libyui

3.10.0

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Chapter 1

Notes about Initialization

1.1 entry points

- YUI::widgetFactory()
- YUI::ui()

1.2 happens on initialization

YUI::ui() calls YUI::ensureUICreated() calls YUILoader::loadUI calls YUILoader::loadPlugin. That instantiates YUIPlugin(string plugin_name) and calls its YUIPlugin::locateSymbol "_Z8createUIb" (mangled createUI(bool)) to produce a YUI * (* createUIFunction_t)(bool withThreads) which is called. Its result is discarded, but YUI::_ui gets initialized by the YUI::YUI ctor called by the derived ctor.

YUIPlugin calls dlopen, but dlclose is not called by default, and actually proably never.

1.3 classes

- YCommandLine

Chapter 2

Hierarchical Index

2.1 Class Hierarchy

This inheritance list is sorted roughly, but not completely, alphabetically:

Chapter 3

Class Index

3.1 Class List

Here are the classes, structs, unions and interfaces with brief descriptions:

Chapter 4

File Index

4.1 File List

Here is a list of all documented files with brief descriptions:

Chapter 5

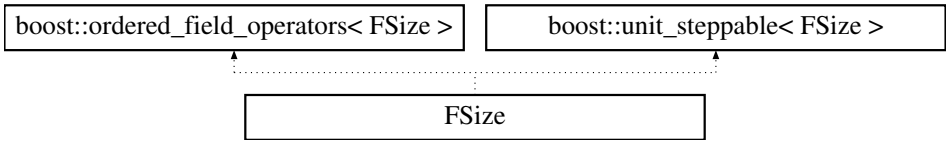
Class Documentation

5.1 FSize Class Reference

Store and operate on (file/package/partition) sizes.

`#include <FSize.h>`

Inheritance diagram for FSize:



Public Types

- enum Unit {
  B, **K**, **M**, **G**,
  T, **P**, **E**, **Z**,
  Y }

  The Units.

Public Member Functions

- FSize (const boost::multiprecision::cpp_int &size_r=0, const Unit unit_r=Unit::B)

  Construct from size in certain unit.
- FSize (double size_r)

  Construct from size in Byte.
- FSize (const std::string &sizeStr, const Unit unit_r=Unit::B)

  Construct from string containing a number in given unit.
- operator long long () const

Conversions to native data types - only explicit as it might overflow If the value is out of range then the behavior depends on the boost version.

- **operator int** () const
- **operator double** () const
- **operator boost::multiprecision::cpp_int** () const
- boost::multiprecision::cpp_int **in_unit** (const Unit unit_r) const
- FSize **operator-** () const
- FSize & **operator+=** (const FSize &rhs)
- FSize & **operator-=** (const FSize &rhs)
- FSize & **operator∗=** (const FSize &rhs)
- FSize & **operator/=** (const FSize &rhs)
- bool **operator<** (const FSize &rhs) const
- bool **operator==** (const FSize &rhs) const
- FSize & **operator++** ()
- FSize & **operator--** ()
- FSize & fillBlock (FSize blocksize_r=boost::multiprecision::cpp_int(KB))

  Adjust size to multiple of `blocksize_r`
- FSize fullBlock (FSize blocksize_r=boost::multiprecision::cpp_int(KB)) const

  Return a new size adjusted to multiple of `blocksize_r`
- Unit bestUnit () const

  Return the best unit for string representation.
- std::string form (const Unit unit_r, unsigned fw=0, unsigned prec=bestPrec, const bool showunit=true) const

  Return string representation in given Unit.
- std::string form (unsigned fw=0, unsigned prec=bestPrec, const bool showunit=true) const

  Return string representation in bestUnit.
- std::string asString () const

  Default string representation (precision 1 and unit appended).

Static Public Member Functions

- static boost::multiprecision::cpp_int factor (const Unit unit_r)

  Return ammount of bytes in Unit.
- static const char ∗ unit (const Unit unit_r)

  String representation of Unit.

Static Public Attributes

- static const boost::multiprecision::cpp_int **KB** = 1024
- static const boost::multiprecision::cpp_int **MB** = FSize::KB ∗ 1024
- static const boost::multiprecision::cpp_int **GB** = FSize::MB ∗ 1024
- static const boost::multiprecision::cpp_int **TB** = FSize::GB ∗ 1024
- static const boost::multiprecision::cpp_int **PB** = FSize::TB ∗ 1024
- static const boost::multiprecision::cpp_int **EB** = FSize::PB ∗ 1024
- static const boost::multiprecision::cpp_int **ZB** = FSize::EB ∗ 1024
- static const boost::multiprecision::cpp_int **YB** = FSize::ZB ∗ 1024
- static const unsigned bestPrec = (unsigned)-1

  Used as precision argument to form(), the 'best' precision according to Unist is chosen.

5.1.1 Detailed Description

Store and operate on (file/package/partition) sizes.

Definition at line 45 of file FSize.h.

5.1.2 Constructor & Destructor Documentation

5.1.2.1 FSize() [1/3]

```
FSize::FSize (
            const boost::multiprecision::cpp_int & size_r = 0,
            const Unit unit_r = Unit::B )  [inline]
```

Construct from size in certain unit.

E.g. `FSize( 1, FSize::Unit::K )` makes 1024 Byte.

Definition at line 121 of file FSize.h.

5.1.2.2 FSize() [2/3]

```
FSize::FSize (
            double size_r )  [inline]
```

Construct from size in Byte.

Parameters

size_r	the initial value

Definition at line 129 of file FSize.h.

5.1.2.3 FSize() [3/3]

```
FSize::FSize (
            const std::string & sizeStr,
            const Unit unit_r = Unit::B )
```

Construct from string containing a number in given unit.

Parameters

sizeStr	input string - must contain *only* numbers
unit_r	optional unit, bytes by default

Exceptions

std::runtime_error	if the string contains any non numeric characters, even a trailing white space!

Definition at line 50 of file FSize.cc.

5.1.3 Member Function Documentation

5.1.3.1 form()

```
std::string FSize::form (
              const Unit unit_r,
              unsigned fw = 0,
              unsigned prec = bestPrec,
              const bool showunit = true ) const
```

Return string representation in given Unit.

Parameter `fw` and `prec` denote field width and precision as in a "%*.*f" printf format string. Avalue of `bestPrec` automatically picks an appropriate precision depending on the unit. If `showunit` ist true, the string representaion of Unit is *appendedseparated by a single blank.*

*If Unit is **B**yte, precision is set to zero.*

Definition at line 111 of file FSize.cc.

5.1.3.2 operator long long()

```
FSize::operator long long ( ) const  [inline], [explicit]
```

Conversions to native data types - only explicit as it might overflow If the value is out of range then the behavior depends on the boost version.

- 1.67 - the min/max values for the corresponding type are returned
- 1.66 - returns just the lower bits

Definition at line 148 of file FSize.h.

The documentation for this class was generated from the following files:

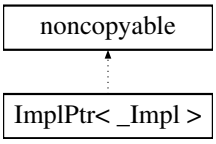
- /usr/src/RPM/BUILD/libyui-3.10.0/src/FSize.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/FSize.cc

5.2 ImplPtr< _Impl > Class Template Reference

Helper template class for implementation pointers (pointers to a private class or structure that hold the member variables of a higher-level class that is part of a public API).

`#include <ImplPtr.h>`

Inheritance diagram for ImplPtr< _Impl >:



Public Types

- typedef _Impl **element_type**

Public Member Functions

- **ImplPtr** (_Impl *impl_r=0)
- void **reset** (_Impl *impl_r=0)
- void **swap** (ImplPtr rhs)
- **operator bool** () const
- const _Impl & **operator*** () const
- const _Impl * **operator->** () const
- const _Impl * **get** () const
- _Impl & **operator*** ()
- _Impl * **operator->** ()
- _Impl * **get** ()

5.2.1 Detailed Description

template<class _Impl>
class ImplPtr< _Impl >

Helper template class for implementation pointers (pointers to a private class or structure that hold the member variables of a higher-level class that is part of a public API).

This pointer class maintains constness of its parent class, i.e. if it is used in a const class the class this pointer points to will also be const.

This class automatically deletes the class it points to in its destructor.

Definition at line 42 of file ImplPtr.h.

The documentation for this class was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/ImplPtr.h

5.3 OptimizeChanges Class Reference

Helper class that calls startMultipleChanges() in its constructor and cares about the necessary call to doneMultiple↩ Changes() when it goes out of scope.

`#include <YWidget_OptimizeChanges.h>`

Public Member Functions

- **OptimizeChanges** (YWidget &w)

5.3.1 Detailed Description

Helper class that calls startMultipleChanges() in its constructor and cares about the necessary call to doneMultiple↩ Changes() when it goes out of scope.

Definition at line 44 of file YWidget_OptimizeChanges.h.

The documentation for this class was generated from the following file:

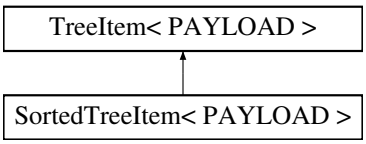
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YWidget_OptimizeChanges.h

5.4 SortedTreeItem< PAYLOAD > Class Template Reference

Template class for tree items that maintain sort order.

`#include <TreeItem.h>`

Inheritance diagram for SortedTreeItem< PAYLOAD >:



Public Member Functions

- SortedTreeItem (PAYLOAD val, SortedTreeItem< PAYLOAD > *parentItem=0)
  Constructor.
- virtual ~SortedTreeItem ()
  Destructor.
- void insertChildSorted (SortedTreeItem< PAYLOAD > *newChild)
  Insert a child into the internal children list in ascending sort order.
- SortedTreeItem< PAYLOAD > * parent () const
  Returns this item's parent or 0 if there is none.
- SortedTreeItem< PAYLOAD > * next () const
  Returns this item's next sibling or 0 if there is none.
- SortedTreeItem< PAYLOAD > * firstChild () const
  Returns this item's first child or 0 if there is none.

Additional Inherited Members

5.4.1 Detailed Description

template<class PAYLOAD>
class SortedTreeItem< PAYLOAD >

Template class for tree items that maintain sort order.

Class 'PAYLOAD' to provide operator<() in addition to what template 'TreeItem' requires.

Definition at line 191 of file TreeItem.h.

5.4.2 Constructor & Destructor Documentation

5.4.2.1 SortedTreeItem()

```
template<class PAYLOAD >
SortedTreeItem< PAYLOAD >::SortedTreeItem (
            PAYLOAD val,
            SortedTreeItem< PAYLOAD > * parentItem = 0 )  [inline]
```

Constructor.

Creates a new tree item with value "val" and inserts it in ascending sort order into the children list of "parent".

Definition at line 199 of file TreeItem.h.

5.4.3 Member Function Documentation

5.4.3.1 insertChildSorted()

```
template<class PAYLOAD >
void SortedTreeItem< PAYLOAD >::insertChildSorted (
            SortedTreeItem< PAYLOAD > * newChild )  [inline]
```

Insert a child into the internal children list in ascending sort order.

Called from the new child's constructor, thus 'public'.

Definition at line 227 of file TreeItem.h.

The documentation for this class was generated from the following file:

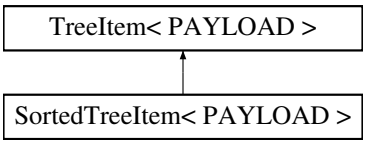
- /usr/src/RPM/BUILD/libyui-3.10.0/src/TreeItem.h

5.5 TreeItem< PAYLOAD > Class Template Reference

Template class for tree items that can handle tree children in a generic way - firstChild(), next() and parent().

`#include <TreeItem.h>`

Inheritance diagram for TreeItem< PAYLOAD >:



Public Member Functions

- TreeItem (const PAYLOAD &val, TreeItem< PAYLOAD > *parent=0)

  Constructor.
- virtual ~TreeItem ()

  Destructor.
- const PAYLOAD & value () const

  Returns this item's value, the "payload".
- void setValue (PAYLOAD newValue)

  Set this item's value, the "payload".
- TreeItem< PAYLOAD > * parent () const

  Returns this item's parent or 0 if there is none.
- TreeItem< PAYLOAD > * next () const

  Returns this item's next sibling or 0 if there is none.
- TreeItem< PAYLOAD > * firstChild () const

  Returns this item's first child or 0 if there is none.
- void setParent (TreeItem< PAYLOAD > *newParent)

  Sets this item's parent.
- void setNext (TreeItem< PAYLOAD > *newNext)

  Sets this item's next sibling.
- void setFirstChild (TreeItem< PAYLOAD > *newFirstChild)

  Sets this item's first child.
- void addChild (TreeItem< PAYLOAD > *newChild)

  Add a child to the internal children list - usually called from within the child's default constructor.

Protected Member Functions

- TreeItem (PAYLOAD val, bool autoAddChild, TreeItem< PAYLOAD > *parent=0)

  Constructor to be called for derived classes: Decide whether or not to automatically insert this item into the parent's children list.

Protected Attributes

- PAYLOAD **_value**
- TreeItem< PAYLOAD > * **_parent**
- TreeItem< PAYLOAD > * **_next**
- TreeItem< PAYLOAD > * **_firstChild**

5.5.1 Detailed Description

template<class PAYLOAD>
class TreeItem< PAYLOAD >

Template class for tree items that can handle tree children in a generic way - firstChild(), next() and parent().

Each item stores one value of type 'PAYLOAD'.

Class 'PAYLOAD' needs to provide operator=().

Definition at line 40 of file TreeItem.h.

5.5.2 Constructor & Destructor Documentation

5.5.2.1 TreeItem() [1/2]

```
template<class PAYLOAD >
TreeItem< PAYLOAD >::TreeItem (
            const PAYLOAD & val,
            TreeItem< PAYLOAD > * parent = 0 )  [inline]
```

Constructor.

Creates a new tree item with value "val" and inserts it (without maintaining any meaningful sort order!) into the children list of "parent".

Definition at line 49 of file TreeItem.h.

5.5.2.2 TreeItem() [2/2]

```
template<class PAYLOAD >
TreeItem< PAYLOAD >::TreeItem (
            PAYLOAD val,
            bool autoAddChild,
            TreeItem< PAYLOAD > * parent = 0 )  [inline], [protected]
```

Constructor to be called for derived classes: Decide whether or not to automatically insert this item into the parent's children list.

Useful for derived classes that want to maintain a specific sort order among children.

Definition at line 69 of file TreeItem.h.

5.5.2.3 ~TreeItem()

```
template<class PAYLOAD >
virtual TreeItem< PAYLOAD >::~TreeItem ( )  [inline], [virtual]
```

Destructor.

Takes care of children - they will be deleted along with this item.

Definition at line 97 of file TreeItem.h.

5.5.3 Member Function Documentation

5.5.3.1 addChild()

```
template<class PAYLOAD >
void TreeItem< PAYLOAD >::addChild (
            TreeItem< PAYLOAD > * newChild )  [inline]
```

Add a child to the internal children list - usually called from within the child's default constructor.

This default method does not maintain any meaningful sorting order - derived classes that require this might want to use the other constructor (with 'autoAddChild' set to 'false') take care of child insertion themselves.

Definition at line 165 of file TreeItem.h.

5.5.3.2 setValue()

```
template<class PAYLOAD >
void TreeItem< PAYLOAD >::setValue (
             PAYLOAD newValue )  [inline]
```

Set this item's value, the "payload".

If the sort order among children of one level is important, overwrite this method and change the sort order according to the new value. The template class itself never calls this.

Definition at line 122 of file TreeItem.h.

The documentation for this class was generated from the following file:

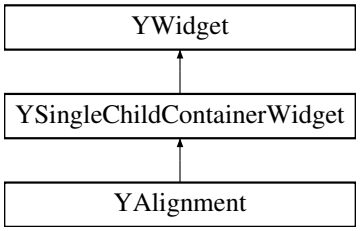
- /usr/src/RPM/BUILD/libyui-3.10.0/src/TreeItem.h

5.6 YAlignment Class Reference

Implementation of all the alignment widgets:

```
#include <YAlignment.h>
```

Inheritance diagram for YAlignment:



Public Member Functions

- virtual ~YAlignment ()

  Destructor.
- virtual const char * widgetClass () const

  Return a descriptive name of this widget class for logging, debugging etc.
- YAlignmentType alignment (YUIDimension dim) const

  Return the alignment in the specified dimension.
- int leftMargin () const

  Return the left margin in pixels, the distance between the left edge of this alignment and the left edge of the child widget.
- int rightMargin () const

  Return the right margin in pixels, the distance between the right edge of this alignment and the right edge of the child widget.
- int topMargin () const

Return the top margin in pixels, the distance between the top edge of this alignment and the top edge of the child widget.

- int bottomMargin () const

  Return the bottom margin in pixels, the distance between the bottom edge of this alignment and the bottom edge of the child widget.
- int totalMargins (YUIDimension dim) const

  Return the sum of all margins in the specified dimension.
- void setLeftMargin (int margin)

  Set the left margin in pixels.
- void setRightMargin (int margin)

  Set the right margin in pixels.
- void setTopMargin (int margin)

  Set the top margin in pixels.
- void setBottomMargin (int margin)

  Set the bottom margin in pixels.
- int minWidth () const

  Return the minimum width of this alignment or 0 if none is set.
- int minHeight () const

  Return the minimum height of this alignment or 0 if none is set.
- void setMinWidth (int width)

  Set the minimum width to return for preferredWidth().
- void setMinHeight (int height)

  Set the minimum height to return for preferredHeight().
- virtual void setBackgroundPixmap (const std::string &pixmapFileName)

  Set a background pixmap.
- std::string backgroundPixmap () const

  Return the name of the background pixmap or an empty string, if there is none.
- virtual void addChild (YWidget *child)

  Add a child widget.
- virtual void moveChild (YWidget *child, int newx, int newy)=0

  Move a child widget to a new position.
- virtual bool stretchable (YUIDimension dim) const

  Return this widget's stretchability.
- virtual int preferredWidth ()

  Preferred width of the widget.
- virtual int preferredHeight ()

  Preferred height of the widget.
- virtual void setSize (int newWidth, int newHeight)

  Set the current size and move the child widget according to its alignment.

Protected Member Functions

- YAlignment (YWidget *parent, YAlignmentType horAlign, YAlignmentType vertAlign)

  Constructor.

Protected Attributes

- ImplPtr< YAlignmentPrivate > **priv**

5.6.1 Detailed Description

Implementation of all the alignment widgets:

- Left, Right, HCenter,
- Top, Bottom, VCenter,
- HVCenter
- MinSize, MinWidth, MinHeight

Definition at line 41 of file YAlignment.h.

5.6.2 Member Function Documentation

5.6.2.1 addChild()

```
void YAlignment::addChild (
             YWidget * child )  [virtual]
```

Add a child widget.

Reimplemented from YSingleChildContainerWidget to propagate stretchability down to the single child.

Reimplemented from YWidget.

Definition at line 176 of file YAlignment.cc.

5.6.2.2 minHeight()

```
int YAlignment::minHeight ( ) const
```

Return the minimum height of this alignment or 0 if none is set.

preferredHeight() will never return less than this value.

Definition at line 152 of file YAlignment.cc.

5.6.2.3 minWidth()

```
int YAlignment::minWidth ( ) const
```

Return the minimum width of this alignment or 0 if none is set.

preferredWidth() will never return less than this value.

Definition at line 146 of file YAlignment.cc.

5.6.2.4 preferredHeight()

```
int YAlignment::preferredHeight ( )  [virtual]
```

Preferred height of the widget.

Reimplemented from YWidget.

Reimplemented from YSingleChildContainerWidget.

Definition at line 206 of file YAlignment.cc.

5.6.2.5 preferredWidth()

```
int YAlignment::preferredWidth ( )  [virtual]
```

Preferred width of the widget.

Reimplemented from YWidget.

Reimplemented from YSingleChildContainerWidget.

Definition at line 194 of file YAlignment.cc.

5.6.2.6 setBackgroundPixmap()

```
void YAlignment::setBackgroundPixmap (
             const std::string & pixmapFileName )  [virtual]
```

Set a background pixmap.

Derived classes may want to overwrite this.

This parent method should be called first in the overwritten method to ensure path expansion is done as specified (prepend the theme path ("/usr/share/libyui/theme/") if the path doesn't start with "/" or ".").

Definition at line 333 of file YAlignment.cc.

5.6.2.7 setSize()

```
void YAlignment::setSize (
             int newWidth,
             int newHeight )  [virtual]
```

Set the current size and move the child widget according to its alignment.

Derived classes should reimplement this, but call this base class function in their own implementation.

Reimplemented from YSingleChildContainerWidget.

Definition at line 218 of file YAlignment.cc.

5.6.2.8 stretchable()

```
bool YAlignment::stretchable (
             YUIDimension dim ) const  [virtual]
```

Return this widget's stretchability.

Reimplemented from YWidget.

In an aligned dimension the widget is always stretchable. In an unchanged dimension the widget is stretchable if the child is stretchable.

Reimplemented from YSingleChildContainerWidget.

Definition at line 185 of file YAlignment.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YAlignment.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YAlignment.cc

5.7 YAlignmentPrivate Struct Reference

Public Member Functions

- YAlignmentPrivate (YAlignmentType horAlign, YAlignmentType vertAlign)

  Constructor.

Public Attributes

- int **leftMargin**
- int **rightMargin**
- int **topMargin**
- int **bottomMargin**
- int **minWidth**
- int **minHeight**
- string **backgroundPixmap**
- YBothDim< YAlignmentType > **alignment**

5.7.1 Detailed Description

Definition at line 37 of file YAlignment.cc.

The documentation for this struct was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YAlignment.cc

5.8 YApplication Class Reference

Class for application-wide values and functions.

`#include <YApplication.h>`

Public Member Functions

- YWidget * findWidget (YWidgetID *id, bool doThrow=true) const

  Find a widget in the topmost dialog by its ID.
- virtual std::string iconBasePath () const

  Get the base path for icons used by the UI.
- virtual void setIconBasePath (const std::string &newIconBasePath)

  Set the icon base path.
- YIconLoader * **iconLoader** ()
- int defaultFunctionKey (const std::string &label) const

  Return the default function key number for a widget with the specified label or 0 if there is none.
- void setDefaultFunctionKey (const std::string &label, int fkey)

  Add a mapping from the specified label to the specified F-key number.
- void clearDefaultFunctionKeys ()

  Clear all previous label-to-function-key mappings.
- virtual void setLanguage (const std::string &language, const std::string &encoding=std::string())

  Set language and encoding for the locale environment ($LANG).
- std::string language (bool stripEncoding=false) const

  Return the current language from the locale environment ($LANG).
- virtual std::string glyph (const std::string &glyphSymbolName)

Return a string for a named glyph:

- virtual std::string askForExistingDirectory (const std::string &startDir, const std::string &headline)=0

  Open a directory selection box and prompt the user for an existing directory.

- virtual std::string askForExistingFile (const std::string &startWith, const std::string &filter, const std::string &headline)=0

  Open a file selection box and prompt the user for an existing file.

- virtual std::string askForSaveFileName (const std::string &startWith, const std::string &filter, const std::string &headline)=0

  Open a file selection box and prompt the user for a file to save data to.

- virtual bool openContextMenu (const YItemCollection &itemCollection)

  Open a context menu for a widget.

- virtual void setProductName (const std::string &productName)

  Set the current product name ("openSUSE", "SLES", ...).

- std::string productName () const

  Get the current product name ("openSUSE", "SLES", ...).

- void setReleaseNotes (const std::map< std::string, std::string > &relNotes)

  Set release notes; map product => text.

- std::map< std::string, std::string > releaseNotes () const

  Get the current release notes map.

- void setShowProductLogo (bool show)

  Set whether the product logo (in top bar) should be shown.

- bool showProductLogo () const

  Return true if product logo should be shown.

- virtual int deviceUnits (YUIDimension dim, float layoutUnits)

  Convert logical layout spacing units into device dependent units.

- virtual float layoutUnits (YUIDimension dim, int deviceUnits)

  Convert device dependent units into logical layout spacing units.

- virtual void setReverseLayout (bool reverse)

  Set reverse layout for Arabic / Hebrew support.

- bool reverseLayout () const

  Returns 'true' if widget geometry should be reversed for languages that have right-to-left writing direction (Arabic, Hebrew).

- virtual void busyCursor ()

  Change the (mouse) cursor to indicate busy status.

- virtual void normalCursor ()

  Change the (mouse) cursor back from busy status to normal.

- virtual void makeScreenShot (const std::string &fileName)

  Make a screen shot and save it to the specified file.

- virtual void beep ()

  Beep.

- virtual void redrawScreen ()

  Redraw the screen.

- virtual void initConsoleKeyboard ()

  Initialize the (text) console keyboard.

- virtual void setConsoleFont (const std::string &console_magic, const std::string &font, const std::string &screen_map, const std::string &unicode_map, const std::string &language)

  Set the (text) console font according to the current encoding etc.

- virtual int runInTerminal (const std::string &command)

Run a shell command (typically an interactive program using NCurses) in a terminal (window).

- virtual int **displayWidth** ()=0
- virtual int **displayHeight** ()=0
- virtual int **displayDepth** ()=0
- virtual long **displayColors** ()=0
- virtual int **defaultWidth** ()=0
- virtual int **defaultHeight** ()=0
- virtual bool **isTextMode** ()=0
- virtual bool **hasImageSupport** ()=0
- virtual bool **hasIconSupport** ()=0
- virtual bool **hasAnimationSupport** ()=0
- virtual bool **hasFullUtf8Support** ()=0
- virtual bool **richTextSupportsTable** ()=0
- virtual bool **leftHandedMouse** ()=0
- virtual bool **hasWizardDialogSupport** ()
- virtual void setApplicationTitle (const std::string &title)

  Set the application title.
- virtual const std::string & applicationTitle () const

  Get the application title.
- virtual void setApplicationIcon (const std::string &icon)

  Set the application Icon.
- virtual const std::string & applicationIcon () const

  Get the application Icon.

- virtual void openUI ()

  To mix TUI (NCurses) with stdio, enclose the UI parts within openUI/closeUI.
- virtual void **closeUI** ()

Protected Member Functions

- YApplication ()

  Constructor.
- virtual ~YApplication ()

  Destructor.

Friends

- class **YUI**

5.8.1 Detailed Description

Class for application-wide values and functions.

This is a singleton. Access and create it via the static functions in YUI.

Definition at line 45 of file YApplication.h.

5.8.2 Constructor & Destructor Documentation

5.8.2.1 YApplication()

```
YApplication::YApplication ( )  [protected]
```

Constructor.

Use YUI::app() to get the singleton for this class.

Definition at line 64 of file YApplication.cc.

5.8.3 Member Function Documentation

5.8.3.1 applicationIcon()

```
const string & YApplication::applicationIcon ( ) const  [virtual]
```

Get the application Icon.

Default icon is an empty string

Definition at line 297 of file YApplication.cc.

5.8.3.2 applicationTitle()

```
const string & YApplication::applicationTitle ( ) const  [virtual]
```

Get the application title.

Default title is the running command (argv[0])

Definition at line 288 of file YApplication.cc.

5.8.3.3 askForExistingDirectory()

```
virtual std::string YApplication::askForExistingDirectory (
             const std::string & startDir,
             const std::string & headline )  [pure virtual]
```

Open a directory selection box and prompt the user for an existing directory.

'startDir' is the initial directory that is displayed.

'headline' is an explanatory text for the directory selection box. Graphical UIs may omit that if no window manager is running.

Returns the selected directory name or an empty string if the user canceled the operation.

Derived classes are required to implement this.

5.8.3.4 askForExistingFile()

```
virtual std::string YApplication::askForExistingFile (
             const std::string & startWith,
             const std::string & filter,
             const std::string & headline )  [pure virtual]
```

Open a file selection box and prompt the user for an existing file.

'startWith' is the initial directory or file.

'filter' is one or more blank-separated file patterns, e.g. "∗.png ∗.jpg"

'headline' is an explanatory text for the file selection box. Graphical UIs may omit that if no window manager is running.

Returns the selected file name or an empty string if the user canceled the operation.

Derived classes are required to implement this.

5.8.3.5 askForSaveFileName()

```
virtual std::string YApplication::askForSaveFileName (
             const std::string & startWith,
             const std::string & filter,
             const std::string & headline )  [pure virtual]
```

Open a file selection box and prompt the user for a file to save data to.

Automatically asks for confirmation if the user selects an existing file.

'startWith' is the initial directory or file.

'filter' is one or more blank-separated file patterns, e.g. "∗.png ∗.jpg"

'headline' is an explanatory text for the file selection box. Graphical UIs may omit that if no window manager is running.

Returns the selected file name or an empty string if the user canceled the operation.

Derived classes are required to implement this.

5.8.3.6 beep()

```
virtual void YApplication::beep ( )  [inline], [virtual]
```

Beep.

This default implementation does nothing.

Definition at line 327 of file YApplication.h.

5.8.3.7 busyCursor()

```
virtual void YApplication::busyCursor ( )  [inline], [virtual]
```

Change the (mouse) cursor to indicate busy status.

This default implementation does nothing.

Definition at line 309 of file YApplication.h.

5.8.3.8 defaultFunctionKey()

```
int YApplication::defaultFunctionKey (
            const std::string & label ) const
```

Return the default function key number for a widget with the specified label or 0 if there is none.

Any keyboard shortcuts that may be contained in 'label' are stripped away before any comparison.

The basic idea behind this concept is to have an easy default mapping from buttons etc. with the same semantics to function keys:

"OK" -> F10 "Accept" -> F10 "Yes" -> F10 "Next" -> F10

"Cancel" -> F9 "No" -> F9 ...

This function returns 10 for F10, F for F9 etc.; 0 means "no function key".

Definition at line 163 of file YApplication.cc.

5.8.3.9 deviceUnits()

```
int YApplication::deviceUnits (
            YUIDimension dim,
            float layoutUnits )  [virtual]
```

Convert logical layout spacing units into device dependent units.

A default size dialog is assumed to be 80x25 layout spacing units.

Derived classes may want to reimplement this method.

Definition at line 262 of file YApplication.cc.

5.8.3.10 findWidget()

```
YWidget * YApplication::findWidget (
            YWidgetID * id,
            bool doThrow = true ) const
```

Find a widget in the topmost dialog by its ID.

If there is no widget with that ID (or no dialog at all), this function throws a YUIWidgetNotFoundException if 'doThrow' is 'true'. It returns 0 if 'doThrow' is 'false'.

Definition at line 82 of file YApplication.cc.

5.8.3.11 glyph()

```
string YApplication::glyph (
            const std::string & glyphSymbolName )  [virtual]
```

Return a string for a named glyph:

YUIGlyph_ArrowLeft YUIGlyph_ArrowRight YUIGlyph_ArrowUp YUIGlyph_ArrowDown YUIGlyph_CheckMark YUI↩ Glyph_BulletArrowRight YUIGlyph_BulletCircle YUIGlyph_BulletSquare

Using this is discouraged in new applications. This method is available for backward compatibility.

This default implementation returns simple textual representations for each glyph simbol (e.g., "->" for YUIGlyphArror↩ Right).

Derived classes are free to overwrite this. It does not make sense to call this base class method in a new implementation.

Definition at line 235 of file YApplication.cc.

5.8.3.12 iconBasePath()

```
string YApplication::iconBasePath ( ) const  [virtual]
```

Get the base path for icons used by the UI.

Selection widgets like YSelectionBox, YComboBox, etc. or YWizard prepend this to icon specifications that don't use an absolute path.

Definition at line 94 of file YApplication.cc.

5.8.3.13 initConsoleKeyboard()

```
virtual void YApplication::initConsoleKeyboard ( )  [inline], [virtual]
```

Initialize the (text) console keyboard.

This default implementation does nothing.

Definition at line 344 of file YApplication.h.

5.8.3.14 language()

```
string YApplication::language (
            bool stripEncoding = false ) const
```

Return the current language from the locale environment ($LANG).

If 'stripEncoding' is true, any encoding (".utf8" etc.) is removed.

Definition at line 211 of file YApplication.cc.

5.8.3.15 layoutUnits()

```
float YApplication::layoutUnits (
            YUIDimension dim,
            int deviceUnits )  [virtual]
```

Convert device dependent units into logical layout spacing units.

A default size dialog is assumed to be 80x25 layout spacing units.

Derived classes may want to reimplement this method.

Definition at line 269 of file YApplication.cc.

5.8.3.16 makeScreenShot()

```
virtual void YApplication::makeScreenShot (
            const std::string & fileName )  [inline], [virtual]
```

Make a screen shot and save it to the specified file.

This default implementation does nothing.

Definition at line 321 of file YApplication.h.

5.8.3.17 normalCursor()

```
virtual void YApplication::normalCursor ( )  [inline], [virtual]
```

Change the (mouse) cursor back from busy status to normal.

This default implementation does nothing.

Definition at line 315 of file YApplication.h.

5.8.3.18 openContextMenu()

```
bool YApplication::openContextMenu (
            const YItemCollection & itemCollection )  [virtual]
```

Open a context menu for a widget.

'itemCollection' describes the menu structure

Returns true on success (otherwise false).

Derived classes are free to overwrite this.

Definition at line 253 of file YApplication.cc.

5.8.3.19 openUI()

```
virtual void YApplication::openUI ( )  [inline], [virtual]
```

To mix TUI (NCurses) with stdio, enclose the UI parts within openUI/closeUI.

This default implementation does nothing.

Definition at line 379 of file YApplication.h.

5.8.3.20 redrawScreen()

```
virtual void YApplication::redrawScreen ( )  [inline], [virtual]
```

Redraw the screen.

This default implementation does nothing.

Definition at line 338 of file YApplication.h.

5.8.3.21 runInTerminal()

```
int YApplication::runInTerminal (
            const std::string & command )  [virtual]
```

Run a shell command (typically an interactive program using NCurses) in a terminal (window).

This is useful for text UIs (e.g., NCurses) that need special preparation prior to running an NCurses-based application and special clean-up afterwards.

This default implementation logs an error and returns -1.

Definition at line 276 of file YApplication.cc.

5.8.3.22 setConsoleFont()

```
virtual void YApplication::setConsoleFont (
            const std::string & console_magic,
            const std::string & font,
            const std::string & screen_map,
            const std::string & unicode_map,
            const std::string & language )  [inline], [virtual]
```

Set the (text) console font according to the current encoding etc.

See the setfont(8) command and the console HowTo for details.

This default implementation does nothing.

Definition at line 352 of file YApplication.h.

5.8.3.23 setDefaultFunctionKey()

```
void YApplication::setDefaultFunctionKey (
             const std::string & label,
             int fkey )
```

Add a mapping from the specified label to the specified F-key number.

This is the counterpart to defaultFunctionKey().

This only affects widgets that are created after this call.

Definition at line 176 of file YApplication.cc.

5.8.3.24 setLanguage()

```
void YApplication::setLanguage (
             const std::string & language,
             const std::string & encoding = std::string() )  [virtual]
```

Set language and encoding for the locale environment ($LANG).

This affects UI-internal translations (e.g. for predefined dialogs like file selection), encoding and fonts.

'language' is the ISO short code ("de_DE", "en_US", ...).

'encoding' an (optional) encoding ("utf8", ...) that will be appended if present.

Derived classes can overwrite this method, but they should call this base class method at the beginning of the new implementation.

Definition at line 193 of file YApplication.cc.

5.8.3.25 setProductName()

```
void YApplication::setProductName (
             const std::string & productName )  [virtual]
```

Set the current product name ("openSUSE", "SLES", ...).

This name will be expanded in help texts when the entity is used.

Derived classes can overwrite this method, but they should call this base class method in the new implementation.

Definition at line 113 of file YApplication.cc.

5.8.3.26 setReleaseNotes()

```
void YApplication::setReleaseNotes (
            const std::map< std::string, std::string > & relNotes )
```

Set release notes; map product => text.

Definition at line 126 of file YApplication.cc.

5.8.3.27 setReverseLayout()

```
void YApplication::setReverseLayout (
            bool reverse )  [virtual]
```

Set reverse layout for Arabic / Hebrew support.

Derived classes can overwrite this method, but they should call this base class method in the new implementation.

Definition at line 150 of file YApplication.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YApplication.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YApplication.cc

5.9 YApplicationPrivate Struct Reference

Public Attributes

- string **productName**
- bool **reverseLayout**
- string **applicationTitle**
- string **applicationIcon**
- YFunctionKeyMap **defaultFunctionKey**
- YIconLoader * **iconLoader**
- map< string, string > **releaseNotes**
- bool **showProductLogo**

5.9.1 Detailed Description

Definition at line 45 of file YApplication.cc.

The documentation for this struct was generated from the following file:

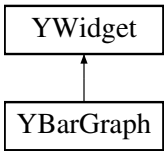
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YApplication.cc

5.10 YBarGraph Class Reference

A graph showing partitioning of a whole.

`#include <YBarGraph.h>`

Inheritance diagram for YBarGraph:



Public Member Functions

- virtual ~YBarGraph ()

  Destructor.
- virtual const char * widgetClass () const

  Return a descriptive name of this widget class for logging, debugging etc.
- void addSegment (const YBarGraphSegment &segment)

  Add one segment.
- void deleteAllSegments ()

  Delete all segments.
- int segments ()

  Return the current number of segments.
- const YBarGraphSegment & segment (int segmentIndex) const

  Return the segment with the specified index (from 0 on).
- void setValue (int segmentIndex, int newValue)

  Set the value of the segment with the specifie index (from 0 on).
- void setLabel (int segmentIndex, const std::string &newLabel)

  Set the label of the segment with the specified index (from 0 on).
- void setSegmentColor (int segmentIndex, const YColor &color)

  Set the background color of the segment with the specified index (from 0 on).
- void setTextColor (int segmentIndex, const YColor &color)

  Set the text color of the segment with the specified index (from 0 on).
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.

Protected Member Functions

- YBarGraph (YWidget *parent)

  Constructor.
- virtual void doUpdate ()=0

  Perform a display update after any change to any of the segments.

Friends

- class **YBarGraphMultiUpdate**

5.10.1 Detailed Description

A graph showing partitioning of a whole.

The whole is divided into YBarGraphSegment each of which has a relative size, a text color, a background color, and a label.

Definition at line 40 of file YBarGraph.h.

5.10.2 Member Function Documentation

5.10.2.1 addSegment()

```
void YBarGraph::addSegment (
            const YBarGraphSegment & segment )
```

Add one segment.

If the segment's background and text colors are not explicitly specified, the YBarGraph widget will assign them from a list of (at least 5 different) color sets.

When adding multiple segments, use a YBarGraphMultiUpdate object for improved performance to hold back display updates until all segments are added.

Definition at line 97 of file YBarGraph.cc.

5.10.2.2 doUpdate()

```
virtual void YBarGraph::doUpdate ( )  [protected], [pure virtual]
```

Perform a display update after any change to any of the segments.

Derived classes are required to implement this.

5.10.2.3 getProperty()

```
YPropertyValue YBarGraph::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 212 of file YBarGraph.cc.

5.10.2.4 propertySet()

```
const YPropertySet & YBarGraph::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 175 of file YBarGraph.cc.

5.10.2.5 segment()

```
const YBarGraphSegment & YBarGraph::segment (
            int segmentIndex ) const
```

Return the segment with the specified index (from 0 on).

This will throw an exception if there are not this many segments.

Definition at line 113 of file YBarGraph.cc.

5.10.2.6 setLabel()

```
void YBarGraph::setLabel (
             int segmentIndex,
             const std::string & newLabel )
```

Set the label of the segment with the specified index (from 0 on).

Use %1 as a placeholder for the current value.

This will throw an exception if there are not this many segments.

Note: Use a YBarGraphMultiUpdate object for improved performance when doing multiple changes at the same time.

Definition at line 139 of file YBarGraph.cc.

5.10.2.7 setProperty()

```
bool YBarGraph::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This function may throw YUIPropertyExceptions.

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 196 of file YBarGraph.cc.

5.10.2.8 setSegmentColor()

```
void YBarGraph::setSegmentColor (
             int segmentIndex,
             const YColor & color )
```

Set the background color of the segment with the specified index (from 0 on).

This will throw an exception if there are not this many segments or if the color is undefined.

Definition at line 149 of file YBarGraph.cc.

5.10.2.9 setTextColor()

```
void YBarGraph::setTextColor (
             int segmentIndex,
             const YColor & color )
```

Set the text color of the segment with the specified index (from 0 on).

This will throw an exception if there are not this many segments or if the color is undefined.

Definition at line 162 of file YBarGraph.cc.

5.10.2.10 setValue()

```
void YBarGraph::setValue (
             int segmentIndex,
             int newValue )
```

Set the value of the segment with the specifie index (from 0 on).

This will throw an exception if there are not this many segments.

Note: Use a YBarGraphMultiUpdate object for improved performance when doing multiple changes at the same time.

Definition at line 129 of file YBarGraph.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YBarGraph.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YBarGraph.cc

5.11 YBarGraphMultiUpdate Class Reference

Helper class for multiple updates to a YBarGraph widget: This will hold back display updates until this object goes out of scope.

```
#include <YBarGraph.h>
```

Public Member Functions

- YBarGraphMultiUpdate (YBarGraph *barGraph)

  Constructor.
- ~YBarGraphMultiUpdate ()

  Destructor.

5.11.1 Detailed Description

Helper class for multiple updates to a YBarGraph widget: This will hold back display updates until this object goes out of scope.

Definition at line 285 of file YBarGraph.h.

5.11.2 Constructor & Destructor Documentation

5.11.2.1 YBarGraphMultiUpdate()

```
YBarGraphMultiUpdate::YBarGraphMultiUpdate (
            YBarGraph * barGraph )
```

Constructor.

This will make the corresponding YBarGraph widget hold back any pending display updates (due to changed values, labels, or colors) until this object is destroyed (goes out of scope).

Create objects of this class on the stack (as local variables) and simply let them go out of scope.

Example:

{ YBarGraphMultiUpdate multiUpdate(myBarGraph); myBarGraph->setValue(0, 42); // No display update yet my↩ BarGraph->setValue(1, 84); // No display update yet myBarGraph->setValue(2, 21); // No display update yet

} // multiUpdate goes out of scope, will trigger display update now

Definition at line 227 of file YBarGraph.cc.

5.11.2.2 ~YBarGraphMultiUpdate()

```
YBarGraphMultiUpdate::~YBarGraphMultiUpdate ( )
```

Destructor.

This will trigger display updates of the corresponding YBarGraph widget if any are necessary.

Definition at line 236 of file YBarGraph.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YBarGraph.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YBarGraph.cc

5.12 YBarGraphPrivate Struct Reference

Public Attributes

- std::vector< YBarGraphSegment > **segments**
- bool **updatesPending**
- bool **postponeUpdates**

5.12.1 Detailed Description

Definition at line 53 of file YBarGraph.cc.

The documentation for this struct was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YBarGraph.cc

5.13 YBarGraphSegment Class Reference

One segment of a YBarGraph.

`#include <YBarGraph.h>`

Public Member Functions

- YBarGraphSegment (int value=0, const std::string &label=std::string(), const YColor &segmentColor=YColor(), const YColor &textColor=YColor())

  Constructor.
- int value () const

  Return the current value of this segment.
- void setValue (int newValue)

  Set the value of this segment.
- std::string label () const

  Return the current text label of this segment.
- void setLabel (const std::string &newLabel)

  Set the text label of this segment.
- YColor segmentColor () const

  Return the segment background color.
- bool hasSegmentColor () const

  Return 'true' if this segment's background color is defined, i.e.
- void setSegmentColor (const YColor &color)

  Set this segment's background color.
- YColor textColor () const

  Return this segment's text color.
- bool hasTextColor () const

  Return 'true' if this segment's text color is defined, i.e.
- void setTextColor (const YColor &color)

  Set this segment's text color.

5.13.1 Detailed Description

One segment of a YBarGraph.

It has a relative size, a label, label color and background color.

Definition at line 186 of file YBarGraph.h.

5.13.2 Constructor & Destructor Documentation

5.13.2.1 YBarGraphSegment()

```
YBarGraphSegment::YBarGraphSegment (
            int value = 0,
            const std::string & label = std::string(),
            const YColor & segmentColor = YColor(),
            const YColor & textColor = YColor() )  [inline]
```

Constructor.

'value' is the initial value of this segment.

'label' is the label text in the segment. Use %1 as a placeholder for the current value.

'segmentColor' is the background color of this segment.

'textColor' is the color for the label text.

The YBarGraph widget will automatically assign some default colors (one of at least 5 different ones) if none are specified.

Definition at line 204 of file YBarGraph.h.

5.13.3 Member Function Documentation

5.13.3.1 hasSegmentColor()

```
bool YBarGraphSegment::hasSegmentColor ( ) const  [inline]
```

Return 'true' if this segment's background color is defined, i.e.

it has a real RGB value and was not just created with the default constructor.

Definition at line 246 of file YBarGraph.h.

5.13.3.2 hasTextColor()

```
bool YBarGraphSegment::hasTextColor ( ) const  [inline]
```

Return 'true' if this segment's text color is defined, i.e.

it has a real RGB value and was not just created with the default constructor.

Definition at line 263 of file YBarGraph.h.

5.13.3.3 label()

```
std::string YBarGraphSegment::label ( ) const  [inline]
```

Return the current text label of this segment.

Any %1 placeholder will be returned as %1 (not expanded).

Definition at line 228 of file YBarGraph.h.

5.13.3.4 setLabel()

```
void YBarGraphSegment::setLabel (
            const std::string & newLabel )  [inline]
```

Set the text label of this segment.

Use %1 as a placeholder for the current value.

Definition at line 234 of file YBarGraph.h.

The documentation for this class was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YBarGraph.h

5.14 YBothDim< T > Class Template Reference

Template class for two-dimensional entities, such as.

```
#include <YBothDim.h>
```

Public Member Functions

- YBothDim (T hor, T vert)

  Constructor with explicit initialization for both values.
- YBothDim ()

  Default constructor (calls T default constructor for both values)
- T & operator[ ] (YUIDimension dim)

  operator[] for alternative access via myVar[YD_HORIZ] Please note that this returns a non-const reference, so this can be used as an lvalue (e.g., in assignments)
- const T & operator[ ] (YUIDimension dim) const

  Same as above for const objects.

Public Attributes

- T **vert**
- T **hor**

5.14.1 Detailed Description

template<**typename T**>
class YBothDim< **T** >

Template class for two-dimensional entities, such as.

- width, height
- x_pos, y_pos
- hStretchable, vStretchable

Precondition: type T needs to have a default constructor (which all simple types like int, long, bool have).

Definition at line 41 of file YBothDim.h.

The documentation for this class was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YBothDim.h

5.15 YBuiltinCaller Class Reference

Abstract base class for transparently calling a built-in function.

`#include <YBuiltinCaller.h>`

Public Member Functions

- virtual void call ()=0

  Call the built-in.

5.15.1 Detailed Description

Abstract base class for transparently calling a built-in function.

Derived classes will want to add some methods to store the function to be called, arguments to that function and its result and to retrieve the result when needed.

See YCPBuiltinCaller.h for an implementation.

Definition at line 37 of file YBuiltinCaller.h.

5.15.2 Member Function Documentation

5.15.2.1 call()

```
virtual void YBuiltinCaller::call ( )  [pure virtual]
```

Call the built-in.

This will be called in the UI thread with appropriate syncing between the threads.

Derived classes might want to store the result of the call in a member variable in this class so it can later be queried.

Derived classes are required to implement this method.

The documentation for this class was generated from the following file:

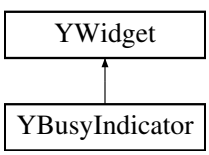
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YBuiltinCaller.h

5.16 YBusyIndicator Class Reference

Indicates that something is in progress and has not frozen yet.

```
#include <YBusyIndicator.h>
```

Inheritance diagram for YBusyIndicator:



Public Member Functions

- virtual ~YBusyIndicator ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- std::string label ()

  Get the label (the caption above the progress bar).
- virtual void setLabel (const std::string &label)

  Set the label (the caption above the progress bar).
- int timeout () const

  Return the current timeout in milliseconds.
- virtual void setTimeout (int newTimeout)

  Set the timeout in milliseconds after that the widget shows 'stalled' when no new tick is received.
- bool alive () const

  Return whether busy indicator is alive or in stalled stated.
- virtual void setAlive (bool newAlive)

  Send a keep alive message to prevent BusyIndicator from changing to 'stalled' state.
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.

Protected Member Functions

- YBusyIndicator (YWidget *parent, const std::string &label, int timeout=1000, bool alive=true)

  Constructor.

5.16.1 Detailed Description

Indicates that something is in progress and has not frozen yet.

It has a label and an "indeterminate" progress bar which will be "ticking" until a timeout occurs or until it receives an "alive" message.

Definition at line 38 of file YBusyIndicator.h.

5.16.2 Member Function Documentation

5.16.2.1 getProperty()

```
YPropertyValue YBusyIndicator::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 151 of file YBusyIndicator.cc.

5.16.2.2 propertySet()

```
const YPropertySet & YBusyIndicator::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 112 of file YBusyIndicator.cc.

5.16.2.3 setAlive()

```
void YBusyIndicator::setAlive (
            bool newAlive )  [virtual]
```

Send a keep alive message to prevent BusyIndicator from changing to 'stalled' state.

Derived classes should reimplement this, but they should call this base class method at the end of the overloaded function.

Definition at line 101 of file YBusyIndicator.cc.

5.16.2.4 setLabel()

```
void YBusyIndicator::setLabel (
            const std::string & label )  [virtual]
```

Set the label (the caption above the progress bar).

Derived classes are free to reimplement this, but they should call this base class method at the end of the overloaded function.

Definition at line 80 of file YBusyIndicator.cc.

5.16.2.5 setProperty()

```
bool YBusyIndicator::setProperty (
            const std::string & propertyName,
            const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This function may throw YUIPropertyExceptions.

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 134 of file YBusyIndicator.cc.

5.16.2.6 setTimeout()

```
void YBusyIndicator::setTimeout (
            int newTimeout )  [virtual]
```

Set the timeout in milliseconds after that the widget shows 'stalled' when no new tick is received.

Derived classes should reimplement this, but they should call this base class method at the end of the overloaded function.

Definition at line 92 of file YBusyIndicator.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YBusyIndicator.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YBusyIndicator.cc

5.17 YBusyIndicatorPrivate Struct Reference

Public Member Functions

- **YBusyIndicatorPrivate** (const string &label, int timeout, bool alive)

Public Attributes

- string **label**
- int **timeout**
- bool **alive**

5.17.1 Detailed Description

Definition at line 35 of file YBusyIndicator.cc.

The documentation for this struct was generated from the following file:

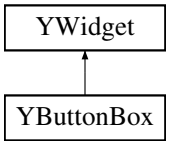
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YBusyIndicator.cc

5.18 YButtonBox Class Reference

Container widget for dialog buttons that abstracts the button order depending on the desktop environment.

```
#include <YButtonBox.h>
```

Inheritance diagram for YButtonBox:



Public Member Functions

- virtual ~YButtonBox ()

  Destructor.
- virtual const char * widgetClass () const

  Return a descriptive name of this widget class for logging, debugging etc.
- virtual void setMargins (const YButtonBoxMargins &margins)

  Set the margins for this YButtonBox.
- YButtonBoxMargins margins () const

  Return the margins of this YButtonBox.
- virtual void doLayout (int width, int height)

  Lay out the button box and its children (its buttons).
- YPushButton * findButton (YButtonRole role)

  Search the child widgets for the first button with the specified role.
- void sanityCheck ()

  Sanity check: Check if all child widgets have the correct widget class and if the button roles are assigned correctly.
- void setSanityCheckRelaxed (bool relax=true)

  Relax the sanity check done in sanityCheck(): Do not enforce that there has to be a YOKButton and a YCancelButton if there is more than one button.
- bool sanityCheckRelaxed () const

  Return 'true' if sanity checks are currently relaxed, 'false' if not.
- virtual int preferredWidth ()

  Preferred width of the widget.
- virtual int preferredHeight ()

  Preferred height of the widget.
- virtual void setSize (int newWidth, int newHeight)

  Sets the size of the YButtonBox.
- virtual bool stretchable (YUIDimension dimension) const

  Returns the stretchability of the YButtonBox.

Static Public Member Functions

- static void setLayoutPolicy (const YButtonBoxLayoutPolicy &layoutPolicy)

  Set the button policy for all future YButtonBox widgets: Button order, alignment if there is any excess space, whether or not to give all buttons the same size.
- static YButtonBoxLayoutPolicy layoutPolicy ()

  Return the layout policy.
- static YButtonBoxLayoutPolicy kdeLayoutPolicy ()

  Predefined layout policy for KDE-like behaviour.
- static YButtonBoxLayoutPolicy gnomeLayoutPolicy ()

  Predefined layout policy for GNOME-like behaviour.
- static void setDefaultMargins (const YButtonBoxMargins &margins)

  Set the default margins for all future YButtonBox widgets.
- static YButtonBoxMargins defaultMargins ()

  Return the default margins for all future YButtonBox widgets.

Protected Member Functions

- YButtonBox (YWidget *parent)

  Constructor.
- virtual std::vector< YPushButton * > buttonsByButtonOrder ()

  Return the button children sorted (left to right) by the current button order (from the layout policy).
- int maxChildSize (YUIDimension dim) const

  Return the (preferred) size of the biggest child widget in the specified dimension.
- int totalChildrenWidth () const

  Return the sum of the (preferred) widths of all child widgets.
- virtual void moveChild (YWidget *child, int newX, int newY)=0

  Move a child to a new position.
- int preferredWidth (bool equalSizeButtons)

  Calculate the preferred with with or without trying to enforce buttons of equal size.

Friends

- class **YButtonBoxPrivate**

5.18.1 Detailed Description

Container widget for dialog buttons that abstracts the button order depending on the desktop environment.

KDE and Windows arrange dialog buttons like this:

```
[OK] [Apply] [Cancel] [Custom1] [Custom2] ... [Help]

[Continue] [Cancel]

[Yes] [No]
```

GNOME and MacOS arrange them like this:

```
[Help] [Custom1] [Custom2] ... [Apply] [Cancel] [OK]

[Cancel] [Continue]

[No] [Yes]
```

This class provides the abstraction to use whatever layout is more appropriate in the current environment. The application creates the buttons as child widgets of a YButtonBox (rather than a YHBox) and leaves the button order to the YButtonBox.

Each of the standard buttons ([OK], [Apply], [Cancel], [Help]) needs to have a button role properly assigned.

If set up properly (see YApplication::setDefaultFunctionKey()), known button labels will be assigned an appropriate role:

```
[OK]                        F10
[Continue] -> [OK]  F10
[Yes]      -> [OK]  F10
[Accept]   -> [OK]  F10
[Next]     -> [OK]  F10

[Cancel]                    F9
[No]       -> [Cancel]      F9

[Help]                      F1
```

Buttons with nonstandard labels that act in such a role need to be explicitly assigned that role:

```
[Print ] [Cancel] [Help]
[Delete] [Cancel] [Help]
```

Those [Print] or [Delete] buttons act as [OK] buttons (the "yes, do it" action of that dialog). Call YPushButton::set↩ ButtonRole(YOkButton) explicitly for them.

YButtonBox widgets only accept YPushButton child widgets. Otherwise an exception is thrown.

If there is more than one button, one of the child buttons needs to have the [OK] role, and another needs to have the [Cancel] role. Otherwise an exception is thrown.

Definition at line 148 of file YButtonBox.h.

5.18.2 Member Function Documentation

5.18.2.1 buttonsByButtonOrder()

```
vector< YPushButton * > YButtonBox::buttonsByButtonOrder ( )  [protected], [virtual]
```

Return the button children sorted (left to right) by the current button order (from the layout policy).

This default implementation handles KDE and Gnome button orders. It is used in the default doLayout() method.

This may throw exceptions if there are non-button children or if there are multiple buttons with any of the standard button roles (except YCustomButton, of course).

Definition at line 411 of file YButtonBox.cc.

5.18.2.2 doLayout()

```
void YButtonBox::doLayout (
             int width,
             int height )  [virtual]
```

Lay out the button box and its children (its buttons).

This is where the button order is implemented.

This method is called by the default setSize() method. It uses YButtonBox::layoutPolicy() and the specified margins (defaultMargins unless changed with setMargins()). It moves the buttons to their position with moveChild().

This all should work reasonably in all cases (Qt-UI with KDE button order, Gtk-UI with Gnome button order, NCurses-UI with KDE button order).

Still, derived classes can reimplement this. It does not make very much sense to call this default method in a new implementation.

Definition at line 162 of file YButtonBox.cc.

5.18.2.3 findButton()

```
YPushButton * YButtonBox::findButton (
             YButtonRole role )
```

Search the child widgets for the first button with the specified role.

Return the button or 0 if there is no button with that role.

Definition at line 576 of file YButtonBox.cc.

5.18.2.4 margins()

```
YButtonBoxMargins YButtonBox::margins ( ) const
```

Return the margins of this YButtonBox.

Notice that those are only the desired margins; if there is not enough space, margins and spacings will be reduced before buttons are cut off.

Definition at line 147 of file YButtonBox.cc.

5.18.2.5 moveChild()

```
virtual void YButtonBox::moveChild (
             YWidget * child,
             int newX,
             int newY )  [protected], [pure virtual]
```

Move a child to a new position.

This is used in doLayout().

Derived classes are required to implement this.

5.18.2.6 preferredHeight()

```
int YButtonBox::preferredHeight ( )  [virtual]
```

Preferred height of the widget.

Reimplemented from YWidget. This default method returns the height of the highest child plus the top and bottom margins.

Derived classes can reimplement this method. It does not make very much sense to call this base class method in a new implementation.

Implements YWidget.

Definition at line 518 of file YButtonBox.cc.

5.18.2.7 preferredWidth()

```
int YButtonBox::preferredWidth ( )  [virtual]
```

Preferred width of the widget.

Reimplemented from YWidget. This default method returns the sum of the the widths of all child widgets plus the left and right margins plus the spacings.

Derived classes can reimplement this method. It does not make very much sense to call this base class method in a new implementation.

Implements YWidget.

Definition at line 511 of file YButtonBox.cc.

5.18.2.8 sanityCheck()

```
void YButtonBox::sanityCheck ( )
```

Sanity check: Check if all child widgets have the correct widget class and if the button roles are assigned correctly.

A YButtonBox with more than one button is required to have one YOKButton and ony YCancelButton. Neither button role may be assigned more than once.

This method may throw exceptions:

- YUIButtonRoleMismatchException
- YUIInvalidChildException (wrong widget class)

This cannot be done as child widgets are inserted since this is done from the child widgets' constructors, so virtual methods or dynamic_cast don't work at that point.

This is called in the default setSize() method (just before doLayout()), so any of the above errors are caught only at that time. Applications are free to call this before that time to make error handling more transparent.

Definition at line 607 of file YButtonBox.cc.

5.18.2.9 setLayoutPolicy()

```
void YButtonBox::setLayoutPolicy (
             const YButtonBoxLayoutPolicy & layoutPolicy )  [static]
```

Set the button policy for all future YButtonBox widgets: Button order, alignment if there is any excess space, whether or not to give all buttons the same size.

You might want to use one of the predefined static methods: YButtonBox::kdeLayoutPolicy(), YButtonBox::gnomeLayoutPolicy().

The default doLayout() method uses those values.

Notice that there is intentionally no way to set this differently for each individual YButtonBox: This would defeat the purpose of consistency (with the desktop environment this application is running in), which is the reason for having this widget class.

Definition at line 83 of file YButtonBox.cc.

5.18.2.10 setMargins()

```
void YButtonBox::setMargins (
             const YButtonBoxMargins & margins )  [virtual]
```

Set the margins for this YButtonBox.

Derived classes are free to reimplement this, but they should call this base class method in the new method.

Definition at line 140 of file YButtonBox.cc.

5.18.2.11 setSanityCheckRelaxed()

```
void YButtonBox::setSanityCheckRelaxed (
             bool relax = true )
```

Relax the sanity check done in sanityCheck(): Do not enforce that there has to be a YOKButton and a YCancelButton if there is more than one button.

In very rare cases, it might be neccessary to have a less stringent sanity check: There are some very few legitimate cases for having a YButtonBox with multiple buttons, yet without a YCancelButton.

Examples:

```
...message...
 <Countdown>
 [OK] [Stop]

...message...
[OK] [Details]
```

In those cases, it makes sense to relax the sanity check.

Definition at line 593 of file YButtonBox.cc.

5.18.2.12 setSize()

```
void YButtonBox::setSize (
             int newWidth,
             int newHeight )  [virtual]
```

Sets the size of the YButtonBox.

Derived classes can reimplement this, but this base class method should be called in the reimplemented function.

Reimplemented from YWidget.

Implements YWidget.

Definition at line 154 of file YButtonBox.cc.

5.18.2.13 stretchable()

```
bool YButtonBox::stretchable (
            YUIDimension dimension ) const  [virtual]
```

Returns the stretchability of the YButtonBox.

YButtonBox widgets are horizontally stretchable by default. How any excess space is used is specified in the layout policy.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 561 of file YButtonBox.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YButtonBox.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YButtonBox.cc

5.19 YButtonBoxLayoutPolicy Struct Reference

Helper class: Layout policy for YButtonBox widgets.

```
#include <YButtonBox.h>
```

Public Attributes

- YButtonOrder **buttonOrder**
- bool **equalSizeButtons**
- bool **addExcessSpaceToHelpButtonExtraMargin**
- YAlignmentType **alignment** [YUIAllDimensions]

5.19.1 Detailed Description

Helper class: Layout policy for YButtonBox widgets.

This is used in the default YButtonBox::doLayout() method.

Definition at line 41 of file YButtonBox.h.

The documentation for this struct was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YButtonBox.h

5.20 YButtonBoxMargins Struct Reference

Helper class: Margins for YButtonBox widgets.

`#include <YButtonBox.h>`

Public Attributes

- int **left**
- int **right**
- int **top**
- int **bottom**
- int **spacing**
- int **helpButtonExtraSpacing**

5.20.1 Detailed Description

Helper class: Margins for YButtonBox widgets.

All sizes are in UI-dependent units, i.e. in pixels.

Definition at line 65 of file YButtonBox.h.

The documentation for this struct was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YButtonBox.h

5.21 YButtonBoxPrivate Struct Reference

Public Member Functions

- YButtonBoxPrivate ()

  Constructor.

Public Attributes

- bool **sanityCheckRelaxed**
- YButtonBoxMargins **margins**

5.21.1 Detailed Description

Definition at line 46 of file YButtonBox.cc.

The documentation for this struct was generated from the following file:

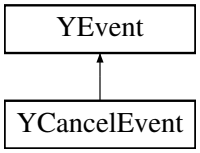
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YButtonBox.cc

5.22 YCancelEvent Class Reference

Event to be returned upon closing a dialog with the window manager close button (or Alt-F4)

`#include <YEvent.h>`

Inheritance diagram for YCancelEvent:



Protected Member Functions

- virtual ~YCancelEvent ()

  Protected destructor - events can only be deleted via YDialog::deleteEvent().

Additional Inherited Members

5.22.1 Detailed Description

Event to be returned upon closing a dialog with the window manager close button (or Alt-F4)

Definition at line 305 of file YEvent.h.

5.22.2 Constructor & Destructor Documentation

5.22.2.1 ~YCancelEvent()

`virtual YCancelEvent::~YCancelEvent ( )  [inline], [protected], [virtual]`

Protected destructor - events can only be deleted via YDialog::deleteEvent().

The associated dialog will take care of this event and delete it when appropriate.

Definition at line 318 of file YEvent.h.

The documentation for this class was generated from the following file:

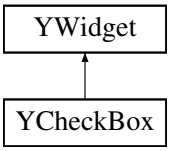
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YEvent.h

5.23 YCheckBox Class Reference

A tri-state check box.

`#include <YCheckBox.h>`

Inheritance diagram for YCheckBox:



Public Member Functions

- virtual ~YCheckBox ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- virtual YCheckBoxState value ()=0

  Get the current value:
- virtual void setValue (YCheckBoxState state)=0

  Set the CheckBox value (on/off/don't care).
- bool isChecked ()

  Simplified access to value(): Return 'true' if the CheckBox is checked.
- void setChecked (bool checked=true)

  Simplified access to setValue(): Check of uncheck the CheckBox.
- bool dontCare ()

  Simplified access to tri-state ("don't care").
- void setDontCare ()

  Simplified access to setting tri-state ("don't care").
- std::string label () const

  Get the label (the text on the CheckBox).
- virtual void setLabel (const std::string &label)

  Set the label (the text on the CheckBox).
- bool useBoldFont () const

  Returns 'true' if a bold font should be used.
- virtual void setUseBoldFont (bool bold=true)

  Indicate whether or not a bold font should be used.
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.
- virtual std::string shortcutString () const

Get the string of this widget that holds the keyboard shortcut.

- virtual void setShortcutString (const std::string &str)

  Set the string of this widget that holds the keyboard shortcut.

- const char * userInputProperty ()

  The name of the widget property that will return user input.

Protected Member Functions

- YCheckBox (YWidget *parent, const std::string &label)

  Constructor.

5.23.1 Detailed Description

A tri-state check box.

It can be toggled between ON and OFF by the user and additionally set to a DONT-CARE value programatically.

Definition at line 46 of file YCheckBox.h.

5.23.2 Member Function Documentation

5.23.2.1 getProperty()

```
YPropertyValue YCheckBox::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw exceptions, for example

- if there is no property with that name

Reimplemented from YWidget.

Definition at line 123 of file YCheckBox.cc.

5.23.2.2 propertySet()

```
const YPropertySet & YCheckBox::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property set upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 86 of file YCheckBox.cc.

5.23.2.3 setLabel()

```
void YCheckBox::setLabel (
             const std::string & label )  [virtual]
```

Set the label (the text on the CheckBox).

Derived classes are free to reimplement this, but they should call this base class method at the end of the overloaded function.

Definition at line 61 of file YCheckBox.cc.

5.23.2.4 setProperty()

```
bool YCheckBox::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This method may throw exceptions, for example

- if there is no property with that name
- if the expected type and the type mismatch
- if the value is out of range

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 107 of file YCheckBox.cc.

5.23.2.5 setShortcutString()

```
virtual void YCheckBox::setShortcutString (
            const std::string & str )  [inline], [virtual]
```

Set the string of this widget that holds the keyboard shortcut.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 190 of file YCheckBox.h.

5.23.2.6 setUseBoldFont()

```
void YCheckBox::setUseBoldFont (
            bool bold = true )  [virtual]
```

Indicate whether or not a bold font should be used.

Derived classes are free to reimplement this, but they should call this base class method at the end of the overloaded function.

Definition at line 79 of file YCheckBox.cc.

5.23.2.7 setValue()

```
virtual void YCheckBox::setValue (
            YCheckBoxState state )  [pure virtual]
```

Set the CheckBox value (on/off/don't care).

Derived classes are required to implement this.

5.23.2.8 shortcutString()

```
virtual std::string YCheckBox::shortcutString ( ) const  [inline], [virtual]
```

Get the string of this widget that holds the keyboard shortcut.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 183 of file YCheckBox.h.

5.23.2.9 userInputProperty()

```
const char* YCheckBox::userInputProperty ( )  [inline], [virtual]
```

The name of the widget property that will return user input.

Inherited from YWidget.

Reimplemented from YWidget.

Definition at line 197 of file YCheckBox.h.

5.23.2.10 value()

```
virtual YCheckBoxState YCheckBox::value ( )  [pure virtual]
```

Get the current value:

YCheckBox_on CheckBox is checked YCheckBox_off CheckBox is unchecked

YCheckBox_dont_care tri-state: CheckBox is greyed out, neither checked nor unchecked

The user cannot set YCheckBox_dont_care directly. This status is always only set from the outside, usually because a setting cannot be clearly determined. For example, a checkbox

```
[ ] Read only
```

would be set to "don't care" (by the application, not directly by the user) when it is to display the read-only state of a group of files where some are read-only and some are writeable.

Derived classes are required to implement this function. (Intentionally not const)

The documentation for this class was generated from the following files:

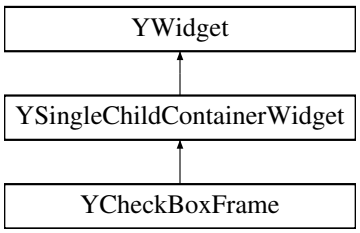
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YCheckBox.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YCheckBox.cc

5.24 YCheckBoxFrame Class Reference

A frame with a check-box, may auto-disable frame contents based on the check.

```
#include <YCheckBoxFrame.h>
```

Inheritance diagram for YCheckBoxFrame:



Public Member Functions

- YCheckBoxFrame (YWidget *parent, const std::string &label, bool checked)

  Constructor.
- virtual ~YCheckBoxFrame ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- std::string label () const

  Return the label text on the CheckBoxFrame.
- virtual void setLabel (const std::string &label)

  Change the label text on the CheckBoxFrame.
- virtual void setValue (bool isChecked)=0

  Check or uncheck the CheckBoxFrame's check box.
- virtual bool value ()=0

  Get the status of the CheckBoxFrame's check box.
- bool autoEnable () const

  Handle children enabling/disabling automatically based on the CheckBoxFrame's check box?
- virtual void setAutoEnable (bool autoEnable)

  Change autoEnabled flag.
- bool invertAutoEnable () const

  Invert the meaning of the CheckBoxFrame's check box, i.e., disable child widgets when checked?
- virtual void setInvertAutoEnable (bool invertAutoEnable)

  Change invertAutonEnable flag.
- void handleChildrenEnablement (bool isChecked)

  Handle enabling/disabling of child widgets based on 'isChecked' (the current status of the check box) and autoEnable() and invertAutoEnable().
- virtual std::string shortcutString () const

  Get the string of this widget that holds the keyboard shortcut.
- virtual void setShortcutString (const std::string &str)

  Set the string of this widget that holds the keyboard shortcut.
- const char * userInputProperty ()

  The name of the widget property that will return user input.
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.

Additional Inherited Members

5.24.1 Detailed Description

A frame with a check-box, may auto-disable frame contents based on the check.

See setAutoEnable, invertAutoEnable.

Definition at line 39 of file YCheckBoxFrame.h.

5.24.2 Member Function Documentation

5.24.2.1 getProperty()

```
YPropertyValue YCheckBoxFrame::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw exceptions, for example

- if there is no property with that name

Reimplemented from YWidget.

Definition at line 156 of file YCheckBoxFrame.cc.

5.24.2.2 handleChildrenEnablement()

```
void YCheckBoxFrame::handleChildrenEnablement (
            bool isChecked )
```

Handle enabling/disabling of child widgets based on 'isChecked' (the current status of the check box) and autoEnable() and invertAutoEnable().

Derived classes should call this when the check box status changes rather than try to handle it on their level.

This method also needs to be called after new child widgets are added to establish the initial enabled or disabled state of the child widgets.

Definition at line 105 of file YCheckBoxFrame.cc.

5.24.2.3 propertySet()

```
const YPropertySet & YCheckBoxFrame::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property set upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 119 of file YCheckBoxFrame.cc.

5.24.2.4 setAutoEnable()

```
void YCheckBoxFrame::setAutoEnable (
            bool autoEnable )  [virtual]
```

Change autoEnabled flag.

Derived classes are free to overload this, but they should call this base class function in the overloaded function.

Definition at line 85 of file YCheckBoxFrame.cc.

5.24.2.5 setInvertAutoEnable()

```
void YCheckBoxFrame::setInvertAutoEnable (
            bool invertAutoEnable )  [virtual]
```

Change invertAutonEnable flag.

Derived classes are free to overload this, but they should call this base class function in the overloaded function.

Definition at line 98 of file YCheckBoxFrame.cc.

5.24.2.6 setLabel()

```
void YCheckBoxFrame::setLabel (
            const std::string & label )  [virtual]
```

Change the label text on the CheckBoxFrame.

Derived classes should overload this, but call this base class function in the overloaded function.

Definition at line 73 of file YCheckBoxFrame.cc.

5.24.2.7 setProperty()

```
bool YCheckBoxFrame::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This method may throw exceptions, for example

- if there is no property with that name
- if the expected type and the type mismatch
- if the value is out of range

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 140 of file YCheckBoxFrame.cc.

5.24.2.8 setShortcutString()

```
virtual void YCheckBoxFrame::setShortcutString (
             const std::string & str )  [inline], [virtual]
```

Set the string of this widget that holds the keyboard shortcut.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 140 of file YCheckBoxFrame.h.

5.24.2.9 setValue()

```
virtual void YCheckBoxFrame::setValue (
             bool isChecked )  [pure virtual]
```

Check or uncheck the CheckBoxFrame's check box.

Derived classes are required to implement this.

5.24.2.10 shortcutString()

```
virtual std::string YCheckBoxFrame::shortcutString ( ) const  [inline], [virtual]
```

Get the string of this widget that holds the keyboard shortcut.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 133 of file YCheckBoxFrame.h.

5.24.2.11 userInputProperty()

```
const char* YCheckBoxFrame::userInputProperty ( )  [inline], [virtual]
```

The name of the widget property that will return user input.

Inherited from YWidget.

Reimplemented from YWidget.

Definition at line 147 of file YCheckBoxFrame.h.

5.24.2.12 value()

```
virtual bool YCheckBoxFrame::value ( )  [pure virtual]
```

Get the status of the CheckBoxFrame's check box.

Derived classes are required to implement this.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YCheckBoxFrame.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YCheckBoxFrame.cc

5.25 YCheckBoxFramePrivate Struct Reference

Public Member Functions

- **YCheckBoxFramePrivate** (const string &label)

Public Attributes

- string **label**
- bool **autoEnable**
- bool **invertAutoEnable**

5.25.1 Detailed Description

Definition at line 35 of file YCheckBoxFrame.cc.

The documentation for this struct was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YCheckBoxFrame.cc

5.26 YCheckBoxPrivate Struct Reference

Public Member Functions

- **YCheckBoxPrivate** (const string &label)

Public Attributes

- string **label**
- bool **useBoldFont**

5.26.1 Detailed Description

Definition at line 35 of file YCheckBox.cc.

The documentation for this struct was generated from the following file:

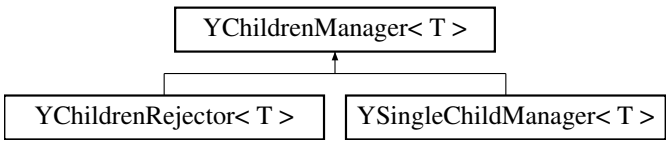
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YCheckBox.cc

5.27 YChildrenManager< T > Class Template Reference

Abstract base template class for children management, such as child widgets.

`#include <YChildrenManager.h>`

Inheritance diagram for YChildrenManager< T >:



Public Types

- typedef std::list< T * > **ChildrenList**

Public Member Functions

- YChildrenManager (T *containerParent)
  Constructor.
- virtual ~YChildrenManager ()
  Destructor.
- bool hasChildren () const
  Check if there are any children.
- bool empty () const
  Check if the children list is empty, i.e.
- int count () const
  Returns the number of children.
- ChildrenList::iterator begin ()
  Return an iterator that points to the first child.
- ChildrenList::iterator end ()
  Return an iterator that points after the last child.
- ChildrenList::const_iterator begin () const
  Return an iterator that points to the first child.
- ChildrenList::const_iterator end () const
  Return an iterator that points after the last child.
- ChildrenList::const_reverse_iterator rbegin () const
  Return a reverse iterator that points to the last child.
- ChildrenList::const_reverse_iterator rend () const
  Return a reverse iterator that points before the first child.
- T * firstChild ()
  Returns the first child or 0 if there is none.
- T * lastChild ()
  Returns the last child or 0 if there is none.
- virtual void add (T *child)
  Add a new child.
- virtual void remove (T *child)
  Remove a child.
- virtual void clear ()
  Remove all children.
- bool contains (T *child) const
  Check if the children list contains the specified child.
- T * container () const
  Returns the associated container, i.e.

Protected Attributes

- T * **_container**
- ChildrenList **_children**

5.27.1 Detailed Description

template<class T>
class YChildrenManager< T >

Abstract base template class for children management, such as child widgets.

Definition at line 37 of file YChildrenManager.h.

5.27.2 Constructor & Destructor Documentation

5.27.2.1 YChildrenManager()

```
template<class T >
YChildrenManager< T >::YChildrenManager (
            T * containerParent )  [inline]
```

Constructor.

'containerParent' is the class whose children are managed.

Definition at line 46 of file YChildrenManager.h.

5.27.3 Member Function Documentation

5.27.3.1 add()

```
template<class T >
virtual void YChildrenManager< T >::add (
            T * child )  [inline], [virtual]
```

Add a new child.

This may throw exceptions if more children are added than the class whose children are handled (the associated widget) can handle.

Reimplemented in YChildrenRejector< T >, and YSingleChildManager< T >.

Definition at line 128 of file YChildrenManager.h.

5.27.3.2 clear()

```
template<class T >
virtual void YChildrenManager< T >::clear ( )  [inline], [virtual]
```

Remove all children.

This only removes the children from the children manager's list; it does not delete them.

Definition at line 142 of file YChildrenManager.h.

5.27.3.3 container()

```
template<class T >
T* YChildrenManager< T >::container ( ) const  [inline]
```

Returns the associated container, i.e.

the object whose children are handled here.

Definition at line 160 of file YChildrenManager.h.

5.27.3.4 contains()

```
template<class T >
bool YChildrenManager< T >::contains (
            T * child ) const  [inline]
```

Check if the children list contains the specified child.

Returns 'true' if the children list contains the child, 'false' otherwise.

Definition at line 150 of file YChildrenManager.h.

5.27.3.5 empty()

```
template<class T >
bool YChildrenManager< T >::empty ( ) const  [inline]
```

Check if the children list is empty, i.e.

if there are no children.

Definition at line 66 of file YChildrenManager.h.

5.27.3.6 firstChild()

```
template<class T >
T* YChildrenManager< T >::firstChild ( )  [inline]
```

Returns the first child or 0 if there is none.

Useful mostly for children managers that handle only one child.

Definition at line 113 of file YChildrenManager.h.

5.27.3.7 remove()

```
template<class T >
virtual void YChildrenManager< T >::remove (
            T * child )  [inline], [virtual]
```

Remove a child.

This only removes the child from the children manager's list; it does not delete it.

Definition at line 135 of file YChildrenManager.h.

The documentation for this class was generated from the following file:

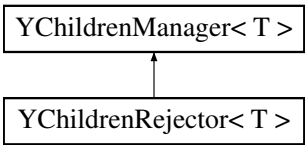
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YChildrenManager.h

5.28 YChildrenRejector< T > Class Template Reference

Children manager that rejects all children.

`#include <YChildrenManager.h>`

Inheritance diagram for YChildrenRejector< T >:



Public Member Functions

- YChildrenRejector (T *containerParent)
  Constructor.
- virtual void add (T *child)
  Add a new child.

Additional Inherited Members

5.28.1 Detailed Description

template<class T>
class YChildrenRejector< T >

Children manager that rejects all children.

Useful for widget classes that can't handle children such as YPushButton, YSelectionBox etc.

Definition at line 214 of file YChildrenManager.h.

5.28.2 Member Function Documentation

5.28.2.1 add()

```
template<class T >
virtual void YChildrenRejector< T >::add (
             T * child )  [inline], [virtual]
```

Add a new child.

Reimplemented from YChildrenManager.

Since this class is designed to reject children, this always throws a YUITooManyChildrenException.

Reimplemented from YChildrenManager< T >.

Definition at line 232 of file YChildrenManager.h.

The documentation for this class was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YChildrenManager.h

5.29 YCodeLocation Class Reference

Helper class for UI exceptions: Store *FILE*, *FUNCTION* and *LINE*.

```
#include <YUIException.h>
```

Public Member Functions

- YCodeLocation (const std::string &file_r, const std::string &func_r, int line_r)
  Constructor.
- YCodeLocation ()
  Default constructor.
- std::string file () const
  Returns the source file name where the exception occured.
- std::string func () const
  Returns the name of the function where the exception occured.
- int line () const
  Returns the source line number where the exception occured.
- std::string asString () const
  Returns the location in normalized string format.

Friends

- std::ostream & operator<< (std::ostream &str, const YCodeLocation &obj)
  Stream output.

5.29.1 Detailed Description

Helper class for UI exceptions: Store *FILE*, *FUNCTION* and *LINE*.

Construct this using the YUI_EXCEPTION_CODE_LOCATION macro.

Definition at line 229 of file YUIException.h.

5.29.2 Constructor & Destructor Documentation

5.29.2.1 YCodeLocation()

```
YCodeLocation::YCodeLocation (
            const std::string & file_r,
            const std::string & func_r,
            int line_r )  [inline]
```

Constructor.

Commonly called using the YUI_EXCEPTION_CODE_LOCATION macro.

Definition at line 236 of file YUIException.h.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.cc

5.30 YColor Class Reference

Helper class to define an RGB color.

`#include <YColor.h>`

Public Member Functions

- YColor (uchar red, uchar green, uchar blue)
  Constructor.
- YColor ()
  Default constructor: Create "undefined" color.
- uchar red () const
  Return the red component (0: none, 255: bright red).
- uchar green () const
  Return the green component (0: none, 255: bright green).
- uchar blue () const
  Return the blue component (0: none, 255: bright blue).
- bool isUndefined () const
  Return 'true' if this color is undefined.
- bool isDefined () const
  Return 'true' if this color is defined.

5.30.1 Detailed Description

Helper class to define an RGB color.

Definition at line 34 of file YColor.h.

The documentation for this class was generated from the following file:

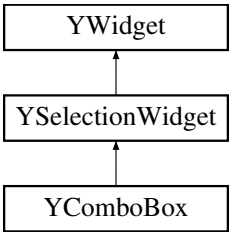
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YColor.h

5.31 YComboBox Class Reference

ComboBox (or "drop down box", "drop down selection"); may be editable.

`#include <YComboBox.h>`

Inheritance diagram for YComboBox:



Public Member Functions

- virtual ~YComboBox ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- bool editable () const

  Return 'true' if this ComboBox is editable, i.e.
- std::string value ()

  Return the value of this ComboBox:
- void setValue (const std::string &newText)

  Set the value of this ComboBox by string: Try to find a list item with that label and select it.
- virtual YItem * selectedItem ()

  Return the (first) selected item or 0 if none is selected or if this ComboBox is editable and the user entered something that does not match any of the ComboBox's list items (in that case, use value() instead).
- virtual YItemCollection selectedItems ()

  Return all selected items.
- virtual void selectItem (YItem *item, bool selected=true)

  Select or deselect an item.
- std::string validChars ()

  Get the valid input characters.
- virtual void setValidChars (const std::string &validChars)

  Set the valid input characters.
- int inputMaxLength () const

  The maximum input length, i.e., the maximum number of characters the user can enter.
- virtual void setInputMaxLength (int numberOfChars)

  Set the maximum input length, i.e., the maximum number of characters the user can enter.
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.
- const char * userInputProperty ()

  The name of the widget property that will return user input.

Protected Member Functions

- YComboBox (YWidget *parent, const std::string &label, bool editable)

  Constructor.
- virtual std::string text ()=0

  Return this ComboBox's current value as text.
- virtual void setText (const std::string &newText)=0

  Set this ComboBox's current value as text.

5.31.1 Detailed Description

ComboBox (or "drop down box", "drop down selection"); may be editable.

A widget with a drop-down list of predefined values to select from. Optionally, this widget can be created in "editable" mode which means that the user can freely enter any text.

In non-editable mode, a ComboBox works very much like a SelectionBox that uses fewer screen space. In that mode, it is recommended to use selectedItem() to retrieve its current value and selectItem() to set it.

In editable mode, a ComboBox is more like an InputField with a list to pick predefined values from (for less typing). In that mode, it is recommended to use value() and setValue().

In either mode, it might be dangerous to use the iterators the (itemsBegin(), itemsEnd()) the base class (YSelectionWidget) provides to find the currently selected item: The items' "selected" flag may or may not be up to date. YComboBox::selectedItem() makes sure they are up to date.

Definition at line 53 of file YComboBox.h.

5.31.2 Constructor & Destructor Documentation

5.31.2.1 YComboBox()

```
YComboBox::YComboBox (
            YWidget * parent,
            const std::string & label,
            bool editable )  [protected]
```

Constructor.

'editable' means the user can freely enter any value without being restricted to the items of the ComboBox's list.

Definition at line 51 of file YComboBox.cc.

5.31.3 Member Function Documentation

5.31.3.1 editable()

```
bool YComboBox::editable ( ) const
```

Return 'true' if this ComboBox is editable, i.e.

if the user can freely enter any value without being restricted to the items of the ComboBox's list.

Notice that this can only be set in the constructor.

Definition at line 66 of file YComboBox.cc.

5.31.3.2 getProperty()

```
YPropertyValue YComboBox::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 222 of file YComboBox.cc.

5.31.3.3 inputMaxLength()

```
int YComboBox::inputMaxLength ( ) const
```

The maximum input length, i.e., the maximum number of characters the user can enter.

-1 means no limit.

This is only meaningful for if the ComboBox is editable.

Definition at line 84 of file YComboBox.cc.

5.31.3.4 propertySet()

```
const YPropertySet & YComboBox::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 174 of file YComboBox.cc.

5.31.3.5 selectedItem()

```
YItem * YComboBox::selectedItem ( )  [virtual]
```

Return the (first) selected item or 0 if none is selected or if this ComboBox is editable and the user entered something that does not match any of the ComboBox's list items (in that case, use value() instead).

Reimplemented from YSelectionWidget for better reliability: This will compare an editable ComboBox's user input against the text labels of all items and try to return an item if there is any match.

Reimplemented from YSelectionWidget.

Definition at line 138 of file YComboBox.cc.

5.31.3.6 selectedItems()

```
YItemCollection YComboBox::selectedItems ( )  [virtual]
```

Return all selected items.

This is not particularly useful for ComboBoxes since there can be no more than one selected item anyway; * better use selectedItem() or value() instead.

This function does not transfer ownership of those items to the caller, so don't try to delete them!

Reimplemented from YSelectionWidget for better reliability.

Reimplemented from YSelectionWidget.

Definition at line 159 of file YComboBox.cc.

5.31.3.7 selectItem()

```
void YComboBox::selectItem (
             YItem * item,
             bool selected = true )  [virtual]
```

Select or deselect an item.

See also setValue().

Reimplemented from YSelectionWidget.

Reimplemented from YSelectionWidget.

Definition at line 124 of file YComboBox.cc.

5.31.3.8 setInputMaxLength()

```
void YComboBox::setInputMaxLength (
             int numberOfChars )  [virtual]
```

Set the maximum input length, i.e., the maximum number of characters the user can enter.

-1 means no limit.

This is only meaningful for if the ComboBox is editable.

Derived classes are free to reimplement this, but they should call this base class method at the end of the overloaded function.

Definition at line 90 of file YComboBox.cc.

5.31.3.9 setProperty()

```
bool YComboBox::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This function may throw YUIPropertyExceptions.

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 202 of file YComboBox.cc.

5.31.3.10 setText()

```
virtual void YComboBox::setText (
             const std::string & newText )  [protected], [pure virtual]
```

Set this ComboBox's current value as text.

Called internally whenever the content is to change programmatically. Don't call setValue() or selectItem() from here.

Derived classes are required to implement this function.

5.31.3.11 setValidChars()

```
void YComboBox::setValidChars (
             const std::string & validChars )  [virtual]
```

Set the valid input characters.

No input validation is performed (i.e., the user can enter anything) if this is empty.

This is only meaningful for if the ComboBox is editable.

Derived classes are free to reimplement this, but they should call this base class method at the end of the overloaded function.

Definition at line 78 of file YComboBox.cc.

5.31.3.12 setValue()

```
void YComboBox::setValue (
             const std::string & newText )
```

Set the value of this ComboBox by string: Try to find a list item with that label and select it.

If there is no matching list item, editable ComboBoxes will set their input field to that text. Non-editable ComboBoxes will throw an exception.

See also selectItem().

Definition at line 102 of file YComboBox.cc.

5.31.3.13 text()

```
virtual std::string YComboBox::text ( )  [protected], [pure virtual]
```

Return this ComboBox's current value as text.

Called internally from value(), selectedItem() and related.

Derived classes are required to implement this function.

5.31.3.14 userInputProperty()

```
const char* YComboBox::userInputProperty ( )  [inline], [virtual]
```

The name of the widget property that will return user input.

Inherited from YWidget.

Reimplemented from YWidget.

Definition at line 211 of file YComboBox.h.

5.31.3.15 validChars()

```
string YComboBox::validChars ( )
```

Get the valid input characters.

No input validation is performed (i.e., the user can enter anything) if this is empty.

This is only meaningful for if the ComboBox is editable.

Definition at line 72 of file YComboBox.cc.

5.31.3.16 value()

```
string YComboBox::value ( )
```

Return the value of this ComboBox:

The text of a list item if the user (or the appplication) selected a list item or the content of the ComboBox's input field if the ComboBox is editable and the user (or the application) entered text there.

See also YComboBox::selectedItem().

Definition at line 96 of file YComboBox.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YComboBox.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YComboBox.cc

5.32 YComboBoxPrivate Struct Reference

Public Member Functions

- **YComboBoxPrivate** (bool editable)

Public Attributes

- bool **editable**
- string **validChars**
- int **inputMaxLength**

5.32.1 Detailed Description

Definition at line 36 of file YComboBox.cc.

The documentation for this struct was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YComboBox.cc

5.33 YCommandLine Class Reference

Utility class to access /proc/<pid>/cmdline to retrieve argc and argv.

`#include <YCommandLine.h>`

Public Member Functions

- YCommandLine ()
  Constructor.
- ~YCommandLine ()
  Destructor.
- int argc () const
  Return the number of arguments in the command line.
- char ** argv () const
  Return the arguments in a C compatible fashion: An array of pointers to characters.
- int size () const
  Alias for argc() for those who like a more C++ -like syntax.
- std::string arg (int index) const
  Return command line argument no.
- std::string operator[ ] (int index) const
  Return command line argument no.
- void add (const std::string &arg)
  Add a command line argument (at the end of the existing ones).
- void remove (int index)
  Remove command line argument no.
- void replace (int index, const std::string &arg)
  Replace command line argument no.
- int find (const std::string &argName) const
  Find a command line argument 'argName' ("-display" etc.).

5.33.1 Detailed Description

Utility class to access /proc/<pid>/cmdline to retrieve argc and argv.

Definition at line 37 of file YCommandLine.h.

5.33.2 Constructor & Destructor Documentation

5.33.2.1 YCommandLine()

```
YCommandLine::YCommandLine ( )
```

Constructor.

This will read /proc/<pid>/cmdline of this process.

Definition at line 50 of file YCommandLine.cc.

5.33.3 Member Function Documentation

5.33.3.1 arg()

```
string YCommandLine::arg (
            int index ) const
```

Return command line argument no.

'index' (from 0 on).

This might throw an YUIIndexOutOfRangeException.

Definition at line 111 of file YCommandLine.cc.

5.33.3.2 argc()

```
int YCommandLine::argc ( ) const
```

Return the number of arguments in the command line.

Remember that the command itself (the binary of the process) is included, so a value of 1 (not 0!) means "no additional arguments".

Definition at line 80 of file YCommandLine.cc.

5.33.3.3 argv()

```
char ** YCommandLine::argv ( ) const
```

Return the arguments in a C compatible fashion: An array of pointers to characters.

The data are copied with strdup(), so they are valid beyond the life time of this object (but OTOH should be released with free() at some point).

Definition at line 87 of file YCommandLine.cc.

5.33.3.4 find()

```
int YCommandLine::find (
             const std::string & argName ) const
```

Find a command line argument 'argName' ("-display" etc.).

Notice that leading minus signs must be specified in 'argName'. Since argv[0] is the program name, the search starts from argv[1].

Return the position of 'argName' (from 0 on) or -1 if not found.

Definition at line 138 of file YCommandLine.cc.

5.33.3.5 operator[]()

```
std::string YCommandLine::operator[] (
            int index ) const  [inline]
```

Return command line argument no.

'index' (from 0 on) as operator[]:

for (int i=0; i < cmdLine.argc(); i++) cout << cmdLine[i] << std::endl;

This might throw an YUIIndexOutOfRangeException.

Definition at line 85 of file YCommandLine.h.

5.33.3.6 remove()

```
void YCommandLine::remove (
            int index )
```

Remove command line argument no.

'index' (from 0 on).

This might throw an YUIIndexOutOfRangeException.

Definition at line 120 of file YCommandLine.cc.

5.33.3.7 replace()

```
void YCommandLine::replace (
            int index,
            const std::string & arg )
```

Replace command line argument no.

'index' (from 0 on) with 'arg'.

This might throw an YUIIndexOutOfRangeException.

Definition at line 129 of file YCommandLine.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YCommandLine.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YCommandLine.cc

5.34 YCommandLinePrivate Struct Reference

Public Attributes

- std::vector< string > **args**

5.34.1 Detailed Description

Definition at line 41 of file YCommandLine.cc.

The documentation for this struct was generated from the following file:

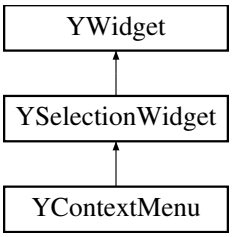
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YCommandLine.cc

5.35 YContextMenu Class Reference

ContextMenu: Similar to PushButton, but with several actions: Upon clicking on a ContextMenu (or activating it with the keyboard), a pop-up menu opens where the user can activate an action.

`#include <YContextMenu.h>`

Inheritance diagram for YContextMenu:



Public Member Functions

- virtual ~YContextMenu ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- virtual void rebuildMenuTree ()=0

  Rebuild the displayed menu tree from the internally stored YMenuItems.
- virtual void addItems (const YItemCollection &itemCollection)

  Add multiple items.
- virtual void addItem (YItem *item_disown)

  Add one item.
- virtual void deleteAllItems ()

Delete all items.

- void resolveShortcutConflicts ()

  Resolve keyboard shortcut conflicts: Change shortcuts of menu items if there are duplicates in the respective menu level.

- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.

- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.

- virtual const YPropertySet & propertySet ()

  Return this class's property set.

Protected Member Functions

- YContextMenu ()

  Constructor.

- YMenuItem * findMenuItem (int index)

  Recursively find the first menu item with the specified index.

- YMenuItem * findMenuItem (int index, YItemConstIterator begin, YItemConstIterator end)

  Recursively find the first menu item with the specified index from iterator 'begin' to iterator 'end'.

- YMenuItem * itemAt (int index)

  Alias for findMenuItem().

5.35.1 Detailed Description

ContextMenu: Similar to PushButton, but with several actions: Upon clicking on a ContextMenu (or activating it with the keyboard), a pop-up menu opens where the user can activate an action.

Menu items in that pop-up menu can have submenus (that will pop up in separate pop-up menus).

Internally, this widget is more similar to the Tree widget. The difference is that it does not keep a "selected" status, but triggers an action right away, just like a PushButton. Like PushButton, ContextMenu sends an event right away when the user selects an item (clicks on a menu item or activates it with the keyboard). Items that have a submenu never send an event, they simply open their submenu when activated.

Note: unlike other widgets, this one is not created via YWidgetFactory or YOptionalWidgetFactory but with YApplication::openContextMenu()

Definition at line 51 of file YContextMenu.h.

5.35.2 Constructor & Destructor Documentation

5.35.2.1 YContextMenu()

```
YContextMenu::YContextMenu ( )  [protected]
```

Constructor.

'label' is the user-visible text on the button (not above it like all other SelectionWidgets).

Definition at line 48 of file YContextMenu.cc.

5.35.3 Member Function Documentation

5.35.3.1 addItem()

```
void YContextMenu::addItem (
             YItem * item_disown )  [virtual]
```

Add one item.

This widget assumes ownership of the item object and will delete it in its destructor.

This reimplementation will an index to the item that is unique for all items in this ContextMenu. That index can be used later with findMenuItem() to find the item by that index.

Reimplemented from YSelectionWidget.

Reimplemented from YSelectionWidget.

Definition at line 73 of file YContextMenu.cc.

5.35.3.2 addItems()

```
void YContextMenu::addItems (
             const YItemCollection & itemCollection )  [virtual]
```

Add multiple items.

For some UIs, this can be more efficient than calling addItem() multiple times. This function also automatically calls resolveShortcutConflicts() and rebuildMenuTree() at the end.

Derived classes can overwrite this function, but they should call this base class function at the end of the new implementation.

Reimplemented from YSelectionWidget.

Reimplemented from YSelectionWidget.

Definition at line 64 of file YContextMenu.cc.

5.35.3.3 deleteAllItems()

```
void YContextMenu::deleteAllItems ( )  [virtual]
```

Delete all items.

Reimplemented from YSelectionWidget.

Reimplemented from YSelectionWidget.

Definition at line 99 of file YContextMenu.cc.

5.35.3.4 findMenuItem() [1/2]

```
YMenuItem * YContextMenu::findMenuItem (
            int index )  [protected]
```

Recursively find the first menu item with the specified index.

Returns 0 if there is no such item.

Definition at line 107 of file YContextMenu.cc.

5.35.3.5 findMenuItem() [2/2]

```
YMenuItem * YContextMenu::findMenuItem (
            int index,
            YItemConstIterator begin,
            YItemConstIterator end )  [protected]
```

Recursively find the first menu item with the specified index from iterator 'begin' to iterator 'end'.

Returns 0 if there is no such item.

Definition at line 114 of file YContextMenu.cc.

5.35.3.6 getProperty()

```
YPropertyValue YContextMenu::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 194 of file YContextMenu.cc.

5.35.3.7 itemAt()

```
YMenuItem* YContextMenu::itemAt (
            int index )  [inline], [protected]
```

Alias for findMenuItem().

Reimplemented to ensure consistent behaviour with YSelectionWidget::itemAt().

Definition at line 173 of file YContextMenu.h.

5.35.3.8 propertySet()

```
const YPropertySet & YContextMenu::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 155 of file YContextMenu.cc.

5.35.3.9 rebuildMenuTree()

```
virtual void YContextMenu::rebuildMenuTree ( )  [pure virtual]
```

Rebuild the displayed menu tree from the internally stored YMenuItems.

The application should call this (once) after all items have been added with addItem(). YContextMenu::addItems() calls this automatically.

Derived classes are required to implement this.

5.35.3.10 resolveShortcutConflicts()

```
void YContextMenu::resolveShortcutConflicts ( )
```

Resolve keyboard shortcut conflicts: Change shortcuts of menu items if there are duplicates in the respective menu level.

This has to be called after all items are added, but before rebuildMenuTree() (see above). YContextMenu::addItems() calls this automatically.

Definition at line 140 of file YContextMenu.cc.

5.35.3.11 setProperty()

```
bool YContextMenu::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This function may throw YUIPropertyExceptions.

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 177 of file YContextMenu.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YContextMenu.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YContextMenu.cc

5.36 YContextMenuPrivate Struct Reference

Public Attributes

- int **nextSerialNo**

5.36.1 Detailed Description

Definition at line 36 of file YContextMenu.cc.

The documentation for this struct was generated from the following file:

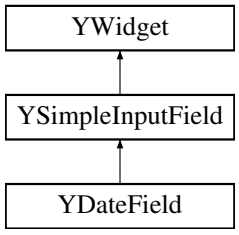
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YContextMenu.cc

5.37 YDateField Class Reference

Input field for entering a date.

`#include <YDateField.h>`

Inheritance diagram for YDateField:



Public Member Functions

- virtual ~YDateField ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.

Protected Member Functions

- YDateField (YWidget *parent, const std::string &label)

  Constructor.

5.37.1 Detailed Description

Input field for entering a date.

Derived classes are required to implement: value() setValue()

For both methods the date is formatted as "YYYY-MM-DD". See YSimpleInputField.h for more details.

Definition at line 42 of file YDateField.h.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YDateField.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YDateField.cc

5.38 YDateFieldPrivate Struct Reference

Public Attributes

- bool **dummy**

5.38.1 Detailed Description

Definition at line 34 of file YDateField.cc.

The documentation for this struct was generated from the following file:

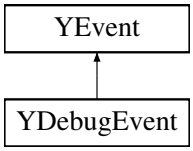
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YDateField.cc

5.39 YDebugEvent Class Reference

Event to be returned upon closing a dialog with the window manager close button (or Alt-F4)

`#include <YEvent.h>`

Inheritance diagram for YDebugEvent:



Protected Member Functions

- virtual ~YDebugEvent ()

  Protected destructor - events can only be deleted via YDialog::deleteEvent().

Additional Inherited Members

5.39.1 Detailed Description

Event to be returned upon closing a dialog with the window manager close button (or Alt-F4)

Definition at line 326 of file YEvent.h.

5.39.2 Constructor & Destructor Documentation

5.39.2.1 ~YDebugEvent()

```
virtual YDebugEvent::~YDebugEvent ( )  [inline], [protected], [virtual]
```

Protected destructor - events can only be deleted via YDialog::deleteEvent().

The associated dialog will take care of this event and delete it when appropriate.

Definition at line 338 of file YEvent.h.

The documentation for this class was generated from the following file:

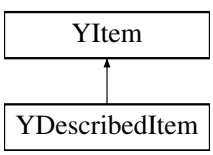
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YEvent.h

5.40 YDescribedItem Class Reference

Item class that has a (possibly multi-line) description text in addition to the normal label.

```
#include <YDescribedItem.h>
```

Inheritance diagram for YDescribedItem:



Public Member Functions

- YDescribedItem (const std::string &label, const std::string &description="", bool selected=false)

  Constructor with the label, the description and optionally the selected state.
- YDescribedItem (const std::string &label, const std::string &description, const std::string &iconName, bool selected=false)

  Constructor with the label, the description, the icon name and optionally the selected state.
- virtual ~YDescribedItem ()

  Destructor.
- std::string description () const

  Return this item's description text.
- void setDescription (const std::string &desc)

  Set this item's description text.
- bool enabled () const

  Return 'true' if this item is enabled (which is the default).
- void setEnabled (bool value)

  Set this item to enabled or disabled.

5.40.1 Detailed Description

Item class that has a (possibly multi-line) description text in addition to the normal label.

Definition at line 35 of file YDescribedItem.h.

5.40.2 Member Function Documentation

5.40.2.1 description()

```
std::string YDescribedItem::description ( ) const  [inline]
```

Return this item's description text.

This is the (typically longer) subtext that the user sees in a dialog, so this will usually be a translated text.

Definition at line 74 of file YDescribedItem.h.

5.40.2.2 enabled()

```
bool YDescribedItem::enabled ( ) const  [inline]
```

Return 'true' if this item is enabled (which is the default).

Items are only ever disabled if the application explicitly sets them to disabled.

Definition at line 85 of file YDescribedItem.h.

5.40.2.3 setEnabled()

```
void YDescribedItem::setEnabled (
             bool value )  [inline]
```

Set this item to enabled or disabled.

Notice that this only stores that status internally. To have any effect on an associated widget, use the widget's method to enable or disable an item (which will usually call this method internally at some point).

Definition at line 94 of file YDescribedItem.h.

The documentation for this class was generated from the following file:

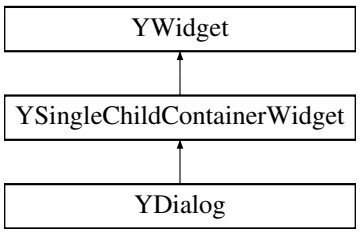
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YDescribedItem.h

5.41 YDialog Class Reference

A window in the desktop environment.

```
#include <YDialog.h>
```

Inheritance diagram for YDialog:



Public Member Functions

- virtual const char * widgetClass () const

  Return a descriptive name of this widget class for logging, debugging etc.
- void open ()

  Open a newly created dialog: Finalize it and make it visible on the screen.
- bool isOpen () const

  Return 'true' if open() has already been called for this dialog.
- YEvent * waitForEvent (int timeout_millisec=0)

  Wait for a user event.
- YEvent * pollEvent ()

  Check if a user event is pending.
- bool isTopmostDialog () const

  Return 'true' if this dialog is the topmost dialog.
- void requestMultiPassLayout ()

  Request multiple passes of the layout engine.
- int layoutPass () const

  Return the number of the current layout pass: 0: No layout going on right now 1: First pass 2: Second pass of a multi-pass layout.
- bool destroy (bool doThrow=true)

  Close and delete this dialog (and all its children) if it is the topmost dialog.
- void setInitialSize ()

  Set the initial dialog size, depending on dialogType: YMainDialog dialogs get the UI's "default main window" size, Y↩ PopupDialog dialogs use their content's preferred size.
- void recalcLayout ()

  Recalculate the layout of the dialog and of all its children after children have been added or removed or if any of them changed its preferred width of height.
- YDialogType dialogType () const

  Return this dialog's type (YMainDialog / YPopupDialog /YWizardDialog).
- bool isMainDialog ()

  Return 'true' if this dialog is a dialog of main dialog size: YMainDialog or YWizardDialog.
- YDialogColorMode colorMode () const

  Return this dialog's color mode.
- void checkShortcuts (bool force=false)

  Checks the keyboard shortcuts of widgets in this dialog unless shortcut checks are postponed or 'force' is 'true'.
- void postponeShortcutCheck ()

  From now on, postpone keyboard shortcut checks - i.e.
- bool shortcutCheckPostponed () const

  Return whether or not shortcut checking is currently postponed.
- YPushButton * defaultButton () const

  Return this dialog's default button: The button that is activated when the user hits [Return] anywhere in this dialog.
- void deleteEvent (YEvent *event)

  Delete an event.
- void addEventFilter (YEventFilter *eventFilter)

  Add an event filter.
- void removeEventFilter (YEventFilter *eventFilter)

  Remove an event filter.
- virtual void highlight (YWidget *child)

Highlight a child widget of this dialog.

- virtual void setDefaultButton (YPushButton *defaultButton)

  Set this dialog's default button (the button that is activated when the user hits [Return] anywhere in this dialog).

- virtual void activate ()=0

  Activate this dialog: Make sure that it is shown as the topmost dialog of this application and that it can receive input.

Static Public Member Functions

- static bool deleteTopmostDialog (bool doThrow=true)

  Delete the topmost dialog.

- static void deleteAllDialogs ()

  Delete all open dialogs.

- static void deleteTo (YDialog *dialog)

  Delete all dialogs from the topmost to the one specified.

- static int openDialogsCount ()

  Returns the number of currently open dialogs (from 1 on), i.e., the depth of the dialog stack.

- static YDialog * currentDialog (bool doThrow=true)

  Return the current (topmost) dialog.

- static YDialog * topmostDialog (bool doThrow=true)

  Alias for currentDialog().

- static void showText (const std::string &text, bool richText=false)

  Show the specified text in a pop-up dialog with a local event loop.

- static bool showHelpText (YWidget *widget)

  Show the help text for the specified widget.

- static bool showRelNotesText ()

  Show the release notes.

Protected Member Functions

- YDialog (YDialogType dialogType, YDialogColorMode colorMode=YDialogNormalColor)

  Constructor.

- virtual ~YDialog ()

  Destructor.

- virtual void openInternal ()=0

  Internal open() method.

- void doLayout ()

  Calculate the layout and set the size of the dialog and all widgets.

- virtual YEvent * waitForEventInternal (int timeout_millisec)=0

  Wait for a user event.

- virtual YEvent * pollEventInternal ()=0

  Check if a user event is pending.

- YEvent * filterInvalidEvents (YEvent *event)

  Filter out invalid events: Return 0 if the event does not belong to this dialog or the unchanged event if it does.

- YEvent * callEventFilters (YEvent *event)

  Call the installed event filters.

- void deleteEventFilters ()

  Delete all (remaining) event filters.

Static Protected Attributes

- static std::stack< YDialog * > _dialogStack

  Stack holding all currently existing dialogs.

5.41.1 Detailed Description

A window in the desktop environment.

A YPopupDialog always has a dedicated window but YMainDialog may be stacked in a single window.

Definition at line 47 of file YDialog.h.

5.41.2 Constructor & Destructor Documentation

5.41.2.1 YDialog()

```
YDialog::YDialog (
            YDialogType dialogType,
            YDialogColorMode colorMode = YDialogNormalColor )  [protected]
```

Constructor.

'dialogType' is one of YMainDialog or YPopupDialog.

'colorMode' can be set to YDialogWarnColor to use very bright "warning" colors or YDialogInfoColor to use more prominent, yet not quite as bright as "warning" colors. Use both only very rarely.

Definition at line 136 of file YDialog.cc.

5.41.2.2 ~YDialog()

```
YDialog::~YDialog ( )  [protected], [virtual]
```

Destructor.

Don't delete a dialog directly, use YDialog::deleteTopmostDialog() or YDialog::destroy().

Definition at line 153 of file YDialog.cc.

5.41.3 Member Function Documentation

5.41.3.1 activate()

```
virtual void YDialog::activate ( )  [pure virtual]
```

Activate this dialog: Make sure that it is shown as the topmost dialog of this application and that it can receive input.

Derived classes are required to implement this.

5.41.3.2 addEventFilter()

```
void YDialog::addEventFilter (
            YEventFilter * eventFilter )
```

Add an event filter.

This can be useful to catch certain types of events before they are delivered to the application. All event filters are called (in unspecified order) in waitForEvent(). Each one may consume an event, pass it through unchanged, or replace it with a newly created event.

Normally, an YEventFilter should be created on the heap with 'new'. In that case, the dialog's destructor will take care of deleting it.

In rare cases it might make sense to create an YEventFilter on the stack (as a local variable) and rely on that variable to go out of scope and be destroyed before the dialog gets destroyed. But that may be risky.

Notice that applications never need to call this function: YEventFilter does it automatically in its constructor.

Definition at line 608 of file YDialog.cc.

5.41.3.3 checkShortcuts()

```
void YDialog::checkShortcuts (
            bool force = false )
```

Checks the keyboard shortcuts of widgets in this dialog unless shortcut checks are postponed or 'force' is 'true'.

A forced shortcut check resets postponed checking.

Definition at line 305 of file YDialog.cc.

5.41.3.4 currentDialog()

```
YDialog * YDialog::currentDialog (
            bool doThrow = true )  [static]
```

Return the current (topmost) dialog.

If there is none, throw a YUINoDialogException if 'doThrow' is 'true' and return 0 if 'doThrow' is false.

Definition at line 539 of file YDialog.cc.

5.41.3.5 defaultButton()

```
YPushButton * YDialog::defaultButton ( ) const
```

Return this dialog's default button: The button that is activated when the user hits [Return] anywhere in this dialog.

Note that this is not the same as the button that currently has the keyboard focus.

This might return 0 if there is no default button.

Definition at line 323 of file YDialog.cc.

5.41.3.6 deleteTopmostDialog()

```
bool YDialog::deleteTopmostDialog (
            bool doThrow = true )  [static]
```

Delete the topmost dialog.

Will throw a YUINoDialogException if there is no dialog and 'doThrow' is 'true'.

This is equivalent to YDialog::currentDialog()->destroy().

Returns 'true' if there is another open dialog after deleting, 'false' if there is none.

Definition at line 553 of file YDialog.cc.

5.41.3.7 destroy()

```
bool YDialog::destroy (
            bool doThrow = true )
```

Close and delete this dialog (and all its children) if it is the topmost dialog.

If this is not the topmost dialog, this will throw an exception if 'doThrow' is true (default).

Remember that all pointers to the dialog and its children will be invalid after this operation.

This is intentionally not named close() since close() would not imply that the dialog and its children are deleted.

Returns 'true' upon success, 'false' upon failure.

Definition at line 238 of file YDialog.cc.

5.41.3.8 filterInvalidEvents()

```
YEvent * YDialog::filterInvalidEvents (
            YEvent * event )  [protected]
```

Filter out invalid events: Return 0 if the event does not belong to this dialog or the unchanged event if it does.

Silently discard events from widgets that have become invalid.

This may legitimately happen if some widget triggered an event yet nobody cared for that event (i.e. called UserInput() or PollInput()) and the widget has been destroyed meanwhile.

Silently discard events from all but the current (topmost) dialog.

This may happen even here even though the specific UI should have taken care about that: Events may still be in the queue. They might have been valid (i.e. belonged to the topmost dialog) when they arrived, but maybe simply nobody has evaluated them.

Definition at line 452 of file YDialog.cc.

5.41.3.9 highlight()

```
virtual void YDialog::highlight (
            YWidget * child )  [inline], [virtual]
```

Highlight a child widget of this dialog.

This is meant for debugging: YDialogSpy and similar uses.

No more than one widget can be highlighted at any one time in the same dialog. Highlighting another widget unhighlights a previously highlighted widget. 0 means 'unhighlight the last highlighted widget, but don't highlight any other'.

This default implementation does nothing.

Definition at line 334 of file YDialog.h.

5.41.3.10 open()

```
void YDialog::open ( )
```

Open a newly created dialog: Finalize it and make it visible on the screen.

Applications should call this once after all children are created. If the application doesn't do this, it will be done automatically upon the next call of YDialog::waitForEvent() (or related). This is OK if YDialog::waitForEvent() is called immediately after creating the dialog anyway. If it is not, the application might appear sluggish to the user.

Derived classes are free to reimplement this, but they should call this base class method in the new implementation.

Definition at line 189 of file YDialog.cc.

5.41.3.11 openInternal()

```
virtual void YDialog::openInternal ( )  [protected], [pure virtual]
```

Internal open() method.

This is called (exactly once during the life time of the dialog) in open().

Derived classes are required to implement this to do whatever is necessary to make this dialog visible on the screen.

5.41.3.12 pollEvent()

```
YEvent * YDialog::pollEvent ( )
```

Check if a user event is pending.

If there is one, return it. If there is none, do not wait for one - return 0.

If open() has not been called for this dialog until now, it is called now.

The dialog retains ownership of the event and will delete it upon the next call to waitForEvent() or pollEvent() or when the dialog is deleted. This also means that the return value of this function can safely be ignored without fear of memory leaks.

If this dialog is not the topmost dialog, an exception is thrown.

Definition at line 427 of file YDialog.cc.

5.41.3.13 pollEventInternal()

```
virtual YEvent* YDialog::pollEventInternal ( )  [protected], [pure virtual]
```

Check if a user event is pending.

If there is one, return it. If there is none, do not wait for one - return 0.

Derived classes are required to implement this.

5.41.3.14 postponeShortcutCheck()

```
void YDialog::postponeShortcutCheck ( )
```

From now on, postpone keyboard shortcut checks - i.e.

normal (not forced) checkKeyboardShortcuts() will do nothing. Reset this mode by forcing a shortcut check with check↩KeyboardShortcuts(true).

Definition at line 291 of file YDialog.cc.

5.41.3.15 recalcLayout()

```
void YDialog::recalcLayout ( )
```

Recalculate the layout of the dialog and of all its children after children have been added or removed or if any of them changed its preferred width of height.

This is a very expensive operation. Call it only when really necessary. YDialog::open() includes a call to YDialog::setInitialSize() which does the same.

The basic idea behind this function is to call it when the dialog changed after it (and its children hierarchy) was initially created.

Definition at line 356 of file YDialog.cc.

5.41.3.16 removeEventFilter()

```
void YDialog::removeEventFilter (
            YEventFilter * eventFilter )
```

Remove an event filter.

Notice that applications never need to call this function: YEventFilter does it automatically in its destructor.

Definition at line 630 of file YDialog.cc.

5.41.3.17 requestMultiPassLayout()

```
void YDialog::requestMultiPassLayout ( )
```

Request multiple passes of the layout engine.

This is intended for widgets that don't know their preferred width and height immediately because one depends on the other, for example labels with auto-wrapping: They know (roughly) the area they will need, but they can calculate their preferred height only when their width is known.

Once set, this option cannot be unset; it remains set for the life time of the dialog.

Definition at line 662 of file YDialog.cc.

5.41.3.18 setDefaultButton()

```
void YDialog::setDefaultButton (
             YPushButton * defaultButton )  [virtual]
```

Set this dialog's default button (the button that is activated when the user hits [Return] anywhere in this dialog).

0 means no default button.

There should be no more than one default button in a dialog.

Derived classes are free to overwrite this method, but they should call this base class method in the new implementation.

Definition at line 330 of file YDialog.cc.

5.41.3.19 showHelpText()

```
bool YDialog::showHelpText (
             YWidget * widget )  [static]
```

Show the help text for the specified widget.

If it doesn't have one, traverse up the widget hierarchy until there is one.

If there is a help text, it is displayed in a pop-up dialog with a local event loop.

This returns 'true' on success (there was a help text) and 'false' on failure (no help text).

Definition at line 102 of file YDialogHelpers.cc.

5.41.3.20 showRelNotesText()

```
bool YDialog::showRelNotesText ( )  [static]
```

Show the release notes.

If there are release notes, they are displayed in a pop-up dialog with a local event loop.

This returns 'true' on success (there were relnotes) and 'false' on failure (no relnotes).

Definition at line 134 of file YDialogHelpers.cc.

5.41.3.21 showText()

```
void YDialog::showText (
             const std::string & text,
             bool richText = false )  [static]
```

Show the specified text in a pop-up dialog with a local event loop.

This is useful for help texts. 'richText' indicates if YRichText formatting should be applied.

Definition at line 56 of file YDialogHelpers.cc.

5.41.3.22 waitForEvent()

```
YEvent * YDialog::waitForEvent (
             int timeout_millisec = 0 )
```

Wait for a user event.

In most cases, this means waiting until the user has clicked on a button in this dialog. If any widget has its 'notify' flag set (`opt(notify)` in YCP, setNotify(true) in C++), an action on such a widget will also make waitForEvent() return.

If the specified timeout elapses without any user event, a YTimeoutEvent will be returned. 0 means no timeout (wait forever).

If open() has not been called for this dialog until now, it is called now.

The dialog retains ownership of the event and will delete it upon the next call to waitForEvent() or pollEvent() or when the dialog is deleted. This also means that the return value of this function can safely be ignored without fear of memory leaks.

Applications can create YEventFilters to act upon some events before they are delivered to the application. Each event filter of this dialog is called (in undefined order) in waitForEvent(). An event filter can consume an event (in which case waitForEvent() will return to its internal event loop), pass it through unchanged, or even replace it with a new event. Refer to the YEventFilter documentation for more details.

If this dialog is not the topmost dialog, an exception is thrown.

Definition at line 387 of file YDialog.cc.

5.41.3.23 waitForEventInternal()

```
virtual YEvent* YDialog::waitForEventInternal (
            int timeout_millisec )  [protected], [pure virtual]
```

Wait for a user event.

Derived classes are required to implement this.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YDialog.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YDialog.cc
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YDialogHelpers.cc
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUI.cc

5.42 YDialogPrivate Struct Reference

Public Member Functions

- **YDialogPrivate** (YDialogType dialogType, YDialogColorMode colorMode)

Public Attributes

- YDialogType **dialogType**
- YDialogColorMode **colorMode**
- bool **shortcutCheckPostponed**
- YPushButton * **defaultButton**
- bool **isOpen**
- bool **multiPassLayout**
- int **layoutPass**
- YEvent * **lastEvent**
- YEventFilterList **eventFilterList**

5.42.1 Detailed Description

Definition at line 45 of file YDialog.cc.

The documentation for this struct was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YDialog.cc

5.43 YDialogSpy Class Reference

An interactive dialog debugger: Show the structure and content of a dialog and its widgets.

`#include <YDialogSpy.h>`

Public Member Functions

- void showProperties ()
  Show the "Properties" sub-window.
- void hideProperties ()
  Hide the "Properties" sub-window.
- bool propertiesShown () const
  Return 'true' if the "Properties" sub-window is currently shown, 'false' if not.

Static Public Member Functions

- static void showDialogSpy (YDialog *dialog=0)
  Show a YDialogSpy for the specified dialog.

Protected Member Functions

- YDialogSpy (YDialog *dialog=0)
  Constructor: Create a YDialogSpy for the specified dialog.
- virtual ~YDialogSpy ()
  Destructor.
- void exec ()
  Execute the event loop.
- void showProperties (YWidget *widget)
  Show the properties of the specified widget if the "Properties" sub-window is currently shown.

5.43.1 Detailed Description

An interactive dialog debugger: Show the structure and content of a dialog and its widgets.

This can be invoked by special key combinations: Ctrl-Alt-Shift-Y in the Qt UI

Definition at line 43 of file YDialogSpy.h.

5.43.2 Constructor & Destructor Documentation

5.43.2.1 YDialogSpy()

```
YDialogSpy::YDialogSpy (
            YDialog * dialog = 0 )  [protected]
```

Constructor: Create a YDialogSpy for the specified dialog.

Constructor - create the main spy dialog.

0 means "use the topmost dialog".

In most cases it is more useful to use the static showDialogSpy() method rather than create this dialog directly.

Definition at line 219 of file YDialogSpy.cc.

5.43.3 Member Function Documentation

5.43.3.1 exec()

```
void YDialogSpy::exec ( )  [protected]
```

Execute the event loop.

The main loop of the spy dialog.

This will only return when the user closes the YDialogSpy dialog.

Definition at line 504 of file YDialogSpy.cc.

5.43.3.2 showDialogSpy()

```
void YDialogSpy::showDialogSpy (
            YDialog * dialog = 0 )  [static]
```

Show a YDialogSpy for the specified dialog.

Run the spy dialog for selected UI dialog.

0 means "use the topmost dialog". This will return only when the user closes the YDialogSpy dialog.

Parameters

dialog	UI dialog to examine

Definition at line 551 of file YDialogSpy.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YDialogSpy.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YDialogSpy.cc

5.44 YDialogSpyPrivate Class Reference

Public Member Functions

- ~YDialogSpyPrivate ()

  Destructor - switch off widget highlighting at the end.
- YWidget * selectedWidget ()

  The currently selected wiget.
- void selectedWidgetChanged ()

  The selected item has been changed, refresh the UI.
- void refreshProperties ()

  Refresh the displayed properties.
- bool toggleProperties ()

  Hide or show the properties dialog.
- void highlightWidget (bool enable=true)

  Highlight the currently selected widget in the spy dialog.
- void deleteWidget ()

  Delete the currently selected widget.
- void addWidget (const string &type)

  Generic handler for adding widgets.
- void editProperty ()

  Run the property editor for the current widget.
- void **moveSelectedUp** ()
- void **moveSelectedDown** ()

Public Attributes

- YDialog * **targetDialog**
- YDialog * **spyDialog**
- YTree * **widgetTree**
- YPushButton * **propButton**
- YMenuButton * **addButton**
- YPushButton * **deleteButton**
- YPushButton * **upButton**
- YPushButton * **downButton**
- YReplacePoint * **propReplacePoint**
- YTable * **propTable**
- YMenuItem * **exportMenu**

5.44.1 Detailed Description

Definition at line 134 of file YDialogSpy.cc.

5.44.2 Member Function Documentation

5.44.2.1 addWidget()

```
void YDialogSpyPrivate::addWidget (
             const string & type )
```

Generic handler for adding widgets.

Parameters

type	Type of the widget to add

Definition at line 705 of file YDialogSpy.cc.

5.44.2.2 selectedWidget()

```
YWidget * YDialogSpyPrivate::selectedWidget ( )
```

The currently selected wiget.

Returns

The currently selected widget (or nullptr if nothing is selected)

Definition at line 570 of file YDialogSpy.cc.

5.44.2.3 toggleProperties()

```
bool YDialogSpyPrivate::toggleProperties ( )
```

Hide or show the properties dialog.

Returns

true if the dialog is now displayed

Definition at line 408 of file YDialogSpy.cc.

The documentation for this class was generated from the following file:

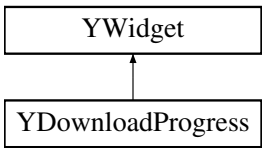
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YDialogSpy.cc

5.45 YDownloadProgress Class Reference

DownloadProgress: A progress bar that monitors downloading a file by repeatedly polling its size up to its expected size.

`#include <YDownloadProgress.h>`

Inheritance diagram for YDownloadProgress:



Public Member Functions

- virtual ~YDownloadProgress ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- std::string label () const

  Get the label (the text above the progress bar).
- virtual void setLabel (const std::string &label)

  Set the label (the text above the progress bar).
- std::string filename () const

  Return the name of the file that is being monitored.
- virtual void setFilename (const std::string &filename)

  Set the name of a new file to monitor.
- YFileSize_t expectedSize () const

  Return the expected file size.
- virtual void setExpectedSize (YFileSize_t newSize)

  Set the expected file size.
- virtual YFileSize_t currentFileSize () const

  Return the current size of the file that is being downloaded or 0 if this file doesn't exist (yet).
- int currentPercent () const

  Return the percentage (0..100) of the file being downloaded so far.
- int value () const

  Alias for currentPercent().
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.

Protected Member Functions

- YDownloadProgress (YWidget *parent, const std::string &label, const std::string &filename, YFileSize_t expectedSize)

  Constructor.

5.45.1 Detailed Description

DownloadProgress: A progress bar that monitors downloading a file by repeatedly polling its size up to its expected size.

Definition at line 37 of file YDownloadProgress.h.

5.45.2 Constructor & Destructor Documentation

5.45.2.1 YDownloadProgress()

```
YDownloadProgress::YDownloadProgress (
            YWidget * parent,
            const std::string & label,
            const std::string & filename,
            YFileSize_t expectedSize )  [protected]
```

Constructor.

'label' is the label above the progress bar.

'filename' is the name (with path) of the file being monitored.

'expectedSize' is the expected size of the file in bytes.

Definition at line 53 of file YDownloadProgress.cc.

5.45.3 Member Function Documentation

5.45.3.1 currentFileSize()

```
YFileSize_t YDownloadProgress::currentFileSize ( ) const  [virtual]
```

Return the current size of the file that is being downloaded or 0 if this file doesn't exist (yet).

This default implementation returns the 'st_size' field of a stat() system call on the file. This should be useful for most implementations.

Definition at line 131 of file YDownloadProgress.cc.

5.45.3.2 getProperty()

```
YPropertyValue YDownloadProgress::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 186 of file YDownloadProgress.cc.

5.45.3.3 propertySet()

```
const YPropertySet & YDownloadProgress::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 143 of file YDownloadProgress.cc.

5.45.3.4 setExpectedSize()

```
void YDownloadProgress::setExpectedSize (
            YFileSize_t newSize )  [virtual]
```

Set the expected file size.

Derived classes are free to reimplement this, but they should call this base class method at the end of the overloaded function.

Definition at line 109 of file YDownloadProgress.cc.

5.45.3.5 setFilename()

```
void YDownloadProgress::setFilename (
            const std::string & filename )  [virtual]
```

Set the name of a new file to monitor.

Derived classes are free to reimplement this, but they should call this base class method at the end of the overloaded function.

Definition at line 95 of file YDownloadProgress.cc.

5.45.3.6 setLabel()

```
void YDownloadProgress::setLabel (
            const std::string & label )  [virtual]
```

Set the label (the text above the progress bar).

Derived classes are free to reimplement this, but they should call this base class method at the end of the overloaded function.

Definition at line 81 of file YDownloadProgress.cc.

5.45.3.7 setProperty()

```
bool YDownloadProgress::setProperty (
            const std::string & propertyName,
            const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This function may throw YUIPropertyExceptions.

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 169 of file YDownloadProgress.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YDownloadProgress.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YDownloadProgress.cc

5.46 YDownloadProgressPrivate Struct Reference

Public Member Functions

- **YDownloadProgressPrivate** (const string &label, const string &filename, YFileSize_t expectedSize)

Public Attributes

- string **label**
- string **filename**
- YFileSize_t **expectedSize**

5.46.1 Detailed Description

Definition at line 37 of file YDownloadProgress.cc.

The documentation for this struct was generated from the following file:

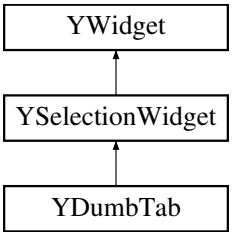
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YDownloadProgress.cc

5.47 YDumbTab Class Reference

DumbTab: A very simple tab widget that can display and switch between a number of tabs, but will only deliver the "user clicked on tab " event very much like a PushButton does.

```
#include <YDumbTab.h>
```

Inheritance diagram for YDumbTab:



Public Member Functions

- virtual ~YDumbTab ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- virtual void addItem (YItem *item)

  Add an item (a tab page).
- virtual void shortcutChanged ()

  Notification that any shortcut of any item was changed by the shortcut conflict manager.
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.
- virtual std::string shortcutString () const

  Get the string of this widget that holds the keyboard shortcut.
- virtual void setShortcutString (const std::string &str)

  Set the string of this widget that holds the keyboard shortcut.
- virtual bool stretchable (YUIDimension dim) const

  Returns 'true' if this widget is stretchable in the specified dimension.
- virtual std::string debugLabel () const

  Descriptive label for debugging.
- virtual void activate ()=0

  Activate selected tab.

Protected Member Functions

- YDumbTab (YWidget *parent)

  Constructor.

5.47.1 Detailed Description

DumbTab: A very simple tab widget that can display and switch between a number of tabs, but will only deliver the "user clicked on tab " event very much like a PushButton does.

Actually exchanging the content of the tab is left to the application.

DumbTab accepts a single child widget.

Definition at line 40 of file YDumbTab.h.

5.47.2 Member Function Documentation

5.47.2.1 activate()

```
virtual void YDumbTab::activate ( )  [pure virtual]
```

Activate selected tab.

Can be used in tests to simulate user input.

Derived classes are required to implement this.

5.47.2.2 addItem()

```
void YDumbTab::addItem (
             YItem * item )  [virtual]
```

Add an item (a tab page).

Reimplemented from YSelectionWidget.

Derived classes can overwrite this function, but they should call this base class function in the new implementation.

Reimplemented from YSelectionWidget.

Definition at line 68 of file YDumbTab.cc.

5.47.2.3 debugLabel()

```
string YDumbTab::debugLabel ( ) const  [virtual]
```

Descriptive label for debugging.

Derived from this widget's only child (if there is one).

Reimplemented from YWidget.

Definition at line 85 of file YDumbTab.cc.

5.47.2.4 getProperty()

```
YPropertyValue YDumbTab::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw exceptions, for example

- if there is no property with that name

Reimplemented from YWidget.

Definition at line 141 of file YDumbTab.cc.

5.47.2.5 propertySet()

```
const YPropertySet & YDumbTab::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property set upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 102 of file YDumbTab.cc.

5.47.2.6 setProperty()

```
bool YDumbTab::setProperty (
            const std::string & propertyName,
            const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This method may throw exceptions, for example

- if there is no property with that name
- if the expected type and the type mismatch
- if the value is out of range

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 124 of file YDumbTab.cc.

5.47.2.7 setShortcutString()

```
virtual void YDumbTab::setShortcutString (
            const std::string & str )  [inline], [virtual]
```

Set the string of this widget that holds the keyboard shortcut.

Since YDumbTab doesn't have a shortcut for the widget itself (only for the tab pages, i.e. the items), this will simply trigger a shortcutChanged() notification.

Reimplemented from YSelectionWidget.

Reimplemented from YSelectionWidget.

Definition at line 130 of file YDumbTab.h.

5.47.2.8 shortcutChanged()

```
virtual void YDumbTab::shortcutChanged ( )  [inline], [virtual]
```

Notification that any shortcut of any item was changed by the shortcut conflict manager.

Derived classes should reimplement this.

Definition at line 76 of file YDumbTab.h.

5.47.2.9 shortcutString()

```
virtual std::string YDumbTab::shortcutString ( ) const  [inline], [virtual]
```

Get the string of this widget that holds the keyboard shortcut.

Notice that since YDumbTab has one shortcut for each tab page (for each item), this is not meaningful for this widget class.

Check YItemShortcut in YShortcut.{cc,h} for more details.

Reimplemented from YSelectionWidget.

Reimplemented from YSelectionWidget.

Definition at line 120 of file YDumbTab.h.

5.47.2.10 stretchable()

```
bool YDumbTab::stretchable (
            YUIDimension dim ) const  [virtual]
```

Returns 'true' if this widget is stretchable in the specified dimension.

In this case, the stretchability of the single child is returned.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 75 of file YDumbTab.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YDumbTab.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YDumbTab.cc

5.48 YDumbTabPrivate Struct Reference

Public Attributes

- bool **dummy**

5.48.1 Detailed Description

Definition at line 36 of file YDumbTab.cc.

The documentation for this struct was generated from the following file:

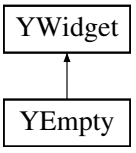
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YDumbTab.cc

5.49 YEmpty Class Reference

A widget with zero size, useful as a placeholder.

```
#include <YEmpty.h>
```

Inheritance diagram for YEmpty:



Public Member Functions

- virtual ~YEmpty ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- virtual int preferredWidth ()

  Preferred width of the widget.
- virtual int preferredHeight ()

  Preferred height of the widget.

Protected Member Functions

- YEmpty (YWidget *parent)

  Constructor.

5.49.1 Detailed Description

A widget with zero size, useful as a placeholder.

Definition at line 37 of file YEmpty.h.

5.49.2 Member Function Documentation

5.49.2.1 preferredHeight()

```
int YEmpty::preferredHeight ( )  [virtual]
```

Preferred height of the widget.

Reimplemented from YWidget.

Implements YWidget.

Definition at line 56 of file YEmpty.cc.

5.49.2.2 preferredWidth()

```
int YEmpty::preferredWidth ( )  [virtual]
```

Preferred width of the widget.

Reimplemented from YWidget.

Implements YWidget.

Definition at line 50 of file YEmpty.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YEmpty.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YEmpty.cc

5.50 YEmptyPrivate Struct Reference

Public Attributes

- bool **dummy**

5.50.1 Detailed Description

Definition at line 28 of file YEmpty.cc.

The documentation for this struct was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YEmpty.cc

5.51 YEnvVar Class Reference

Helper class to represent an environment variable and its value.

```
#include <YEnvVar.h>
```

Public Member Functions

- YEnvVar (const std::string &name=std::string())

  Constructor: Retrieve the environment variable 'name' and store the value (unless 'name' is empty).
- std::string name () const

  Return the name of the environment variable.
- bool isSet () const

  Return 'true' if the environment variable is set.
- std::string value () const

  Return the value of the environment variable.
- bool isEqual (const std::string &str, bool caseSensitive=false) const

  Return 'true' if the environment variable is set and the value is 'str'.
- bool operator== (const std::string &str) const

  Case-insensitive comparison (shortcut for isEqual()): Return 'true' if the environment variable is set and the value is 'str'.
- bool contains (const std::string &str, bool caseSensitive=false) const

  Return 'true' if the environment variable is set and the value contains 'str'.

5.51.1 Detailed Description

Helper class to represent an environment variable and its value.

Definition at line 36 of file YEnvVar.h.

The documentation for this class was generated from the following files:

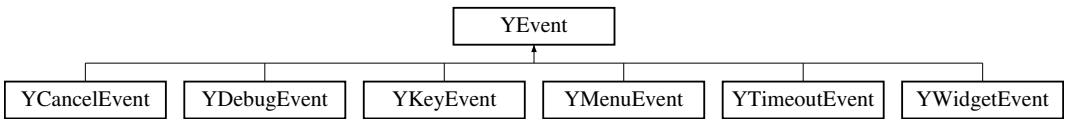
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YEnvVar.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YEnvVar.cc

5.52 YEvent Class Reference

Abstract base class for events to be returned upon UI::UserInput() and related functions.

```
#include <YEvent.h>
```

Inheritance diagram for YEvent:



Public Types

- enum **EventType** {
  NoEvent = 0, **UnknownEvent**, **WidgetEvent**, **MenuEvent**,
  KeyEvent, **CancelEvent**, **TimeoutEvent**, **DebugEvent**,
  InvalidEvent = 0x4242 }
- enum **EventReason** {
  UnknownReason = 0, **Activated**, **SelectionChanged**, **ValueChanged**,
  ContextMenuActivated }

Public Member Functions

- YEvent (EventType eventType=UnknownEvent)

  Constructor.
- EventType eventType () const

  Returns the event type.
- unsigned long serial () const

  Returns the unique serial no.
- virtual YWidget * widget () const

  Returns the widget that caused this event or 0 if there is none.
- virtual YItem * item () const

  Return the YItem that corresponds to this event or 0 if there is none.
- YDialog * dialog () const

  Return the dialog this event belongs to or 0 if no dialog was set yet.
- bool isValid () const

  Check if this event is valid.

Static Public Member Functions

- static const char * toString (EventType eventType)

  Returns the character representation of an event type.
- static const char * toString (EventReason reason)

  Returns the character representation of an event reason.

Protected Member Functions

- void setDialog (YDialog *dia)

  Set the dialog this event belongs to.
- virtual ~YEvent ()

  Protected destructor - events can only be deleted via YDialog::deleteEvent().
- void invalidate ()

  Mark this event as invalid.

Friends

- void **YDialog::deleteEvent** (YEvent *event)
- void **YSimpleEventHandler::deleteEvent** (YEvent *event)

5.52.1 Detailed Description

Abstract base class for events to be returned upon UI::UserInput() and related functions.

Definition at line 43 of file YEvent.h.

5.52.2 Constructor & Destructor Documentation

5.52.2.1 ~YEvent()

```
YEvent::~YEvent ( )  [protected], [virtual]
```

Protected destructor - events can only be deleted via YDialog::deleteEvent().

The associated dialog will take care of this event and delete it when appropriate.

This desctructor is virtual to force a polymorph object so dynamic_cast<> can be used.

Definition at line 48 of file YEvent.cc.

5.52.3 Member Function Documentation

5.52.3.1 invalidate()

```
void YEvent::invalidate ( )  [protected]
```

Mark this event as invalid.

This cannot be undone.

Definition at line 62 of file YEvent.cc.

5.52.3.2 isValid()

```
bool YEvent::isValid ( ) const
```

Check if this event is valid.

Events become invalid in the destructor.

Definition at line 55 of file YEvent.cc.

5.52.3.3 item()

```
virtual YItem* YEvent::item ( ) const  [inline], [virtual]
```

Return the YItem that corresponds to this event or 0 if there is none.

This default implementation always returns 0. Subclasses that actually return items should overwrite this method.

Reimplemented in YMenuEvent.

Definition at line 101 of file YEvent.h.

5.52.3.4 serial()

```
unsigned long YEvent::serial ( ) const  [inline]
```

Returns the unique serial no.

of this event. This is mainly useful for debugging.

Definition at line 85 of file YEvent.h.

5.52.3.5 widget()

```
virtual YWidget* YEvent::widget ( ) const  [inline], [virtual]
```

Returns the widget that caused this event or 0 if there is none.

This default implementation always returns 0. Subclasses that actually return widgets should overwrite this method.

Reimplemented in YWidgetEvent.

Definition at line 93 of file YEvent.h.

The documentation for this class was generated from the following files:

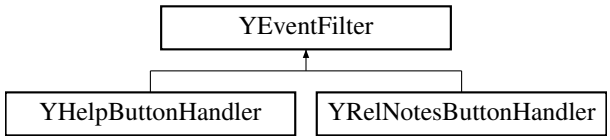
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YEvent.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YEvent.cc

5.53 YEventFilter Class Reference

Abstract base class to filter events.

`#include <YEventFilter.h>`

Inheritance diagram for YEventFilter:



Public Member Functions

- virtual ~YEventFilter ()

  Destructor.
- virtual YEvent * filter (YEvent *event)=0

  The heart of the matter: The event filter function.
- YDialog * dialog () const

  Return the dialog this event filter belongs to.

Protected Member Functions

- YEventFilter (YDialog *dialog=0)

  Constructor.

5.53.1 Detailed Description

Abstract base class to filter events.

This class can be used to examine events just before they are delivered to the application. This is most useful for higher-level widgets or for libraries that need to react to certain events and either consume them, have them delivered unchanged to the application, or exchange an event with another one.

A YEventFilter belongs to one specific dialog. Each dialog can have any number of event filters. Each of those event filters is called (its YEventFilter::filter() method) for each event inside YDialog::waitForEvent(). The order in which event filters are called is undefined.

YEventFilter objects should be created with 'new' (on the heap). Since an YEventFilter registers itself with its dialog, the dialog will delete it in its destructor if it still exists after all child widgets are deleted.

Thus, it is safe to store a pointer to an YEventFilter until the corresponding dialog is deleted. After that, the pointer becomes invalid.

See YHelpButtonHandler in YDialog.cc for an example.

Definition at line 62 of file YEventFilter.h.

5.53.2 Constructor & Destructor Documentation

5.53.2.1 YEventFilter()

```
YEventFilter::YEventFilter (
            YDialog * dialog = 0 )  [protected]
```

Constructor.

This registers the event filter with the specified dialog. The dialog assumes ownership of this object and will delete it in its destructor (unless this object is destroyed before that time).

If 'dialog' is 0, YDialog::currentDialog() is used (which can throw a YUINoDialogException if there is no dialog).

Definition at line 44 of file YEventFilter.cc.

5.53.2.2 ~YEventFilter()

```
YEventFilter::~YEventFilter ( )  [virtual]
```

Destructor.

This will unregister this object with its dialog.

Definition at line 56 of file YEventFilter.cc.

5.53.3 Member Function Documentation

5.53.3.1 filter()

```
virtual YEvent* YEventFilter::filter (
            YEvent * event )  [pure virtual]
```

The heart of the matter: The event filter function.

Derived classes are required to implement this.

This method can inspect the event it receives. Hint: event->widget() is typically the most interesting information.

This method can react on individual events and

- consume the event (i.e., return 0)
- pass the event through unchanged (simply return the event)
- create a new event (typically based on data in the received event).

If 0 or a new event (another value than 'event') is returned, the old event is deleted. If a value different from 'event' or 0 is returned, that value is assumed to be a pointer to a newly created event. The dialog will assume ownership of that event and delete it when appropriate.

Note: Never delete 'event' in this method! Return 0 or a new event instead; the caller will take care of deleting the old event.

Implemented in YRelNotesButtonHandler, and YHelpButtonHandler.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YEventFilter.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YEventFilter.cc

5.54 YEventFilterPrivate Struct Reference

Public Member Functions

- **YEventFilterPrivate** (YDialog *dialog)

Public Attributes

- YDialog * **dialog**

5.54.1 Detailed Description

Definition at line 32 of file YEventFilter.cc.

The documentation for this struct was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YEventFilter.cc

5.55 YExternalWidgetFactory Class Reference

Abstract widget factory for mandatory widgets.

`#include <YExternalWidgetFactory.h>`

Protected Member Functions

- YExternalWidgetFactory ()

  Constructor.
- virtual ~YExternalWidgetFactory ()

  Destructor.

Friends

- class **YUI**
- class **YExternalWidgets**

5.55.1 Detailed Description

Abstract widget factory for mandatory widgets.

Use YOptionalWidgetFactory for optional ("special") widgets. YExternalWidgetFactory is used for external widgets, e.g. user defined plugin.

Refer to the respective widget's documentation (in the header file) for documentation about the function parameters.

Definition at line 30 of file YExternalWidgetFactory.h.

5.55.2 Constructor & Destructor Documentation

5.55.2.1 YExternalWidgetFactory()

```
YExternalWidgetFactory::YExternalWidgetFactory ( )  [inline], [protected]
```

Constructor.

Use YExternalWidgets::widgetExtensionFactory() to get the singleton for this class.

Definition at line 42 of file YExternalWidgetFactory.h.

The documentation for this class was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YExternalWidgetFactory.h

5.56 YExternalWidgets Class Reference

Abstract base class of a libYUI Widget Extension interface.

```
#include <YExternalWidgets.h>
```

Public Member Functions

- virtual ~YExternalWidgets ()
  Destructor.
- YExternalWidgetFactory * externalWidgetFactory ()
  Return the external widget factory that provides all the createXY() methods for user defined widgets.

Static Public Member Functions

- static YExternalWidgets * externalWidgets (const std::string &name)
  Access the global YUI external widgets.
- static YExternalWidgetFactory * **externalWidgetFactory** (const std::string &name)

Protected Member Functions

- YExternalWidgets (const std::string &name)
  Constructor.
- virtual YExternalWidgetFactory * createExternalWidgetFactory ()=0
  Create the external widgets factory that provides all the createXY() methods for.

Friends

- class **YExternalWidgetsTerminator**

5.56.1 Detailed Description

Abstract base class of a libYUI Widget Extension interface.

Definition at line 29 of file YExternalWidgets.h.

5.56.2 Constructor & Destructor Documentation

5.56.2.1 YExternalWidgets()

```
YExternalWidgets::YExternalWidgets (
            const std::string & name )  [protected]
```

Constructor.

'name' is the plugin name

throws a YUIException if the plugin 'name' has been alread created

Definition at line 35 of file YExternalWidgets.cc.

5.56.3 Member Function Documentation

5.56.3.1 createExternalWidgetFactory()

```
virtual YExternalWidgetFactory* YExternalWidgets::createExternalWidgetFactory ( )  [protected],
[pure virtual]
```

Create the external widgets factory that provides all the createXY() methods for.

Derived classes are required to implement this. Usually createXY() is virtual, real implementation is demanded to derived classes that implement Gtk, ncurses and QT specialization.

5.56.3.2 externalWidgetFactory()

```
YExternalWidgetFactory * YExternalWidgets::externalWidgetFactory ( )
```

Return the external widget factory that provides all the createXY() methods for user defined widgets.

This will create the factory upon the first call and return a pointer to the one and only (singleton) factory upon each subsequent call. This may throw exceptions if the factory cannot be created.

It is up to user extend YExternalWidgetFactory to add createXY() methods in his/her implementation. So once YExternalWidgetFactory is extended with all the createXY() methods, three sub-plugins must be defined one for each supported graphical environment, e.g. Gtk, ncurses and QT, following the libyui implementation rules.

For instance an external widgets plugin called yui-foo that needs Gtk, ncurses and QT specialization will require also yui-foo-gtk, yui-foo-ncurses and yui-foo-qt plugin implementation.

Definition at line 83 of file YExternalWidgets.cc.

5.56.3.3 externalWidgets()

```
YExternalWidgets * YExternalWidgets::externalWidgets (
            const std::string & name )  [static]
```

Access the global YUI external widgets.

'name' is the plugin name

if plugin 'name' has not been explicitally loaded by YUILoader::loadExternalWidgets externalWidgets try loading it (exactly as YUI::ui does) with default function symbol to be executed (see YUILoader::loadExternalWidgets for explanation)

Definition at line 60 of file YExternalWidgets.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YExternalWidgets.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YExternalWidgets.cc

5.57 YExternalWidgetsTerminator Class Reference

Helper class to make sure the EW is properly shut down.

Public Member Functions

- ~YExternalWidgetsTerminator ()

  Destructor.

5.57.1 Detailed Description

Helper class to make sure the EW is properly shut down.

Definition at line 100 of file YExternalWidgets.cc.

5.57.2 Constructor & Destructor Documentation

5.57.2.1 ~YExternalWidgetsTerminator()

```
YExternalWidgetsTerminator::~YExternalWidgetsTerminator ( )
```

Destructor.

If there still is a EW, it will be deleted. If there is none, this will do nothing.

Definition at line 115 of file YExternalWidgets.cc.

The documentation for this class was generated from the following file:

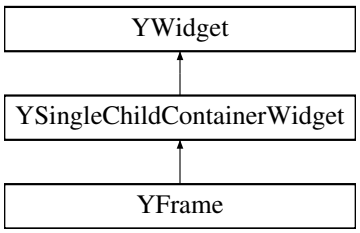
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YExternalWidgets.cc

5.58 YFrame Class Reference

A labeled framed container.

```
#include <YFrame.h>
```

Inheritance diagram for YFrame:



Public Member Functions

- virtual ~YFrame ()
  Destructor.
- virtual const char * widgetClass () const
  Returns a descriptive name of this widget class for logging, debugging etc.
- virtual void setLabel (const std::string &newLabel)
  Change the frame label.
- std::string label () const
  Get the current frame label.
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)
  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)
  Get a property.
- virtual const YPropertySet & propertySet ()
  Return this class's property set.

Protected Member Functions

- YFrame (YWidget *parent, const std::string &label)
  Constructor.

5.58.1 Detailed Description

A labeled framed container.

Definition at line 38 of file YFrame.h.

5.58.2 Member Function Documentation

5.58.2.1 getProperty()

```
YPropertyValue YFrame::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw exceptions, for example

- if there is no property with that name

Reimplemented from YWidget.

Definition at line 109 of file YFrame.cc.

5.58.2.2 propertySet()

```
const YPropertySet & YFrame::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property set upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 75 of file YFrame.cc.

5.58.2.3 setLabel()

```
void YFrame::setLabel (
             const std::string & newLabel )  [virtual]
```

Change the frame label.

Derived classes should overwrite this, but call this base class function in the overwritten function.

Definition at line 62 of file YFrame.cc.

5.58.2.4 setProperty()

```
bool YFrame::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This method may throw exceptions, for example

- if there is no property with that name
- if the expected type and the type mismatch
- if the value is out of range

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 94 of file YFrame.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YFrame.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YFrame.cc

5.59 YFramePrivate Struct Reference

Public Member Functions

- **YFramePrivate** (const string &frameLabel)

Public Attributes

- string **label**

5.59.1 Detailed Description

Definition at line 36 of file YFrame.cc.

The documentation for this struct was generated from the following file:

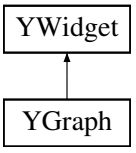
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YFrame.cc

5.60 YGraph Class Reference

A graph with nodes and edges, rendered with Graphviz.

```
#include <YGraph.h>
```

Inheritance diagram for YGraph:



Public Member Functions

- virtual ~YGraph ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.
- std::string filename () const

  Return the filename that describes the graph.
- virtual void setFilename (const std::string &filename)

  Set the filename that describes the graph and render the graph.
- std::string layoutAlgorithm () const

  Return the layout-algorithm used for the graph.
- virtual void setLayoutAlgorithm (const std::string &filename)

  Set the layout-algorithm used for the graph.
- virtual void setGraph (void *graph)

  Render the graph.
- virtual std::string activatedNode () const

  Return name of activated node.

Protected Member Functions

- YGraph (YWidget *parent, const std::string &filename, const std::string &layoutAlgorithm)

  Constructor.
- YGraph (YWidget *parent, void *graph)

  Constructor.
- virtual void renderGraph (const std::string &filename, const std::string &layoutAlgorithm)=0

  Render the graph from the filename.
- virtual void renderGraph (void *graph)=0

  Render the graph.

5.60.1 Detailed Description

A graph with nodes and edges, rendered with Graphviz.

Definition at line 45 of file YGraph.h.

5.60.2 Constructor & Destructor Documentation

5.60.2.1 YGraph() [1/2]

```
YGraph::YGraph (
            YWidget * parent,
            const std::string & filename,
            const std::string & layoutAlgorithm )  [protected]
```

Constructor.

Loads a graph in DOT format from filename and uses the layout algorithm layoutAlgorithm to layout and then render the graph. The layout algorithm can be any string accepted by the function gvLayout from graphviz, e.g. "dot" or "neato".

Definition at line 46 of file YGraph.cc.

5.60.2.2 YGraph() [2/2]

```
YGraph::YGraph (
            YWidget * parent,
            void * graph )  [protected]
```

Constructor.

Renders the graph. The graph must already contain layout information.

Definition at line 55 of file YGraph.cc.

5.60.3 Member Function Documentation

5.60.3.1 activatedNode()

```
string YGraph::activatedNode ( ) const  [virtual]
```

Return name of activated node.

Activation can happen due to e.g. single right mouse click (context menu) or double left mouse click.

Definition at line 108 of file YGraph.cc.

5.60.3.2 getProperty()

```
YPropertyValue YGraph::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 153 of file YGraph.cc.

5.60.3.3 propertySet()

```
const YPropertySet & YGraph::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 115 of file YGraph.cc.

5.60.3.4 renderGraph() [1/2]

```
virtual void YGraph::renderGraph (
            const std::string & filename,
            const std::string & layoutAlgorithm )  [protected], [pure virtual]
```

Render the graph from the filename.

Derived classes are required to implement this.

5.60.3.5 renderGraph() [2/2]

```
virtual void YGraph::renderGraph (
            void * graph )  [protected], [pure virtual]
```

Render the graph.

Derived classes are required to implement this.

5.60.3.6 setFilename()

```
void YGraph::setFilename (
            const std::string & filename )  [virtual]
```

Set the filename that describes the graph and render the graph.

Derived classes can reimplent this, but they should call this base class method in the new implementation. Most derived classes only need to implement renderGraph().

Definition at line 78 of file YGraph.cc.

5.60.3.7 setGraph()

```
void YGraph::setGraph (
            void * graph )  [virtual]
```

Render the graph.

Derived classes can reimplent this, but they should call this base class method in the new implementation. Most derived classes only need to implement renderGraph().

Definition at line 93 of file YGraph.cc.

5.60.3.8 setLayoutAlgorithm()

```
void YGraph::setLayoutAlgorithm (
            const std::string & filename )  [virtual]
```

Set the layout-algorithm used for the graph.

Derived classes can reimplent this, but they should call this base class method in the new implementation.

Definition at line 101 of file YGraph.cc.

5.60.3.9 setProperty()

```
bool YGraph::setProperty (
            const std::string & propertyName,
            const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This function may throw YUIPropertyExceptions.

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 137 of file YGraph.cc.

The documentation for this class was generated from the following files:

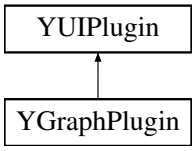
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YGraph.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YGraph.cc

5.61 YGraphPlugin Class Reference

Abstract base class for simplified access to UI plugins for graph widget.

`#include <YGraphPlugin.h>`

Inheritance diagram for YGraphPlugin:



Public Member Functions

- virtual YGraph ∗ createGraph (YWidget ∗parent, const std::string &filename, const std::string &layoutAlgorithm)=0

  Create a graph widget.

Protected Member Functions

- YGraphPlugin (const char ∗pluginLibBaseName)

  Constructor: Load the specified plugin library from the standard UI plugin directory (/usr/lib/yui/).
- virtual ∼YGraphPlugin ()

  Destructor.

5.61.1 Detailed Description

Abstract base class for simplified access to UI plugins for graph widget.

Definition at line 37 of file YGraphPlugin.h.

5.61.2 Constructor & Destructor Documentation

5.61.2.1 ~YGraphPlugin()

```
virtual YGraphPlugin::~YGraphPlugin ( )  [inline], [protected], [virtual]
```

Destructor.

Calls dlclose() which will unload the plugin library if it is no longer used, i.e. if the reference count dlopen() uses reaches 0.

Definition at line 51 of file YGraphPlugin.h.

5.61.3 Member Function Documentation

5.61.3.1 createGraph()

```
virtual YGraph* YGraphPlugin::createGraph (
             YWidget * parent,
             const std::string & filename,
             const std::string & layoutAlgorithm )  [pure virtual]
```

Create a graph widget.

Derived classes need to implement this.

This might return 0 if the plugin lib could not be loaded or if the appropriate symbol could not be located in the plugin lib.

The documentation for this class was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YGraphPlugin.h

5.62 YGraphPrivate Struct Reference

Public Member Functions

- **YGraphPrivate** (string filename, string layoutAlgorithm)

Public Attributes

- string **filename**
- string **layoutAlgorithm**

5.62.1 Detailed Description

Definition at line 34 of file YGraph.cc.

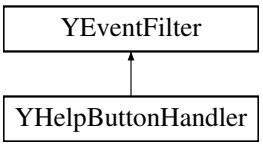
The documentation for this struct was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YGraph.cc

5.63 YHelpButtonHandler Class Reference

Helper class: Event filter that handles "Help" buttons.

Inheritance diagram for YHelpButtonHandler:



Public Member Functions

- **YHelpButtonHandler** (YDialog *dialog)
- YEvent * filter (YEvent *event)

  The heart of the matter: The event filter function.

Additional Inherited Members

5.63.1 Detailed Description

Helper class: Event filter that handles "Help" buttons.

Definition at line 74 of file YDialog.cc.

5.63.2 Member Function Documentation

5.63.2.1 filter()

```
YEvent* YHelpButtonHandler::filter (
            YEvent * event )  [inline], [virtual]
```

The heart of the matter: The event filter function.

Derived classes are required to implement this.

This method can inspect the event it receives. Hint: event->widget() is typically the most interesting information.

This method can react on individual events and

- consume the event (i.e., return 0)
- pass the event through unchanged (simply return the event)
- create a new event (typically based on data in the received event).

If 0 or a new event (another value than 'event') is returned, the old event is deleted. If a value different from 'event' or 0 is returned, that value is assumed to be a pointer to a newly created event. The dialog will assume ownership of that event and delete it when appropriate.

Note: Never delete 'event' in this method! Return 0 or a new event instead; the caller will take care of deleting the old event.

Implements YEventFilter.

Definition at line 83 of file YDialog.cc.

The documentation for this class was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YDialog.cc

5.64 YIconLoader Class Reference

Public Member Functions

- std::string **findIcon** (std::string name)
- void **setIconBasePath** (std::string path)
- std::string **iconBasePath** () const
- void **addIconSearchPath** (std::string path)

5.64.1 Detailed Description

Definition at line 32 of file YIconLoader.h.

The documentation for this class was generated from the following files:

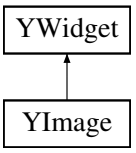
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YIconLoader.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YIconLoader.cc

5.65 YImage Class Reference

A picture, possibly animated, loaded from a file.

`#include <YImage.h>`

Inheritance diagram for YImage:



Public Member Functions

- YImage (YWidget *parent, const std::string &imageFileName, bool animated=false)
  Constructor.
- virtual ~YImage ()
  Destructor.
- virtual const char * widgetClass () const
  Returns a descriptive name of this widget class for logging, debugging etc.
- std::string imageFileName () const
  Return the file name of this widget's image.
- bool animated () const
  Returns 'true' if the current image is an animated image format (e.g., MNG).
- virtual void setImage (const std::string &imageFileName, bool animated=false)
  Set and display a new image (or movie if animated is 'true').
- void setMovie (const std::string &movieFileName)
  Set and display a movie (an animated image).
- bool hasZeroSize (YUIDimension dim) const
  Return 'true' if the image widget should be stretchable with a default width of 0 in the specified dimension.
- void setZeroSize (YUIDimension dim, bool zeroSize=true)
  Make the image widget stretchable with a default size of 0 in the specified dimension.
- bool autoScale () const
  Return 'true' if the image should be scaled to fit into the available space.
- virtual void setAutoScale (bool autoScale=true)
  Make the image fit into the available space.

Additional Inherited Members

5.65.1 Detailed Description

A picture, possibly animated, loaded from a file.

Definition at line 37 of file YImage.h.

5.65.2 Constructor & Destructor Documentation

5.65.2.1 YImage()

```
YImage::YImage (
             YWidget * parent,
             const std::string & imageFileName,
             bool animated = false )
```

Constructor.

'animated' indicates if 'imageFileName' is an animated image format (e.g., MNG).

Definition at line 56 of file YImage.cc.

5.65.3 Member Function Documentation

5.65.3.1 hasZeroSize()

```
bool YImage::hasZeroSize (
             YUIDimension dim ) const
```

Return 'true' if the image widget should be stretchable with a default width of 0 in the specified dimension.

This is useful if the widget width is determined by outside constraints, like the width of a neighbouring widget.

Definition at line 91 of file YImage.cc.

5.65.3.2 setAutoScale()

```
void YImage::setAutoScale (
             bool autoScale = true )  [virtual]
```

Make the image fit into the available space.

Derived classes should overwrite this, but call this base class function in the new function.

Definition at line 110 of file YImage.cc.

5.65.3.3 setImage()

```
void YImage::setImage (
             const std::string & imageFileName,
             bool animated = false )  [virtual]
```

Set and display a new image (or movie if animated is 'true').

Derived classes should overwrite this, but call this base class function in the new function.

Definition at line 84 of file YImage.cc.

5.65.3.4 setZeroSize()

```
void YImage::setZeroSize (
             YUIDimension dim,
             bool zeroSize = true )
```

Make the image widget stretchable with a default size of 0 in the specified dimension.

This is useful if the widget width is determined by outside constraints, like the width of a neighbouring widget.

This function is intentionally not virtual because it is only relevant during the next geometry update, in which case the derived class has to check this value anyway.

Definition at line 97 of file YImage.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YImage.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YImage.cc

5.66 YImagePrivate Struct Reference

Public Member Functions

- YImagePrivate (const string &imageFileName, bool animated)

  Constructor.

Public Attributes

- string **imageFileName**
- bool **animated**
- YBothDim< bool > **zeroSize**
- bool **autoScale**

5.66.1 Detailed Description

Definition at line 32 of file YImage.cc.

The documentation for this struct was generated from the following file:

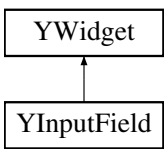
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YImage.cc

5.67 YInputField Class Reference

InputField: General purpose one line input field for entering text and other data.

```
#include <YInputField.h>
```

Inheritance diagram for YInputField:



Public Member Functions

- virtual ~YInputField ()

  Destructor.
- virtual const char * widgetClass () const

  Return a descriptive name of this widget class for logging, debugging etc.
- virtual std::string value ()=0

  Get the current value (the text entered by the user or set from the outside) of this input field.
- virtual void setValue (const std::string &text)=0

  Set the current value (the text entered by the user or set from the outside) of this input field.
- std::string label () const

  Get the label (the caption above the input field).
- virtual void setLabel (const std::string &label)

  Set the label (the caption above the input field).
- bool passwordMode () const

  Returns 'true' if this input field is in password mode, i.e.
- std::string validChars ()

  Get the valid input characters.
- virtual void setValidChars (const std::string &validChars)

  Set the valid input characters.
- int inputMaxLength () const

  The maximum input length, i.e., the maximum number of characters the user can enter.
- virtual void setInputMaxLength (int numberOfChars)

  Set the maximum input length, i.e., the maximum number of characters the user can enter.
- bool shrinkable () const

  Return 'true' if this InputField should be very small.
- virtual void setShrinkable (bool shrinkable=true)

  Make this InputField very small.
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.
- virtual std::string shortcutString () const

  Get the string of this widget that holds the keyboard shortcut.
- virtual void setShortcutString (const std::string &str)

  Set the string of this widget that holds the keyboard shortcut.
- const char * userInputProperty ()

  The name of the widget property that will return user input.
- virtual void saveUserInput (YMacroRecorder *macroRecorder)

  Save the widget's user input to a macro recorder.

Protected Member Functions

- YInputField (YWidget *parent, const std::string &label, bool passwordMode=false)

  Constructor.

5.67.1 Detailed Description

InputField: General purpose one line input field for entering text and other data.

Can be used for entering passwords with a "∗" echoed for every character typed.

Like most widgets, the InputField has a label (a caption) above the input field itself. The label can and should get a keyboard shortcut (specified with '&') that will make the input field receive the keyboard focus with a special key combination ("&Name" -> Alt-N or Ctrl-N will make the keyboard focus jump to the corresponding input field).

Definition at line 46 of file YInputField.h.

5.67.2 Constructor & Destructor Documentation

5.67.2.1 YInputField()

```
YInputField::YInputField (
            YWidget * parent,
            const std::string & label,
            bool passwordMode = false )  [protected]
```

Constructor.

Create an input field with 'label' as the caption. If 'passwordMode' is set, the input will be not be echoed as clear text.

Definition at line 54 of file YInputField.cc.

5.67.3 Member Function Documentation

5.67.3.1 getProperty()

```
YPropertyValue YInputField::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 169 of file YInputField.cc.

5.67.3.2 inputMaxLength()

```
int YInputField::inputMaxLength ( ) const
```

The maximum input length, i.e., the maximum number of characters the user can enter.

-1 means no limit.

Definition at line 114 of file YInputField.cc.

5.67.3.3 passwordMode()

```
bool YInputField::passwordMode ( ) const
```

Returns 'true' if this input field is in password mode, i.e.

if there should be no on-screen echo or only a '∗' for each character typed.

Notice that this can only be set in the constructor.

Definition at line 83 of file YInputField.cc.

5.67.3.4 propertySet()

```
const YPropertySet & YInputField::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 127 of file YInputField.cc.

5.67.3.5 saveUserInput()

```
void YInputField::saveUserInput (
             YMacroRecorder * macroRecorder )  [virtual]
```

Save the widget's user input to a macro recorder.

Reimplemented from YWidget to avoid recording passwords.

Reimplemented from YWidget.

Definition at line 185 of file YInputField.cc.

5.67.3.6 setInputMaxLength()

```
void YInputField::setInputMaxLength (
             int numberOfChars )  [virtual]
```

Set the maximum input length, i.e., the maximum number of characters the user can enter.

-1 means no limit.

Derived classes are free to reimplement this, but they should call this base class method at the end of the overloaded function.

Definition at line 120 of file YInputField.cc.

5.67.3.7 setLabel()

```
void YInputField::setLabel (
             const std::string & label )  [virtual]
```

Set the label (the caption above the input field).

Derived classes are free to reimplement this, but they should call this base class method at the end of the overloaded function.

Definition at line 77 of file YInputField.cc.

5.67.3.8 setProperty()

```
bool YInputField::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This function may throw YUIPropertyExceptions.

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 151 of file YInputField.cc.

5.67.3.9 setShortcutString()

```
virtual void YInputField::setShortcutString (
            const std::string & str )  [inline], [virtual]
```

Set the string of this widget that holds the keyboard shortcut.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 193 of file YInputField.h.

5.67.3.10 setShrinkable()

```
void YInputField::setShrinkable (
            bool shrinkable = true )  [virtual]
```

Make this InputField very small.

This will take effect only upon the next geometry management run.

Derived classes can overwrite this, but should call this base class function in the new function.

Definition at line 95 of file YInputField.cc.

5.67.3.11 setValidChars()

```
void YInputField::setValidChars (
            const std::string & validChars )  [virtual]
```

Set the valid input characters.

No input validation is performed (i.e., the user can enter anything) if this is empty.

Derived classes are free to reimplement this, but they should call this base class method at the end of the overloaded function.

Definition at line 108 of file YInputField.cc.

5.67.3.12 setValue()

```
virtual void YInputField::setValue (
            const std::string & text )  [pure virtual]
```

Set the current value (the text entered by the user or set from the outside) of this input field.

Derived classes are required to implement this.

5.67.3.13 shortcutString()

```
virtual std::string YInputField::shortcutString ( ) const  [inline], [virtual]
```

Get the string of this widget that holds the keyboard shortcut.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 186 of file YInputField.h.

5.67.3.14 userInputProperty()

```
const char* YInputField::userInputProperty ( )  [inline], [virtual]
```

The name of the widget property that will return user input.

Inherited from YWidget.

Reimplemented from YWidget.

Definition at line 200 of file YInputField.h.

5.67.3.15 validChars()

```
string YInputField::validChars ( )
```

Get the valid input characters.

No input validation is performed (i.e., the user can enter anything) if this is empty.

Definition at line 102 of file YInputField.cc.

5.67.3.16 value()

```
virtual std::string YInputField::value ( )  [pure virtual]
```

Get the current value (the text entered by the user or set from the outside) of this input field.

Derived classes are required to implement this.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YInputField.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YInputField.cc

5.68 YInputFieldPrivate Struct Reference

Public Member Functions

- **YInputFieldPrivate** (string label, bool passwordMode)

Public Attributes

- string **label**
- bool **passwordMode**
- bool **shrinkable**
- string **validChars**
- int **inputMaxLength**

5.68.1 Detailed Description

Definition at line 36 of file YInputField.cc.

The documentation for this struct was generated from the following file:

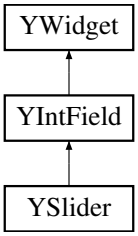
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YInputField.cc

5.69 YIntField Class Reference

IntField: Input field for integer values.

```
#include <YIntField.h>
```

Inheritance diagram for YIntField:



Public Member Functions

- virtual ~YIntField ()

  Destructor.
- virtual const char * widgetClass () const

  Return a descriptive name of this widget class for logging, debugging etc.
- virtual int value ()=0

  Get the current value (the number entered by the user or set from the outside) of this IntField.
- void setValue (int val)

  Set the current value (the number entered by the user or set from the outside) of this IntField.
- int minValue () const

  Return the minimum value.
- void setMinValue (int val)

  Set a new minimum value.
- int maxValue () const

  Return the maximum value.
- void setMaxValue (int val)

  Set a new maximum value.
- std::string label () const

  Get the label (the caption above the input field).
- virtual void setLabel (const std::string &label)

  Set the label (the caption above the input field).
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.
- virtual std::string shortcutString () const

  Get the string of this widget that holds the keyboard shortcut.
- virtual void setShortcutString (const std::string &str)

  Set the string of this widget that holds the keyboard shortcut.
- const char * userInputProperty ()

  The name of the widget property that will return user input.

Protected Member Functions

- YIntField (YWidget *parent, const std::string &label, int minValue, int maxValue)

  Constructor.
- virtual void setValueInternal (int val)=0

  Set the current value (the number entered by the user or set from the outside) of this IntField.
- int enforceRange (int val) const

  Enforce 'val' to be between minValue and maxValue.

5.69.1 Detailed Description

IntField: Input field for integer values.

Enforces input range between a specified minimum and maximum value.

Definition at line 38 of file YIntField.h.

5.69.2 Constructor & Destructor Documentation

5.69.2.1 YIntField()

```
YIntField::YIntField (
            YWidget * parent,
            const std::string & label,
            int minValue,
            int maxValue )  [protected]
```

Constructor.

Create an IntField with 'label' as the caption, and the specified minimum and maximum values.

Note that YWidgetFactory::createIntField() also has an 'initialValue' parameter that is not used here (because the current value is not stored in this base class, but in the derived class).

Definition at line 52 of file YIntField.cc.

5.69.3 Member Function Documentation

5.69.3.1 enforceRange()

```
int YIntField::enforceRange (
            int val ) const  [protected]
```

Enforce 'val' to be between minValue and maxValue.

Return a value that is in range. This does not change the internally stored value of this IntField in any way.

Definition at line 73 of file YIntField.cc.

5.69.3.2 getProperty()

```
YPropertyValue YIntField::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 183 of file YIntField.cc.

5.69.3.3 propertySet()

```
const YPropertySet & YIntField::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 141 of file YIntField.cc.

5.69.3.4 setLabel()

```
void YIntField::setLabel (
            const std::string & label )  [virtual]
```

Set the label (the caption above the input field).

Derived classes are free to reimplement this, but they should call this base class method at the end of the overloaded function.

Definition at line 133 of file YIntField.cc.

5.69.3.5 setMaxValue()

```
void YIntField::setMaxValue (
             int val )
```

Set a new maximum value.

If the current value is greater than that, it will be set to the new maximum.

Definition at line 113 of file YIntField.cc.

5.69.3.6 setMinValue()

```
void YIntField::setMinValue (
             int val )
```

Set a new minimum value.

If the current value is less than that, it will be set to the new minimum.

Definition at line 93 of file YIntField.cc.

5.69.3.7 setProperty()

```
bool YIntField::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This function may throw YUIPropertyExceptions.

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 165 of file YIntField.cc.

5.69.3.8 setShortcutString()

```
virtual void YIntField::setShortcutString (
            const std::string & str )  [inline], [virtual]
```

Set the string of this widget that holds the keyboard shortcut.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 179 of file YIntField.h.

5.69.3.9 setValue()

```
void YIntField::setValue (
            int val )  [inline]
```

Set the current value (the number entered by the user or set from the outside) of this IntField.

This method enforces 'val to be between minValue and maxValue.

Definition at line 81 of file YIntField.h.

5.69.3.10 setValueInternal()

```
virtual void YIntField::setValueInternal (
            int val )  [protected], [pure virtual]
```

Set the current value (the number entered by the user or set from the outside) of this IntField.

'val' is guaranteed to be between minValue and maxValue; no further checks are required.

Derived classes are required to implement this method.

5.69.3.11 shortcutString()

```
virtual std::string YIntField::shortcutString ( ) const  [inline], [virtual]
```

Get the string of this widget that holds the keyboard shortcut.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 172 of file YIntField.h.

5.69.3.12 userInputProperty()

```
const char* YIntField::userInputProperty ( )  [inline], [virtual]
```

The name of the widget property that will return user input.

Inherited from YWidget.

Reimplemented from YWidget.

Definition at line 186 of file YIntField.h.

5.69.3.13 value()

```
virtual int YIntField::value ( )  [pure virtual]
```

Get the current value (the number entered by the user or set from the outside) of this IntField.

Derived classes are required to implement this.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YIntField.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YIntField.cc

5.70 YIntFieldPrivate Struct Reference

Public Member Functions

- **YIntFieldPrivate** (const string &label, int minValue, int maxValue)

Public Attributes

- string **label**
- int **minValue**
- int **maxValue**

5.70.1 Detailed Description

Definition at line 34 of file YIntField.cc.

The documentation for this struct was generated from the following file:

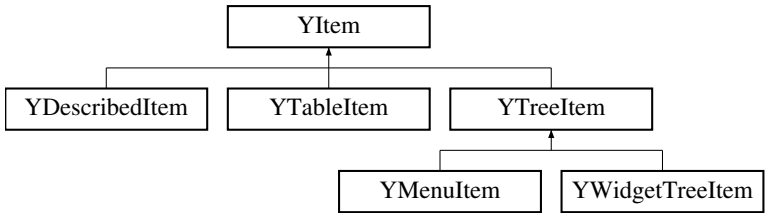
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YIntField.cc

5.71 YItem Class Reference

Simple item class for SelectionBox, ComboBox, MultiSelectionBox etc.

`#include <YItem.h>`

Inheritance diagram for YItem:



Public Member Functions

- YItem (const std::string &label, bool selected=false)
  Constructor with just the label and optionally the selected state.
- YItem (const std::string &label, const std::string &iconName, bool selected=false)
  Constructor with label and icon name and optionally the selected state.
- virtual ~YItem ()
  Destructor.
- std::string label () const
  Return this item's label.
- void setLabel (const std::string &newLabel)
  Set this item's label.
- std::string iconName () const
  Return this item's icon name.
- bool hasIconName () const
  Return 'true' if this item has an icon name.
- void setIconName (const std::string &newIconName)
  Set this item's icon name.
- bool selected () const
  Return 'true' if this item is currently selected.
- void setSelected (bool sel=true)
  Select or unselect this item.
- int status () const
  Return the status of this item.
- void setStatus (int newStatus)
  Set the status of this item.
- void setIndex (int index)
  Set this item's index.
- int index () const
  Return the index of this item (as set with setIndex()).
- void setData (void *newData)

Set the opaque data pointer for application use.

- void * data () const

  Return the opaque data pointer.

- virtual bool hasChildren () const

  Return 'true' if this item has any child items.

- virtual YItemIterator childrenBegin ()

  Return an iterator that points to the first child item of this item.

- virtual YItemConstIterator **childrenBegin** () const
- virtual YItemIterator childrenEnd ()

  Return an iterator that points after the last child item of this item.

- virtual YItemConstIterator **childrenEnd** () const
- virtual YItem * parent () const

  Returns this item's parent item or 0 if it is a toplevel item.

5.71.1 Detailed Description

Simple item class for SelectionBox, ComboBox, MultiSelectionBox etc.

items. This class provides stubs for children management.

Definition at line 49 of file YItem.h.

5.71.2 Member Function Documentation

5.71.2.1 childrenBegin()

```
virtual YItemIterator YItem::childrenBegin ( )  [inline], [virtual]
```

Return an iterator that points to the first child item of this item.

This default implementation returns the 'end' iterator of the class-static always empty _noChildren YItemCollection. It is safe to use this iterator in classic iterator loops:

for (YItemIterator it = myItem->childrenBegin(); it != myItem->childrenEnd(); ++it) { ... }

The loop body will only ever be executed if this item is a derived class that actually manages child items.

Reimplemented in YTreeItem.

Definition at line 186 of file YItem.h.

5.71.2.2 childrenEnd()

```
virtual YItemIterator YItem::childrenEnd ( )  [inline], [virtual]
```

Return an iterator that points after the last child item of this item.

This default implementation returns the 'end' iterator of the class-static always empty _noChildren YItemCollection.

Reimplemented in YTreeItem.

Definition at line 195 of file YItem.h.

5.71.2.3 label()

```
std::string YItem::label ( ) const  [inline]
```

Return this item's label.

This is what the user sees in a dialog, so this will usually be a translated text.

Definition at line 82 of file YItem.h.

5.71.2.4 parent()

```
virtual YItem* YItem::parent ( ) const  [inline], [virtual]
```

Returns this item's parent item or 0 if it is a toplevel item.

This default implementation always returns 0. Derived classes that handle children should reimplement this.

Reimplemented in YTreeItem, and YMenuItem.

Definition at line 203 of file YItem.h.

5.71.2.5 setData()

```
void YItem::setData (
            void * newData )  [inline]
```

Set the opaque data pointer for application use.

Applications can use this to store the pointer to a counterpart of this tree item. It is the application's responsibility to watch for dangling pointers and possibliy deleting the data. All this class ever does with this pointer is to store it.

Definition at line 148 of file YItem.h.

5.71.2.6 setSelected()

```
void YItem::setSelected (
            bool sel = true )  [inline]
```

Select or unselect this item.

This does not have any effect on any other item; if it is desired that only one item is selected at any time, the caller has to take care of that.

Definition at line 114 of file YItem.h.

5.71.2.7 setStatus()

```
void YItem::setStatus (
            int newStatus )  [inline]
```

Set the status of this item.

Most widgets only use 0 for "not selected" or nonzero for "selected". Some widgets may make use of other values as well.

Definition at line 128 of file YItem.h.

5.71.2.8 status()

```
int YItem::status ( ) const  [inline]
```

Return the status of this item.

This is a bit more generalized than 'selected'. Values other than 0 or 1 can mean different things to the application or to the specific widget.

Definition at line 121 of file YItem.h.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YItem.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YItem.cc

5.72 YItemCustomStatus Class Reference

Class describing a non-binary status for an item.

```
#include <YItemCustomStatus.h>
```

Public Member Functions

- YItemCustomStatus (const std::string &iconName, const std::string &textIndicator, int nextStatus=-1)

  Constructor.
- const std::string & iconName () const

  The name of an icon to use in the widget in a graphical UI if an item has this status.
- const std::string & textIndicator () const

  A text representation of this status in a text-based UI if an item has this status, for example "[ ]", "[x]" or "[ ], "[+]", "[a+]".
- int nextStatus () const

  This returns the next status to cycle through if the user clicks on the status or cycles through status values with the corresponding shortcut key.
- void setNextStatus (int value)

  Set the next status.
- bool hasNextStatus () const

  Return 'true' if a next status to cylce to is defined for this status, 'false' if not.

Protected Attributes

- std::string **_iconName**
- std::string **_textIndicator**
- int **_nextStatus**

5.72.1 Detailed Description

Class describing a non-binary status for an item.

This is an extension of normal boolean item states: Rather than just "on" or "off" like for check boxes or radio buttons, a status of this kind can have any nonnegative integer number. The number is implicitly the index of this status in the corresponding vector.

For symmetry with boolean states, a value of 0 is defined to have the same semantics as "off" / "unselected", 1 has the semantics of "on" / "fully selected", and all other values are purely application-defined.

Definition at line 44 of file YItemCustomStatus.h.

5.72.2 Member Function Documentation

5.72.2.1 nextStatus()

```
int YItemCustomStatus::nextStatus ( ) const  [inline]
```

This returns the next status to cycle through if the user clicks on the status or cycles through status values with the corresponding shortcut key.

If no such value was specified, this returns -1. The application can then still choose to set a different status depending on other application data.

Definition at line 82 of file YItemCustomStatus.h.

5.72.2.2 setNextStatus()

```
void YItemCustomStatus::setNextStatus (
             int value )  [inline]
```

Set the next status.

This should only be done once when the status transition map is evaluated.

Definition at line 88 of file YItemCustomStatus.h.

5.72.2.3 textIndicator()

```
const std::string& YItemCustomStatus::textIndicator ( ) const  [inline]
```

A text representation of this status in a text-based UI if an item has this status, for example "[ ]", "[x]" or "[ ], "[+]", "[a+]".

It is recommended to use the same character length for all states so all items line up properly, even if they have different states.

Definition at line 71 of file YItemCustomStatus.h.

The documentation for this class was generated from the following file:

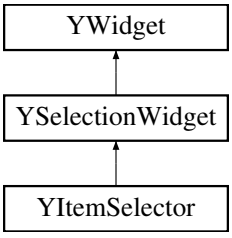
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YItemCustomStatus.h

5.73 YItemSelector Class Reference

Scrollable item selector widget with not only a label for each item, but also a (possible multi-line) description and an optional icon.

```
#include <YItemSelector.h>
```

Inheritance diagram for YItemSelector:



Public Member Functions

- YItemSelector (YWidget *parent, bool enforceSingleSelection=true)

  Standard constructor.
- YItemSelector (YWidget *parent, const YItemCustomStatusVector &customStates)

  Constructor for custom item status values.
- virtual ~YItemSelector ()

  Destructor.
- virtual const char * widgetClass () const

  Return a descriptive name of this widget class for logging, debugging etc.
- int visibleItems () const

  Return the number of visible items (i.e.
- virtual void setVisibleItems (int newVal)

  Set the number of visible items.
- virtual void setItemStatus (YItem *item, int status)

  Set the status of an item.
- bool usingCustomStatus () const

  Return 'true' if this widget uses custom status values, 'false' if not (i.e.
- int customStatusCount () const

  Return the number of custom status values or 0 if no custom status values are used.
- const YItemCustomStatus & customStatus (int index)

  Return the custom status with the specified index (counting from 0).
- bool validCustomStatusIndex (int index) const

  Return 'true' if a custom status index is within the valid range, i.e.
- int cycleCustomStatus (int oldStatus)

  Cycle through the custom status values according to the custom status table, i.e.
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.
- const char * userInputProperty ()

  The name of the widget property that will return user input.
- virtual void activateItem (YItem *item)=0

  Activate selected item.

Protected Member Functions

- virtual void updateCustomStatusIndicator (YItem *item)

  Update the status indicator (status icon or text indicator) if this widget is using custom status values.

5.73.1 Detailed Description

Scrollable item selector widget with not only a label for each item, but also a (possible multi-line) description and an optional icon.

This widget supports both 1-of-n or n-of-m selection, i.e. it can act as a (more verbose and more screen space consuming) replacement for YSelectionBox or YMultiSelectionBox.

Definition at line 43 of file YItemSelector.h.

5.73.2 Constructor & Destructor Documentation

5.73.2.1 YItemSelector()

```
YItemSelector::YItemSelector (
             YWidget * parent,
             const YItemCustomStatusVector & customStates )
```

Constructor for custom item status values.

This makes it possible to set a wider variety of values than just 0 or

1. The semantics behind the individual status values is purely application defined; the specified customStates description only provides an icon (for graphical UIs) or a text representation (for text-based UIs) and an optional "next" status value that can be used to let the user cycle through different status values. The numeric value of each status is implicitly its index in the vector.

Notice that this constructor is the only way to set custom status value descriptions; they cannot be changed anymore after initializing the widget. This is by design so that any derived widgets in concrete UIs do not have to bother with possibly recreating any subwidgets if this should change; this guarantees that it does not change, neither the fact that there are custom status values nor their number or indicator icons or texts.

This constructor implicitly sets 'enforceSingleSelection' to 'false'.

In this mode, the widget sends YMenuEvents (which include the item that the user changed) if the notify option is set. For anything beyond the simple status transitions that are defined here in 'customStates', it is highly recommended to set that notify option and to handle those YMenuEvents on the application level.

Definition at line 59 of file YItemSelector.cc.

5.73.3 Member Function Documentation

5.73.3.1 activateItem()

```
virtual void YItemSelector::activateItem (
            YItem * item )  [pure virtual]
```

Activate selected item.

Can be used in tests to simulate user input.

Derived classes are required to implement this.

5.73.3.2 customStatus()

```
const YItemCustomStatus & YItemSelector::customStatus (
            int index )
```

Return the custom status with the specified index (counting from 0).

Notice that this may throw a std::out_of_range exception if the index is invalid.

Definition at line 149 of file YItemSelector.cc.

5.73.3.3 cycleCustomStatus()

```
int YItemSelector::cycleCustomStatus (
            int oldStatus )
```

Cycle through the custom status values according to the custom status table, i.e.

return the 'nextStatus' field of table index 'oldStatus'. This may be -1 if no next status was specified there or if 'oldStatus' is out of range of that table.

Definition at line 196 of file YItemSelector.cc.

5.73.3.4 getProperty()

```
YPropertyValue YItemSelector::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 260 of file YItemSelector.cc.

5.73.3.5 propertySet()

```
const YPropertySet & YItemSelector::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 209 of file YItemSelector.cc.

5.73.3.6 setItemStatus()

```
void YItemSelector::setItemStatus (
             YItem * item,
             int status )  [virtual]
```

Set the status of an item.

Unlike YItem::setStatus(), this informs the widget of the change so it can set the corresponding status icon.

Reimplemented from YSelectionWidget.

Reimplemented from YSelectionWidget.

Definition at line 115 of file YItemSelector.cc.

5.73.3.7 setProperty()

```
bool YItemSelector::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This function may throw YUIPropertyExceptions.

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 239 of file YItemSelector.cc.

5.73.3.8 setVisibleItems()

```
void YItemSelector::setVisibleItems (
             int newVal )  [virtual]
```

Set the number of visible items.

When changing this, make sure to recalculate the layout (YDialog::recalc()) so the change has any effect.

Derived classes are free to reimplement this, but they should call this base class method in the overloaded function.

Definition at line 106 of file YItemSelector.cc.

5.73.3.9 updateCustomStatusIndicator()

```
virtual void YItemSelector::updateCustomStatusIndicator (
             YItem * item )  [inline], [protected], [virtual]
```

Update the status indicator (status icon or text indicator) if this widget is using custom status values.

Derived classes should overwrite this.

Definition at line 204 of file YItemSelector.h.

5.73.3.10 userInputProperty()

```
const char* YItemSelector::userInputProperty ( )  [inline], [virtual]
```

The name of the widget property that will return user input.

Inherited from YWidget.

Reimplemented from YWidget.

Definition at line 187 of file YItemSelector.h.

5.73.3.11 usingCustomStatus()

```
bool YItemSelector::usingCustomStatus ( ) const
```

Return 'true' if this widget uses custom status values, 'false' if not (i.e.

only 0 or 1).

Definition at line 136 of file YItemSelector.cc.

5.73.3.12 validCustomStatusIndex()

```
bool YItemSelector::validCustomStatusIndex (
            int index ) const
```

Return 'true' if a custom status index is within the valid range, i.e.

0..customStatusCount()-1, 'false' otherwise.

Definition at line 161 of file YItemSelector.cc.

5.73.3.13 visibleItems()

```
int YItemSelector::visibleItems ( ) const
```

Return the number of visible items (i.e.

items that are visible without scrolling). This is used to calculate the preferred height. If the widget gets more or less screen space than desired due to layout constraints, this number is not updated; this is purely the desired value for initializing layout negotiations.

Definition at line 100 of file YItemSelector.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YItemSelector.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YItemSelector.cc

5.74 YItemSelectorPrivate Struct Reference

Public Attributes

- int **visibleItems**
- YItemCustomStatusVector **customStates**

5.74.1 Detailed Description

Definition at line 35 of file YItemSelector.cc.

The documentation for this struct was generated from the following file:

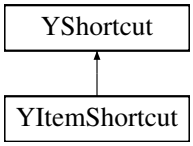
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YItemSelector.cc

5.75 YItemShortcut Class Reference

Special case for widgets that can have multiple shortcuts based on items (like YDumbTab)

`#include <YShortcut.h>`

Inheritance diagram for YItemShortcut:



Public Member Functions

- YItemShortcut (YWidget *widget, YItem *item)
  Constructor.
- virtual ~YItemShortcut ()
  Destructor.
- YItem * item () const
  Return the associated item.
- virtual void setShortcut (char newShortcut)
  Set (override) the shortcut character.

Protected Member Functions

- virtual std::string getShortcutString ()
  Obtain the the shortcut property of this shortcut's widget - the string that contains "&" to designate a shortcut.

Additional Inherited Members

5.75.1 Detailed Description

Special case for widgets that can have multiple shortcuts based on items (like YDumbTab)

Definition at line 225 of file YShortcut.h.

5.75.2 Member Function Documentation

5.75.2.1 setShortcut()

```
void YItemShortcut::setShortcut (
             char newShortcut )  [virtual]
```

Set (override) the shortcut character.

In this subclass, it will change the internally stored item.

Reimplemented from YShortcut.

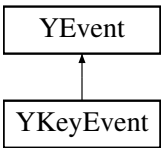
Definition at line 322 of file YShortcut.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YShortcut.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YShortcut.cc

5.76 YKeyEvent Class Reference

Inheritance diagram for YKeyEvent:



Public Member Functions

- YKeyEvent (const std::string &keySymbol, YWidget *focusWidget=0)

  Constructor.
- std::string keySymbol () const

  Returns the key symbol - a text describing the key, such as "CursorLeft", "F1", "a", "A", etc.
- YWidget * focusWidget () const

  Returns the widget that currently has the keyboard focus.

Protected Member Functions

- virtual ~YKeyEvent ()

  Protected destructor - events can only be deleted via YDialog::deleteEvent().

Protected Attributes

- std::string **_keySymbol**
- YWidget * **_focusWidget**

Additional Inherited Members

5.76.1 Detailed Description

Definition at line 206 of file YEvent.h.

5.76.2 Constructor & Destructor Documentation

5.76.2.1 YKeyEvent()

```
YKeyEvent::YKeyEvent (
            const std::string & keySymbol,
            YWidget * focusWidget = 0 )
```

Constructor.

Create a key event with a specified key symbol (a text describing the key, such as "CursorLeft", "F1", etc.) and optionally the widget that currently has the keyboard focus.

Definition at line 125 of file YEvent.cc.

5.76.2.2 ~YKeyEvent()

```
virtual YKeyEvent::~YKeyEvent ( )  [inline], [protected], [virtual]
```

Protected destructor - events can only be deleted via YDialog::deleteEvent().

The associated dialog will take care of this event and delete it when appropriate.

Definition at line 241 of file YEvent.h.

5.76.3 Member Function Documentation

5.76.3.1 focusWidget()

```
YWidget* YKeyEvent::focusWidget ( ) const  [inline]
```

Returns the widget that currently has the keyboard focus.

This might be 0 if no widget has the focus or if the creator of this event could not obtain that information.

Definition at line 232 of file YEvent.h.

The documentation for this class was generated from the following files:

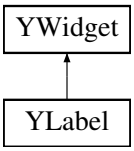
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YEvent.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YEvent.cc

5.77 YLabel Class Reference

Implementation of the Label, Heading and OutputField widgets.

```
#include <YLabel.h>
```

Inheritance diagram for YLabel:



Public Member Functions

- YLabel (YWidget *parent, const std::string &text, bool isHeading=false, bool isOutputField=false)
  Constructor.
- virtual ~YLabel ()
  Destructor.
- virtual const char * widgetClass () const
  Returns a descriptive name of this widget class for logging, debugging etc.
- std::string text () const
  Return the text the widget displays.
- std::string value () const
  Aliases for text().
- std::string **label** () const
- virtual void setText (const std::string &newText)
  Set the text the widget displays.
- void setValue (const std::string &newValue)
  Aliases for setText().

- void **setLabel** (const std::string &newLabel)
- bool isHeading () const

  Return 'true' if this is a Heading widget, i.e., it should display its text in a bold and/or larger font.
- bool isOutputField () const

  Return 'true' if this is an OutputField widget, i.e., it should display its text similar to an InputField the user can't change.
- bool useBoldFont () const

  Return 'true' if a bold font should be used.
- virtual void setUseBoldFont (bool bold=true)

  Switch bold font on or off.
- bool autoWrap () const

  Return 'true' if automatic word wrapping is enabled.
- virtual void setAutoWrap (bool autoWrap=true)

  Enable or disable automatic word wrapping.
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.
- virtual std::string debugLabel () const

  Returns a descriptive label of this widget instance for debugging.

Protected Member Functions

- int layoutPass ()

  Convenience method for the parent dialog's layoutPass(): Return the number of the current layout pass.

5.77.1 Detailed Description

Implementation of the Label, Heading and OutputField widgets.

Definition at line 38 of file YLabel.h.

5.77.2 Constructor & Destructor Documentation

5.77.2.1 YLabel()

```
YLabel::YLabel (
             YWidget * parent,
             const std::string & text,
             bool isHeading = false,
             bool isOutputField = false )
```

Constructor.

'isHeading' indicates if this should be displayed as a Heading widget, i.e. with a bold and/or larger font. This cannot be changed after creating the widget.

'isOutputField' indicates if this should be displayed as an OutputField widget, i.e. similar to an InputField the user can't change. This cannot be changed after creating the widget.

Definition at line 61 of file YLabel.cc.

5.77.3 Member Function Documentation

5.77.3.1 debugLabel()

```
string YLabel::debugLabel ( ) const  [virtual]
```

Returns a descriptive label of this widget instance for debugging.

Reimplemented from YWidget since a YLabel doesn't have a shortcut property.

Reimplemented from YWidget.

Definition at line 200 of file YLabel.cc.

5.77.3.2 getProperty()

```
YPropertyValue YLabel::getProperty (
             const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw exceptions, for example

- if there is no property with that name

Reimplemented from YWidget.

Definition at line 186 of file YLabel.cc.

5.77.3.3 isHeading()

```
bool YLabel::isHeading ( ) const
```

Return 'true' if this is a Heading widget, i.e., it should display its text in a bold and/or larger font.

This cannot be changed after creating the widget.

Definition at line 90 of file YLabel.cc.

5.77.3.4 isOutputField()

```
bool YLabel::isOutputField ( ) const
```

Return 'true' if this is an OutputField widget, i.e., it should display its text similar to an InputField the user can't change.

This cannot be changed after creating the widget.

Definition at line 96 of file YLabel.cc.

5.77.3.5 layoutPass()

```
int YLabel::layoutPass ( )  [protected]
```

Convenience method for the parent dialog's layoutPass(): Return the number of the current layout pass.

0: No layout going on right now 1: First pass 2: Second pass of a multi-pass layout

Definition at line 137 of file YLabel.cc.

5.77.3.6 propertySet()

```
const YPropertySet & YLabel::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property set upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 146 of file YLabel.cc.

5.77.3.7 setAutoWrap()

```
void YLabel::setAutoWrap (
             bool autoWrap = true )  [virtual]
```

Enable or disable automatic word wrapping.

This has implications for geometry management: An auto-wrapping label does not have any reasonable preferred size; it needs to be put into a parent widget (like a MinSize) that enforces a reasonable width. The height can be then be calculated from that width.

Changing this setting takes only effect after the next layout geometry calculation.

Derived classes should overwrite this, but call this base class function in the overwritten function.

Definition at line 120 of file YLabel.cc.

5.77.3.8 setProperty()

```
bool YLabel::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This method may throw exceptions, for example

- if there is no property with that name
- if the expected type and the type mismatch
- if the value is out of range

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 169 of file YLabel.cc.

5.77.3.9 setText()

```
void YLabel::setText (
             const std::string & newText )  [virtual]
```

Set the text the widget displays.

Derived classes should overwrite this, but call this base class function in the overwritten function.

Definition at line 84 of file YLabel.cc.

5.77.3.10 setUseBoldFont()

```
void YLabel::setUseBoldFont (
             bool bold = true )  [virtual]
```

Switch bold font on or off.

Derived classes should overwrite this, but call this base class function in the overwritten function.

Definition at line 108 of file YLabel.cc.

5.77.3.11 widgetClass()

```
const char * YLabel::widgetClass ( ) const  [virtual]
```

Returns a descriptive name of this widget class for logging, debugging etc.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 222 of file YLabel.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YLabel.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YLabel.cc

5.78 YLabelPrivate Struct Reference

Public Member Functions

- YLabelPrivate (const string &text, bool isHeading, bool isOutputField)

  Constructor.

Public Attributes

- string **text**
- bool **isHeading**
- bool **isOutputField**
- bool **useBoldFont**
- bool **autoWrap**

5.78.1 Detailed Description

Definition at line 38 of file YLabel.cc.

The documentation for this struct was generated from the following file:

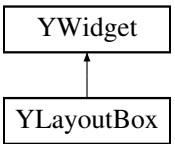
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YLabel.cc

5.79 YLayoutBox Class Reference

A vertical or horizontal stacking of widgets, implementing HBox and VBox.

`#include <YLayoutBox.h>`

Inheritance diagram for YLayoutBox:



Public Types

- typedef std::vector< int > **sizeVector**
- typedef std::vector< int > **posVector**

Public Member Functions

- virtual ~YLayoutBox ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- YUIDimension primary () const

  Return the primary dimension, i.e., the dimension this LayoutBox lays out its children in: YD_VERT for a VBox, YD_HORIZ for a HBox.
- YUIDimension secondary () const

  Return the secondary dimension.
- bool debugLayout () const

  Returns 'true' if layout debugging (verbose logging during layout) is on.
- void setDebugLayout (bool deb=true)

  Enable or disable layout debugging.
- virtual int preferredSize (YUIDimension dim)

  Preferred size of the widget in the specified dimension.
- virtual int preferredWidth ()

  Preferred width of the widget.
- virtual int preferredHeight ()

  Preferred height of the widget.
- virtual void setSize (int newWidth, int newHeight)

  Sets the size of the layout box.
- virtual bool stretchable (YUIDimension dimension) const

  Returns the stretchability of the layout box: The layout box is stretchable if one of the children is stretchable in this dimension or if one of the child widgets has a layout weight in this dimension.
- virtual void moveChild (YWidget *child, int newX, int newY)=0

  Move a child to a new position.

Static Public Member Functions

- static bool isLayoutStretch (YWidget *child, YUIDimension dimension)

  Check if this is a layout stretch widget in the specfied dimension, i.e.

Protected Member Functions

- YLayoutBox (YWidget *parent, YUIDimension dim)

  Constructor.
- int childrenTotalWeight (YUIDimension dimension)

  Add up all the children's weights.
- int childrenMaxPreferredSize (YUIDimension dimension)

  Return the maximum preferred size of all children in the specified dimension.
- int totalNonWeightedChildrenPreferredSize (YUIDimension dimension)

  Add up all the non-weighted children's preferred sizes in the specified dimension.
- int countNonWeightedChildren (YUIDimension dimension)

  Count the number of non-weighted children.

- int countStretchableChildren (YUIDimension dimension)

  Count the number of stretchable (non-weighted) children.
- int countLayoutStretchChildren (YUIDimension dimension)

  Count the number of "rubber bands", i.e.
- YWidget * findDominatingChild ()

  Determine the number of the "dominating child" - the child widget that determines the overall size with respect to its weight.
- void calcPrimaryGeometry (int newSize, sizeVector &childSize, posVector &childPos)

  Calculate the sizes and positions of all children in the primary dimension and store them in "childSize" and "childPos".
- void calcSecondaryGeometry (int newSize, sizeVector &childSize, posVector &childPos)

  Calculate the sizes and positions of all children in the secondary dimension and store them in "childSize" and "childPos".
- void doResize (sizeVector &width, sizeVector &height, posVector &x_pos, posVector &y_pos)

  Actually perform resizing and moving the child widgets to the appropriate position.

5.79.1 Detailed Description

A vertical or horizontal stacking of widgets, implementing HBox and VBox.

Definition at line 37 of file YLayoutBox.h.

5.79.2 Constructor & Destructor Documentation

5.79.2.1 YLayoutBox()

```
YLayoutBox::YLayoutBox (
            YWidget * parent,
            YUIDimension dim )  [protected]
```

Constructor.

Creates a VBox for dim == YD_VERT or a HBox for YD_HORIZ.

Definition at line 62 of file YLayoutBox.cc.

5.79.3 Member Function Documentation

5.79.3.1 countLayoutStretchChildren()

```
int YLayoutBox::countLayoutStretchChildren (
            YUIDimension dimension )  [protected]
```

Count the number of "rubber bands", i.e.

the number of stretchable layout spacings (e.g. {H|V}Weight, {H|V}Spacing). Only those without a weight are counted.

Definition at line 311 of file YLayoutBox.cc.

5.79.3.2 countStretchableChildren()

```
int YLayoutBox::countStretchableChildren (
            YUIDimension dimension )  [protected]
```

Count the number of stretchable (non-weighted) children.

Note: Weighted children are *always* considered stretchable.

Definition at line 293 of file YLayoutBox.cc.

5.79.3.3 doResize()

```
void YLayoutBox::doResize (
            sizeVector & width,
            sizeVector & height,
            posVector & x_pos,
            posVector & y_pos )  [protected]
```

Actually perform resizing and moving the child widgets to the appropriate position.

The vectors passed are the sizes previously calculated by calcPrimaryGeometry() and calcSecondaryGeometry().

Definition at line 742 of file YLayoutBox.cc.

5.79.3.4 findDominatingChild()

```
YWidget * YLayoutBox::findDominatingChild ( )  [protected]
```

Determine the number of the "dominating child" - the child widget that determines the overall size with respect to its weight.

Return 0 if there is no dominating child, i.e. none of the children has a weight specified.

Definition at line 181 of file YLayoutBox.cc.

5.79.3.5 isLayoutStretch()

```
bool YLayoutBox::isLayoutStretch (
             YWidget * child,
             YUIDimension dimension )  [static]
```

Check if this is a layout stretch widget in the specfied dimension, i.e.

an empty widget that is stretchable.

Definition at line 329 of file YLayoutBox.cc.

5.79.3.6 moveChild()

```
virtual void YLayoutBox::moveChild (
             YWidget * child,
             int newX,
             int newY )  [pure virtual]
```

Move a child to a new position.

Derived classes are required to implement this.

5.79.3.7 preferredHeight()

```
int YLayoutBox::preferredHeight ( )  [virtual]
```

Preferred height of the widget.

Reimplemented from YWidget.

Implements YWidget.

Definition at line 161 of file YLayoutBox.cc.

5.79.3.8 preferredSize()

```
int YLayoutBox::preferredSize (
             YUIDimension dim )  [virtual]
```

Preferred size of the widget in the specified dimension.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 107 of file YLayoutBox.cc.

5.79.3.9 preferredWidth()

```
int YLayoutBox::preferredWidth ( )  [virtual]
```

Preferred width of the widget.

Reimplemented from YWidget.

Implements YWidget.

Definition at line 155 of file YLayoutBox.cc.

5.79.3.10 setSize()

```
void YLayoutBox::setSize (
             int newWidth,
             int newHeight )  [virtual]
```

Sets the size of the layout box.

This is where the layout policy is implemented.

Derived classes can reimplement this, but this base class method should be called in the reimplemented function.

Reimplemented from YWidget.

Implements YWidget.

Definition at line 361 of file YLayoutBox.cc.

5.79.3.11 stretchable()

```
bool YLayoutBox::stretchable (
             YUIDimension dimension ) const  [virtual]
```

Returns the stretchability of the layout box: The layout box is stretchable if one of the children is stretchable in this dimension or if one of the child widgets has a layout weight in this dimension.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 345 of file YLayoutBox.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YLayoutBox.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YLayoutBox.cc

5.80 YLayoutBoxPrivate Struct Reference

Public Member Functions

- YLayoutBoxPrivate (YUIDimension prim)

  Constructor.

Public Attributes

- YUIDimension **primary**
- YUIDimension **secondary**
- bool **debugLayout**

5.80.1 Detailed Description

Definition at line 39 of file YLayoutBox.cc.

The documentation for this struct was generated from the following file:

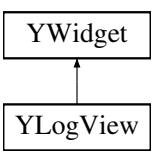
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YLayoutBox.cc

5.81 YLogView Class Reference

LogView: A scrollable (output-only) text to display a growing log, very much like the "tail -f" shell command.

```
#include <YLogView.h>
```

Inheritance diagram for YLogView:



Public Member Functions

- virtual ~YLogView ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- std::string label () const

  Return the label (the caption above the log text).
- virtual void setLabel (const std::string &label)

  Set the label (the caption above the log text).
- int visibleLines () const

  Return the number of visible lines.
- void setVisibleLines (int newVisibleLines)

  Set the number of visible lines.
- int maxLines () const

  Return the maximum number of lines to store.
- void setMaxLines (int newMaxLines)

  Set the maximum number of lines to store.
- std::string logText () const

  Return the entire log text as one large string of concatenated lines delimited with newlines.
- void setLogText (const std::string &text)

  Set (replace) the entire log text and trigger a display update.
- std::string lastLine () const

  Return the last log line.
- void appendLines (const std::string &text)

  Append one or more lines to the log text and trigger a display update.
- void clearText ()

  Clear the log text and trigger a display update.
- int lines () const

  Return the current number of lines.
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.
- virtual std::string shortcutString () const

  Get the string of this widget that holds the keyboard shortcut.
- virtual void setShortcutString (const std::string &str)

  Set the string of this widget that holds the keyboard shortcut.

Protected Member Functions

- YLogView (YWidget *parent, const std::string &label, int visibleLines, int maxLines)

  Constructor.
- virtual void displayLogText (const std::string &text)=0

  Display the part of the log text that should be displayed.

5.81.1 Detailed Description

LogView: A scrollable (output-only) text to display a growing log, very much like the "tail -f" shell command.

Definition at line 37 of file YLogView.h.

5.81.2 Constructor & Destructor Documentation

5.81.2.1 YLogView()

```
YLogView::YLogView (
            YWidget * parent,
            const std::string & label,
            int visibleLines,
            int maxLines )  [protected]
```

Constructor.

'label' is the caption above the log. 'visibleLines' indicates how many lines should be visible by default (unless changed by other layout constraints), 'maxLines' specifies how many lines (always the last ones) to keep in the log. 0 for 'max↩ Lines' means "keep all lines".

Definition at line 59 of file YLogView.cc.

5.81.3 Member Function Documentation

5.81.3.1 displayLogText()

```
virtual void YLogView::displayLogText (
            const std::string & text )  [protected], [pure virtual]
```

Display the part of the log text that should be displayed.

'text' contains the last 'visibleLines()' lines. This is called whenever the log text changes. Note that the text might also be empty, in which case the displayed log text should be cleared.

Derived classes are required to implement this.

5.81.3.2 getProperty()

```
YPropertyValue YLogView::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 286 of file YLogView.cc.

5.81.3.3 maxLines()

```
int YLogView::maxLines ( ) const
```

Return the maximum number of lines to store.

The last maxLines() lines of the log text will be kept.

Definition at line 105 of file YLogView.cc.

5.81.3.4 propertySet()

```
const YPropertySet & YLogView::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 241 of file YLogView.cc.

5.81.3.5 setLabel()

```
void YLogView::setLabel (
            const std::string & label )  [virtual]
```

Set the label (the caption above the log text).

Derived classes are free to reimplement this, but they should call this base class method at the end of the overloaded function.

Definition at line 84 of file YLogView.cc.

5.81.3.6 setMaxLines()

```
void YLogView::setMaxLines (
            int newMaxLines )
```

Set the maximum number of lines to store.

"0" means "keep all lines" (beware of memory overflow!).

If the new value is lower than the old value, any (now) excess lines before the last 'newMaxLines' lines of the log text is cut off and a display update is triggered.

This method is intentionally not virtual since a display update is triggered when appropriate.

Definition at line 112 of file YLogView.cc.

5.81.3.7 setProperty()

```
bool YLogView::setProperty (
            const std::string & propertyName,
            const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This function may throw YUIPropertyExceptions.

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 267 of file YLogView.cc.

5.81.3.8 setShortcutString()

```
virtual void YLogView::setShortcutString (
            const std::string & str )  [inline], [virtual]
```

Set the string of this widget that holds the keyboard shortcut.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 185 of file YLogView.h.

5.81.3.9 setVisibleLines()

```
void YLogView::setVisibleLines (
            int newVisibleLines )
```

Set the number of visible lines.

Changing this has only effect upon the next geometry call, so applications calling this function might want to trigger a re-layout afterwards.

This method is intentionally not virtual: visibleLines() should be queried in the preferredHeight() implementation.

Definition at line 98 of file YLogView.cc.

5.81.3.10 shortcutString()

```
virtual std::string YLogView::shortcutString ( ) const  [inline], [virtual]
```

Get the string of this widget that holds the keyboard shortcut.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 178 of file YLogView.h.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YLogView.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YLogView.cc

5.82 YLogViewPrivate Struct Reference

Public Member Functions

- **YLogViewPrivate** (const string &label, int visibleLines, int maxLines)

Public Attributes

- string **label**
- int **visibleLines**
- int **maxLines**
- StringDeque **logText**

5.82.1 Detailed Description

Definition at line 41 of file YLogView.cc.

The documentation for this struct was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YLogView.cc

5.83 YMacro Class Reference

Simple access to macro recording and playing.

```
#include <YMacro.h>
```

Static Public Member Functions

- static void setRecorder (YMacroRecorder *recorder)

  Set a macro recorder.
- static void setPlayer (YMacroPlayer *player)

  Set a macro player.
- static void record (const std::string &macroFile)

  Record a macro to the specified macro file.
- static void endRecording ()

  End macro recording.
- static bool recording ()

  Return 'true' if a macro is currently being recorded.
- static void play (const std::string &macroFile)

  Play a macro from the specified macro file.
- static void playNextBlock ()

  Play the next block from the current macro, if there is one playing.

- static bool playing ()

  Return 'true' if a macro is currently being played.
- static YMacroRecorder * recorder ()

  Return the current macro recorder or 0 if there is none.
- static YMacroPlayer * player ()

  Return the current macro player or 0 if there is none.
- static void deleteRecorder ()

  Delete the current macro recorder if there is one.
- static void deletePlayer ()

  Delete the current macro player if there is one.

5.83.1 Detailed Description

Simple access to macro recording and playing.

This class stores an instance of a macro recorder and a macro player. Since both YMacroRecorder and YMacroPlayer are abstract base classes, derived classes from either of them have to be instantiated and set (setRecorder(), setPlayer()) from the outside for anything to happen. Until that point, none of the macro operations here do anything (but also don't throw any error or exception).

Definition at line 44 of file YMacro.h.

5.83.2 Member Function Documentation

5.83.2.1 setPlayer()

```
void YMacro::setPlayer (
            YMacroPlayer * player )  [static]
```

Set a macro player.

This needs to be done from the outside since YMacroRecorder is an abstract base class, i.e., it needs to be derived to be instantiated.

Definition at line 46 of file YMacro.cc.

5.83.2.2 setRecorder()

```
void YMacro::setRecorder (
            YMacroRecorder * recorder )  [static]
```

Set a macro recorder.

This needs to be done from the outside since YMacroRecorder is an abstract base class, i.e., it needs to be derived to be instantiated.

Definition at line 37 of file YMacro.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YMacro.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YMacro.cc

5.84 YMacroPlayer Class Reference

Abstract base class for macro player.

```
#include <YMacroPlayer.h>
```

Public Member Functions

- virtual ~YMacroPlayer ()

  Destructor.
- virtual void play (const std::string &macroFile)=0

  Play a macro from the specified macro file.
- virtual void playNextBlock ()=0

  Play the next block from the current macro, if there is one playing.
- virtual bool playing () const =0

  Return 'true' if a macro is currently being played.

Protected Member Functions

- YMacroPlayer ()

  Constructor.

Friends

- class **YMacro**

5.84.1 Detailed Description

Abstract base class for macro player.

Applications should not use this directly, but the static methods in YMacro.

Definition at line 35 of file YMacroPlayer.h.

The documentation for this class was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YMacroPlayer.h

5.85 YMacroRecorder Class Reference

Abstract base class for macro recorders.

`#include <YMacroRecorder.h>`

Public Member Functions

- virtual ~YMacroRecorder ()
  Destructor.
- virtual void record (const std::string &macroFileName)=0
  Start recording a macro to the specified file.
- virtual void endRecording ()=0
  End recording and close the current macro file (if there is any).
- virtual bool recording () const =0
  Return 'true' if a macro is currently being recorded.
- virtual void recordWidgetProperty (YWidget *widget, const char *propertyName)=0
  Record one widget property.
- virtual void recordMakeScreenShot (bool enabled=false, const std::string &filename=std::string())=0
  Record a "UI::MakeScreenShot()" statement.

Protected Member Functions

- YMacroRecorder ()
  Constructor.

Friends

- class **YMacro**

5.85.1 Detailed Description

Abstract base class for macro recorders.

Applications should not use this directly, but the static methods in YMacro.

Definition at line 38 of file YMacroRecorder.h.

5.85.2 Member Function Documentation

5.85.2.1 recordMakeScreenShot()

```
virtual void YMacroRecorder::recordMakeScreenShot (
            bool enabled = false,
            const std::string & filename = std::string() )  [pure virtual]
```

Record a "UI::MakeScreenShot()" statement.

If 'enabled' is 'false', this statement will be commented out. If no file name is given, a default file name (with auto-increment) will be used.

The documentation for this class was generated from the following file:

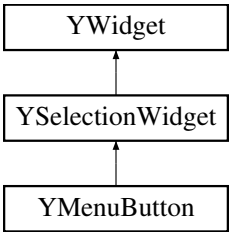
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YMacroRecorder.h

5.86 YMenuButton Class Reference

MenuButton: Similar to PushButton, but with several actions: Upon clicking on a MenuButton (or activating it with the keyboard), a pop-up menu opens where the user can activate an action.

```
#include <YMenuButton.h>
```

Inheritance diagram for YMenuButton:



Public Member Functions

- virtual ~YMenuButton ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- virtual void rebuildMenuTree ()=0

  Rebuild the displayed menu tree from the internally stored YMenuItems.
- virtual void addItems (const YItemCollection &itemCollection)

  Add multiple items.
- virtual void addItem (YItem *item_disown)

  Add one item.
- virtual void deleteAllItems ()

  Delete all items.
- void resolveShortcutConflicts ()

  Resolve keyboard shortcut conflicts: Change shortcuts of menu items if there are duplicates in the respective menu level.
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.
- YMenuItem * findItem (std::vector< std::string > &path) const

  Return item in the tree which matches path of labels or nullptr in case no item with such label was found and is a leaf, as other nodes do not trigger actions except showing children items.
- virtual void activateItem (YMenuItem *item)=0

  Activate the item selected in the tree.
- YMenuItem * findMenuItem (int index)

  Recursively find the first menu item with the specified index.

Protected Member Functions

- YMenuButton (YWidget *parent, const std::string &label)

  Constructor.
- YMenuItem * findMenuItem (int index, YItemConstIterator begin, YItemConstIterator end)

  Recursively find the first menu item with the specified index from iterator 'begin' to iterator 'end'.
- YMenuItem * findItem (std::vector< std::string >::iterator path_begin, std::vector< std::string >::iterator path_↩ end, YItemConstIterator begin, YItemConstIterator end) const

  Recursively looks for the first item in the tree of the menu items using depth first search.
- YMenuItem * itemAt (int index)

  Alias for findMenuItem().

5.86.1 Detailed Description

MenuButton: Similar to PushButton, but with several actions: Upon clicking on a MenuButton (or activating it with the keyboard), a pop-up menu opens where the user can activate an action.

Menu items in that pop-up menu can have submenus (that will pop up in separate pop-up menus).

Internally, this widget is more similar to the Tree widget. The difference is that it does not keep a "selected" status, but triggers an action right away, just like a PushButton. Like PushButton, MenuButton sends an event right away when the user selects an item (clicks on a menu item or activates it with the keyboard). Items that have a submenu never send an event, they simply open their submenu when activated.

Definition at line 48 of file YMenuButton.h.

5.86.2 Constructor & Destructor Documentation

5.86.2.1 YMenuButton()

```
YMenuButton::YMenuButton (
            YWidget * parent,
            const std::string & label )  [protected]
```

Constructor.

'label' is the user-visible text on the button (not above it like all other SelectionWidgets).

Definition at line 49 of file YMenuButton.cc.

5.86.3 Member Function Documentation

5.86.3.1 activateItem()

```
virtual void YMenuButton::activateItem (
            YMenuItem * item )  [pure virtual]
```

Activate the item selected in the tree.

Can be used in tests to simulate user input.

Derived classes are required to implement this.

5.86.3.2 addItem()

```
void YMenuButton::addItem (
            YItem * item_disown )  [virtual]
```

Add one item.

This widget assumes ownership of the item object and will delete it in its destructor.

This reimplementation will an index to the item that is unique for all items in this MenuButton. That index can be used later with findMenuItem() to find the item by that index.

Note

please do not forget to call after adding all elements resolveShortcutConflicts and rebuildMenuTree in this order. It is important to call it after all submenus are added otherwise it won't have proper shortcuts and won't be rendered.

See also

examples/MenuButton.cc.

Reimplemented from YSelectionWidget.

Reimplemented from YSelectionWidget.

Definition at line 74 of file YMenuButton.cc.

5.86.3.3 addItems()

```
void YMenuButton::addItems (
            const YItemCollection & itemCollection )  [virtual]
```

Add multiple items.

For some UIs, this can be more efficient than calling addItem() multiple times. This function also automatically calls resolveShortcutConflicts() and rebuildMenuTree() at the end.

Derived classes can overwrite this function, but they should call this base class function at the end of the new implementation.

Reimplemented from YSelectionWidget.

Reimplemented from YSelectionWidget.

Definition at line 65 of file YMenuButton.cc.

5.86.3.4 deleteAllItems()

```
void YMenuButton::deleteAllItems ( )  [virtual]
```

Delete all items.

Reimplemented from YSelectionWidget.

Reimplemented from YSelectionWidget.

Definition at line 100 of file YMenuButton.cc.

5.86.3.5 findItem() [1/2]

```
YMenuItem * YMenuButton::findItem (
            std::vector< std::string > & path ) const
```

Return item in the tree which matches path of labels or nullptr in case no item with such label was found and is a leaf, as other nodes do not trigger actions except showing children items.

Accepts vector of strings which denote path to the node.

Definition at line 270 of file YMenuButton.cc.

5.86.3.6 findItem() [2/2]

```
YMenuItem * YMenuButton::findItem (
            std::vector< std::string >::iterator path_begin,
            std::vector< std::string >::iterator path_end,
            YItemConstIterator begin,
            YItemConstIterator end ) const  [protected]
```

Recursively looks for the first item in the tree of the menu items using depth first search.

Return nullptr if item which matches full path is not found. Path is a vector of strings, where next element is a child item, so in case one needs to select File->Export->As PDF, for instance, Vector will look like ["File", "Export", "As PDF"].

Definition at line 276 of file YMenuButton.cc.

5.86.3.7 findMenuItem() [1/2]

```
YMenuItem * YMenuButton::findMenuItem (
            int index )
```

Recursively find the first menu item with the specified index.

Returns 0 if there is no such item.

Definition at line 108 of file YMenuButton.cc.

5.86.3.8 findMenuItem() [2/2]

```
YMenuItem * YMenuButton::findMenuItem (
            int index,
            YItemConstIterator begin,
            YItemConstIterator end )  [protected]
```

Recursively find the first menu item with the specified index from iterator 'begin' to iterator 'end'.

Returns 0 if there is no such item.

Definition at line 115 of file YMenuButton.cc.

5.86.3.9 getProperty()

```
YPropertyValue YMenuButton::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 255 of file YMenuButton.cc.

5.86.3.10 itemAt()

```
YMenuItem* YMenuButton::itemAt (
            int index )  [inline], [protected]
```

Alias for findMenuItem().

Reimplemented to ensure consistent behaviour with YSelectionWidget::itemAt().

Definition at line 204 of file YMenuButton.h.

5.86.3.11 propertySet()

```
const YPropertySet & YMenuButton::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 216 of file YMenuButton.cc.

5.86.3.12 rebuildMenuTree()

```
virtual void YMenuButton::rebuildMenuTree ( )  [pure virtual]
```

Rebuild the displayed menu tree from the internally stored YMenuItems.

The application should call this (once) after all items have been added with addItem(). YMenuButton::addItems() calls this automatically.

Derived classes are required to implement this.

5.86.3.13 resolveShortcutConflicts()

```
void YMenuButton::resolveShortcutConflicts ( )
```

Resolve keyboard shortcut conflicts: Change shortcuts of menu items if there are duplicates in the respective menu level.

This has to be called after all items are added, but before rebuildMenuTree() (see above). YMenuButton::addItems() calls this automatically.

Definition at line 209 of file YMenuButton.cc.

5.86.3.14 setProperty()

```
bool YMenuButton::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This function may throw YUIPropertyExceptions.

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 238 of file YMenuButton.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YMenuButton.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YMenuButton.cc

5.87 YMenuButtonPrivate Struct Reference

Public Attributes

- int **nextSerialNo**

5.87.1 Detailed Description

Definition at line 37 of file YMenuButton.cc.

The documentation for this struct was generated from the following file:

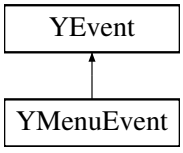
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YMenuButton.cc

5.88 YMenuEvent Class Reference

Event to be returned upon menu selection.

```
#include <YEvent.h>
```

Inheritance diagram for YMenuEvent:



Public Member Functions

- **YMenuEvent** (YItem *item)
- **YMenuEvent** (const char *id)
- **YMenuEvent** (const std::string &id)
- virtual YItem * item () const

  Return the YItem that corresponds to this event or 0 if the event was constructed with a string ID.
- std::string id () const

  Return the string ID of this event.

Protected Member Functions

- virtual ~YMenuEvent ()

  Protected destructor - events can only be deleted via YDialog::deleteEvent().

Protected Attributes

- YItem * **_item**
- std::string **_id**

Additional Inherited Members

5.88.1 Detailed Description

Event to be returned upon menu selection.

Definition at line 256 of file YEvent.h.

5.88.2 Constructor & Destructor Documentation

5.88.2.1 ~YMenuEvent()

```
virtual YMenuEvent::~YMenuEvent ( )  [inline], [protected], [virtual]
```

Protected destructor - events can only be deleted via YDialog::deleteEvent().

The associated dialog will take care of this event and delete it when appropriate.

Definition at line 289 of file YEvent.h.

5.88.3 Member Function Documentation

5.88.3.1 id()

```
std::string YMenuEvent::id ( ) const  [inline]
```

Return the string ID of this event.

This will be an empty string if the event was constructed with a YItem.

Definition at line 280 of file YEvent.h.

5.88.3.2 item()

```
virtual YItem* YMenuEvent::item ( ) const  [inline], [virtual]
```

Return the YItem that corresponds to this event or 0 if the event was constructed with a string ID.

Reimplemented from YEvent.

Reimplemented from YEvent.

Definition at line 274 of file YEvent.h.

The documentation for this class was generated from the following file:

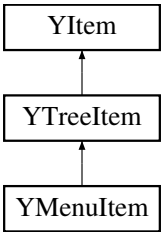
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YEvent.h

5.89 YMenuItem Class Reference

Item class for menu items.

```
#include <YMenuItem.h>
```

Inheritance diagram for YMenuItem:



Public Member Functions

- YMenuItem (const std::string &label)

  Constructors for toplevel items.
- **YMenuItem** (const std::string &label, const std::string &iconName)
- YMenuItem (YMenuItem *parent, const std::string &label)

  Constructors for items that have a parent item.
- **YMenuItem** (YMenuItem *parent, const std::string &label, const std::string &iconName)
- virtual ~YMenuItem ()

  Destructor.
- YMenuItem * parent () const

  Returns this item's parent item or 0 if it is a toplevel item.

5.89.1 Detailed Description

Item class for menu items.

Definition at line 35 of file YMenuItem.h.

5.89.2 Constructor & Destructor Documentation

5.89.2.1 YMenuItem()

```
YMenuItem::YMenuItem (
            YMenuItem * parent,
            const std::string & label )  [inline]
```

Constructors for items that have a parent item.

They will automatically register this item with the parent item. The parent assumes ownership of this item and will delete it in its (the parent's) destructor.

Definition at line 57 of file YMenuItem.h.

5.89.2.2 ~YMenuItem()

```
virtual YMenuItem::~YMenuItem ( )  [inline], [virtual]
```

Destructor.

This will delete all children.

Definition at line 73 of file YMenuItem.h.

The documentation for this class was generated from the following file:

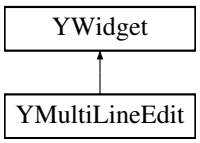
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YMenuItem.h

5.90 YMultiLineEdit Class Reference

A multi-line plain-text area.

`#include <YMultiLineEdit.h>`

Inheritance diagram for YMultiLineEdit:



Public Member Functions

- virtual ~YMultiLineEdit ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- virtual std::string value ()=0

  Get the current value (the text entered by the user or set from the outside) of this MultiLineEdit.
- virtual void setValue (const std::string &text)=0

  Set the current value (the text entered by the user or set from the outside) of this MultiLineEdit.
- std::string label () const

  Get the label (the caption above the MultiLineEdit).
- virtual void setLabel (const std::string &label)

  Set the label (the caption above the MultiLineEdit).
- int inputMaxLength () const

  The maximum input length, i.e., the maximum number of characters the user can enter.
- virtual void setInputMaxLength (int numberOfChars)

  Set the maximum input length, i.e., the maximum number of characters the user can enter.
- int defaultVisibleLines () const

  Return the number of input lines that are visible by default.
- virtual void setDefaultVisibleLines (int newVisibleLines)

  Set the number of input lines that are visible by default.
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.
- virtual std::string shortcutString () const

  Get the string of this widget that holds the keyboard shortcut.
- virtual void setShortcutString (const std::string &str)

  Set the string of this widget that holds the keyboard shortcut.
- const char * userInputProperty ()

  The name of the widget property that will return user input.

Protected Member Functions

- YMultiLineEdit (YWidget *parent, const std::string &label)

  Constructor.

5.90.1 Detailed Description

A multi-line plain-text area.

Definition at line 35 of file YMultiLineEdit.h.

5.90.2 Member Function Documentation

5.90.2.1 defaultVisibleLines()

```
int YMultiLineEdit::defaultVisibleLines ( ) const
```

Return the number of input lines that are visible by default.

This is what the widget would like to get (which will be reflected by preferredHeight()), not what it currently actually has due to layout constraints.

Definition at line 95 of file YMultiLineEdit.cc.

5.90.2.2 getProperty()

```
YPropertyValue YMultiLineEdit::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 147 of file YMultiLineEdit.cc.

5.90.2.3 inputMaxLength()

```
int YMultiLineEdit::inputMaxLength ( ) const
```

The maximum input length, i.e., the maximum number of characters the user can enter.

-1 means no limit.

Definition at line 83 of file YMultiLineEdit.cc.

5.90.2.4 propertySet()

```
const YPropertySet & YMultiLineEdit::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 108 of file YMultiLineEdit.cc.

5.90.2.5 setDefaultVisibleLines()

```
void YMultiLineEdit::setDefaultVisibleLines (
             int newVisibleLines )  [virtual]
```

Set the number of input lines that are visible by default.

This is what the widget would like to get (which will be reflected by preferredHeight()), not what it currently actually has due to layout constraints.

Notice that since a MultiLineEdit is stretchable in both dimensions, it might get more or less screen space, depending on the layout. This value is only meaningful if there are no other layout constraints.

Changing this value will not trigger a re-layout.

Derived classes can overwrite this function (but should call this base class function in the new function implementation), but it will normally be sufficient to query defaultVisibleLines() in preferredHeight().

Definition at line 101 of file YMultiLineEdit.cc.

5.90.2.6 setInputMaxLength()

```
void YMultiLineEdit::setInputMaxLength (
             int numberOfChars )  [virtual]
```

Set the maximum input length, i.e., the maximum number of characters the user can enter.

-1 means no limit.

Derived classes are free to reimplement this, but they should call this base class method at the end of the overloaded function.

Definition at line 89 of file YMultiLineEdit.cc.

5.90.2.7 setLabel()

```
void YMultiLineEdit::setLabel (
             const std::string & label )  [virtual]
```

Set the label (the caption above the MultiLineEdit).

Derived classes are free to reimplement this, but they should call this base class method at the end of the overloaded function.

Definition at line 77 of file YMultiLineEdit.cc.

5.90.2.8 setProperty()

```
bool YMultiLineEdit::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This function may throw YUIPropertyExceptions.

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 130 of file YMultiLineEdit.cc.

5.90.2.9 setShortcutString()

```
virtual void YMultiLineEdit::setShortcutString (
            const std::string & str )  [inline], [virtual]
```

Set the string of this widget that holds the keyboard shortcut.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 168 of file YMultiLineEdit.h.

5.90.2.10 setValue()

```
virtual void YMultiLineEdit::setValue (
            const std::string & text )  [pure virtual]
```

Set the current value (the text entered by the user or set from the outside) of this MultiLineEdit.

Derived classes are required to implement this.

5.90.2.11 shortcutString()

```
virtual std::string YMultiLineEdit::shortcutString ( ) const  [inline], [virtual]
```

Get the string of this widget that holds the keyboard shortcut.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 161 of file YMultiLineEdit.h.

5.90.2.12 userInputProperty()

```
const char* YMultiLineEdit::userInputProperty ( )  [inline], [virtual]
```

The name of the widget property that will return user input.

Inherited from YWidget.

Reimplemented from YWidget.

Definition at line 175 of file YMultiLineEdit.h.

5.90.2.13 value()

```
virtual std::string YMultiLineEdit::value ( )  [pure virtual]
```

Get the current value (the text entered by the user or set from the outside) of this MultiLineEdit.

Derived classes are required to implement this.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YMultiLineEdit.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YMultiLineEdit.cc

5.91 YMultiLineEditPrivate Struct Reference

Public Member Functions

- **YMultiLineEditPrivate** (const string &label)

Public Attributes

- string **label**
- int **inputMaxLength**
- int **defaultVisibleLines**

5.91.1 Detailed Description

Definition at line 38 of file YMultiLineEdit.cc.

The documentation for this struct was generated from the following file:

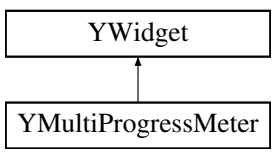
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YMultiLineEdit.cc

5.92 YMultiProgressMeter Class Reference

MultiProgressMeter: Progress bar with several segments that can indicate progress individually.

```
#include <YMultiProgressMeter.h>
```

Inheritance diagram for YMultiProgressMeter:



Public Member Functions

- virtual ~YMultiProgressMeter ()

  Destructor.
- virtual const char * widgetClass () const

  Return a descriptive name of this widget class for logging, debugging etc.
- YUIDimension dimension () const

  Return the orientation of the MultiProgressBar.
- bool horizontal () const

  Return 'true' if the orientation is horizontal.
- bool vertical () const

  Return 'true' if the orientation is vertical.
- int segments () const

  Return the number of segments.
- float maxValue (int segment) const

  Return the maximum value for the specified segment (counting from 0).
- float currentValue (int segment) const

  Return the current value for the specified segment (counting from 0).
- void setCurrentValue (int segment, float value)

  Set the current value for the specified segment.
- void setCurrentValues (const std::vector< float > &values)

  Set all current values and call doUpdate().
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.
- virtual void doUpdate ()=0

  Notification that values have been updated and the widget needs to be redisplayed.

Protected Member Functions

- YMultiProgressMeter (YWidget *parent, YUIDimension dim, const std::vector< float > &maxValues)

  Constructor.

5.92.1 Detailed Description

MultiProgressMeter: Progress bar with several segments that can indicate progress individually.

This is useful to display progress of several activities that might not necessarily all be done in sequence.

A common example is installing packages from several CDs: Each CD would get a separate segment. Each segment's size would be proportional to the amount of data to be installed from that CD. This visualizes at the same time (a) how many CDs are involved (b) how much in proportion is to be expected from each CD (c) whether or not a specific CD is finished.

Visual example (horizontal MultiProgressMeter):

```
[=============...] [===] [......] [.]
```

This corresponds to 4 CDs:

CD #1: A lot of packages are to be installed from this CD, and a fair amount of those are already installed, but some are still missing. CD #2: Some packages were installed from this, but this CD is finished. CD #3: Quite some packages are to be installed from this CD. CD #4: Very few packages are to be installed from this CD.

As can be seen from this simple example, this widget can visualize a lot of complex information at the same time in a very natural way.

This is an optional widget, i.e. not all UIs support it.

Definition at line 64 of file YMultiProgressMeter.h.

5.92.2 Member Function Documentation

5.92.2.1 currentValue()

```
float YMultiProgressMeter::currentValue (
            int segment ) const
```

Return the current value for the specified segment (counting from 0).

If no value has been set yet, -1 is returned.

Definition at line 109 of file YMultiProgressMeter.cc.

5.92.2.2 doUpdate()

```
virtual void YMultiProgressMeter::doUpdate ( )  [pure virtual]
```

Notification that values have been updated and the widget needs to be redisplayed.

Derived classes need to reimplement this.

5.92.2.3 getProperty()

```
YPropertyValue YMultiProgressMeter::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 176 of file YMultiProgressMeter.cc.

5.92.2.4 propertySet()

```
const YPropertySet & YMultiProgressMeter::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 143 of file YMultiProgressMeter.cc.

5.92.2.5 setCurrentValue()

```
void YMultiProgressMeter::setCurrentValue (
            int segment,
            float value )
```

Set the current value for the specified segment.

This must be in the range 0..maxValue(segment).

Remember to call doUpdate() after all changed values are set!

Definition at line 117 of file YMultiProgressMeter.cc.

5.92.2.6 setProperty()

```
bool YMultiProgressMeter::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This function may throw YUIPropertyExceptions.

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 161 of file YMultiProgressMeter.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YMultiProgressMeter.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YMultiProgressMeter.cc

5.93 YMultiProgressMeterPrivate Struct Reference

Public Member Functions

- **YMultiProgressMeterPrivate** (YUIDimension dim, const vector< float > &maxValues)

Public Attributes

- YUIDimension **dim**
- vector< float > **maxValues**
- vector< float > **currentValues**

5.93.1 Detailed Description

Definition at line 36 of file YMultiProgressMeter.cc.

The documentation for this struct was generated from the following file:

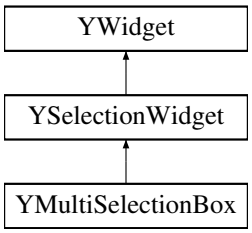
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YMultiProgressMeter.cc

5.94 YMultiSelectionBox Class Reference

A variant of YSelectionBox where more than one item can be selected.

`#include <YMultiSelectionBox.h>`

Inheritance diagram for YMultiSelectionBox:



Public Member Functions

- virtual ~YMultiSelectionBox ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- bool shrinkable () const

  Return 'true' if this MultiSelectionBox should be very small.
- virtual void setShrinkable (bool shrinkable=true)

  Make this MultiSelectionBox very small.
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.
- const char * userInputProperty ()

  The name of the widget property that will return user input.
- virtual YItem * currentItem ()=0

  Return the the item that currently has the keyboard focus or 0 if no item currently has the keyboard focus.
- virtual void setCurrentItem (YItem *item)=0

  Set the keyboard focus to the specified item.
- virtual void saveUserInput (YMacroRecorder *macroRecorder)

  Save the widget's user input to a macro recorder.

Protected Member Functions

- YMultiSelectionBox (YWidget *parent, const std::string &label)

  Constructor.

5.94.1 Detailed Description

A variant of YSelectionBox where more than one item can be selected.

Definition at line 36 of file YMultiSelectionBox.h.

5.94.2 Member Function Documentation

5.94.2.1 currentItem()

```
virtual YItem* YMultiSelectionBox::currentItem ( )  [pure virtual]
```

Return the the item that currently has the keyboard focus or 0 if no item currently has the keyboard focus.

Notice that for a MultiSelectionBox the current item is not necessarily selected, i.e., its check box may or may not be checked.

Derived classes are required to implement this function.

5.94.2.2 getProperty()

```
YPropertyValue YMultiSelectionBox::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 124 of file YMultiSelectionBox.cc.

5.94.2.3 propertySet()

```
const YPropertySet & YMultiSelectionBox::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 80 of file YMultiSelectionBox.cc.

5.94.2.4 saveUserInput()

```
void YMultiSelectionBox::saveUserInput (
             YMacroRecorder * macroRecorder )  [virtual]
```

Save the widget's user input to a macro recorder.

Reimplemented from YWidget because two properties need to be recorded.

Reimplemented from YWidget.

Definition at line 141 of file YMultiSelectionBox.cc.

5.94.2.5 setCurrentItem()

```
virtual void YMultiSelectionBox::setCurrentItem (
             YItem * item )  [pure virtual]
```

Set the keyboard focus to the specified item.

0 means clear the keyboard focus.

Notice that for a MultiSelectionBox the current item is not necessarily selected, i.e., its check box may or may not be checked. Use selectItem() for that.

Also notice that selectItem() does not make that newly selected item the current item.

Derived classes are required to implement this function.

5.94.2.6 setProperty()

```
bool YMultiSelectionBox::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This function may throw YUIPropertyExceptions.

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 105 of file YMultiSelectionBox.cc.

5.94.2.7 setShrinkable()

```
void YMultiSelectionBox::setShrinkable (
             bool shrinkable = true )  [virtual]
```

Make this MultiSelectionBox very small.

This will take effect only upon the next geometry management run.

Derived classes can overwrite this, but should call this base class function in the new function.

Definition at line 73 of file YMultiSelectionBox.cc.

5.94.2.8 userInputProperty()

```
const char* YMultiSelectionBox::userInputProperty ( )  [inline], [virtual]
```

The name of the widget property that will return user input.

Inherited from YWidget.

Reimplemented from YWidget.

Definition at line 103 of file YMultiSelectionBox.h.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YMultiSelectionBox.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YMultiSelectionBox.cc

5.95 YMultiSelectionBoxPrivate Struct Reference

Public Attributes

- bool **shrinkable**

5.95.1 Detailed Description

Definition at line 37 of file YMultiSelectionBox.cc.

The documentation for this struct was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YMultiSelectionBox.cc

5.96 YOptionalWidgetFactory Class Reference

Abstract widget factory for optional ("special") widgets.

`#include <YOptionalWidgetFactory.h>`

Public Member Functions

- virtual bool **hasWizard** ()
- virtual YWizard * **createWizard** (YWidget *parent, const std::string &backButtonLabel, const std::string &abortButtonLabel, const std::string &nextButtonLabel, YWizardMode wizardMode=YWizardMode_Standard)
- virtual bool **hasDumbTab** ()
- virtual YDumbTab * **createDumbTab** (YWidget *parent)
- virtual bool **hasSlider** ()
- virtual YSlider * **createSlider** (YWidget *parent, const std::string &label, int minVal, int maxVal, int initialVal)
- virtual bool **hasDateField** ()
- virtual YDateField * **createDateField** (YWidget *parent, const std::string &label)
- virtual bool **hasTimeField** ()
- virtual YTimeField * **createTimeField** (YWidget *parent, const std::string &label)
- virtual bool **hasBarGraph** ()
- virtual YBarGraph * **createBarGraph** (YWidget *parent)
- virtual bool **hasPatternSelector** ()
- virtual YWidget * **createPatternSelector** (YWidget *parent, long modeFlags=0)
- virtual bool **hasSimplePatchSelector** ()
- virtual YWidget * **createSimplePatchSelector** (YWidget *parent, long modeFlags=0)
- virtual bool **hasMultiProgressMeter** ()
- YMultiProgressMeter * **createHMultiProgressMeter** (YWidget *parent, const std::vector< float > &maxValues)
- YMultiProgressMeter * **createVMultiProgressMeter** (YWidget *parent, const std::vector< float > &maxValues)
- virtual YMultiProgressMeter * **createMultiProgressMeter** (YWidget *parent, YUIDimension dim, const std::vector< float > &maxValues)
- virtual bool **hasPartitionSplitter** ()
- virtual YPartitionSplitter * **createPartitionSplitter** (YWidget *parent, int usedSize, int totalFreeSize, int newPartSize, int minNewPartSize, int minFreeSize, const std::string &usedLabel, const std::string &freeLabel, const std::string &newPartLabel, const std::string &freeFieldLabel, const std::string &newPartFieldLabel)
- virtual bool **hasDownloadProgress** ()
- virtual YDownloadProgress * **createDownloadProgress** (YWidget *parent, const std::string &label, const std::string &filename, YFileSize_t expectedFileSize)
- bool **hasDummySpecialWidget** ()
- YWidget * **createDummySpecialWidget** (YWidget *parent)
- virtual bool **hasTimezoneSelector** ()
- virtual YTimezoneSelector * **createTimezoneSelector** (YWidget *parent, const std::string &timezoneMap, const std::map< std::string, std::string > &timezones)
- virtual bool **hasGraph** ()
- virtual YGraph * **createGraph** (YWidget *parent, const std::string &filename, const std::string &layoutAlgorithm)
- virtual YGraph * **createGraph** (YWidget *parent, void *graph)
- virtual bool **hasContextMenu** ()

Protected Member Functions

- YOptionalWidgetFactory ()

  Constructor.
- virtual ~YOptionalWidgetFactory ()

  Destructor.

Friends

- class **YUI**

5.96.1 Detailed Description

Abstract widget factory for optional ("special") widgets.

Remember to always check with the corresponding "has..()" method if the current UI actually provides the requested widget. Otherwise the "create...()" method will throw an exception.

Definition at line 56 of file YOptionalWidgetFactory.h.

5.96.2 Constructor & Destructor Documentation

5.96.2.1 YOptionalWidgetFactory()

```
YOptionalWidgetFactory::YOptionalWidgetFactory ( )  [protected]
```

Constructor.

Use YUI::optionalWidgetFactory() to get the singleton for this class.

Definition at line 44 of file YOptionalWidgetFactory.cc.

The documentation for this class was generated from the following files:

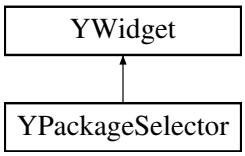
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YOptionalWidgetFactory.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YOptionalWidgetFactory.cc

5.97 YPackageSelector Class Reference

A simple wrapper for an insanely complex UI for installing software.

`#include <YPackageSelector.h>`

Inheritance diagram for YPackageSelector:



Public Member Functions

- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- bool testMode () const

  Check for the various modes.
- bool **onlineUpdateMode** () const
- bool **updateMode** () const
- bool **searchMode** () const
- bool **summaryMode** () const
- bool **repoMode** () const
- bool **repoMgrEnabled** () const
- bool **confirmUnsupported** () const
- bool **onlineSearchEnabled** () const

Protected Member Functions

- YPackageSelector (YWidget *parent, long modeFlags=0)

  Constructor.

Protected Attributes

- long **_modeFlags**

5.97.1 Detailed Description

A simple wrapper for an insanely complex UI for installing software.

Definition at line 43 of file YPackageSelector.h.

5.97.2 Constructor & Destructor Documentation

5.97.2.1 YPackageSelector()

```
YPackageSelector::YPackageSelector (
            YWidget * parent,
            long modeFlags = 0 )  [protected]
```

Constructor.

'modeFlags' are flags determining which modes to use, ORed together: YPkg_OnlineUpdateMode | YPkg_TestMode

Definition at line 32 of file YPackageSelector.cc.

The documentation for this class was generated from the following files:

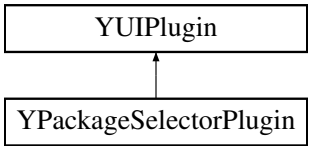
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YPackageSelector.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YPackageSelector.cc

5.98 YPackageSelectorPlugin Class Reference

Abstract base class for simplified access to UI plugins for package selection.

`#include <YPackageSelectorPlugin.h>`

Inheritance diagram for YPackageSelectorPlugin:



Public Member Functions

- virtual YPackageSelector * createPackageSelector (YWidget *parent, long modeFlags=0)=0

  Create a package selector.

Protected Member Functions

- YPackageSelectorPlugin (const char *pluginLibBaseName)

  Constructor: Load the specified plugin library from the standard UI plugin directory (/usr/lib/yui/).
- virtual ~YPackageSelectorPlugin ()

  Destructor.

5.98.1 Detailed Description

Abstract base class for simplified access to UI plugins for package selection.

Definition at line 38 of file YPackageSelectorPlugin.h.

5.98.2 Constructor & Destructor Documentation

5.98.2.1 ~YPackageSelectorPlugin()

```
virtual YPackageSelectorPlugin::~YPackageSelectorPlugin ( )  [inline], [protected], [virtual]
```

Destructor.

Calls dlclose() which will unload the plugin library if it is no longer used, i.e. if the reference count dlopen() uses reaches 0.

Definition at line 52 of file YPackageSelectorPlugin.h.

5.98.3 Member Function Documentation

5.98.3.1 createPackageSelector()

```
virtual YPackageSelector* YPackageSelectorPlugin::createPackageSelector (
            YWidget * parent,
            long modeFlags = 0 )  [pure virtual]
```

Create a package selector.

Derived classes need to implement this.

This might return 0 if the plugin lib could not be loaded or if the appropriate symbol could not be located in the plugin lib.

The documentation for this class was generated from the following file:

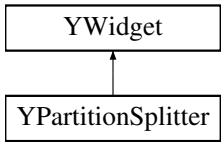
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YPackageSelectorPlugin.h

5.99 YPartitionSplitter Class Reference

PartitionSplitter: A (very custom) widget for easily splitting one existing partition into two.

`#include <YPartitionSplitter.h>`

Inheritance diagram for YPartitionSplitter:



Public Member Functions

- virtual ~YPartitionSplitter ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- virtual int value ()=0

  The value of this PartitionSplitter: The size of the new partition.
- virtual void setValue (int newValue)=0

  Set the value (the size of the new partition).
- int **usedSize** () const
- int **totalFreeSize** () const
- int **minFreeSize** () const
- int **maxFreeSize** () const
- int **freeSize** ()
- int **newPartSize** ()
- int **minNewPartSize** () const
- int **maxNewPartSize** () const
- std::string **usedLabel** () const
- std::string **freeLabel** () const
- std::string **newPartLabel** () const
- std::string **freeFieldLabel** () const
- std::string **newPartFieldLabel** () const
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.
- const char * userInputProperty ()

  The name of the widget property that will return user input.

Protected Member Functions

- YPartitionSplitter (YWidget *parent, int usedSize, int totalFreeSize, int newPartSize, int minNewPartSize, int minFreeSize, const std::string &usedLabel, const std::string &freeLabel, const std::string &newPartLabel, const std::string &freeFieldLabel, const std::string &newPartFieldLabel)

  Constructor.

5.99.1 Detailed Description

PartitionSplitter: A (very custom) widget for easily splitting one existing partition into two.

Layout:

```
+--------------------+---------------+--------------------------+
| Old Partition      | Old Partition | New Partition            |
| used               | free          |                          |
+--------------------+---------------+--------------------------+

Old Partition free                                  New Partition
[ 123 ] ================O================================= [ 123 ]
```

At the top, there is a BarGraph that dynamicylla displays the sizes in graphical form. Below are an IntField to the left and an IntField to the right, each with its respective label. Between the two IntFields there is a Slider.

The user can enter a value in either IntField or drag the slider. The other sub-widgets (including the BarGraph) will automatically be adjusted. Visually (in the BarGraph), the border between "old partition free" and "new partition" will move left and right. The border between "old partition used" and "old partition free" is static.

There are built-in (configurable) limits for the minimum sizes of "old partition free" and "new partition".

Definition at line 63 of file YPartitionSplitter.h.

5.99.2 Constructor & Destructor Documentation

5.99.2.1 YPartitionSplitter()

```
YPartitionSplitter::YPartitionSplitter (
            YWidget * parent,
            int usedSize,
            int totalFreeSize,
            int newPartSize,
            int minNewPartSize,
            int minFreeSize,
            const std::string & usedLabel,
            const std::string & freeLabel,
            const std::string & newPartLabel,
```

```
            const std::string & freeFieldLabel,
            const std::string & newPartFieldLabel )  [protected]
```

Constructor.

usedSize: Used size of the old partition (constant)

totalFreeSize: Total free size of the old partition before the split: OldPartitionFree + NewPartition

newPartSize': Initial size of the new partition

minNewPartSize: Miminum size of the new partition

minFreeSize: Minimum free size of the old partition

usedLabel: BarGraph label for the used part of the old partition

freeLabel: BarGraph label for the free part of the old partition

newPartLabel: BarGraph label for the new partition

freeFieldLabel: IntField label for the free part of the old partition

newPartFieldLabel: IntField label for the size of the new partition

Definition at line 71 of file YPartitionSplitter.cc.

5.99.3 Member Function Documentation

5.99.3.1 getProperty()

```
YPropertyValue YPartitionSplitter::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 195 of file YPartitionSplitter.cc.

5.99.3.2 propertySet()

```
const YPropertySet & YPartitionSplitter::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 162 of file YPartitionSplitter.cc.

5.99.3.3 setProperty()

```
bool YPartitionSplitter::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This function may throw YUIPropertyExceptions.

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 180 of file YPartitionSplitter.cc.

5.99.3.4 setValue()

```
virtual void YPartitionSplitter::setValue (
             int newValue )  [pure virtual]
```

Set the value (the size of the new partition).

Derived classes are required to implement this.

5.99.3.5 userInputProperty()

```
const char* YPartitionSplitter::userInputProperty ( )  [inline], [virtual]
```

The name of the widget property that will return user input.

Inherited from YWidget.

Reimplemented from YWidget.

Definition at line 181 of file YPartitionSplitter.h.

5.99.3.6 value()

```
virtual int YPartitionSplitter::value ( )  [pure virtual]
```

The value of this PartitionSplitter: The size of the new partition.

Derived classes are required to implement this.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YPartitionSplitter.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YPartitionSplitter.cc

5.100 YPartitionSplitterPrivate Struct Reference

Public Member Functions

- **YPartitionSplitterPrivate** (int usedSize, int totalFreeSize, int minNewPartSize, int minFreeSize, const string &usedLabel, const string &freeLabel, const string &newPartLabel, const string &freeFieldLabel, const string &newPartFieldLabel)

Public Attributes

- int **usedSize**
- int **totalFreeSize**
- int **minNewPartSize**
- int **minFreeSize**
- string **usedLabel**
- string **freeLabel**
- string **newPartLabel**
- string **freeFieldLabel**
- string **newPartFieldLabel**

5.100.1 Detailed Description

Definition at line 35 of file YPartitionSplitter.cc.

The documentation for this struct was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YPartitionSplitter.cc

5.101 YPath Class Reference

Finds files (e.g.

`#include <YPath.h>`

Public Member Functions

- YPath (const std::string &directory, const std::string &filename)

  Constructor.
- ~YPath ()

  Destructor.
- std::string path ()

  Returns the full path of the file if found; if not found just the filename given in constructor.
- std::string dir ()

  Returns the directory where the file is found; if not found just the subdir part (if there's any) of the filename given in constructor.

5.101.1 Detailed Description

Finds files (e.g.

plugins or theme pixmaps) recursively inside a directory.

Definition at line 43 of file YPath.h.

5.101.2 Constructor & Destructor Documentation

5.101.2.1 YPath()

```
YPath::YPath (
            const std::string & directory,
            const std::string & filename )
```

Constructor.

to be called with the directory where to look inside and filename which to lookup.

YSettings::progSubDir will be preferred by the lookup.

Definition at line 51 of file YPath.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YPath.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YPath.cc

5.102 YPerThreadLogInfo Struct Reference

Helper class: Per-thread logging information.

Public Member Functions

- YPerThreadLogInfo ()

  Constructor.
- ~YPerThreadLogInfo ()

  Destructor.
- bool isThread (pthread_t otherThreadHandle)

  Check if this per-thread logging information belongs to the specified thread.

Public Attributes

- pthread_t **threadHandle**
- YUILogBuffer **logBuffer**
- ostream **logStream**

5.102.1 Detailed Description

Helper class: Per-thread logging information.

Multiple threads can easily clobber each others' half-done logging. A naive approach to prevent this would be to lock a mutex when a thread starts logging and unlock it when it's done logging. But that "when it's done" condition might never come true. endl or a newline in the output stream would be one indication, but there is no way to make sure there always is such a delimiter. If it is forgotten and that thread (that still has the mutex locked) runs into a waiting condition itself (e.g., UI thread synchronization with pipes), there would be a deadlock.

So this much safer approach was chosen: Give each thread its own logging infrastructure, i.e., its own log stream and its own log buffer.

Sure, in bad cases the logger function might still be executed in parallel and thus clobber a line or two of log output. But that's merely bad output formatting, not writing another thread's data structures without control - which can easily happen if multiple threads are working on the same output buffer, i.e. manipulate the same string.

Definition at line 212 of file YUILog.cc.

The documentation for this struct was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUILog.cc

5.103 YPopupInternal Class Reference

Public Types

- typedef std::vector< std::string > **StringArray**

Static Public Member Functions

- static void message (const std::string &label)

  Display a simple popup dialog with OK button.
- static bool editStringArray (StringArray &array, const std::string &label)

  Display a popup dialog with several input fields.
- static StringArray editNewStringArray (const std::string &label)

  Display a popup dialog with 3 initially empty input fields.

5.103.1 Detailed Description

Definition at line 21 of file YPopupInternal.h.

5.103.2 Member Function Documentation

5.103.2.1 editNewStringArray()

```
YPopupInternal::StringArray YPopupInternal::editNewStringArray (
            const std::string & label )  [static]
```

Display a popup dialog with 3 initially empty input fields.

Parameters

label	title of the dialog

Returns

Entered values in a StringArray, if canceled the array is empty.

Definition at line 141 of file YPopupInternal.cc.

5.103.2.2 editStringArray()

```
bool YPopupInternal::editStringArray (
             StringArray & array,
             const std::string & label )  [static]
```

Display a popup dialog with several input fields.

Parameters

array	fields to edit
label	title of the dialog

Returns

true if dialog was closed by [OK], false otherwise

Definition at line 74 of file YPopupInternal.cc.

5.103.2.3 message()

```
void YPopupInternal::message (
             const std::string & label )  [static]
```

Display a simple popup dialog with OK button.

Parameters

label	the message to display

Definition at line 36 of file YPopupInternal.cc.

The documentation for this class was generated from the following files:

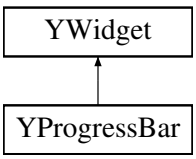
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YPopupInternal.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YPopupInternal.cc

5.104 YProgressBar Class Reference

A progress bar, showing completion of value() out of maxValue() parts.

`#include <YProgressBar.h>`

Inheritance diagram for YProgressBar:



Public Member Functions

- virtual ~YProgressBar ()
  Destructor.
- virtual const char * widgetClass () const
  Returns a descriptive name of this widget class for logging, debugging etc.
- std::string label ()
  Get the label (the caption above the progress bar).
- virtual void setLabel (const std::string &label)
  Set the label (the caption above the progress bar).
- int maxValue () const
  Return the maximum progress value.
- int value () const
  Return the current progress value.
- virtual void setValue (int newValue)
  Set the current progress value (<= maxValue()).
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)
  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)
  Get a property.
- virtual const YPropertySet & propertySet ()
  Return this class's property set.

Protected Member Functions

- YProgressBar (YWidget *parent, const std::string &label, int maxValue=100)
  Constructor.

5.104.1 Detailed Description

A progress bar, showing completion of value() out of maxValue() parts.

Definition at line 36 of file YProgressBar.h.

5.104.2 Member Function Documentation

5.104.2.1 getProperty()

```
YPropertyValue YProgressBar::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 147 of file YProgressBar.cc.

5.104.2.2 maxValue()

```
int YProgressBar::maxValue ( ) const
```

Return the maximum progress value.

Notice that this value can only be set in the constructor.

Definition at line 86 of file YProgressBar.cc.

5.104.2.3 propertySet()

```
const YPropertySet & YProgressBar::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 111 of file YProgressBar.cc.

5.104.2.4 setLabel()

```
void YProgressBar::setLabel (
             const std::string & label )  [virtual]
```

Set the label (the caption above the progress bar).

Derived classes are free to reimplement this, but they should call this base class method at the end of the overloaded function.

Definition at line 80 of file YProgressBar.cc.

5.104.2.5 setProperty()

```
bool YProgressBar::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This function may throw YUIPropertyExceptions.

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 131 of file YProgressBar.cc.

5.104.2.6 setValue()

```
void YProgressBar::setValue (
             int newValue )  [virtual]
```

Set the current progress value (<= maxValue()).

Derived classes should reimplement this, but they should call this base class method at the end of the overloaded function.

Definition at line 98 of file YProgressBar.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YProgressBar.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YProgressBar.cc

5.105 YProgressBarPrivate Struct Reference

Public Member Functions

- **YProgressBarPrivate** (const string &label, int maxValue)

Public Attributes

- string **label**
- int **maxValue**
- int **value**

5.105.1 Detailed Description

Definition at line 35 of file YProgressBar.cc.

The documentation for this struct was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YProgressBar.cc

5.106 YProperty Class Reference

Class for widget properties.

```
#include <YProperty.h>
```

Public Member Functions

- YProperty (const std::string &name, YPropertyType type, bool isReadOnly=false)

  Constructor: Create a property with the specified name and type.
- std::string name () const

  Returns the name of this property.
- YPropertyType type () const

  Returns the type of this property.
- bool isReadOnly () const

  Returns 'true' if this property cannot be changed, only retrieved.
- std::string typeAsStr () const

  Returns the type of this property as string.

Static Public Member Functions

- static std::string typeAsStr (YPropertyType type)

  Returns a string description of a property type.

5.106.1 Detailed Description

Class for widget properties.

Definition at line 51 of file YProperty.h.

5.106.2 Constructor & Destructor Documentation

5.106.2.1 YProperty()

```
YProperty::YProperty (
            const std::string & name,
            YPropertyType type,
            bool isReadOnly = false )  [inline]
```

Constructor: Create a property with the specified name and type.

'isReadOnly' is for properties that cannot be set, only retrieved.

Definition at line 58 of file YProperty.h.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YProperty.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YProperty.cc

5.107 YPropertyEditor Class Reference

An internal helper class for displaying the widget property editor in the spy dialog.

`#include <YPropertyEditor.h>`

Public Member Functions

- YPropertyEditor (YWidget *widget)
  Constructor.
- bool edit (const std::string &property)
  Display a popup for editing a widget property.

5.107.1 Detailed Description

An internal helper class for displaying the widget property editor in the spy dialog.

See also

YDialogSpy

Definition at line 32 of file YPropertyEditor.h.

5.107.2 Constructor & Destructor Documentation

5.107.2.1 YPropertyEditor()

```
YPropertyEditor::YPropertyEditor (
            YWidget * widget )
```

Constructor.

Parameters

widget	the target widget

Definition at line 301 of file YPropertyEditor.cc.

5.107.3 Member Function Documentation

5.107.3.1 edit()

```
bool YPropertyEditor::edit (
            const std::string & property )
```

Display a popup for editing a widget property.

Parameters

property	name of the property to edit

Returns

true if the property has been changed, false otherwise

Definition at line 295 of file YPropertyEditor.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YPropertyEditor.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YPropertyEditor.cc

5.108 YPropertyEditorPriv Class Reference

Public Member Functions

- **YPropertyEditorPriv** (YWidget *widget)
- bool **edit** (const string &property)

5.108.1 Detailed Description

Definition at line 40 of file YPropertyEditor.cc.

The documentation for this class was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YPropertyEditor.cc

5.109 YPropertySet Class Reference

A set of properties to check names and types against.

`#include <YProperty.h>`

Public Types

- typedef std::vector< YProperty >::const_iterator **const_iterator**

Public Member Functions

- YPropertySet ()
  Constructor.
- void check (const std::string &propertyName) const
  Check if a property 'propertyName' exists in this property set.
- void check (const std::string &propertyName, YPropertyType type) const
  Check if a property 'propertyName' exists in this property set.
- void check (const YProperty &prop) const
  Same as above, overloaded for convenience.
- bool contains (const std::string &propertyName) const throw ()
  Check if a property 'propertyName' exists in this property set.
- bool contains (const std::string &propertyName, YPropertyType type) const
  Check if a property 'propertyName' exists in this property set.
- bool contains (const YProperty &prop) const
  Same as above, overloaded for convenience.
- bool isEmpty () const
  Returns 'true' if this property set does not contain anything.
- int size () const
  Returns the number of properties in this set.
- void add (const YProperty &prop)
  Add a property to this property set.
- void add (const YPropertySet &otherSet)
  Adds all properties of another property set.
- const_iterator propertiesBegin () const
  Returns an iterator that points to the first property in this set.
- const_iterator propertiesEnd () const
  Returns an iterator that points after the last property in this set.

5.109.1 Detailed Description

A set of properties to check names and types against.

Definition at line 197 of file YProperty.h.

5.109.2 Member Function Documentation

5.109.2.1 add()

```
void YPropertySet::add (
            const YPropertySet & otherSet )
```

Adds all properties of another property set.

If that other set contains duplicates (properties that are already in this set), those others will never be found with lookup().

Definition at line 153 of file YProperty.cc.

5.109.2.2 check() [1/2]

```
void YPropertySet::check (
            const std::string & propertyName ) const
```

Check if a property 'propertyName' exists in this property set.

Throw a YUIUnknownPropertyException if it does not exist. Use YPropertySet::contains() for a check that simply returns 'false' if it does not exist.

Definition at line 88 of file YProperty.cc.

5.109.2.3 check() [2/2]

```
void YPropertySet::check (
            const std::string & propertyName,
            YPropertyType type ) const
```

Check if a property 'propertyName' exists in this property set.

Throw a YUIUnknownPropertyException if it does not exist.

If there is a property with that name, check also the expected type against 'type'. If the types don't match, throw a YUIPropertyTypeMismatchException. If the property is read-only, throw a YUISetReadOnlyPropertyException.

Definition at line 96 of file YProperty.cc.

5.109.2.4 contains() [1/2]

```
bool YPropertySet::contains (
             const std::string & propertyName ) const throw ( )
```

Check if a property 'propertyName' exists in this property set.

Returns 'true' if it exists, 'false' if not.

Use YPropertySet::check() for a check that throws exceptions if there is no such property.

Definition at line 107 of file YProperty.cc.

5.109.2.5 contains() [2/2]

```
bool YPropertySet::contains (
             const std::string & propertyName,
             YPropertyType type ) const
```

Check if a property 'propertyName' exists in this property set.

Returns 'true' if it exists, 'false' if not.

If there is a property with that name, check also the expected type against 'type'. If the types don't match, throw a YUIPropertyTypeMismatchException.

If the property is read-only, throw a YUISetReadOnlyPropertyException.

Use YPropertySet::check() for a check that throws exceptions if there is no such property.

Definition at line 122 of file YProperty.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YProperty.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YProperty.cc

5.110 YPropertyValue Class Reference

Transport class for the value of simple properties.

```
#include <YProperty.h>
```

Public Member Functions

- YPropertyValue (const std::string &str)

  Constructor for string properties.
- YPropertyValue (const char *str)

  *Constructor for const char * (string) properties.*
- YPropertyValue (bool b)

  Constructor for bool properties.
- YPropertyValue (YInteger num)

  Constructor for numerical (YCP integer) properties.
- YPropertyValue (int num)

  Constructor for numerical (YCP integer) properties.
- **YPropertyValue** (YPropertyType type)
- YPropertyValue ()

  Default constructor.
- ~YPropertyValue ()

  Destructor.
- bool operator== (const YPropertyValue &other) const

  Equality operator, can compare with another YPropertyValue.
- bool operator!= (const YPropertyValue &other) const

  Inequality operator.
- YPropertyType type () const

  Returns the type of this property value.
- std::string typeAsStr () const

  Returns the type of this property value as string.
- std::string stringVal () const

  Methods to get the value of this property.
- bool **boolVal** () const
- YInteger **integerVal** () const

5.110.1 Detailed Description

Transport class for the value of simple properties.

More complex properties (lists of items, tree descriptions, ...) have to be handled specifically someplace else, but most properties are of simple types and can be treated in similar ways.

Definition at line 104 of file YProperty.h.

5.110.2 Member Function Documentation

5.110.2.1 operator"!=()

```
bool YPropertyValue::operator!= (
            const YPropertyValue & other ) const
```

Inequality operator.

Exceptions

YUIException	for incompatible property types

See also

operator==

Definition at line 76 of file YProperty.cc.

5.110.2.2 operator==()

```
bool YPropertyValue::operator== (
             const YPropertyValue & other ) const
```

Equality operator, can compare with another YPropertyValue.

Exceptions

YUIException	for incompatible property types

Returns

true if the value is the same

Definition at line 54 of file YProperty.cc.

5.110.2.3 stringVal()

```
std::string YPropertyValue::stringVal ( ) const  [inline]
```

Methods to get the value of this property.

Check with type() which one to use.

Definition at line 180 of file YProperty.h.

5.110.2.4 type()

```
YPropertyType YPropertyValue::type ( ) const  [inline]
```

Returns the type of this property value.

Use this to determine which xyVal() method to use.

Definition at line 169 of file YProperty.h.

The documentation for this class was generated from the following files:

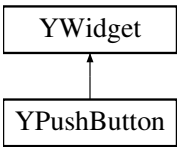
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YProperty.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YProperty.cc

5.111 YPushButton Class Reference

A push button; may have an icon, and a F-key shortcut.

```
#include <YPushButton.h>
```

Inheritance diagram for YPushButton:



Public Member Functions

- virtual ~YPushButton ()
  Destructor.
- virtual const char * widgetClass () const
  Return a descriptive name of this widget class for logging, debugging etc.
- std::string label () const
  Get the label (the text on the button).
- virtual void setLabel (const std::string &label)
  Set the label (the text on the button).
- virtual void setIcon (const std::string &iconName)
  Set this button's icon from an icon file in the UI's default icon directory.
- bool isDefaultButton () const
  Returns 'true' if this is the dialog's default button, i.e.
- virtual void setDefaultButton (bool def=true)
  Make this button the default button.
- virtual void setRole (YButtonRole role)

Set a predefined role for this button.

- YButtonRole role () const

  Return the role of this button.

- virtual void setFunctionKey (int fkey_no)

  Assign a function key to this widget (1 for F1, 2 for F2, etc.

- bool isHelpButton () const

  Returns 'true' if this is a "Help" button.

- virtual void setHelpButton (bool helpButton=true)

  Make this button a help button.

- bool isRelNotesButton () const

  Returns 'true' if this is a "Release Notes" button.

- virtual void setRelNotesButton (bool relNotesButton=true)

  Make this button a release notes button.

- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.

- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.

- virtual const YPropertySet & propertySet ()

  Return this class's property set.

- virtual std::string shortcutString () const

  Get the string of this widget that holds the keyboard shortcut.

- virtual void setShortcutString (const std::string &str)

  Set the string of this widget that holds the keyboard shortcut.

- virtual void activate ()=0

  Activate the button.

Protected Member Functions

- YPushButton (YWidget *parent, const std::string &label)

  Constructor.

5.111.1 Detailed Description

A push button; may have an icon, and a F-key shortcut.

Definition at line 37 of file YPushButton.h.

5.111.2 Member Function Documentation

5.111.2.1 activate()

```
virtual void YPushButton::activate ( )  [pure virtual]
```

Activate the button.

Can be used in tests to simulate user input.

Derived classes are required to implement this.

5.111.2.2 getProperty()

```
YPropertyValue YPushButton::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 245 of file YPushButton.cc.

5.111.2.3 isDefaultButton()

```
bool YPushButton::isDefaultButton ( ) const
```

Returns 'true' if this is the dialog's default button, i.e.

the one button that gets activated if the user hits the [Return] key anywhere in the dialog.

Definition at line 92 of file YPushButton.cc.

5.111.2.4 isHelpButton()

```
bool YPushButton::isHelpButton ( ) const
```

Returns 'true' if this is a "Help" button.

When activated, a help button will traverse up its widget hierarchy and search for the topmost widget with a helpText() set and display that help text in a pop-up dialog (with a local event loop).

NOTE that this is only done during YDialog::waitForEvent() (i.e. in YCP UI::WaitForEvent(), UI::UserInput(), UI::↩ TimeoutUserInput()) and not during YDialog::pollEvent() (i.e. YCP UI::PollInput()) since displaying the help text will block the application until the user closes the help text.

Definition at line 127 of file YPushButton.cc.

5.111.2.5 isRelNotesButton()

```
bool YPushButton::isRelNotesButton ( ) const
```

Returns 'true' if this is a "Release Notes" button.

NOTE that this is only done during YDialog::waitForEvent() (i.e. in YCP UI::WaitForEvent(), UI::UserInput(), UI::↩ TimeoutUserInput()) and not during YDialog::pollEvent() (i.e. YCP UI::PollInput()) since displaying the release notes will block the application until the user closes the text.

Definition at line 139 of file YPushButton.cc.

5.111.2.6 propertySet()

```
const YPropertySet & YPushButton::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 212 of file YPushButton.cc.

5.111.2.7 setDefaultButton()

```
void YPushButton::setDefaultButton (
             bool def = true )  [virtual]
```

Make this button the default button.

Derived classes should reimplement this, but call this base class function in the overwritten function.

Definition at line 98 of file YPushButton.cc.

5.111.2.8 setFunctionKey()

```
void YPushButton::setFunctionKey (
             int fkey_no )  [virtual]
```

Assign a function key to this widget (1 for F1, 2 for F2, etc.

; 0 for none)

Reimplemented from YWidget to map function keys to button roles.

Derived classes may want to overwrite this function, but they should call this base class function in the new function.

Reimplemented from YWidget.

Definition at line 186 of file YPushButton.cc.

5.111.2.9 setHelpButton()

```
void YPushButton::setHelpButton (
             bool helpButton = true )  [virtual]
```

Make this button a help button.

Derived classes are free to reimplement this, but they should call this base class method in the overloaded function.

Definition at line 133 of file YPushButton.cc.

5.111.2.10 setIcon()

```
virtual void YPushButton::setIcon (
             const std::string & iconName )  [inline], [virtual]
```

Set this button's icon from an icon file in the UI's default icon directory.

Clear the icon if the name is empty.

This default implementation does nothing. UIs that can handle icons can choose to overwrite this method.

Definition at line 77 of file YPushButton.h.

5.111.2.11 setLabel()

```
void YPushButton::setLabel (
             const std::string & label )  [virtual]
```

Set the label (the text on the button).

Derived classes are free to reimplement this, but they should call this base class method at the end of the overloaded function.

Definition at line 80 of file YPushButton.cc.

5.111.2.12 setProperty()

```
bool YPushButton::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This function may throw YUIPropertyExceptions.

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 230 of file YPushButton.cc.

5.111.2.13 setRelNotesButton()

```
void YPushButton::setRelNotesButton (
             bool relNotesButton = true )  [virtual]
```

Make this button a release notes button.

Derived classes are free to reimplement this, but they should call this base class method in the overloaded function.

Definition at line 145 of file YPushButton.cc.

5.111.2.14 setRole()

```
void YPushButton::setRole (
             YButtonRole role )  [virtual]
```

Set a predefined role for this button.

This is important when the button is a child of a YButtonBox so the layout can be arranged according to the conventions of the current UI or desktop environment.

See YButtonBox.h for more details. YButtonRole is defined in YTypes.h

The default is YCustomButton, i.e., no predefined role. setFunctionKey() uses some heuristics to map function keys to buttons:

```
F10 -> YOkButton
F9  -> YCancelButton
F1  -> YHelpButton
```

Derived classes are free to reimplement this, but they should call this base class function in the overwritten function.

Definition at line 154 of file YPushButton.cc.

5.111.2.15 setShortcutString()

```
virtual void YPushButton::setShortcutString (
             const std::string & str )  [inline], [virtual]
```

Set the string of this widget that holds the keyboard shortcut.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 215 of file YPushButton.h.

5.111.2.16 shortcutString()

```
virtual std::string YPushButton::shortcutString ( ) const  [inline], [virtual]
```

Get the string of this widget that holds the keyboard shortcut.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 208 of file YPushButton.h.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YPushButton.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YPushButton.cc

5.112 YPushButtonPrivate Struct Reference

Public Member Functions

- **YPushButtonPrivate** (const string &label)

Public Attributes

- string **label**
- bool **isDefaultButton**
- bool **setDefaultButtonRecursive**
- bool **isHelpButton**
- bool **isRelNotesButton**
- YButtonRole **role**

5.112.1 Detailed Description

Definition at line 38 of file YPushButton.cc.

The documentation for this struct was generated from the following file:

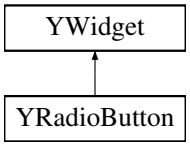
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YPushButton.cc

5.113 YRadioButton Class Reference

RadioButton: Widget for one-out-of-many selection.

```
#include <YRadioButton.h>
```

Inheritance diagram for YRadioButton:



Public Member Functions

- virtual ~YRadioButton ()

  Destructor: Removes the button from the radio button group.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- virtual bool value ()=0

  Get the current on/off value: 'true' if checked, 'false' if unchecked.
- virtual void setValue (bool checked)=0

  Set the radio button value (on/off).
- std::string label () const

  Get the label (the text on the RadioButton).
- virtual void setLabel (const std::string &label)

  Set the label (the text on the RadioButton).
- bool useBoldFont () const

  Returns 'true' if a bold font should be used.
- virtual void setUseBoldFont (bool bold=true)

  Indicate whether or not a bold font should be used.
- YRadioButtonGroup * buttonGroup ()

  Get a pointer to the radio button group this button belongs to.
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.
- virtual std::string shortcutString () const

  Get the string of this widget that holds the keyboard shortcut.
- virtual void setShortcutString (const std::string &str)

  Set the string of this widget that holds the keyboard shortcut.
- const char * userInputProperty ()

  The name of the widget property that will return user input.

Protected Member Functions

- YRadioButton (YWidget *parent, const std::string &label)

  Constructor.
- YRadioButtonGroup * findRadioButtonGroup () const

  Traverse the widget hierarchy upwards to find the corresponding YRadioButtonGroup, i.e.
- virtual void saveUserInput (YMacroRecorder *macroRecorder)

  Save the widget's user input to a macro recorder.

5.113.1 Detailed Description

RadioButton: Widget for one-out-of-many selection.

Only one RadioButton in a RadioBox (in a RadioButtonGroup) can be set to "on" at the same time. Setting any RadioButton of a RadioButtonGroup to "on" automatically sets all others in the same RadioButtonGroup to "off".

RadioButtons customarily have a distinct visual appearance from CheckBoxes:

```
( ) RadioButton 1
(*) RadioButton 2
( ) RadioButton 3

[ ] CheckBox 1
[*] CheckBox 2
[*] CheckBox 3
```

Definition at line 51 of file YRadioButton.h.

5.113.2 Constructor & Destructor Documentation

5.113.2.1 YRadioButton()

```
YRadioButton::YRadioButton (
            YWidget * parent,
            const std::string & label )  [protected]
```

Constructor.

Creates a new RadioButton with user-visible text 'label'. 'label' can and should contain a keyboard shortcut (designated with '&').

The caller has to take care to add this RadioButton to its RadioButtonGroup:

if (radioButton->buttonGroup()) radioButton->buttonGroup()->addRadioButton(radioButton);

This can't be done in the constructor because it would involve calling a virtual function, which doesn't work yet within the constructor.

Definition at line 61 of file YRadioButton.cc.

5.113.3 Member Function Documentation

5.113.3.1 findRadioButtonGroup()

```
YRadioButtonGroup * YRadioButton::findRadioButtonGroup ( ) const  [protected]
```

Traverse the widget hierarchy upwards to find the corresponding YRadioButtonGroup, i.e.

the class that controls the radio box behaviour (i.e. that makes sure that no more than one RadioButton is set to "on" at the same time).

Definition at line 176 of file YRadioButton.cc.

5.113.3.2 getProperty()

```
YPropertyValue YRadioButton::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw exceptions, for example

- if there is no property with that name

Reimplemented from YWidget.

Definition at line 150 of file YRadioButton.cc.

5.113.3.3 propertySet()

```
const YPropertySet & YRadioButton::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property set upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 113 of file YRadioButton.cc.

5.113.3.4 saveUserInput()

```
void YRadioButton::saveUserInput (
            YMacroRecorder * macroRecorder )  [protected], [virtual]
```

Save the widget's user input to a macro recorder.

Reimplemented from YWidget because only radio buttons that are on (no more than one per radio box) are recorded.

Reimplemented from YWidget.

Definition at line 195 of file YRadioButton.cc.

5.113.3.5 setLabel()

```
void YRadioButton::setLabel (
            const std::string & label )  [virtual]
```

Set the label (the text on the RadioButton).

Derived classes are free to reimplement this, but they should call this base class method at the end of the overloaded function.

Definition at line 88 of file YRadioButton.cc.

5.113.3.6 setProperty()

```
bool YRadioButton::setProperty (
            const std::string & propertyName,
            const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This method may throw exceptions, for example

- if there is no property with that name
- if the expected type and the type mismatch
- if the value is out of range

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 134 of file YRadioButton.cc.

5.113.3.7 setShortcutString()

```
virtual void YRadioButton::setShortcutString (
            const std::string & str )  [inline], [virtual]
```

Set the string of this widget that holds the keyboard shortcut.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 177 of file YRadioButton.h.

5.113.3.8 setUseBoldFont()

```
void YRadioButton::setUseBoldFont (
            bool bold = true )  [virtual]
```

Indicate whether or not a bold font should be used.

Derived classes are free to reimplement this, but they should call this base class method at the end of the overloaded function.

Definition at line 106 of file YRadioButton.cc.

5.113.3.9 setValue()

```
virtual void YRadioButton::setValue (
            bool checked )  [pure virtual]
```

Set the radio button value (on/off).

Derived classes are required to implement this.

5.113.3.10 shortcutString()

```
virtual std::string YRadioButton::shortcutString ( ) const  [inline], [virtual]
```

Get the string of this widget that holds the keyboard shortcut.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 170 of file YRadioButton.h.

5.113.3.11 userInputProperty()

```
const char* YRadioButton::userInputProperty ( )  [inline], [virtual]
```

The name of the widget property that will return user input.

Inherited from YWidget.

Reimplemented from YWidget.

Definition at line 184 of file YRadioButton.h.

5.113.3.12 value()

```
virtual bool YRadioButton::value ( )  [pure virtual]
```

Get the current on/off value: 'true' if checked, 'false' if unchecked.

Derived classes are required to implement this.

5.113.3.13 widgetClass()

```
virtual const char* YRadioButton::widgetClass ( ) const  [inline], [virtual]
```

Returns a descriptive name of this widget class for logging, debugging etc.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 84 of file YRadioButton.h.

The documentation for this class was generated from the following files:

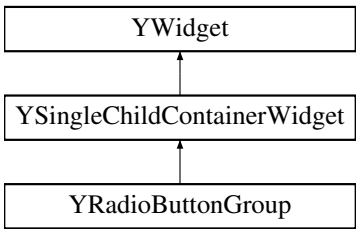
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YRadioButton.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YRadioButton.cc

5.114 YRadioButtonGroup Class Reference

A group of YRadioButton widgets.

```
#include <YRadioButtonGroup.h>
```

Inheritance diagram for YRadioButtonGroup:



Public Member Functions

- virtual ~YRadioButtonGroup ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- YRadioButton * currentButton () const

  Find the currently selected button.
- YRadioButton * value () const

  The same as currentButton() above for convenience.
- virtual void addRadioButton (YRadioButton *radioButton)

  Add a RadioButton to this button group.
- virtual void removeRadioButton (YRadioButton *radioButton)

  Remove a RadioButton from this button group.
- void uncheckOtherButtons (YRadioButton *radioButton)

  Unchecks all radio buttons except one.
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.

Protected Member Functions

- YRadioButtonGroup (YWidget *parent)

  Constructor.
- YRadioButtonListConstIterator radioButtonsBegin () const

  Return an iterator that points to the first RadioButton of this button group.
- YRadioButtonListConstIterator radioButtonsEnd () const

  Return an iterator that points behind the last RadioButton of this button group.
- int radioButtonsCount () const

  Return the number of RadioButtons in this button group.

5.114.1 Detailed Description

A group of YRadioButton widgets.

Definition at line 41 of file YRadioButtonGroup.h.

5.114.2 Member Function Documentation

5.114.2.1 addRadioButton()

```
void YRadioButtonGroup::addRadioButton (
             YRadioButton * radioButton )  [virtual]
```

Add a RadioButton to this button group.

RadioButtons are required to call this in their constructor.

Derived classes are free to overload this, but they should call this base class function in the overloaded function.

Definition at line 83 of file YRadioButtonGroup.cc.

5.114.2.2 getProperty()

```
YPropertyValue YRadioButtonGroup::getProperty (
             const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw exceptions, for example

- if there is no property with that name

Reimplemented from YWidget.

Definition at line 161 of file YRadioButtonGroup.cc.

5.114.2.3 propertySet()

```
const YPropertySet & YRadioButtonGroup::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property set upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 125 of file YRadioButtonGroup.cc.

5.114.2.4 radioButtonsBegin()

```
YRadioButtonListConstIterator YRadioButtonGroup::radioButtonsBegin ( ) const  [protected]
```

Return an iterator that points to the first RadioButton of this button group.

Note that RadioButtons in this group may be direct or indirect children of the group, so don't confuse this with YWidget↩ ::widgetsBegin().

Definition at line 62 of file YRadioButtonGroup.cc.

5.114.2.5 removeRadioButton()

```
void YRadioButtonGroup::removeRadioButton (
             YRadioButton * radioButton )  [virtual]
```

Remove a RadioButton from this button group.

RadioButtons are required to call this in their destructor, but only if the button group is not also in the process of being destroyed (otherwise there may be race conditions with child widgets already destroyed):

```
if ( ! buttonGroup()->beingDestroyed )
    buttonGroup()->removeRadioButton( this );
```

Definition at line 90 of file YRadioButtonGroup.cc.

5.114.2.6 setProperty()

```
bool YRadioButtonGroup::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This method may throw exceptions, for example

- if there is no property with that name
- if the expected type and the type mismatch
- if the value is out of range

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 145 of file YRadioButtonGroup.cc.

5.114.2.7 uncheckOtherButtons()

```
void YRadioButtonGroup::uncheckOtherButtons (
            YRadioButton * radioButton )
```

Unchecks all radio buttons except one.

This method can be used by a concrete UI (the Qt UI or the NCurses UI) in the implementation of YRadioButton::setValue().

Definition at line 97 of file YRadioButtonGroup.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YRadioButtonGroup.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YRadioButtonGroup.cc

5.115 YRadioButtonGroupPrivate Struct Reference

Public Attributes

- YRadioButtonList **buttonList**

5.115.1 Detailed Description

Definition at line 36 of file YRadioButtonGroup.cc.

The documentation for this struct was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YRadioButtonGroup.cc

5.116 YRadioButtonPrivate Struct Reference

Public Member Functions

- YRadioButtonPrivate (const string &label)

  Constructor.

Public Attributes

- string **label**
- YRadioButtonGroup * **radioButtonGroup**
- bool **useBoldFont**

5.116.1 Detailed Description

Definition at line 40 of file YRadioButton.cc.

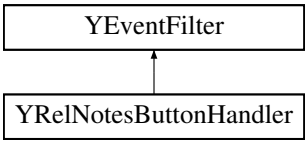
The documentation for this struct was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YRadioButton.cc

5.117 YRelNotesButtonHandler Class Reference

Helper class: Event filter that handles "ReleaseNotes" buttons.

Inheritance diagram for YRelNotesButtonHandler:



Public Member Functions

- **YRelNotesButtonHandler** (YDialog *dialog)
- YEvent * filter (YEvent *event)

  The heart of the matter: The event filter function.

Additional Inherited Members

5.117.1 Detailed Description

Helper class: Event filter that handles "ReleaseNotes" buttons.

Definition at line 105 of file YDialog.cc.

5.117.2 Member Function Documentation

5.117.2.1 filter()

```
YEvent* YRelNotesButtonHandler::filter (
            YEvent * event )  [inline], [virtual]
```

The heart of the matter: The event filter function.

Derived classes are required to implement this.

This method can inspect the event it receives. Hint: event->widget() is typically the most interesting information.

This method can react on individual events and

- consume the event (i.e., return 0)
- pass the event through unchanged (simply return the event)
- create a new event (typically based on data in the received event).

If 0 or a new event (another value than 'event') is returned, the old event is deleted. If a value different from 'event' or 0 is returned, that value is assumed to be a pointer to a newly created event. The dialog will assume ownership of that event and delete it when appropriate.

Note: Never delete 'event' in this method! Return 0 or a new event instead; the caller will take care of deleting the old event.

Implements YEventFilter.

Definition at line 114 of file YDialog.cc.

The documentation for this class was generated from the following file:

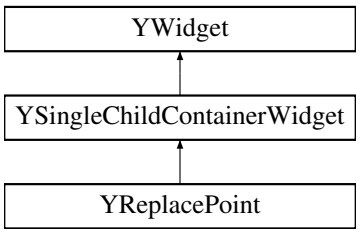
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YDialog.cc

5.118 YReplacePoint Class Reference

A placeholder that can have its contents exchanged, using ReplaceWidget.

`#include <YReplacePoint.h>`

Inheritance diagram for YReplacePoint:



Public Member Functions

- virtual void showChild ()

  Show a newly added child.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.

Protected Member Functions

- YReplacePoint (YWidget *parent)

  Constructor.

5.118.1 Detailed Description

A placeholder that can have its contents exchanged, using ReplaceWidget.

Definition at line 33 of file YReplacePoint.h.

5.118.2 Member Function Documentation

5.118.2.1 showChild()

```
void YReplacePoint::showChild ( )  [virtual]
```

Show a newly added child.

The application using the ReplacePoint is required to call this after the new child is created.

This cannot be done in the child widget's constructor (e.g., by overwriting YWidget::addChild()) since at that point YWidget::widgetRep() may or may not be initialized yet.

This default implementation does nothing. Derived classes should reimplement this to make new child widgets visible.

Definition at line 35 of file YReplacePoint.cc.

The documentation for this class was generated from the following files:

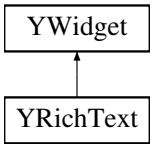
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YReplacePoint.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YReplacePoint.cc

5.119 YRichText Class Reference

Text formatted with simple HTML-like tags, with "links" generating events.

`#include <YRichText.h>`

Inheritance diagram for YRichText:



Public Member Functions

- YRichText (YWidget *parent, const std::string &text, bool plainTextMode=false)

  Constructor.
- virtual ~YRichText ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- virtual void setValue (const std::string &newValue)

  Change the text content of the RichText widget.
- std::string value () const

  Return the text content of the RichText widget.
- void setText (const std::string &newText)

  Alias for setValue().
- std::string text () const

  Alias for value().
- bool plainTextMode () const

  Return 'true' if this RichText widget is in "plain text" mode, i.e.
- virtual void setPlainTextMode (bool on=true)

  Set this RichText widget's "plain text" mode on or off.
- bool autoScrollDown () const

  Return 'true' if this RichText widget should automatically scroll down when the text content is changed.
- virtual void setAutoScrollDown (bool on=true)

  Set this RichText widget's "auto scroll down" mode on or off.
- bool shrinkable () const

  Returns 'true' if this widget is "shrinkable", i.e.
- void setShrinkable (bool shrinkable=true)

  Make this widget shrinkable, i.e.
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

Return this class's property set.

- virtual std::string vScrollValue () const

  Get the position value of the vertical scrollbar.

- virtual void setVScrollValue (const std::string &newValue)

  Set the position value of the vertical scrollbar.

- virtual std::string hScrollValue () const

  Get the position value of the horizontal scrollbar.

- virtual void setHScrollValue (const std::string &newValue)

  Set the position value of the horizontal scrollbar.

- virtual void activateLink (const std::string &url)=0

  Derived classes should implement this, method is used to trigger event like user has pressed the link in the RichText.

Protected Attributes

- ImplPtr< YRichTextPrivate > **priv**

Additional Inherited Members

5.119.1 Detailed Description

Text formatted with simple HTML-like tags, with "links" generating events.

Definition at line 40 of file YRichText.h.

5.119.2 Constructor & Destructor Documentation

5.119.2.1 YRichText()

```
YRichText::YRichText (
            YWidget * parent,
            const std::string & text,
            bool plainTextMode = false )
```

Constructor.

'plainTextMode' indicates that the text should be treated as plain text, i.e. any HTML-like tags in the text should not be interpreted in any way.

Definition at line 57 of file YRichText.cc.

5.119.3 Member Function Documentation

5.119.3.1 autoScrollDown()

```
bool YRichText::autoScrollDown ( ) const
```

Return 'true' if this RichText widget should automatically scroll down when the text content is changed.

This is useful for progress displays and log files.

Definition at line 98 of file YRichText.cc.

5.119.3.2 getProperty()

```
YPropertyValue YRichText::getProperty (
             const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 165 of file YRichText.cc.

5.119.3.3 hScrollValue()

```
std::string YRichText::hScrollValue ( ) const  [virtual]
```

Get the position value of the horizontal scrollbar.

Might not be available in all frontends.

Definition at line 191 of file YRichText.cc.

5.119.3.4 plainTextMode()

```
bool YRichText::plainTextMode ( ) const
```

Return 'true' if this RichText widget is in "plain text" mode, i.e.

does not try to interpret RichText/HTML tags.

Definition at line 86 of file YRichText.cc.

5.119.3.5 propertySet()

```
const YPropertySet & YRichText::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 123 of file YRichText.cc.

5.119.3.6 setAutoScrollDown()

```
void YRichText::setAutoScrollDown (
             bool on = true )  [virtual]
```

Set this RichText widget's "auto scroll down" mode on or off.

Derived classes may want to reimplement this, but they should call this base class function in the new function.

Definition at line 104 of file YRichText.cc.

5.119.3.7 setHScrollValue()

```
void YRichText::setHScrollValue (
             const std::string & newValue )  [virtual]
```

Set the position value of the horizontal scrollbar.

Only values previously obtained using hScrollValue() and some special values are allowed.

The special values are:

"minimum" Moves the scrollbar to the start.

"maximum" Moves the scrollbar to the end.

The meaning of start and end can depend on the text direction (LTR or RTL).

Might not be available in all frontends.

Definition at line 197 of file YRichText.cc.

5.119.3.8 setPlainTextMode()

```
void YRichText::setPlainTextMode (
             bool on = true )  [virtual]
```

Set this RichText widget's "plain text" mode on or off.

Derived classes may want to reimplement this, but they should call this base class function in the new function.

Definition at line 92 of file YRichText.cc.

5.119.3.9 setProperty()

```
bool YRichText::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This function may throw YUIPropertyExceptions.

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 147 of file YRichText.cc.

5.119.3.10 setShrinkable()

```
void YRichText::setShrinkable (
            bool shrinkable = true )
```

Make this widget shrinkable, i.e.

very small in layouts.

This method is intentionally not virtual because it doesn't have any immediate effect; it is only needed in preferredWidth() / preferredHeight().

Definition at line 116 of file YRichText.cc.

5.119.3.11 setValue()

```
void YRichText::setValue (
            const std::string & newValue )  [virtual]
```

Change the text content of the RichText widget.

Derived classes should overwrite this function, but call this base class function in the new function.

Definition at line 74 of file YRichText.cc.

5.119.3.12 setVScrollValue()

```
void YRichText::setVScrollValue (
            const std::string & newValue )  [virtual]
```

Set the position value of the vertical scrollbar.

Only values previously obtained using vScrollValue() and some special values are allowed.

The special values are:

"minimum" Moves the scrollbar to the start.

"maximum" Moves the scrollbar to the end.

Might not be available in all frontends.

Definition at line 186 of file YRichText.cc.

5.119.3.13 shrinkable()

```
bool YRichText::shrinkable ( ) const
```

Returns 'true' if this widget is "shrinkable", i.e.

it should be very small by default.

Definition at line 110 of file YRichText.cc.

5.119.3.14 vScrollValue()

```
std::string YRichText::vScrollValue ( ) const  [virtual]
```

Get the position value of the vertical scrollbar.

Might not be available in all frontends.

Definition at line 180 of file YRichText.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YRichText.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YRichText.cc

5.120 YRichTextPrivate Struct Reference

Public Member Functions

- YRichTextPrivate (const string &text, bool plainTextMode)

  Constructor.

Public Attributes

- string **text**
- bool **plainTextMode**
- bool **autoScrollDown**
- bool **shrinkable**

5.120.1 Detailed Description

Definition at line 36 of file YRichText.cc.

The documentation for this struct was generated from the following file:

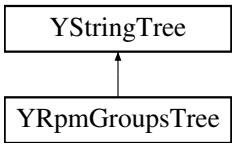
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YRichText.cc

5.121 YRpmGroupsTree Class Reference

This was an efficient storage for RPM group tags.

`#include <YRpmGroupsTree.h>`

Inheritance diagram for YRpmGroupsTree:



Public Member Functions

- YStringTreeItem * **addRpmGroup** (const std::string &rpmGroup)
- std::string **rpmGroup** (const YStringTreeItem *node)
- std::string **translatedRpmGroup** (const YStringTreeItem *node)
- void **addFallbackRpmGroups** ()

Additional Inherited Members

5.121.1 Detailed Description

This was an efficient storage for RPM group tags.

THIS CLASS IS OBSOLETE. DO NOT USE THIS ANYMORE.

Definition at line 41 of file YRpmGroupsTree.h.

The documentation for this class was generated from the following files:

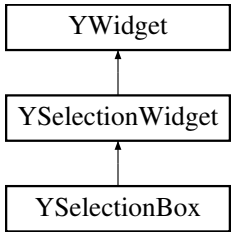
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YRpmGroupsTree.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YRpmGroupsTree.cc

5.122 YSelectionBox Class Reference

Selection box: List box that displays a (scrollable) list of items from which the user can select exactly one.

`#include <YSelectionBox.h>`

Inheritance diagram for YSelectionBox:



Public Member Functions

- virtual ~YSelectionBox ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- bool shrinkable () const

  Return 'true' if this SelectionBox should be very small.
- virtual void setShrinkable (bool shrinkable=true)

  Make this SelectionBox very small.
- bool immediateMode () const

  Deliver even more events than with notify() set.
- void setImmediateMode (bool on=true)

  Set immediateMode() on or off.
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.
- const char * userInputProperty ()

  The name of the widget property that will return user input.

Protected Member Functions

- YSelectionBox (YWidget *parent, const std::string &label)

  Constructor.

5.122.1 Detailed Description

Selection box: List box that displays a (scrollable) list of items from which the user can select exactly one.

Each item has a label text and an optional icon (*).

This widget displays a number of items at once (as screen space permits). If there is little screen space, you might consider using a ComboBox instead which (in non-editable mode which is the default) displays just one item (the selected item) right away and the others in a pop-up dialog upon mouse click or keypress.

The selection box also has a caption label that is displayed above the list. The hotkey displayed in that caption label will move the keyboard focus into the list.

If multiple columns are needed, use the YTable widget instead. For tree-like structures, use the YTree widget. Use YMultiSelectionBox if more than one item can be selected.

(*) Not all UIs (in particular not text-based UIs) support displaying icons, so an icon should never be an exclusive means to display any kind of information.

Definition at line 56 of file YSelectionBox.h.

5.122.2 Member Function Documentation

5.122.2.1 getProperty()

```
YPropertyValue YSelectionBox::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 141 of file YSelectionBox.cc.

5.122.2.2 immediateMode()

```
bool YSelectionBox::immediateMode ( ) const
```

Deliver even more events than with notify() set.

For YSelectionBox, this is relevant mostly for the NCurses UI:

In graphical UIs like the Qt UI, the user can use the mouse to select an item in a selection box. With notify() set, this will send an event right away (i.e., it will make UserInput and related return, while normally it would only return when the user clicks a PushButton).

In the NCurses UI, there is no mouse, so the user has to use the cursor keys to move to the item he wants to select. In immediateMode(), every cursor key press will make the selection box send an event. Without immediateMode(), the NCSelectionBox will wait until the user hits the [Return] key until an event is sent. Depending on what the application does upon each selection box event, immediateMode() might make the application less responsive.

Definition at line 80 of file YSelectionBox.cc.

5.122.2.3 propertySet()

```
const YPropertySet & YSelectionBox::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 96 of file YSelectionBox.cc.

5.122.2.4 setProperty()

```
bool YSelectionBox::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This function may throw YUIPropertyExceptions.

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 122 of file YSelectionBox.cc.

5.122.2.5 setShrinkable()

```
void YSelectionBox::setShrinkable (
             bool shrinkable = true )  [virtual]
```

Make this SelectionBox very small.

This will take effect only upon the next geometry management run.

Derived classes can overwrite this, but should call this base class function in the new function.

Definition at line 74 of file YSelectionBox.cc.

5.122.2.6 userInputProperty()

```
const char* YSelectionBox::userInputProperty ( )  [inline], [virtual]
```

The name of the widget property that will return user input.

Inherited from YWidget.

Reimplemented from YWidget.

Definition at line 149 of file YSelectionBox.h.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSelectionBox.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSelectionBox.cc

5.123 YSelectionBoxPrivate Struct Reference

Public Attributes

- bool **shrinkable**
- bool **immediateMode**

5.123.1 Detailed Description

Definition at line 36 of file YSelectionBox.cc.

The documentation for this struct was generated from the following file:

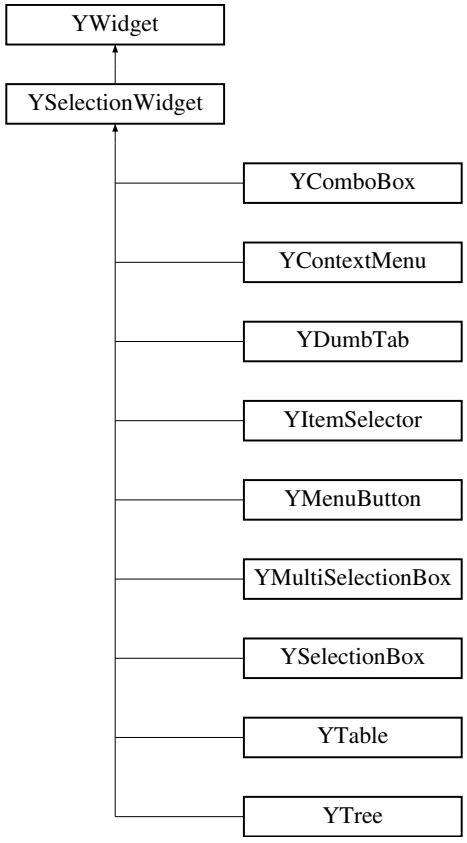
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSelectionBox.cc

5.124 YSelectionWidget Class Reference

Base class for various kinds of multi-value widgets.

`#include <YSelectionWidget.h>`

Inheritance diagram for YSelectionWidget:



Public Member Functions

- virtual ~YSelectionWidget ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- std::string label () const

  Return this widget's label (the caption above the item list).
- virtual void setLabel (const std::string &newLabel)

  Change this widget's label (the caption above the item list).
- virtual void addItem (YItem *item_disown)

  Add one item.
- void addItem (const std::string &itemLabel, bool selected=false)

  Overloaded for convenience: Add an item by string.
- void addItem (const std::string &itemLabel, const std::string &iconName, bool selected=false)

  Overloaded for convenience: Add an item with a text and an icon.
- virtual void addItems (const YItemCollection &itemCollection)

  Add multiple items.
- virtual void deleteAllItems ()

  Delete all items.
- void setItems (const YItemCollection &itemCollection)

  Delete all items and add new items.
- YItemIterator itemsBegin ()

  Return an iterator that points to the first item.
- YItemConstIterator **itemsBegin** () const
- YItemIterator itemsEnd ()

  Return an iterator that points behind the last item.
- YItemConstIterator **itemsEnd** () const
- bool hasItems () const

  Return 'true' if this widget has any items.
- int itemsCount () const

  Return the number of items.
- YItem * firstItem () const

  Return the first item or 0 if there is none.
- virtual YItem * selectedItem ()

  Return the (first) selected item or 0 if none is selected.
- virtual YItemCollection selectedItems ()

  Return all selected items.
- bool hasSelectedItem ()

  Return 'true' if any item is selected.
- virtual void selectItem (YItem *item, bool selected=true)

  Select or deselect an item.
- virtual void setItemStatus (YItem *item, int status)

  Set the status of an item.
- virtual void deselectAllItems ()

  Deselect all items.
- void setIconBasePath (const std::string &basePath)

Set this widget's base path where to look up icons.

- std::string iconBasePath () const

  Return this widget's base path where to look up icons as set with setIconBasePath().

- std::string iconFullPath (const std::string &iconName) const

  Return the full path + file name for the specified icon name.

- std::string iconFullPath (YItem *item) const

  Return the full path + file name for the icon of the specified item.

- bool itemsContain (YItem *item) const

  Return 'true' if this widget's items contain the specified item.

- YItem * findItem (const std::string &itemLabel) const

  Find the (first) item with the specified label.

- virtual std::string shortcutString () const

  Get the string of this widget that holds the keyboard shortcut.

- virtual void setShortcutString (const std::string &str)

  Set the string of this widget that holds the keyboard shortcut.

- void dumpItems () const

  Dump all items and their selection state to the log.

- bool enforceSingleSelection () const

  Return 'true' if this base class should enforce single selection.

Protected Member Functions

- YSelectionWidget (YWidget *parent, const std::string &label, bool enforceSingleSelection, bool recursiveSelection=false)

  Constructor.

- void setEnforceSingleSelection (bool on)

  Set single selection mode on or off.

- void setEnforceInitialSelection (bool on)

  In single selection mode, enforce selecting an initial item ('true' by default).

- bool enforceInitialSelection () const

  Return 'true' if this class enforces an initial selection.

- bool recursiveSelection () const

  Return 'true' if this base class should select children recursively.

- YItem * findSelectedItem (YItemConstIterator begin, YItemConstIterator end)

  Recursively try to find the first selected item between iterators 'begin' and 'end'.

- void findSelectedItems (YItemCollection &selectedItems, YItemConstIterator begin, YItemConstIterator end)

  Recursively find all selected items between iterators 'begin' and 'end' and add each of them to the 'selectedItems' YItem↩ Collection.

- void deselectAllItems (YItemIterator begin, YItemIterator end)

  Recursively deselect all items between iterators 'begin' and 'end'.

- YItem * findItem (const std::string &wantedItemLabel, YItemConstIterator begin, YItemConstIterator end) const

  Recursively try to find an item with label 'wantedItemLabel' between iterators 'begin' and 'end'.

- bool itemsContain (YItem *wantedItem, YItemConstIterator begin, YItemConstIterator end) const

  Recursively check if 'wantedItem' is between iterators 'begin' and 'end'.

- YItem * itemAt (int index) const

  Return the item at index 'index' (from 0) or 0 if there is no such item.

5.124.1 Detailed Description

Base class for various kinds of multi-value widgets.

- YSelectionBox, YMultiSelectionBox, YComboBox
- YContextMenu, YMenuButton
- YTable
- YTree
- YDumbTab

Definition at line 42 of file YSelectionWidget.h.

5.124.2 Constructor & Destructor Documentation

5.124.2.1 YSelectionWidget()

```
YSelectionWidget::YSelectionWidget (
            YWidget * parent,
            const std::string & label,
            bool enforceSingleSelection,
            bool recursiveSelection = false )  [protected]
```

Constructor.

'enforceSingleSelection' indicates if this base class should enforce single selection when items are added or when items are selected from the application. Note that single selection can also mean that no item is selected.

Definition at line 59 of file YSelectionWidget.cc.

5.124.3 Member Function Documentation

5.124.3.1 addItem() [1/2]

```
void YSelectionWidget::addItem (
            const std::string & itemLabel,
            const std::string & iconName,
            bool selected = false )
```

Overloaded for convenience: Add an item with a text and an icon.

Note that not all UIs can display icons.

Definition at line 248 of file YSelectionWidget.cc.

5.124.3.2 addItem() [2/2]

```
void YSelectionWidget::addItem (
             YItem * item_disown )  [virtual]
```

Add one item.

This widget assumes ownership of the item object and will delete it in its destructor.

NOTE: For tree items, call this only for the toplevel items; all non-toplevel items are already owned by their respective parent items. Adding them to the parent widget will clash with this ownership.

Derived classes can overwrite this function, but they should call this base class function in the new implementation.

Reimplemented in YMenuButton, YContextMenu, and YDumbTab.

Definition at line 186 of file YSelectionWidget.cc.

5.124.3.3 addItems()

```
void YSelectionWidget::addItems (
             const YItemCollection & itemCollection )  [virtual]
```

Add multiple items.

For some UIs, this can be more efficient than calling addItem() multiple times.

Reimplemented in YTree, YContextMenu, and YMenuButton.

Definition at line 264 of file YSelectionWidget.cc.

5.124.3.4 deleteAllItems()

```
void YSelectionWidget::deleteAllItems ( )  [virtual]
```

Delete all items.

Derived classes can overwrite this function, but they should call this base class function in the new implementation.

Reimplemented in YMenuButton, and YContextMenu.

Definition at line 80 of file YSelectionWidget.cc.

5.124.3.5 deselectAllItems()

```
void YSelectionWidget::deselectAllItems ( )  [virtual]
```

Deselect all items.

Derived classes can overwrite this function, but they should call this base class function in the new implementation.

Definition at line 484 of file YSelectionWidget.cc.

5.124.3.6 findItem() [1/2]

```
YItem * YSelectionWidget::findItem (
            const std::string & itemLabel ) const
```

Find the (first) item with the specified label.

Return 0 if there is no item with that label.

Definition at line 506 of file YSelectionWidget.cc.

5.124.3.7 findItem() [2/2]

```
YItem * YSelectionWidget::findItem (
            const std::string & wantedItemLabel,
            YItemConstIterator begin,
            YItemConstIterator end ) const  [protected]
```

Recursively try to find an item with label 'wantedItemLabel' between iterators 'begin' and 'end'.

Return that item or 0 if there is none.

Definition at line 513 of file YSelectionWidget.cc.

5.124.3.8 findSelectedItem()

```
YItem * YSelectionWidget::findSelectedItem (
            YItemConstIterator begin,
            YItemConstIterator end )  [protected]
```

Recursively try to find the first selected item between iterators 'begin' and 'end'.

Return that item or 0 if there is none.

Definition at line 349 of file YSelectionWidget.cc.

5.124.3.9 iconFullPath() [1/2]

```
string YSelectionWidget::iconFullPath (
            const std::string & iconName ) const
```

Return the full path + file name for the specified icon name.

If iconBasePath is non-empty, it is prepended to the icon name. Otherwise, YUI::yApp()->iconLoader() and its icon search paths is used find the icon in one of them

If 'iconName' is empty, this will return an empty string.

Definition at line 155 of file YSelectionWidget.cc.

5.124.3.10 iconFullPath() [2/2]

```
string YSelectionWidget::iconFullPath (
            YItem * item ) const
```

Return the full path + file name for the icon of the specified item.

If iconBasePath is non-empty, it is prepended to the item's iconName. Otherwise, YUI::yApp()->iconLoader() and its icon search paths is used find the icon in one of them

If 'item' does not have an iconName specified, this will return an empty string.

Definition at line 177 of file YSelectionWidget.cc.

5.124.3.11 itemsBegin()

```
YItemConstIterator YSelectionWidget::itemsBegin ( )
```

Return an iterator that points to the first item.

For YSelectionWidgets that can have tree structures, this iterator will iterate over the toplevel items.

Important: Don't use this iterator to iterate over all items and check their "selected" state; that information might not always be up to date. Use the dedicated functions for that.

Definition at line 283 of file YSelectionWidget.cc.

5.124.3.12 itemsCount()

```
int YSelectionWidget::itemsCount ( ) const
```

Return the number of items.

For YSelectionWidgets that can have tree structures, this returns the number of toplevel items.

Definition at line 315 of file YSelectionWidget.cc.

5.124.3.13 selectedItems()

```
YItemCollection YSelectionWidget::selectedItems ( )  [virtual]
```

Return all selected items.

This is mostly useful for derived classes that allow selecting multiple items.

This function does not transfer ownership of those items to the caller, so don't try to delete them!

Reimplemented in YComboBox.

Definition at line 377 of file YSelectionWidget.cc.

5.124.3.14 selectItem()

```
void YSelectionWidget::selectItem (
             YItem * item,
             bool selected = true )  [virtual]
```

Select or deselect an item.

Notice that this is different from YItem::setSelected() because unlike the latter function, this function informs the parent widget of the selection change.

If only one item can be selected at any time (single selection), the derived class will make sure to deselect any previous selection, if applicable.

Derived classes should overwrite this function, but they should call this base class function at the new function's start (this will also check if the item really belongs to this widget and throw an exception if not).

Reimplemented in YComboBox.

Definition at line 414 of file YSelectionWidget.cc.

5.124.3.15 setEnforceInitialSelection()

```
void YSelectionWidget::setEnforceInitialSelection (
             bool on )  [protected]
```

In single selection mode, enforce selecting an initial item ('true' by default).

This is ignored in multi selection mode.

Definition at line 117 of file YSelectionWidget.cc.

5.124.3.16 setEnforceSingleSelection()

```
void YSelectionWidget::setEnforceSingleSelection (
             bool on )  [protected]
```

Set single selection mode on or off.

In single selection mode, only one item can be selected at any time.

If set, this base class enforces this when items are added or when items are selected from the application. Note that single selection can also mean that no item is selected.

Definition at line 137 of file YSelectionWidget.cc.

5.124.3.17 setIconBasePath()

```
void YSelectionWidget::setIconBasePath (
             const std::string & basePath )
```

Set this widget's base path where to look up icons.

If this is a relative path, YUI::qApp()->iconBasePath() is prepended.

Definition at line 143 of file YSelectionWidget.cc.

5.124.3.18 setItemStatus()

```
void YSelectionWidget::setItemStatus (
             YItem * item,
             int status )  [virtual]
```

Set the status of an item.

This is similar to selectItem(), but with numeric values.

This default implementation just calls selectItem() with 'status' converted to boolean. Derived classes can choose to make more detailed use of the numeric value.

Reimplemented in YItemSelector.

Definition at line 444 of file YSelectionWidget.cc.

5.124.3.19 setLabel()

```
void YSelectionWidget::setLabel (
             const std::string & newLabel )  [virtual]
```

Change this widget's label (the caption above the item list).

Derived classes should overwrite this function, but they should call this base class function in the new implementation.

Definition at line 105 of file YSelectionWidget.cc.

5.124.3.20 setShortcutString()

```
virtual void YSelectionWidget::setShortcutString (
             const std::string & str )  [inline], [virtual]
```

Set the string of this widget that holds the keyboard shortcut.

Reimplemented from YWidget.

Reimplemented from YWidget.

Reimplemented in YDumbTab.

Definition at line 279 of file YSelectionWidget.h.

5.124.3.21 shortcutString()

```
virtual std::string YSelectionWidget::shortcutString ( ) const  [inline], [virtual]
```

Get the string of this widget that holds the keyboard shortcut.

Reimplemented from YWidget.

Reimplemented from YWidget.

Reimplemented in YDumbTab.

Definition at line 272 of file YSelectionWidget.h.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSelectionWidget.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSelectionWidget.cc

5.125 YSelectionWidgetPrivate Struct Reference

Public Member Functions

- **YSelectionWidgetPrivate** (const string &label, bool enforceSingleSelection, bool recursiveSelection)

Public Attributes

- string **label**
- bool **enforceSingleSelection**
- bool **enforceInitialSelection**
- bool **recursiveSelection**
- string **iconBasePath**
- YItemCollection **itemCollection**

5.125.1 Detailed Description

Definition at line 37 of file YSelectionWidget.cc.

The documentation for this struct was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSelectionWidget.cc

5.126 YSettings Class Reference

Settings for libyui.

`#include <YSettings.h>`

Static Public Member Functions

- static void setProgDir (std::string directory)

  This can be used to set a subdir beneath PLUGINDIR or THEMEDIR, where your program stores a custom plugin or theme.
- static std::string progDir ()

  Returns the value of your program's subdir.
- static void setIconDir (std::string directory)

  This can be used to set a subdir ICONDIR, where your program stores a custom icons.
- static std::string iconDir ()

  Returns the value of your program's icons subdir.
- static void setThemeDir (std::string directory)

  This can be used to set a subdir THEMEDIR, where your program stores a custom icons.
- static std::string themeDir ()

  Returns the value of your program's theme subdir.
- static void setLocaleDir (std::string directory)

  This can be used to set a subdir LOCALEDIR, where your program stores translations.
- static std::string localeDir ()

  Returns the value of your program's locale subdir.
- static void loadedUI (std::string ui)

  This can be used to set the loaded UI-backend.
- static std::string loadedUI ()

  Returns the value of the loaded UI-backend.

Static Protected Member Functions

- static void loadedUI (std::string ui, bool force)

  This can be used to set the loaded UI-backend.

5.126.1 Detailed Description

Settings for libyui.

This singleton-object hold some presets for libyui.

Definition at line 49 of file YSettings.h.

5.126.2 Member Function Documentation

5.126.2.1 loadedUI() [1/2]

```
void YSettings::loadedUI (
            std::string ui )  [static]
```

This can be used to set the loaded UI-backend.

Once this is set, it can't be altered. If you do so although an exception will be thrown.

Definition at line 196 of file YSettings.cc.

5.126.2.2 loadedUI() [2/2]

```
void YSettings::loadedUI (
            std::string ui,
            bool force )  [static], [protected]
```

This can be used to set the loaded UI-backend.

Once this is set, it can't be altered, except if you force it. If you do so without force an exception will be thrown.

Definition at line 179 of file YSettings.cc.

5.126.2.3 setIconDir()

```
void YSettings::setIconDir (
            std::string directory )  [static]
```

This can be used to set a subdir ICONDIR, where your program stores a custom icons.

Once this is set, it can't be altered. If you do so although an exception will be thrown.

Definition at line 82 of file YSettings.cc.

5.126.2.4 setLocaleDir()

```
void YSettings::setLocaleDir (
             std::string directory )  [static]
```

This can be used to set a subdir LOCALEDIR, where your program stores translations.

Once this is set, it can't be altered. If you do so although an exception will be thrown.

Definition at line 147 of file YSettings.cc.

5.126.2.5 setProgDir()

```
void YSettings::setProgDir (
             std::string directory )  [static]
```

This can be used to set a subdir beneath PLUGINDIR or THEMEDIR, where your program stores a custom plugin or theme.

Once this is set, it can't be altered. If you do so although an exception will be thrown.

Definition at line 58 of file YSettings.cc.

5.126.2.6 setThemeDir()

```
void YSettings::setThemeDir (
             std::string directory )  [static]
```

This can be used to set a subdir THEMEDIR, where your program stores a custom icons.

Once this is set, it can't be altered. If you do so although an exception will be thrown.

Definition at line 113 of file YSettings.cc.

The documentation for this class was generated from the following files:

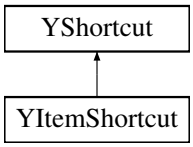
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSettings.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSettings.cc

5.127 YShortcut Class Reference

Helper class for shortcut management: This class holds data about the shortcut for one single widget.

`#include <YShortcut.h>`

Inheritance diagram for YShortcut:



Public Types

- enum { **None** = 0 }

  Marker for "no shortcut".

Public Member Functions

- YShortcut (YWidget *shortcut_widget)

  Constructor.
- virtual ~YShortcut ()

  Destructor.
- YWidget * widget () const

  Returns the YWidget this shortcut data belong to.
- const char * widgetClass () const

  Returns the textual representation of the widget class of the widget this shortcut data belongs to.
- bool isButton () const

  Returns 'true' if the widget that is associated with this shortcut is a button (derived from YPushButton).
- bool isWizardButton () const

  Returns 'true' if the widget that is associated with this shortcut is a wizard button (one of the navigation buttons of a wizard).
- std::string shortcutString ()

  Returns the complete shortcut string (which may or may not contain "&"), i.e.
- std::string cleanShortcutString ()

  Returns the shortcut string (from the widget's shortcut property) without any "&" markers.
- char preferred ()

  The preferred shortcut character, i.e.
- char shortcut ()

  The actual shortcut character.
- virtual void setShortcut (char newShortcut)

  Set (override) the shortcut character.
- void clearShortcut ()

  Clear the shortcut: Override the shortcut character with nothing.
- bool conflict ()

Query the internal 'conflict' marker.

- void setConflict (bool newConflictState=true)

  Set or unset the internal 'conflict' marker.

- int distinctShortcutChars ()

  Obtain the number of distinct valid shortcut characters in the shortcut string, i.e.

- bool hasValidShortcutChar ()

  Return true if this shortcut contains any character that would be valid as a shortcut character.

Static Public Member Functions

- static std::string cleanShortcutString (std::string shortcutString)

  Static version of the above for general use: Returns the specified string without any "&" markers.

- static char shortcutMarker ()

  Static function: Returns the character used for marking keyboard shortcuts.

- static std::string::size_type findShortcutPos (const std::string &str, std::string::size_type start_pos=0)

  Static function: Find the next occurrence of the shortcut marker ('&') in a string, beginning at starting position start_pos.

- static char findShortcut (const std::string &str, std::string::size_type start_pos=0)

  Static function: Find the next shortcut marker in a string, beginning at starting position start_pos.

- static bool isValid (char c)

  Returns 'true' if 'c' is a valid shortcut character, i.e.

- static char normalized (char c)

  Return the normalized version of shortcut character 'c', i.e.

- static std::string getShortcutString (const YWidget *widget)

  Obtain a widget's shortcut property - the string that contains "&" to designate a shortcut.

Protected Member Functions

- virtual std::string getShortcutString ()

  Obtain the the shortcut property of this shortcut's widget - the string that contains "&" to designate a shortcut.

Protected Attributes

- YWidget * **_widget**
- std::string **_shortcutString**
- bool **_shortcutStringCached**
- std::string **_cleanShortcutString**
- bool **_cleanShortcutStringCached**
- int **_preferred**
- int **_shortcut**
- bool **_conflict**
- bool **_isButton**
- bool **_isWizardButton**
- int **_distinctShortcutChars**

5.127.1 Detailed Description

Helper class for shortcut management: This class holds data about the shortcut for one single widget.

Definition at line 40 of file YShortcut.h.

5.127.2 Member Function Documentation

5.127.2.1 clearShortcut()

```
void YShortcut::clearShortcut ( )
```

Clear the shortcut: Override the shortcut character with nothing.

This may happen if a conflict cannot be resolved.

Definition at line 175 of file YShortcut.cc.

5.127.2.2 conflict()

```
bool YShortcut::conflict ( )  [inline]
```

Query the internal 'conflict' marker.

This class doesn't care about that flag, it just stores it for the convenience of higher-level classes.

Definition at line 131 of file YShortcut.h.

5.127.2.3 distinctShortcutChars()

```
int YShortcut::distinctShortcutChars ( )
```

Obtain the number of distinct valid shortcut characters in the shortcut string, i.e.

how many different shortcuts that widget could get.

Definition at line 182 of file YShortcut.cc.

5.127.2.4 findShortcut()

```
char YShortcut::findShortcut (
            const std::string & str,
            std::string::size_type start_pos = 0 )  [static]
```

Static function: Find the next shortcut marker in a string, beginning at starting position start_pos.

Returns the shortcut character or 0 if none found.

Definition at line 282 of file YShortcut.cc.

5.127.2.5 findShortcutPos()

```
string::size_type YShortcut::findShortcutPos (
            const std::string & str,
            std::string::size_type start_pos = 0 )  [static]
```

Static function: Find the next occurrence of the shortcut marker ('&') in a string, beginning at starting position start_pos.

Returns string::npos if not found or the position of the shortcut marker (not the shortcut character!) if found.

Definition at line 256 of file YShortcut.cc.

5.127.2.6 isValid()

```
bool YShortcut::isValid (
            char c )  [static]
```

Returns 'true' if 'c' is a valid shortcut character, i.e.

[a-zA-Z0-9], 'false' otherwise.

Definition at line 291 of file YShortcut.cc.

5.127.2.7 normalized()

```
char YShortcut::normalized (
            char c )  [static]
```

Return the normalized version of shortcut character 'c', i.e.

a lowercase letter or a digit [a-z0-9]. Returns 0 if 'c' is invalid.

Definition at line 301 of file YShortcut.cc.

5.127.2.8 preferred()

```
char YShortcut::preferred ( )
```

The preferred shortcut character, i.e.

the character that had been preceded by "&" before checking / resolving conflicts began.

Definition at line 119 of file YShortcut.cc.

5.127.2.9 shortcut()

```
char YShortcut::shortcut ( )
```

The actual shortcut character.

This may be different from preferred() if it is overridden.

Definition at line 131 of file YShortcut.cc.

5.127.2.10 shortcutString()

```
string YShortcut::shortcutString ( )
```

Returns the complete shortcut string (which may or may not contain "&"), i.e.

the value of the widget's shortcut property. For PushButtons, this is the label on the button (e.g., "&Details..."), for other widgets usually the caption above it.

This value is chached, i.e. this isn't a too expensive operation.

Definition at line 77 of file YShortcut.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YShortcut.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YShortcut.cc

5.128 YShortcutManager Class Reference

Helper class to manage keyboard shortcuts within one dialog and resolve keyboard shortcut conflicts.

```
#include <YShortcutManager.h>
```

Public Member Functions

- YShortcutManager (YDialog *dialog)

  Constructor.
- virtual ~YShortcutManager ()

  Destructor.
- void checkShortcuts (bool autoResolve=true)

  Check the keyboard shortcuts of all children of this dialog (not for sub-dialogs!).
- int conflictCount ()

  Returns the number of shortcut conflicts.
- void resolveAllConflicts ()

  Resolve shortcut conflicts.
- YDialog * dialog ()

  Returns the dialog this shortcut manager works on.

Protected Member Functions

- void clearShortcutList ()

  Delete all members of the internal shortcut list, then empty the list.
- void findShortcutWidgets (YWidgetListConstIterator begin, YWidgetListConstIterator end)

  Recursively search all widgets between iterators 'begin' and 'end' (not those of any sub-dialogs!) for child widgets that could accept a keyboard shortcut and add these to _shortcutList.
- void resolveConflict (YShortcut *shortcut)

  Pick a new shortcut character for 'shortcut' - one that isn't marked as used in the '_used' array.
- int findShortestWizardButton (const YShortcutList &conflictList)

  Find the shortest wizard button in 'conflictList', if there is any.
- unsigned findShortestWidget (const YShortcutList &conflictList)

  Find the shortest widget in 'conflictList'.

Protected Attributes

- YDialog * _dialog

  The dialog this shortcut manager works on.
- YShortcutList _shortcutList

  List of all the shortcuts in this dialog.
- int _wanted [sizeof(char)<< 8]

  Counters for wanted shortcut characters.
- bool _used [sizeof(char)<< 8]

  Flags for used shortcut characters.
- int _conflictCount

  Counter for shortcut conflicts.

5.128.1 Detailed Description

Helper class to manage keyboard shortcuts within one dialog and resolve keyboard shortcut conflicts.

Definition at line 38 of file YShortcutManager.h.

5.128.2 Member Function Documentation

5.128.2.1 checkShortcuts()

```
void YShortcutManager::checkShortcuts (
             bool autoResolve = true )
```

Check the keyboard shortcuts of all children of this dialog (not for sub-dialogs!).

Call resolveAllConflicts() if 'autoResolve' is 'true'.

Definition at line 62 of file YShortcutManager.cc.

5.128.2.2 conflictCount()

```
int YShortcutManager::conflictCount ( )  [inline]
```

Returns the number of shortcut conflicts.

Valid only after checkShortcuts() or resolveAllConflicts().

Definition at line 63 of file YShortcutManager.h.

5.128.2.3 findShortestWidget()

```
unsigned YShortcutManager::findShortestWidget (
             const YShortcutList & conflictList )  [protected]
```

Find the shortest widget in 'conflictList'.

Buttons get priority if they have the same number of eligible shortcut characters as another widget.

Returns the index of the shortest widget.

Definition at line 334 of file YShortcutManager.cc.

5.128.2.4 findShortestWizardButton()

```
int YShortcutManager::findShortestWizardButton (
            const YShortcutList & conflictList )  [protected]
```

Find the shortest wizard button in 'conflictList', if there is any.

Returns the index of that shortest wizard button or -1 if there is none.

Definition at line 309 of file YShortcutManager.cc.

5.128.2.5 resolveAllConflicts()

```
void YShortcutManager::resolveAllConflicts ( )
```

Resolve shortcut conflicts.

Requires checkShortcuts() to be called first.

Note: This may or may not work. There is no general solution to that problem. This method tries its best, but you may end up with widgets that don't have any (more) shortcut.

Why? Just picture the following (admittedly pathologic) situation:

[& OK] [& OK] [& OK]

This will result in something like this:

[& OK] [O& K] [OK]

I.e. the first OK button will retain its preferred shortcut ('O'), the second OK button's shortcut will be reassigned to 'K' and the third won't get any - there are simply not enough eligible shortcut characters.

This may even fail in much less pathological situations. This example is only supposed to give you a general idea why not to blindly rely on automatic shortcut resolving.

It's always best to resolve conflicts manually. This will generally result in much better shortcuts: Easier to memorize, less chance of picking characters that cannot really do a good job showing their shortcut like very narrow characters (.e.g., 'i') or descender characters (e.g., 'g', 'p', 'q' - imagine those underlined!).

Definition at line 163 of file YShortcutManager.cc.

5.128.2.6 resolveConflict()

```
void YShortcutManager::resolveConflict (
             YShortcut * shortcut )  [protected]
```

Pick a new shortcut character for 'shortcut' - one that isn't marked as used in the '_used' array.

Unset the conflict marker if that succeeded.

Definition at line 231 of file YShortcutManager.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YShortcutManager.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YShortcutManager.cc

5.129 YSimpleEventHandler Class Reference

Simple event handler suitable for most UIs.

```
#include <YSimpleEventHandler.h>
```

Public Member Functions

- YSimpleEventHandler ()
  Constructor.
- virtual ~YSimpleEventHandler ()
  Destructor.
- void sendEvent (YEvent *event_disown)
  Widget event handlers call this when an event occured that should be the answer to a UserInput() / PollInput() (etc.) call.
- bool eventPendingFor (YWidget *widget) const
  Returns 'true' if there is any event pending for the specified widget.
- YEvent * pendingEvent () const
  Returns the last event that isn't processed yet or 0 if there is none.
- YEvent * consumePendingEvent ()
  Consumes the pending event.
- void deletePendingEventsFor (YWidget *widget)
  Delete any pending events for the specified widget.
- void clear ()
  Clears any pending event (deletes the corresponding object).
- void blockEvents (bool block=true)
  Block (or unblock) events.
- void unblockEvents ()
  Unblock events previously blocked.
- bool eventsBlocked () const
  Returns 'true' if events are currently blocked.
- void deleteEvent (YEvent *event)
  Delete an event.

Protected Attributes

- YEvent * **_pendingEvent**
- bool **_eventsBlocked**

5.129.1 Detailed Description

Simple event handler suitable for most UIs.

This event handler keeps track of one single event that gets overwritten when a new one arrives.

Definition at line 39 of file YSimpleEventHandler.h.

5.129.2 Constructor & Destructor Documentation

5.129.2.1 ~YSimpleEventHandler()

```
YSimpleEventHandler::~YSimpleEventHandler ( )  [virtual]
```

Destructor.

If there is a pending event, it is deleted here.

Definition at line 44 of file YSimpleEventHandler.cc.

5.129.3 Member Function Documentation

5.129.3.1 blockEvents()

```
void YSimpleEventHandler::blockEvents (
             bool block = true )
```

Block (or unblock) events.

If events are blocked, any event sent with sendEvent() from now on is ignored (and will get lost) until events are unblocked again.

Definition at line 145 of file YSimpleEventHandler.cc.

5.129.3.2 consumePendingEvent()

```
YEvent * YSimpleEventHandler::consumePendingEvent ( )
```

Consumes the pending event.

Sets the internal pending event to 0. Does NOT delete the internal consuming event.

The caller assumes ownership of the object this pending event points to. In particular, he has to take care to delete that object when he is done processing it.

Returns the pending event or 0 if there is none.

Definition at line 62 of file YSimpleEventHandler.cc.

5.129.3.3 deleteEvent()

```
void YSimpleEventHandler::deleteEvent (
             YEvent * event )
```

Delete an event.

Don't call this from the outside; this is public only because of limitations of C++ .

Definition at line 156 of file YSimpleEventHandler.cc.

5.129.3.4 deletePendingEventsFor()

```
void YSimpleEventHandler::deletePendingEventsFor (
             YWidget * widget )
```

Delete any pending events for the specified widget.

This is useful mostly if the widget is about to be destroyed.

Definition at line 130 of file YSimpleEventHandler.cc.

5.129.3.5 pendingEvent()

```
YEvent* YSimpleEventHandler::pendingEvent ( ) const  [inline]
```

Returns the last event that isn't processed yet or 0 if there is none.

This event handler keeps track of only one single (the last one) event.

Definition at line 80 of file YSimpleEventHandler.h.

5.129.3.6 sendEvent()

```
void YSimpleEventHandler::sendEvent (
            YEvent * event_disown )
```

Widget event handlers call this when an event occured that should be the answer to a UserInput() / PollInput() (etc.) call.

The UI assumes ownership of the event object that 'event' points to, so the event MUST be created with new(). The UI is to take care to delete the event after it has been processed.

If events are blocked (see blockEvents()), the event sent with this function will be ignored (but safely deleted - no memory leak).

It is an error to pass 0 for 'event'. This simple event handler keeps track of only the latest user event. If there is more than one, older events are automatically discarded. Since Events are created on the heap with the "new" operator, discarded events need to be deleted.

Events that are not discarded are deleted later (after they are processed) by the generic UI.

Definition at line 75 of file YSimpleEventHandler.cc.

5.129.3.7 unblockEvents()

```
void YSimpleEventHandler::unblockEvents ( )  [inline]
```

Unblock events previously blocked.

This is just an alias for blockEvents(false) for better readability.

Definition at line 116 of file YSimpleEventHandler.h.

The documentation for this class was generated from the following files:

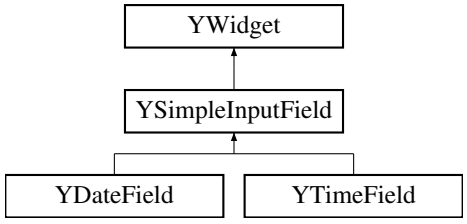
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSimpleEventHandler.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSimpleEventHandler.cc

5.130 YSimpleInputField Class Reference

Abstract base class for simple input fields with a label above the field and a text value.

```
#include <YSimpleInputField.h>
```

Inheritance diagram for YSimpleInputField:



Public Member Functions

- virtual ~YSimpleInputField ()

  Destructor.
- virtual std::string value ()=0

  Get the current value (the text entered by the user or set from the outside) of this input field.
- virtual void setValue (const std::string &text)=0

  Set the current value (the text entered by the user or set from the outside) of this input field.
- std::string label () const

  Get the label (the caption above the input field).
- virtual void setLabel (const std::string &label)

  Set the label (the caption above the input field).
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.
- virtual std::string shortcutString () const

  Get the string of this widget that holds the keyboard shortcut.
- virtual void setShortcutString (const std::string &str)

  Set the string of this widget that holds the keyboard shortcut.
- const char * userInputProperty ()

  The name of the widget property that will return user input.

Protected Member Functions

- YSimpleInputField (YWidget *parent, const std::string &label)

  Constructor.

5.130.1 Detailed Description

Abstract base class for simple input fields with a label above the field and a text value.

Definition at line 37 of file YSimpleInputField.h.

5.130.2 Member Function Documentation

5.130.2.1 getProperty()

```
YPropertyValue YSimpleInputField::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 114 of file YSimpleInputField.cc.

5.130.2.2 propertySet()

```
const YPropertySet & YSimpleInputField::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 78 of file YSimpleInputField.cc.

5.130.2.3 setLabel()

```
void YSimpleInputField::setLabel (
            const std::string & label )  [virtual]
```

Set the label (the caption above the input field).

Derived classes are free to reimplement this, but they should call this base class method at the end of the overloaded function.

Definition at line 70 of file YSimpleInputField.cc.

5.130.2.4 setProperty()

```
bool YSimpleInputField::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This function may throw YUIPropertyExceptions.

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 98 of file YSimpleInputField.cc.

5.130.2.5 setShortcutString()

```
virtual void YSimpleInputField::setShortcutString (
             const std::string & str )  [inline], [virtual]
```

Set the string of this widget that holds the keyboard shortcut.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 121 of file YSimpleInputField.h.

5.130.2.6 setValue()

```
virtual void YSimpleInputField::setValue (
             const std::string & text )  [pure virtual]
```

Set the current value (the text entered by the user or set from the outside) of this input field.

Derived classes are required to implement this.

5.130.2.7 shortcutString()

```
virtual std::string YSimpleInputField::shortcutString ( ) const  [inline], [virtual]
```

Get the string of this widget that holds the keyboard shortcut.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 114 of file YSimpleInputField.h.

5.130.2.8 userInputProperty()

```
const char* YSimpleInputField::userInputProperty ( )  [inline], [virtual]
```

The name of the widget property that will return user input.

Inherited from YWidget.

Reimplemented from YWidget.

Definition at line 128 of file YSimpleInputField.h.

5.130.2.9 value()

```
virtual std::string YSimpleInputField::value ( )  [pure virtual]
```

Get the current value (the text entered by the user or set from the outside) of this input field.

Derived classes are required to implement this.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSimpleInputField.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSimpleInputField.cc

5.131 YSimpleInputFieldPrivate Struct Reference

Public Member Functions

- **YSimpleInputFieldPrivate** (const string &label)

Public Attributes

- string **label**

5.131.1 Detailed Description

Definition at line 35 of file YSimpleInputField.cc.

The documentation for this struct was generated from the following file:

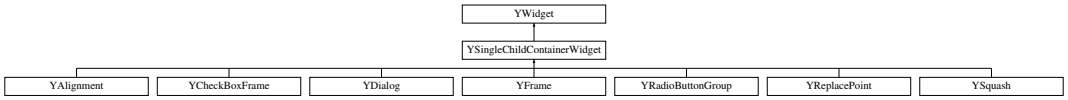
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSimpleInputField.cc

5.132 YSingleChildContainerWidget Class Reference

Container widget class that manages one child.

`#include <YSingleChildContainerWidget.h>`

Inheritance diagram for YSingleChildContainerWidget:



Public Member Functions

- virtual ~YSingleChildContainerWidget ()

  Destructor.
- virtual int preferredWidth ()

  Preferred width of the widget.
- virtual int preferredHeight ()

  Preferred height of the widget.
- virtual void setSize (int newWidth, int newHeight)

  Set the new size of the widget.
- virtual bool stretchable (YUIDimension dim) const

  Returns 'true' if this widget is stretchable in the specified dimension.

Protected Member Functions

- YSingleChildContainerWidget (YWidget *parent)

  Constructor.

5.132.1 Detailed Description

Container widget class that manages one child.

Definition at line 34 of file YSingleChildContainerWidget.h.

5.132.2 Member Function Documentation

5.132.2.1 preferredHeight()

```
int YSingleChildContainerWidget::preferredHeight ( )  [virtual]
```

Preferred height of the widget.

Reimplemented from YWidget.

Implements YWidget.

Reimplemented in YAlignment.

Definition at line 51 of file YSingleChildContainerWidget.cc.

5.132.2.2 preferredWidth()

```
int YSingleChildContainerWidget::preferredWidth ( )  [virtual]
```

Preferred width of the widget.

Reimplemented from YWidget.

Implements YWidget.

Reimplemented in YAlignment.

Definition at line 42 of file YSingleChildContainerWidget.cc.

5.132.2.3 setSize()

```
void YSingleChildContainerWidget::setSize (
             int newWidth,
             int newHeight )  [virtual]
```

Set the new size of the widget.

In this case, the size of the single child is set.

Reimplemented from YWidget.

Implements YWidget.

Reimplemented in YAlignment.

Definition at line 60 of file YSingleChildContainerWidget.cc.

5.132.2.4 stretchable()

```
bool YSingleChildContainerWidget::stretchable (
             YUIDimension dim ) const  [virtual]
```

Returns 'true' if this widget is stretchable in the specified dimension.

In this case, the stretchability of the single child is returned.

Reimplemented from YWidget.

Reimplemented from YWidget.

Reimplemented in YAlignment, and YSquash.

Definition at line 68 of file YSingleChildContainerWidget.cc.

The documentation for this class was generated from the following files:

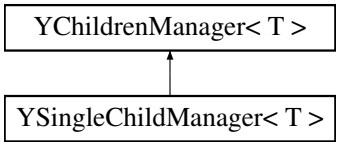
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSingleChildContainerWidget.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSingleChildContainerWidget.cc

5.133 YSingleChildManager< T > Class Template Reference

Children manager that can handle one single child (rejecting any more).

`#include <YChildrenManager.h>`

Inheritance diagram for YSingleChildManager< T >:



Public Member Functions

- **YSingleChildManager** (T *containerParent)
- virtual void add (T *child)

  Add a new child.
- void replace (T *newChild)

  Replace the previous child (if any) with a new one.

Additional Inherited Members

5.133.1 Detailed Description

template<class T>
class YSingleChildManager< T >

Children manager that can handle one single child (rejecting any more).

Useful for YAlignment, YFrame etc.

Definition at line 173 of file YChildrenManager.h.

5.133.2 Member Function Documentation

5.133.2.1 add()

```
template<class T >
virtual void YSingleChildManager< T >::add (
            T * child )  [inline], [virtual]
```

Add a new child.

Reimplemented from YChildrenManager.

This will throw a YUITooManyChildrenException if there already is a child.

Reimplemented from YChildrenManager< T >.

Definition at line 189 of file YChildrenManager.h.

The documentation for this class was generated from the following file:

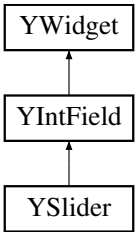
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YChildrenManager.h

5.134 YSlider Class Reference

Slider: Input widget for an integer value between a minimum and a maximum value.

`#include <YSlider.h>`

Inheritance diagram for YSlider:



Public Member Functions

- virtual ~YSlider ()
  Destructor.
- virtual const char * widgetClass () const
  Returns a descriptive name of this widget class for logging, debugging etc.

Protected Member Functions

- YSlider (YWidget *parent, const std::string &label, int minValue, int maxValue)
  Constructor.

5.134.1 Detailed Description

Slider: Input widget for an integer value between a minimum and a maximum value.

Very similar to IntField in semantics, but with a graphical slider that can be dragged to the desired value. It also contains an IntField to allow entering the value directly.

Don't confuse this widget with ProgressBar: ProgressBar is output-only.

This is an optional widget, i.e. not all UIs support it.

Definition at line 44 of file YSlider.h.

5.134.2 Constructor & Destructor Documentation

5.134.2.1 YSlider()

```
YSlider::YSlider (
            YWidget * parent,
            const std::string & label,
            int minValue,
            int maxValue )  [protected]
```

Constructor.

Create a Slider with 'label' as the caption, and the specified minimum and maximum values.

Note that YWidgetFactory::createSlider() also has an 'initialValue' parameter that is not used here (because the current value is not stored in this base class, but in the derived class).

Definition at line 45 of file YSlider.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSlider.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSlider.cc

5.135 YSliderPrivate Struct Reference

Public Attributes

- bool **dummy**

5.135.1 Detailed Description

Definition at line 34 of file YSlider.cc.

The documentation for this struct was generated from the following file:

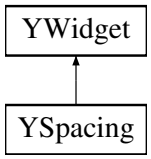
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSlider.cc

5.136 YSpacing Class Reference

HSpacing, VSpacing, HStretch, VStretch.

`#include <YSpacing.h>`

Inheritance diagram for YSpacing:



Public Member Functions

- YSpacing (YWidget *parent, YUIDimension dim, bool stretchable=false, YLayoutSize_t layoutUnits=0.0)

  Constructor.
- virtual ~YSpacing ()

  Destructor.
- virtual const char * widgetClass () const

  Return a descriptive name of this widget class for logging, debugging etc.
- YUIDimension dimension () const

  Return the primary dimension of this Spacing/Stretch, i.e.
- int size () const

  Return the size in the primary dimension.
- int size (YUIDimension dim) const

  Return the size in the specified dimension.
- virtual int preferredWidth ()

  Preferred width of the widget.
- virtual int preferredHeight ()

  Preferred height of the widget.

Additional Inherited Members

5.136.1 Detailed Description

HSpacing, VSpacing, HStretch, VStretch.

Definition at line 37 of file YSpacing.h.

5.136.2 Constructor & Destructor Documentation

5.136.2.1 YSpacing()

```
YSpacing::YSpacing (
             YWidget * parent,
             YUIDimension dim,
             bool stretchable = false,
             YLayoutSize_t layoutUnits = 0.0 )
```

Constructor.

A Spacing/Stretch widget works only in one dimension ('dim') at the same time. But it can be stretchable and have a size at the same time, in which case the specified size acts very much like a minimal size - but not exactly, since YLayoutBox will reduce Spacings first before other widgets have to be resized below their preferred size.

'layoutUnits' is specified in abstract UI units where a main window (800x600 pixels in the Qt UI) corresponds to a 80x25 window.

Definition at line 45 of file YSpacing.cc.

5.136.3 Member Function Documentation

5.136.3.1 dimension()

```
YUIDimension YSpacing::dimension ( ) const
```

Return the primary dimension of this Spacing/Stretch, i.e.

the dimension in which it uses space or stretches.

Definition at line 62 of file YSpacing.cc.

5.136.3.2 preferredHeight()

```
int YSpacing::preferredHeight ( )  [virtual]
```

Preferred height of the widget.

Reimplemented from YWidget.

Implements YWidget.

Definition at line 90 of file YSpacing.cc.

5.136.3.3 preferredWidth()

```
int YSpacing::preferredWidth ( )  [virtual]
```

Preferred width of the widget.

Reimplemented from YWidget.

Implements YWidget.

Definition at line 81 of file YSpacing.cc.

5.136.3.4 size() [1/2]

```
int YSpacing::size ( ) const
```

Return the size in the primary dimension.

This is the device dependent size (pixels or character cells), not the abstract UI layout unit from the constructor.

Definition at line 68 of file YSpacing.cc.

5.136.3.5 size() [2/2]

```
int YSpacing::size (
             YUIDimension dim ) const
```

Return the size in the specified dimension.

This is the device dependent size (pixels or character cells), not the abstract UI layout unit from the constructor.

Definition at line 74 of file YSpacing.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSpacing.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSpacing.cc

5.137 YSpacingPrivate Struct Reference

Public Member Functions

- **YSpacingPrivate** (YUIDimension dim, int size)

Public Attributes

- YUIDimension **dim**
- int **size**

5.137.1 Detailed Description

Definition at line 31 of file YSpacing.cc.

The documentation for this struct was generated from the following file:

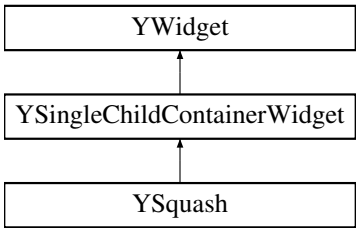
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSpacing.cc

5.138 YSquash Class Reference

HSquash, VSquash HVSquash: reduce child to its preferred size.

`#include <YSquash.h>`

Inheritance diagram for YSquash:



Public Member Functions

- virtual ~YSquash ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- bool horSquash () const

  Returns 'true' if this widget squashes horizontally.
- bool vertSquash () const

  Returns 'true' if this widget squashes vertically.
- bool stretchable (YUIDimension dim) const

  In a squashed dimension the widget NOT stretchable.

Protected Member Functions

- YSquash (YWidget *parent, bool horSquash, bool vertSquash)

  Constructor.

5.138.1 Detailed Description

HSquash, VSquash HVSquash: reduce child to its preferred size.

Squash is a widget that "squashes" its one child during layout, i.e., it reduces it in size down to its preferred size. It may squash vertically, horizontally or in both dimensions.

Definition at line 41 of file YSquash.h.

5.138.2 Constructor & Destructor Documentation

5.138.2.1 YSquash()

```
YSquash::YSquash (
            YWidget * parent,
            bool horSquash,
            bool vertSquash )  [protected]
```

Constructor.

Squashes horizontally if 'horSquash' is 'true', vertically if 'vertSquash' is 'true'.

Definition at line 44 of file YSquash.cc.

5.138.3 Member Function Documentation

5.138.3.1 stretchable()

```
bool YSquash::stretchable (
            YUIDimension dim ) const  [virtual]
```

In a squashed dimension the widget NOT stretchable.

In an unsquashed dimension the widget is stretchable if the child is stretchable.

Reimplemented from YSingleChildContainerWidget.

Definition at line 70 of file YSquash.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSquash.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSquash.cc

5.139 YSquashPrivate Struct Reference

Public Member Functions

- YSquashPrivate (bool horSquash, bool vertSquash)

  Constructor.

Public Attributes

- YBothDim< bool > **squash**

5.139.1 Detailed Description

Definition at line 29 of file YSquash.cc.

The documentation for this struct was generated from the following file:

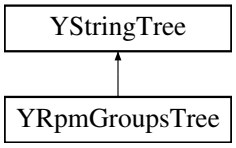
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YSquash.cc

5.140 YStringTree Class Reference

Abstract base class for filter views with hierarchical filter criteria - e.g., RPM group tags, MIME types.

`#include <YStringTree.h>`

Inheritance diagram for YStringTree:



Public Member Functions

- YStringTree (const char *textdomain)
  Constructor.
- virtual ~YStringTree ()
  Destructor.
- YStringTreeItem * addBranch (const std::string &content, char delimiter=0, YStringTreeItem *parent=0)
  Add a unique new branch with text content 'content' to the tree, beginning at 'parent' (root if parent == 0).
- std::string origPath (const YStringTreeItem *item, char delimiter, bool startWithDelimiter=true)
  Construct a complete original path for the specified tree item.
- std::string translatedPath (const YStringTreeItem *item, char delimiter, bool startWithDelimiter=true)
  Construct a complete original path for the specified tree item.
- YTransText path (const YStringTreeItem *item, char delimiter, bool startWithDelimiter=true)
  Construct a complete path (both original and translated) for the specified tree item.
- void logTree ()
  Debugging - dump the tree into the log file.
- YStringTreeItem * root () const
  Returns the root of the filter view tree.
- const char * textdomain () const
  Returns the textdomain used internally for translation of pathname components.
- void setTextdomain (const char *domain)
  Set the textdomain used internally for translation of pathname components.
- std::string translate (const std::string &orig)
  Translate message 'orig' using the internal textdomain.

Protected Member Functions

- std::string completePath (const YStringTreeItem *item, bool translated, char delimiter, bool startWithDelimiter)

  Construct a complete original or translated path for the specified tree item.
- void logBranch (YStringTreeItem *branch, std::string indentation)

  Debugging - dump one branch of the tree into the log file.

Protected Attributes

- YStringTreeItem * **_root**
- std::string **_textdomain**

5.140.1 Detailed Description

Abstract base class for filter views with hierarchical filter criteria - e.g., RPM group tags, MIME types.

Definition at line 41 of file YStringTree.h.

5.140.2 Constructor & Destructor Documentation

5.140.2.1 YStringTree()

```
YStringTree::YStringTree (
            const char * textdomain )
```

Constructor.

'textdomain' specifies the gettext textdomain to use to translate pathname components as new branches are added.

NOTE: This will NOT change the gettext environment in any way - the tree uses dgettext() internally. The caller is responsible to bind that textdomain to a message catalog (bindtextdomain() etc.).

Definition at line 33 of file YStringTree.cc.

5.140.3 Member Function Documentation

5.140.3.1 addBranch()

```
YStringTreeItem * YStringTree::addBranch (
            const std::string & content,
            char delimiter = 0,
            YStringTreeItem * parent = 0 )
```

Add a unique new branch with text content 'content' to the tree, beginning at 'parent' (root if parent == 0).

This content can be a path specification delimited with character 'delimiter' (if not 0), i.e. this method will split 'content' up into path components and insert tree items for each level as appropriate. Leading delimiters will be ignored. If 'delimiter' is 0, 'content' is not split but used 'as is'. Items are automatically sorted alphabetically. Pathname components are automatically translated using the textdomain specified in the constructor.

Returns the tree node for this branch - either newly created or the existing one.

Example: addBranch("/usr/local/bin", '/') addBranch("/usr/lib", '/')

"usr" "lib" "local" "bin"

Definition at line 49 of file YStringTree.cc.

5.140.3.2 completePath()

```
string YStringTree::completePath (
            const YStringTreeItem * item,
            bool translated,
            char delimiter,
            bool startWithDelimiter )  [protected]
```

Construct a complete original or translated path for the specified tree item.

'startWithDelimiter' specifies whether or not the complete path should start with the delimiter character.

Definition at line 128 of file YStringTree.cc.

5.140.3.3 origPath()

```
std::string YStringTree::origPath (
            const YStringTreeItem * item,
            char delimiter,
            bool startWithDelimiter = true )  [inline]
```

Construct a complete original path for the specified tree item.

'startWithDelimiter' specifies whether or not the complete path should start with the delimiter character.

Definition at line 97 of file YStringTree.h.

5.140.3.4 path()

```
YTransText YStringTree::path (
            const YStringTreeItem * item,
            char delimiter,
            bool startWithDelimiter = true )
```

Construct a complete path (both original and translated) for the specified tree item.

'startWithDelimiter' specifies whether or not the complete path should start with the delimiter character.

Note: origPath() or translatedPath() are much cheaper if only one version (original or translated) is required.

Definition at line 159 of file YStringTree.cc.

5.140.3.5 root()

```
YStringTreeItem* YStringTree::root ( ) const  [inline]
```

Returns the root of the filter view tree.

Note: In most cases, the root item itself will not contain any useful information. Consider it the handle for the entire tree, not an actual data element.

Definition at line 139 of file YStringTree.h.

5.140.3.6 setTextdomain()

```
void YStringTree::setTextdomain (
            const char * domain )  [inline]
```

Set the textdomain used internally for translation of pathname components.

NOTE: This will NOT change the gettext environment in any way - the tree uses dgettext() internally. The caller is responsible to bind that textdomain to a message catalog (bindtextdomain() etc.).

Definition at line 157 of file YStringTree.h.

5.140.3.7 translate()

```
string YStringTree::translate (
            const std::string & orig )
```

Translate message 'orig' using the internal textdomain.

Returns the translated text or the original if there is no translation.

Definition at line 119 of file YStringTree.cc.

5.140.3.8 translatedPath()

```
std::string YStringTree::translatedPath (
            const YStringTreeItem * item,
            char delimiter,
            bool startWithDelimiter = true )  [inline]
```

Construct a complete original path for the specified tree item.

'startWithDelimiter' specifies whether or not the complete path should start with the delimiter character.

Definition at line 108 of file YStringTree.h.

The documentation for this class was generated from the following files:

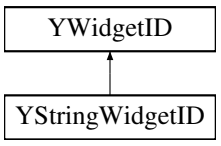
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YStringTree.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YStringTree.cc

5.141 YStringWidgetID Class Reference

Simple widget ID class based on strings.

```
#include <YWidgetID.h>
```

Inheritance diagram for YStringWidgetID:



Public Member Functions

- YStringWidgetID (const std::string &value)

  Constructor.
- virtual ~YStringWidgetID ()

  Destructor.
- virtual bool isEqual (YWidgetID *otherID) const

  Check if this ID is equal to another.
- virtual std::string toString () const

  Convert the ID value to string.
- std::string value () const

  Return the ID value.
- const std::string & valueConstRef () const

  Return the ID value as a const ref.

Additional Inherited Members

5.141.1 Detailed Description

Simple widget ID class based on strings.

Definition at line 72 of file YWidgetID.h.

5.141.2 Member Function Documentation

5.141.2.1 isEqual()

```
bool YStringWidgetID::isEqual (
            YWidgetID * otherID ) const  [virtual]
```

Check if this ID is equal to another.

Reimplemented from YWidgetID.

Implements YWidgetID.

Definition at line 46 of file YWidgetID.cc.

5.141.2.2 toString()

```
string YStringWidgetID::toString ( ) const  [virtual]
```

Convert the ID value to string.

Used for logging and debugging.

Reimplemented from YWidgetID.

Implements YWidgetID.

Definition at line 59 of file YWidgetID.cc.

The documentation for this class was generated from the following files:

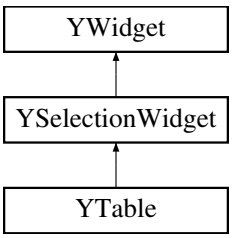
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YWidgetID.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YWidgetID.cc

5.142 YTable Class Reference

Table: Selection list with multiple columns.

```
#include <YTable.h>
```

Inheritance diagram for YTable:



Public Member Functions

- virtual ~YTable ()

  Destructor.
- virtual const char * widgetClass () const

  Return a descriptive name of this widget class for logging, debugging etc.
- int columns () const

  Return the number of columns of this table.
- bool hasColumn (int column) const

  Return 'true' if this table has a column no.
- std::string header (int column) const

  Return the header text for the specified column.

- YAlignmentType alignment (int column) const

  Return the alignment for the specified column.
- bool immediateMode () const

  Deliver even more events than with notify() set.
- void setImmediateMode (bool immediateMode=true)

  Set immediateMode() on or off.
- bool keepSorting () const

  Return 'true' if the sort order is to be kept in item insertion order, i.e.
- virtual void setKeepSorting (bool keepSorting)

  Switch between sorting by item insertion order (keepSorting: true) or allowing the user to sort by an arbitrary column (by clicking on the column header).
- bool hasMultiSelection () const

  Return 'true' if the user can select multiple items at the same time (e.g., with shift-click or ctrl-click).
- YItem * findItem (const std::string &wantedItemLabel, int column) const

  Try to find an item with label 'wantedItemLabel' in column 'column' between iterators 'begin' and 'end'.
- YItem * **findItem** (const std::string &wantedItemLabel, int column, YItemConstIterator begin, YItemConstIterator end) const
- virtual void cellChanged (const YTableCell *cell)=0

  Notification that a cell (its text, its icon and/or sort-key) was changed from the outside.
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.
- const char * userInputProperty ()

  The name of the widget property that will return user input.

Protected Member Functions

- YTable (YWidget *parent, YTableHeader *header, bool multiSelection)

  Constructor.
- void setTableHeader (YTableHeader *newHeader)

  Exchange the previous table header with a new one.

5.142.1 Detailed Description

Table: Selection list with multiple columns.

The user can select exactly one row (with all its columns) from that list. Each cell (each column within each row) has a label text, an optional icon (*) and an optional sort-key (used instead of the label text during sort).

This widget is similar to SelectionBox, but it has several columns for each item (each row). If just one column is desired, consider using SelectionBox instead.

Note: This is not something like a spread sheet, and it doesn't pretend or want to be. Actions are performed on rows, not on individual cells (columns within one row).

(*) Not all UIs (in particular not text-based UIs) support displaying icons, so an icon should never be an exclusive means to display any kind of information.

Definition at line 56 of file YTable.h.

5.142.2 Constructor & Destructor Documentation

5.142.2.1 YTable()

```
YTable::YTable (
            YWidget * parent,
            YTableHeader * header,
            bool multiSelection )  [protected]
```

Constructor.

'header' describes the table's headers: Number of columns, column headings, and column alignment. The widget assumes ownership of this object and will delete it when appropriate. The header cannot be changed after creating the widget.

'multiSelection' indicates whether or not the user can select multiple items at the same time (e.g., with shift-click or ctrl-click). This can only be set in the constructor.

Definition at line 52 of file YTable.cc.

5.142.3 Member Function Documentation

5.142.3.1 cellChanged()

```
virtual void YTable::cellChanged (
            const YTableCell * cell )  [pure virtual]
```

Notification that a cell (its text, its icon and/or sort-key) was changed from the outside.

Applications are required to call this whenever a table cell is changed after adding the corresponding table item (the row) to the table widget.

Derived classes are required to implement this and update the display accordingly.

Note that the position of this cell can be retrieved with cell->column() and cell->itemIndex().

5.142.3.2 findItem()

```
YItem * YTable::findItem (
            const std::string & wantedItemLabel,
            int column ) const
```

Try to find an item with label 'wantedItemLabel' in column 'column' between iterators 'begin' and 'end'.

Return that item or 0 if there is none.

Definition at line 152 of file YTable.cc.

5.142.3.3 getProperty()

```
YPropertyValue YTable::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 235 of file YTable.cc.

5.142.3.4 hasColumn()

```
bool YTable::hasColumn (
            int column ) const
```

Return 'true' if this table has a column no.

'column' (counting from 0 on).

Definition at line 94 of file YTable.cc.

5.142.3.5 immediateMode()

```
bool YTable::immediateMode ( ) const
```

Deliver even more events than with notify() set.

With "notify" alone, a table widget sends an ActivatedEvent when the user double-clicks an item or presses the "space" key on it. It does not send an event when the user just sends another item.

With "immediate", it also sends a SelectionChangedEvent when the user selects another item. "immediate" implicitly includes "notify".

Definition at line 115 of file YTable.cc.

5.142.3.6 keepSorting()

```
bool YTable::keepSorting ( ) const
```

Return 'true' if the sort order is to be kept in item insertion order, i.e.

if sorting the table by clicking on a column header should be disabled.

Definition at line 132 of file YTable.cc.

5.142.3.7 propertySet()

```
const YPropertySet & YTable::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 179 of file YTable.cc.

5.142.3.8 setKeepSorting()

```
void YTable::setKeepSorting (
             bool keepSorting )  [virtual]
```

Switch between sorting by item insertion order (keepSorting: true) or allowing the user to sort by an arbitrary column (by clicking on the column header).

Derived classes can overwrite this function, but they should call this base class function in the new implementation.

Definition at line 139 of file YTable.cc.

5.142.3.9 setProperty()

```
bool YTable::setProperty (
            const std::string & propertyName,
            const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This function may throw YUIPropertyExceptions.

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 214 of file YTable.cc.

5.142.3.10 setTableHeader()

```
void YTable::setTableHeader (
            YTableHeader * newHeader )  [protected]
```

Exchange the previous table header with a new one.

This will delete the old YTableHeader object.

If the new header has a different number of columns than the old one, all items will implicitly be deleted.

Definition at line 74 of file YTable.cc.

5.142.3.11 userInputProperty()

```
const char* YTable::userInputProperty ( )  [inline], [virtual]
```

The name of the widget property that will return user input.

Inherited from YWidget.

Reimplemented from YWidget.

Definition at line 208 of file YTable.h.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YTable.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YTable.cc

5.143 YTableCell Class Reference

One cell (one column in one row) of a YTableItem.

`#include <YTableItem.h>`

Public Member Functions

- YTableCell (const std::string &label, const std::string &iconName="", const std::string &sortKey="")

  Constructor with label and optional icon name and optional sort key for cells that don't have a parent item yet (that will be added to a parent later with setParent()).
- YTableCell (YTableItem *parent, int column, const std::string &label, const std::string &iconName="", const std::string &sortKey="")

  Constructor with parent, column no., label and optional icon name for cells that are created with a parent.
- virtual ~YTableCell ()

  Destructor.
- std::string label () const

  Return this cells's label.
- void setLabel (const std::string &newLabel)

  Set this cell's label.
- std::string iconName () const

  Return this cell's icon name.
- bool hasIconName () const

  Return 'true' if this cell has an icon name.
- void setIconName (const std::string &newIconName)

  Set this cell's icon name.
- std::string sortKey () const

  Return this cell's sort key.
- bool hasSortKey () const

  Return 'true' if this cell has a sort key.
- void setSortKey (const std::string &newSortKey)

  Set this cell's sort key.
- YTableItem * parent () const

  Return this cell's parent item or 0 if it doesn't have one yet.
- int column () const

  Return this cell's column no.
- int itemIndex () const

  Convenience function: Return this cell's parent item's index within its table widget or -1 if there is no parent item or no parent table.
- void reparent (YTableItem *parent, int column)

  Set this cell's parent item and column no.

5.143.1 Detailed Description

One cell (one column in one row) of a YTableItem.

Each cell has a label (a user visible text), optionally an icon (*) and also optionally a sort-key.

Note that cells don't have individual IDs; they have just an index. The first cell in an item is cell(0). In an ideal world, each YTableItem would have exactly as many cells as there are columns in the YTable, but these classes make no such assumptions. A YTableItem might have any number of cells, including none.

The YTable widget is free to ignore any excess cells if there are more than the YTable widget has columns. If there are less cells than the table has columns, the nonexistent cells will be treated as empty.

(*) Not all UIs can handle icons. UIs that can't handle them will simply ignore any icons specified for YTableCells. Thus, applications should either check the UI capabilities if it can handle icons or use icons only as an additional visual cue that still has a text counterpart (so the user can still make sense of the table content when no icons are visible).

Definition at line 219 of file YTableItem.h.

5.143.2 Constructor & Destructor Documentation

5.143.2.1 ~YTableCell()

```
virtual YTableCell::~YTableCell ( )  [inline], [virtual]
```

Destructor.

Not strictly needed inside this class, but useful for derived classes. Since this is the only virtual method of this class, the cost of this is a vtable for this class and a pointer to the vtable in each instance.

Definition at line 258 of file YTableItem.h.

5.143.3 Member Function Documentation

5.143.3.1 column()

```
int YTableCell::column ( ) const  [inline]
```

Return this cell's column no.

(counting from 0on) or -1 if it doesn't have a parent yet.

Definition at line 322 of file YTableItem.h.

5.143.3.2 label()

```
std::string YTableCell::label ( ) const  [inline]
```

Return this cells's label.

This is what the user sees in a dialog, so this will usually be a translated text.

Definition at line 264 of file YTableItem.h.

5.143.3.3 reparent()

```
void YTableCell::reparent (
            YTableItem * parent,
            int column )
```

Set this cell's parent item and column no.

if it doesn't have a parent yet.

This method will throw an exception if the cell already has a parent.

Definition at line 173 of file YTableItem.cc.

5.143.3.4 setIconName()

```
void YTableCell::setIconName (
            const std::string & newIconName )  [inline]
```

Set this cell's icon name.

If this is called after the corresponding table item (table row) is added to the table widget, call YTable::cellChanged() to notify the table widget about the fact. Only then will the display be updated.

Definition at line 292 of file YTableItem.h.

5.143.3.5 setLabel()

```
void YTableCell::setLabel (
            const std::string & newLabel )  [inline]
```

Set this cell's label.

If this is called after the corresponding table item (table row) is added to the table widget, call YTable::cellChanged() to notify the table widget about the fact. Only then will the display be updated.

Definition at line 273 of file YTableItem.h.

5.143.3.6 setSortKey()

```
void YTableCell::setSortKey (
             const std::string & newSortKey )  [inline]
```

Set this cell's sort key.

If this is called after the corresponding table item (table row) is added to the table widget, call YTable::cellChanged() to notify the table widget about the fact. Only then will the display be updated.

Definition at line 311 of file YTableItem.h.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YTableItem.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YTableItem.cc

5.144 YTableHeader Class Reference

Helper class for YTable for table column properties:

`#include <YTableHeader.h>`

Public Member Functions

- YTableHeader ()
  Constructor.
- virtual ~YTableHeader ()
  Destructor.
- void addColumn (const std::string &header, YAlignmentType alignment=YAlignBegin)
  Add a column with the specified colum header text and alignment.
- int columns () const
  Return the number of columns.
- bool hasColumn (int column) const
  Return 'true' if this table header has a column no.
- std::string header (int column) const
  Return the header text for the specified column.
- YAlignmentType alignment (int column) const
  Return the alignment for the specified column.

5.144.1 Detailed Description

Helper class for YTable for table column properties:

- number of columns
- header for each column
- alignment for each column

Definition at line 43 of file YTableHeader.h.

5.144.2 Member Function Documentation

5.144.2.1 hasColumn()

```
bool YTableHeader::hasColumn (
             int column ) const
```

Return 'true' if this table header has a column no.

'column' (counting from 0 on).

Definition at line 79 of file YTableHeader.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YTableHeader.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YTableHeader.cc

5.145 YTableHeaderPrivate Struct Reference

Public Attributes

- vector< string > **headers**
- vector< YAlignmentType > **alignments**

5.145.1 Detailed Description

Definition at line 38 of file YTableHeader.cc.

The documentation for this struct was generated from the following file:

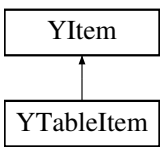
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YTableHeader.cc

5.146 YTableItem Class Reference

Item class for YTable items.

```
#include <YTableItem.h>
```

Inheritance diagram for YTableItem:



Public Member Functions

- YTableItem ()

  Default constructor.
- YTableItem (const std::string &label_0, const std::string &label_1=std::string(), const std::string &label_2=std↩ ::string(), const std::string &label_3=std::string(), const std::string &label_4=std::string(), const std::string &label↩ _5=std::string(), const std::string &label_6=std::string(), const std::string &label_7=std::string(), const std::string &label_8=std::string(), const std::string &label_9=std::string())

  Convenience constructor for table items without any icons.
- virtual ~YTableItem ()

  Destructor.
- void addCell (YTableCell *cell_disown)

  Add a cell.
- void addCell (const std::string &label, const std::string &iconName=std::string(), const std::string &sortKey=std↩ ::string())

  Create a new cell and add it (even if all 'label', 'iconName' and 'sortKey' are empty).
- void deleteCells ()

  Delete all cells.
- YTableCellIterator cellsBegin ()

  Return an iterator that points to the first cell of this item.
- YTableCellConstIterator **cellsBegin** () const
- YTableCellIterator cellsEnd ()

  Return an iterator that points after the last cell of this item.
- YTableCellConstIterator **cellsEnd** () const
- const YTableCell * cell (int index) const

  Return the cell at the specified index (counting from 0 on) or 0 if there is none.
- YTableCell * **cell** (int index)
- int cellCount () const

  Return the number of cells this item has.
- bool hasCell (int index) const

  Return 'true' if this item has a cell with the specified index (counting from 0 on), 'false' otherwise.
- std::string label (int index) const

  Return the label of cell no.
- std::string iconName (int index) const

  Return the icon name of cell no.
- bool hasIconName (int index) const

  Return 'true' if there is a cell with the specified index that has an icon name.
- std::string label () const

  Just for debugging.

5.146.1 Detailed Description

Item class for YTable items.

Each YTableItem corresponds to one row in a YTable.

A YTableItem might have any number of cells (columns within this row), including none. The YTable widget is free to ignore any excess cells if there are more than the YTable widget has columns. The YTable widget is to treat nonexistent cells like empty ones.

Note that while YTable items and their cells can be manipulated through pointers, their visual representation on screen might be updated only upon calling certain methods of the YTable widget. See the YTable reference for details.

Definition at line 58 of file YTableItem.h.

5.146.2 Constructor & Destructor Documentation

5.146.2.1 YTableItem() [1/2]

```
YTableItem::YTableItem ( )
```

Default constructor.

Use addCell() to give it any content.

Definition at line 31 of file YTableItem.cc.

5.146.2.2 YTableItem() [2/2]

```
YTableItem::YTableItem (
            const std::string & label_0,
            const std::string & label_1 = std::string(),
            const std::string & label_2 = std::string(),
            const std::string & label_3 = std::string(),
            const std::string & label_4 = std::string(),
            const std::string & label_5 = std::string(),
            const std::string & label_6 = std::string(),
            const std::string & label_7 = std::string(),
            const std::string & label_8 = std::string(),
            const std::string & label_9 = std::string() )
```

Convenience constructor for table items without any icons.

This will create up to 10 (0..9) cells. Empty cells for empty labels at the end of the labels are not created, but empty cells in between are.

```
new YTableItem( "one", "two", "", "", "five" );
```

will create an item with 5 cells:

```
cell[0] ==> "one"
cell[1] ==> "two"
cell[2] ==> ""
cell[3] ==> ""
cell[4] ==> "five"
```

Definition at line 38 of file YTableItem.cc.

5.146.2.3 ~YTableItem()

```
YTableItem::~YTableItem ( )  [virtual]
```

Destructor.

This will delete all cells.

Definition at line 84 of file YTableItem.cc.

5.146.3 Member Function Documentation

5.146.3.1 addCell()

```
void YTableItem::addCell (
             YTableCell * cell_disown )
```

Add a cell.

This item will assume ownership over the cell and delete it when appropriate (when the table is destroyed or when table items are replaced), at which time the pointer will become invalid.

Cells can still be changed after they (and the item they belong to) are added, but in that case, YTable::cellChanged() needs to be called to update the table display accordingly.

Definition at line 107 of file YTableItem.cc.

5.146.3.2 iconName()

```
string YTableItem::iconName (
             int index ) const
```

Return the icon name of cell no.

'index' (counting from 0 on) or an empty string if there is no cell with that index.

Definition at line 157 of file YTableItem.cc.

5.146.3.3 label()

```
string YTableItem::label (
            int index ) const
```

Return the label of cell no.

'index' (counting from 0 on) or an empty string if there is no cell with that index.

Definition at line 150 of file YTableItem.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YTableItem.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YTableItem.cc

5.147 YTablePrivate Struct Reference

Public Member Functions

- **YTablePrivate** (YTableHeader *header)

Public Attributes

- YTableHeader * **header**
- bool **keepSorting**
- bool **immediateMode**

5.147.1 Detailed Description

Definition at line 35 of file YTable.cc.

The documentation for this struct was generated from the following file:

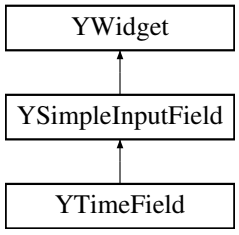
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YTable.cc

5.148 YTimeField Class Reference

Input field for entering a time in "hh:mm:ss" format.

`#include <YTimeField.h>`

Inheritance diagram for YTimeField:



Public Member Functions

- virtual ~YTimeField ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.

Protected Member Functions

- YTimeField (YWidget *parent, const std::string &label)

  Constructor.

5.148.1 Detailed Description

Input field for entering a time in "hh:mm:ss" format.

Derived classes are required to implement: value() setValue() See YSimpleInputField.h for details.

Definition at line 41 of file YTimeField.h.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YTimeField.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YTimeField.cc

5.149 YTimeFieldPrivate Struct Reference

Public Attributes

- bool **dummy**

5.149.1 Detailed Description

Definition at line 34 of file YTimeField.cc.

The documentation for this struct was generated from the following file:

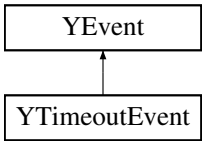
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YTimeField.cc

5.150 YTimeoutEvent Class Reference

Event to be returned upon timeout (i.e.

`#include <YEvent.h>`

Inheritance diagram for YTimeoutEvent:



Protected Member Functions

- virtual ~YTimeoutEvent ()

  Protected destructor - events can only be deleted via YDialog::deleteEvent().

Additional Inherited Members

5.150.1 Detailed Description

Event to be returned upon timeout (i.e.

no event available in the specified timeout)

Definition at line 346 of file YEvent.h.

5.150.2 Constructor & Destructor Documentation

5.150.2.1 ~YTimeoutEvent()

`virtual YTimeoutEvent::~YTimeoutEvent ( ) [inline], [protected], [virtual]`

Protected destructor - events can only be deleted via YDialog::deleteEvent().

The associated dialog will take care of this event and delete it when appropriate.

Definition at line 358 of file YEvent.h.

The documentation for this class was generated from the following file:

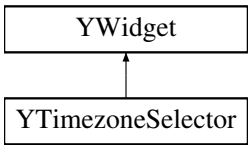
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YEvent.h

5.151 YTimezoneSelector Class Reference

A fancy widget with a world map.

`#include <YTimezoneSelector.h>`

Inheritance diagram for YTimezoneSelector:



Public Member Functions

- virtual ~YTimezoneSelector ()

  Destructor.
- virtual const char * widgetClass () const

  Return a descriptive name of this widget class for logging, debugging etc.
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.
- virtual std::string currentZone () const =0

  subclasses have to implement this to return value
- virtual void setCurrentZone (const std::string &zone, bool zoom)=0

  subclasses have to implement this to set value

Protected Member Functions

- YTimezoneSelector (YWidget *parent, const std::string &pixmap, const std::map< std::string, std::string > &timezones)

  Constructor.

5.151.1 Detailed Description

A fancy widget with a world map.

Definition at line 38 of file YTimezoneSelector.h.

5.151.2 Constructor & Destructor Documentation

5.151.2.1 YTimezoneSelector()

```
YTimezoneSelector::YTimezoneSelector (
            YWidget * parent,
            const std::string & pixmap,
            const std::map< std::string, std::string > & timezones )  [protected]
```

Constructor.

This widget isn't doing much on it's own, but the UI may have some fancy use.

- pixmap should be a png or jpg of a world map with centered 0°0° and the timezones are a map between zone.tab entry and user visible string.

The widget is only displaying timezones/cities in that map

Definition at line 43 of file YTimezoneSelector.cc.

5.151.3 Member Function Documentation

5.151.3.1 getProperty()

```
YPropertyValue YTimezoneSelector::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 93 of file YTimezoneSelector.cc.

5.151.3.2 propertySet()

```
const YPropertySet & YTimezoneSelector::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 58 of file YTimezoneSelector.cc.

5.151.3.3 setProperty()

```
bool YTimezoneSelector::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This function may throw YUIPropertyExceptions.

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 74 of file YTimezoneSelector.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YTimezoneSelector.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YTimezoneSelector.cc

5.152 YTimezoneSelectorPrivate Class Reference

5.152.1 Detailed Description

Definition at line 35 of file YTimezoneSelector.cc.

The documentation for this class was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YTimezoneSelector.cc

5.153 YTransText Class Reference

Helper class for translated strings: Stores a message in the original (untranslated) version along with the translation into the current locale.

`#include <YTransText.h>`

Public Member Functions

- YTransText (const std::string &orig, const std::string &translation)
  Constructor with both original and translated message.
- YTransText (const std::string &orig)
  Constructor that automatically translates the original message.
- YTransText (const YTransText &src)
  Copy constructor.
- YTransText & operator= (const YTransText &src)
  Assignment operator.
- const std::string & orig () const
  Return the original message.
- const std::string & translation () const
  Return the translation.
- const std::string & trans () const
  Return the translation.
- void setOrig (const std::string &newOrig)
  Set the original message.
- void setTranslation (const std::string &newTrans)
  Set the translation.
- bool operator< (const YTransText &other) const
  operator< : Compares translations.
- bool operator> (const YTransText &other) const
  operator> : Compares translations.
- bool operator== (const YTransText &other) const
  operator== : Compares translations.

5.153.1 Detailed Description

Helper class for translated strings: Stores a message in the original (untranslated) version along with the translation into the current locale.

Definition at line 36 of file YTransText.h.

5.153.2 Member Function Documentation

5.153.2.1 setOrig()

```
void YTransText::setOrig (
            const std::string & newOrig )  [inline]
```

Set the original message.

Does not touch the translation, so make sure you change both if you want to keep them synchronized!

Definition at line 95 of file YTransText.h.

5.153.2.2 trans()

```
const std::string& YTransText::trans ( ) const  [inline]
```

Return the translation.

(alias, just as a shortcut)

Definition at line 89 of file YTransText.h.

The documentation for this class was generated from the following file:

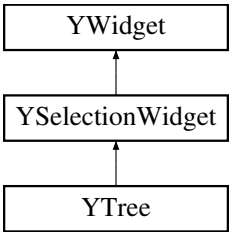
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YTransText.h

5.154 YTree Class Reference

Tree: List box that displays a (scrollable) list of hierarchical items from which the user can select exactly one.

```
#include <YTree.h>
```

Inheritance diagram for YTree:



Public Member Functions

- virtual ~YTree ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- virtual void rebuildTree ()=0

  Rebuild the displayed tree from the internally stored YTreeItems.
- virtual void addItems (const YItemCollection &itemCollection)

  Add multiple items.
- bool immediateMode () const

  Deliver even more events than with notify() set.
- void setImmediateMode (bool on=true)

  Set immediateMode() on or off.
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.
- const char * userInputProperty ()

  The name of the widget property that will return user input.
- bool hasMultiSelection () const

  Return 'true' if the user can select multiple items at the same time.
- virtual YTreeItem * currentItem ()=0

  Return the the item that currently has the keyboard focus or 0 if no item currently has the keyboard focus.
- YTreeItem * findItem (std::vector< std::string > &path) const

  Return item in the tree which matches path of labels or nullptr in case no item with such label was found.
- virtual void activate ()=0

  Activate the item selected in the tree.

Protected Member Functions

- YTree (YWidget *parent, const std::string &label, bool multiSelection, bool recursiveSelection)

  Constructor.
- YTreeItem * findItem (std::vector< std::string >::iterator path_begin, std::vector< std::string >::iterator path_end, YItemConstIterator begin, YItemConstIterator end) const

  Recursively looks for the first item in the tree of the menu items using depth first search.

5.154.1 Detailed Description

Tree: List box that displays a (scrollable) list of hierarchical items from which the user can select exactly one.

Each item has a label text and an optional icon (*).

This is very similar to SelectionBox, but each item can have subitems that can be open (expanded) or closed (collapsed).

The tree widget also has a caption label that is displayed above the tree. The hotkey displayed in that caption label will move the keyboard focus into the tree item list.

(*) Not all UIs (in particular not text-based UIs) support displaying icons, so an icon should never be an exclusive means to display any kind of information.

'multiSelection' indicates whether or not the user can select multiple items at the same time. This can only be set in the constructor.

Definition at line 56 of file YTree.h.

5.154.2 Member Function Documentation

5.154.2.1 activate()

```
virtual void YTree::activate ( )  [pure virtual]
```

Activate the item selected in the tree.

Can be used in tests to simulate user input.

Derived classes are required to implement this.

5.154.2.2 addItems()

```
void YTree::addItems (
             const YItemCollection & itemCollection )  [virtual]
```

Add multiple items.

For some UIs, this can be more efficient than calling addItem() multiple times. This function also automatically calls rebuildTree() at the end.

Derived classes can overwrite this function, but they should call this base class function at the end of the new implementation.

Reimplemented from YSelectionWidget.

Reimplemented from YSelectionWidget.

Definition at line 84 of file YTree.cc.

5.154.2.3 currentItem()

```
virtual YTreeItem* YTree::currentItem ( )  [pure virtual]
```

Return the the item that currently has the keyboard focus or 0 if no item currently has the keyboard focus.

Notice that for a MultiSelectionBox the current item is not necessarily selected, i.e., its check box may or may not be checked.

Derived classes are required to implement this function.

5.154.2.4 findItem() [1/2]

```
YTreeItem * YTree::findItem (
            std::vector< std::string > & path ) const
```

Return item in the tree which matches path of labels or nullptr in case no item with such label was found.

Accepts vector of strings which denote path to the node.

Definition at line 175 of file YTree.cc.

5.154.2.5 findItem() [2/2]

```
YTreeItem * YTree::findItem (
             std::vector< std::string >::iterator path_begin,
             std::vector< std::string >::iterator path_end,
             YItemConstIterator begin,
             YItemConstIterator end ) const  [protected]
```

Recursively looks for the first item in the tree of the menu items using depth first search.

Return nullptr if item which matches full path is not found.

Definition at line 182 of file YTree.cc.

5.154.2.6 getProperty()

```
YPropertyValue YTree::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 149 of file YTree.cc.

5.154.2.7 immediateMode()

```
bool YTree::immediateMode ( ) const
```

Deliver even more events than with notify() set.

For YTree, this is relevant mostly for the NCurses UI:

In graphical UIs like the Qt UI, the user can use the mouse to select an item in a tree. With notify() set, this will send an event right away (i.e., it will make UserInput and related return, while normally it would only return when the user clicks a PushButton).

In the NCurses UI, there is no mouse, so the user has to use the cursor keys to move to the item he wants to select. In immediateMode(), every cursor key press will make the tree send an event. Without immediateMode(), the NCTree will wait until the user hits the [Return] key until an event is sent. Depending on what the application does upon each selection box event, immediateMode() might make the application less responsive.

Definition at line 67 of file YTree.cc.

5.154.2.8 propertySet()

```
const YPropertySet & YTree::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 92 of file YTree.cc.

5.154.2.9 rebuildTree()

```
virtual void YTree::rebuildTree ( )  [pure virtual]
```

Rebuild the displayed tree from the internally stored YTreeItems.

The application should call this (once) after all items have been added with addItem(). YTree::addItems() calls this automatically.

Derived classes are required to implement this.

5.154.2.10 setProperty()

```
bool YTree::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Reimplemented from YWidget.

This function may throw YUIPropertyExceptions.

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented from YWidget.

Definition at line 126 of file YTree.cc.

5.154.2.11 userInputProperty()

```
const char* YTree::userInputProperty ( )  [inline], [virtual]
```

The name of the widget property that will return user input.

Inherited from YWidget.

Reimplemented from YWidget.

Definition at line 165 of file YTree.h.

The documentation for this class was generated from the following files:

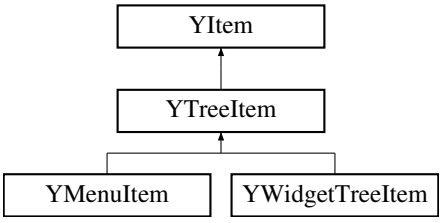
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YTree.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YTree.cc

5.155 YTreeItem Class Reference

Item class for tree items.

```
#include <YTreeItem.h>
```

Inheritance diagram for YTreeItem:



Public Member Functions

- YTreeItem (const std::string &label, bool isOpen=false)

  Constructors for toplevel items.
- **YTreeItem** (const std::string &label, const std::string &iconName, bool isOpen=false)
- YTreeItem (YTreeItem *parent, const std::string &label, bool isOpen=false)

  Constructors for items that have a parent item.
- **YTreeItem** (YTreeItem *parent, const std::string &label, const std::string &iconName, bool isOpen=false)
- virtual ~YTreeItem ()

  Destructor.
- virtual bool hasChildren () const

  Return 'true' if this item has any child items.
- virtual YItemIterator childrenBegin ()

  Return an iterator that points to the first child item of this item.
- virtual YItemConstIterator **childrenBegin** () const
- virtual YItemIterator childrenEnd ()

  Return an iterator that points after the last child item of this item.
- virtual YItemConstIterator **childrenEnd** () const
- virtual void addChild (YItem *item_disown)

  Add a child item to this item.
- virtual void deleteChildren ()

  Delete all child items.
- bool isOpen () const

  Return 'true' if this tree item should be displayed open (with its children visible) by default.
- void setOpen (bool open)

  Change the 'isOpen' flag.
- virtual YTreeItem * parent () const

  Returns this item's parent item or 0 if it is a toplevel item.

5.155.1 Detailed Description

Item class for tree items.

This class implements children management.

Definition at line 35 of file YTreeItem.h.

5.155.2 Constructor & Destructor Documentation

5.155.2.1 YTreeItem()

```
YTreeItem::YTreeItem (
            YTreeItem * parent,
            const std::string & label,
            bool isOpen = false )
```

Constructors for items that have a parent item.

They will automatically register this item with the parent item. The parent assumes ownership of this item and will delete it in its (the parent's) destructor.

Definition at line 49 of file YTreeItem.cc.

5.155.2.2 ~YTreeItem()

```
YTreeItem::~YTreeItem ( )  [virtual]
```

Destructor.

This will delete all children.

Definition at line 74 of file YTreeItem.cc.

5.155.3 Member Function Documentation

5.155.3.1 addChild()

```
void YTreeItem::addChild (
            YItem * item_disown )  [virtual]
```

Add a child item to this item.

Note that the constructors that accept a parent pointer will automatically add themselves to their parent, so applications will normally not have to call this function.

Definition at line 80 of file YTreeItem.cc.

5.155.3.2 childrenBegin()

```
virtual YItemIterator YTreeItem::childrenBegin ( )  [inline], [virtual]
```

Return an iterator that points to the first child item of this item.

Reimplemented from YItem.

Reimplemented from YItem.

Definition at line 83 of file YTreeItem.h.

5.155.3.3 childrenEnd()

```
virtual YItemIterator YTreeItem::childrenEnd ( )  [inline], [virtual]
```

Return an iterator that points after the last child item of this item.

Reimplemented from YItem.

Reimplemented from YItem.

Definition at line 91 of file YTreeItem.h.

5.155.3.4 hasChildren()

```
virtual bool YTreeItem::hasChildren ( ) const  [inline], [virtual]
```

Return 'true' if this item has any child items.

Reimplemented from YItem.

Reimplemented from YItem.

Definition at line 76 of file YTreeItem.h.

5.155.3.5 isOpen()

```
bool YTreeItem::isOpen ( ) const
```

Return 'true' if this tree item should be displayed open (with its children visible) by default.

Notice that this will always return 'false' for tree items without children.

Definition at line 101 of file YTreeItem.cc.

5.155.3.6 parent()

```
virtual YTreeItem* YTreeItem::parent ( ) const  [inline], [virtual]
```

Returns this item's parent item or 0 if it is a toplevel item.

Reimplemented from YItem.

Reimplemented from YItem.

Reimplemented in YMenuItem.

Definition at line 127 of file YTreeItem.h.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YTreeItem.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YTreeItem.cc

5.156 YTreePrivate Struct Reference

Public Attributes

- bool **immediateMode**

5.156.1 Detailed Description

Definition at line 37 of file YTree.cc.

The documentation for this struct was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YTree.cc

5.157 YUI Class Reference

Abstract base class of a libYUI user interface.

```
#include <YUI.h>
```

Public Member Functions

- virtual ~YUI ()

  Destructor.
- void shutdownThreads ()

  Shut down multithreading.
- virtual void blockEvents (bool block=true)

  Block (or unblock) events.
- void unblockEvents ()

  Unblock events previously blocked.
- virtual bool eventsBlocked () const

  Returns 'true' if events are currently blocked.
- virtual void deleteNotify (YWidget *widget)

  Notification that a widget is being deleted.
- void topmostConstructorHasFinished ()

  Must be called after the constructor of the Qt/NCurses ui is ready.
- bool runningWithThreads () const

  Running with threads?
- void uiThreadMainLoop ()

  This method implements the UI thread in case it is existing.
- YBuiltinCaller * builtinCaller () const

  Return the transparent inter-thread communication.
- void setBuiltinCaller (YBuiltinCaller *caller)

  Set the transparent inter-thread communication.
- virtual YEvent * runPkgSelection (YWidget *packageSelector)=0

  UI-specific runPkgSelection method.
- YWidget * sendWidgetID (const std::string &id)

  Send a widget ID.

Static Public Member Functions

- static YUI * ui ()

  Access the global UI.
- static YWidgetFactory * widgetFactory ()

  Return the widget factory that provides all the createXY() methods for standard (mandatory, i.e.
- static YOptionalWidgetFactory * optionalWidgetFactory ()

  Return the widget factory that provides all the createXY() methods for optional ("special") widgets and the corresponding hasXYWidget() methods.
- static YApplication * app ()

  Return the global YApplication object.
- static YApplication * application ()

  Aliases for YUI::app()
- static YApplication * **yApp** ()
- static void ensureUICreated ()

  Make sure there is a UI (with a UI plug-in) created.

Protected Member Functions

- YUI (bool withThreads)

  Constructor.
- virtual YWidgetFactory * createWidgetFactory ()=0

  Create the widget factory that provides all the createXY() methods for standard (mandatory, i.e.
- virtual YOptionalWidgetFactory * createOptionalWidgetFactory ()=0

  Create the widget factory that provides all the createXY() methods for optional ("special") widgets and the corresponding hasXYWidget() methods.
- virtual YApplication * createApplication ()=0

  Create the YApplication object that provides global methods.
- virtual void idleLoop (int fd_ycp)=0

  This virtual method is called when threads are activated in case the execution control is currently on the side of the module.
- void terminateUIThread ()

  Tells the ui thread that it should terminate and waits until it does so.
- void createUIThread ()

  Creates and launches the ui thread.
- virtual void uiThreadDestructor ()

  Destructor for the UI thread.
- void signalUIThread ()

  Signals the ui thread by sending one byte through the pipe to it.
- bool waitForUIThread ()

  Waits for the ui thread to send one byte through the pipe to the ycp thread and reads this byte from the pipe.
- void signalYCPThread ()

  Signals the ycp thread by sending one byte through the pipe to it.
- bool waitForYCPThread ()

  Waits for the ycp thread to send one byte through the pipe to the ycp thread and reads this byte from the pipe.
- void setButtonOrderFromEnvironment ()

  Set the button order (in YButtonBox widgets) from environment variables:

Protected Attributes

- bool _withThreads

  true if a seperate UI thread is created
- pthread_t _uiThread

  Handle to the ui thread.
- YBuiltinCaller * _builtinCaller

  Inter-thread communication between the YCP thread and the UI thread: The YCP thread supplies data here and signals the UI thread, the UI thread picks up the data, executes the function, puts the result here and signals the YCP thread that waits until the result is available.
- int pipe_to_ui [2]

  Used to synchronize data transfer with the ui thread.
- int pipe_from_ui [2]

  Used to synchronize data transfer with the ui thread.
- bool _terminate_ui_thread

  This is a flag that signals the ui thread that it should terminate.
- bool _eventsBlocked

  Flag that keeps track of blocked events.

Friends

- class **YUIFunction**
- class **YUILoader**
- void * **start_ui_thread** (void *ui_int)

5.157.1 Detailed Description

Abstract base class of a libYUI user interface.

Definition at line 48 of file YUI.h.

5.157.2 Member Function Documentation

5.157.2.1 app()

```
YApplication * YUI::app ( )  [static]
```

Return the global YApplication object.

This will create the YApplication upon the first call and return a pointer to the one and only (singleton) YApplication upon each subsequent call. This may throw exceptions if the YApplication cannot be created.

Definition at line 162 of file YUI.cc.

5.157.2.2 blockEvents()

```
virtual void YUI::blockEvents (
             bool block = true )  [inline], [virtual]
```

Block (or unblock) events.

If events are blocked, any event sent should be ignored until events are unblocked again.

This default implementation keeps track of a simple internal flag that can be queried with eventsBlocked(), so if you reimplement blockEvents(), be sure to reimplement eventsBlocked() as well.

Definition at line 161 of file YUI.h.

5.157.2.3 builtinCaller()

```
YBuiltinCaller* YUI::builtinCaller ( ) const  [inline]
```

Return the transparent inter-thread communication.

This will return 0 until set from the outside.

Definition at line 212 of file YUI.h.

5.157.2.4 createApplication()

```
virtual YApplication* YUI::createApplication ( )  [protected], [pure virtual]
```

Create the YApplication object that provides global methods.

Derived classes are required to implement this.

5.157.2.5 createOptionalWidgetFactory()

```
virtual YOptionalWidgetFactory* YUI::createOptionalWidgetFactory ( )  [protected], [pure virtual]
```

Create the widget factory that provides all the createXY() methods for optional ("special") widgets and the corresponding hasXYWidget() methods.

Derived classes are required to implement this.

5.157.2.6 createWidgetFactory()

```
virtual YWidgetFactory* YUI::createWidgetFactory ( )  [protected], [pure virtual]
```

Create the widget factory that provides all the createXY() methods for standard (mandatory, i.e.

non-optional) widgets.

Derived classes are required to implement this.

5.157.2.7 deleteNotify()

```
virtual void YUI::deleteNotify (
            YWidget * widget )  [inline], [virtual]
```

Notification that a widget is being deleted.

This is called from the YWidget destructor.

Derived classes can implement this for any clean-up actions such as deleting any events that might be pending for that widget.

Definition at line 185 of file YUI.h.

5.157.2.8 ensureUICreated()

```
void YUI::ensureUICreated ( )  [static]
```

Make sure there is a UI (with a UI plug-in) created.

If there is none yet, this will use all-default parameters to load a UI plug-in and create a UI (without threads).

Definition at line 176 of file YUI.cc.

5.157.2.9 eventsBlocked()

```
virtual bool YUI::eventsBlocked ( ) const  [inline], [virtual]
```

Returns 'true' if events are currently blocked.

Reimplement this if you reimplement blockEvents().

Definition at line 176 of file YUI.h.

5.157.2.10 idleLoop()

```
virtual void YUI::idleLoop (
             int fd_ycp )  [protected], [pure virtual]
```

This virtual method is called when threads are activated in case the execution control is currently on the side of the module.

This means that no UserInput() or PollInput() is pending. The module just does some work. The UI <-> module protocol is in the "UI waits for the next command" state. The UI can override this method when it wants to react to user input or other external events such as repaint requests from the X server.

'fd_ycp' file descriptor that should be used to determine when to leave the idle loop. As soon as it is readable, the loop must be left. In order to avoid polling you can combine it with other ui-specific fds and do a common select() call.

5.157.2.11 optionalWidgetFactory()

```
YOptionalWidgetFactory * YUI::optionalWidgetFactory ( )  [static]
```

Return the widget factory that provides all the createXY() methods for optional ("special") widgets and the corresponding hasXYWidget() methods.

This will create the factory upon the first call and return a pointer to the one and only (singleton) factory upon each subsequent call. This may throw exceptions if the factory cannot be created.

Definition at line 147 of file YUI.cc.

5.157.2.12 runPkgSelection()

```
virtual YEvent* YUI::runPkgSelection (
             YWidget * packageSelector )  [pure virtual]
```

UI-specific runPkgSelection method.

Derived classes are required to implement this.

The packageSelector's dialog will take care of the event and delete it when appropriate. The returned pointer is valid until the next call to YDialog::userInput(), YDialog::pollInput(), or YUI::runPkgSelection() or until the dialog with the packageSelector is destroyed.

5.157.2.13 sendWidgetID()

```
YWidget * YUI::sendWidgetID (
             const std::string & id )
```

Send a widget ID.

This implementation simply sets the keyboard focus to that widget. If there is no widget with that ID, this will throw a YUIWidgetNotFoundException. This function returns the widget that was found in case the caller wants to do more with it than just set the keyboard focus to it.

Definition at line 487 of file YUI.cc.

5.157.2.14 setBuiltinCaller()

```
void YUI::setBuiltinCaller (
             YBuiltinCaller * caller )  [inline]
```

Set the transparent inter-thread communication.

Built-ins are only really called if there is a valid YBuiltinCaller set.

Definition at line 218 of file YUI.h.

5.157.2.15 setButtonOrderFromEnvironment()

```
void YUI::setButtonOrderFromEnvironment ( )  [protected]
```

Set the button order (in YButtonBox widgets) from environment variables:

```
$Y2_BUTTON_ORDER="KDE"
$Y2_BUTTON_ORDER="Gnome"
```

(all case insensitive)

Definition at line 392 of file YUI.cc.

5.157.2.16 shutdownThreads()

```
void YUI::shutdownThreads ( )
```

Shut down multithreading.

This needs to be called before the destructor if the UI was created with threads. If the UI was created without threads, this does nothing.

Definition at line 265 of file YUI.cc.

5.157.2.17 topmostConstructorHasFinished()

```
void YUI::topmostConstructorHasFinished ( )
```

Must be called after the constructor of the Qt/NCurses ui is ready.

Starts the ui thread.

Definition at line 188 of file YUI.cc.

5.157.2.18 uiThreadDestructor()

```
void YUI::uiThreadDestructor ( )  [protected], [virtual]
```

Destructor for the UI thread.

This will be called as the last thing the UI thread does.

Derived classes can overwrite this. In most cases it makes sense to call this base class method in the new implementation.

Definition at line 117 of file YUI.cc.

5.157.2.19 uiThreadMainLoop()

```
void YUI::uiThreadMainLoop ( )
```

This method implements the UI thread in case it is existing.

The loop consists of calling idleLoop, getting the next command from the YCPUIComponent, evaluating it, which possibly invovles calling userInput() or pollInput() and writes the answer back to the other thread where the request came from.

Definition at line 359 of file YUI.cc.

5.157.2.20 unblockEvents()

```
void YUI::unblockEvents ( )  [inline]
```

Unblock events previously blocked.

This is just an alias for blockEvents(false) for better readability.

Note: This method is intentionally not virtual.

Definition at line 169 of file YUI.h.

5.157.2.21 widgetFactory()

```
YWidgetFactory * YUI::widgetFactory ( )  [static]
```

Return the widget factory that provides all the createXY() methods for standard (mandatory, i.e.

non-optional) widgets.

This will create the factory upon the first call and return a pointer to the one and only (singleton) factory upon each subsequent call. This may throw exceptions if the factory cannot be created.

Definition at line 132 of file YUI.cc.

5.157.3 Member Data Documentation

5.157.3.1 _eventsBlocked

```
bool YUI::_eventsBlocked  [protected]
```

Flag that keeps track of blocked events.

Never query this directly, use eventsBlocked() instead.

Definition at line 367 of file YUI.h.

5.157.3.2 _terminate_ui_thread

```
bool YUI::_terminate_ui_thread  [protected]
```

This is a flag that signals the ui thread that it should terminate.

This is done by setting the flag to true. The ui thread replies by setting the flag back to false directly after terminating itself.

Definition at line 361 of file YUI.h.

5.157.3.3 pipe_from_ui

```
int YUI::pipe_from_ui[2]  [protected]
```

Used to synchronize data transfer with the ui thread.

It stores a pair of file descriptors of a pipe. For each YCP value we get from the ui thread, we read one aribrary byte from here.

Definition at line 353 of file YUI.h.

5.157.3.4 pipe_to_ui

```
int YUI::pipe_to_ui[2]  [protected]
```

Used to synchronize data transfer with the ui thread.

It stores a pair of file descriptors of a pipe. For each YCP value we send to the ui thread, we write one aribrary byte here.

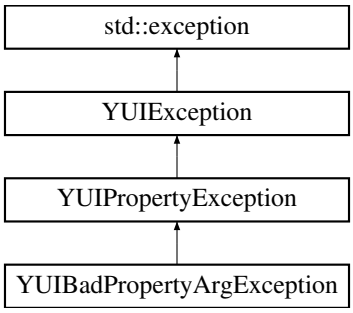
Definition at line 346 of file YUI.h.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUI.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUI.cc

5.158 YUIBadPropertyArgException Class Reference

Inheritance diagram for YUIBadPropertyArgException:



Public Member Functions

- **YUIBadPropertyArgException** (const YProperty &property, YWidget *widget, const std::string &message="")

Protected Member Functions

- virtual std::ostream & dumpOn (std::ostream &str) const

  Write proper error message with all relevant data.

Additional Inherited Members

5.158.1 Detailed Description

Definition at line 635 of file YUIException.h.

5.158.2 Member Function Documentation

5.158.2.1 dumpOn()

```
ostream & YUIBadPropertyArgException::dumpOn (
            std::ostream & str ) const  [protected], [virtual]
```

Write proper error message with all relevant data.

Reimplemented from YUIException.

Implements YUIPropertyException.

Definition at line 197 of file YUIException.cc.

The documentation for this class was generated from the following files:

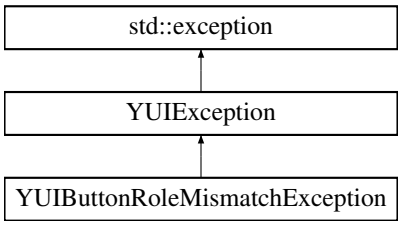
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.cc

5.159 YUIButtonRoleMismatchException Class Reference

Exception class for "wrong button roles in YButtonBox".

`#include <YUIException.h>`

Inheritance diagram for YUIButtonRoleMismatchException:



Public Member Functions

- **YUIButtonRoleMismatchException** (const std::string &msg)

Additional Inherited Members

5.159.1 Detailed Description

Exception class for "wrong button roles in YButtonBox".

Definition at line 905 of file YUIException.h.

The documentation for this class was generated from the following file:

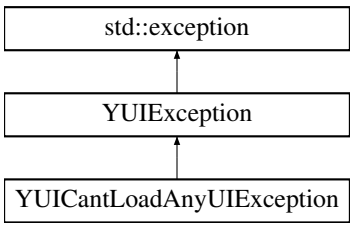
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.h

5.160 YUICantLoadAnyUIException Class Reference

Exception class for UI plugin load failure.

`#include <YUIException.h>`

Inheritance diagram for YUICantLoadAnyUIException:



Additional Inherited Members

5.160.1 Detailed Description

Exception class for UI plugin load failure.

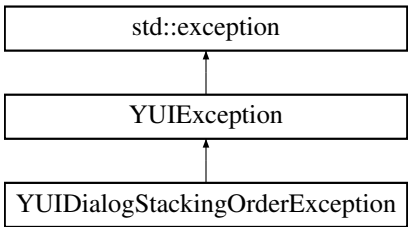
Definition at line 890 of file YUIException.h.

The documentation for this class was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.h

5.161 YUIDialogStackingOrderException Class Reference

Inheritance diagram for YUIDialogStackingOrderException:



Additional Inherited Members

5.161.1 Detailed Description

Definition at line 479 of file YUIException.h.

The documentation for this class was generated from the following file:

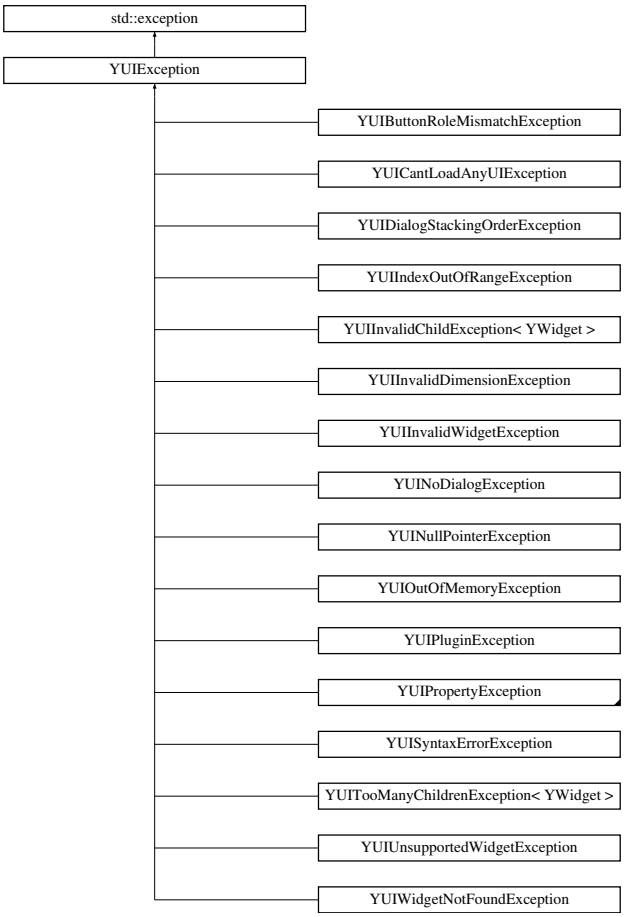
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.h

5.162 YUIException Class Reference

Base class for UI Exceptions.

`#include <YUIException.h>`

Inheritance diagram for YUIException:



Public Member Functions

- YUIException ()

  Default constructor.
- YUIException (const std::string &msg_r)

  Constructor taking a message.
- virtual ~YUIException () throw ()

  Destructor.
- const YCodeLocation & where () const

  Return YCodeLocation.
- void relocate (const YCodeLocation &newLocation) const

  Exchange location on rethrow.

- const std::string & msg () const

  Return the message string provided to the constructor.
- void setMsg (const std::string &msg)

  Set a new message string.
- std::string asString () const

  Error message provided by dumpOn as string.
- virtual const char * what () const throw ()

  Return message string.

Static Public Member Functions

- static std::string strErrno (int errno_r)

  Make a string from errno_r.
- static std::string strErrno (int errno_r, const std::string &msg)

  Make a string from errno_r and msg_r.
- static void log (const YUIException &exception, const YCodeLocation &location, const char *const prefix)

  Drop a log line on throw, catch or rethrow.

Protected Member Functions

- virtual std::ostream & dumpOn (std::ostream &str) const

  Overload this to print a proper error message.

Friends

- std::ostream & operator<< (std::ostream &str, const YUIException &obj)

  YUIException stream output.

5.162.1 Detailed Description

Base class for UI Exceptions.

Exception offers to store a message string passed to the constructor. Derived classes may provide additional information. Overload dumpOn to provide a proper error text.

Definition at line 297 of file YUIException.h.

5.162.2 Constructor & Destructor Documentation

5.162.2.1 YUIException() [1/2]

```
YUIException::YUIException ( )
```

Default constructor.

Use YUI_THROW to throw exceptions.

Definition at line 63 of file YUIException.cc.

5.162.2.2 YUIException() [2/2]

```
YUIException::YUIException (
            const std::string & msg_r )
```

Constructor taking a message.

Use YUI_THROW to throw exceptions.

Definition at line 68 of file YUIException.cc.

5.162.3 Member Function Documentation

5.162.3.1 log()

```
void YUIException::log (
            const YUIException & exception,
            const YCodeLocation & location,
            const char *const prefix )  [static]
```

Drop a log line on throw, catch or rethrow.

Used by YUI_THROW macros.

Definition at line 128 of file YUIException.cc.

5.162.3.2 msg()

```
const std::string& YUIException::msg ( ) const  [inline]
```

Return the message string provided to the constructor.

Note: This is not neccessarily the complete error message. The whole error message is provided by asString or dump↩
On.

Definition at line 334 of file YUIException.h.

5.162.3.3 what()

```
virtual const char* YUIException::what ( ) const throw ( )  [inline], [virtual]
```

Return message string.

Reimplemented from std::exception.

Definition at line 370 of file YUIException.h.

The documentation for this class was generated from the following files:

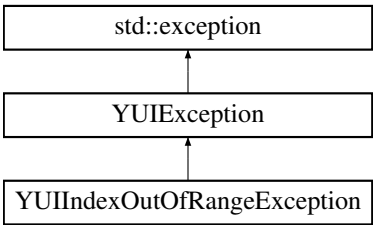
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.cc

5.163 YUIIndexOutOfRangeException Class Reference

Exception class for "index out of range".

```
#include <YUIException.h>
```

Inheritance diagram for YUIIndexOutOfRangeException:



Public Member Functions

- YUIIndexOutOfRangeException (int invalidIndex, int validMin, int validMax, const std::string &msg="")

  Constructor.
- int invalidIndex () const

  Return the offending index value.
- int validMin () const

  Return the valid minimum index.
- int validMax () const

  Return the valid maximum index.

Protected Member Functions

- virtual std::ostream & dumpOn (std::ostream &str) const

  Write proper error message with all relevant data.

Additional Inherited Members

5.163.1 Detailed Description

Exception class for "index out of range".

Definition at line 807 of file YUIException.h.

5.163.2 Constructor & Destructor Documentation

5.163.2.1 YUIIndexOutOfRangeException()

```
YUIIndexOutOfRangeException::YUIIndexOutOfRangeException (
            int invalidIndex,
            int validMin,
            int validMax,
            const std::string & msg = "" )  [inline]
```

Constructor.

'invalidIndex' is the offending index value. It should be between 'validMin' and 'validMax':

```
validMin <= index <= validMax
```

Definition at line 818 of file YUIException.h.

5.163.3 Member Function Documentation

5.163.3.1 dumpOn()

```
virtual std::ostream& YUIIndexOutOfRangeException::dumpOn (
            std::ostream & str ) const  [inline], [protected], [virtual]
```

Write proper error message with all relevant data.

Reimplemented from YUIException.

Reimplemented from YUIException.

Definition at line 852 of file YUIException.h.

The documentation for this class was generated from the following file:

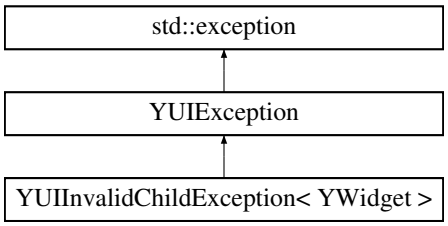
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.h

5.164 YUIInvalidChildException< YWidget > Class Template Reference

Exception class for "invalid child".

```
#include <YUIException.h>
```

Inheritance diagram for YUIInvalidChildException< YWidget >:



Public Member Functions

- **YUIInvalidChildException** (YWidget *container, YWidget *child=0)
- YWidget * container () const

  Returns the container widget whose child should be removed etc.
- YWidget * child () const

  Returns the child widget.

Protected Member Functions

- virtual std::ostream & dumpOn (std::ostream &str) const

  Write proper error message with all relevant data.

Additional Inherited Members

5.164.1 Detailed Description

template<class YWidget>
class YUIInvalidChildException< YWidget >

Exception class for "invalid child".

One of:

- Attempt to remove a child from a children manager that is not in that manager's children list.
- Child widget of wrong type added to a container widget, e.g., anything other than a YPushButton added to a YButtonBox.

Definition at line 712 of file YUIException.h.

5.164.2 Member Function Documentation

5.164.2.1 dumpOn()

```
template<class YWidget >
virtual std::ostream& YUIInvalidChildException< YWidget >::dumpOn (
            std::ostream & str ) const  [inline], [protected], [virtual]
```

Write proper error message with all relevant data.

Reimplemented from YUIException.

Reimplemented from YUIException.

Definition at line 742 of file YUIException.h.

The documentation for this class was generated from the following file:

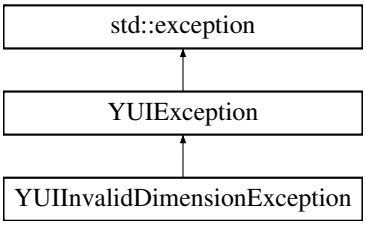
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.h

5.165 YUIInvalidDimensionException Class Reference

Exception class for "value other than YD_HORIZ or YD_VERT used for dimension".

`#include <YUIException.h>`

Inheritance diagram for YUIInvalidDimensionException:



Additional Inherited Members

5.165.1 Detailed Description

Exception class for "value other than YD_HORIZ or YD_VERT used for dimension".

Definition at line 792 of file YUIException.h.

The documentation for this class was generated from the following file:

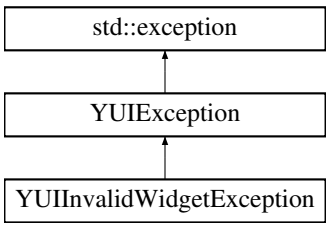
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.h

5.166 YUIInvalidWidgetException Class Reference

Exception class for invalid widgets.

`#include <YUIException.h>`

Inheritance diagram for YUIInvalidWidgetException:



Additional Inherited Members

5.166.1 Detailed Description

Exception class for invalid widgets.

This is typically caused by widget pointers that continue living after the corresponding widget has already been deleted.

Definition at line 440 of file YUIException.h.

The documentation for this class was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.h

5.167 YUILoader Class Reference

Class to load one of the concrete UI plug-ins: Qt, NCurses, Gtk.

```
#include <YUILoader.h>
```

Static Public Member Functions

- static void loadUI (bool withThreads=false)

  Load any of the available UI-plugins by this order and criteria:
- static void deleteUI ()

  This will make sure the UI singleton is deleted.
- static void loadRestAPIPlugin (const std::string &wantedGUI, bool withThreads=false)

  Method handles loading integration test framework and load underlying GUI using hints from loadUI.
- static void loadPlugin (const std::string &name, bool withThreads=false)

  Load a UI plug-in.
- static bool **pluginExists** (const std::string &pluginBaseName)
- static void loadExternalWidgets (const std::string &name, const std::string &symbol="_Z21createExternal↩ WidgetsPKc")

  Load the given External Widgets plugin followed by its graphical extension implementation in the following order in the same way as loadUI:

5.167.1 Detailed Description

Class to load one of the concrete UI plug-ins: Qt, NCurses, Gtk.

Definition at line 47 of file YUILoader.h.

5.167.2 Member Function Documentation

5.167.2.1 deleteUI()

```
void YUILoader::deleteUI ( )  [static]
```

This will make sure the UI singleton is deleted.

If the UI is already destroyed, it will do nothing. If there still is a UI object, it will be deleted.

This is particularly important for the NCurses UI so that the terminal settings are properly restored.

Definition at line 230 of file YUILoader.cc.

5.167.2.2 loadExternalWidgets()

```
void YUILoader::loadExternalWidgets (
             const std::string & name,
             const std::string & symbol = "_Z21createExternalWidgetsPKc" )  [static]
```

Load the given External Widgets plugin followed by its graphical extension implementation in the following order in the same way as loadUI:

- Qt, Gtk or NCurses

'name' is the user defined plugin name, graphical extension implementations have to be called 'name'-qt, 'name'-gtk and 'name'-ncurses. Following this rule plugin file names are as libyui-XX-YY.so.VER where: XX is the user defined name YY is the UI used (ncurses, gtk, qt) VER is the libyui so version 'symbol' is the function symbol to be loaded, e.g. YExternalWidgets* 'symbol'(void) (e.g. default YExternalWidgets* createExternalWidgets(const char *) see createE↩ WFunction_t definition)

Definition at line 295 of file YUILoader.cc.

5.167.2.3 loadPlugin()

```
void YUILoader::loadPlugin (
             const std::string & name,
             bool withThreads = false )  [static]
```

Load a UI plug-in.

'name' is one of the YUIPlugin_ -defines above.

This might throw exceptions.

Definition at line 241 of file YUILoader.cc.

5.167.2.4 loadUI()

```
void YUILoader::loadUI (
             bool withThreads = false )  [static]
```

Load any of the available UI-plugins by this order and criteria:

- Qt:
  - if $DISPLAY is set
  - NCurses is user-selected and stdout is *not* a TTY
- Gtk:
  - if $DISPLAY is set and Qt is not available,
  - a GTK-based desktop environment is detected from the environment variable XDG_CURRENT_DESKTOP
  - any of the above pre-conditions are met and NCurses is user-selected, but stdout is *not* a TTY
- NCurses:
  - if $DISPLAY is *not* set and stdout is a TTY
  - Qt and Gtk are not available and stdout is a TTY

This can be overridden by either:

- specifing one of the switches on the command-line of the program
  - '–gtk',
  - '–ncurses', or
  - '–qt'
- setting the environment variable YUI_PREFERED_BACKEND to one of
  - 'gtk',
  - 'ncurses', or
  - 'qt'

If a command-line switch is given to the program, the setting from the environment variable will be overridden by the UI-plugin chosen with the switch.

If the user-selected UI-plugin is not installed on the system, an installed UI-plugin will be chosen by the above criteria.

Definition at line 51 of file YUILoader.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUILoader.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUILoader.cc

5.168 YUILog Class Reference

UI logging.

`#include <YUILog.h>`

Public Member Functions

- std::ostream & log (YUILogLevel_t logLevel, const char *logComponent, const char *sourceFileName, int lineNo, const char *functionName)

  Generic log function.

Static Public Member Functions

- static std::ostream & debug (const char *logComponent, const char *sourceFileName, int lineNo, const char *functionName)

  Logging functions for each log level.
- static std::ostream & **milestone** (const char *logComponent, const char *sourceFileName, int lineNo, const char *functionName)
- static std::ostream & **warning** (const char *logComponent, const char *sourceFileName, int lineNo, const char *functionName)
- static std::ostream & **error** (const char *logComponent, const char *sourceFileName, int lineNo, const char *functionName)
- static YUILog * instance ()

  Return the singleton object for this class.
- static void enableDebugLogging (bool debugLogging=true)

  Enable or disable debug logging.
- static bool debugLoggingEnabled ()

  Return 'true' if debug logging is enabled, 'false' if not.
- static bool setLogFileName (const std::string &logFileName)

  Set the log file name to be used with the standard logger function.
- static std::string logFileName ()

  Return the current log file name or an empty string if stderr is used.
- static void setLoggerFunction (YUILoggerFunction loggerFunction)

  Set the UI logger function.
- static YUILoggerFunction loggerFunction (bool returnStdLogger=false)

  Return the UI logger function.
- static void setEnableDebugLoggingHooks (YUIEnableDebugLoggingFunction enableFunction, YUIDebug↩ LoggingEnabledFunction isEnabledFunction)

  Set the hook functions to enable/disable debug logging and to query if debug logging is enabled:
- static YUIEnableDebugLoggingFunction enableDebugLoggingHook ()

  Return the hook function that enables or disables debug logging or 0 if no such hook function is set.
- static YUIDebugLoggingEnabledFunction debugLoggingEnabledHook ()

  Return the hook function that checks if debug logging is enabled or 0 if no such hook function is set.
- static std::string basename (const std::string &fileNameWithPath)

  Return the base name without path from a file name with path.

5.168.1 Detailed Description

UI logging.

Definition at line 99 of file YUILog.h.

5.168.2 Member Function Documentation

5.168.2.1 debug()

```
ostream & YUILog::debug (
            const char * logComponent,
            const char * sourceFileName,
            int lineNo,
            const char * functionName )  [static]
```

Logging functions for each log level.

They all access the singleton object for this class. This means that the first call to any of those functions will create the singleton YUILog object.

Definition at line 487 of file YUILog.cc.

5.168.2.2 instance()

```
YUILog * YUILog::instance ( )  [static]
```

Return the singleton object for this class.

This will create the singleton if it doesn't exist yet.

Definition at line 333 of file YUILog.cc.

5.168.2.3 log()

```
ostream & YUILog::log (
            YUILogLevel_t logLevel,
            const char * logComponent,
            const char * sourceFileName,
            int lineNo,
            const char * functionName )
```

Generic log function.

debug(), milestone() etc. ultimately all call this function.

Definition at line 456 of file YUILog.cc.

5.168.2.4 logFileName()

```
string YUILog::logFileName ( )  [static]
```

Return the current log file name or an empty string if stderr is used.

Notice that this information is only relevant as long as the standard logger function is used.

Definition at line 384 of file YUILog.cc.

5.168.2.5 loggerFunction()

```
YUILoggerFunction YUILog::loggerFunction (
            bool returnStdLogger = false )  [static]
```

Return the UI logger function.

If stderr is used for logging (i.e. no logger function set), 0 is returned (unless 'returnStdLogger' is 'true', in which case the internally used stderr-logger is returned).

Definition at line 421 of file YUILog.cc.

5.168.2.6 setEnableDebugLoggingHooks()

```
void YUILog::setEnableDebugLoggingHooks (
            YUIEnableDebugLoggingFunction enableFunction,
            YUIDebugLoggingEnabledFunction isEnabledFunction )  [static]
```

Set the hook functions to enable/disable debug logging and to query if debug logging is enabled:

```
void enableDebugLogging( bool enable );
bool debugLoggingEnabled();
```

If those functions are set, they will be used instead of the internal "debugLogging" flag.

Definition at line 433 of file YUILog.cc.

5.168.2.7 setLogFileName()

```
bool YUILog::setLogFileName (
             const std::string & logFileName )  [static]
```

Set the log file name to be used with the standard logger function.

Output will be appended to this file.

Until this file name is set, the standard logger function logs to stderr. Set the log file name to an empty string to log to stderr again.

This returns 'true' upon success (opening the file was successful), 'false' upon error.

Notice:

(1) This file name is only relevant as long as the standard logger function is used. Custom logger functions may or may not use this file name.

(2) No attempt is made to do anything fancy with the log file like log file rotation when a certain file size is reached. Applications that need this should use a custom logger function. See also setLoggerFunction().

Definition at line 348 of file YUILog.cc.

5.168.2.8 setLoggerFunction()

```
void YUILog::setLoggerFunction (
             YUILoggerFunction loggerFunction )  [static]
```

Set the UI logger function.

This is the function that will ultimately receive all UI log output (except debug logging if debug logging is disabled).

By default, all logging is output to stderr. This behaviour can be restored if 0 is passed as a function pointer here.

Definition at line 411 of file YUILog.cc.

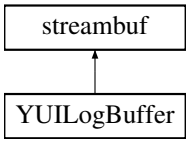
The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUILog.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUILog.cc

5.169 YUILogBuffer Class Reference

Stream buffer class that will use the YUILog's logger function.

Inheritance diagram for YUILogBuffer:



Public Member Functions

- YUILogBuffer ()

  Constructor.
- virtual ~YUILogBuffer ()

  Destructor.
- virtual std::streamsize xsputn (const char *sequence, std::streamsize maxLength)

  Write (no more than maxLength characters of) a sequence of characters and return the number of characters written.
- virtual int overflow (int ch=EOF)

  Write one character in case of buffer overflow.
- std::streamsize writeBuffer (const char *sequence, std::streamsize seqLen)

  Write (no more than maxLength characters of) a sequence of characters and return the number of characters written.
- void flush ()

  Flush the output buffer: Write any data unwritten so far.

Friends

- class **YUILog**

5.169.1 Detailed Description

Stream buffer class that will use the YUILog's logger function.

See also http://blogs.awesomeplay.com/elanthis/archives/2007/12/10/

Definition at line 58 of file YUILog.cc.

5.169.2 Member Function Documentation

5.169.2.1 overflow()

```
int YUILogBuffer::overflow (
            int ch = EOF )  [virtual]
```

Write one character in case of buffer overflow.

Reimplemented from streambuf.

Definition at line 170 of file YUILog.cc.

5.169.2.2 writeBuffer()

```
std::streamsize YUILogBuffer::writeBuffer (
            const char * sequence,
            std::streamsize seqLen )
```

Write (no more than maxLength characters of) a sequence of characters and return the number of characters written.

This is the actual worker function that uses the YUILog::loggerFunction to actually write characters.

Definition at line 125 of file YUILog.cc.

5.169.2.3 xsputn()

```
std::streamsize YUILogBuffer::xsputn (
            const char * sequence,
            std::streamsize maxLength )  [virtual]
```

Write (no more than maxLength characters of) a sequence of characters and return the number of characters written.

Reimplemented from streambuf. This is called for all output operations on the associated ostream.

Definition at line 163 of file YUILog.cc.

The documentation for this class was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUILog.cc

5.170 YUILogPrivate Struct Reference

Public Member Functions

- YUILogPrivate ()

  Constructor.
- ~YUILogPrivate ()

  Destructor.
- YPerThreadLogInfo * findCurrentThread ()

  Find the per-thread logging information for the current thread.

Public Attributes

- string **logFileName**
- std::ofstream **stdLogStream**
- YUILoggerFunction **loggerFunction**
- YUIEnableDebugLoggingFunction **enableDebugLoggingHook**
- YUIDebugLoggingEnabledFunction **debugLoggingEnabledHook**
- bool **enableDebugLogging**
- std::vector< YPerThreadLogInfo * > **threadLogInfo**

5.170.1 Detailed Description

Definition at line 254 of file YUILog.cc.

5.170.2 Member Function Documentation

5.170.2.1 findCurrentThread()

```
YPerThreadLogInfo* YUILogPrivate::findCurrentThread ( )  [inline]
```

Find the per-thread logging information for the current thread.

Create a new one if it doesn't exist yet.

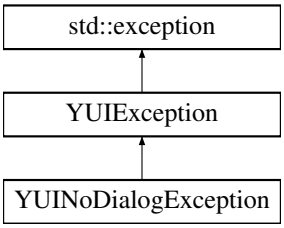
Definition at line 279 of file YUILog.cc.

The documentation for this struct was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUILog.cc

5.171 YUINoDialogException Class Reference

Inheritance diagram for YUINoDialogException:



Additional Inherited Members

5.171.1 Detailed Description

Definition at line 467 of file YUIException.h.

The documentation for this class was generated from the following file:

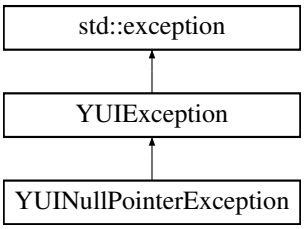
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.h

5.172 YUINullPointerException Class Reference

Exception class for generic null pointer exceptions.

`#include <YUIException.h>`

Inheritance diagram for YUINullPointerException:



Additional Inherited Members

5.172.1 Detailed Description

Exception class for generic null pointer exceptions.

When available, a more specialized exception class should be used.

Definition at line 407 of file YUIException.h.

The documentation for this class was generated from the following file:

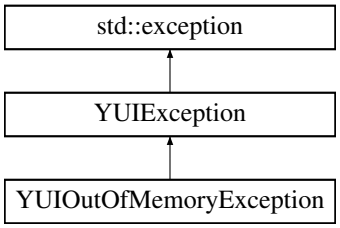
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.h

5.173 YUIOutOfMemoryException Class Reference

Exception class for "out of memory".

`#include <YUIException.h>`

Inheritance diagram for YUIOutOfMemoryException:



Additional Inherited Members

5.173.1 Detailed Description

Exception class for "out of memory".

Typically used if operator new returned 0.

Definition at line 423 of file YUIException.h.

The documentation for this class was generated from the following file:

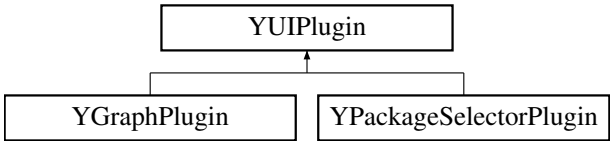
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.h

5.174 YUIPlugin Class Reference

Wrapper class for dlopen() and related.

`#include <YUIPlugin.h>`

Inheritance diagram for YUIPlugin:



Public Member Functions

- YUIPlugin (const char *pluginLibBaseName)

  Constructor: Load the specified plugin library from the standard UI plugin directory (/usr/lib/yui/).
- virtual ~YUIPlugin ()

  Destructor.
- void unload ()

  Unload this plugin.
- void * locateSymbol (const char *symbol)

  Try to locate the specified symbol (function or global variable) in the plugin library.
- bool error () const

  Returns 'true' if there was an error loading the plugin.
- bool success () const

  Returns 'true' if there was no error loading the plugin.
- std::string errorMsg () const

  Returns a human readable (but in most cases untranslated) error message if there was an error.

Protected Member Functions

- void * pluginLibHandle ()

  Returns the dlopen() handle of the plugin library.
- std::string pluginLibBaseName () const

  Returns the base name of the plugin library.
- std::string pluginLibFullPath () const

  Returns the full path of the plugin library.

5.174.1 Detailed Description

Wrapper class for dlopen() and related.

Definition at line 35 of file YUIPlugin.h.

5.174.2 Constructor & Destructor Documentation

5.174.2.1 ~YUIPlugin()

```
YUIPlugin::~YUIPlugin ( )  [virtual]
```

Destructor.

Please note that this will NOT attempt to unload the plugin library since this is usually counterproductive. If unloading the plugin is desired, call unload() manually.

Definition at line 60 of file YUIPlugin.cc.

5.174.3 Member Function Documentation

5.174.3.1 locateSymbol()

```
void * YUIPlugin::locateSymbol (
            const char * symbol )
```

Try to locate the specified symbol (function or global variable) in the plugin library.

Returns the in-memory address of that symbol or 0 if it could not be found or if loading the plugin library had failed in the constructor.

Definition at line 89 of file YUIPlugin.cc.

5.174.3.2 unload()

```
void YUIPlugin::unload ( )
```

Unload this plugin.

This calls dlclose() which will unload the plugin library if it is no longer used, i.e. if the reference count dlopen() uses reaches 0.

Definition at line 68 of file YUIPlugin.cc.

The documentation for this class was generated from the following files:

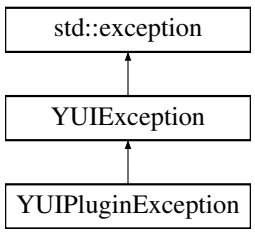
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIPlugin.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIPlugin.cc

5.175 YUIPluginException Class Reference

Exception class for plugin load failure.

```
#include <YUIException.h>
```

Inheritance diagram for YUIPluginException:



Public Member Functions

- **YUIPluginException** (const std::string &pluginName)

Additional Inherited Members

5.175.1 Detailed Description

Exception class for plugin load failure.

Definition at line 875 of file YUIException.h.

The documentation for this class was generated from the following file:

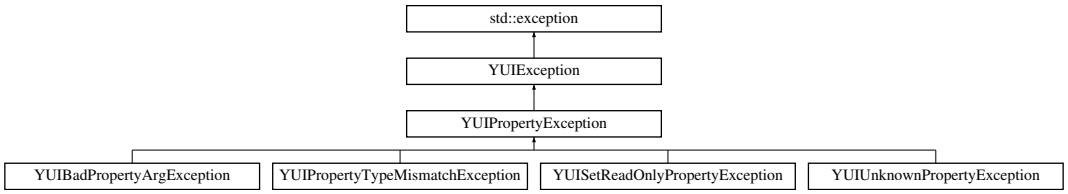
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.h

5.176 YUIPropertyException Class Reference

Abstract base class for widget property exceptions.

`#include <YUIException.h>`

Inheritance diagram for YUIPropertyException:



Public Member Functions

- YProperty property () const

  Returns the property that caused this exception.
- YWidget * widget () const

  Returns the corresponding widget or 0 if there was none.
- void setWidget (YWidget *w)

  Set the corresponding widget.

Protected Member Functions

- **YUIPropertyException** (const YProperty &prop, YWidget *widget=0)
- virtual std::ostream & dumpOn (std::ostream &str) const =0

  Write proper error message with all relevant data.

Additional Inherited Members

5.176.1 Detailed Description

Abstract base class for widget property exceptions.

Definition at line 506 of file YUIException.h.

5.176.2 Member Function Documentation

5.176.2.1 dumpOn()

```
virtual std::ostream& YUIPropertyException::dumpOn (
            std::ostream & str ) const  [protected], [pure virtual]
```

Write proper error message with all relevant data.

Reimplemented from YUIException.

Reimplemented from YUIException.

Implemented in YUIBadPropertyArgException, YUISetReadOnlyPropertyException, YUIPropertyTypeMismatchException, and YUIUnknownPropertyException.

The documentation for this class was generated from the following file:

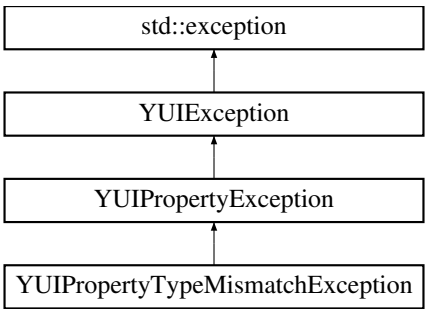
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.h

5.177 YUIPropertyTypeMismatchException Class Reference

Exception class for "property type mismatch": The application tried to set a property with a wrong type.

```
#include <YUIException.h>
```

Inheritance diagram for YUIPropertyTypeMismatchException:



Public Member Functions

- **YUIPropertyTypeMismatchException** (const YProperty &property, YPropertyType type, YWidget *widget=0)
- YPropertyType type () const

  Return the property type the application tried to set.

Protected Member Functions

- virtual std::ostream & dumpOn (std::ostream &str) const

  Write proper error message with all relevant data.

Additional Inherited Members

5.177.1 Detailed Description

Exception class for "property type mismatch": The application tried to set a property with a wrong type.

Definition at line 578 of file YUIException.h.

5.177.2 Member Function Documentation

5.177.2.1 dumpOn()

```
ostream & YUIPropertyTypeMismatchException::dumpOn (
            std::ostream & str ) const  [protected], [virtual]
```

Write proper error message with all relevant data.

Reimplemented from YUIException.

Implements YUIPropertyException.

Definition at line 162 of file YUIException.cc.

The documentation for this class was generated from the following files:

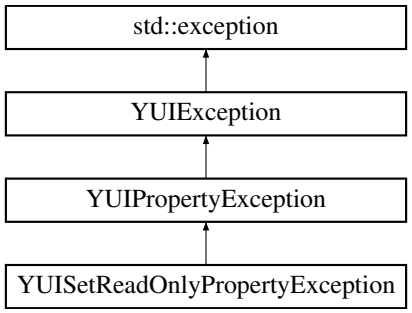
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.cc

5.178 YUISetReadOnlyPropertyException Class Reference

Exception class for attempt to set a read-only property.

`#include <YUIException.h>`

Inheritance diagram for YUISetReadOnlyPropertyException:



Public Member Functions

- **YUISetReadOnlyPropertyException** (const YProperty &property, YWidget *widget=0)

Protected Member Functions

- virtual std::ostream & dumpOn (std::ostream &str) const

  Write proper error message with all relevant data.

Additional Inherited Members

5.178.1 Detailed Description

Exception class for attempt to set a read-only property.

Definition at line 613 of file YUIException.h.

5.178.2 Member Function Documentation

5.178.2.1 dumpOn()

```
ostream & YUISetReadOnlyPropertyException::dumpOn (
            std::ostream & str ) const  [protected], [virtual]
```

Write proper error message with all relevant data.

Reimplemented from YUIException.

Implements YUIPropertyException.

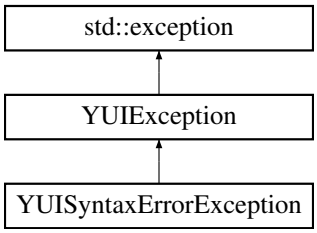
Definition at line 181 of file YUIException.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.cc

5.179 YUISyntaxErrorException Class Reference

Inheritance diagram for YUISyntaxErrorException:



Public Member Functions

- **YUISyntaxErrorException** (const std::string &msg)

Additional Inherited Members

5.179.1 Detailed Description

Definition at line 491 of file YUIException.h.

The documentation for this class was generated from the following file:

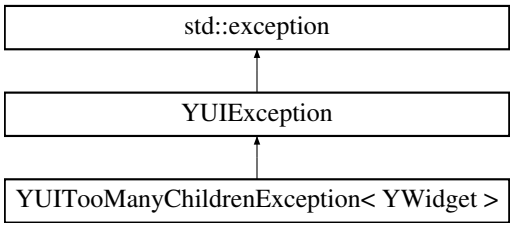
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.h

5.180 YUITooManyChildrenException< YWidget > Class Template Reference

Exception class for "too many children": Attempt to add a child to a widget class that can't handle children (YPushButton etc.) or just one child (YFrame, YDialog).

`#include <YUIException.h>`

Inheritance diagram for YUITooManyChildrenException< YWidget >:



Public Member Functions

- **YUITooManyChildrenException** (YWidget *container)
- YWidget * container () const

  Returns the container widget that can't handle that many children.

Protected Member Functions

- virtual std::ostream & dumpOn (std::ostream &str) const

  Write proper error message with all relevant data.

Additional Inherited Members

5.180.1 Detailed Description

template<class YWidget>
class YUITooManyChildrenException< YWidget >

Exception class for "too many children": Attempt to add a child to a widget class that can't handle children (YPushButton etc.) or just one child (YFrame, YDialog).

Definition at line 663 of file YUIException.h.

5.180.2 Member Function Documentation

5.180.2.1 dumpOn()

```
template<class YWidget >
virtual std::ostream& YUITooManyChildrenException< YWidget >::dumpOn (
            std::ostream & str ) const  [inline], [protected], [virtual]
```

Write proper error message with all relevant data.

Reimplemented from YUIException.

Reimplemented from YUIException.

Definition at line 686 of file YUIException.h.

The documentation for this class was generated from the following file:

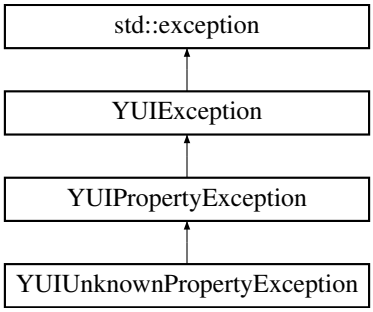
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.h

5.181 YUIUnknownPropertyException Class Reference

Exception class for "unknown property name": The application tried to set (or query) a property that doesn't exist.

```
#include <YUIException.h>
```

Inheritance diagram for YUIUnknownPropertyException:



Public Member Functions

- **YUIUnknownPropertyException** (const std::string &propertyName, YWidget *widget=0)

Protected Member Functions

- virtual std::ostream & dumpOn (std::ostream &str) const

  Write proper error message with all relevant data.

Additional Inherited Members

5.181.1 Detailed Description

Exception class for "unknown property name": The application tried to set (or query) a property that doesn't exist.

Definition at line 553 of file YUIException.h.

5.181.2 Member Function Documentation

5.181.2.1 dumpOn()

```
ostream & YUIUnknownPropertyException::dumpOn (
            std::ostream & str ) const  [protected], [virtual]
```

Write proper error message with all relevant data.

Reimplemented from YUIException.

Implements YUIPropertyException.

Definition at line 141 of file YUIException.cc.

The documentation for this class was generated from the following files:

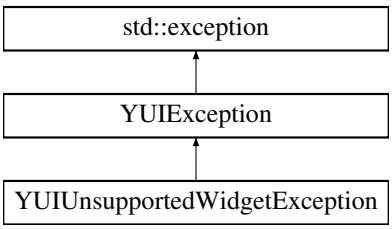
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.cc

5.182 YUIUnsupportedWidgetException Class Reference

Exception class for "optional widget not supported".

```
#include <YUIException.h>
```

Inheritance diagram for YUIUnsupportedWidgetException:



Public Member Functions

- **YUIUnsupportedWidgetException** (const std::string &widgetType)

Additional Inherited Members

5.182.1 Detailed Description

Exception class for "optional widget not supported".

Note that applications are supposed to check with YUI::optionalWidgetFactory()->hasXYWidget() before trying to create such a widget. This exception is thrown if that check wasn't done, the application tried to create that kind of widget anyway, but the UI doesn't support that widget.

Definition at line 775 of file YUIException.h.

The documentation for this class was generated from the following file:

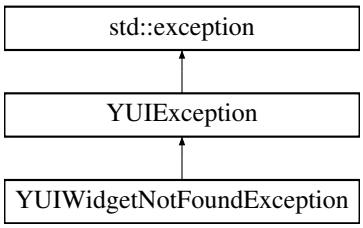
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.h

5.183 YUIWidgetNotFoundException Class Reference

Exception class for "No widget found with that ID".

```
#include <YUIException.h>
```

Inheritance diagram for YUIWidgetNotFoundException:



Public Member Functions

- **YUIWidgetNotFoundException** (const std::string &idString)

Additional Inherited Members

5.183.1 Detailed Description

Exception class for "No widget found with that ID".

Definition at line 455 of file YUIException.h.

The documentation for this class was generated from the following file:

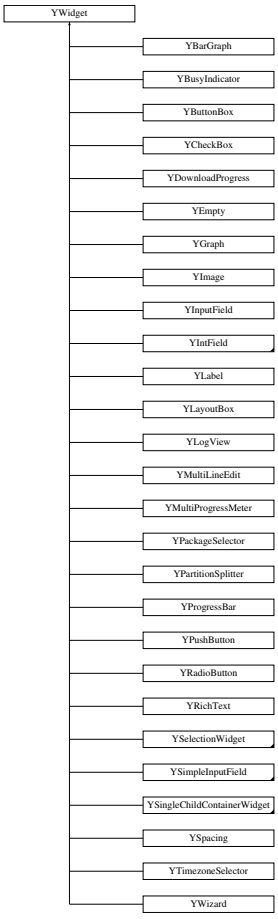
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YUIException.h

5.184 YWidget Class Reference

Abstract base class of all UI widgets.

`#include <YWidget.h>`

Inheritance diagram for YWidget:



Public Member Functions

- virtual ~YWidget ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- virtual std::string debugLabel () const

  Returns a descriptive label of this widget instance.
- std::string helpText () const

  Return the help text for this widget.
- void setHelpText (const std::string &helpText)

  Set a help text for this widget.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.
- virtual bool setProperty (const std::string &propertyName, const YPropertyValue &val)

  Set a property.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- bool hasChildren () const

  Returns 'true' if this widget has any children.
- YWidget * firstChild () const

  Returns the first child or 0 if there is none.
- YWidget * lastChild () const

  Returns the last child or 0 if there is none.
- YWidgetListIterator childrenBegin () const

  Return an iterator that points to the first child or to childrenEnd() if there are no children.
- YWidgetListIterator childrenEnd () const

  Return an interator that points after the last child.
- YWidgetListConstIterator childrenConstBegin () const

  Return a const iterator that points to the first child or to childrenEnd() if there are no children.
- YWidgetListConstIterator childrenConstEnd () const

  Return a const interator that points after the last child.
- YWidgetListIterator begin ()

  A helper for the range-based "for" loop.
- YWidgetListIterator end ()

  A helper for the range-based "for" loop.
- int childrenCount () const

  Returns the current number of children.
- bool contains (YWidget *child) const

  Checks if 'child' is a (direct!) child of this widget.
- virtual void addChild (YWidget *child)

  Add a new child.
- virtual void removeChild (YWidget *child)

  Remove a child.
- void deleteChildren ()

  Delete all children and remove them from the children manager's list.
- YWidget * parent () const

Return this widget's parent or 0 if it doesn't have a parent.

- bool hasParent () const

  Return 'true' if this widget has a parent, 'false' if not.

- void setParent (YWidget *newParent)

  Set this widget's parent.

- YDialog * findDialog ()

  Traverse up the widget hierarchy and find the dialog this widget belongs to.

- YWidget * findWidget (YWidgetID *id, bool doThrow=true) const

  Recursively find a widget by its ID.

- virtual int preferredWidth ()=0

  Preferred width of the widget.

- virtual int preferredHeight ()=0

  Preferred height of the widget.

- virtual int preferredSize (YUIDimension dim)

  Preferred size of the widget in the specified dimension.

- virtual void setSize (int newWidth, int newHeight)=0

  Set the new size of the widget.

- bool isValid () const

  Checks whether or not this object is valid.

- bool beingDestroyed () const

  Check if this widget is in the process of being destroyed.

- void * widgetRep () const

  Return a pointer to the underlying toolkit's (Qt, ...) widget representing this abstract UI widget.

- void setWidgetRep (void *toolkitWidgetRep)

  Set the pointer to the underlying toolkit's (Qt, ...) widget representing this abstract UI widget.

- bool hasId () const

  Returns 'true' if this widget has an ID.

- YWidgetID * id () const

  Returns this widget's ID.

- void setId (YWidgetID *newId_disown)

  Set this widget's ID.

- virtual void setEnabled (bool enabled=true)

  Enable or disable this widget, i.e.

- void setDisabled ()

  Disable this widget (overloaded for better readability).

- virtual bool isEnabled () const

  Returns 'true' if this widget is enabled.

- virtual bool stretchable (YUIDimension dim) const

  This is a boolean value that determines whether the widget is resizable beyond its preferred size in the specified dimension.

- void setStretchable (YUIDimension dim, bool newStretch)

  Set the stretchable state to "newStretch" regardless of any `hstretch or` vstretch options.

- void setDefaultStretchable (YUIDimension dim, bool newStretch)

  Set the stretchable state to "newStretch".

- virtual int weight (YUIDimension dim)

  The weight is used in situations where all widgets can get their preferred size and yet space is available.

- bool hasWeight (YUIDimension dim)

  Return whether or not the widget has a weight in the specified dimension.

- void setWeight (YUIDimension dim, int weight)

  Set a weight in the specified dimension.
- void setNotify (bool notify=true)

  Sets the Notify property.
- bool notify () const

  Returns whether the widget will notify, i.e.
- void setNotifyContextMenu (bool notifyContextMenu=true)

  Sets the notifyContextMenu property.
- bool notifyContextMenu () const

  Returns whether the widget will send an event when the user clicks selects the context menu e.g.
- bool sendKeyEvents () const

  Returns 'true' if this widget should send key events, i.e.
- void setSendKeyEvents (bool doSend)

  Specify whether or not this widget should send key events.
- bool autoShortcut () const

  Returns 'true' if a keyboard shortcut should automatically be assigned to this widget - without complaints in the log file.
- void setAutoShortcut (bool _newAutoShortcut)

  Sets the 'autoShortcut' flag.
- int functionKey () const

  Return a function key number that is assigned to this widget.
- bool hasFunctionKey () const

  Check if a function key is assigned to this widget.
- virtual void setFunctionKey (int fkey_no)

  Assign a function key to this widget (1 for F1, 2 for F2, etc.
- virtual bool setKeyboardFocus ()

  Set the keyboard focus to this widget.
- virtual std::string shortcutString () const

  Get the string of this widget that holds the keyboard shortcut, if any.
- virtual void setShortcutString (const std::string &str)

  Set the string of this widget that holds the keyboard shortcut, if any.
- virtual const char * userInputProperty ()

  The name of the widget property that will return user input, if there is any.
- void dumpWidgetTree (int indentationLevel=0)

  Debugging function: Dump the widget tree from here on to the log file.
- void dumpDialogWidgetTree ()

  Debugging function: Dump the widget tree from this widget's dialog parent.
- void setChildrenEnabled (bool enabled)

  Enable or disable all widgets in this widget tree.
- virtual void saveUserInput (YMacroRecorder *macroRecorder)

  Recursively save the user input of all child widgets to a macro recorder:
- void * operator new (size_t size)

  Overloaded operator new to ensure widgets are always created on the heap, never on the stack.
- virtual void startMultipleChanges ()

  In some UIs updating the screen content is an expensive operation.
- virtual void **doneMultipleChanges** ()

Protected Member Functions

- YWidget (YWidget *parent)

  Constructor.
- YWidgetChildrenManager * childrenManager () const

  Returns this widget's children manager.
- void setChildrenManager (YWidgetChildrenManager *manager)

  Sets a new children manager for this widget.
- void setBeingDestroyed ()

  Set the "being destroyed" flag, i.e.
- void dumpWidget (YWidget *w, int indentationLevel)

  Helper function for dumpWidgetTree(): Dump one widget to the log file.

5.184.1 Detailed Description

Abstract base class of all UI widgets.

Definition at line 54 of file YWidget.h.

5.184.2 Member Function Documentation

5.184.2.1 addChild()

```
void YWidget::addChild (
             YWidget * child )  [virtual]
```

Add a new child.

This may throw exceptions if more children are added than this widget can handle.

Reimplemented in YAlignment.

Definition at line 176 of file YWidget.cc.

5.184.2.2 begin()

```
YWidgetListIterator YWidget::begin ( )  [inline]
```

A helper for the range-based "for" loop.

Returns

Iterator pointing to the beginning of the children list

Definition at line 238 of file YWidget.h.

5.184.2.3 debugLabel()

```
string YWidget::debugLabel ( ) const  [virtual]
```

Returns a descriptive label of this widget instance.

This default implementation returns this widget's "shortcut property" (possibly trunctated to avoid over-long texts) - the property that contains the keyboard shortcut used to activate this widget or to move the keyboard focus to it. In most cases this is this widget's label.

Note: This is usually translated to the user's target language. This makes this useful for debugging only.

Reimplemented in YLabel, and YDumbTab.

Definition at line 223 of file YWidget.cc.

5.184.2.4 dumpDialogWidgetTree()

```
void YWidget::dumpDialogWidgetTree ( )
```

Debugging function: Dump the widget tree from this widget's dialog parent.

If there is no such dialog parent, dump the widget tree from here on.

Definition at line 663 of file YWidget.cc.

5.184.2.5 end()

```
YWidgetListIterator YWidget::end ( )  [inline]
```

A helper for the range-based "for" loop.

Returns

Iterator pointing to the end of the children list

Definition at line 245 of file YWidget.h.

5.184.2.6 findDialog()

```
YDialog * YWidget::findDialog ( )
```

Traverse up the widget hierarchy and find the dialog this widget belongs to.

Returns 0 if there is none.

Definition at line 376 of file YWidget.cc.

5.184.2.7 findWidget()

```
YWidget * YWidget::findWidget (
             YWidgetID * id,
             bool doThrow = true ) const
```

Recursively find a widget by its ID.

If there is no widget with that ID, this function throws a YUIWidgetNotFoundException if 'doThrow' is 'true'. It returns 0 if 'doThrow' is 'false'.

Definition at line 607 of file YWidget.cc.

5.184.2.8 firstChild()

```
YWidget* YWidget::firstChild ( ) const  [inline]
```

Returns the first child or 0 if there is none.

Useful mostly for children managers that handle only one child.

Definition at line 199 of file YWidget.h.

5.184.2.9 functionKey()

```
int YWidget::functionKey ( ) const
```

Return a function key number that is assigned to this widget.

(1 for F1, 2 for F2, etc.; 0 for none)

Definition at line 324 of file YWidget.cc.

5.184.2.10 getProperty()

```
YPropertyValue YWidget::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Derived classes need to implement this.

This method may throw exceptions, for example

- if there is no property with that name

Reimplemented in YWizard, YComboBox, YPushButton, YTable, YItemSelector, YCheckBoxFrame, YInputField, YLabel, YCheckBox, YPartitionSplitter, YLogView, YIntField, YRadioButton, YRichText, YTree, YBarGraph, YMultiProgressMeter, YMenuButton, YMultiLineEdit, YContextMenu, YDownloadProgress, YSelectionBox, YBusyIndicator, YRadioButtonGroup, YProgressBar, YDumbTab, YSimpleInputField, YGraph, YFrame, YMultiSelectionBox, and YTimezoneSelector.

Definition at line 457 of file YWidget.cc.

5.184.2.11 isValid()

```
bool YWidget::isValid ( ) const
```

Checks whether or not this object is valid.

This is to enable dangling pointer error checking (i.e. this object is already deallocated, but a pointer to it is still in use).

See also the YUI_CHECK_WIDGET() macro in YUIException.h

Definition at line 244 of file YWidget.cc.

5.184.2.12 notify()

```
bool YWidget::notify ( ) const
```

Returns whether the widget will notify, i.e.

will case UserInput to return.

Definition at line 534 of file YWidget.cc.

5.184.2.13 notifyContextMenu()

```
bool YWidget::notifyContextMenu ( ) const
```

Returns whether the widget will send an event when the user clicks selects the context menu e.g.

via right click.

Definition at line 540 of file YWidget.cc.

5.184.2.14 operator new()

```
void * YWidget::operator new (
             size_t size )
```

Overloaded operator new to ensure widgets are always created on the heap, never on the stack.

Simpler implementations of this have a tendency to be fooled by poorly implemented derived classes.

Definition at line 130 of file YWidget.cc.

5.184.2.15 preferredHeight()

```
virtual int YWidget::preferredHeight ( )  [pure virtual]
```

Preferred height of the widget.

Derived classes are required to implement this.

Implemented in YButtonBox, YAlignment, YLayoutBox, YSpacing, YEmpty, and YSingleChildContainerWidget.

5.184.2.16 preferredSize()

```
int YWidget::preferredSize (
             YUIDimension dim )  [virtual]
```

Preferred size of the widget in the specified dimension.

This default implementation calls preferredWidth() or preferredHeight() which makes sense for most cases.

Derived classes can reimplement this, but this is discouraged.

Note: Even in that case, preferredWidth() and preferredHeight() need to be implemented, but they might then call preferredSize().

Reimplemented in YLayoutBox.

Definition at line 546 of file YWidget.cc.

5.184.2.17 preferredWidth()

```
virtual int YWidget::preferredWidth ( )  [pure virtual]
```

Preferred width of the widget.

Derived classes are required to implement this.

Implemented in YButtonBox, YAlignment, YLayoutBox, YSpacing, YEmpty, and YSingleChildContainerWidget.

5.184.2.18 propertySet()

```
const YPropertySet & YWidget::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Derived classes should reimplement this.

Remember to add the base class's property set to your own in reimplemented versions, e.g.:

```
const YPropertySet &
MyWidgetClass::propertySet()
{
    static YPropertySet propSet;

    if ( propSet.isEmpty() )
    {
        // Add properties for the derived class
       propSet.add( YProperty( YUIProperty_Value, YStringProperty ) );
       propSet.add( YProperty( YUIProperty_Label, YStringProperty ) );

        // Add base class properties
       propSet.add( YWidget::propertySet() );
    }

    return propSet;
}
```

Otherwise the base class's properties will not be available in the derived class. It is also important that the base class's properties are added after those of the derived class so the derived class's properties have priority over those of the base class.

Reimplemented in YWizard, YComboBox, YPushButton, YTable, YItemSelector, YCheckBoxFrame, YInputField, YLabel, YCheckBox, YPartitionSplitter, YLogView, YIntField, YRadioButton, YRichText, YTree, YBarGraph, YMultiProgressMeter, YMenuButton, YMultiLineEdit, YContextMenu, YDownloadProgress, YSelectionBox, YBusyIndicator, YRadioButtonGroup, YProgressBar, YDumbTab, YSimpleInputField, YGraph, YFrame, YMultiSelectionBox, and YTimezoneSelector.

Definition at line 395 of file YWidget.cc.

5.184.2.19 removeChild()

```
void YWidget::removeChild (
             YWidget * child )  [virtual]
```

Remove a child.

This only removes the child from the children manager's list; it does not delete it.

Definition at line 191 of file YWidget.cc.

5.184.2.20 saveUserInput()

```
void YWidget::saveUserInput (
             YMacroRecorder * macroRecorder )  [virtual]
```

Recursively save the user input of all child widgets to a macro recorder:

All child widgets that could contain data entered by the user are requested to send their contents to the macro recorder, e.g. input fields, check boxes etc.

This default implementation records this widget's user input property (the property returned by userInputProperty) and then recursively calls saveUserInput() for all child widgets. This is suitable for most cases, for container widgets as well as for leaf widgets that have no or exactly one property that needs to be recorded.

Widgets that need another number of properties recorded should reimplement this method (and NOT call this default method in the new implementation).

Reimplemented in YInputField, YRadioButton, and YMultiSelectionBox.

Definition at line 719 of file YWidget.cc.

5.184.2.21 sendKeyEvents()

```
bool YWidget::sendKeyEvents ( ) const
```

Returns 'true' if this widget should send key events, i.e.

if it has `opt(keyEvent)` set.

Definition at line 300 of file YWidget.cc.

5.184.2.22 setBeingDestroyed()

```
void YWidget::setBeingDestroyed ( )  [protected]
```

Set the "being destroyed" flag, i.e.

indicate that this widget is in the process of being destroyed. The base class method already sets this, but sometimes it might be useful to call this in a derived class's destructor so certain optimizations work better.

This status intentionally cannot be reverted to "not being destroyed".

Definition at line 264 of file YWidget.cc.

5.184.2.23 setChildrenManager()

```
void YWidget::setChildrenManager (
             YWidgetChildrenManager * manager )  [protected]
```

Sets a new children manager for this widget.

The widget assumes ownership of this children manager and will delete it when appropriate.

The default children manager (a YWidgetChildrenRejector) rejects all children. This is useful for leaf widgets such as PushButton, ComboBox etc.

Derived classes that can handle children might want to set the children manager to a YWidgetChildrenManager (the base class that does not reject children) or to a YSingleWidgetChildManager (the class that handles exactly one child widget).

Definition at line 166 of file YWidget.cc.

5.184.2.24 setDefaultStretchable()

```
void YWidget::setDefaultStretchable (
             YUIDimension dim,
             bool newStretch )
```

Set the stretchable state to "newStretch".

`hstretch` or`vstretch` options may override this.

Definition at line 566 of file YWidget.cc.

5.184.2.25 setEnabled()

```
void YWidget::setEnabled (
             bool enabled = true )  [virtual]
```

Enable or disable this widget, i.e.

make it accept or reject user input.

Derived classes should call the base class method to update the internal "enabled" flag.

Definition at line 500 of file YWidget.cc.

5.184.2.26 setFunctionKey()

```
void YWidget::setFunctionKey (
             int fkey_no )  [virtual]
```

Assign a function key to this widget (1 for F1, 2 for F2, etc.

; 0 for none)

Derived classes may want to overwrite this function, but they should call this base class function in the new function.

Reimplemented in YPushButton.

Definition at line 336 of file YWidget.cc.

5.184.2.27 setHelpText()

```
void YWidget::setHelpText (
             const std::string & helpText )
```

Set a help text for this widget.

Currently, the UI does not do anything with this text but store it. Displaying the text at a convenient time is currently the application's responsibility. This may change in future versions.

Definition at line 348 of file YWidget.cc.

5.184.2.28 setId()

```
void YWidget::setId (
             YWidgetID * newId_disown )
```

Set this widget's ID.

The widget assumes ownership of this ID and will delete it when needed. (In the widget's destructor or when a new ID is set)

Widget IDs are purely for application use. C++ applications don't need to use them; they are much better off using widget pointers. For other languages, though, that can't use C++ pointers (e.g. Ruby) it makes sense to have widget IDs to identify widgets.

Definition at line 361 of file YWidget.cc.

5.184.2.29 setKeyboardFocus()

```
bool YWidget::setKeyboardFocus ( )  [virtual]
```

Set the keyboard focus to this widget.

The default implementation just emits a warning message. Overwrite this function for all widgets that can accept the keyboard focus.

This function returns true if the widget did accept the keyboard focus, and false if not.

Definition at line 599 of file YWidget.cc.

5.184.2.30 setProperty()

```
bool YWidget::setProperty (
             const std::string & propertyName,
             const YPropertyValue & val )  [virtual]
```

Set a property.

Derived classes need to implement this.

This method may throw exceptions, for example

- if there is no property with that name
- if the expected type and the type mismatch
- if the value is out of range

This function returns 'true' if the value was successfully set and 'false' if that value requires special handling (not in error cases: those are covered by exceptions).

Reimplemented in YComboBox, YPushButton, YTable, YItemSelector, YCheckBoxFrame, YInputField, YLabel, YCheckBox, YPartitionSplitter, YLogView, YIntField, YRadioButton, YRichText, YTree, YBarGraph, YMultiProgressMeter, YMenuButton, YMultiLineEdit, YContextMenu, YDownloadProgress, YSelectionBox, YBusyIndicator, YRadioButtonGroup, YProgressBar, YDumbTab, YSimpleInputField, YGraph, YFrame, YMultiSelectionBox, and YTimezoneSelector.

Definition at line 432 of file YWidget.cc.

5.184.2.31 setShortcutString()

```
void YWidget::setShortcutString (
             const std::string & str )  [virtual]
```

Set the string of this widget that holds the keyboard shortcut, if any.

Most widgets will call setLabel().

Overwrite this for widgets that can have keyboard shortcuts.

Reimplemented in YSelectionWidget, YPushButton, YInputField, YCheckBox, YLogView, YIntField, YRadioButton, YMultiLineEdit, YCheckBoxFrame, YDumbTab, and YSimpleInputField.

Definition at line 513 of file YWidget.cc.

5.184.2.32 setSize()

```
virtual void YWidget::setSize (
             int newWidth,
             int newHeight )  [pure virtual]
```

Set the new size of the widget.

Layout manager widgets (like YLayoutBox) call this during geometry management after all widgets are queried about their preferred widths and heights. Depending on layout constraints, widgets might be resized beyond or below their preferred size.

The sizes passed here are not meant to affect any future preferredWidth() or preferredHeight() calls; they are just the outcome of all kinds of compromises (too little screen space or too much) for the current geometry management calculation.

Derived classes are required to implement this function.

Implemented in YButtonBox, YAlignment, YLayoutBox, and YSingleChildContainerWidget.

5.184.2.33 setWidgetRep()

```
void YWidget::setWidgetRep (
             void * toolkitWidgetRep )
```

Set the pointer to the underlying toolkit's (Qt, ...) widget representing this abstract UI widget.

This pointer might be useful for derived UIs to store a counterpart of the toolkit widget in each YWidget. The abstract UI does not need that, though; this is purely for the convenience of derived UIs. All the abstract UI ever does with that pointer is store it.

Definition at line 493 of file YWidget.cc.

5.184.2.34 shortcutString()

```
virtual std::string YWidget::shortcutString ( ) const  [inline], [virtual]
```

Get the string of this widget that holds the keyboard shortcut, if any.

Most widgets will return label().

Overwrite this for widgets that can have keyboard shortcuts.

Reimplemented in YSelectionWidget, YPushButton, YInputField, YCheckBox, YLogView, YIntField, YRadioButton, YMultiLineEdit, YCheckBoxFrame, YDumbTab, and YSimpleInputField.

Definition at line 560 of file YWidget.h.

5.184.2.35 startMultipleChanges()

```
virtual void YWidget::startMultipleChanges ( )  [inline], [virtual]
```

In some UIs updating the screen content is an expensive operation.

Use startMultipleChanges() to tell the ui that you're going to perform multiple chages to the widget. The UI may delay any screen updates until doneMultipleChanges() is called.

Definition at line 640 of file YWidget.h.

5.184.2.36 stretchable()

```
bool YWidget::stretchable (
              YUIDimension dim ) const  [virtual]
```

This is a boolean value that determines whether the widget is resizable beyond its preferred size in the specified dimension.

A selection box is stretchable in both dimensions, a push button is not stretchable by default, a frame is stretchable if its contents are stretchable. Most widgets accept a `hstretch` or `vstretch` option to become stretchable even when by default they are not.

Reimplemented in YButtonBox, YLayoutBox, YAlignment, YDumbTab, YSquash, and YSingleChildContainerWidget.

Definition at line 572 of file YWidget.cc.

5.184.2.37 userInputProperty()

```
virtual const char* YWidget::userInputProperty ( )  [inline], [virtual]
```

The name of the widget property that will return user input, if there is any.

Widgets that do have user input (such as InputField, ComboBox, SelBox) should overwrite this methods. Widgets that are purely passive (such as Label, RichText) should not.

Reimplemented in YComboBox, YTable, YInputField, YCheckBox, YItemSelector, YIntField, YRadioButton, YPartitionSplitter, YMultiLineEdit, YTree, YSelectionBox, YCheckBoxFrame, YSimpleInputField, and YMultiSelectionBox.

Definition at line 576 of file YWidget.h.

5.184.2.38 weight()

```
int YWidget::weight (
            YUIDimension dim )  [virtual]
```

The weight is used in situations where all widgets can get their preferred size and yet space is available.

The remaining space will be devided between all stretchable widgets according to their weights. A widget with greater weight will get more space. The default weight for all widgets is 0.

Derived classes can overwrite this function, but they should call this base class function in the new function.

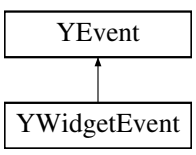
Definition at line 578 of file YWidget.cc.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YWidget.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YWidget.cc

5.185 YWidgetEvent Class Reference

Inheritance diagram for YWidgetEvent:



Public Member Functions

- YWidgetEvent (YWidget *widget=0, EventReason reason=Activated, EventType eventType=WidgetEvent)

  Constructor.
- virtual YWidget * widget () const

  Returns the widget that caused this event.
- EventReason reason () const

  Returns the reason for this event.

Protected Member Functions

- virtual ~YWidgetEvent ()

  Protected destructor - events can only be deleted via YDialog::deleteEvent().

Protected Attributes

- YWidget * **_widget**
- EventReason **_reason**

Additional Inherited Members

5.185.1 Detailed Description

Definition at line 165 of file YEvent.h.

5.185.2 Constructor & Destructor Documentation

5.185.2.1 ~YWidgetEvent()

```
virtual YWidgetEvent::~YWidgetEvent ( )  [inline], [protected], [virtual]
```

Protected destructor - events can only be deleted via YDialog::deleteEvent().

The associated dialog will take care of this event and delete it when appropriate.

Definition at line 194 of file YEvent.h.

5.185.3 Member Function Documentation

5.185.3.1 reason()

```
EventReason YWidgetEvent::reason ( ) const  [inline]
```

Returns the reason for this event.

This very much like an event sub-type.

Definition at line 185 of file YEvent.h.

5.185.3.2 widget()

```
virtual YWidget* YWidgetEvent::widget ( ) const  [inline], [virtual]
```

Returns the widget that caused this event.

Reimplemented from YEvent.

Reimplemented from YEvent.

Definition at line 180 of file YEvent.h.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YEvent.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YEvent.cc

5.186 YWidgetFactory Class Reference

Abstract widget factory for mandatory widgets.

```
#include <YWidgetFactory.h>
```

Public Member Functions

- YDialog * **createMainDialog** (YDialogColorMode colorMode=YDialogNormalColor)
- YDialog * **createPopupDialog** (YDialogColorMode colorMode=YDialogNormalColor)
- virtual YDialog * **createDialog** (YDialogType dialogType, YDialogColorMode colorMode=YDialogNormal↩ Color)=0
- YLayoutBox * **createVBox** (YWidget *parent)
- YLayoutBox * **createHBox** (YWidget *parent)
- virtual YLayoutBox * **createLayoutBox** (YWidget *parent, YUIDimension dimension)=0
- virtual YButtonBox * **createButtonBox** (YWidget *parent)=0
- virtual YPushButton * **createPushButton** (YWidget *parent, const std::string &label)=0
- virtual YLabel * **createLabel** (YWidget *parent, const std::string &text, bool isHeading=false, bool isOutput↩ Field=false)=0
- YLabel * **createHeading** (YWidget *parent, const std::string &label)
- virtual YInputField * **createInputField** (YWidget *parent, const std::string &label, bool passwordMode=false)=0
- virtual YCheckBox * **createCheckBox** (YWidget *parent, const std::string &label, bool isChecked=false)=0
- virtual YRadioButton * **createRadioButton** (YWidget *parent, const std::string &label, bool isChecked=false)=0
- virtual YComboBox * **createComboBox** (YWidget *parent, const std::string &label, bool editable=false)=0
- virtual YSelectionBox * **createSelectionBox** (YWidget *parent, const std::string &label)=0
- virtual YTree * **createTree** (YWidget *parent, const std::string &label, bool multiselection=false, bool recursive↩ selection=false)=0
- virtual YTable * **createTable** (YWidget *parent, YTableHeader *header_disown, bool multiSelection=false)=0
- virtual YProgressBar * **createProgressBar** (YWidget *parent, const std::string &label, int maxValue=100)=0
- virtual YRichText * **createRichText** (YWidget *parent, const std::string &text=std::string(), bool plainText↩ Mode=false)=0
- virtual YBusyIndicator * **createBusyIndicator** (YWidget *parent, const std::string &label, int timeout=1000)=0
- YPushButton * **createIconButton** (YWidget *parent, const std::string &iconName, const std::string &fallback↩ TextLabel)
- YLabel * **createOutputField** (YWidget *parent, const std::string &label)
- virtual YIntField * **createIntField** (YWidget *parent, const std::string &label, int minVal, int maxVal, int initial↩ Val)=0
- YInputField * **createPasswordField** (YWidget *parent, const std::string &label)
- virtual YMenuButton * **createMenuButton** (YWidget *parent, const std::string &label)=0
- virtual YMultiLineEdit * **createMultiLineEdit** (YWidget *parent, const std::string &label)=0
- virtual YImage * **createImage** (YWidget *parent, const std::string &imageFileName, bool animated=false)=0
- virtual YLogView * **createLogView** (YWidget *parent, const std::string &label, int visibleLines, int stored↩ Lines=0)=0
- virtual YMultiSelectionBox * **createMultiSelectionBox** (YWidget *parent, const std::string &label)=0
- virtual YPackageSelector * **createPackageSelector** (YWidget *parent, long ModeFlags=0)=0
- virtual YWidget * **createPkgSpecial** (YWidget *parent, const std::string &subwidgetName)=0
- YSpacing * **createHStretch** (YWidget *parent)
- YSpacing * **createVStretch** (YWidget *parent)
- YSpacing * **createHSpacing** (YWidget *parent, YLayoutSize_t size=1.0)
- YSpacing * **createVSpacing** (YWidget *parent, YLayoutSize_t size=1.0)
- virtual YSpacing * **createSpacing** (YWidget *parent, YUIDimension dim, bool stretchable=false, YLayoutSize_t size=0.0)=0
- virtual YEmpty * **createEmpty** (YWidget *parent)=0
- YAlignment * **createLeft** (YWidget *parent)
- YAlignment * **createRight** (YWidget *parent)
- YAlignment * **createTop** (YWidget *parent)
- YAlignment * **createBottom** (YWidget *parent)

- YAlignment * **createHCenter** (YWidget *parent)
- YAlignment * **createVCenter** (YWidget *parent)
- YAlignment * **createHVCenter** (YWidget *parent)
- YAlignment * **createMarginBox** (YWidget *parent, YLayoutSize_t horMargin, YLayoutSize_t vertMargin)
- YAlignment * **createMarginBox** (YWidget *parent, YLayoutSize_t leftMargin, YLayoutSize_t rightMargin, YLayoutSize_t topMargin, YLayoutSize_t bottomMargin)
- YAlignment * **createMinWidth** (YWidget *parent, YLayoutSize_t minWidth)
- YAlignment * **createMinHeight** (YWidget *parent, YLayoutSize_t minHeight)
- YAlignment * **createMinSize** (YWidget *parent, YLayoutSize_t minWidth, YLayoutSize_t minHeight)
- virtual YAlignment * **createAlignment** (YWidget *parent, YAlignmentType horAlignment, YAlignmentType vertAlignment)=0
- YSquash * **createHSquash** (YWidget *parent)
- YSquash * **createVSquash** (YWidget *parent)
- YSquash * **createHVSquash** (YWidget *parent)
- virtual YSquash * **createSquash** (YWidget *parent, bool horSquash, bool vertSquash)=0
- virtual YFrame * **createFrame** (YWidget *parent, const std::string &label)=0
- virtual YCheckBoxFrame * **createCheckBoxFrame** (YWidget *parent, const std::string &label, bool checked)=0
- virtual YRadioButtonGroup * **createRadioButtonGroup** (YWidget *parent)=0
- virtual YReplacePoint * **createReplacePoint** (YWidget *parent)=0
- virtual YItemSelector * **createItemSelector** (YWidget *parent, bool enforceSingleSelection=true)
- YItemSelector * **createSingleItemSelector** (YWidget *parent)
- YItemSelector * **createMultiItemSelector** (YWidget *parent)
- virtual YItemSelector * **createCustomStatusItemSelector** (YWidget *parent, const YItemCustomStatusVector &customStates)

Protected Member Functions

- YWidgetFactory ()

  Constructor.
- virtual ~YWidgetFactory ()

  Destructor.

5.186.1 Detailed Description

Abstract widget factory for mandatory widgets.

Use YOptionalWidgetFactory for optional ("special") widgets.

Refer to the respective widget's documentation (in the header file) for documentation about the function parameters.

Definition at line 78 of file YWidgetFactory.h.

5.186.2 Constructor & Destructor Documentation

5.186.2.1 YWidgetFactory()

```
YWidgetFactory::YWidgetFactory ( )  [protected]
```

Constructor.

Use YUI::widgetFactory() to get the singleton for this class.

Definition at line 37 of file YWidgetFactory.cc.

The documentation for this class was generated from the following files:

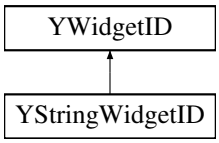
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YWidgetFactory.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YWidgetFactory.cc

5.187 YWidgetID Class Reference

Abstract base class for widget IDs.

```
#include <YWidgetID.h>
```

Inheritance diagram for YWidgetID:



Public Member Functions

- virtual ~YWidgetID ()

  Destructor.
- virtual bool isEqual (YWidgetID *otherID) const =0

  Check if this ID is equal to another.
- virtual std::string toString () const =0

  Convert the ID value to string.

Protected Member Functions

- YWidgetID ()

  Constructor.

5.187.1 Detailed Description

Abstract base class for widget IDs.

Definition at line 36 of file YWidgetID.h.

5.187.2 Constructor & Destructor Documentation

5.187.2.1 YWidgetID()

```
YWidgetID::YWidgetID ( )  [inline], [protected]
```

Constructor.

Protected since this is an abstract base class.

Definition at line 42 of file YWidgetID.h.

5.187.3 Member Function Documentation

5.187.3.1 toString()

```
virtual std::string YWidgetID::toString ( ) const  [pure virtual]
```

Convert the ID value to string.

Used for logging and debugging.

Implemented in YStringWidgetID.

The documentation for this class was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YWidgetID.h

5.188 YWidgetPrivate Struct Reference

Public Member Functions

- YWidgetPrivate (YWidgetChildrenManager *manager, YWidget *parentWidget=0)
  Constructor.

Public Attributes

- YWidgetChildrenManager * **childrenManager**
- YWidget * **parent**
- bool **beingDestroyed**
- bool **enabled**
- bool **notify**
- bool **notifyContextMenu**
- bool **sendKeyEvents**
- bool **autoShortcut**
- void * **toolkitWidgetRep**
- YWidgetID * **id**
- YBothDim< bool > **stretch**
- YBothDim< int > **weight**
- int **functionKey**
- string **helpText**

5.188.1 Detailed Description

Definition at line 56 of file YWidget.cc.

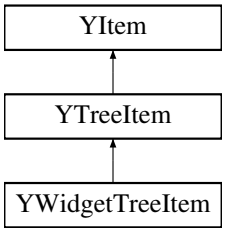
The documentation for this struct was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YWidget.cc

5.189 YWidgetTreeItem Class Reference

Custom tree item class to map tree items to widgets.

Inheritance diagram for YWidgetTreeItem:



Public Member Functions

- **YWidgetTreeItem** (YWidget *widget, bool isOpen)
- **YWidgetTreeItem** (YWidgetTreeItem *parent, YWidget *widget, bool isOpen)
- YWidget * **widget** () const

Protected Member Functions

- void **setWidgetLabel** ()

5.189.1 Detailed Description

Custom tree item class to map tree items to widgets.

Definition at line 86 of file YDialogSpy.cc.

The documentation for this class was generated from the following file:

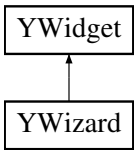
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YDialogSpy.cc

5.190 YWizard Class Reference

A wizard is a more complex frame typically used for multi-step workflows:

`#include <YWizard.h>`

Inheritance diagram for YWizard:



Public Member Functions

- virtual ~YWizard ()

  Destructor.
- virtual const char * widgetClass () const

  Returns a descriptive name of this widget class for logging, debugging etc.
- YWizardMode wizardMode () const

  Return the wizard mode (what kind of wizard this is): YWizardMode_Standard, YWizardMode_Steps, YWizardMode_Tree, YWizardMode_TitleOnLeft.
- virtual YPushButton * backButton () const =0

  Return the wizard buttons or 0 if there is no such button.
- virtual YPushButton * **abortButton** () const =0
- virtual YPushButton * **nextButton** () const =0
- virtual YReplacePoint * contentsReplacePoint () const =0

  Return the internal contents ReplacePoint.
- void protectNextButton (bool protect)

  Protect the wizard's "Next" button against disabling.

- bool nextButtonIsProtected () const

  Check if the wizard's "Next" button is currently protected against disabling.
- virtual void setButtonLabel (YPushButton *button, const std::string &newLabel)

  Set the label of one of the wizard buttons (backButton(), abortButton(), nextButton()) if that button is non-null.
- virtual void setHelpText (const std::string &helpText)=0

  Set the help text.
- virtual void setDialogIcon (const std::string &iconName)=0

  Set the dialog icon.
- virtual void setDialogTitle (const std::string &titleText)=0

  Set the dialog title shown in the window manager's title bar.
- virtual std::string getDialogTitle ()=0

  Get the current dialog title shown in the window manager's title bar.
- virtual void setDialogHeading (const std::string &headingText)=0

  Set the dialog heading.
- virtual std::string getDialogHeading ()=0

  Get the dialog heading.
- virtual void addStep (const std::string &text, const std::string &id)=0

  Add a step for the steps panel on the side bar.
- virtual void addStepHeading (const std::string &text)=0

  Add a step heading for the steps panel on the side bar.
- virtual void deleteSteps ()=0

  Delete all steps and step headings from the internal lists.
- virtual void setCurrentStep (const std::string &id)=0

  Set the current step.
- virtual void updateSteps ()=0

  Update the steps display: Reflect the internal steps and heading lists in the layout.
- virtual void addTreeItem (const std::string &parentID, const std::string &text, const std::string &id)=0

  Add a tree item.
- virtual void selectTreeItem (const std::string &id)=0

  Select the tree item with the specified ID, if such an item exists.
- virtual std::string currentTreeSelection ()=0

  Returns the current tree selection or an empty string if nothing is selected or there is no tree.
- virtual void deleteTreeItems ()=0

  Delete all tree items.
- virtual void addMenu (const std::string &text, const std::string &id)=0

  Add a menu to the menu bar.
- virtual void addSubMenu (const std::string &parentMenuID, const std::string &text, const std::string &id)=0

  Add a submenu to the menu with ID 'parentMenuID'.
- virtual void addMenuEntry (const std::string &parentMenuID, const std::string &text, const std::string &id)=0

  Add a menu entry to the menu with ID 'parentMenuID'.
- virtual void addMenuSeparator (const std::string &parentMenuID)=0

  Add a menu separator to a menu.
- virtual void deleteMenus ()=0

  Delete all menus and hide the menu bar.
- virtual void showReleaseNotesButton (const std::string &label, const std::string &id)=0

  Show a "Release Notes" button above the "Help" button in the steps panel with the specified label that will return the specified id to UI::UserInput() when clicked.

- virtual void hideReleaseNotesButton ()=0

  Hide an existing "Release Notes" button.
- virtual void retranslateInternalButtons ()=0

  Retranslate internal buttons that are not accessible from the outside:
- void ping ()

  NOP command to check if a YWizard is running.
- virtual YPropertyValue getProperty (const std::string &propertyName)

  Get a property.
- virtual const YPropertySet & propertySet ()

  Return this class's property set.

Protected Member Functions

- YWizard (YWidget *parent, const std::string &backButtonLabel, const std::string &abortButtonLabel, const std::string &nextButtonLabel, YWizardMode wizardMode=YWizardMode_Standard)

  Constructor.

5.190.1 Detailed Description

A wizard is a more complex frame typically used for multi-step workflows:

+----------—+--—+

Side bar	Content Area
	(YReplacePoint)
	[Back] [Abort] [Next]

+----------—+--—+

The side bar can contain help text, a list of steps that are performed, or an embedded tree (much like the YTree widget).

The client application creates the wizard and replaces the widget in the content area for each step.

The wizard buttons can theoretically be used to do anything, but good UI design will stick to the model above: [Back], [Abort], [Next].

If only two buttons are desired, leave the [Back] button's label emtpy. The remaining two buttons will be rearranged accordingly in the button area.

In the last step of a multi-step workflow, the [Next] button's label is customarily replaced with a label that indicates that this is the last step. [Accept] is recommended for that button label: [Finish] (as sometimes used in other environments) by no means clearly indicates that this is the positive ending, the final "do it" button. Worse, translations of that are often downright miserable: To German, [Finish] gets translated as [Beenden] which is the same word as "Quit" (used in menus). This does not at all tell the user that that button really performs the requested action the multi-step wizard is all about.

Definition at line 96 of file YWizard.h.

5.190.2 Constructor & Destructor Documentation

5.190.2.1 YWizard()

```
YWizard::YWizard (
            YWidget * parent,
            const std::string & backButtonLabel,
            const std::string & abortButtonLabel,
            const std::string & nextButtonLabel,
            YWizardMode wizardMode = YWizardMode_Standard )  [protected]
```

Constructor.

If only two buttons are desired, leave 'backButtonLabel' empty.

Definition at line 49 of file YWizard.cc.

5.190.3 Member Function Documentation

5.190.3.1 addMenu()

```
virtual void YWizard::addMenu (
            const std::string & text,
            const std::string & id )  [pure virtual]
```

Add a menu to the menu bar.

If the menu bar is not visible yet, it will be made visible. 'text' is the user-visible text for the menu bar (including keyboard shortcuts marked with '&'), 'id' is the menu ID for later addMenuEntry() etc. calls.

5.190.3.2 addMenuEntry()

```
virtual void YWizard::addMenuEntry (
             const std::string & parentMenuID,
             const std::string & text,
             const std::string & id )  [pure virtual]
```

Add a menu entry to the menu with ID 'parentMenuID'.

'id' is what will be returned by UI::UserInput() etc. when a user activates this menu entry.

5.190.3.3 addStep()

```
virtual void YWizard::addStep (
             const std::string & text,
             const std::string & id )  [pure virtual]
```

Add a step for the steps panel on the side bar.

This only adds the step to the internal list of steps. The display is only updated upon calling updateSteps().

5.190.3.4 addStepHeading()

```
virtual void YWizard::addStepHeading (
             const std::string & text )  [pure virtual]
```

Add a step heading for the steps panel on the side bar.

This only adds the heading to the internal list of steps. The display is only updated upon calling updateSteps().

5.190.3.5 addTreeItem()

```
virtual void YWizard::addTreeItem (
             const std::string & parentID,
             const std::string & text,
             const std::string & id )  [pure virtual]
```

Add a tree item.

If "parentID" is an empty string, it will be a root item. 'text' is the text that will be displayed in the tree, 'id' the ID with which this newly created item can be referenced - and that will be returned when the user clicks on a tree item.

5.190.3.6 backButton()

```
virtual YPushButton* YWizard::backButton ( ) const  [pure virtual]
```

Return the wizard buttons or 0 if there is no such button.

Derived classes are required to implement this.

5.190.3.7 contentsReplacePoint()

```
virtual YReplacePoint* YWizard::contentsReplacePoint ( ) const  [pure virtual]
```

Return the internal contents ReplacePoint.

Derived classes are required to implement this.

5.190.3.8 deleteSteps()

```
virtual void YWizard::deleteSteps ( )  [pure virtual]
```

Delete all steps and step headings from the internal lists.

The display is only updated upon calling updateSteps().

5.190.3.9 getProperty()

```
YPropertyValue YWizard::getProperty (
            const std::string & propertyName )  [virtual]
```

Get a property.

Reimplemented from YWidget.

This method may throw YUIPropertyExceptions.

Reimplemented from YWidget.

Definition at line 133 of file YWizard.cc.

5.190.3.10 propertySet()

```
const YPropertySet & YWizard::propertySet ( )  [virtual]
```

Return this class's property set.

This also initializes the property upon the first call.

Reimplemented from YWidget.

Reimplemented from YWidget.

Definition at line 115 of file YWizard.cc.

5.190.3.11 retranslateInternalButtons()

```
virtual void YWizard::retranslateInternalButtons ( )  [pure virtual]
```

Retranslate internal buttons that are not accessible from the outside:

- [Help]
- [Steps]
- [Tree]

5.190.3.12 setButtonLabel()

```
void YWizard::setButtonLabel (
             YPushButton * button,
             const std::string & newLabel )  [virtual]
```

Set the label of one of the wizard buttons (backButton(), abortButton(), nextButton()) if that button is non-null.

The default implementation simply calls button->setLabel(newLabel).

Definition at line 96 of file YWizard.cc.

5.190.3.13 setCurrentStep()

```
virtual void YWizard::setCurrentStep (
             const std::string & id )  [pure virtual]
```

Set the current step.

This also triggers updateSteps() if necessary.

5.190.3.14 setDialogIcon()

```
virtual void YWizard::setDialogIcon (
             const std::string & iconName )  [pure virtual]
```

Set the dialog icon.

An empty icon name clears the current icon.

5.190.3.15 setDialogTitle()

```
virtual void YWizard::setDialogTitle (
             const std::string & titleText )  [pure virtual]
```

Set the dialog title shown in the window manager's title bar.

An empty string clears the current title.

The documentation for this class was generated from the following files:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YWizard.h
- /usr/src/RPM/BUILD/libyui-3.10.0/src/YWizard.cc

5.191 YWizardPrivate Struct Reference

Public Member Functions

- **YWizardPrivate** (YWizardMode wizardMode)

Public Attributes

- YWizardMode **wizardMode**
- bool **nextButtonIsProtected**

5.191.1 Detailed Description

Definition at line 35 of file YWizard.cc.

The documentation for this struct was generated from the following file:

- /usr/src/RPM/BUILD/libyui-3.10.0/src/YWizard.cc

Chapter 6

File Documentation

6.1 /usr/src/RPM/BUILD/libyui-3.10.0/src/YItem.h File Reference

```
#include <string>
#include <vector>
```

Classes

- class YItem

  Simple item class for SelectionBox, ComboBox, MultiSelectionBox etc.

Typedefs

- typedef std::vector< YItem * > YItemCollection

  Collection of pointers to YItem.
- typedef YItemCollection::iterator YItemIterator

  Mutable iterator over YItemCollection.
- typedef YItemCollection::const_iterator YItemConstIterator

  Const iterator over YItemCollection.

6.2 YItem.h

```
00001 /*
00002   Copyright (C) 2000-2012 Novell, Inc
00003   This library is free software; you can redistribute it and/or modify
00004   it under the terms of the GNU Lesser General Public License as
00005   published by the Free Software Foundation; either version 2.1 of the
00006   License, or (at your option) version 3.0 of the License. This library
00007   is distributed in the hope that it will be useful, but WITHOUT ANY
00008   WARRANTY; without even the implied warranty of MERCHANTABILITY or
00009   FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public
00010   License for more details. You should have received a copy of the GNU
00011   Lesser General Public License along with this library; if not, write
00012   to the Free Software Foundation, Inc., 51 Franklin Street, Fifth
```

```
00013   Floor, Boston, MA 02110-1301 USA
00014 */
00015
00016
00017 /*-/
00018
00019   File:         YItem.h
00020
00021   Author:       Stefan Hundhammer <sh@suse.de>
00022
00023 /-*/
00024
00025 #ifndef YItem_h
00026 #define YItem_h
00027
00028 #include <string>
00029 #include <vector>
00030
00031
00032 class YItem;
00033
00034 // without "documenting" the file, typedefs will be dropped
00035 //! @file
00036
00037 //! Collection of pointers to YItem.
00038 typedef std::vector<YItem *>                    YItemCollection;
00039 //! Mutable iterator over @ref YItemCollection.
00040 typedef YItemCollection::iterator               YItemIterator;
00041 //! Const   iterator over @ref YItemCollection.
00042 typedef YItemCollection::const_iterator         YItemConstIterator;
00043
00044
00045 /**
00046  * Simple item class for SelectionBox, ComboBox, MultiSelectionBox etc. items.
00047  * This class provides stubs for children management.
00048  **/
00049 class YItem
00050 {
00051 public:
00052     /**
00053      * Constructor with just the label and optionally the selected state.
00054      **/
00055     YItem( const std::string & label, bool selected = false )
00056         : _label( label )
00057         , _status( selected ? 1 : 0 )
00058         , _index( -1 )
00059         , _data( 0 )
00060         {}
00061
00062     /**
00063      * Constructor with label and icon name and optionally the selected state.
00064      **/
00065     YItem( const std::string & label, const std::string & iconName, bool selected = false )
00066         : _label( label )
00067         , _iconName( iconName )
00068         , _status( selected ? 1 : 0 )
00069         , _index( -1 )
00070         , _data( 0 )
00071         {}
00072
00073     /**
00074      * Destructor.
00075      **/
00076     virtual ~YItem() {}
00077
00078     /**
00079      * Return this item's label. This is what the user sees in a dialog, so
00080      * this will usually be a translated text.
00081      **/
00082     std::string label() const { return _label; }
00083
00084     /**
00085      * Set this item's label.
00086      **/
00087     void setLabel( const std::string & newLabel ) { _label = newLabel; }
00088
00089     /**
00090      * Return this item's icon name.
00091      **/
00092     std::string iconName() const { return _iconName; }
00093
```

```
00094     /**
00095      * Return 'true' if this item has an icon name.
00096      **/
00097     bool hasIconName() const { return ! _iconName.empty(); }
00098
00099     /**
00100      * Set this item's icon name.
00101      **/
00102     void setIconName( const std::string & newIconName ) { _iconName = newIconName; }
00103
00104     /**
00105      * Return 'true' if this item is currently selected.
00106      **/
00107     bool selected() const { return _status != 0; }
00108
00109     /**
00110      * Select or unselect this item. This does not have any effect on any other
00111      * item; if it is desired that only one item is selected at any time, the
00112      * caller has to take care of that.
00113      **/
00114     void setSelected( bool sel = true ) { _status = sel ? 1 : 0; }
00115
00116     /**
00117      * Return the status of this item. This is a bit more generalized than
00118      * 'selected'. Values other than 0 or 1 can mean different things to the
00119      * application or to the specific widget.
00120      **/
00121     int status() const { return _status; }
00122
00123     /**
00124      * Set the status of this item. Most widgets only use 0 for "not selected"
00125      * or nonzero for "selected". Some widgets may make use of other values as
00126      * well.
00127      **/
00128     void setStatus( int newStatus ) { _status = newStatus; }
00129
00130     /**
00131      * Set this item's index.
00132      **/
00133     void setIndex( int index ) { _index = index; }
00134
00135     /**
00136      * Return the index of this item (as set with setIndex() ).
00137      **/
00138     int index() const { return _index; }
00139
00140     /**
00141      * Set the opaque data pointer for application use.
00142      *
00143      * Applications can use this to store the pointer to a counterpart of this
00144      * tree item. It is the application's responsibility to watch for dangling
00145      * pointers and possibliy deleting the data. All this class ever does with
00146      * this pointer is to store it.
00147      **/
00148     void setData( void * newData ) { _data = newData; }
00149
00150     /**
00151      * Return the opaque data pointer.
00152      **/
00153     void * data() const { return _data; }
00154
00155     //
00156     // Children management stubs.
00157     //
00158     // Derived classes that can handle child items should reimplement those
00159     // functions.
00160     // The following default implementations don't do anything with children;
00161     // they act as if this item didn't have any children.
00162     //
00163
00164     /**
00165      * Return 'true' if this item has any child items.
00166      **/
00167     virtual bool hasChildren() const { return false; }
00168
00169     /**
00170      * Return an iterator that points to the first child item of this item.
00171      *
00172      * This default implementation returns the 'end' iterator of the
00173      * class-static always empty _noChildren YItemCollection.
00174      * It is safe to use this iterator in classic iterator loops:
```

```
00175      *
00176      *   for ( YItemIterator it = myItem->childrenBegin();
00177      *         it != myItem->childrenEnd();
00178      *         ++it )
00179      *   {
00180      *       ...
00181      *   }
00182      *
00183      * The loop body will only ever be executed if this item is a derived class
00184      * that actually manages child items.
00185      **/
00186     virtual YItemIterator  childrenBegin()            { return _noChildren.end(); }
00187     virtual YItemConstIterator        childrenBegin() const      { return _noChildren.end(); }
00188
00189     /**
00190      * Return an iterator that points after the last child item of this item.
00191      *
00192      * This default implementation returns the 'end' iterator of the
00193      * class-static always empty _noChildren YItemCollection.
00194      **/
00195     virtual YItemIterator  childrenEnd()              { return _noChildren.end(); }
00196     virtual YItemConstIterator        childrenEnd() const  { return _noChildren.end(); }
00197
00198     /**
00199      * Returns this item's parent item or 0 if it is a toplevel item.
00200      * This default implementation always returns 0.
00201      * Derived classes that handle children should reimplement this.
00202      **/
00203     virtual YItem * parent() const { return 0; }
00204
00205
00206 private:
00207
00208     std::string _label;
00209     std::string _iconName;
00210     int         _status;
00211     int         _index;
00212     void *      _data;
00213
00214     /**
00215      * Static children collection that is always empty so the children
00216      * iterators of this base class have something valid to return.
00217      **/
00218     static YItemCollection _noChildren;
00219 };
00220
00221
00222
00223 #endif // YItem_h
```

6.3 /usr/src/RPM/BUILD/libyui-3.10.0/src/YTableItem.h File Reference

```
#include "YItem.h"
```

Classes

- class YTableItem

  Item class for YTable items.

- class YTableCell

  One cell (one column in one row) of a YTableItem.

Typedefs

- typedef std::vector< YTableCell * > YTableCellCollection

  Collection of pointers to YTableCell.
- typedef YTableCellCollection::iterator YTableCellIterator

  Mutable iterator over YTableCellCollection.
- typedef YTableCellCollection::const_iterator YTableCellConstIterator

  Const iterator over YTableCellCollection.

6.4 YTableItem.h

```
00001 /*
00002   Copyright (C) 2000-2012 Novell, Inc
00003   This library is free software; you can redistribute it and/or modify
00004   it under the terms of the GNU Lesser General Public License as
00005   published by the Free Software Foundation; either version 2.1 of the
00006   License, or (at your option) version 3.0 of the License. This library
00007   is distributed in the hope that it will be useful, but WITHOUT ANY
00008   WARRANTY; without even the implied warranty of MERCHANTABILITY or
00009   FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public
00010   License for more details. You should have received a copy of the GNU
00011   Lesser General Public License along with this library; if not, write
00012   to the Free Software Foundation, Inc., 51 Franklin Street, Fifth
00013   Floor, Boston, MA 02110-1301 USA
00014 */
00015
00016
00017 /*-/
00018
00019   File:         YTableItem.h
00020
00021   Author:       Stefan Hundhammer <sh@suse.de>
00022
00023 /-*/
00024
00025 #ifndef YTableItem_h
00026 #define YTableItem_h
00027
00028 #include "YItem.h"
00029
00030
00031 class YTableCell;
00032
00033 // without "documenting" the file, typedefs will be dropped
00034 //! @file
00035
00036 //! Collection of pointers to YTableCell
00037 typedef std::vector<YTableCell *>               YTableCellCollection;
00038 //! Mutable iterator over @ref YTableCellCollection
00039 typedef YTableCellCollection::iterator          YTableCellIterator;
00040 //! Const   iterator over @ref YTableCellCollection
00041 typedef YTableCellCollection::const_iterator    YTableCellConstIterator;
00042
00043
00044 /**
00045  * Item class for YTable items. Each YTableItem corresponds to one row in a
00046  * YTable.
00047  *
00048  * A YTableItem might have any number of cells (columns within this row),
00049  * including none. The YTable widget is free to ignore any excess cells if
00050  * there are more than the YTable widget has columns. The YTable widget is to
00051  * treat nonexistent cells like empty ones.
00052  *
00053  * Note that while YTable items and their cells can be manipulated through
00054  * pointers, their visual representation on screen might be updated only upon
00055  * calling certain methods of the YTable widget. See the YTable reference for
00056  * details.
00057  **/
00058 class YTableItem: public YItem
00059 {
00060 public:
00061
```

```
00062     /**
00063      * Default constructor. Use addCell() to give it any content.
00064      **/
00065     YTableItem();
00066
00067     /**
00068      * Convenience constructor for table items without any icons.
00069      *
00070      * This will create up to 10 (0..9) cells. Empty cells for empty labels at
00071      * the end of the labels are not created, but empty cells in between are.
00072      *
00073      *     new YTableItem( "one", "two", "", "", "five" );
00074      *
00075      * will create an item with 5 cells:
00076      *
00077      *     cell[0] ==> "one"
00078      *     cell[1] ==> "two"
00079      *     cell[2] ==> ""
00080      *     cell[3] ==> ""
00081      *     cell[4] ==> "five"
00082      **/
00083     YTableItem( const std::string & label_0,
00084                 const std::string & label_1 = std::string(),
00085                 const std::string & label_2 = std::string(),
00086                 const std::string & label_3 = std::string(),
00087                 const std::string & label_4 = std::string(),
00088                 const std::string & label_5 = std::string(),
00089                 const std::string & label_6 = std::string(),
00090                 const std::string & label_7 = std::string(),
00091                 const std::string & label_8 = std::string(),
00092                 const std::string & label_9 = std::string() );
00093
00094     /**
00095      * Destructor.
00096      *
00097      * This will delete all cells.
00098      **/
00099     virtual ~YTableItem();
00100
00101     /**
00102      * Add a cell. This item will assume ownership over the cell and delete it
00103      * when appropriate (when the table is destroyed or when table items are
00104      * replaced), at which time the pointer will become invalid.
00105      *
00106      * Cells can still be changed after they (and the item they belong to) are
00107      * added, but in that case, YTable::cellChanged() needs to be called to
00108      * update the table display accordingly.
00109      **/
00110     void addCell( YTableCell * cell_disown );
00111
00112     /**
00113      * Create a new cell and add it (even if all 'label',
00114      * 'iconName' and 'sortKey' are empty).
00115      **/
00116     void addCell( const std::string & label, const std::string & iconName = std::string(),
00117                   const std::string & sortKey = std::string() );
00118
00119     /**
00120      * Delete all cells.
00121      **/
00122     void deleteCells();
00123
00124     /**
00125      * Return an iterator that points to the first cell of this item.
00126      **/
00127     YTableCellIterator          cellsBegin()            { return _cells.begin(); }
00128     YTableCellConstIterator     cellsBegin() const      { return _cells.begin(); }
00129
00130     /**
00131      * Return an iterator that points after the last cell of this item.
00132      **/
00133     YTableCellIterator          cellsEnd()              { return _cells.end(); }
00134     YTableCellConstIterator     cellsEnd() const        { return _cells.end(); }
00135
00136     /**
00137      * Return the cell at the specified index (counting from 0 on)
00138      * or 0 if there is none.
00139      **/
00140     const YTableCell * cell( int index ) const;
00141     YTableCell * cell( int index );
00142
```

```
00143     /**
00144      * Return the number of cells this item has.
00145      **/
00146     int cellCount() const { return _cells.size(); }
00147
00148     /**
00149      * Return 'true' if this item has a cell with the specified index
00150      * (counting from 0 on), 'false' otherwise.
00151      **/
00152     bool hasCell( int index ) const;
00153
00154     /**
00155      * Return the label of cell no. 'index' (counting from 0 on) or an empty
00156      * string if there is no cell with that index.
00157      **/
00158     std::string label( int index ) const;
00159
00160     /**
00161      * Return the icon name of cell no. 'index' (counting from 0 on) or an empty
00162      * string if there is no cell with that index.
00163      **/
00164     std::string iconName( int index ) const;
00165
00166     /**
00167      * Return 'true' if there is a cell with the specified index that has an
00168      * icon name.
00169      **/
00170     bool hasIconName( int index ) const;
00171
00172     /**
00173      * Just for debugging.
00174      **/
00175     std::string label() const { return label(0); }
00176
00177 private:
00178
00179     // Disable unwanted base class methods. They don't make sense in this
00180     // context since there is not just one single label or icon name, but one
00181     // for each cell.
00182
00183     std::string iconName()      const                   { return ""; }
00184     bool        hasIconName()       const               { return false; }
00185     void        setLabel        ( const std::string & ) {}
00186     void        setIconName     ( const std::string & ) {}
00187
00188
00189     //
00190     // Data members
00191     //
00192
00193     YTableCellCollection _cells;
00194 };
00195
00196
00197
00198 /**
00199  * One cell (one column in one row) of a YTableItem. Each cell has a label (a
00200  * user visible text), optionally an icon (*) and also optionally a sort-key.
00201  *
00202  * Note that cells don't have individual IDs; they have just an index.
00203  * The first cell in an item is cell(0). In an ideal world, each YTableItem
00204  * would have exactly as many cells as there are columns in the YTable, but
00205  * these classes make no such assumptions. A YTableItem might have any number
00206  * of cells, including none.
00207  *
00208  * The YTable widget is free to ignore any excess cells if there are more than
00209  * the YTable widget has columns. If there are less cells than the table has
00210  * columns, the nonexistent cells will be treated as empty.
00211  *
00212  *
00213  * (*) Not all UIs can handle icons. UIs that can't handle them will simply
00214  * ignore any icons specified for YTableCells. Thus, applications should either
00215  * check the UI capabilities if it can handle icons or use icons only as an
00216  * additional visual cue that still has a text counterpart (so the user can
00217  * still make sense of the table content when no icons are visible).
00218  **/
00219 class YTableCell
00220 {
00221 public:
00222     /**
00223      * Constructor with label and optional icon name and optional sort
```

```
00224      * key for cells that don't have a parent item yet (that will be
00225      * added to a parent later with setParent()).
00226      **/
00227     YTableCell( const std::string & label, const std::string & iconName = "",
00228                 const std::string & sortKey = "" )
00229         : _label( label )
00230         , _iconName( iconName )
00231         , _sortKey( sortKey )
00232         , _parent( 0 )
00233         , _column ( -1 )
00234         {}
00235
00236     /**
00237      * Constructor with parent, column no., label and optional icon name for
00238      * cells that are created with a parent.
00239      **/
00240     YTableCell( YTableItem *                parent,
00241                 int                         column,
00242                 const std::string &         label,
00243                 const std::string &         iconName = "",
00244                 const std::string &         sortKey = "" )
00245         : _label( label )
00246         , _iconName( iconName )
00247         , _sortKey( sortKey )
00248         , _parent( parent )
00249         , _column ( column )
00250         {}
00251
00252     /**
00253      * Destructor. Not strictly needed inside this class, but useful for
00254      * derived classes. Since this is the only virtual method of this class,
00255      * the cost of this is a vtable for this class and a pointer to the vtable
00256      * in each instance.
00257      **/
00258     virtual ~YTableCell() {}
00259
00260     /**
00261      * Return this cells's label. This is what the user sees in a dialog, so
00262      * this will usually be a translated text.
00263      **/
00264     std::string label() const { return _label; }
00265
00266     /**
00267      * Set this cell's label.
00268      *
00269      * If this is called after the corresponding table item (table row) is
00270      * added to the table widget, call YTable::cellChanged() to notify the
00271      * table widget about the fact. Only then will the display be updated.
00272      **/
00273     void setLabel( const std::string & newLabel ) { _label = newLabel; }
00274
00275     /**
00276      * Return this cell's icon name.
00277      **/
00278     std::string iconName() const { return _iconName; }
00279
00280     /**
00281      * Return 'true' if this cell has an icon name.
00282      **/
00283     bool hasIconName() const { return ! _iconName.empty(); }
00284
00285     /**
00286      * Set this cell's icon name.
00287      *
00288      * If this is called after the corresponding table item (table row) is
00289      * added to the table widget, call YTable::cellChanged() to notify the
00290      * table widget about the fact. Only then will the display be updated.
00291      **/
00292     void setIconName( const std::string & newIconName ) { _iconName = newIconName; }
00293
00294     /**
00295      * Return this cell's sort key.
00296      **/
00297     std::string sortKey() const { return _sortKey; }
00298
00299     /**
00300      * Return 'true' if this cell has a sort key.
00301      **/
00302     bool hasSortKey() const { return ! _sortKey.empty(); }
00303
00304     /**
```

```
00305      * Set this cell's sort key.
00306      *
00307      * If this is called after the corresponding table item (table row) is
00308      * added to the table widget, call YTable::cellChanged() to notify the
00309      * table widget about the fact. Only then will the display be updated.
00310      **/
00311     void setSortKey( const std::string & newSortKey ) { _sortKey = newSortKey; }
00312
00313     /**
00314      * Return this cell's parent item or 0 if it doesn't have one yet.
00315      **/
00316     YTableItem * parent() const { return _parent; }
00317
00318     /**
00319      * Return this cell's column no. (counting from 0on) or -1 if it doesn't
00320      * have a parent yet.
00321      **/
00322     int column() const { return _column; }
00323
00324     /**
00325      * Convenience function: Return this cell's parent item's index within its
00326      * table widget or -1 if there is no parent item or no parent table.
00327      **/
00328     int itemIndex() const { return _parent ? _parent->index() : -1; }
00329
00330     /**
00331      * Set this cell's parent item and column no. if it doesn't have a parent
00332      * yet.
00333      *
00334      * This method will throw an exception if the cell already has a parent.
00335      **/
00336     void reparent( YTableItem * parent, int column );
00337
00338
00339 private:
00340
00341     std::string         _label;
00342     std::string         _iconName;
00343     std::string         _sortKey;
00344     YTableItem *      _parent;
00345     int                 _column;
00346 };
00347
00348
00349
00350  #endif // YTableItem_h
```

6.5 /usr/src/RPM/BUILD/libyui-3.10.0/src/YTypes.h File Reference

```
#include <list>
```

Macros

- #define **YUIAllDimensions** 2

Typedefs

- typedef double **YLayoutSize_t**
- typedef long long **YFileSize_t**
- typedef std::list< YWidget * > **YWidgetList**
- typedef std::list< YWidget * >::iterator **YWidgetListIterator**
- typedef std::list< YWidget * >::const_iterator **YWidgetListConstIterator**
- typedef std::list< YWidget * >::reverse_iterator **YWidgetListReverseIterator**
- typedef std::list< YWidget * >::const_reverse_iterator **YWidgetListConstReverseIterator**

Enumerations

- enum **YUIDimension** { **YD_HORIZ** = 0, **YD_VERT** = 1 }
- enum **YAlignmentType** { **YAlignUnchanged**, **YAlignBegin**, **YAlignEnd**, **YAlignCenter** }
- enum YDialogType { **YMainDialog**, **YPopupDialog**, **YWizardDialog** }

  Type of dialog: Main / Popup / Wizard.
- enum **YDialogColorMode** { **YDialogNormalColor**, **YDialogInfoColor**, **YDialogWarnColor** }
- enum **YButtonRole** {
  YCustomButton = 0, **YOKButton**, **YApplyButton**, **YCancelButton**,
  YHelpButton, **YRelNotesButton**, **YMaxButtonRole** }
- enum **YButtonOrder** { **YKDEButtonOrder**, **YGnomeButtonOrder** }

6.5.1 Detailed Description

Author: Stefan Hundhammer sh@suse.de

Header file for frequently used simple types to reduce interdependencies between important headers (e.g., YWidget.h, YUI.h).

Definition in file YTypes.h.

6.6 YTypes.h

```
00001 /*
00002   Copyright (C) 2000-2012 Novell, Inc
00003   This library is free software; you can redistribute it and/or modify
00004   it under the terms of the GNU Lesser General Public License as
00005   published by the Free Software Foundation; either version 2.1 of the
00006   License, or (at your option) version 3.0 of the License. This library
00007   is distributed in the hope that it will be useful, but WITHOUT ANY
00008   WARRANTY; without even the implied warranty of MERCHANTABILITY or
00009   FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public
00010   License for more details. You should have received a copy of the GNU
00011   Lesser General Public License along with this library; if not, write
00012   to the Free Software Foundation, Inc., 51 Franklin Street, Fifth
00013   Floor, Boston, MA 02110-1301 USA
00014 */
00015
00016
00017 /**
00018  @file          YTypes.h
00019
00020   Author:       Stefan Hundhammer <sh@suse.de>
00021
00022   Header file for frequently used simple types to reduce interdependencies
00023   between important headers (e.g., YWidget.h, YUI.h).
00024
00025 **/
00026
00027
00028 #ifndef YTypes_h
00029 #define YTypes_h
00030
00031 #include <list>
00032
00033 typedef double          YLayoutSize_t;
00034 typedef long long       YFileSize_t;
00035
00036 class YWidget;
00037
00038 typedef std::list<YWidget *>                            YWidgetList;
00039 typedef std::list<YWidget *>::iterator                  YWidgetListIterator;
00040 typedef std::list<YWidget *>::const_iterator            YWidgetListConstIterator;
00041 typedef std::list<YWidget *>::reverse_iterator          YWidgetListReverseIterator;
```

```
00042 typedef std::list<YWidget *>::const_reverse_iterator    YWidgetListConstReverseIterator;
00043
00044
00045 #define YUIAllDimensions        2
00046
00047 enum YUIDimension
00048 {
00049     YD_HORIZ    = 0,
00050     YD_VERT     = 1
00051 };
00052
00053
00054 enum YAlignmentType
00055 {
00056     YAlignUnchanged,
00057     YAlignBegin,
00058     YAlignEnd,
00059     YAlignCenter
00060 };
00061
00062
00063 /**
00064  * Type of dialog: Main / Popup / Wizard.
00065  **/
00066 enum YDialogType
00067 {
00068     YMainDialog,
00069     YPopupDialog,
00070     YWizardDialog,
00071 };
00072
00073
00074 enum YDialogColorMode
00075 {
00076     YDialogNormalColor, // Default
00077     YDialogInfoColor,   // Brighter colors
00078     YDialogWarnColor    // Very bright Warning colors
00079 };
00080
00081
00082 enum YButtonRole
00083 {
00084     YCustomButton = 0,  // No predefined role
00085     YOKButton,          // [OK], [Continue], [Yes], [Accept], [Next]
00086     YApplyButton,       // [Apply]
00087     YCancelButton,      // [Cancel]
00088     YHelpButton,        // [Help]
00089     YRelNotesButton,    // [Release Notes]
00090
00091     YMaxButtonRole      // For use as array size
00092 };
00093
00094
00095 enum YButtonOrder
00096 {
00097     YKDEButtonOrder,    // [OK] [Apply] [Cancel] [Custom1] [Custom2] [Help]
00098                         // [Yes] [No]
00099                         // [Continue] [Cancel]
00100
00101     YGnomeButtonOrder   // [Help] [Custom1] [Custom2] [Apply] [Cancel] [OK]
00102                         // [No] [Yes]
00103                         // [Cancel] [Continue]
00104 };
00105
00106
00107
00108 #endif // YTypes_h
```

6.7 /usr/src/RPM/BUILD/libyui-3.10.0/src/YWizard.h File Reference

```
#include "YWidget.h"
```

Classes

- class YWizard

  A wizard is a more complex frame typically used for multi-step workflows:

Macros

- #define **YWizardID** "wizard"
- #define **YWizardContentsReplacePointID** "contents"

Enumerations

- enum YWizardMode { YWizardMode_Standard, YWizardMode_Steps, YWizardMode_Tree, YWizardMode_TitleOnLeft }

  Kind of the wizard layout.

6.7.1 Detailed Description

Author: Stefan Hundhammer sh@suse.de

Definition in file YWizard.h.

6.7.2 Enumeration Type Documentation

6.7.2.1 YWizardMode

`enum YWizardMode`

Kind of the wizard layout.

Enumerator

YWizardMode_Standard	Normal wizard (help panel or nothing)
YWizardMode_Steps	Steps visible in left side panel.
YWizardMode_Tree	Tree in left side panel.
YWizardMode_TitleOnLeft	Title on the left side.

Definition at line 42 of file YWizard.h.

6.8 YWizard.h

```
00001 /*
00002   Copyright (C) 2000-2012 Novell, Inc
00003   This library is free software; you can redistribute it and/or modify
00004   it under the terms of the GNU Lesser General Public License as
00005   published by the Free Software Foundation; either version 2.1 of the
00006   License, or (at your option) version 3.0 of the License. This library
00007   is distributed in the hope that it will be useful, but WITHOUT ANY
00008   WARRANTY; without even the implied warranty of MERCHANTABILITY or
00009   FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public
00010   License for more details. You should have received a copy of the GNU
00011   Lesser General Public License along with this library; if not, write
00012   to the Free Software Foundation, Inc., 51 Franklin Street, Fifth
00013   Floor, Boston, MA 02110-1301 USA
00014 */
00015
00016
00017 /**
00018
00019   @file         YWizard.h
00020
00021   Author:       Stefan Hundhammer <sh@suse.de>
00022
00023 **/
00024
00025 #ifndef YWizard_h
00026 #define YWizard_h
00027
00028 #include "YWidget.h"
00029
00030 class YMacroRecorder;
00031 class YWizardPrivate;
00032 class YPushButton;
00033 class YReplacePoint;
00034
00035 #define YWizardID                       "wizard"
00036 #define YWizardContentsReplacePointID   "contents"
00037
00038
00039 /**
00040  * Kind of the wizard layout
00041  **/
00042 enum YWizardMode
00043 {
00044     YWizardMode_Standard,   ///< Normal wizard (help panel or nothing)
00045     YWizardMode_Steps,         ///< Steps visible in left side panel
00046     YWizardMode_Tree,           ///< Tree in left side panel
00047     YWizardMode_TitleOnLeft     ///< Title on the left side
00048 };
00049
00050
00051 /**
00052  * A wizard is a more complex frame typically used for multi-step workflows:
00053  *
00054  *    +------------+-------------------------------------------------+
00055  *    |            |                                                 |
00056  *    |            |                                                 |
00057  *    |            |                                                 |
00058  *    |            |                                                 |
00059  *    |            |                                                 |
00060  *    |            |                                                 |
00061  *    |            |                                                 |
00062  *    |            |                                                 |
00063  *    |  Side bar  |                 Content Area                    |
00064  *    |            |                (YReplacePoint)                  |
00065  *    |            |                                                 |
00066  *    |            |                                                 |
00067  *    |            |                                                 |
00068  *    |            |                                                 |
00069  *    |            |                                                 |
00070  *    |            |                                                 |
00071  *    |            |  [Back]           [Abort]              [Next]   |
00072  *    +------------+-------------------------------------------------+
00073  *
00074  * The side bar can contain help text, a list of steps that are performed, or
00075  * an embedded tree (much like the YTree widget).
00076  *
00077  * The client application creates the wizard and replaces the widget in the
00078  * content area for each step.
```

```
00079  *
00080  * The wizard buttons can theoretically be used to do anything, but good UI
00081  * design will stick to the model above: [Back], [Abort], [Next].
00082  *
00083  * If only two buttons are desired, leave the [Back] button's label emtpy. The
00084  * remaining two buttons will be rearranged accordingly in the button area.
00085  *
00086  * In the last step of a multi-step workflow, the [Next] button's label is
00087  * customarily replaced with a label that indicates that this is the last
00088  * step. [Accept] is recommended for that button label: [Finish] (as sometimes
00089  * used in other environments) by no means clearly indicates that this is the
00090  * positive ending, the final "do it" button. Worse, translations of that are
00091  * often downright miserable: To German, [Finish] gets translated as [Beenden]
00092  * which is the same word as "Quit" (used in menus). This does not at all tell
00093  * the user that that button really performs the requested action the
00094  * multi-step wizard is all about.
00095  **/
00096 class YWizard: public YWidget
00097 {
00098 protected:
00099     /**
00100      * Constructor.
00101      *
00102      * If only two buttons are desired, leave 'backButtonLabel' empty.
00103      **/
00104     YWizard( YWidget *                    parent,
00105              const std::string &        backButtonLabel,
00106              const std::string &        abortButtonLabel,
00107              const std::string &        nextButtonLabel,
00108              YWizardMode              wizardMode = YWizardMode_Standard );
00109
00110 public:
00111
00112     /**
00113      * Destructor.
00114      **/
00115     virtual ~YWizard();
00116
00117     /**
00118      * Returns a descriptive name of this widget class for logging,
00119      * debugging etc.
00120      **/
00121     virtual const char * widgetClass() const { return "YWizard"; }
00122
00123
00124     //
00125     // Wizard basics
00126     //
00127
00128     /**
00129      * Return the wizard mode (what kind of wizard this is):
00130      * YWizardMode_Standard, YWizardMode_Steps, YWizardMode_Tree, YWizardMode_TitleOnLeft
00131      **/
00132     YWizardMode wizardMode() const;
00133
00134     /**
00135      * Return the wizard buttons or 0 if there is no such button.
00136      *
00137      * Derived classes are required to implement this.
00138      **/
00139     virtual YPushButton * backButton()  const = 0;
00140     virtual YPushButton * abortButton() const = 0;
00141     virtual YPushButton * nextButton()  const = 0;
00142
00143     /**
00144      * Return the internal contents ReplacePoint.
00145      *
00146      * Derived classes are required to implement this.
00147      **/
00148     virtual YReplacePoint * contentsReplacePoint() const = 0;
00149
00150     /**
00151      * Protect the wizard's "Next" button against disabling.
00152      **/
00153     void protectNextButton( bool protect );
00154
00155     /**
00156      * Check if the wizard's "Next" button is currently protected against
00157      * disabling.
00158      **/
00159     bool nextButtonIsProtected() const;
```

```
00160
00161     /**
00162      * Set the label of one of the wizard buttons (backButton(), abortButton(),
00163      * nextButton() ) if that button is non-null.
00164      *
00165      * The default implementation simply calls button->setLabel( newLabel ).
00166      **/
00167     virtual void setButtonLabel( YPushButton * button, const std::string & newLabel );
00168
00169     /**
00170      * Set the help text.
00171      **/
00172     virtual void setHelpText( const std::string & helpText ) = 0;
00173
00174     /**
00175      * Set the dialog icon. An empty icon name clears the current icon.
00176      **/
00177     virtual void setDialogIcon( const std::string & iconName ) = 0;
00178
00179     /**
00180      * Set the dialog title shown in the window manager's title bar.
00181        An empty string clears the current title.
00182      **/
00183     virtual void setDialogTitle( const std::string & titleText ) = 0;
00184
00185     /**
00186      * Get the current dialog title shown in the window manager's title bar.
00187      **/
00188     virtual std::string getDialogTitle() = 0;
00189
00190     /**
00191      * Set the dialog heading.
00192      **/
00193     virtual void setDialogHeading( const std::string & headingText ) = 0;
00194
00195     /**
00196      * Get the dialog heading.
00197      **/
00198     virtual std::string getDialogHeading() = 0;
00199
00200     //
00201     // Steps handling
00202     //
00203
00204     /**
00205      * Add a step for the steps panel on the side bar.
00206      * This only adds the step to the internal list of steps.
00207      * The display is only updated upon calling updateSteps().
00208      **/
00209     virtual void addStep( const std::string & text, const std::string & id ) = 0;
00210
00211     /**
00212      * Add a step heading for the steps panel on the side bar.
00213      * This only adds the heading to the internal list of steps.
00214      * The display is only updated upon calling updateSteps().
00215      **/
00216     virtual void addStepHeading( const std::string & text ) = 0;
00217
00218     /**
00219      * Delete all steps and step headings from the internal lists.
00220      * The display is only updated upon calling updateSteps().
00221      **/
00222     virtual void deleteSteps() = 0;
00223
00224     /**
00225      * Set the current step. This also triggers updateSteps() if necessary.
00226      **/
00227     virtual void setCurrentStep( const std::string & id ) = 0;
00228
00229     /**
00230      * Update the steps display: Reflect the internal steps and heading lists
00231      * in the layout.
00232      **/
00233     virtual void updateSteps() = 0;
00234
00235
00236     //
00237     // Tree handling
00238     //
00239
00240     /**
```

```
00241      * Add a tree item. If "parentID" is an empty string, it will be a root
00242      * item. 'text' is the text that will be displayed in the tree, 'id' the ID
00243      * with which this newly created item can be referenced - and that will be
00244      * returned when the user clicks on a tree item.
00245      **/
00246     virtual void addTreeItem( const std::string & parentID,
00247                               const std::string & text,
00248                               const std::string & id    ) = 0;
00249
00250     /**
00251      * Select the tree item with the specified ID, if such an item exists.
00252      **/
00253     virtual void selectTreeItem( const std::string & id ) = 0;
00254
00255     /**
00256      * Returns the current tree selection or an empty string if nothing is
00257      * selected or there is no tree.
00258      **/
00259     virtual std::string currentTreeSelection() = 0;
00260
00261     /**
00262      * Delete all tree items.
00263      **/
00264     virtual void deleteTreeItems() = 0;
00265
00266
00267     //
00268     // Menu handling
00269     //
00270
00271     /**
00272      * Add a menu to the menu bar. If the menu bar is not visible yet, it will
00273      * be made visible. 'text' is the user-visible text for the menu bar
00274      * (including keyboard shortcuts marked with '&'), 'id' is the menu ID for
00275      * later addMenuEntry() etc. calls.
00276      **/
00277     virtual void addMenu( const std::string & text,
00278                           const std::string & id ) = 0;
00279
00280     /**
00281      * Add a submenu to the menu with ID 'parentMenuID'.
00282      **/
00283     virtual void addSubMenu( const std::string & parentMenuID,
00284                              const std::string & text,
00285                              const std::string & id ) = 0;
00286
00287     /**
00288      * Add a menu entry to the menu with ID 'parentMenuID'. 'id' is what will
00289      * be returned by UI::UserInput() etc. when a user activates this menu entry.
00290      **/
00291     virtual void addMenuEntry( const std::string & parentMenuID,
00292                                const std::string & text,
00293                                const std::string & id ) = 0;
00294
00295     /**
00296      * Add a menu separator to a menu.
00297      **/
00298     virtual void addMenuSeparator( const std::string & parentMenuID ) = 0;
00299
00300     /**
00301      * Delete all menus and hide the menu bar.
00302      **/
00303     virtual void deleteMenus() = 0;
00304
00305     /**
00306      * Show a "Release Notes" button above the "Help" button in the steps panel
00307      * with the specified label that will return the specified id to
00308      * UI::UserInput() when clicked.
00309      **/
00310     virtual void showReleaseNotesButton( const std::string & label,
00311                                          const std::string & id ) = 0;
00312
00313     //
00314     // Misc
00315     //
00316
00317     /**
00318      * Hide an existing "Release Notes" button.
00319      **/
00320     virtual void hideReleaseNotesButton() = 0;
00321
```

```
00322     /**
00323      * Retranslate internal buttons that are not accessible from the outside:
00324      * - [Help]
00325      * - [Steps]
00326      * - [Tree]
00327      **/
00328     virtual void retranslateInternalButtons() = 0;
00329
00330     /**
00331      * NOP command to check if a YWizard is running.
00332      **/
00333     void ping();
00334
00335
00336     //
00337     // Property handling
00338     //
00339
00340     /**
00341      * Get a property.
00342      * Reimplemented from YWidget.
00343      *
00344      * This method may throw YUIPropertyExceptions.
00345      **/
00346     virtual YPropertyValue getProperty( const std::string & propertyName );
00347
00348     /**
00349      * Return this class's property set.
00350      * This also initializes the property upon the first call.
00351      *
00352      * Reimplemented from YWidget.
00353      **/
00354     virtual const YPropertySet & propertySet();
00355
00356
00357 private:
00358
00359     ImplPtr<YWizardPrivate> priv;
00360 };
00361
00362
00363 #endif // YWizard_h
```

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