



XML SCHEMA DEFINITION

InsertThirdPartyRibbonTabs API Function

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Introduction

The basic structure of a Ribbon XML file (or string) is something like this

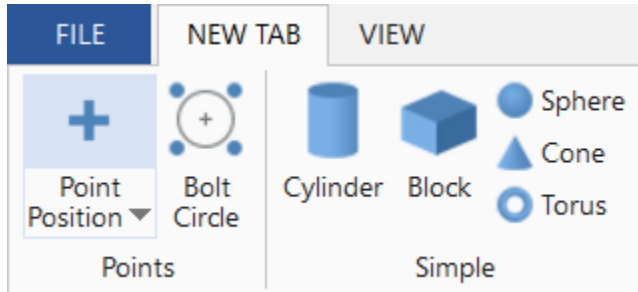
- <Ribbon>
 - <Tabs>
 - <Tab>
 - <Groups>
 - <Group ... >
 - <Button ... />
 - <PopupButton ... >
 - <Elements ... >
 - <Button ... />
 - etc.
 - </Elements>
 - </PopupButton>
 - etc.
 - <Group>
 - etc.
 - </Groups>
 - </Tab>
 - </Tabs>
- </Ribbon>

That is, there is a single Ribbon element, with multiple Tabs, which contain multiple Groups, which contain multiple Buttons, PopupButtons, etc. Each of these elements will be described in full, with their attributes

Layout XML Elements

These XML Elements primarily provide the layout of the Ribbon, as opposed to [Interactive XML Elements](#) which provide access to FT Commands.

<TAB> Element



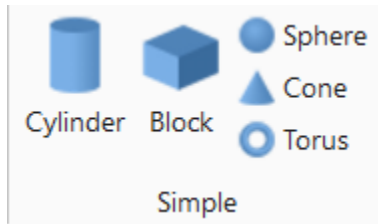
This element represents a single Ribbon Tab. A Tab can contain zero or more Groups.

Here you can see a Tab called New Tab, with two Groups: Points and Simple.

Attributes

Label	The text of the Tab
KeyTip	This represents the keys used to activate the Ribbon element via Alt based keyboard control.

<Group> Element



This element represents a Group within a [<Tab>](#). A Group can contain zero or more [Interactive XML Elements](#).

Here you can see a Group called Simple, containing Large and Small Buttons.

Attributes

FTCommand	<p>This is a combination of the FT Application and Function names separated by a single period. For example, "Mastercam.OnHelp". This would reference the FT entry from Mastercam.ft for the OnHelp function.</p> <p>This attribute is what provides the Group with its Icon, Label and ToolTip. To use this, it is necessary to create a dummy FT entry for each Group with FUNCTION, SPNG, LPNG and TIP. The actual code must exist, but can simply return MC_RETURN::RETURN_NOERROR.</p>
KeyTip	<p>This represents the keys used to activate the Ribbon element via Alt based keyboard control.</p>
LauncherFTCommand	<p>Similar to FTCommand, the allows you to specify the FT Command which is run when the "launcher" button on the Group is clicked. This button is the small arrow on the lower right of the Group.</p> <p>Unlike the Group's FTCommand, clicking the Launcher Button will execute the associated FT Command within Mastercam.</p>
LauncherKeyTip	<p>Similar to KeyTip, this allows you to specify the KeyTip for the "launcher" button.</p>

<Separator> Element

Use a Separator to include a vertical line between Buttons in a Group.

Interactive XML Elements

Use of these XML Element enable Buttons, etc. to appear on the Ribbon. These are used to execute FT Commands.

<Button> Element



This is your basic simple Ribbon Button.

Here you can see it rendered in both Large and Small sizes.

Attributes

FTCommand	<p>This is a combination of the FT Application and Function names separated by a single period. For example, “Mastercam.OnHelp”. This would reference the FT entry from Mastercam.ft for the OnHelp function.</p> <p>Clicking the Button will execute the associated FT Command within Mastercam.</p> <p>This attribute is what provides the Button with its Icon, Label and ToolTip. To use this, it is necessary to create an FT entry for each Button with FUNCTION, SPNG, LPNG and TIP.</p>	
KeyTip	This represents the keys used to activate the Button via Alt based keyboard control.	
LargeMode	This specifies when the Button will render in Large Size.	
	Below are the acceptable values for this attribute:	
	<i>Default</i>	Button will be sized using default Ribbon rules based on available space.
	<i>Always</i>	Button will always be rendered Large.
	<i>Never</i>	Button will never be rendered Large.

<SplitButton> Element

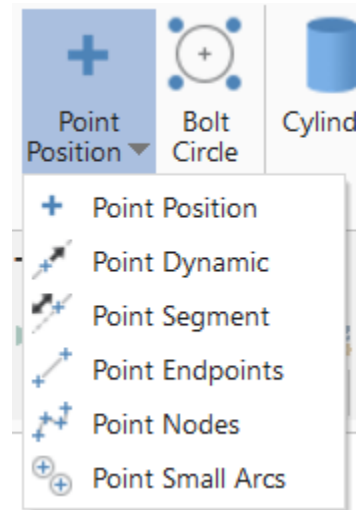


Similar to a Button, a SplitButton also contains a drop down menu of additional buttons.

Notice in the image to the left, you can see that the Icon is highlighted indicating that clicking on the Icon will execute the Point Position command.

In the image to the right, image you can see the drop down menu, which is activated by clicking on the lower portion of the SplitButton. Clicking on any Buttons in the menu will execute those commands.

SplitButton contains a collection of sub-elements under the <Elements> tag. This collection represents the items in the drop down menu. Add the Button, SplitButton, PopupButton, and Separator Elements as required.



Attributes

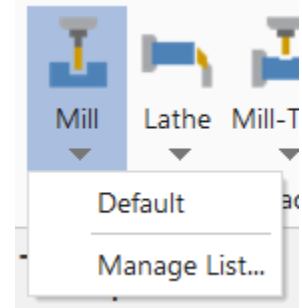
FTCommand	<p>This is a combination of the FT Application and Function names separated by a single period. For example, "Mastercam.OnHelp". This would reference the FT entry from Mastercam.ft for the OnHelp function.</p> <p>Clicking the top half of a SplitButton will execute the associated FT Command within Mastercam.</p> <p>This attribute is what provides the SplitButton with its Icon, Label and ToolTip. To use this, it is necessary to create an FT entry for each SplitButton with FUNCTION, SPNG, LPNG and TIP.</p>	
KeyTip	<p>This represents the keys used to activate the SplitButton via Alt based keyboard control.</p>	
LargeMode	<p>This specifies when the SplitButton will render in Large Size.</p> <p>Below are the acceptable values for this attribute:</p>	
	<i>Default</i>	SplitButton will be sized using default Ribbon rules based on available space.
	<i>Always</i>	SplitButton will always be rendered Large.
	<i>Never</i>	SplitButton will never be rendered Large.

<PopupButton> Element



Similar to a [SplitButton](#), a PopupButton also contains a drop down menu of additional buttons. Unlike a [SplitButton](#), a PopupButton *does not* itself execute a command when clicked. Clicking a PopupButton will only expand the drop down menu.

Notice in the image on the left, when highlighted, the entire PopupButton highlights indicating it has a drop down. The image on the right displays the drop down menu.



PopupButton contains a collection of sub-elements under the <Elements> tag.

This collection represents the items in the drop down menu. Add the Button, SplitButton, PopupButton, and Separator Elements as required.

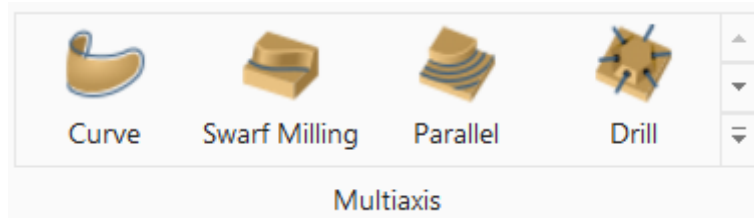
Attributes

FTCommand	<p>This is a combination of the FT Application and Function names separated by a single period. For example, “Mastercam.OnHelp”. This would reference the FT entry from Mastercam.ft for the OnHelp function.</p> <p>Clicking a PopupButton <i>will not</i> execute the associated FT Command.</p> <p>This attribute is what provides the Button with its Icon, Label and ToolTip. To use this, it is necessary to create an FT entry for each Button with FUNCTION, SPNG, LPNG and TIP.</p>	
KeyTip	<p>This represents the keys used to activate the PopupButton via Alt based keyboard control.</p>	
LargeMode	<p>This specifies when the PopupButton will render in Large Size.</p> <p>Below are the acceptable values for this attribute:</p>	
	<i>Default</i>	PopupButton will be sized using default Ribbon rules based on available space.
	<i>Always</i>	PopupButton will always be rendered Large.
	<i>Never</i>	PopupButton will never be rendered Large.

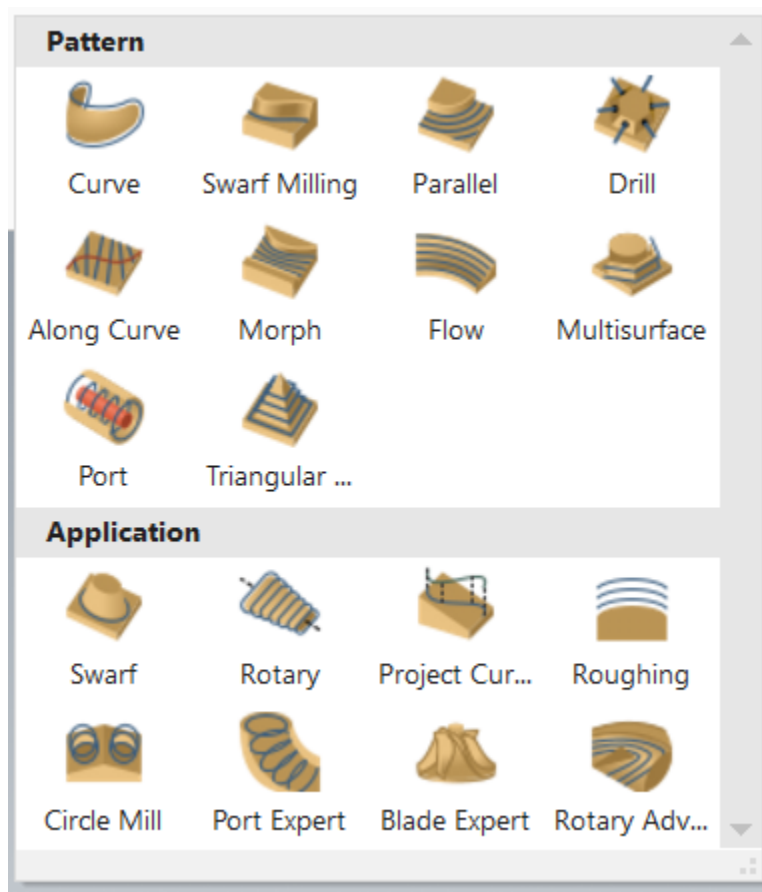
<CommandGallery> Element

This element is designed to group together large amounts of related FT Commands into a Gallery.

The default presentation of a CommandGallery is seen below, and it displays the first few Buttons (based on the InitialColumns attribute, see below.)



A CommandGallery can also be expanded to show the full set of Buttons, as seen below:



Notice the Buttons are separated into optional GalleryGroups, here named **Pattern** and **Application**.

A CommandGallery can also be rendered as a Large Button as seen in the image to the right.



Attributes

FTCommand	<p>This is a combination of the FT Application and Function names separated by a single period. For example, "Mastercam.OnHelp". This would reference the FT entry from Mastercam.ft for the OnHelp function.</p> <p>A CommandGallery itself does not execute this FTCommand, it is used for presentation purposes.</p> <p>This attribute is what provides the CommandGallery with its Icon, Label and ToolTip. To use this, it is necessary to create an FT entry for each Button with FUNCTION, SPNG, LPNG and TIP.</p>	
KeyTip	This represents the keys used to activate the CommandGallery via Alt based keyboard control.	
ButtonMode	This specifies whether the CommandGallery will render as a Gallery, or as a Button.	
	Below are the acceptable values for this attribute:	
	<i>False</i>	CommandGallery will render as a Gallery
	<i>True</i>	CommandGallery will render as a Button
IconsPerRow	When fully expanded, this indicates how many Button Icons will render per row.	
InitialColumns	When in Gallery mode, this indicates how many Button icons will render.	

Sub-elements

<GalleryGroup>

GalleryGroups are used to logically collect FT Commands into named Groups. These are optional.

Attributes

Label	The text of the GalleryGroup
NumberOfElements	Indicates how many Buttons (elements) will be included in the GalleryGroup.