

# LayoutGroup

## Table of Contents

- Description
- Fields

Extends: [Group](#)

## Description

The **LayoutGroup** node class manages the position of its child nodes by arranging them in a row from left to right (horizontal layout), or in a column from top to bottom (vertical layout). Fields provide options to control the spacing between children, the horizontal and vertical alignment, and the margins around the edges of the group.

## Fields

Field	Type	Default	Use																					
layoutDirection	string	"vert"	Controls the layout direction. <table border="1"><thead><tr><th>Value</th><th>Use</th></tr></thead><tbody><tr><td>horiz</td><td>Positions the children in a row from left to right</td></tr><tr><td>vert</td><td>Positions the children in a column from top to bottom</td></tr></tbody></table>	Value	Use	horiz	Positions the children in a row from left to right	vert	Positions the children in a column from top to bottom															
Value	Use																							
horiz	Positions the children in a row from left to right																							
vert	Positions the children in a column from top to bottom																							
horizAlignment	string	"left"	Specifies the alignment point in the horizontal direction. The effect of the value set depends on the whether the <code>layoutDirection</code> field value is set to either <code>horiz</code> or <code>vert</code> . <table border="1"><thead><tr><th>Value</th><th>layoutDirection</th><th>Use</th></tr></thead><tbody><tr><td rowspan="2">left</td><td>vert</td><td>Aligns the left edges of each child in the column, and sets the <b>LayoutGroup</b> node local x-coordinate origin at the left edge of the children</td></tr><tr><td>horiz</td><td>Sets the <b>LayoutGroup</b> node local x-coordinate origin at the left edge of the first child</td></tr><tr><td rowspan="2">center</td><td>vert</td><td>Aligns the centers of each child in the column, and sets the <b>LayoutGroup</b> node local x-coordinate origin at the center alignment point</td></tr><tr><td>horiz</td><td>Sets the <b>LayoutGroup</b> node local x-coordinate origin at the center of the horizontal row of children</td></tr><tr><td rowspan="2">right</td><td>vert</td><td>Aligns the right edges of each child in the column, and sets the <b>LayoutGroup</b> node local x-coordinate origin is at the right edge of the children</td></tr><tr><td>horiz</td><td>Sets the <b>LayoutGroup</b> node local x-coordinate origin at the right edge of the last child</td></tr><tr><td>custom</td><td>vert</td><td>Explicitly set the x translation of each child of the <b>LayoutGroup</b>. If the <code>layoutDirection</code> is "horiz", custom will not be a valid setting. Instead, "left" will be used to do the child layout. <i>Available since firmware version 7.5</i></td></tr></tbody></table>	Value	layoutDirection	Use	left	vert	Aligns the left edges of each child in the column, and sets the <b>LayoutGroup</b> node local x-coordinate origin at the left edge of the children	horiz	Sets the <b>LayoutGroup</b> node local x-coordinate origin at the left edge of the first child	center	vert	Aligns the centers of each child in the column, and sets the <b>LayoutGroup</b> node local x-coordinate origin at the center alignment point	horiz	Sets the <b>LayoutGroup</b> node local x-coordinate origin at the center of the horizontal row of children	right	vert	Aligns the right edges of each child in the column, and sets the <b>LayoutGroup</b> node local x-coordinate origin is at the right edge of the children	horiz	Sets the <b>LayoutGroup</b> node local x-coordinate origin at the right edge of the last child	custom	vert	Explicitly set the x translation of each child of the <b>LayoutGroup</b> . If the <code>layoutDirection</code> is "horiz", custom will not be a valid setting. Instead, "left" will be used to do the child layout. <i>Available since firmware version 7.5</i>
Value	layoutDirection	Use																						
left	vert	Aligns the left edges of each child in the column, and sets the <b>LayoutGroup</b> node local x-coordinate origin at the left edge of the children																						
	horiz	Sets the <b>LayoutGroup</b> node local x-coordinate origin at the left edge of the first child																						
center	vert	Aligns the centers of each child in the column, and sets the <b>LayoutGroup</b> node local x-coordinate origin at the center alignment point																						
	horiz	Sets the <b>LayoutGroup</b> node local x-coordinate origin at the center of the horizontal row of children																						
right	vert	Aligns the right edges of each child in the column, and sets the <b>LayoutGroup</b> node local x-coordinate origin is at the right edge of the children																						
	horiz	Sets the <b>LayoutGroup</b> node local x-coordinate origin at the right edge of the last child																						
custom	vert	Explicitly set the x translation of each child of the <b>LayoutGroup</b> . If the <code>layoutDirection</code> is "horiz", custom will not be a valid setting. Instead, "left" will be used to do the child layout. <i>Available since firmware version 7.5</i>																						

vertAlignment	string	"top"	<p>Specifies the alignment point in the vertical direction. The effect of the value set depends on the whether the <code>layoutDirection</code> field value is set to either <code>horiz</code> or <code>vert</code>.</p> <table border="1" data-bbox="576 367 1518 945"> <thead> <tr> <th>Value</th> <th>layoutDirection</th> <th>Use</th> </tr> </thead> <tbody> <tr> <td rowspan="2">top</td> <td>horiz</td> <td>Aligns the top edges of each child in the row, and sets the <b>LayoutGroup</b> node local y-coordinate origin at the top edge of the children</td> </tr> <tr> <td>vert</td> <td>Sets the <b>LayoutGroup</b> node local y-coordinate origin at the top edge of the first child</td> </tr> <tr> <td rowspan="2">center</td> <td>horiz</td> <td>Aligns the centers of each child in the row, and sets the <b>LayoutGroup</b> node local y-coordinate origin at the center alignment point</td> </tr> <tr> <td>vert</td> <td>Sets the <b>LayoutGroup</b> node local y-coordinate origin at the center of the vertical column of children</td> </tr> <tr> <td rowspan="2">bottom</td> <td>horiz</td> <td>Aligns the bottom edges of each child in the row, and sets the <b>LayoutGroup</b> node local y-coordinate origin at the bottom edge of the children</td> </tr> <tr> <td>vert</td> <td>Sets the <b>LayoutGroup</b> node local y-coordinate origin at the bottom edge of the last child</td> </tr> <tr> <td>custom</td> <td>horiz</td> <td>Explicitly set the y translation of each child of the <b>LayoutGroup</b>. If the <code>layoutDirection</code> is "vert", custom will not be a valid setting. Instead, "top" will be used to do the child layout.  <i>Available since firmware version 7.5</i></td> </tr> </tbody> </table>	Value	layoutDirection	Use	top	horiz	Aligns the top edges of each child in the row, and sets the <b>LayoutGroup</b> node local y-coordinate origin at the top edge of the children	vert	Sets the <b>LayoutGroup</b> node local y-coordinate origin at the top edge of the first child	center	horiz	Aligns the centers of each child in the row, and sets the <b>LayoutGroup</b> node local y-coordinate origin at the center alignment point	vert	Sets the <b>LayoutGroup</b> node local y-coordinate origin at the center of the vertical column of children	bottom	horiz	Aligns the bottom edges of each child in the row, and sets the <b>LayoutGroup</b> node local y-coordinate origin at the bottom edge of the children	vert	Sets the <b>LayoutGroup</b> node local y-coordinate origin at the bottom edge of the last child	custom	horiz	Explicitly set the y translation of each child of the <b>LayoutGroup</b> . If the <code>layoutDirection</code> is "vert", custom will not be a valid setting. Instead, "top" will be used to do the child layout.  <i>Available since firmware version 7.5</i>
Value	layoutDirection	Use																						
top	horiz	Aligns the top edges of each child in the row, and sets the <b>LayoutGroup</b> node local y-coordinate origin at the top edge of the children																						
	vert	Sets the <b>LayoutGroup</b> node local y-coordinate origin at the top edge of the first child																						
center	horiz	Aligns the centers of each child in the row, and sets the <b>LayoutGroup</b> node local y-coordinate origin at the center alignment point																						
	vert	Sets the <b>LayoutGroup</b> node local y-coordinate origin at the center of the vertical column of children																						
bottom	horiz	Aligns the bottom edges of each child in the row, and sets the <b>LayoutGroup</b> node local y-coordinate origin at the bottom edge of the children																						
	vert	Sets the <b>LayoutGroup</b> node local y-coordinate origin at the bottom edge of the last child																						
custom	horiz	Explicitly set the y translation of each child of the <b>LayoutGroup</b> . If the <code>layoutDirection</code> is "vert", custom will not be a valid setting. Instead, "top" will be used to do the child layout.  <i>Available since firmware version 7.5</i>																						
itemSpacings	array of floats	[]	<p>Controls the spacing before or after each child in the layout direction. By default, no space is added between the children.</p> <p>If the field value array is set with a single value, and the <code>addItemSpacingAfterChild</code> field value is set to <code>true</code>, that amount of space is inserted after each child is positioned. If the <code>addItemSpacingAfterChild</code> field value is set to <code>false</code>, the space is inserted before each child is positioned.</p> <p>If the field value array has more than one value, the first value specifies the spacing before or after the first item, the second value specifies the spacing before or after the second item, and so on. If there are fewer values in the field value array than needed, the final value is repeated as needed. If there are more values in the field value array than needed, the extra values are ignored.</p>																					
addItemSpacingAfterChild	Boolean	true	<p>Controls how the spaces specified in the <code>itemSpacings</code> field are inserted. By default, the field value is set to <code>true</code>. This causes the specified spaces to be inserted <i>after</i> the child is positioned. If the field value is set to <code>false</code>, the specified item space is inserted <i>before</i> the child is positioned.</p>																					