

```

        <node label="Christopher Sharp" data="d3"/>
    </node>
    <node label="Compensation and Other">
        <node label="David Avila" data="d4"/>
    </node>
</node>
</fx:XML>
</mx:dataProvider>
</mx:Tree>

```

## Using text equivalents

If a native object cannot be used to convey hierarchical information, a text equivalent for the hierarchy should be provided via the `accessibilityName` property. For basic hierarchies, a direct description of the hierarchy is sufficient; for example:

```

// ActionScript
imgFoodPyramid.accessibilityName = "The original food pyramid consisted of
four levels each representing a food group. The large base group Breads and
Cereals appears at the bottom, followed by Fruits and Vegetables, Dairy and
Meat, and the smallest group at the top, Fats and Sweets";

// MXML
<mx:Image id="imgFoodPyramid" accessibilityName="The original food pyramid
consisted of four levels each representing a food group. The large base group
Breads and Cereals appears at the bottom, followed by Fruits and Vegetables,
Dairy and Meat, and the smallest group at the top, Fats and Sweets" />

```

For more complex hierarchies, the text equivalent should describe all the elements at each level of the tree. When there are more than two levels in a structure, as in an organizational chart, use the word "level" to indicate each level in the hierarchy. For example, consider the following organizational hierarchy:

Contact the Appropriate Technical Support Person in Your Department

### Senior Management

Tim Springer

### Information Technology

Mary Smith

### Financial

Ted Robins

### HR

### Recruitment

Christopher Sharp

### Compensation and Other

David Avila

The equivalent text for this organization may be defined as follows:

```

imgTechSupportOrgChart.accessibilityName =
    "Level 1 - Senior Management, Level 2 - Tim Springer,
    Level 1 - Information Technology, Level 2 - Mary Smith,
    Level 1 - Finance, Level 2 - Ted Robins,
    Level 1 - HR, Level 2 - Recruitment, Level 3 - Christopher Sharp,
    Level 2 - Compensation and Other, Level 3 - David Avila";

```

## Providing text equivalents for progress bars

Accessible applications must provide a text equivalent for any progress bars that convey important information. An equivalent may not be required for an initial preloader progress bar if loading completes within five seconds, though it is required for all other uses. The Flex 4 `ProgressBar` control does not provide accessibility support automatically. To provide alternative text for these controls, developers should indicate