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Chapter 31 Check Point Questions

Section 31.2

▼ 31.2.1

How do you load a style sheet to a Scene or a Parent? Can you load multiple style sheets?

Use Scene and Parent's `getStylesheets()` method to return an observable list of String and add a style sheet into the list. You can add multiple style sheets to this list.

Hide Answer

▼ 31.2.2

If a style sheet is loaded from a node, can the pane and all its containing nodes access the style sheet?

Yes.

Hide Answer

▼ 31.2.3

Can a node add multiple style classes? Can a node set multiple style ids?

A node can add multiple style classes. A node can add only one style id.

Hide Answer

▼ 31.2.4

If the same property is defined in both a style class and a style id and applied to a node, which one has the precedence?

If the same property is defined in both a style class and a style id, the one defined in the style id takes precedence.

Hide Answer

Section 31.3

▼ 31.3.1

Create a QuadCurve with starting point (100, 75.5), control point (40, 55.5), and end point (56, 80). Set its fill property to white and stroke to green.

`new QuadCurve(100, 75.5, 40, 55.5, 56, 80)`

Hide Answer

▼ 31.3.2

Create CubicCurve object with starting point (100, 75.5), control point 1 (40, 55.5), control point 2 (78.5, 25.5), and end point (56, 80). Set its fill property to white and stroke to green.

`CubicCurve cubicCurve = new CubicCurve(100, 75.5, 40, 55.5, 56, 80);`

```
cubicCurve.setFill(Color.WHITE);  
cubicCurve.setStroke(Color.GREEN);
```

Hide Answer

▼ 31.3.3

Does a path have a default initial position? How do you set a position for a path?

No. Use `new path.getElements().add(new MoveTo(x, y))` to set a new position.

Hide Answer

▼ 31.3.4

How do you close a path?

Use `path.getElements().add(new ClosePath())` to close a path.

Hide Answer

▼ 31.3.5

How do you display a filled path?

Set fill color to display a filled path.

Hide Answer

Section 31.4

▼ 31.4.1

Can you perform a coordinate transformation on any node? Does a coordinate transformation change the contents of a Shape object?

Yes. No.

Hide Answer

▼ 31.4.2

Does the method `setTranslateX(6)` move the node's x-coordinate to 6? Does the method `setTranslateX(6)` move the node's x-coordinate 6 pixel right from its current location?

No. Yes.

Hide Answer

▼ 31.4.3

Does the method `rotate(Math.PI / 2)` rotate a node 90 degrees? Does the method `rotate(90)` rotate a node 90 degrees?

No. Yes.

Hide Answer

▼ 31.4.4

How is the pivot point determined for performing a rotation?

The pivot point is automatically computed based on the bounds of the node.

Hide Answer

▼ 31.4.5

What method do you use to scale a node two times on its x-axis?

`node.setScaleX(2)`

Hide Answer

Section 31.5**▼ 31.5.1**

Are the methods for setting a stroke and its attributes defined in the Node or Shape class?

The methods for setting a stroke and its attributes are defined in the Shape class.

Hide Answer

▼ 31.5.2

How do you set a stroke width to 3 pixels?

Use `shape.setStrokeWidth(3)`.

Hide Answer

▼ 31.5.3

What are the stroke types? What is the default stroke type? How do you set a stroke type?

The stroke types are

- a. `StrokeType.INSIDE`
- b. `StrokeType.CENTER`
- c. `StrokeType.OUTSIDE`

The default stroke type is `StrokeType.CENTER`. To set a stroke type use `shape.setStrokeType(type)`.

Hide Answer

▼ 31.5.4

What are the stroke line join types? What is the default stroke line join type? How do you set a stroke line join type?

The stroke line join types are

- a. `StrokeLineJoin.MITER`
- b. `StrokeLineJoin.BEVEL`
- c. `StrokeLineJoin.ROUND`

The default stroke line join type is `StrokeLineJoin.MITER`. To set a stroke line join type use `shape.setStrokeLineJoinType(lineJoinType)`.

Hide Answer

▼ 31.5.5

What are the stroke cap types? What is the default stroke cap type? How do you set a stroke cap type?

The stroke line cap types are

- a. `StrokeLineCap.BUTT`
- b. `StrokeLineCap.ROUND`
- c. `StrokeLineCap.SQUARE`

The default stroke line cap type is `StrokeLineCap.BUTT`. To set a stroke line cap use `shape.setStrokeLineCap(lineCap)`.

Hide Answer

▼ 31.5.6

How do you specify a dashed pattern for strokes?

To specify a dashed pattern for strokes, use `shape.getStrokeDashArray().addAll(d1, d2, d3, d4);`

Hide Answer

Section 31.6

▼ 31.6.1

How do you create a menu bar, menu, menu item, check menu item, and radio menu item?

To create a menu bar, menu, menu item, check menu item, and radio menu item, use `new MenuBar()`, `new Menu()`, `new MenuItem`, `new CheckMenuItem()`, `new RadioMenuItem()`.

Hide Answer

▼ 31.6.2

How do you place a menu into a menu bar? How do you place a menu item, check menu item, and radio menu item into a menu?

`menuBar.getMenus().add(menu)`. To place a menu item, check menu item, radio menu item into a menu, use `menu.getItems().addAll(items)`.

Hide Answer

▼ 31.6.3

Can you place a menu item into another menu item or a check menu or a radio menu item into a menu item?

Yes.

Hide Answer

▼ 31.6.4

How do you associate an image with a menu, menu item, check menu item, and radio menu item?

Use the method `menuItem.setGraphic(imageView)`.

Hide Answer

▼ 31.6.5

How do you associate an accelerator CTRL+O with a menu item, check menu item, and radio menu item?

```
menuItem.setAccelerator(  
    KeyCombination.keyCombination("Ctrl+O"));
```

Hide Answer

Section 31.7

▼ 31.7.1

How do you create a context menu? How do you add menu items, check menu items, and radio menu items into a context menu?

To create a context menu, use `new ContextMenu()`. To add a menu item into a context menu, use `contextMenu.getItems().add(menuItem)`.

Hide Answer

▼ 31.7.2

How do you show a context menu?

To show a context menu, use `contextMenu(node, x, y)`.

Hide Answer

Section 31.8

▼ 31.8.1

How do you create a horizontal SplitPane? How do you create a vertical SplitPane?

Use `new SplitPane()`.

```
splitPane.setOrientation(Orientation.HORIZONTAL).  
splitPane.setOrientation(Orientation.VERTICAL).
```

Hide Answer

▼ 31.8.2

How do you add items into a SplitPane? Can an item added to a SplitPane to another SplitPane?

`splitPane.getItems().add(item)` or `splitPane.getItems().addAll(items)`.

Hide Answer

Section 31.9

▼ 31.9.1

How do you create a tab pane? How do you create a tab? How do you add a tab to a tab pane?

`new TabPane()`. `new Tab()`. `tabPane.getTabs().addAll(tab1, tab2)`.

Hide Answer

▼ 31.9.2

How do you place the tabs on the left of the tab pane?

`tabPane.setSide(Side.LEFT)`.

Hide Answer

▼ 31.9.3

Can a tab have a text as well as an image? Write the code to set an image for tab1 in Listing 34.13.

Yes. `tab1.setGraphic(new ImageView(image));`

Hide Answer

Section 31.10

▼ 31.10.1

How do you create a table view? How do you create a table column? How do you add a table column to a table view?

`new TableView(). new TableColumn(). To add a table column to a table view, use tableView.getColumns().add(tableColumn).`

Hide Answer

▼ 31.10.2

What is the data type for a TableView's data model? How do you associate a data model with a TableView?

`The data type for a TableView's data model is ObjectProperty<ObservableList<T>>. To associate a data model with a table view, use tableView.setItems(data).`

Hide Answer

▼ 31.10.3

How do you set a cell value factory for a TableColumn?

`To set a cellValueFacotory for a column, use tableColumn.setCellValueFactory(factory).`

Hide Answer

▼ 31.10.4

How do you set an image in a table column header?

`Use tableColumn.setGraphic(node).`

Hide Answer