

JViews Framework Glossary

accelerator	In ILOG JViews, an immediate command triggered by a specific keyboard event. The event is recognized by the manager, which calls a predefined function.
affine transformation	A composite linear remapping of an image's coordinate geometry to correct for perspective distortions.
back buffer	<i>See</i> double buffering, triple buffering.
bounding box	The smallest possible horizontal rectangle surrounding one or more objects.
composite graphic	A complex graphic object made up of several graphic objects, which may be either simple objects (<code>IlvGraphic</code>) or other composite objects (<code>IlvCompositeGraphic</code>).
double buffering	<p>A rendering technique which consists in:</p> <ul style="list-style-type: none">◆ first, drawing to an off-screen image (back buffer),◆ second, when the image is complete, copying the off-screen image to the screen (front buffer). <p>In applets, drawing is almost always done with double buffering to reduce flickering. <i>See also</i> triple buffering.</p>
front buffer	<i>See</i> double buffering, triple buffering.
grapher	A high-level ILOG JViews functionality allowing you to create programs that both include and represent hierarchical information with graphic objects. A grapher is a type of manager, an instance of the <code>IlvGrapher</code> class, a subclass of the <code>IlvManager</code> class.

grapher pin	In ILOG JViews, a fixed connection point for a link on a node in a grapher.
graphic bag	An interface that describes the methods to be implemented by a class that contains several graphic objects. An example of a graphic bag is the class <code>IlvManager</code> , which manages a large number of graphic objects.
graphic object	In ILOG JViews, a defined pictorial entity having functionality which allows it to be drawn, saved, and reshaped. There are many predefined graphic objects, such as rectangles and ellipses, as well as more complex objects, such as shaded labels and zoomable icons.
handle object	In ILOG JViews, an object used to reference another object. Using handle objects, the same object can be displayed more than once without being duplicated.
hit testing	Mapping from a given display point to an object to determine if the point is part of the object space.
image map	Images on the client side with an attached map that points out certain hot spots or clickable areas. They are typically used for displaying tooltips.
interactor	An agent for a user interface element that allows the user to make a choice about, specify some input for, obtain some output from, or see other specific behavior of the element concerned. <i>See also</i> object interactor, view interactor.
JSF	JavaServer Faces.
JSP	JavaServer Pages.
layer	Storage area of manager in which graphic objects are placed. A manager uses multiple layers, referenced by index numbers. Objects in a higher-numbered layer are displayed in front of objects of a lower-numbered layer.
link	The visual representation of connections between nodes. Links are also graphic objects, instances of the <code>IlvLinkImage</code> class or its subclasses.
link connector	In ILOG JViews, the system that allows you to control the connections of links to nodes in a grapher.
listener	In ILOG JViews, an interface allowing you to connect events that occur in the manager view with actions to be performed.
manager	In ILOG JViews, a container for grouping graphic objects and for coordinating their behavior and display in multiple layers and views.
manager view	The AWT component where the graphic objects of a manager are displayed.

To display graphic objects contained in the different layers of a manager, you create at least one view, and often multiple views. The manager lets you connect as many views as you require to display graphic objects.

- node** A visual reference point in a hierarchy of information. A node is a graphic object, as it is an instance of a subclass of the `IlvGraphic` class.
- object interactor** In ILOG JViews, a behavior that can be attached to an object to make it work in a certain way. For example, a button interactor attached to an object makes that object act like a button. *See also* interactor, view interactor.
- pin** *See* grapher pin.
- quadtree** A structure composed of four quadrants which recursively subdivide themselves by four, allowing you to achieve manageable datasets. This permits quick access to information, as the quadtree can confine its search to quadrants covering a particular area of interest.
- rich client** Also called **fat client** or **thick client**. A rich client is a way of deploying a client/server application such that the client performs most of the processing itself rather than depending on the server facilities. All users have to install and maintain their own copy of the program but may be able to do useful work when disconnected from the server. User response can be quicker and more intelligent due to application state existing locally (“model” as well as “view”). *See also* thin client.
- selection object** A graphic object created by ILOG JViews to display a selected object within a manager. These objects are stored in the manager. Unlike regular graphic objects, they are internally managed and cannot be manipulated.
- thin client** Also called **light client** or **clientless**. A thin client is a way of deploying a client/server application such that the client side is small, with no Java running on the client. Users require only a Web browser and an Internet connection. The user interface is executed within the browser with no local system administration and the business logic is executed on a remote server. *See also* rich client
- transformer** A 2D affine transformation that performs a linear mapping from 2D coordinates to other 2D coordinates. A transformer can be a scale, a translation, or a rotation.
- triple buffering** A rendering technique that uses three frame buffers instead of two as in *double buffering*. With two buffers, front and back, the front buffer is being displayed while the back buffer is being drawn. When the back buffer is ready, it has to wait until the current scan of the screen is finished before the buffers

can be swapped. With three buffers, there is no waiting time. Triple buffering results in smoother animation, especially if the screen has a slow refresh rate.

vector graphic

A digital image made up of geometric graphic elements such as points, arcs, and lines that are defined by mathematical formulas. This mathematical formulation allows for the size of the graphic to be changed without a loss in its image quality.

view

See manager view.

view interactor

A behavior that can be applied to a view as a whole, affecting all the objects in the view. *See also* interactor, object interactor.