WindowsGestureSupport

The package WindowGestureSupport adds support for Gestures to VisualWorks under Windows 7 and newer. It provides access to gestures like pan, zoom and rotate. It is based on the WM_GESTURE API from Windows 7 and is compatible with Windows 7, 8 and 8.1.

Microsoft provides 3 different kinds of gesture APIs: WM_TOUCH, WM_GESTURE and WM_POINTER. WM_TOUCH is a very low-level API that is rather difficult to use. The WM_POINTER API is rather easy to use and provides very fine grained gesture detection. With the WM_POINTER API it is possible to detect different gestures for multiple objects in the same Window. The WM_GESTURE API can be seen between both APIs as a very easy to use access to basic gestures. It provides built in support for pan, zoom and rotate gestures. Unlike the WM_POINTER API however it only allows for detecting a single gesture at once.

For most Desktop applications it is sufficient to have basic gesture support in order to allow gestures like panning through lists. For that the WM_GESTURE API is sufficient and thus it was chosen as the API that's supported by WindowsGestureSupport.

The WindowGestureSupport comes in two parts, a DLL that enables the VisualWorks Image to receive the Events and a package that makes sure that the Events are properly used by VisualWorks. Adding gesture support to existing VisualWorks applications is then as easy as handling the gesture events in a Controller subclass. The WindowsGestureSupport package comes with two gestures already supported throughout the system: panning in lists will scroll according to the gestures and dragging windows around using a pan-gesture is also supported.