

XWaveRefFromTrace

XWaveRefFromTrace(*graphNameStr*, *traceNameStr*)

The XWaveRefFromTrace function returns a wave reference to the wave supplying the X coordinates against which the named trace is displayed in the named graph window or subwindow.

Parameters

graphNameStr can be "" to refer to the top graph window.

When identifying a subwindow with *graphNameStr*, see **Subwindow Syntax** on page III-92 for details on forming the window hierarchy.

Details

XWaveRefFromTrace returns a null reference (see **WaveExists**) if the wave is not plotted versus an X wave.

graphNameStr and *traceNameStr* are strings, not names.

Examples

```
Display ywave vs xwave // XY graph
Print XWaveRefFromTrace("", "ywave")[50] // prints value of xwave at point 50
```

See Also

For other commands related to waves and traces: **WaveRefIndexed**, **TraceNameToWaveRef**, **TraceNameList**, **CsrWaveRef**, and **CsrXWaveRef**.

For a description of traces: **ModifyGraph**.

For a discussion of contour traces see **Contour Traces** on page II-370.

For commands referencing other waves in a graph: **ImageNameList**, **ImageNameToWaveRef**, **ContourNameList**, and **ContourNameToWaveRef**.

For a discussion of wave references, see **Wave Reference Functions** on page IV-197.

See Also

Trace Names on page II-282, **Programming With Trace Names** on page IV-87.

y

y

The y function returns the Y value for the current column of the destination wave when used in a multidimensional wave assignment statement. Y is the scaled column index whereas **q** is the column index itself.

Details

Unlike **x**, outside of a wave assignment statement, y does not act like a normal variable.

See Also

x, **z**, and **t** functions for other dimensions.

p, **q**, **r**, and **s** functions for the scaled indices.

z

z

The z function returns the Z value for the current layer of the destination wave when used in a multidimensional wave assignment statement. z is the scaled layer index whereas **r** is the layer index itself.

Details

Unlike **x**, outside of a wave assignment statement, z does not act like a normal variable.

See Also

x, **y**, and **t** functions for other dimensions.

p, **q**, **r**, and **s** functions for the scaled indices.