Perspective and Outcodes

Thomas J. Peters

Department of Computer Science and Engineering
University of Connecticut
Storrs, CT 06269-3155
tpeters@cse.uconn.edu
860-486-5045

Upside Up

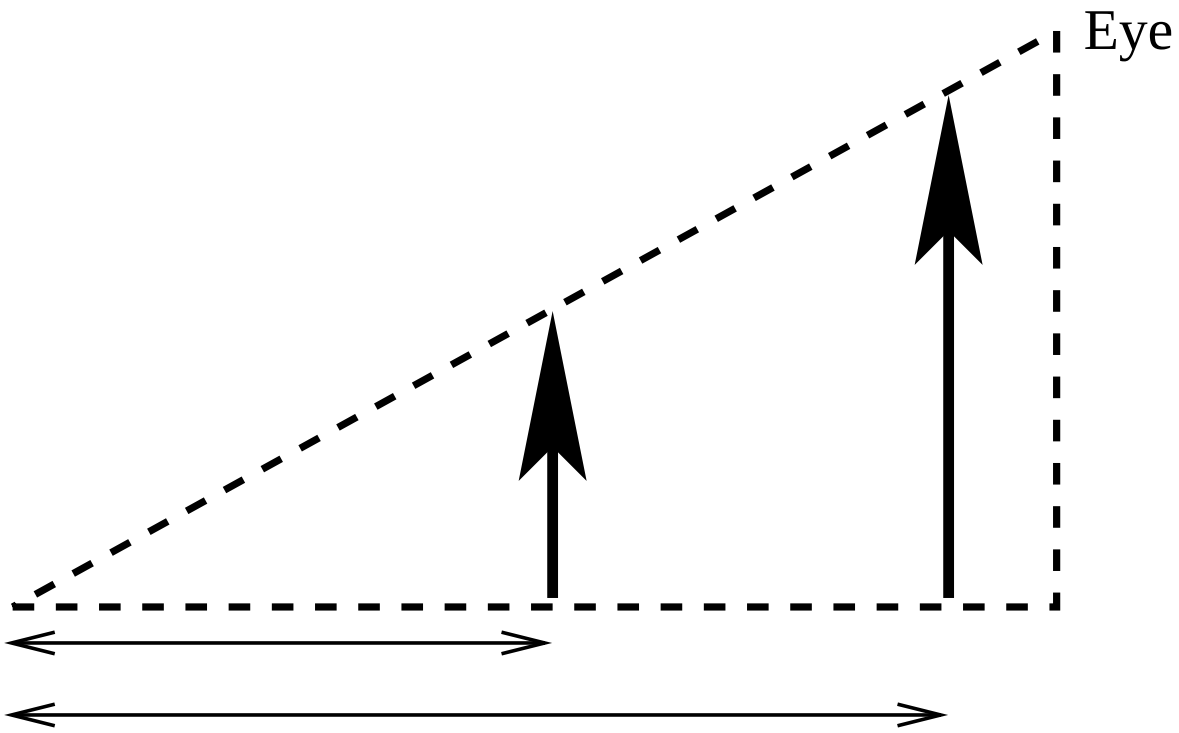

Figure 1: Upside Up

Upside Down

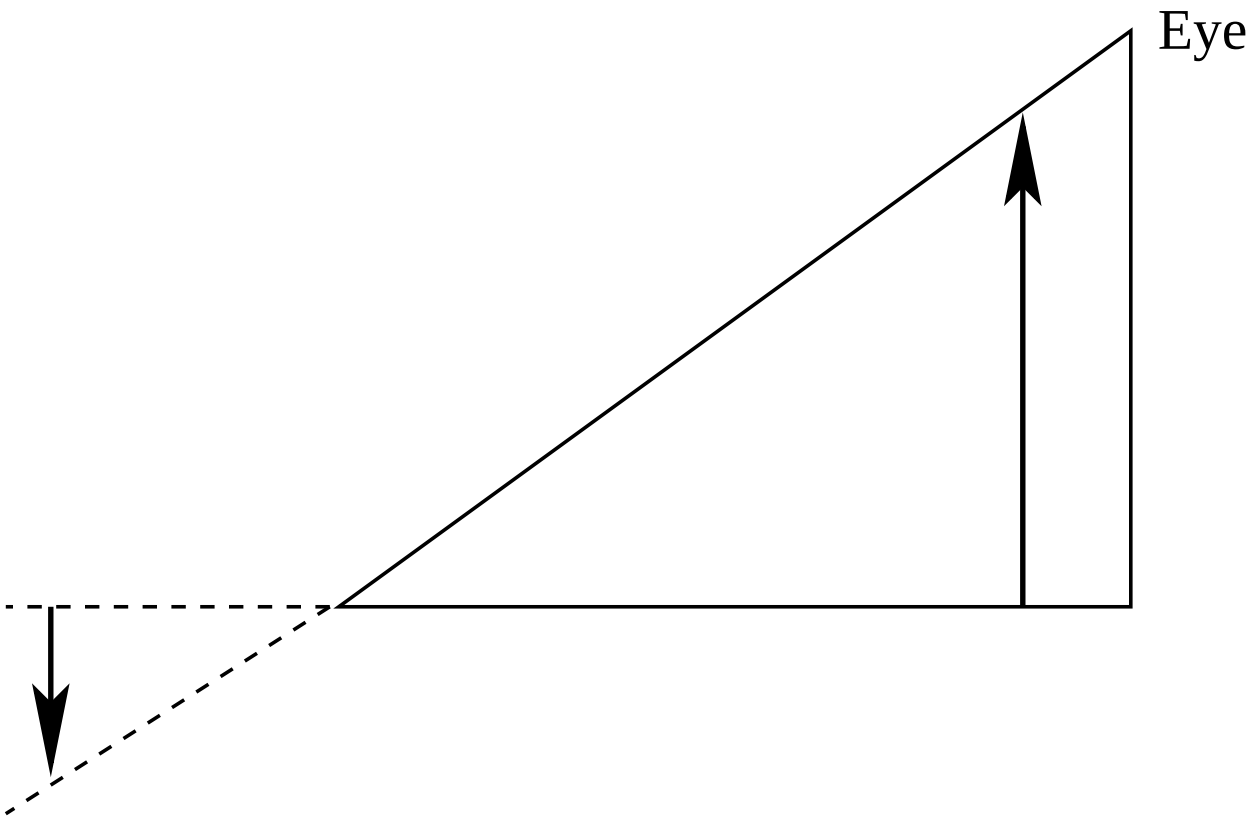

Figure 2: Upside Down

2D OutCode

An outcode in $\Re^2$ is a 4 digit binary number for each vertex of a line segment.

RightTopLeftBottom, where a '1' in the second entry for Top indicates that this specific endpoint is above a rectangular region.

Similar remarks for other entries.

outcode(P0) = outcode(P1) = 0000, then the segment lies entirely inside and should be drawn in full.

Second entries both 1, then the line segment is entirely above the rectangle and should not be drawn at all.

More difficult cases ....