

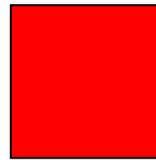
Understanding 2D Viewing

Start with the source code from the lecture. Modify it to do the following: open a 600 x 600 window, cleared to WHITE, with a RED rectangle/quad that fills the entire window (you'll need a viewport that covers the full window). The **world coordinates** of the window (viewport) corners should be as follows:

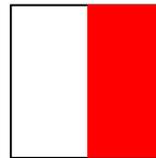
```
left edge    = -100.0, right edge = +100.0  
bottom edge  = -100.0, top edge   = +100.0
```

Once your program successfully does the above, make the necessary changes so your program also does the following:

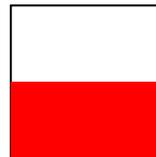
1. When the 'f' key is pressed, the full-window viewport is used.



2. When the 'r' key is pressed, the viewport takes up only the *right* half of the window.



3. When the 'b' key is pressed, the viewport takes up only the *bottom* half of the window.



4. When the 'm' key is pressed, the viewport takes up only the *middle* of the window both vertically and horizontally.

