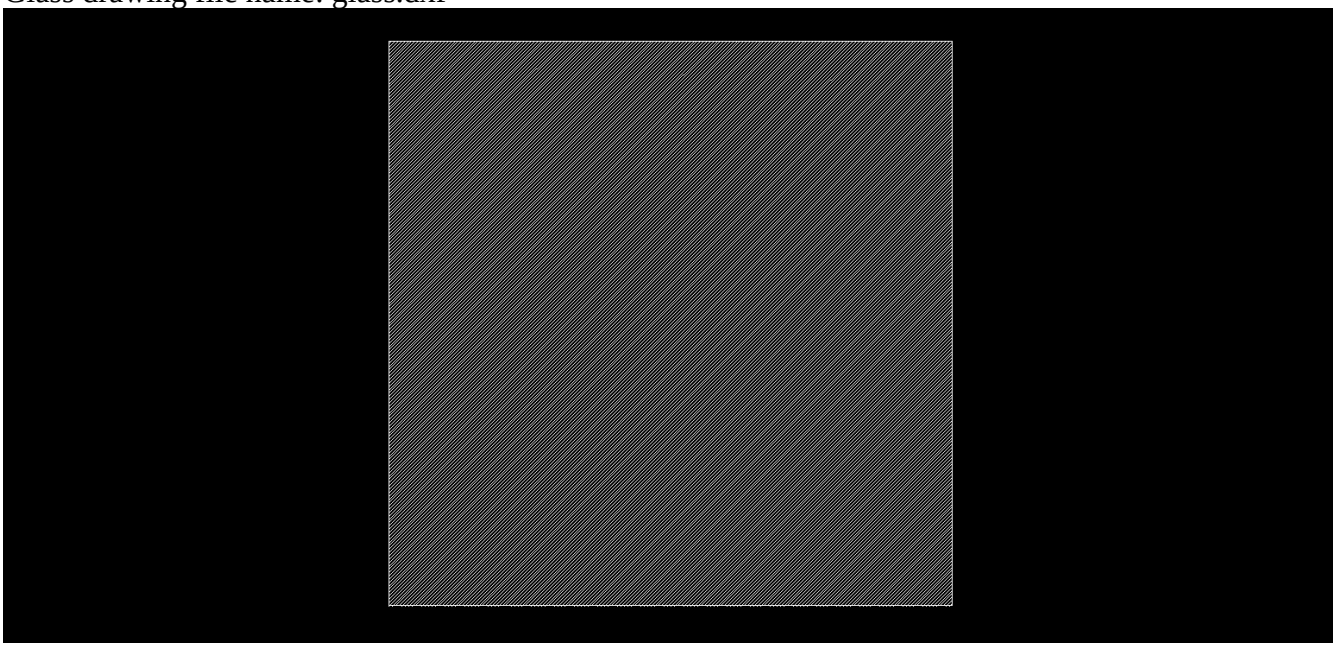
Layout Documentation

Use.

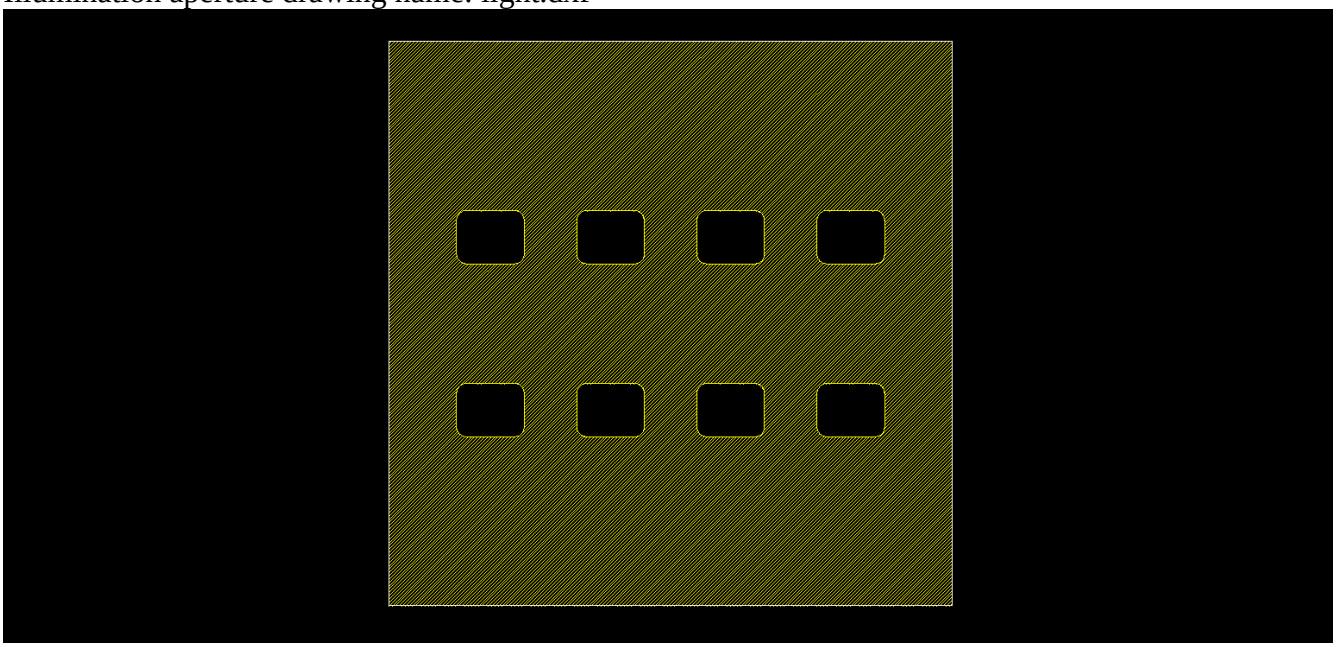
Notes.
Drawing units are millimeters.

Glass drawing file name: glass.dxf



Nominal dimensions: 30.00 mm square
Final shape tolerance: 0.2mm or better on the "shadow" (2D projection) of the glass piece

Illumination aperture drawing name: light.dxf

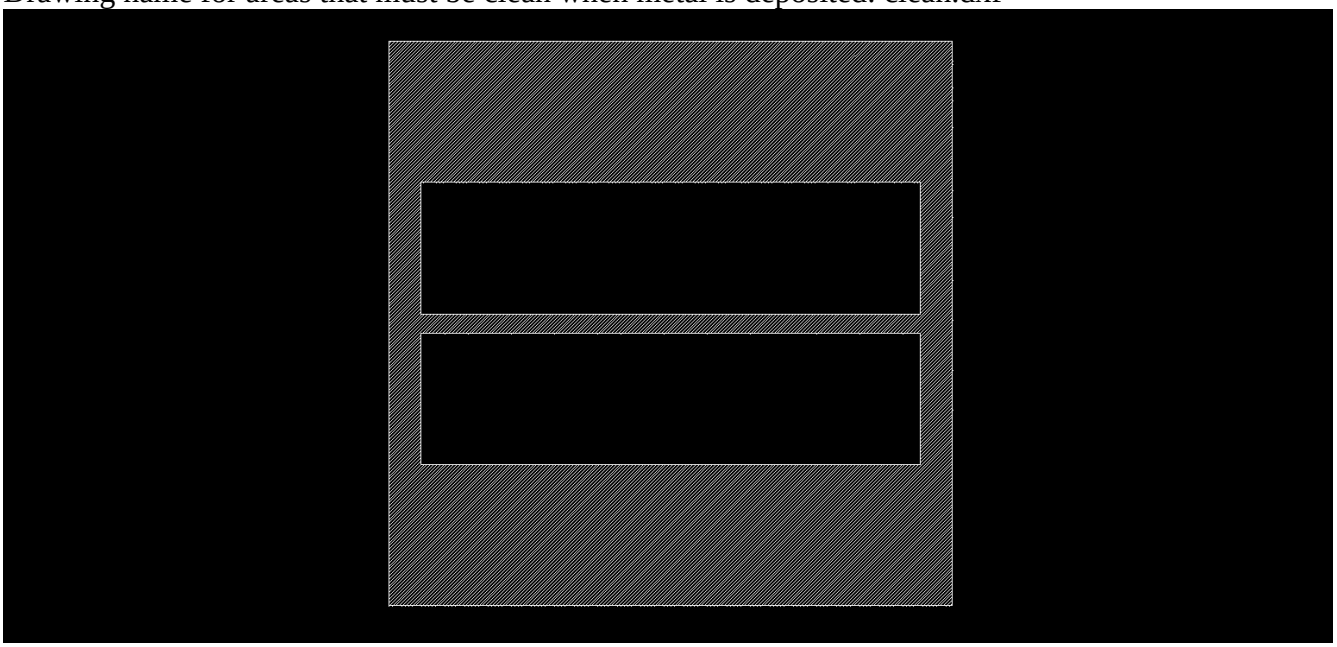


light mask holes, nominally:
a: area = 10 mm^2
r: radius = -sqrt(h*w-a)/sqrt(4-π) ~= 0.530959
h: height = 2.845 mm
w: width = 3.6 mm
governing equation: (a-r*r*(π-4))/h = w

nominal geometric dark area
dark area = 15.666 mm^2
found by inspection of the drawing

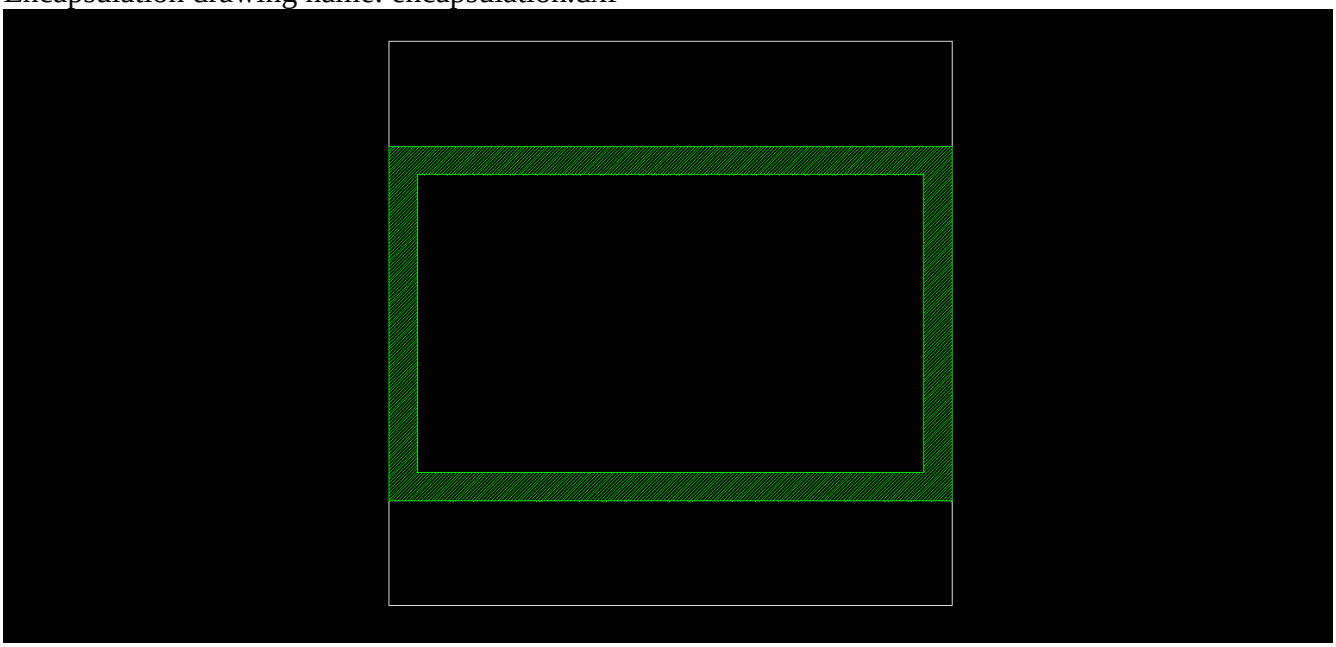
Active area mask drawing name: active.dxf

Drawing name for areas that must be clean when metal is deposited: clean.dxf



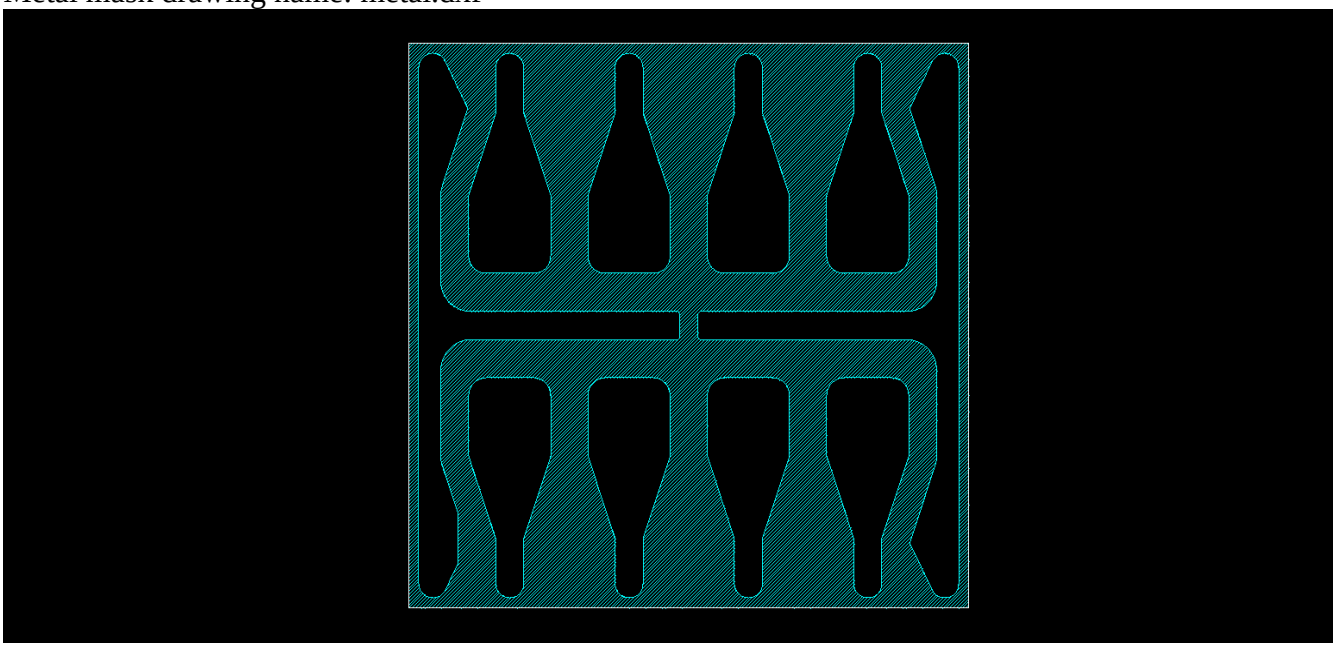
Everything except the two central black rectangles shown here must be clean when metal deposition takes place so that metal is deposited directly onto glass or TCO with no abrorber/ETL/HTL or other device layers in between.

Encapsulation drawing name: encapsulation.dxf



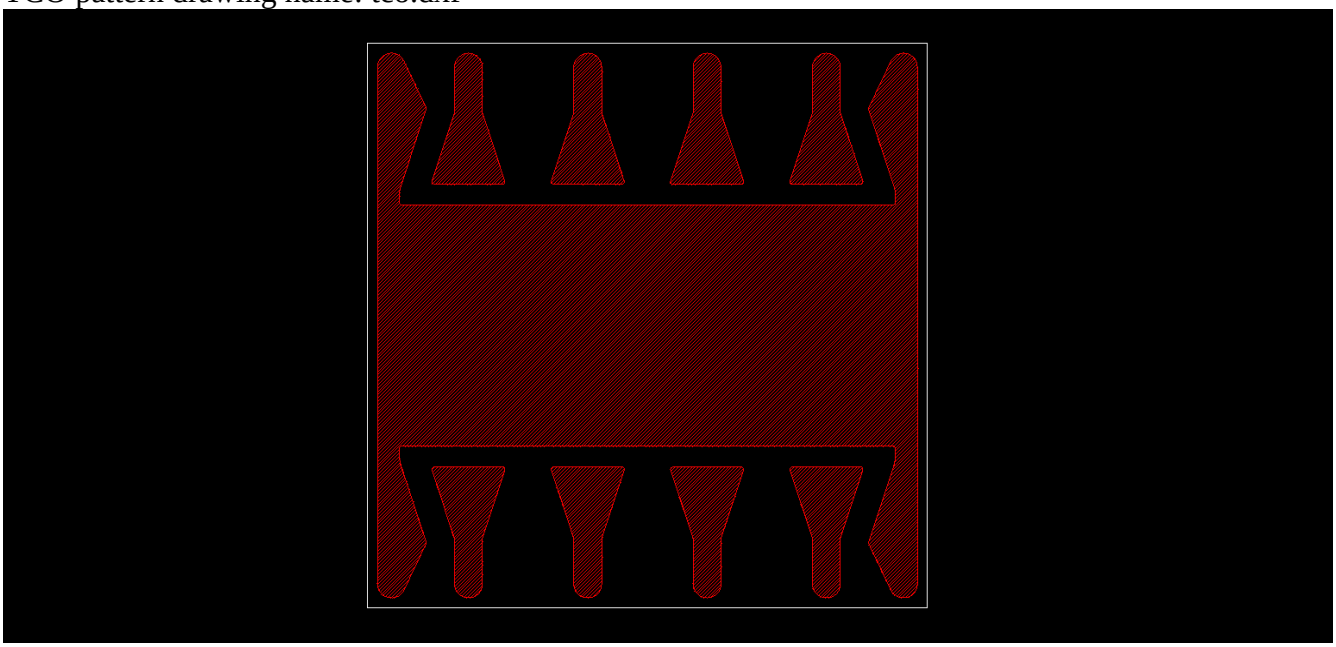
The outer dimensions of the encapsulation glass should be 30mm by 18.84mm. The inner pocket should be 27mm by 15.84mm so that the nominal width of glued region is 1.5mm wide.

Metal mask drawing name: metal.dxf



Pixel #1 indicated by a flat region in the lower left corner.

TCO pattern drawing name: tco.dxf



TCO should remain in the red hatched areas, bare glass in the black areas.