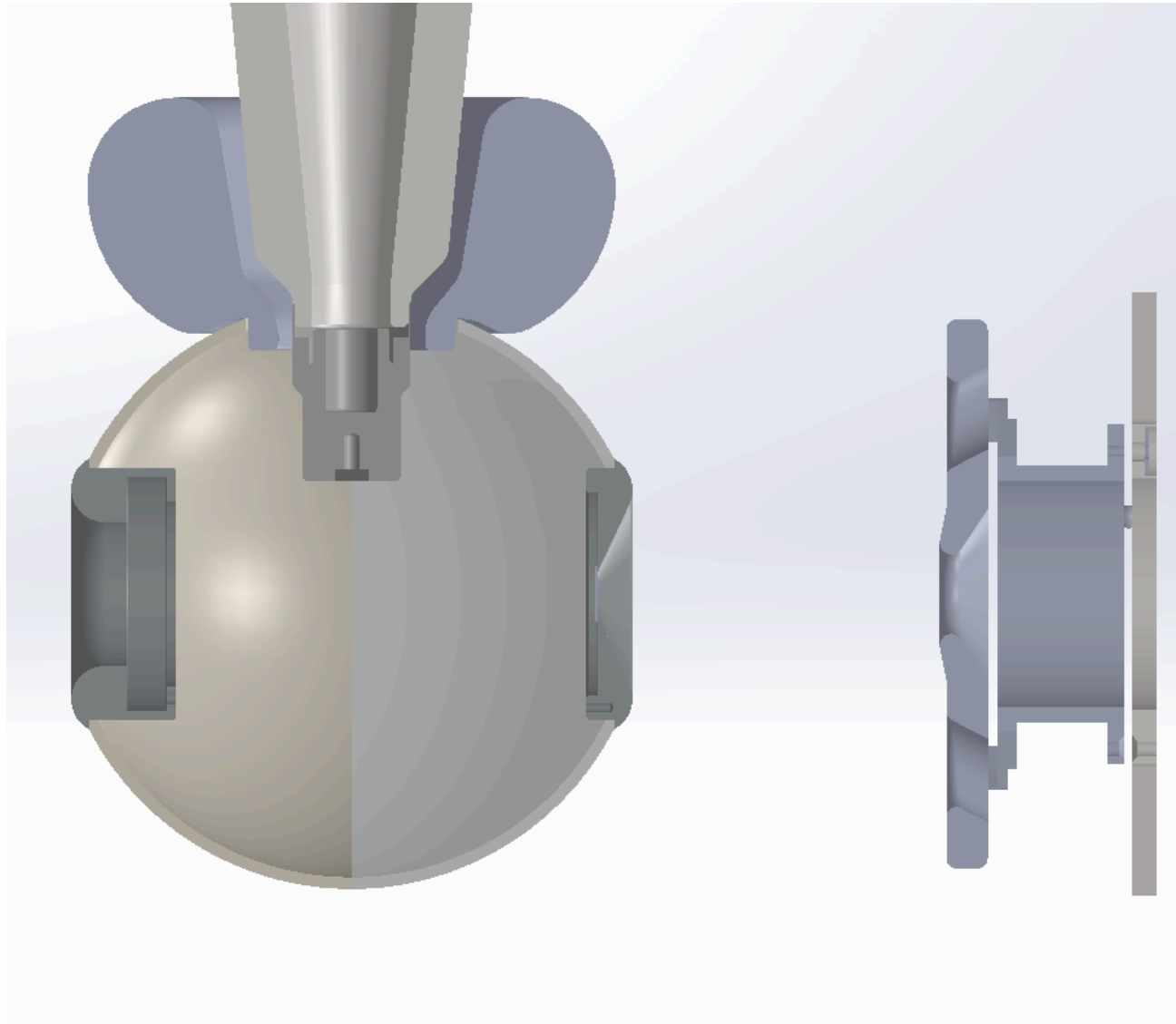# Summary of John and Yan's work on the optimized shed for the R30 inverted insulators
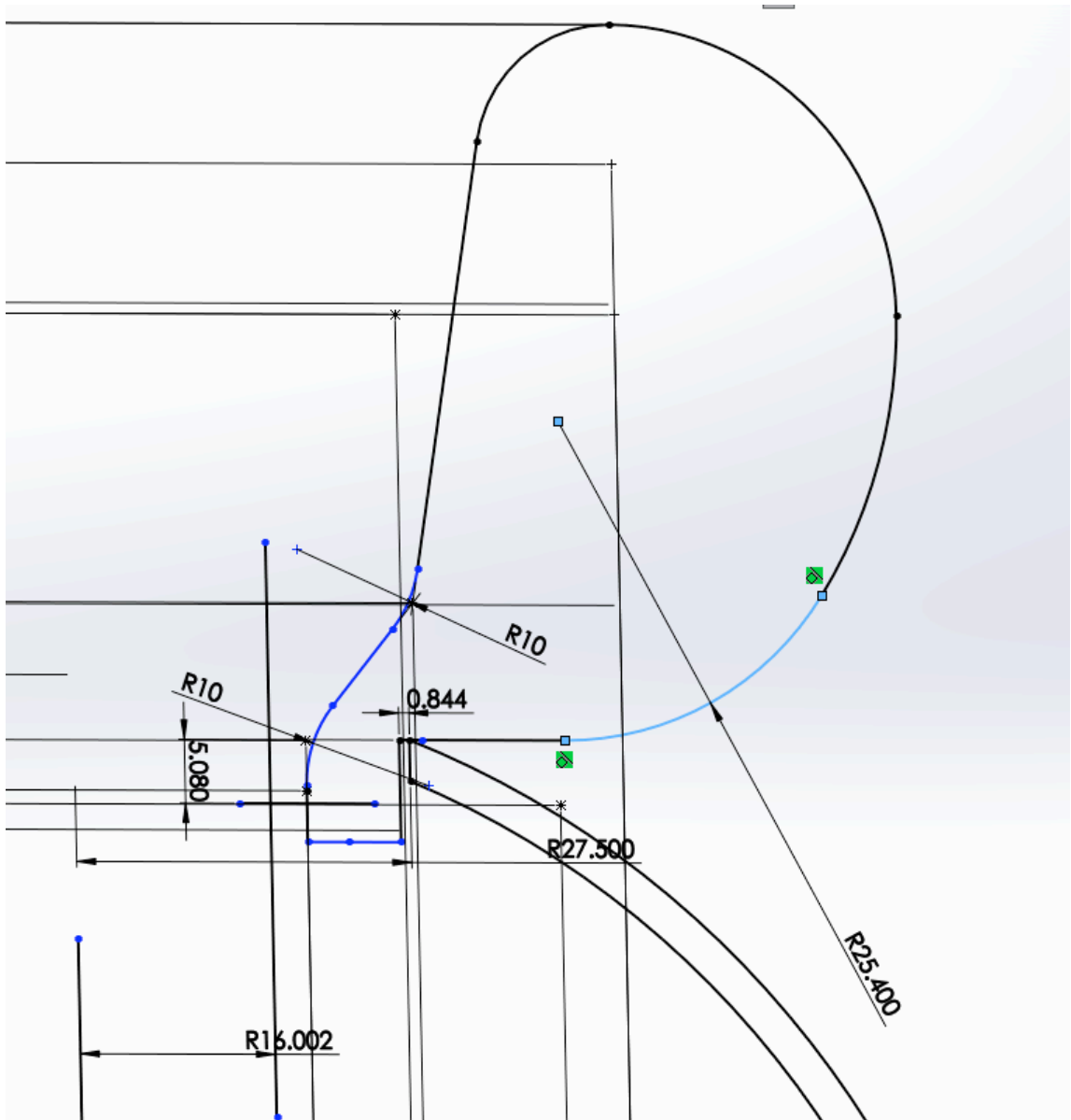## January 26 2016

John's design of Yan's optimized shed for R30 inverted insulator
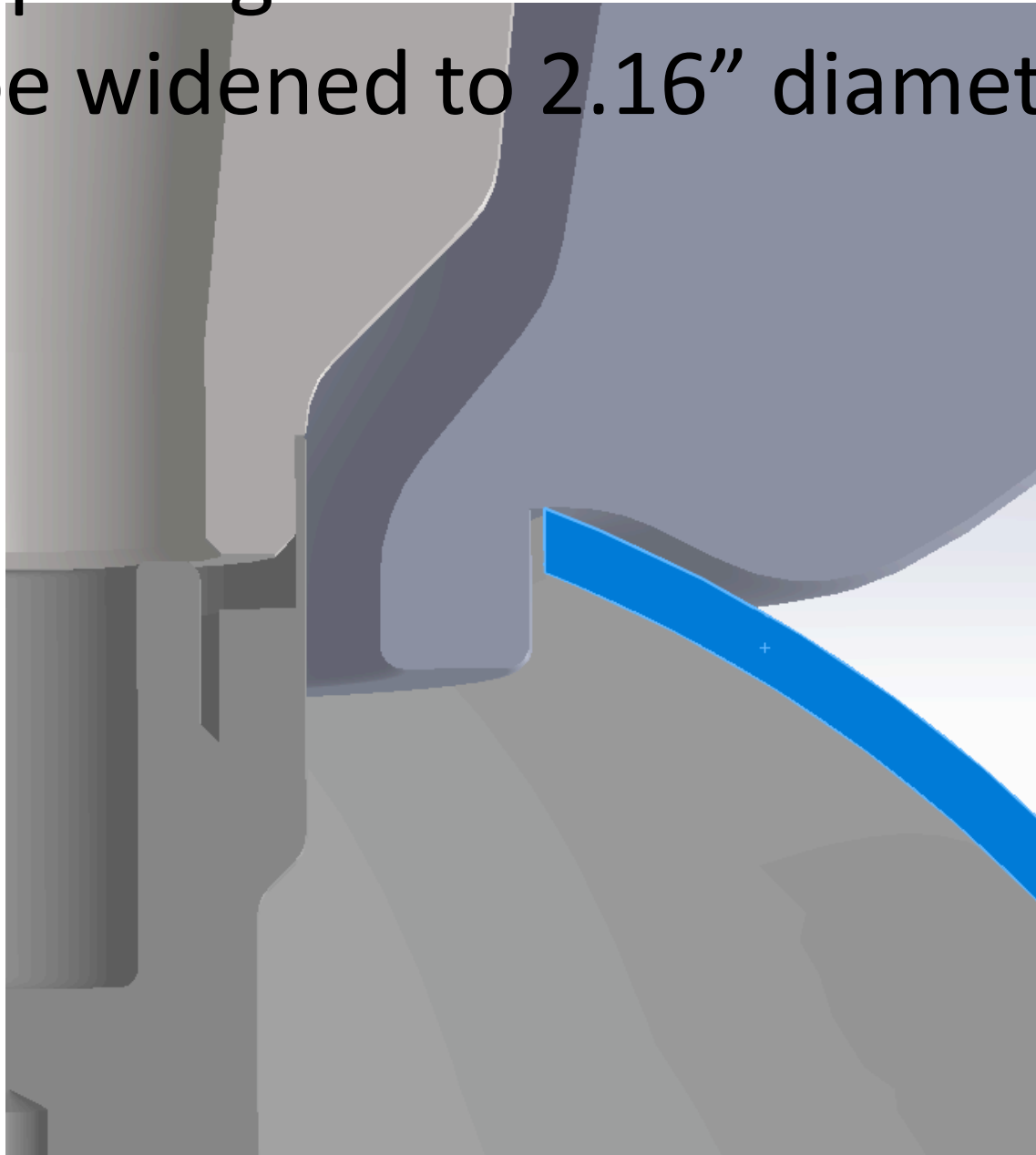
John: In your original document you would draw a circle of 1" radius at position X=4.02cm and Y= 9.642cm. This is the fillet that tapers your "C" curve inward to the mount. You can see that at 180 degree position it transitions to a flat that extends to the ball hole. It is also worth noting that the ball hole has been enlarged to a 2.75 cm opening, so the top of the hole is along this flat.I need you (Yan) to confirm that this does not change your fields.

R10

R10

0.844

5.080

R27.500

R16.002

R25.400

The opening of the ball cathode has to be widened to 2.16" diameter

Three holes at 120 deg to hold it

Hog out option to reduce weight, Yan's preliminary simulations show no major changes in field, but Yan will make graphs of potential along ceramic