

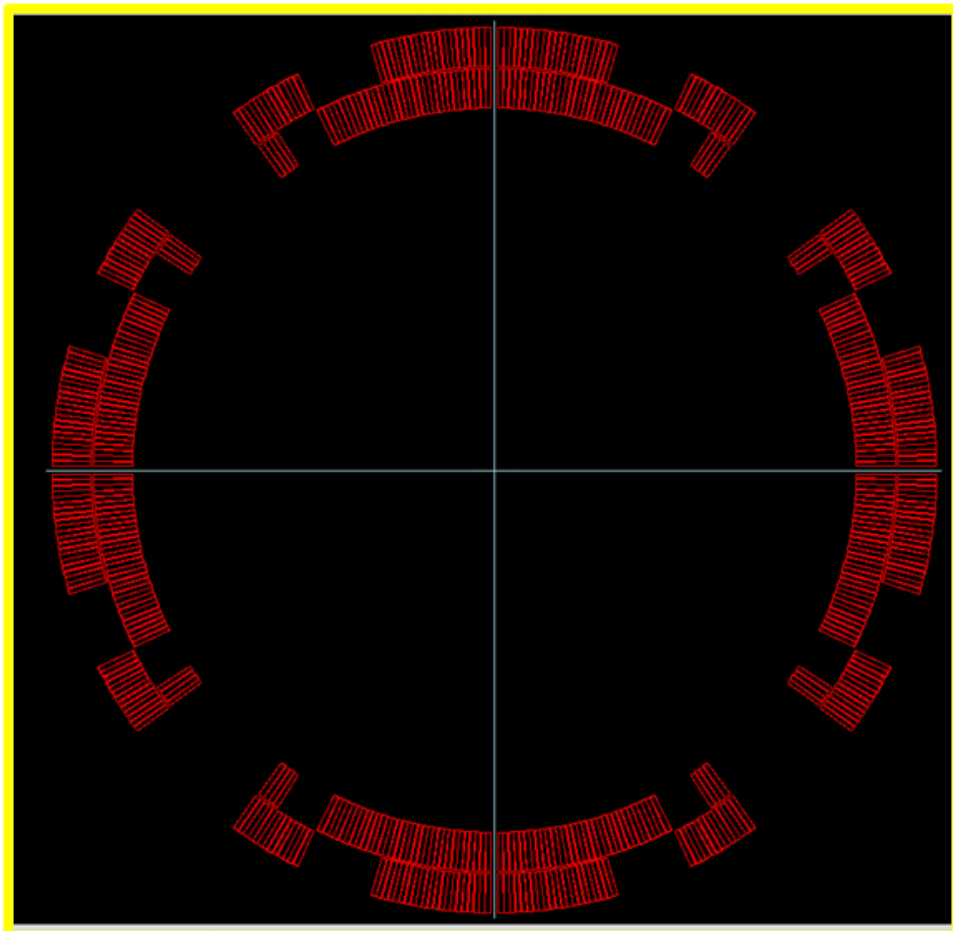


# Q2pF Coil with Lead and Return Ends

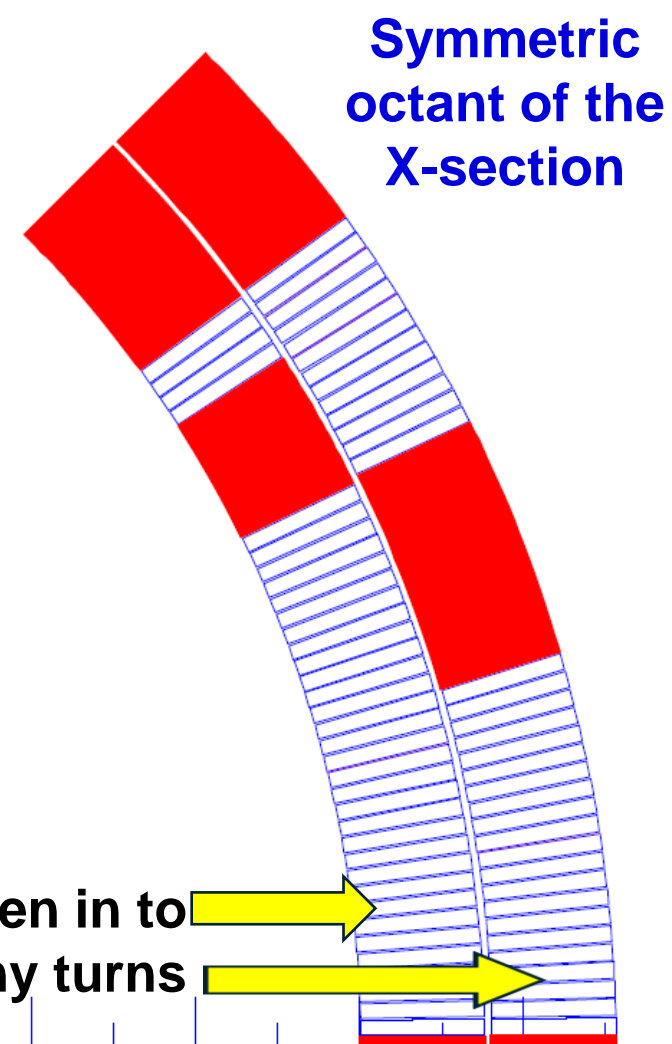
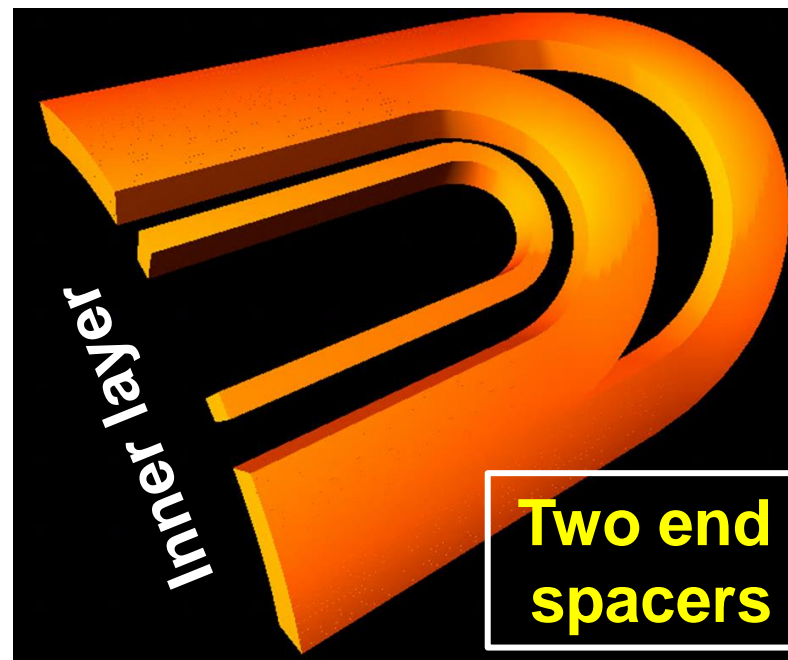
Ramesh Gupta  
February 27, 2024



# Return End Coil Design



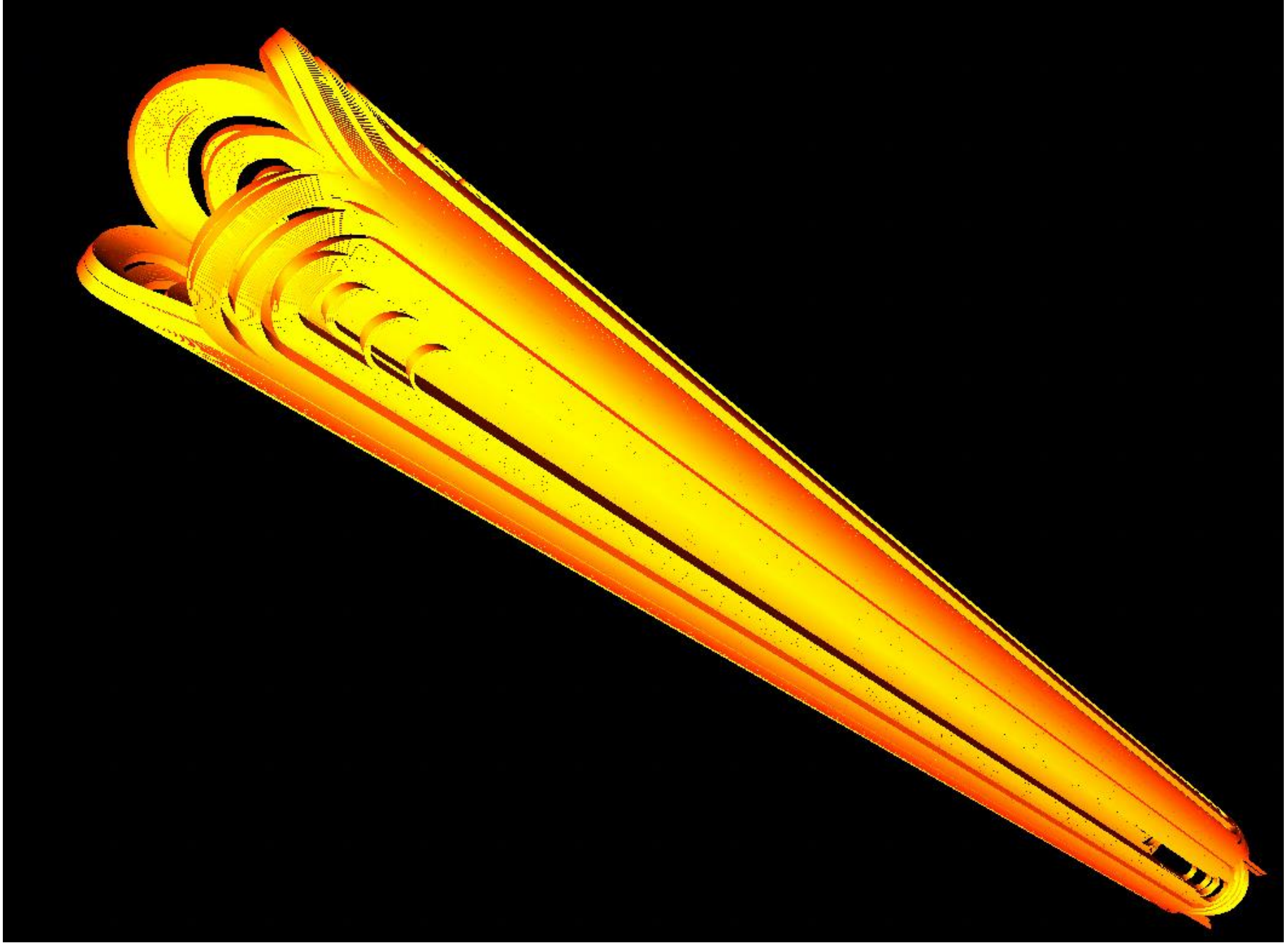
Cutout at the Vertical Plane at the Return End (symmetric)



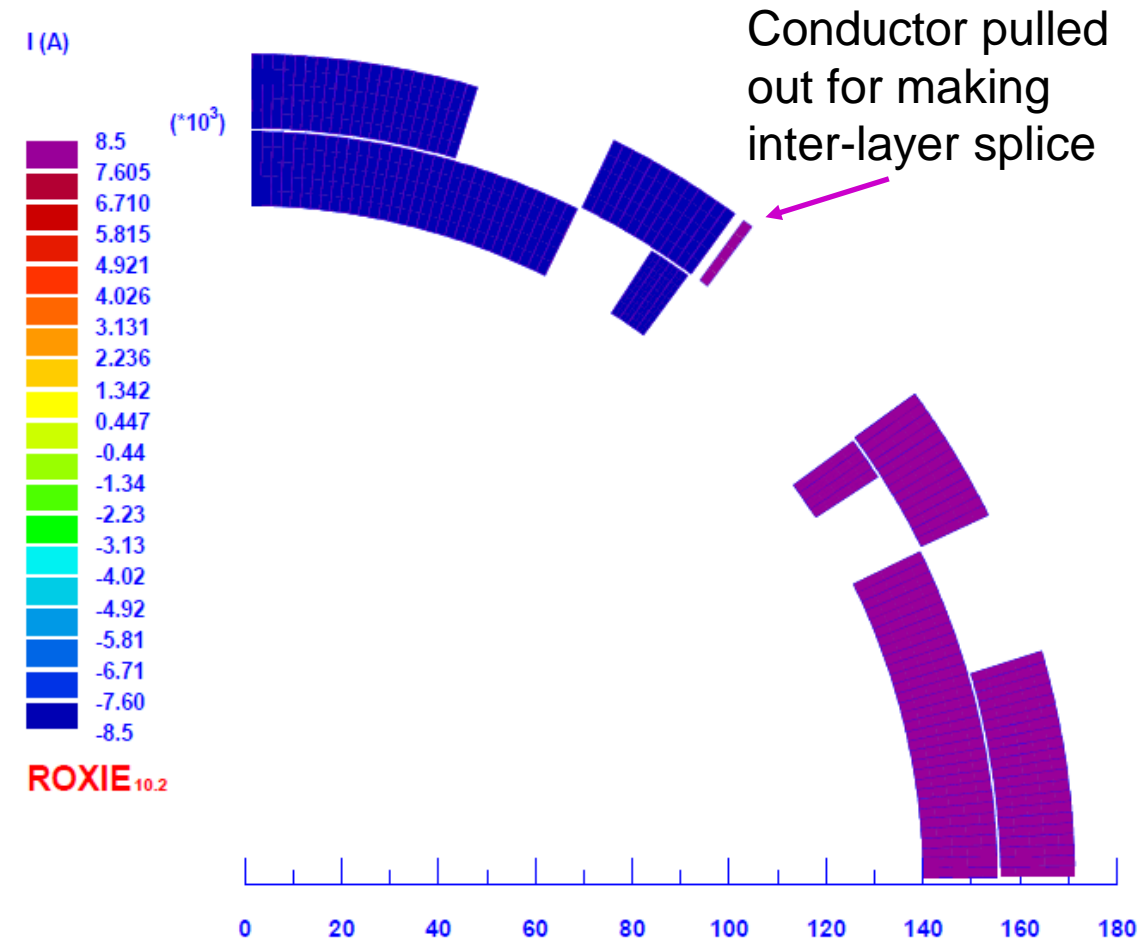
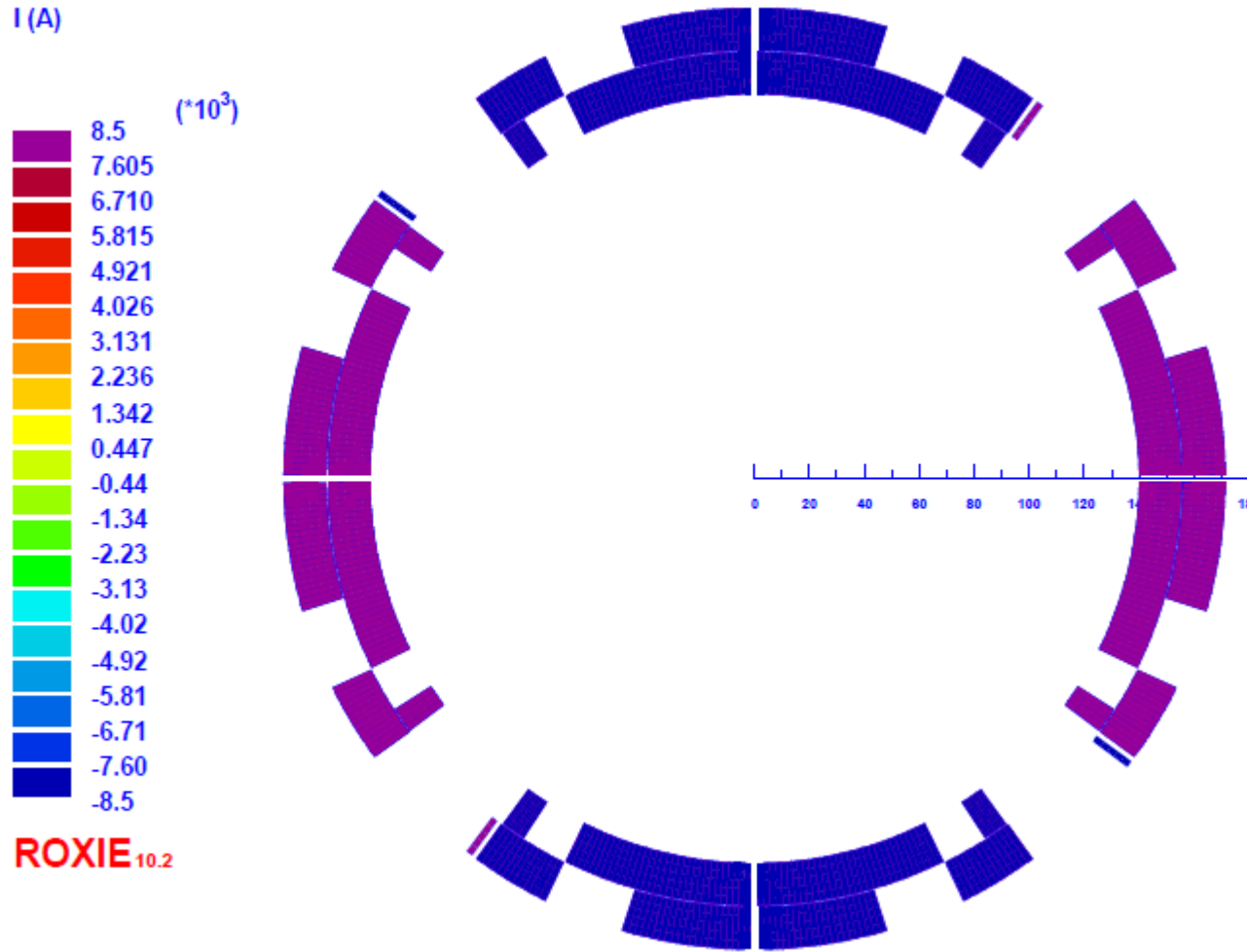
Big blocks in body broken in to two because of too many turns

0 20 40 60 80 100 120 140 160



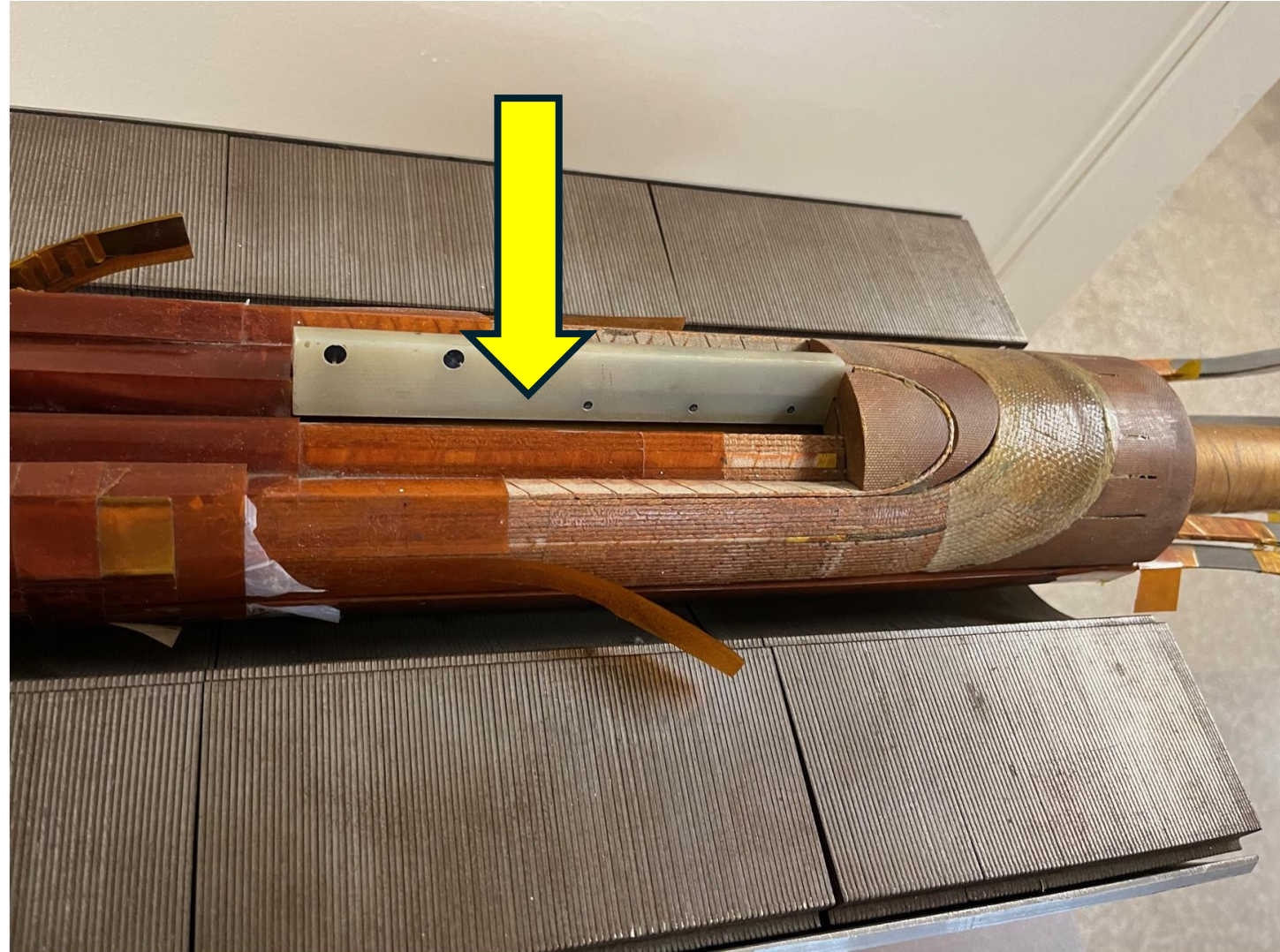


# Inner and Outer Layers with inter-layer splice



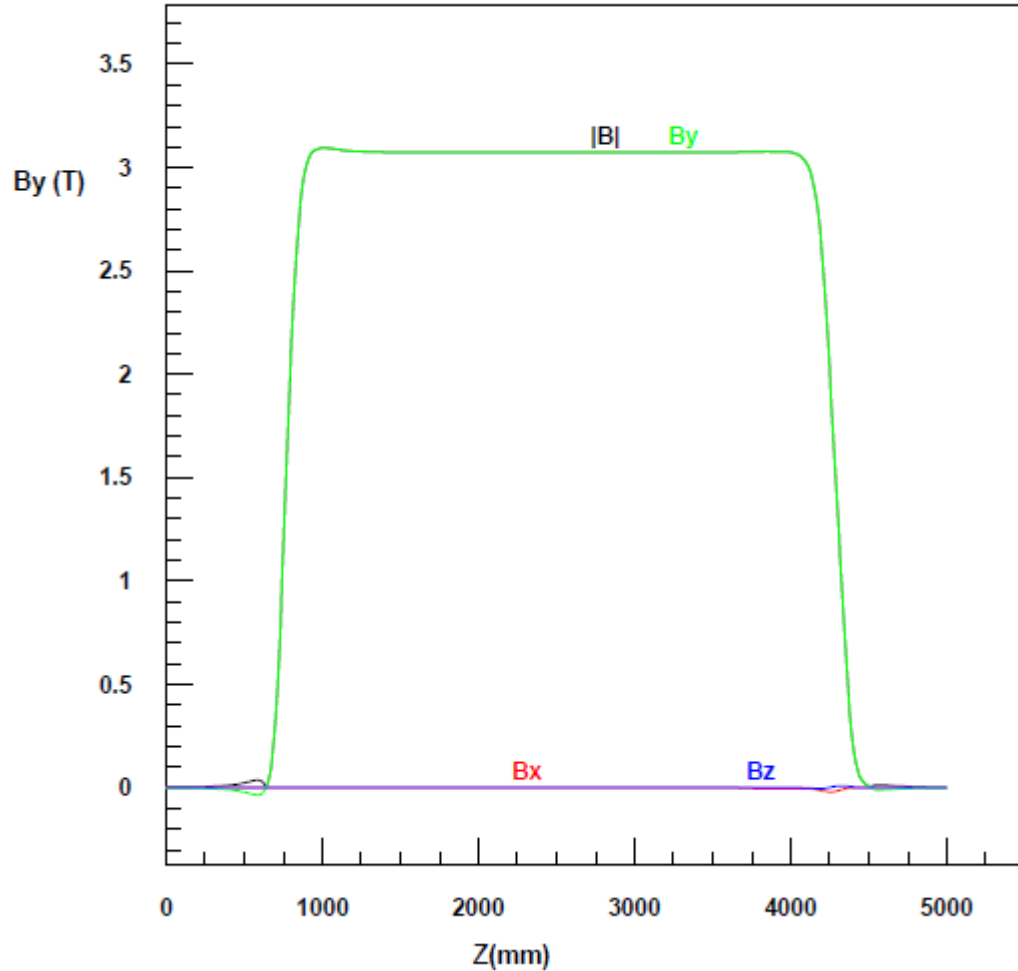
Checking color is a good way to check that current is in the right direction

# Inter-layer Splice in Previous 2-layer Coils

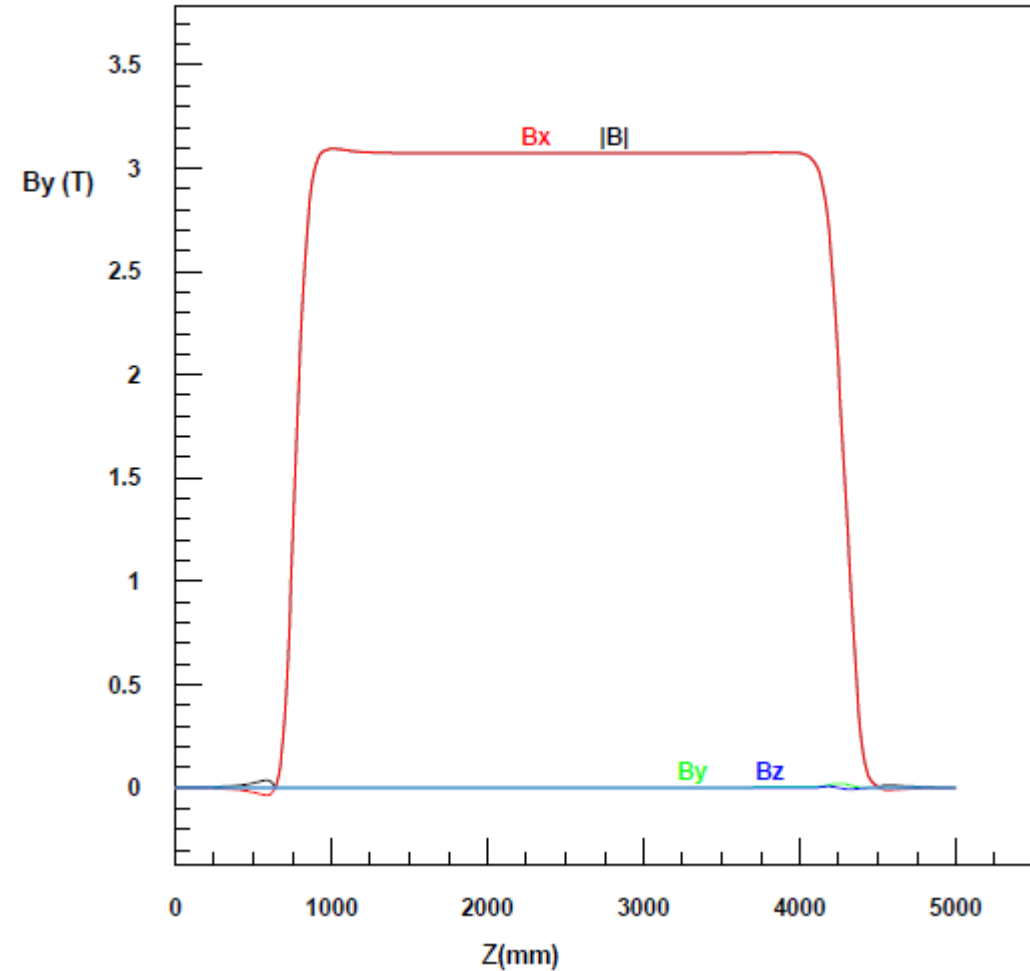


# Field @R=100mm on horizontal and vertical plane

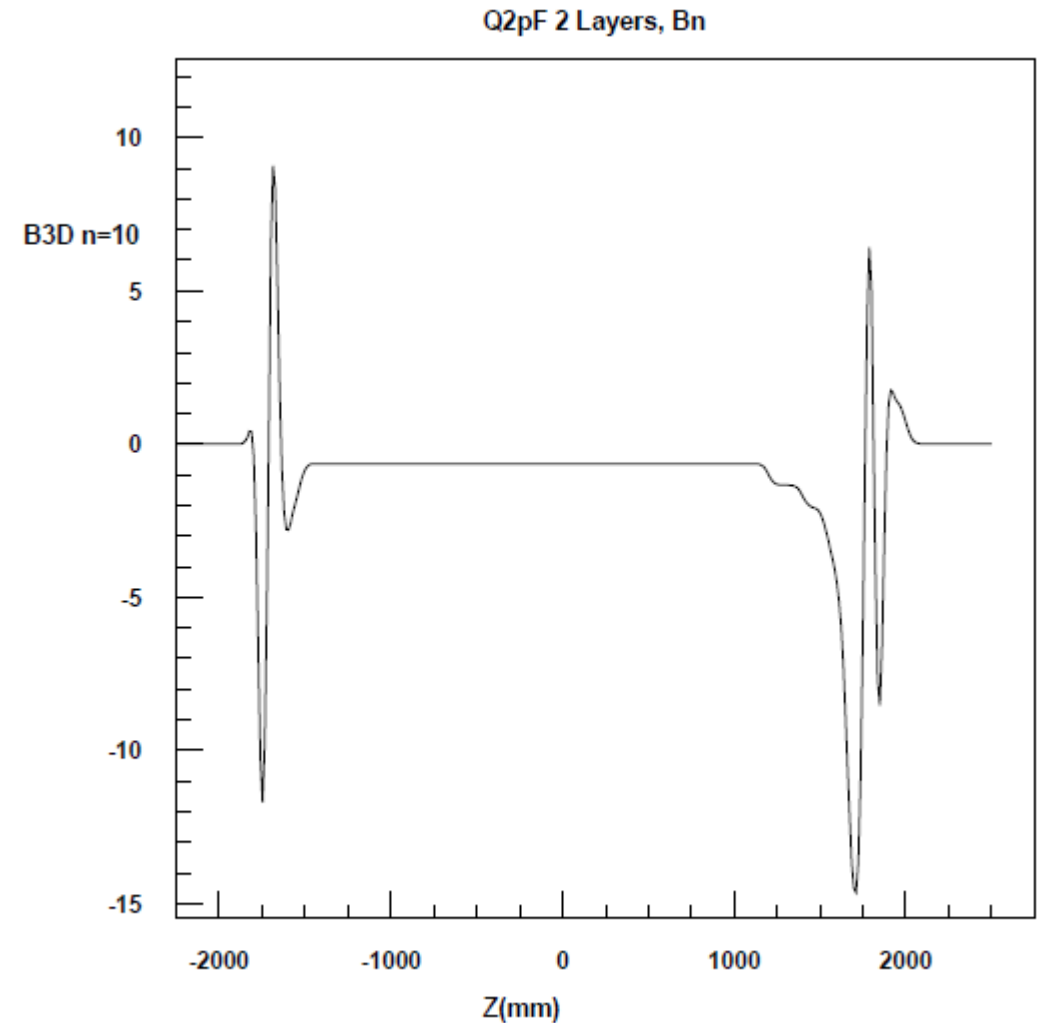
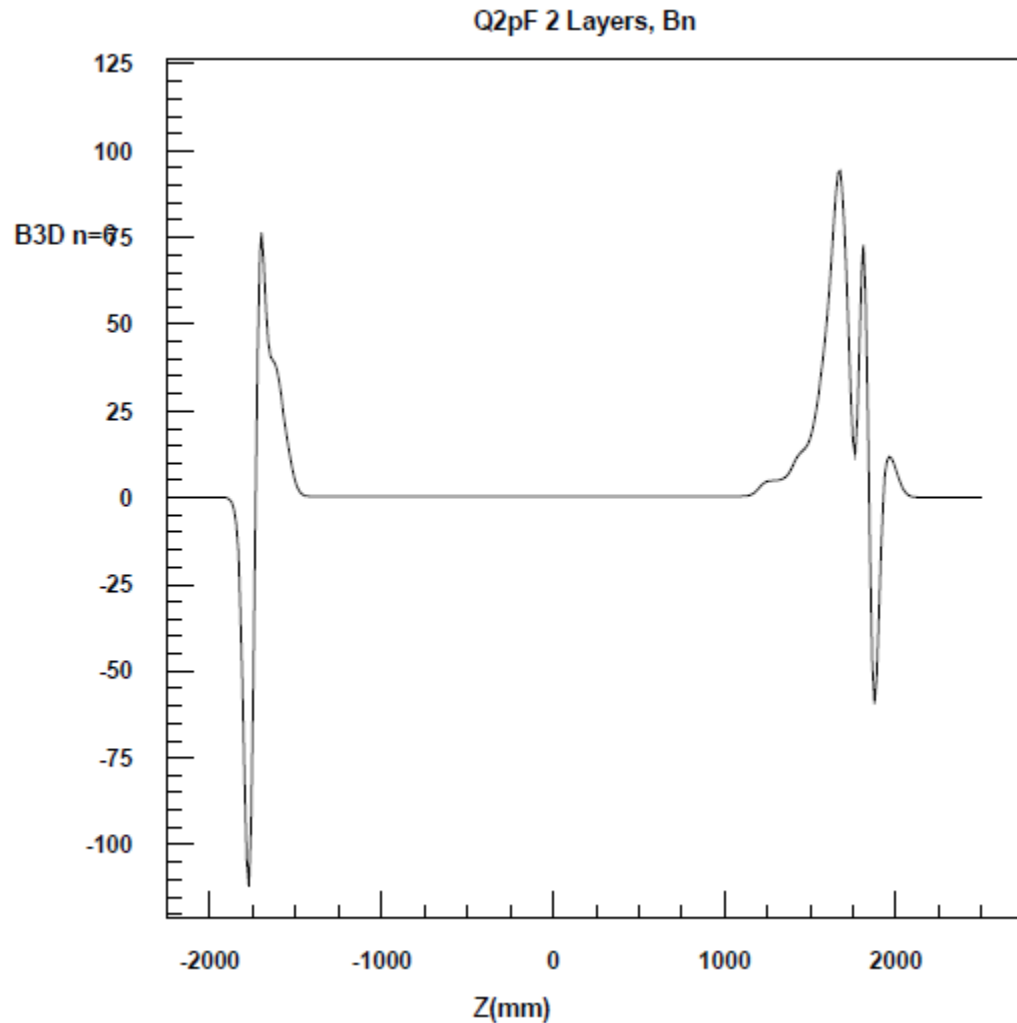
Q2pF 2 Layers, x=100, y=0



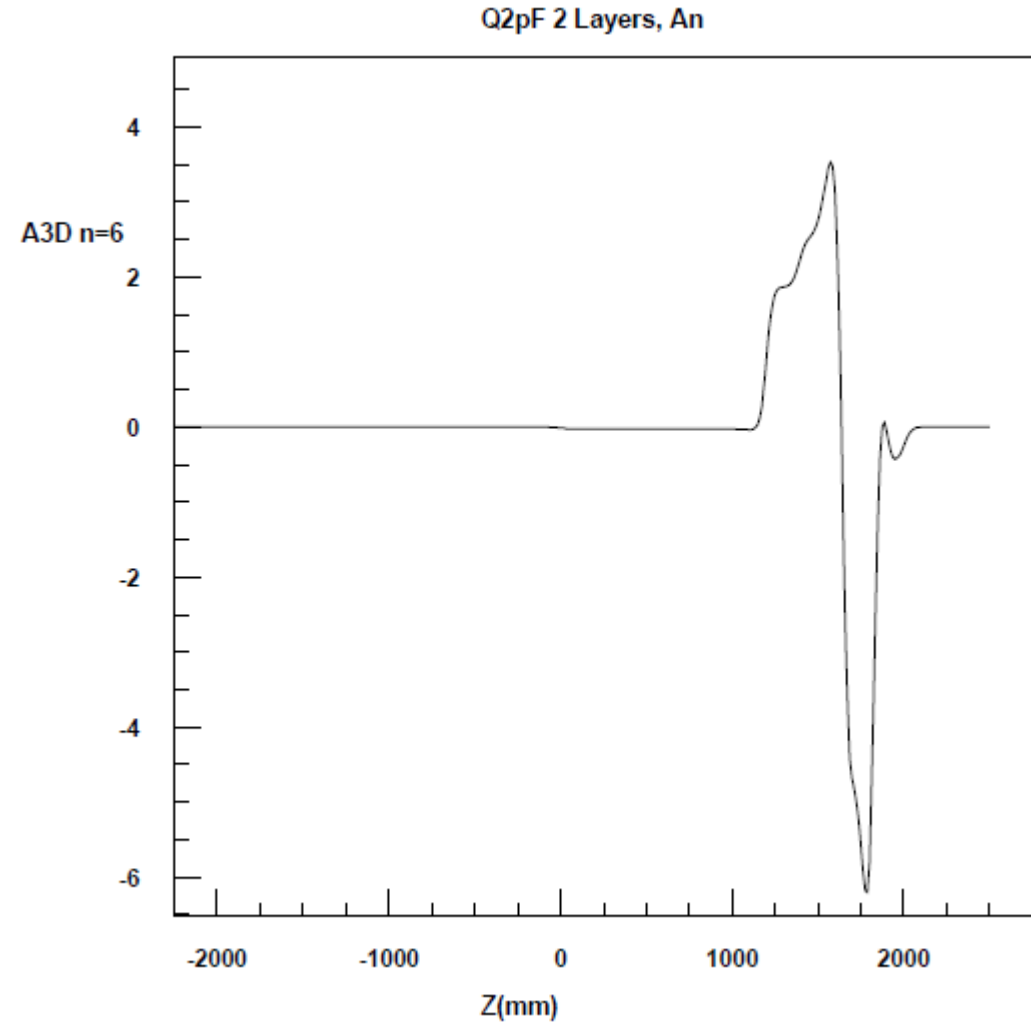
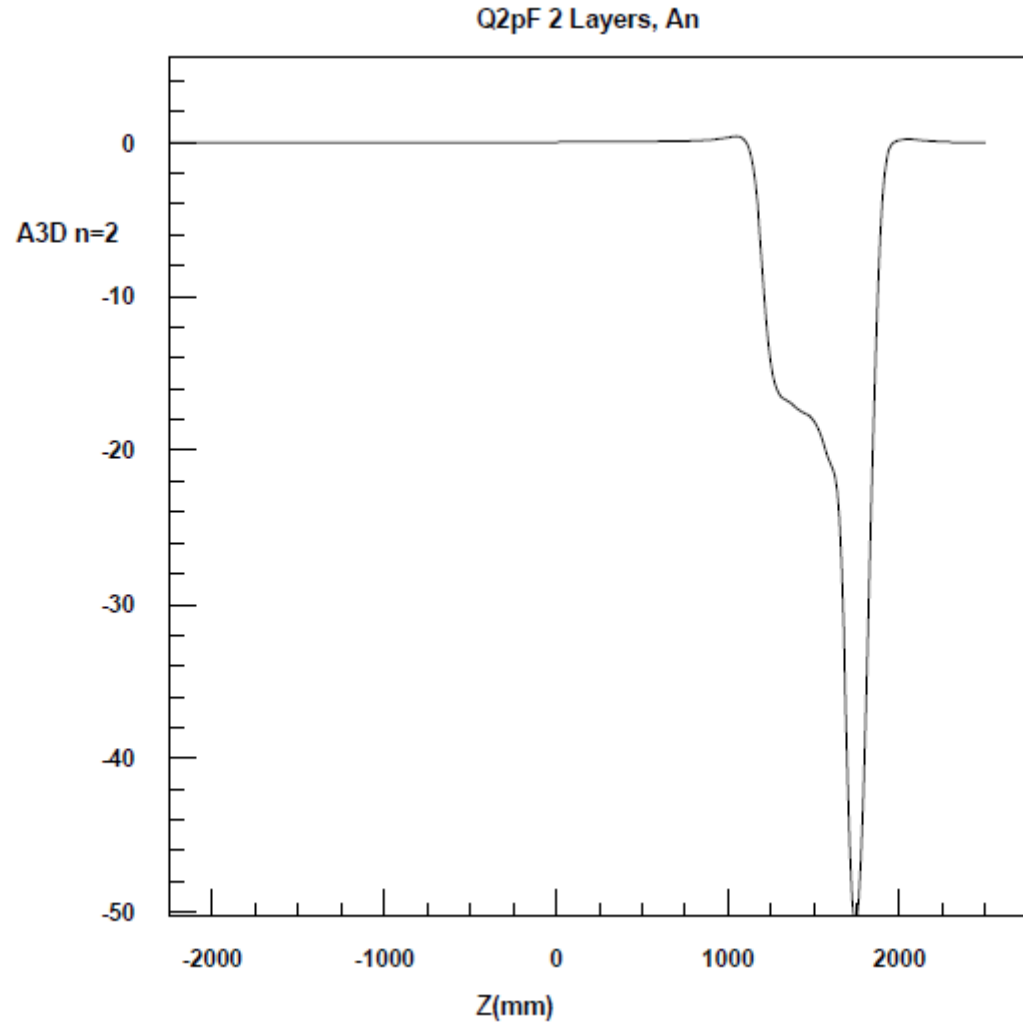
Q2pF 2 Layers, x=0, y=100



# Harmonics b6 and b10 (yet to be optimized in LE)

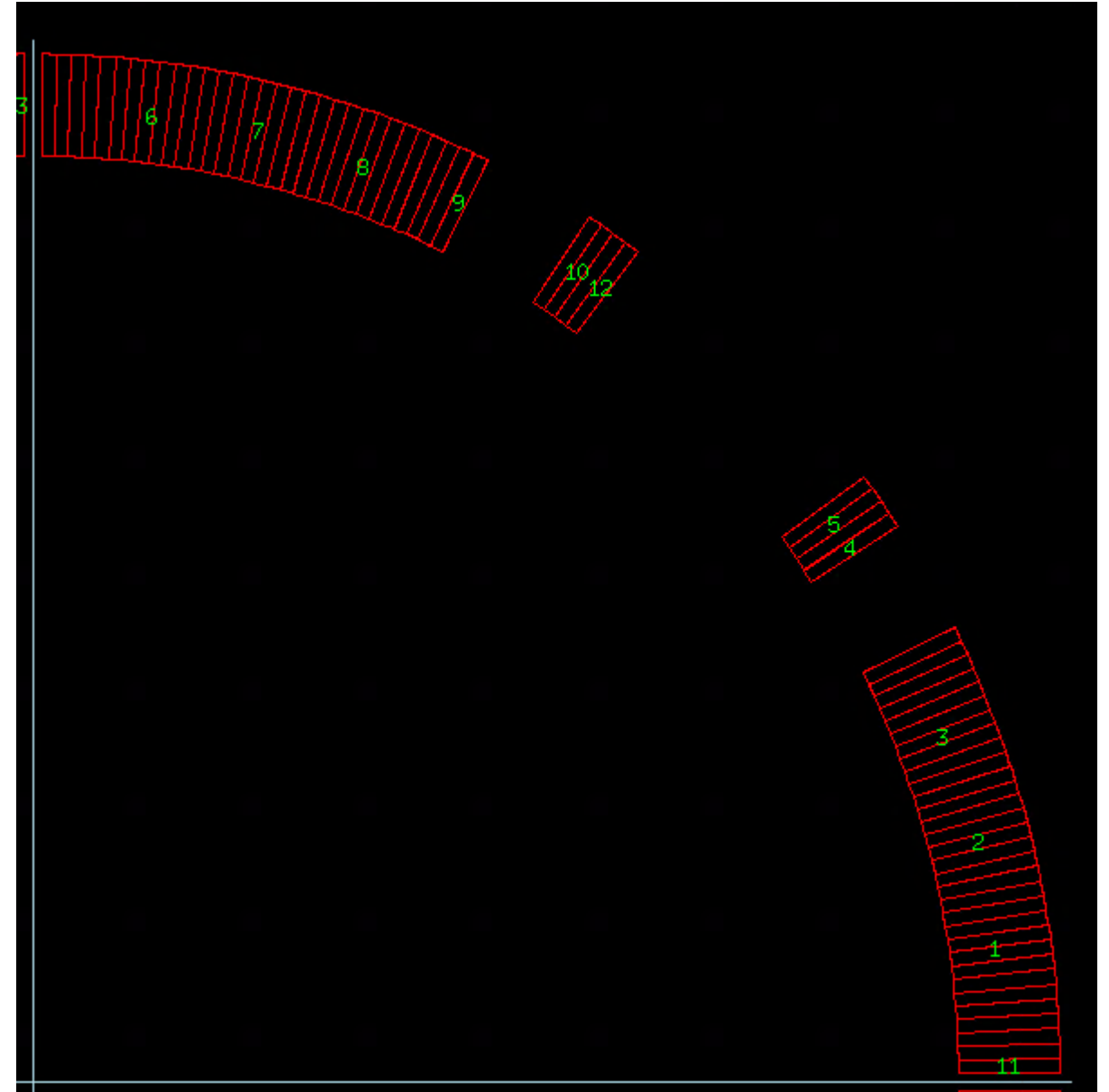
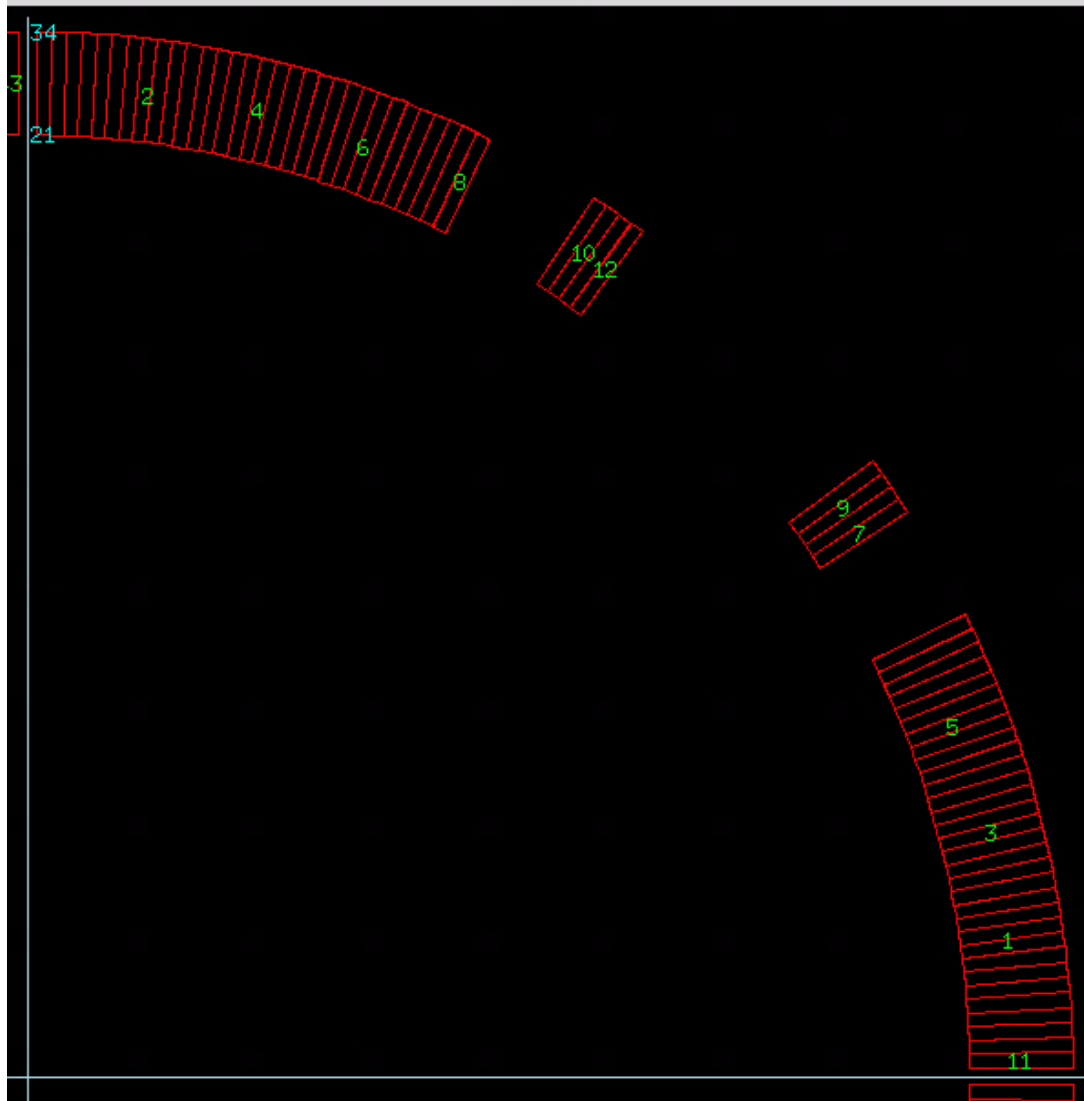


# Harmonics a2 and a6 (from leads and asymmetry)





# Numbering scheme for inner layer



# Numbering scheme for outer layer

