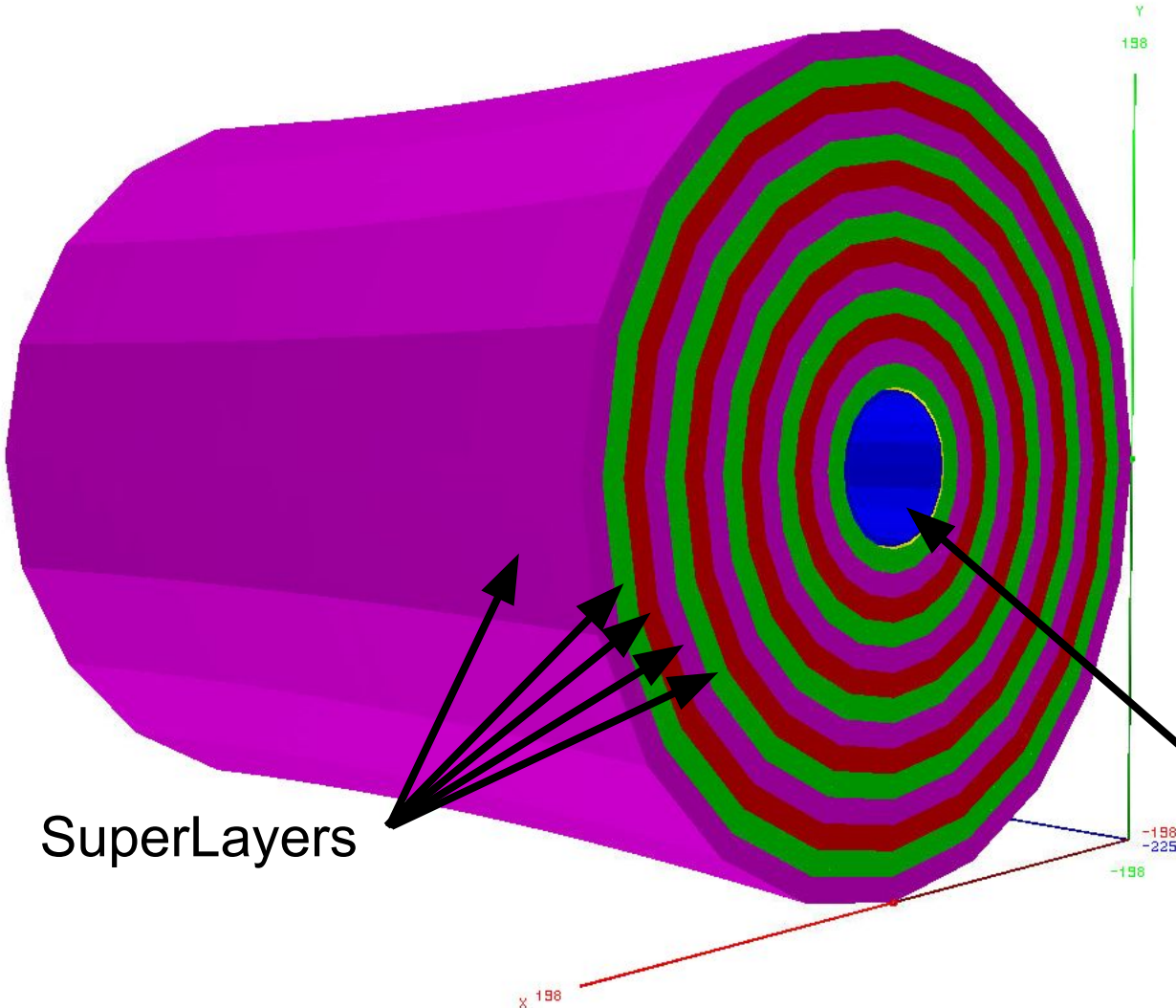


Update on Drift Chamber geometry in DD4hep

Lorenzo Capriotti

IDEA Physics and Software Meeting

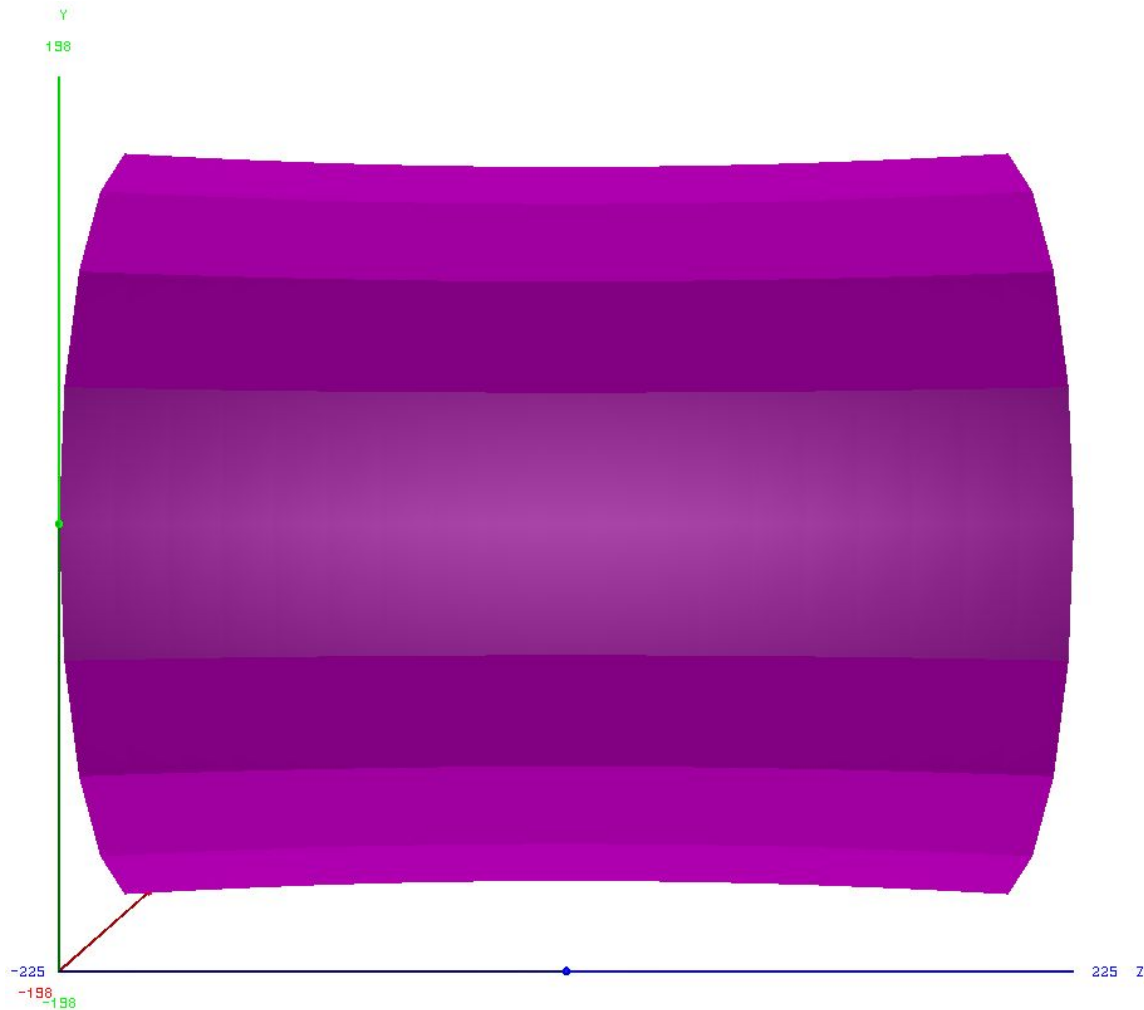
12/10/2022



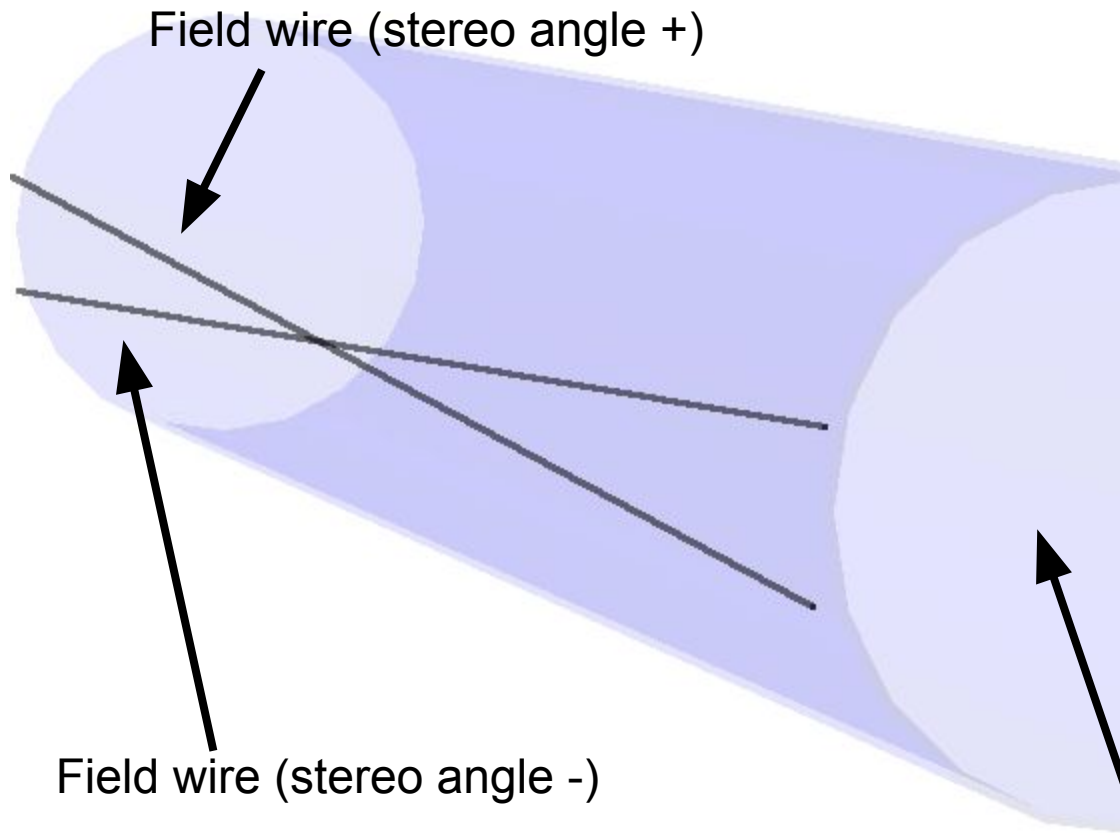
SuperLayers

- Total gas volume divided into 14 “SuperLayers”
- Each SuperLayer is an hyperboloid volume
- Each SuperLayer contains 8 hyperboloyd Layers
- Each Layer contains one row of wire cells
- Outer radius: 198 cm

Silicon Tracker

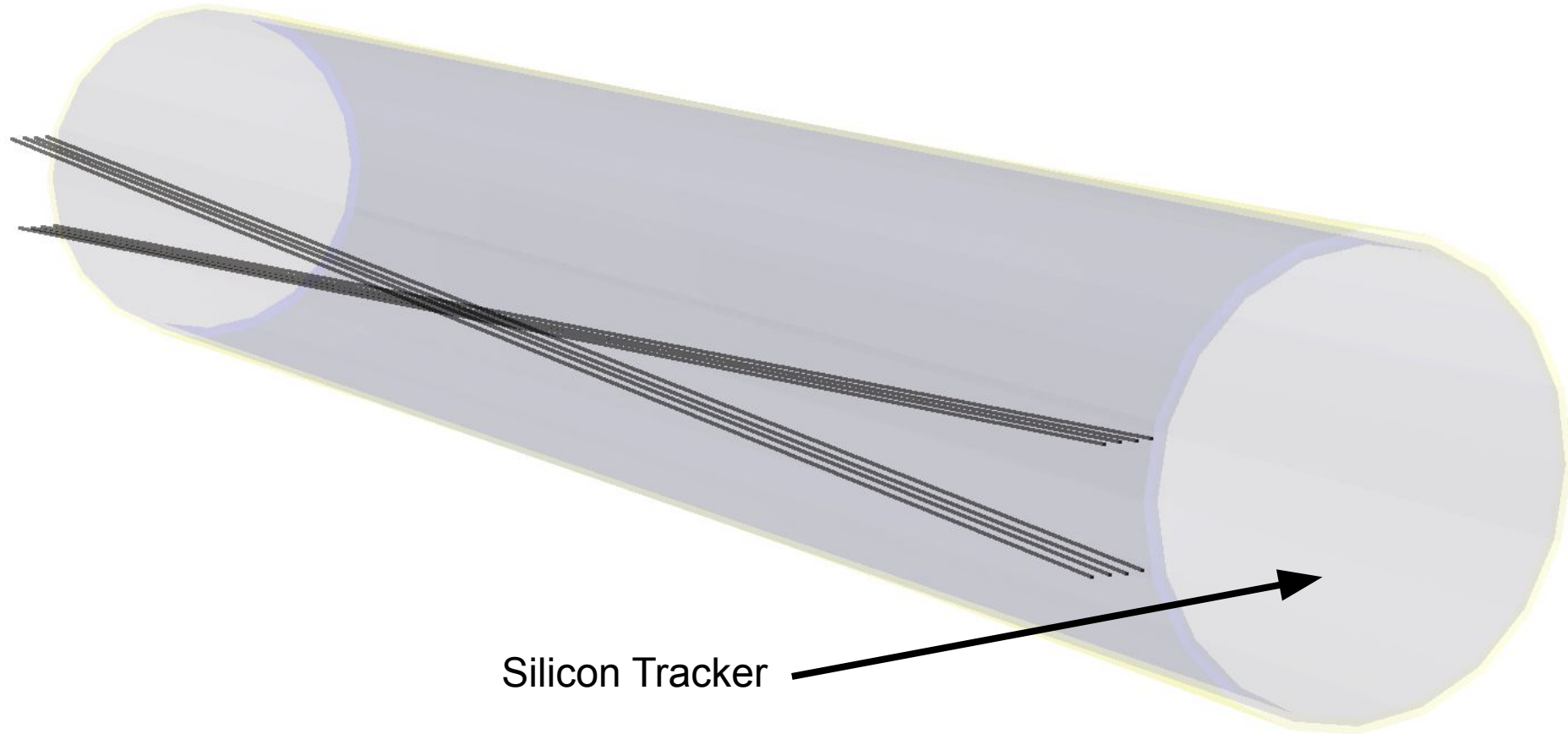


Curvature due to the
hyperboloid shape

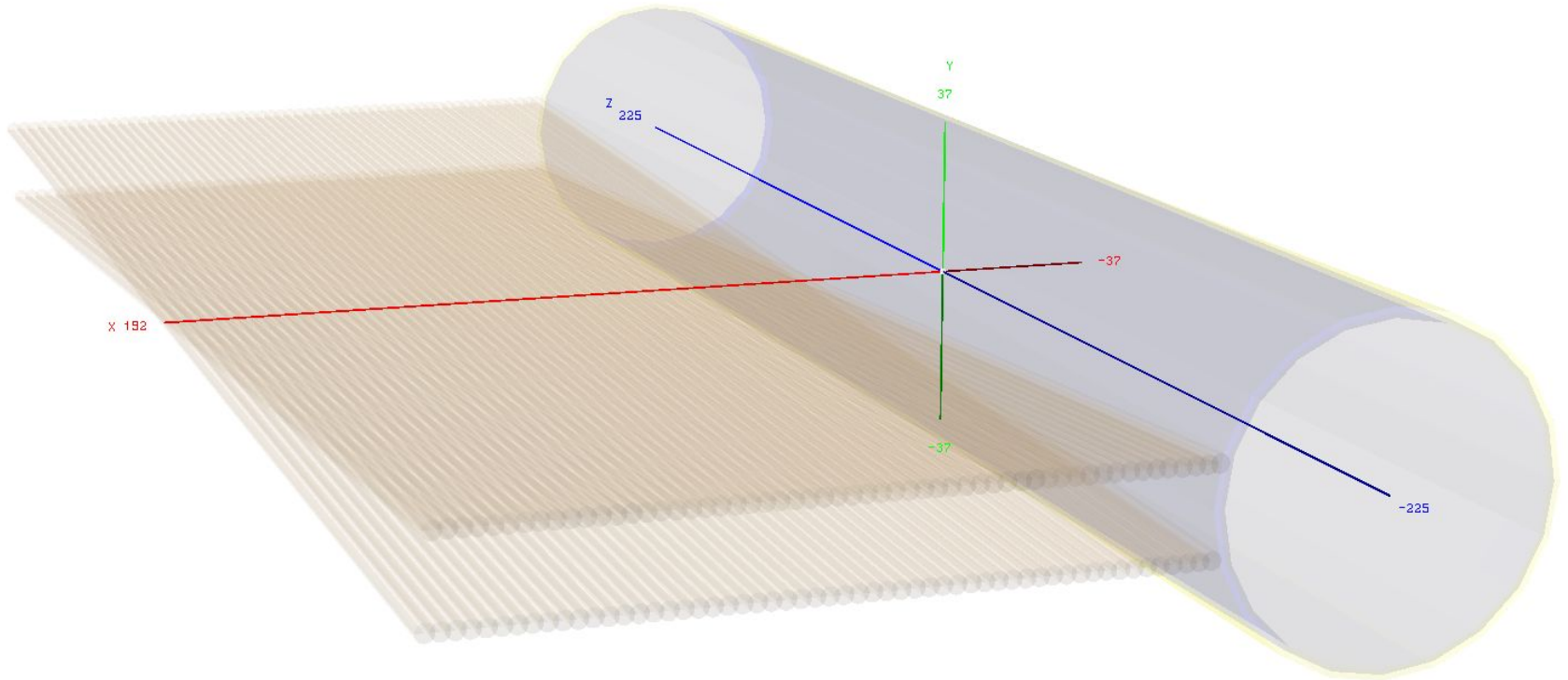


- First 2 field wires in the first 2 Layers of the first SuperLayer
- Part of the base of wire cell
- Thickness is x1000 for display purposes
- Stereo angle: $\pm 30^\circ$

Field wires of all the 8 Layers of the first SuperLayer



Field wires of all the **Layers** of all the **SuperLayers** (**8** x **14** = 112 in total)



Proposal for a DetectorElement tree

