

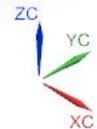
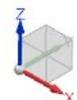
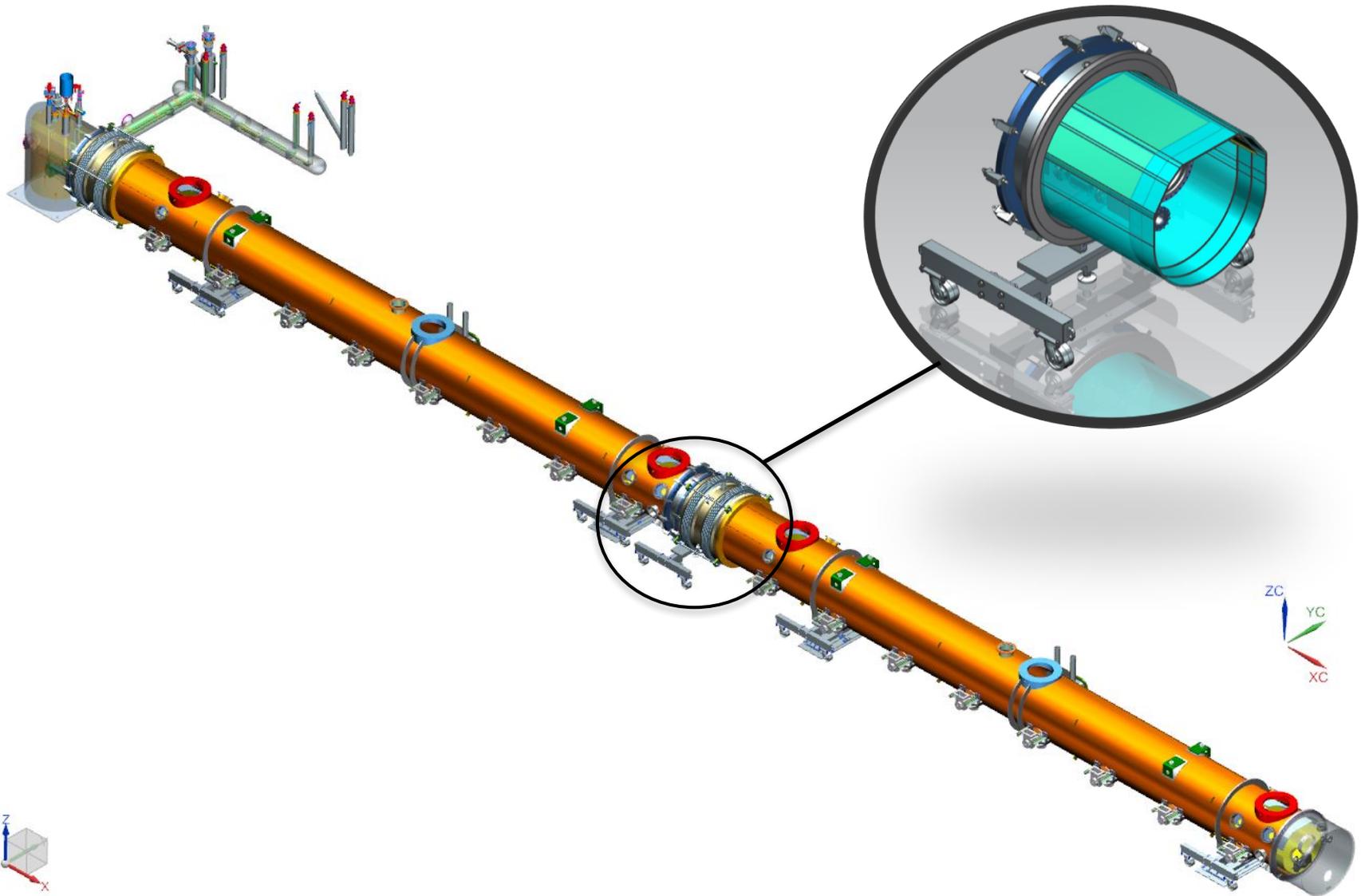


LERF Preliminary Review

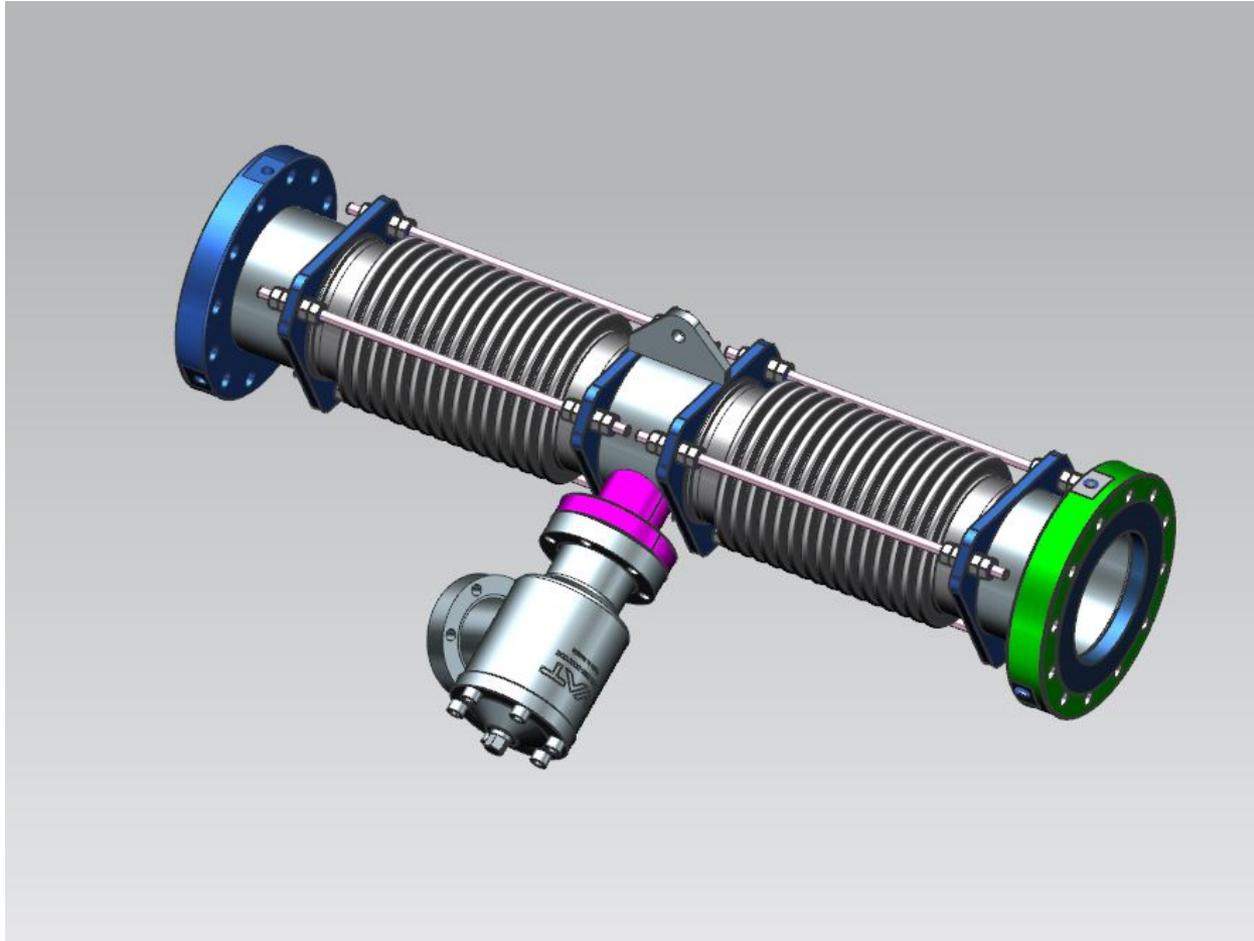
Interconnect Region

Keith Harding
11/13/2017

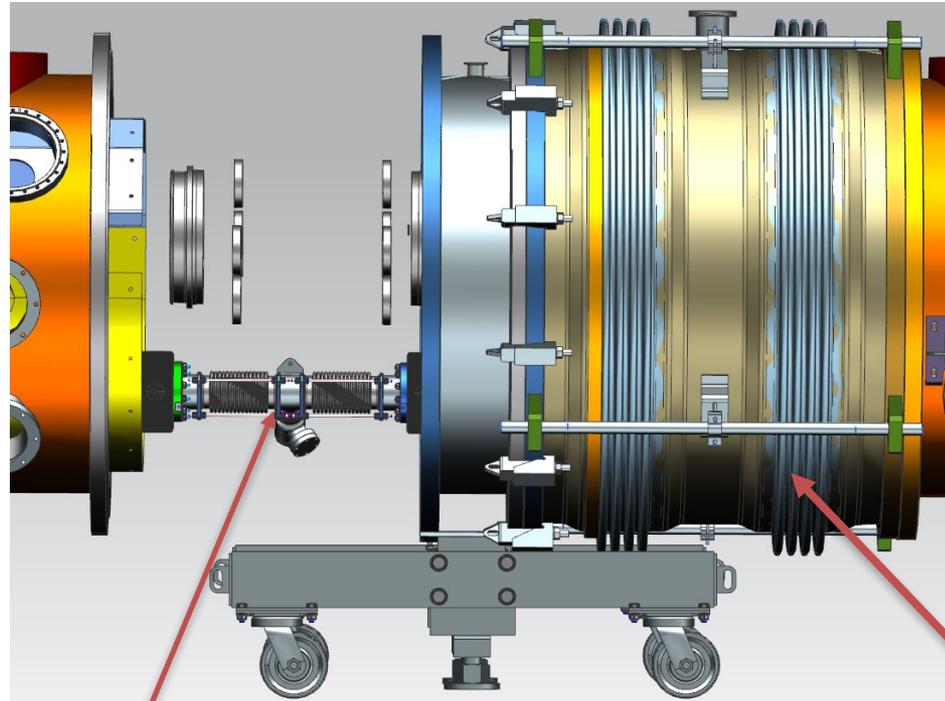
Overview



Beamline Bellows



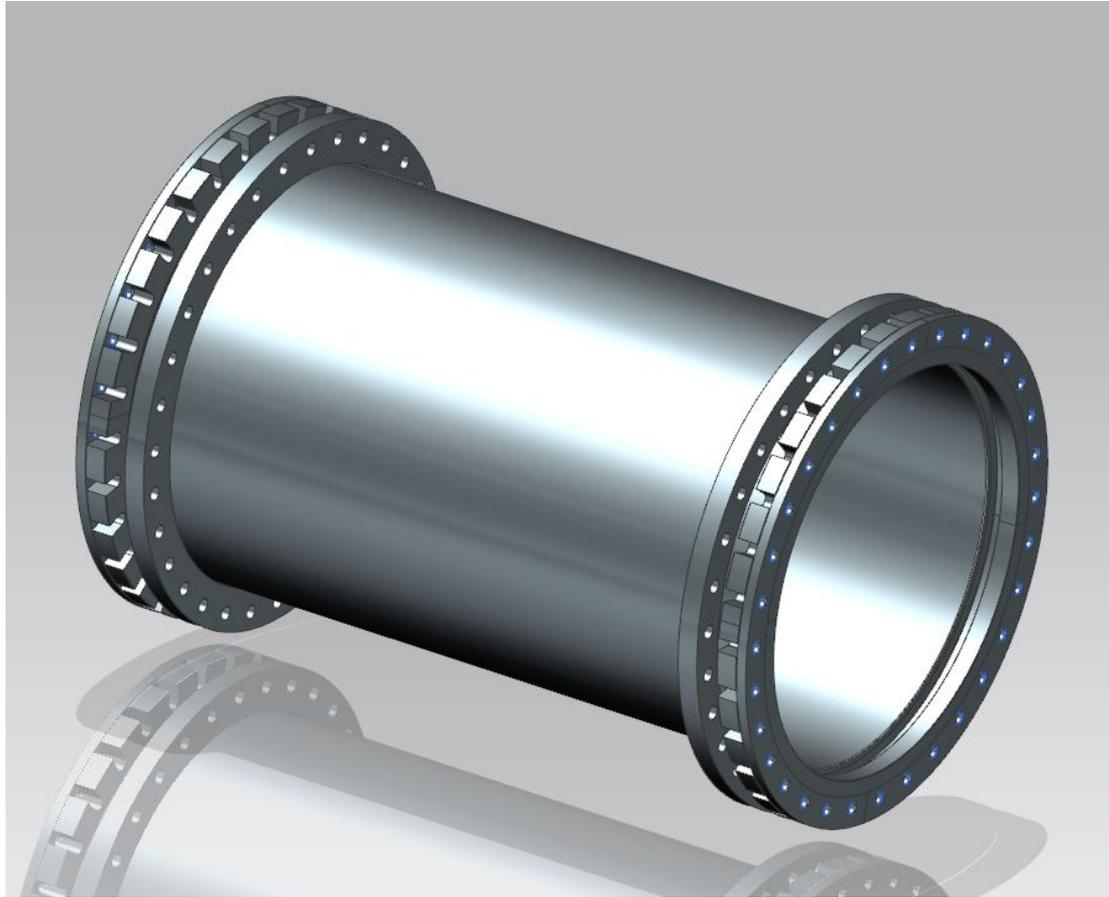
Beamline Installation



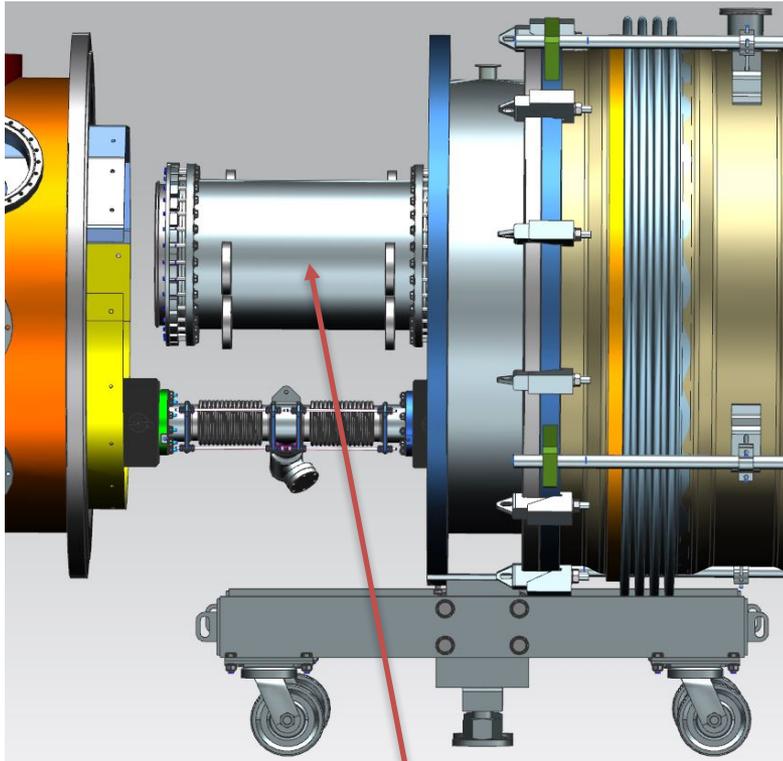
Install Beamline Bellows
w/ Right Angle Valve in
Clean Room Environment
(Tent)

Insulating Vacuum Bellows
And Spool are installed and
slid into "open" position

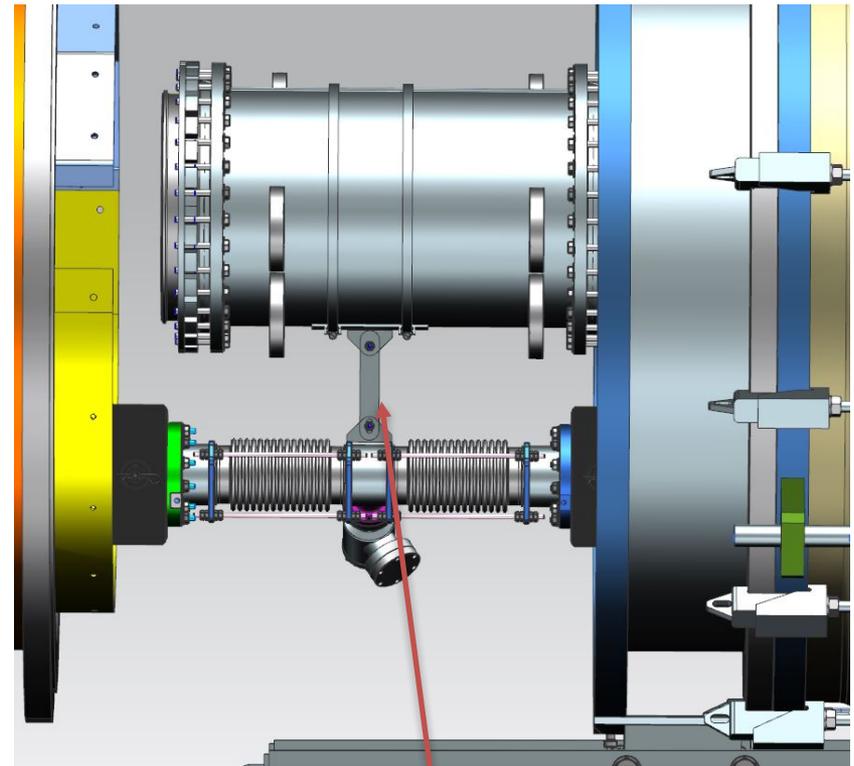
Gas Return Header Pipe



GRHP Installation

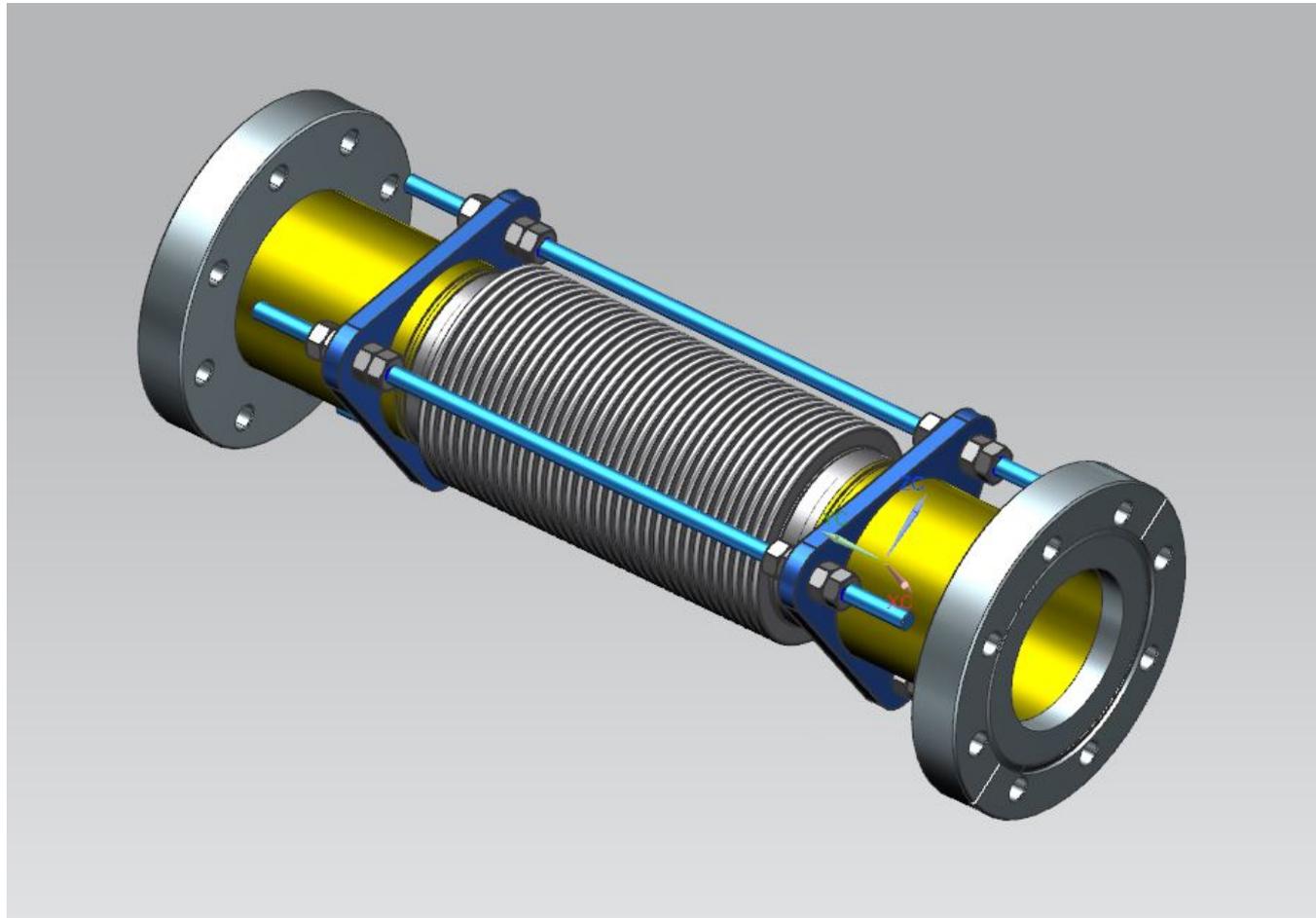


Install GRHP Utilizing same convention as currently used (Same Hardware as Currently used)

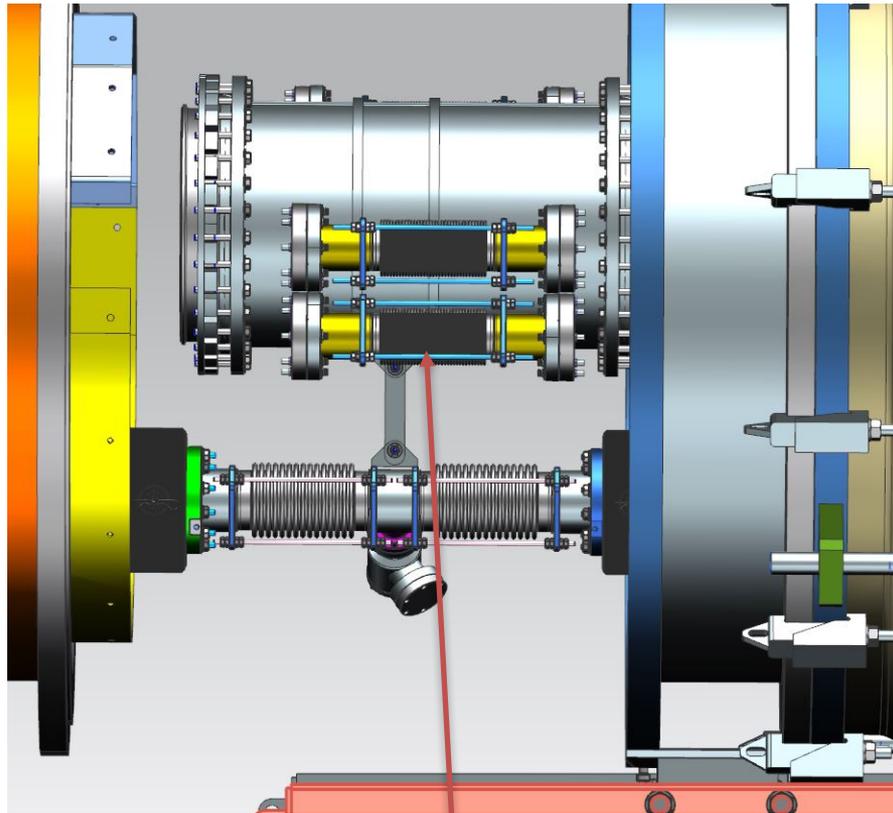


Install Beamline Support between GRHP and Beamline Bellows Spool. Use Two "Radiator" Clamps to secure to GRHP.

Cryogenic Interconnect Bellows

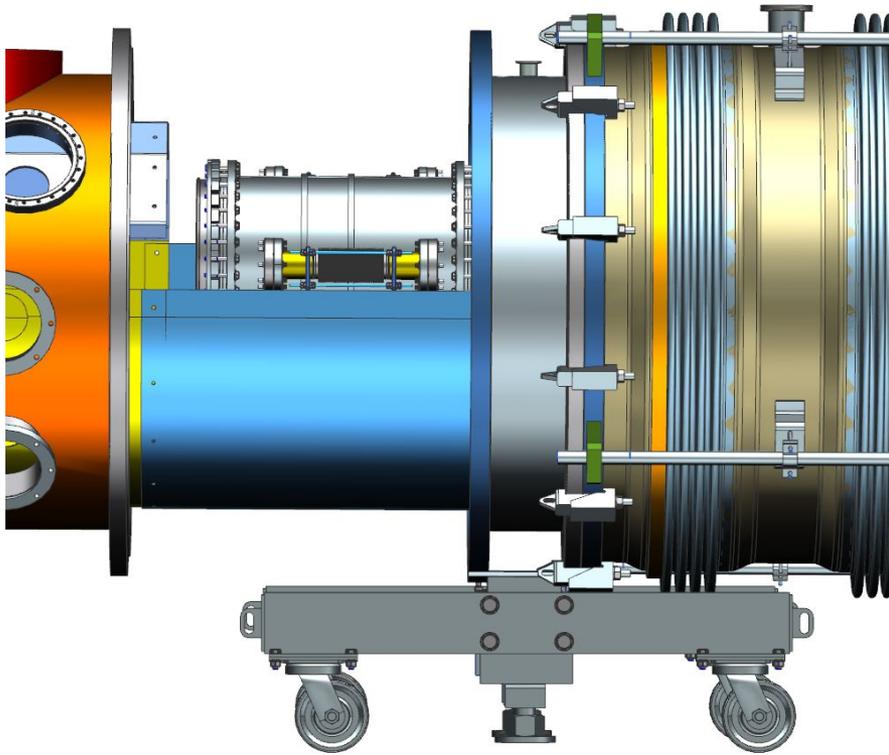


Cryogenic Interconnect Bellows Installation

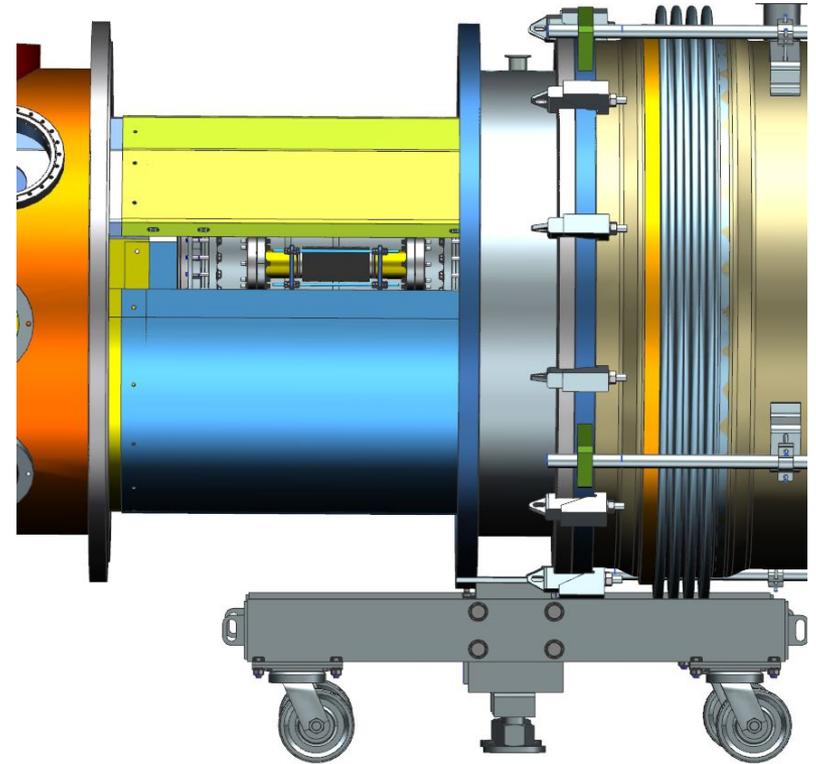


Install Bellows for Cryogenic lines
A,C,D,E, and F using standard
Hardware and assembly methods

Thermal Shield Installation

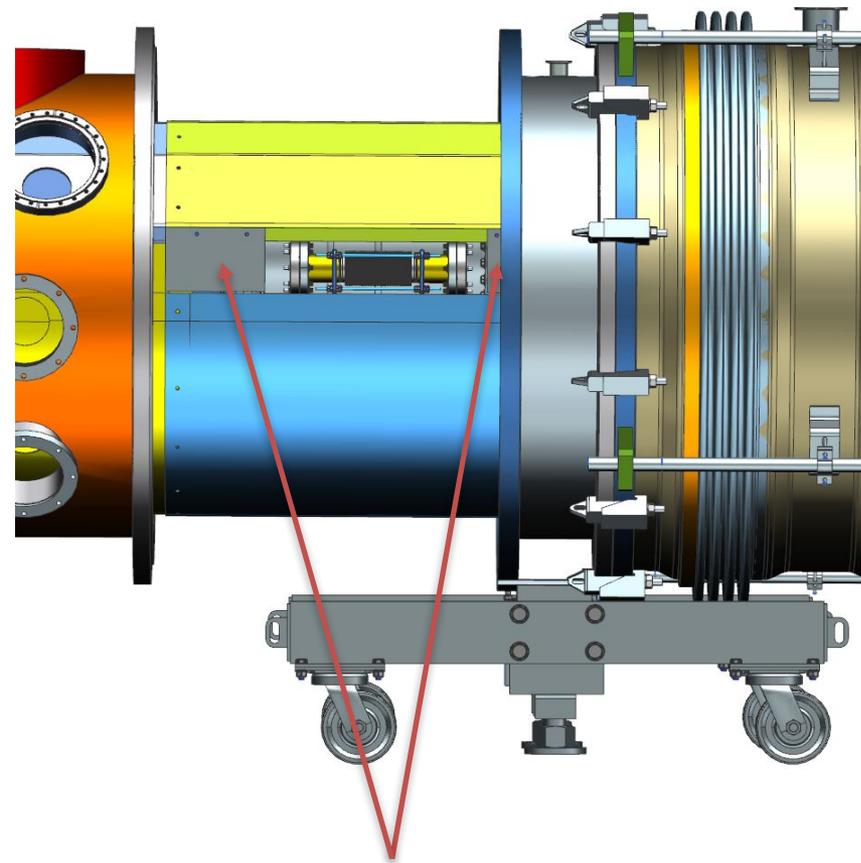


Install Lower Shield

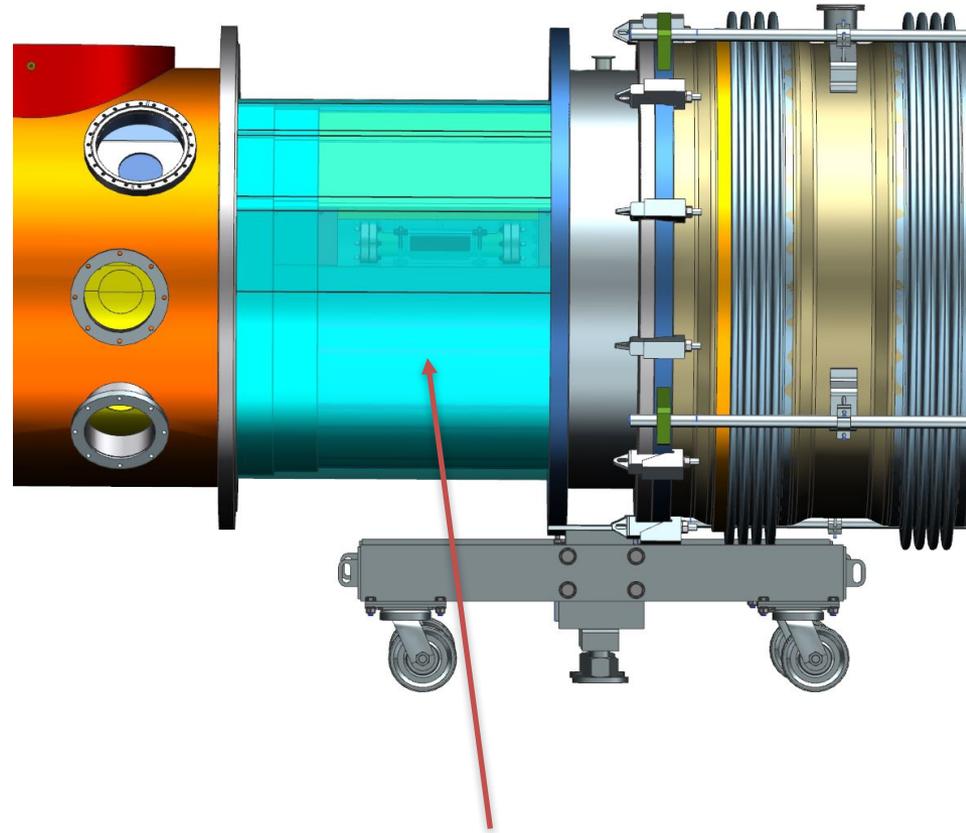


Install Upper Shield

Shield Patches and MLI

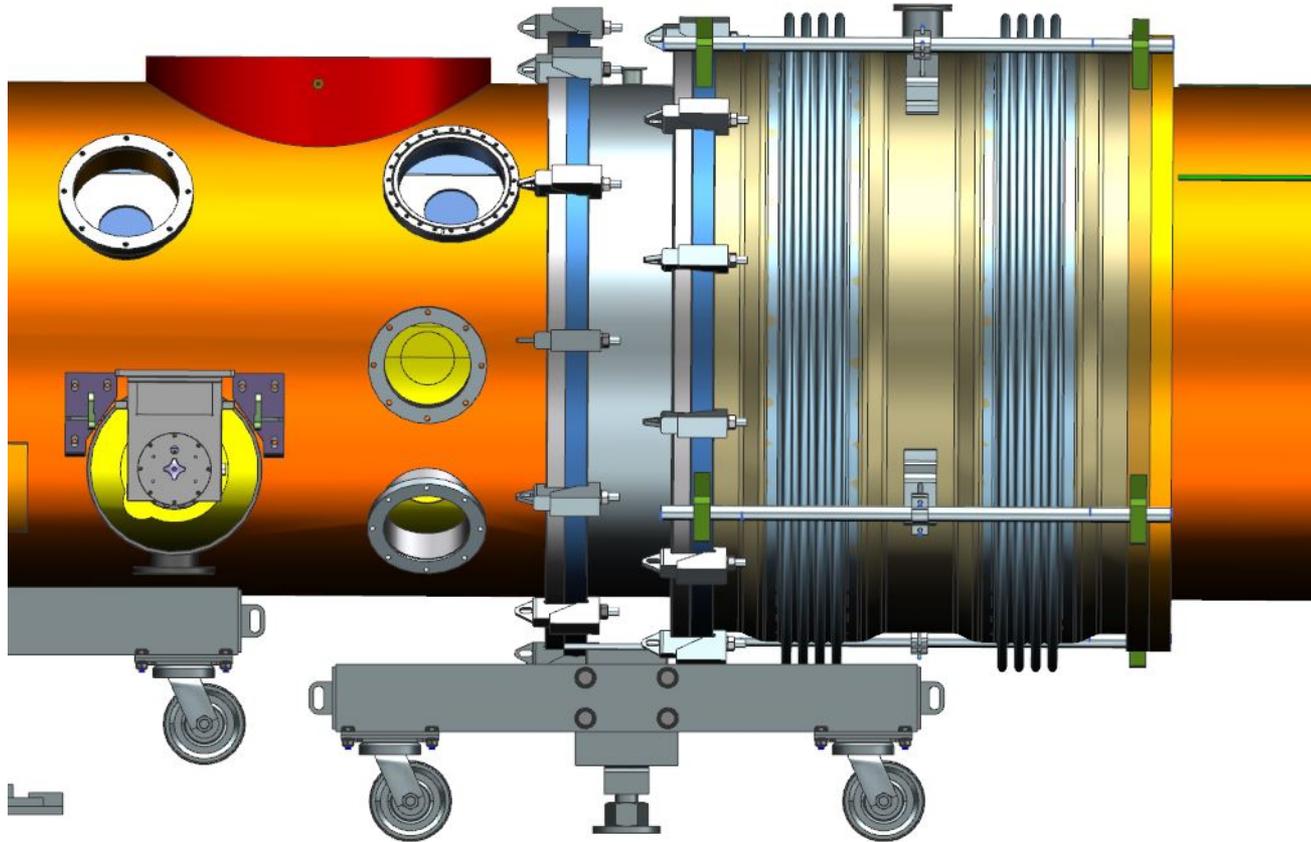


Install Thermal Shield Patches



Install MLI Blankets

Final Assembly



Roll Insulating Bellows Assembly into
Closed position and secure

Summary

- Design uses as many common parts and concepts as possible
- Utilizes processes and procedures that are familiar to Staff
- Simplified design reduces cost