

LCLS BC 1 Magnet FIDUCIALIZATION REPORT

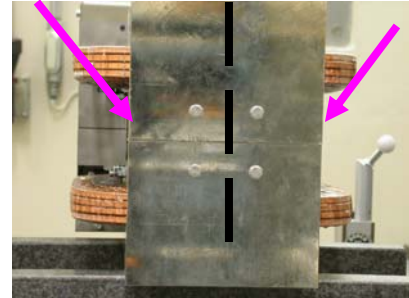


Inspector: Keith Caban
Responsible Engineer: Jose Chan
Date: Wednesday, August 30, 2006
Work Order/Charge No.: 92-4223-2
Serial Number: 001078
URL of Fiducial Report: <\\Web002\www-group\met\Quality\FIDUCIAL REPORTS\LCLS BC1 MAGNETS\LCLS BC1 001078.pdf>

Part Set-up – Coordinate System Set-up

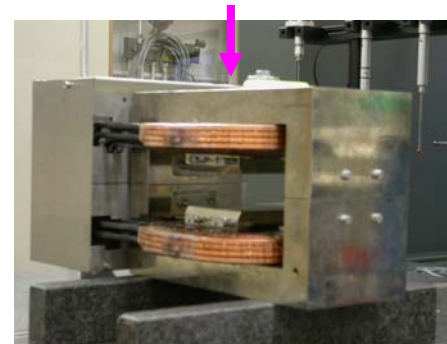
Planar Alignment

- Mid-Plane of the magnet



Spatial Alignment

- Top of magnet where label is.



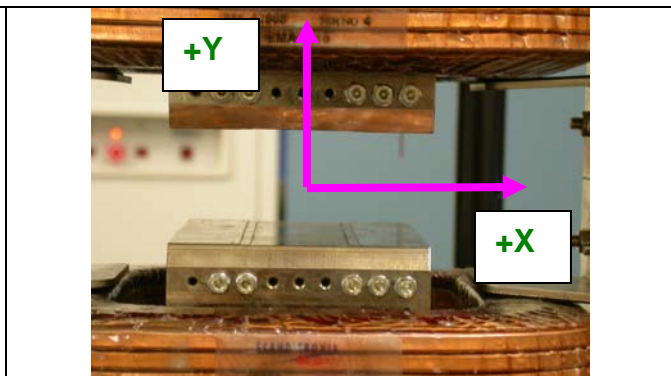
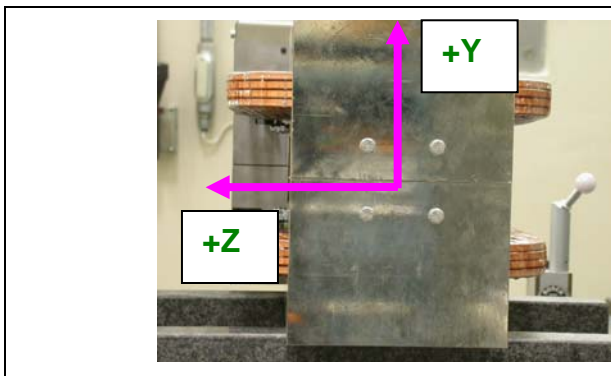
“Z” Zero

- Mid-Plane of the magnet.

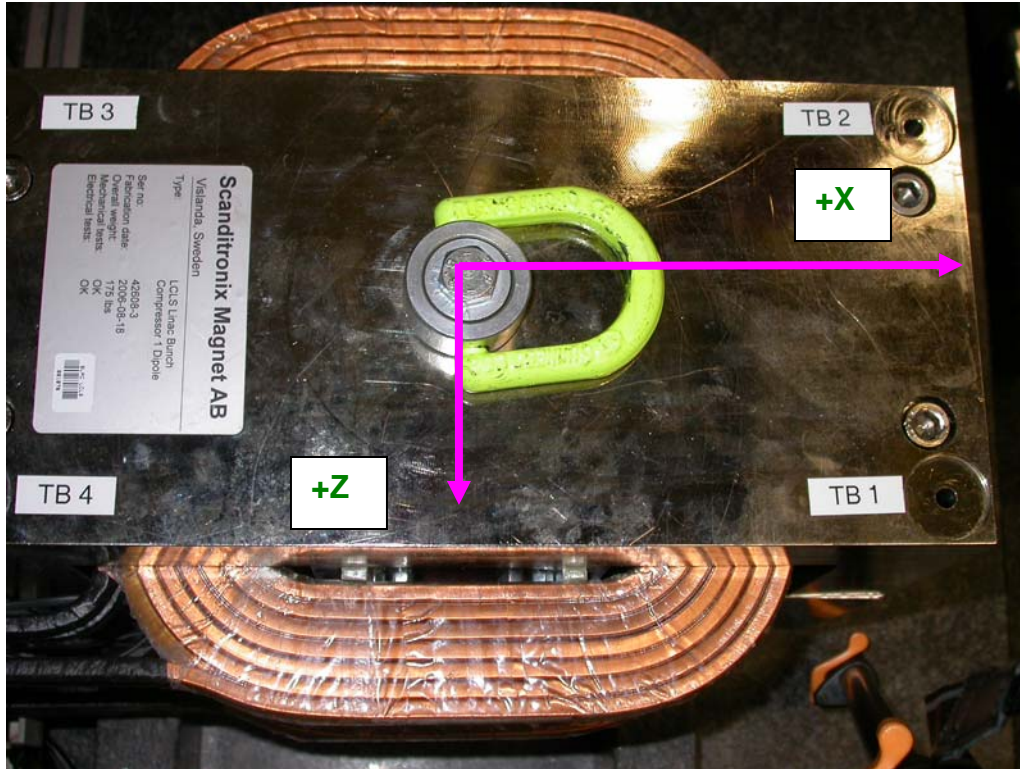


“X” & “Y” Zero

- X zero is created by the symmetry point of the inner stainless steel where coils lie.
 - Both ends of both sides.
 - Create lines which is y axis.
 - This Creates X- zero
 - Symmetry of pole planes
 - This creates Y- zero



Tooling Ball Measurements/Locations



| Tooling Ball | FORM | DIAMETER | X | Y | Z |
|--------------|---------|----------|----------|---------|----------|
| TB 1 | 0.00136 | 0.49453 | 6.04552 | 5.67027 | 2.52974 |
| TB 2 | 0.00075 | 0.49736 | 6.04751 | 5.67027 | -2.52954 |
| TB 3 | 0.00154 | 0.49442 | -6.02812 | 5.67595 | -2.53652 |
| TB 4 | 0.00433 | 0.49035 | -6.03246 | 5.67745 | 2.52710 |