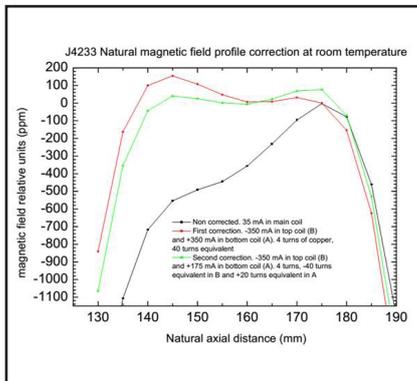


## CRYOGEN-FREE 6 T SPLIT PAIR MAGNET SYSTEM FOR EPR

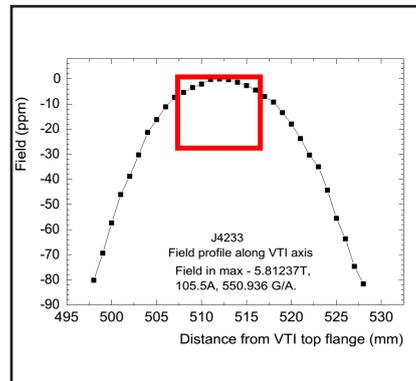


### Key features

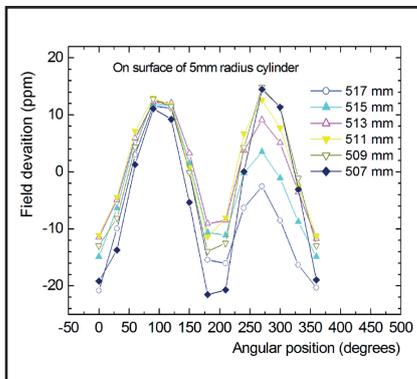
- »  $\pm 6$  T split pair superconducting magnet with horizontal field
- » 25 ppm homogeneity over  $\varnothing 10$  mm diameter sphere
- »  $\varnothing 50$  mm variable temperature insert designed to incorporate Bruker W-Band EPR spectrometer
- » 2 K – 350 K sample temperature range
- » High magnetic field stability in persistent mode 0.1 ppm/hr
- » Designed to minimise vibration resulting in low sample displacement
- » Low stray magnetic field  
B < 5 G for z & r > 3 m
- » No liquid cryogenes



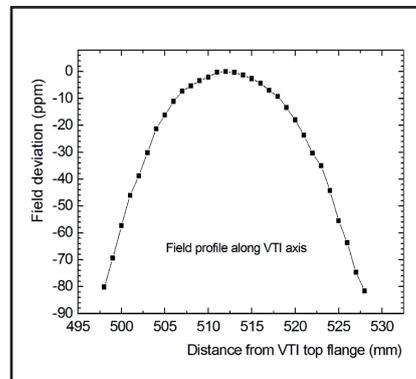
Once the magnet was cold above results were measured at low temperature and along the VTI



Field profile measured at low temperature and along the VTI



Field deviation as a function of angular position on the surface of a cylinder of 5 mm radius



Field profile measured at low temperature as a function of axial position