

MATLAB-based AT with LOCO

-Using the data from 06/22/2005, LOCO optimizations were run

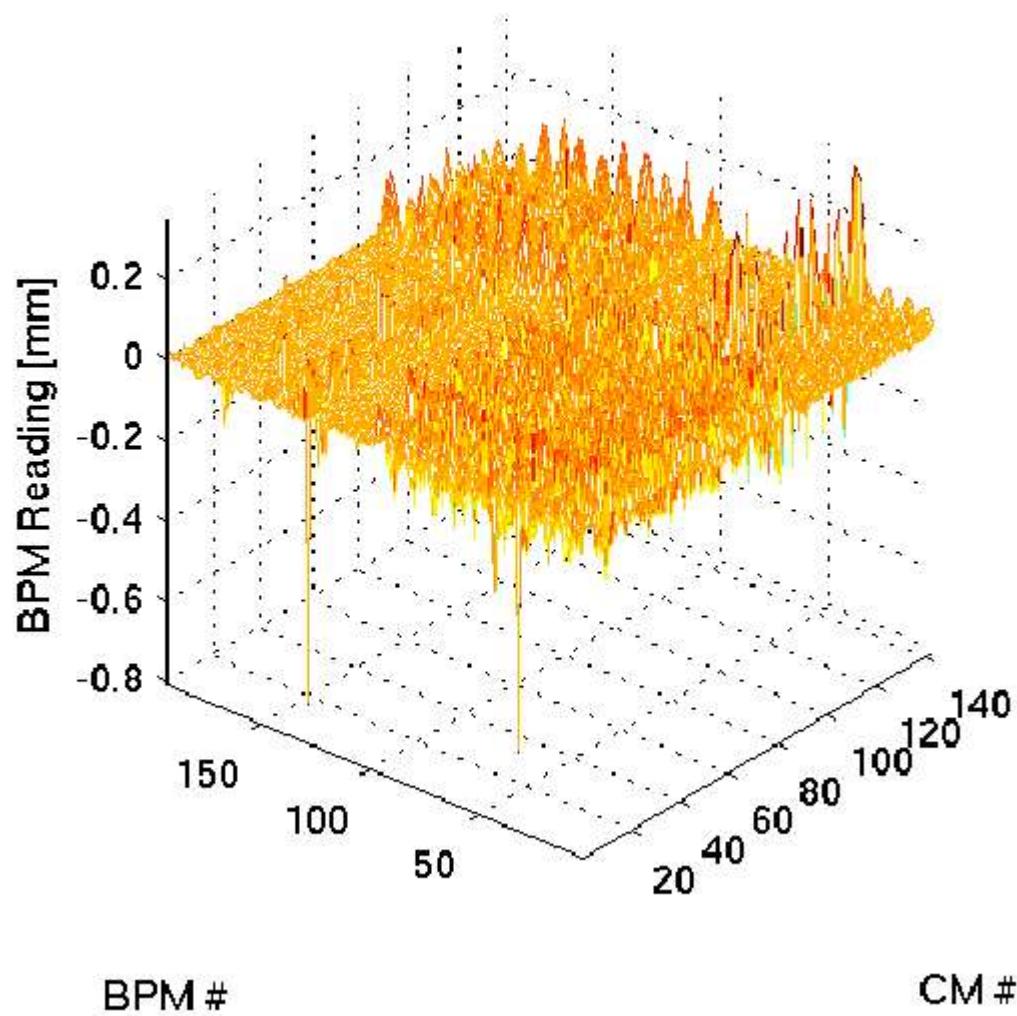
- Dispersion and phase measurements included in the fit

- 15 iterations run – fit converged after 5-6 iterations

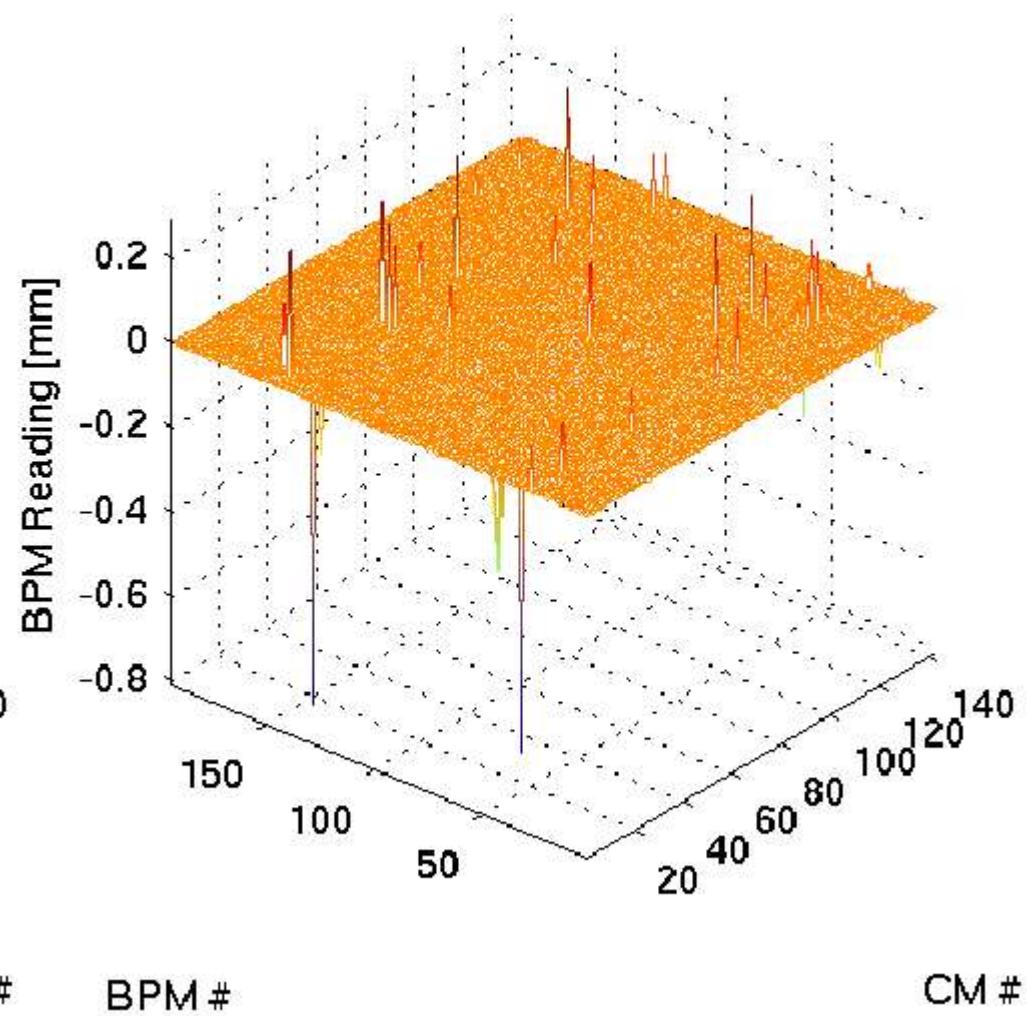
- ”BPM reading” fit within $< 10\mu\text{m}$ of measured values

-Results are very similar to Ji Li's from 2005

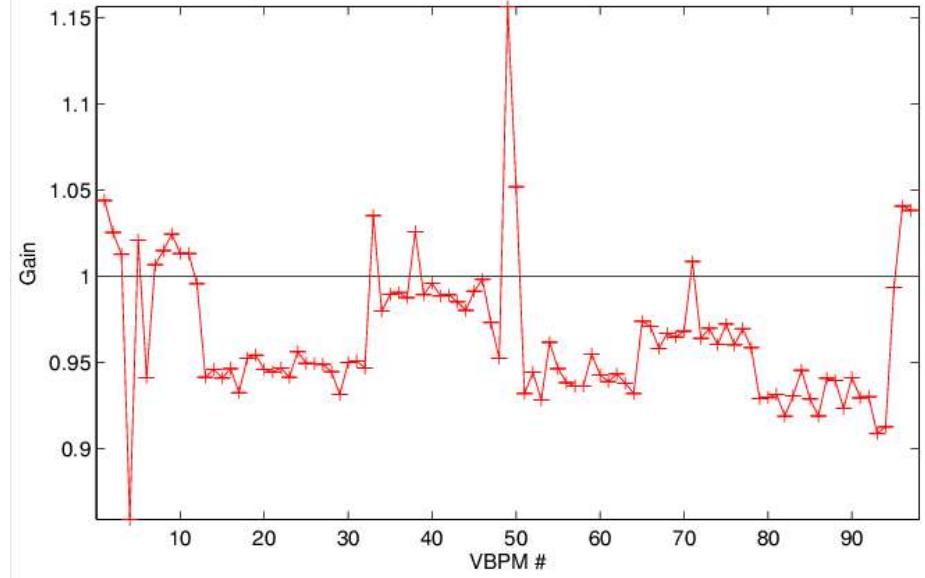
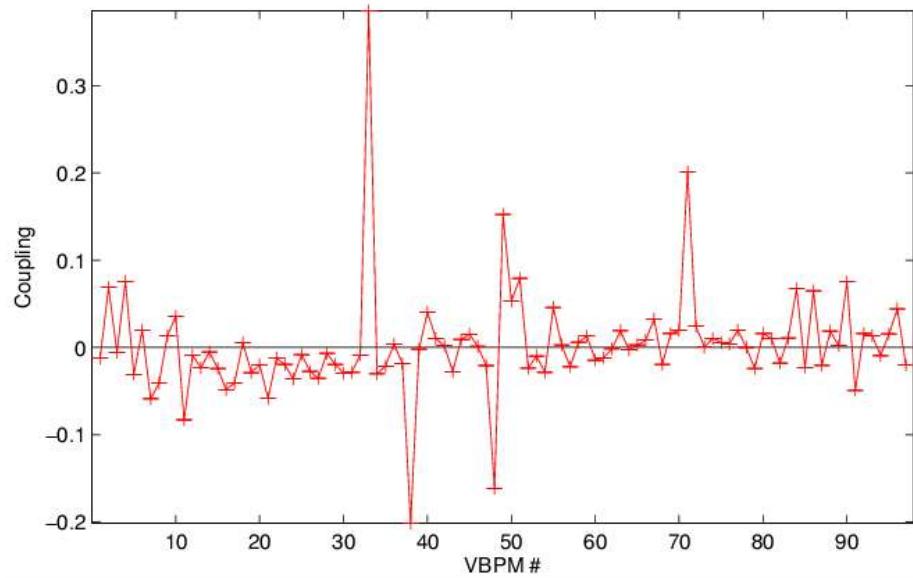
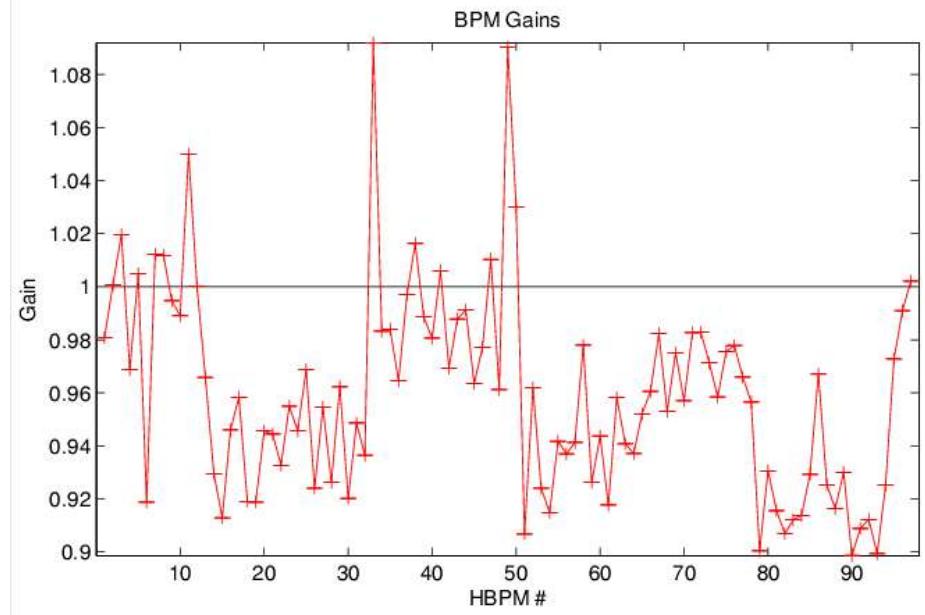
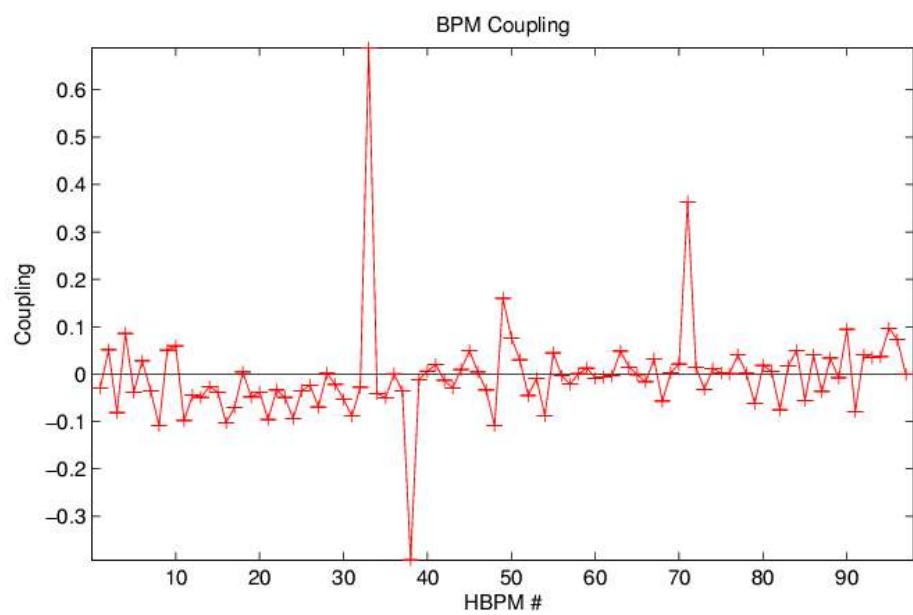
Residual Response Matrix: Unfitted Model



Residual Response Matrix: Fitted Model

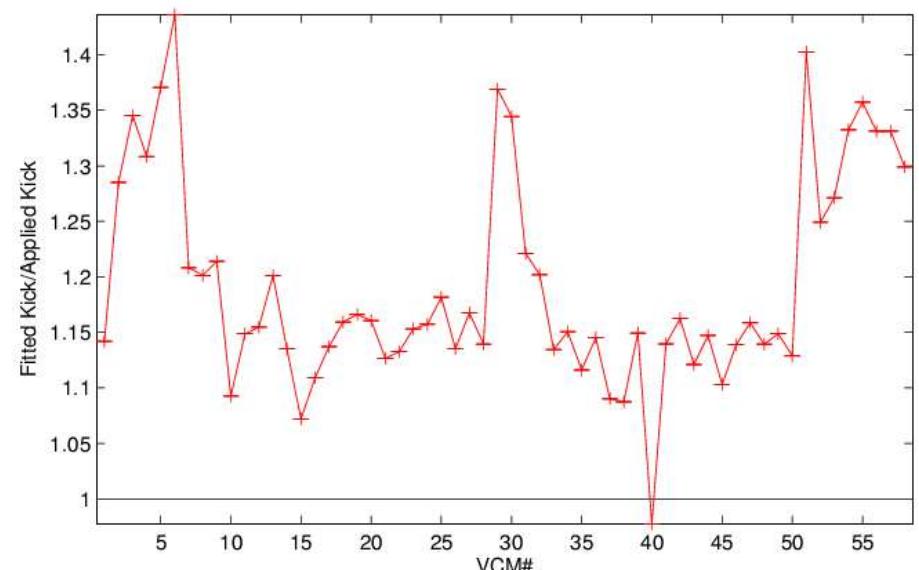
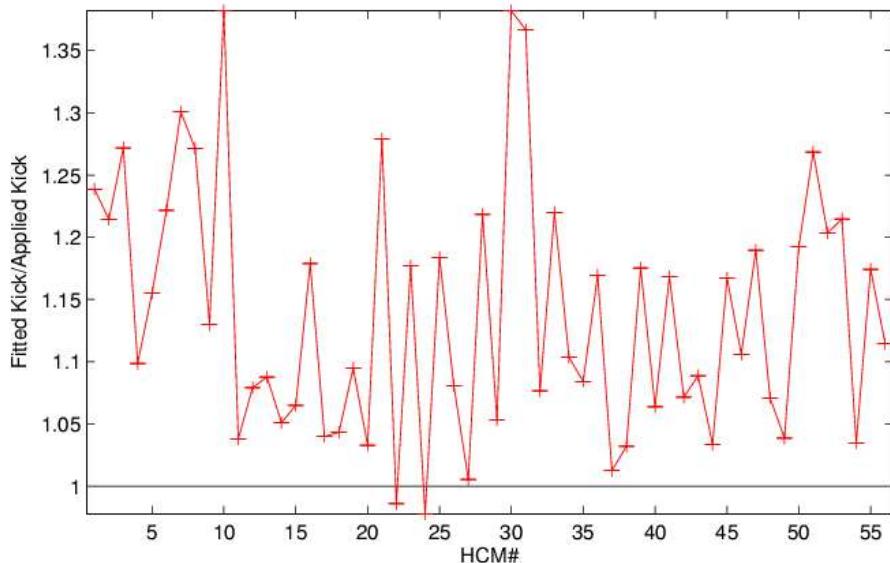
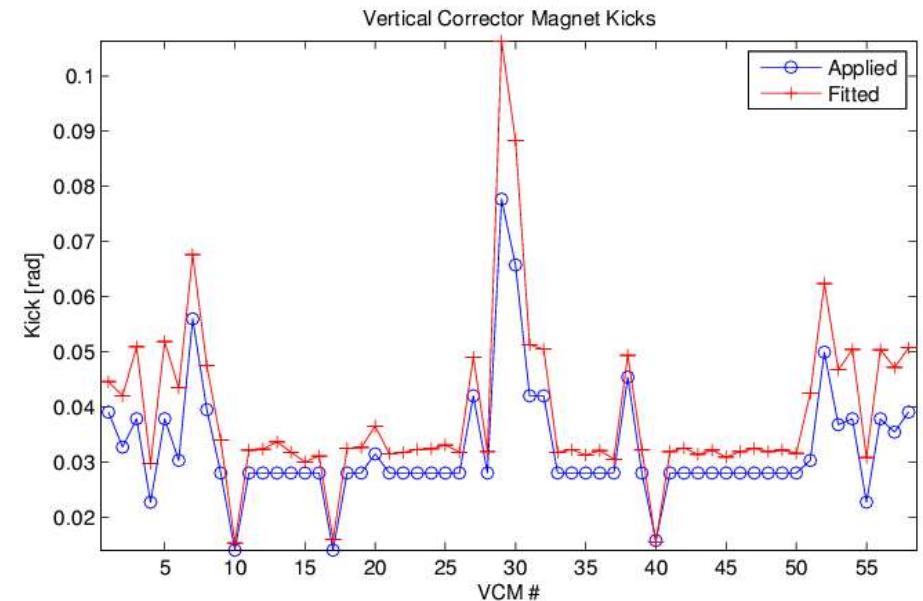
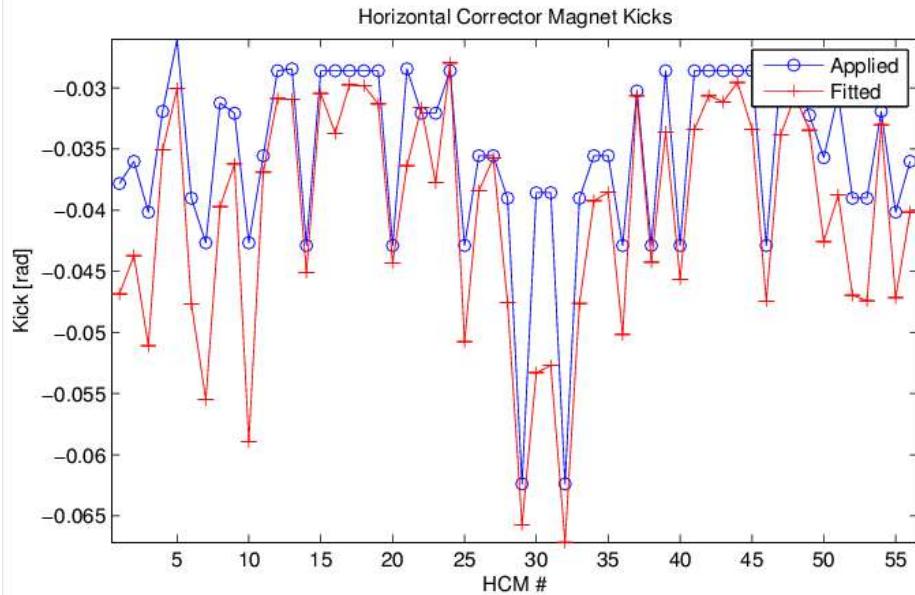


LOCO – BPM Coupling and Gains

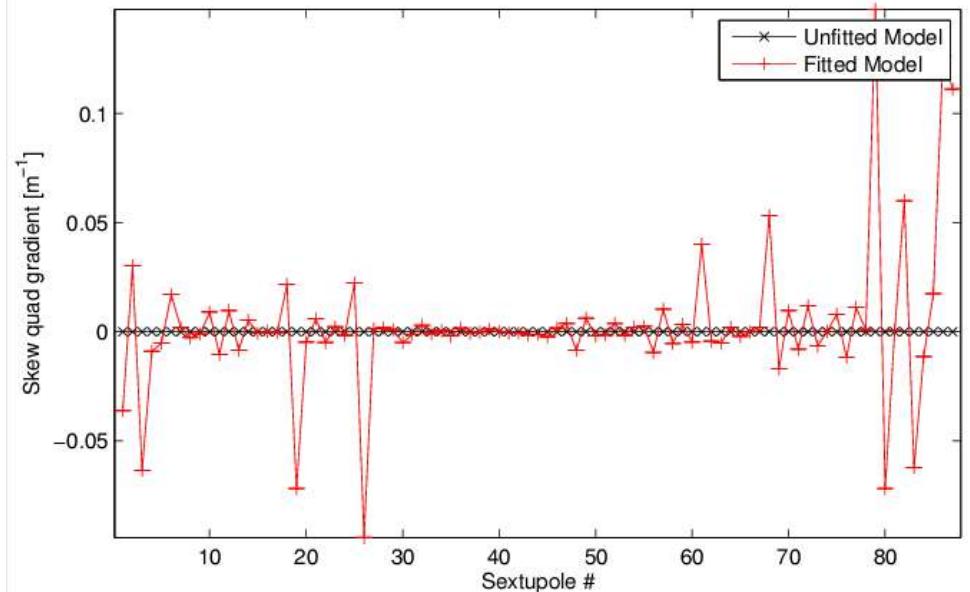
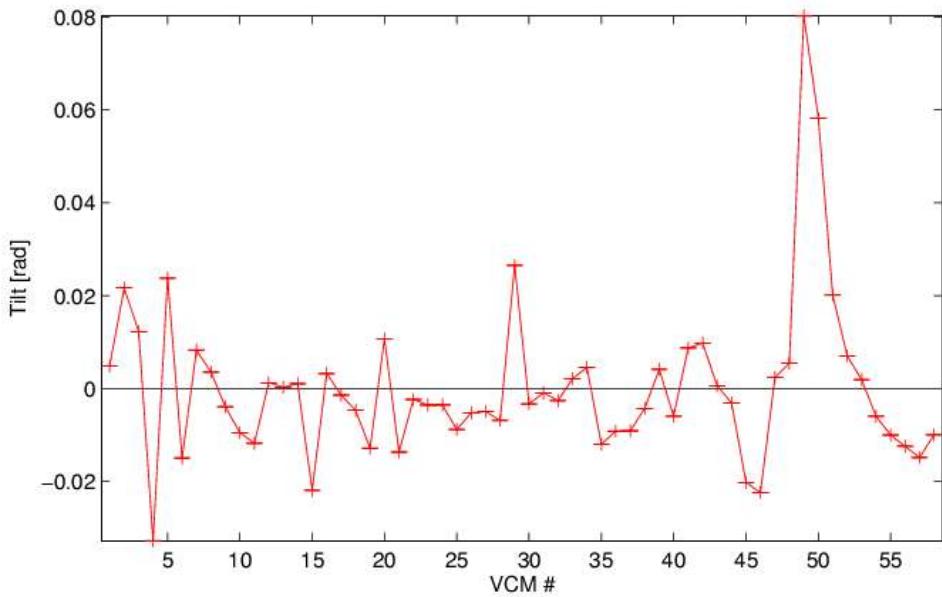
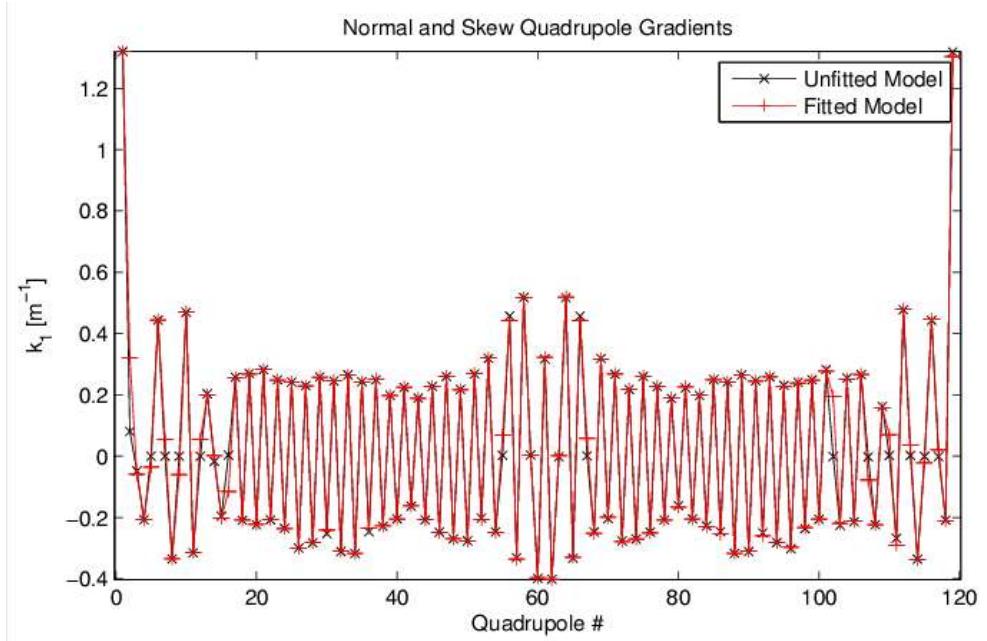
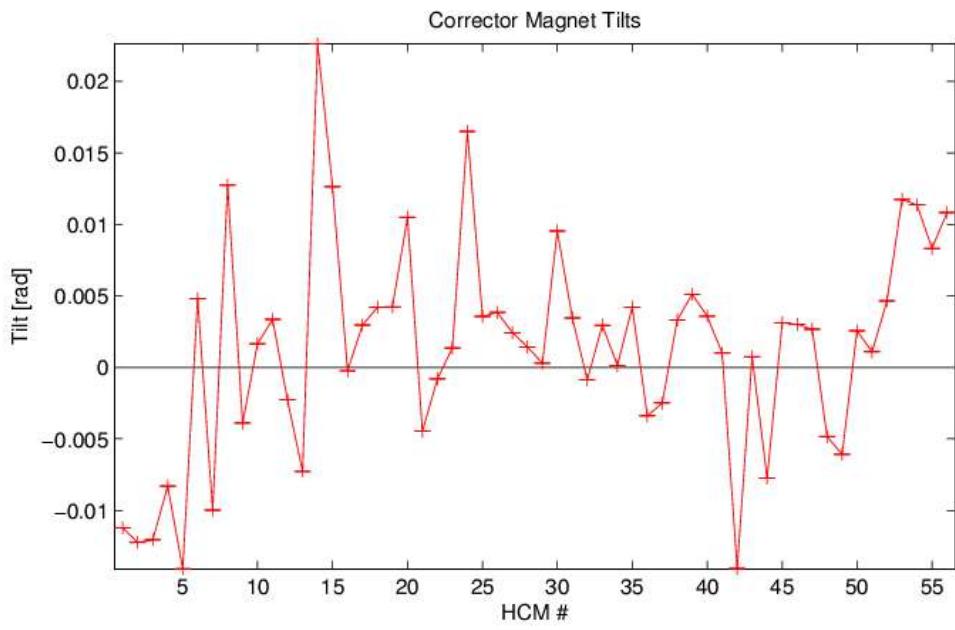


LOCO – Corrector Kicks

- Fitted corrector magnet kicks consistently larger than applied kicks
- Also noted this in Ji Li's results

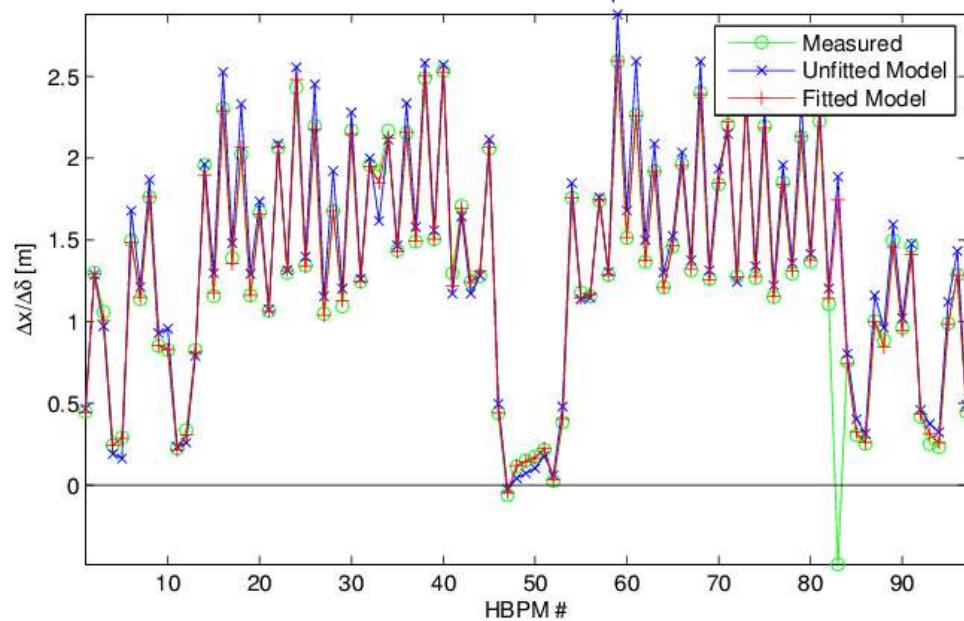


LOCO – Corrector Tilts, Quad Gradients



LOCO – Dispersion Fit

Measured and Fitted Dispersion



Residual of Dispersion Fit

