

Analysis of DESY Test Beam Data 05/06

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Progress so far:

- Learnt how to use MARLIN to generate histograms from LCIO files,
- Used Mokka 06-00 to simulate the Test Beam impacting the centre of a wafer.
- Energies: 1, 1.5, 2, 3, 4, 5, 6 GeV.
- Angles: 0, 10, 20, 30, 45 degrees.
- These can be easily extended to impact points at the edge and corner of a wafer by translating the particle gun and trackers in the X-Y plane.
- Using TB07 detector model (TBDesy0506 will be included in the next version of Mokka >06-01).
- No smearing of position or energy.

Future Work....

- Include energy and position smearing in the simulations.
 - Energy Spread of 5%
 - X-Y Smear of 10mm
- Use MARLIN to analyse the simulation LCIO files.
- Compare simulation to real data.
- Energy and Position Resolution
- Compare centre, edge and corner of the wafer.
- Effect of angle of incidence.

Any Questions?