# Major Design Criteria

- Clear separation between “data” and “algorithms”
- Three basic types of data:
  - **event data**
  - **detector data** (structure, geometry, calibration, alignment,..)
  - **statistical data** (histograms, …)
- Clear separation between “persistent” and “transient” data
  - Isolation of user’s code
  - Different/incompatible optimization criteria
  - Transient as a bridge between various representations
- Data Store centered architectural style
  - Algorithms as data producers and consumers
- *User code* encapsulated in few specific places:
  - “Algorithms”: Physics code
  - “Converters”: Converting data objects into other representations