Data Warehouses and Data Integration Services: Chapter Scope

- Data Integration (in general)

  - Virtual Views

  - **Materialized Views**

  - Hybrid

- Data Warehousing and OLAP

  - Design, modeling and architectural issues

  - ETL (Extract-Translate-Load)

  - Maintenance

  - Traditional data management issues (indexing, query processing, etc)

- Data Mining (very briefly) ?

  - Is it just one possible application that is more easily/effectively implemented in presence of a DW?

- Cs227dataint Mailing List: http://list.cs.brown.edu/mailman/listinfo/cs227dataint

- Cs227dataint Team Web Page: http://members.home.com/cconvey/cs227

Small Topics Under Current Investigation

- Maintenance of materialized views

- Query/View languages and processing

- ETL (Extract Translate Load)
  - Semantic/Syntactic heterogeneity issues
  - Change detection in original data sources
  - Tools and languages that facilitate ETL

- Overall architectures of DW/OLAP systems

- Metadata management for DW/OLAP

- Indexing

- Front end OLAP querying tools

- RDBMS schemas used in DW/OLAP

- Data Mining in relation to DW/OLAP systems