CS 445
The Relational Model

Chapter 3

September 14, 2009
Relational Model

• Read Chapter 3

• The database is a collection of relations
  – each relation is a table

• Data Definition Language
  – subset of SQL

• Integrity constraints

• Views
Relation

• Relation schema
  – example:

• Relation instance
  – set of {tuples|records|rows}

• Relational database
  – Relational database schema
  – Relational database instance
Translation

• Translate E–R diagram to Relational Model
  – E–R Diagram to SQL!
  – must represent:
Create a relation

- SQL
- CREATE TABLE (CONSTRAINT PRIMARY KEY (TYPE=INNODB);

- INSERT INTO (VALUES ( );

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Unique

- CREATE TABLE

  CONSTRAINT UNIQUE ( )

);
Key References

- `CREATE TABLE`