Dealing with the glue system
Introduction to Oracle

• Log onto grace system
  – ssh glue.umd.edu
  – ssh linux.glue.umd.edu

• Go into the class directory
  – cd /afs/glue.umd.edu/class/spring2014/cmsc/424/0201

• Go into public directory
  cd public/Mondial_dataset

• Start oracle
  tap oraclient
  – Your SID is 'dbclass1'

• Start sqlplus
  sqlplus

• Enter user name and password that were emailed to you

• To change your password
  – alter user <username> identified by <pass>;
Load tables

- Copy Mondial_dataset from public directory to your own
  - `cp -r ../../public/Mondial_dataset .`
  - `cd Mondial_dataset`

- Start sqlplus
  - `sqlplus`

- Create tables
  - `@ create`

- Load data
  - `@ data`

- If you need to trash everything
  - `@ drop`
Basic Query Structure

• A typical SQL query has the form:

```sql
select \( A_1, A_2, \ldots, A_n \)
from \( r_1, r_2, \ldots, r_m \)
where \( P \)
```

– \( A_i \) represents an attribute
– \( R_i \) represents a relation
– \( P \) is a predicate.

• The result of an SQL query is a relation.
Sample queries

• Find the country code for the United States
  SELECT code
  FROM country
  WHERE name = 'United States'

• Find the population of the United States
  SELECT population
  FROM country
  WHERE code = 'USA'

• Find countries that border the United States
  SELECT country1
  FROM borders
  WHERE country2 = 'USA'