Unit 02.01

Basic Structured Query Language: Database Introduction

USING DATABASES WITH PYTHON

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SQLite Browser

http://sqlitebrowser.org/

Relational Databases

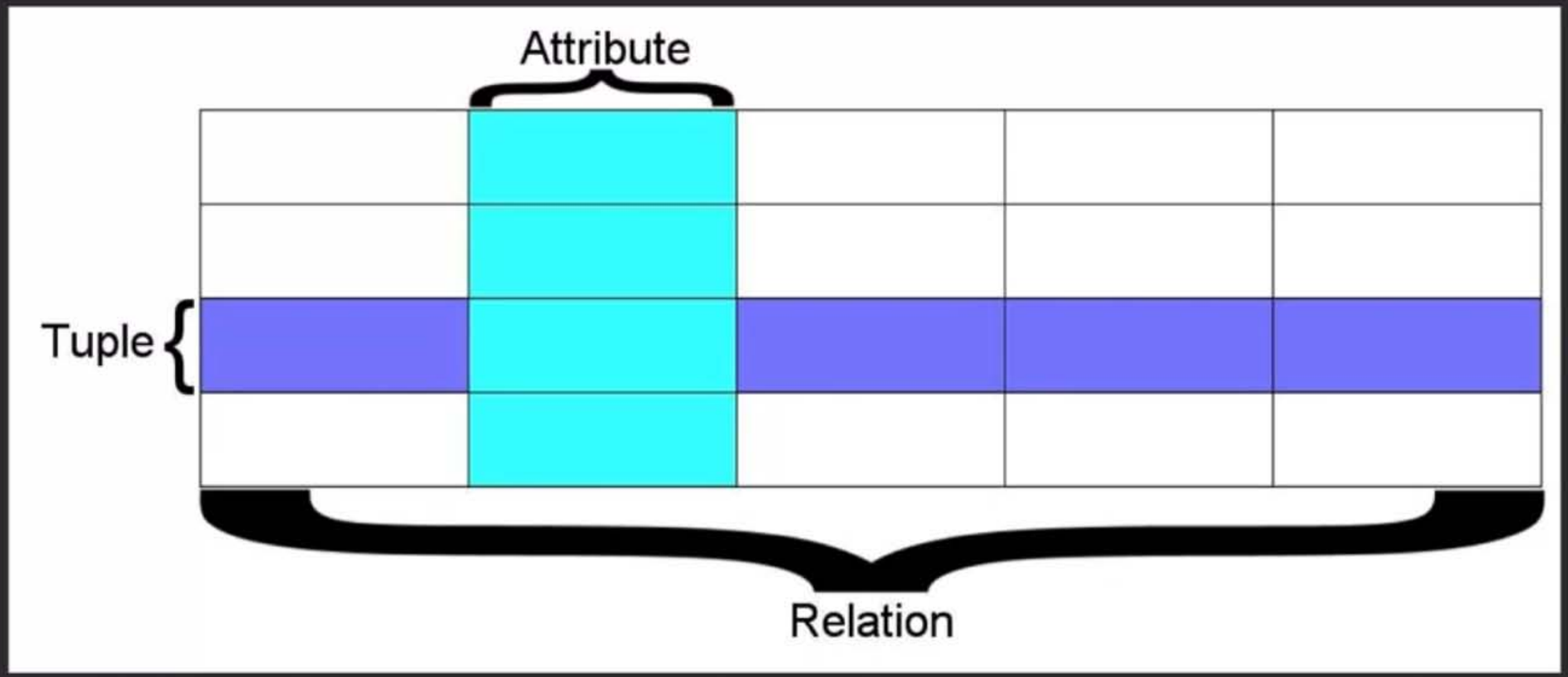
Relational databases model data by storing rows and columns in tables. The power of the relational database lies in its ability to efficiently retrieve data from those tables and in particular where there are multiple tables and the relationships between those tables involved in the query.

http://en.wikipedia.org/wiki/Relational_database

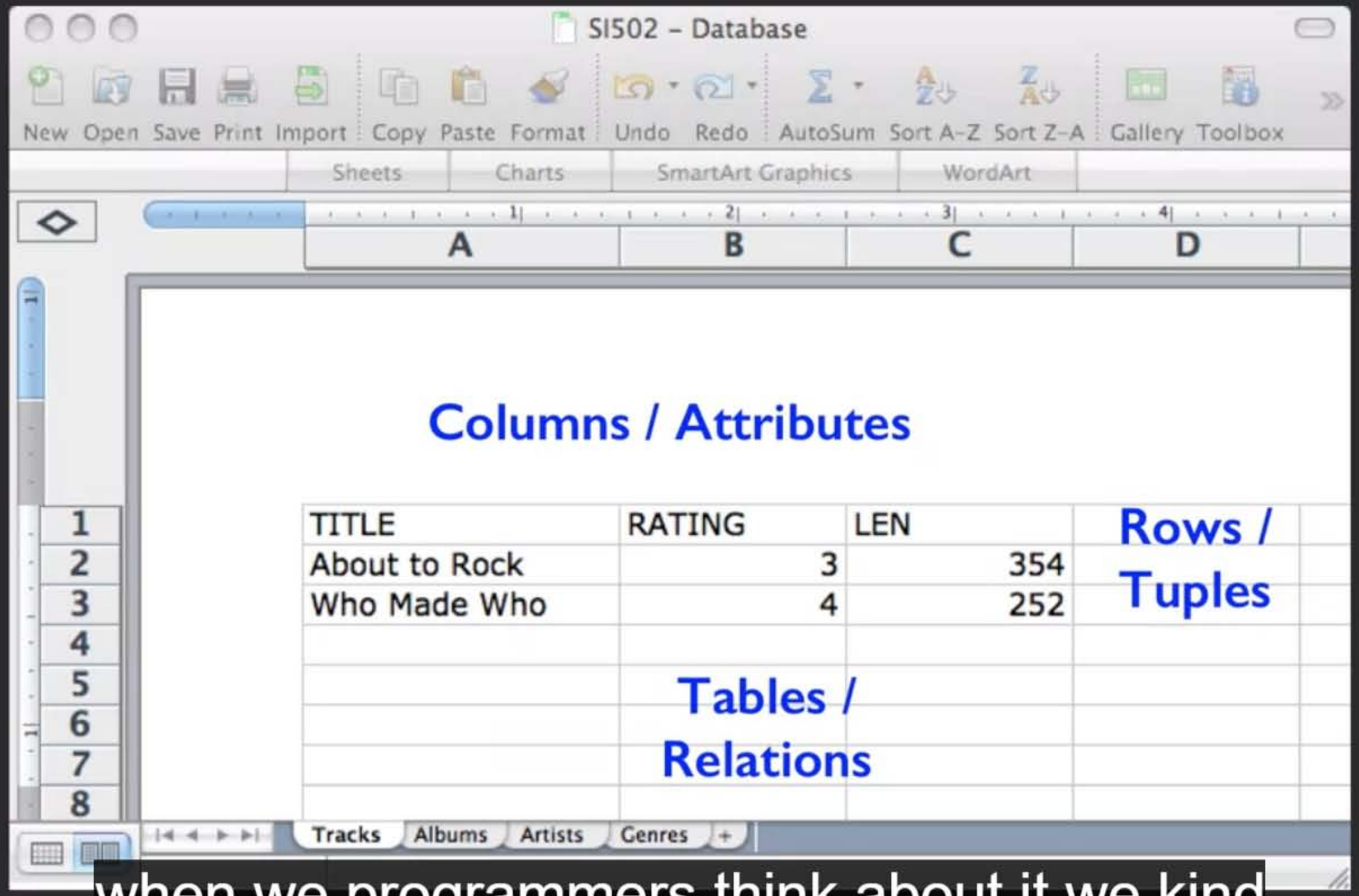
Terminology

- Database - contains many tables
- Relation (or table) - contains tuples and attributes
- Tuple (or row) - a set of fields that generally represents an "object" like a person or a music track
- Attribute (also column or field) - one of possibly many elements of data corresponding to the object represented by the row

in some of the terminology that some
people use to describe databases.



A relation is defined as a set of tuples that have the same attributes. A tuple usually represents an object and information about that object. Objects are typically physical objects or concepts. A relation is usually described as a table, which is organized into rows and columns. All the data referenced by an attribute are in the same domain and conform to the same constraints.
(Wikipedia)



when we programmers think about it we kind of think about it as rows and columns.

SQL

- **Structured Query Language** is the language we use to issue commands to the database
  - Create a table
  - Retrieve some data
  - Insert data
  - Delete data

http://en.wikipedia.org/wiki/SQL

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UPDATE CRUD

So that's a database term. SQL