Assignments up to 1129
You asked for it, you got it: this is your opportunity to design and build a database application as a RESTful web service, from the ground up. This assignment is also unusual because it is set up as a sequence of 4 distinct milestones, staged roughly one week apart. Of course, the staging of the work is not strict; you will likely go back and forth through this cycle as the software evolves.

Outcomes
This assignment will affect your proficiency measures for outcomes 1a–1c, 3b–3d, and 4a–4f. Same ones as the last two assignment—you can see here how all of these come together to build your case for your proficiencies.

Background Reading
The big addition due to doing things from the ground up is database design. Thus, you’ll want to take a look at Chapter 7 and 8 of Silberschatz/Korth/Sudarshan for reference.

For Submission
Milestone 1030: Application Project Name and Repository
Decide on a project name and set up its repository, along with collaborators and initial documentation.

Milestone 1101: Database Design, Service URI Contract, Distribution of Labor
Submit individual proposed database designs and service URI contracts. We will then merge the proposals into one final, true form.

Milestone 1106: Technology Stack Setup
Put together a full technology stack source tree. It should successfully build a test-driven, deployable artifact. Stub-laden and feature-incomplete, maybe, but still test-driven and deployable.

Milestone 1108: Domain Objects
Define the domain objects required by the database application. These objects should generally reflect what was expressed in the 1101 database design and URI contract, but may also revise those based on what might be discovered while the code is actually being written.

Milestone 1115: Interfaces, Test Fixtures, Unit Tests, Some Implementation
Finish defining the interfaces required for the application, along with a test fixture and accompanying unit tests. Mocks may be used to facilitate successful testing without a full implementation (yet).

Milestone 1129: Full Implementation
Finally, fill in the blanks. Everything in the current URI contract should run correctly, with good test coverage and documentation.