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CIS 310 Chapter 5 Group Project

This is a small group project and you need to get in a group of 4 or 5 to form your team. Create two completed ERDs using Visio in Crow's Foot notation using the information provided to you in Problem 2 on page 154, Problem 4, and Problem 5 on page 155 of your textbook. Identify all of the main entities and attributes. Write all appropriate connectivities and cardinalities in the ERD using the business rules that are given to you in each problem.  Create your ERD using standardized naming convention. Screen shot of each ERD and paste into Word and submit it individually via Blackboard. Also, I will need you to complete the attached "Peer Evaluation" form. Please be fair and objective with your assessment of yourself as well as your team members.

2. Given the following business scenario, create a Crow’s Foot ERD using a specialization hierarchy if appropriate. Tiny Hospital keeps information on patients and hospital rooms. The system assigns each patient a patient ID number. In addition, the patient’s name and date of birth are recorded. Some patients are resident patients who spend at least one night in the hospital, and others are outpatients who are treated and released. Resident patients are assigned to a room. Each room is identified by a room number. The system also stores the room type (private or semiprivate) and room fee. Over time, each room will have many patients. Each resident patient will stay in only one room. Every room must have had a patient, and every resident patient must have a room.

4. In [Chapter 4](javascript://), you saw the creation of the Tiny College database design, which reflected such business rules as “a professor may advise many students” and “a professor may chair one department.” Modify the design shown in [Figure 4.35](javascript://) to include these business rules:

* + An employee could be staff, a professor, or an administrator.
  + A professor may also be an administrator.
  + Staff employees have a work-level classification, such as Level I or Level II.
  + Only professors can chair a department. A department is chaired by only one professor.
  + Only professors can serve as the dean of a college. Each of the university’s colleges is served by one dean.
  + A professor can teach many classes.
  + Administrators have a position title.

Given that information, create the complete ERD that contains all primary keys, foreign keys, and main attributes.

5. Tiny College wants to keep track of the history of all its administrative appointments, including dates of appointment and dates of termination. (*Hint:* Time-variant data is at work.) The Tiny College chancellor may want to know how many deans worked in the College of Business between January 1, 1960, and January 1, 2018, or who the dean of the College of Education was in 1990. Given that information, create the complete ERD that contains all primary keys, foreign keys, and main attributes.