A3_Spencer_Rosenvall_phy_des **PK = Primary Key** FK = Foreign Key Student D = Domain enrolled_in + StudentId (PK, D:Student, NN) NN = Not Null + FirstName (D: Student) + LastName (D: Student) Many Optional to Many Optional + EnrolledClassIds (multi, D: Student) Class + ClassId (PK, D: Class, NN) + InstructorId (FK. D: Instructor, NN) + SectionIds (multi, D: Section) + StudentIds (multi D: Student) section_of 1 Mandatory to Many Optional Section + SectionId (PK, D: Section, NN) + ClassId (FK, D: Class, NN) + AssignmentIds (multi, D: Assignment) + Title (D: Section)

Key

Question 1 Answers:

- 1. Student Table: Doesn't contain any transitive dependencies and qualifies as Second Normal (N2) form, therefore it is in Third Normal (N3) form.
- 2. Class Table: Doesn't contain any transitive dependencies and qualifies as Second Normal (N2) form, therefore it is in Third Normal (N3) form.
- 3. Section Table: Doesn't contain any transitive dependencies and qualifies as Second Normal (N2) form, therefore it is in Third Normal (N3) form.

Question 2 Answers:

- 1. Primary Keys indicated
- 2. Foregin Keys Indicated.
- 3. Domains Indicated.
- 4. Constriants Indicated.
- 5. No Associative Table created.

Question 3 Answers:

Student(StudentId, FName, LName, University)

Now I'd split it into two based on which university the student attends, because there may be multiple specific attributes depending on the university, and then we can drop the University column.

WeberStudent (WNumber, Fname, LName) & UofUStudent(UNumber, FName, LName)