

The (cross-section of the) college database discussed in lecture 7 is repeated here.

Relation	Attributes	Primary Key	Foreign Key
Student	{Stud#, StudFName, StudLName, StudSex, StudAddr, StudPgm#, StudHall#, StudDoB ...}	[Stud#]	StudPgm# references AcademicProgram.Pgm# StudHall# references Hall.Hall#
AcademicProgram	{Pgm#, PgmName ...}	[Pgm#]	None
Hall	{Hall#, HallName ...}	[Hall#]	None
Department	{Dept#, DeptName, DeptHead#, DeptDiv#}	[Dept#]	DeptHead# references Staff.Staff# DeptDiv# references Division.Div#
Staff	{Staff#, StaffName, StaffDept# ...}	[Staff#]	None
Course	{Crs#, CrsName, CrsDept# ...}	[Crs#]	None
Pgm_Struct	{PSPgm#, PSCrs#, PSCrsSeqn}	[PSPgm#, PSCrs#]	PSPgm# references AcademicProgram.Pgm# PSCrs# references Course.Crs#
Division	{Div#, DivName, DivHead# ...}	[Div#]	DivHead# references Staff.Staff#

Each relation and each attribute would need additional clarification prior to database construction and table creation.

1. Based on the principles of database design discussed in lectures 4 and 5, construct an ESG of the college database for the entities specified above. [50]
2. Write SQL statements to create these tables in your schema of the class database. You may add additional attributes to the structure of each database table as you deem appropriate. Store these statements in an SQL script file. [40]
3. Use your SQL script file to create the tables in the class database. [16]
4. Populate your tables with sample data (at least six records per table). [16]

**Note:** Your sample data must reflect the interrelatedness among various relations in the database. You will submit your SQL script file which must have syntactically correct SQL statements. As part of the evaluation, your database schema will be checked for these tables.

**Total Possible Points: 112**