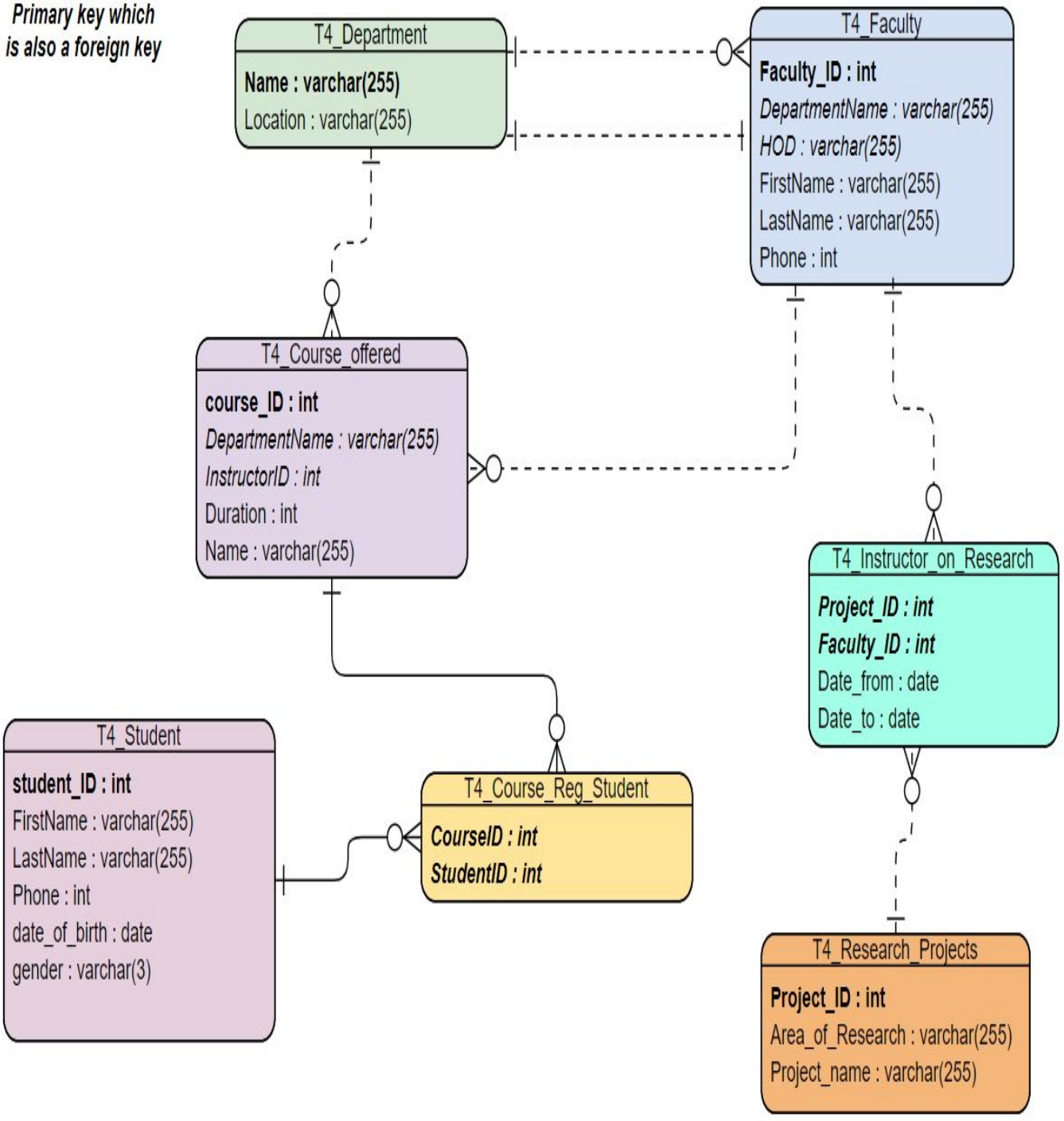
Bold: Primary key
Italics: Foreign Key
Bold+Italics:
Primary key which
is also a foreign key



EXPLANATION OF ER DIAGRAM:

Entity Name	Attributes	Primary Key	Foreign Key	Relationship	Entity Type
T4_Department	>Name >Location	Name	----------	T4_ Faculty (One to many) T4_ Faculty (One to one) T4_Course (One to many)	Strong entity because each department name is unique, has a primary key. Also it is not dependent on any other attribute.
T4_Faculty	>Faculty_ID >DepartmentName >HOD >FirstName >LastName >Phone	Faculty_ ID	>DepartmentName >HOD	T4_Department (Many to one) T4_Department (One to one) T4_Course_offered (One to many) T4_Instructor_on_Research (one to many)	Strong entity because each instructor id is unique, has a primary key.
T4_Course_ offered	>Course_ID >DepartmentName >InstructorID >Duration >Name	Course_ ID	>DepartmentName >InstructorID	T4_Department (Many to one) T4_Faculty (Many to one) T4_Course_Reg_Student (one to many)	Strong entity because each course id is unique.
T4_Student	>ID >FirstName >LastName >Phone >date_of_birth >gender	ID	----------	T4_Course_Reg_Student (One to many)	Strong entity because each student id is unique.

T4_Course_Reg_Student	>CourseID >StudentID	>Course ID >Student ID	>CourseID >StudentID	T4_Course_offered (Many to one) T4_Student (Many to one)	Weak entity because it isn't unique (each student can have multiple courses and vice versa) and is dependent on T4_Student
T4_Instructor_on_Research	>ProjectID >Faculty_ID >Date_from >Date_to	>Project ID >Faculty_ID	>ProjectID >Faculty_ID	T4_Faculty (Many to one) T4_Research_Projects (Many to one)	Weak entity because it isn't unique (each faculty can have multiple projects and vice versa). Also doesn't have a primary key.
T4_Research_Projects	>Project_ID >Area_of_Research >Project_name	Project_ID	----------	T4_Instructor_on_Research (One to many)	Strong entity because each project id is unique, and has a primary key..