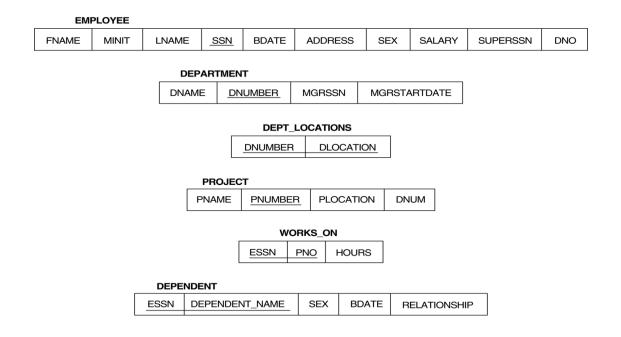
## Course No: IS211 Semester: Summer 2014 Assignment 2: Relational Algebra

Total grade 10 scaled to 5 Deadline: 23-08-2014

Based on the below database schema, write the relational algebra expression for the following queries:



- 1. Find the names of all employees who are directly supervised by 'Franklin Wong'.
- 2. For each project, list the project name and the total hours per week (by all employees) spent on that project.
- 3. Retrieve the names of all employees who work on every project.
- 4. Retrieve the names of all employees in department 5 who work more than 10 hours per week on the Product X project.
- 5. List the names of all employees who have a dependent with the same first name as themselves.
- 6. Retrieve the names of all employees who do not work on any project.
- 7. Find the names and addresses of all employees who work on at least one project located in Houston but whose department has no location in Houston.

- 8. List the last names of all department managers who have no dependents.
- 9. For each department, retrieve the department name and the average salary of all employees working in that department.
- 10. Retrieve the average salary of female employees.