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Homework 6

Given schema:

Emp(<u>eid</u>, ename, addr, sal, age, yrs, deptid) Dept(did, dname, floor, budget)

Queries and suggested indexes:

1. List the id, name, and address of employees who work in the department with a user-specified department name

Users will be selecting employees using a department's name (not department's id). For this query, it would be best to create a hash index on <Dept.dname>, which will return the desired deptid. Then a separate hash index on <Emp.deptid> to return and list the attributes of the employees.

2. List the id and address of employees with a user-specified name

Simply create a hash index on <Emp.ename>.

3. List the overall average salary for employees

Index on <Emp.sal>

4. List the avg sal for employees (based on their age)

Since we want employees to be grouped by age, it would be the best candidate for clustering. Create clustered tree index <Emp.age>

5. List all the department info, ordered by department floor numbers

This is similar to the previous query, create clustered tree index <Dept.floor>