

Module 3 – Questions 10 and 11

Question 10: What is the average GPA by degree type?

This query computes the average GPA for each degree category (e.g., Masters, PhD). It groups applicants by degree and calculates the mean GPA for each group, providing insight into GPA differences across degree paths.

SQL Query Logic:

```
SELECT degree, ROUND(AVG(gpa)::numeric, 2)
FROM applicants
WHERE gpa IS NOT NULL
GROUP BY degree;
```

Question 11: What percentage of applicants were accepted overall?

This query calculates the overall acceptance rate by dividing the number of accepted applications by the total number of applications. The result is expressed as a percentage to two decimal places.

SQL Query Logic:

```
SELECT ROUND(
    100.0 * SUM(CASE WHEN status ILIKE 'accepted%' THEN 1 ELSE 0 END)
    / COUNT(*),
    2
)
FROM applicants;
```