Republic of the Philippines
BICOL UNIVERSITY POLANGUI
Polangui, Albay
https://www.bicol-u.edu.ph/
email: bupc-dean@bicol-u.edu.ph

Insight Documentation

Total Credits Earned by Each Student

```sql
Total Credits Earned by Each Student (SUM)

SELECT
    s.StudentID,
    CONCAT(s.firstname, ' ', s.lastname) AS StudentName,
    SUM(c.credits) AS TotalCredits
FROM
    student s
JOIN
    course c ON s.CourseID = c.CourseID
JOIN
    enrollment e ON s.StudentID = e.StudentID
WHERE
    e.status = 'Completed'
GROUP BY
    s.StudentID
HAVING
    SUM(c.credits) > 0
ORDER BY
    TotalCredits DESC;

```

We used a query that sums up the total number of academic credits earned by each student, based on completed courses. This gives a clear picture of student progress. Students who have earned the most credits are likely on track to graduate or are outperforming in terms of workload. This information is useful for identifying top-performing students who may be eligible for honors or academic recognition.

Result Grid | Filter Rows: | Export: | Wrap Cell Content: | Fetch rows:

StudentID	StudentName	TotalCredits
279	Avery Sanchez	27
48641	Andrea Griffith	27
13780	Sherri Gibson	27
106408	Milan Mcgee	27
23271	Joseph Martinez	27
99377	Fred Huff	27
18859	Jamel Hendrix	27
91985	Aria Moore	27
51711	Gayle Wiley	27
37906	Oliver Wilson	27
108408	Leopoldo Guerra	27
52843	Omar Daniels	27
50258	Jayne Sutton	27
74434	Camille Coffey	27
103902	Avery Garcia	27
81702	Wilber Montes	27

Number of Students Enrolled Per Course

```sql
Number of Students Enrolled Per Course (COUNT)

SELECT
    c.courseName,
    COUNT(e.StudentID) AS TotalStudents
FROM
    course c
JOIN
    enrollment e ON c.CourseID = e.CourseID
GROUP BY
    c.CourseID
ORDER BY
    TotalStudents DESC;

```

This query counts how many students are enrolled in each course. The results help highlight which courses are the most and least popular. High-enrollment courses might need larger class sizes or additional sections, while low-enrollment courses could benefit from review—either in terms of curriculum, scheduling, or promotion to students.

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

courseName	TotalStudents
Bachelor of Science in Computer Science	7634
Bachelor Of Science in Information System	7595
Bachelor of Science in Information Technology ...	7555
Bachelor of Science in Information Technology	7515

Average Grade Per Subject

```
37  Average Grade Per Subject (AVG)
38
39  SELECT
40      sub.SubjectName,
41      AVG(CASE WHEN g.remarks = 'Passed' THEN 1 ELSE 0 END) AS AvgGrade
42  FROM
43      grades g
44  JOIN
45      subject sub ON g.SubjectID = sub.SubjectID
46  GROUP BY
47      sub.SubjectID
48  HAVING
49      COUNT(g.GradeID) > 5 -- Only subjects with more than 5 grades
50  ORDER BY
51      AvgGrade DESC;
52
```

We also calculated the average pass rate for each subject. To ensure accuracy, only subjects with more than five recorded grades were included. This helps identify subjects where students tend to perform well versus those where they struggle. It could be an early signal for reviewing teaching strategies or offering extra support for certain classes.

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

SubjectName	AvgGrade
Ethics	0.8026
Professional Issues in Inforamation System	0.8021
Data Structure and Algorithms	0.8018
Computer Programming 1	0.7997
Fundamentals of Programming	0.7984
Environemental Science	0.7980
Web System	0.7932
Computer Programming 2	0.7905

Faculty Members with the Most Enrolled Students

```
54  Faculty Members with Most Enrolled Students (JOIN + COUNT)
55
56  SELECT
57      f.FacultyID,
58      CONCAT(f.firstname, ' ', f.lastname) AS FacultyName,
59      COUNT(e.StudentID) AS TotalStudents
60  FROM
61      faculty f
62  JOIN
63      subject sub ON f.SubjectID = sub.SubjectID
64  JOIN
65      classschedule cs ON sub.SubjectID = cs.subjectID
66  JOIN
67      enrollment e ON cs.CourseID = e.CourseID AND e.StudentID = cs.StudentID
68  GROUP BY
69      f.FacultyID
70  ORDER BY
71      TotalStudents DESC
72  LIMIT 12;
```

This query focused on faculty engagement by counting how many students are associated with each instructor. Faculty with high student counts may be teaching popular subjects or handling large class sizes. This data can help balance workloads and also highlight faculty who might be candidates for additional support or recognition.

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

FacultyID	FacultyName	TotalStudents
12	Vince Angelo Naz	283
22	Joseph Carinan	283
14	Paulo Perete	274
23	Arnold Platon	274
16	Maria Charmy Arispe	268
19	Khristine Botin	265
13	Jerry Agsunod	259
17	Blessica Dorosan	259
20	Jorge Sulpicio Aganan	259
15	Red Guillermo	258
21	Mary Antoniette Ariño	258
18	Suzanne Causapin	258

Students Who Failed More Than One Subject

```
74    Students Who Failed More Than One Subject
75
76    SELECT
77        s.StudentID,
78        CONCAT(s.firstname, ' ', s.lastname) AS FullName,
79        COUNT(*) AS FailedSubjects
80    FROM
81        grades g
82    JOIN
83        student s ON g.StudentID = s.StudentID
84    WHERE
85        g.remarks = 'Failed'
86    GROUP BY
87        s.StudentID
88    HAVING
89        COUNT(*) > 1;
```

Finally, we identified students who failed more than one subject. This list can be used by academic advisors or support staff to check in with those students and provide guidance, tutoring, or other interventions before issues become worse.

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

StudentID	FullName	FailedSubjects
10630	Bud Anderson	2
68425	Kristina Valentine	2
58900	Olivia Hernandez	3
16919	Emma Jones	2
25195	Elijah White	2
74813	Percy Shelton	2
44038	Mason Torres	2
51512	Darlene Guerrero	2
76199	James Martin	2
13021	Mila Lopez	2
88098	Amelia Smith	2
17678	Jimmie Jacobson	2
20015	Sebastian Nguyen	2
4575	Kristine Potter	2
61016	Aria Moore	2
40697	Lolita Bartlett	2

Suggested Dashboard Elements

- **Bar chart** for top students by total credits earned
- **Pie or bar chart** for enrollment distribution across courses
- **Column chart or heatmap** for average pass rates by subject
- **Faculty leaderboard** showing those with the most student enrollments
- **Filterable table** of students at academic risk (failed more than one subject)