

DYNAMO CONSULTING STUDENTS

DATABASE CREATION AND ANALYSIS

GOAL OF THE DYNAMO CONSULTING PROJECT

The purpose of this project is to create a student database for my IT school(Dynamo Consulting),populate the tables in the database accordingly and subsequently analyse the available data. The analysis would help to provide some great insights about the state of the business(Dynamo Consulting) and help with guided decision making. The project would help the company know its areas of strengths and the aspects of the business that require urgent attention and improvements.

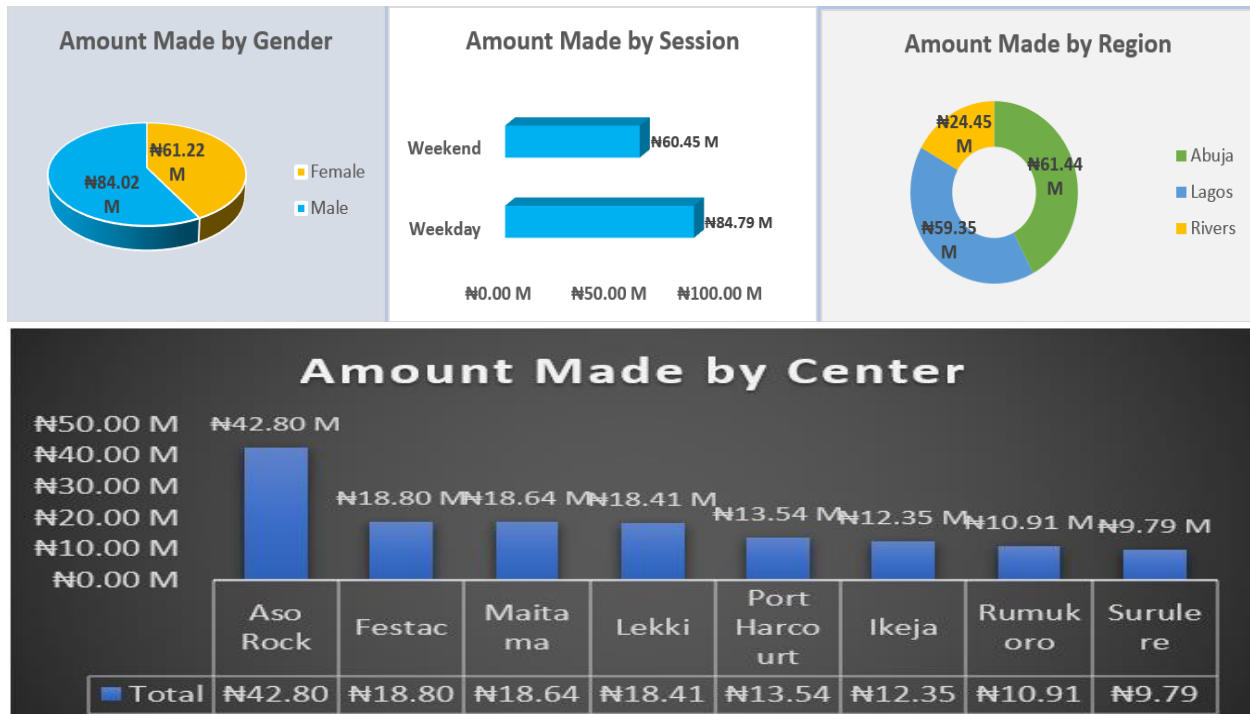
TOOLS USED FOR ANALYSIS AND VIZUALIZATION :

- **MySQL** to create the database and its children table
- **Microsoft Excel**(Power Point) for creation of data models and relationships between tables.
- **Microsoft Excel** for Data Analysis and Visualizations

BRIEF DESCRIPTION OF THE DATA SET :

In order to have a well structured data,a relational database was created using MySQL .The database comprises 5 tables which are connected based on primary/foreign key relationships.Although the 5 tables were created in MySQL,they were exported into Microsoft Excel for analysis and visualization.

WHAT ARE THE REVENUE FIGURES FOR THE BUSINESS?



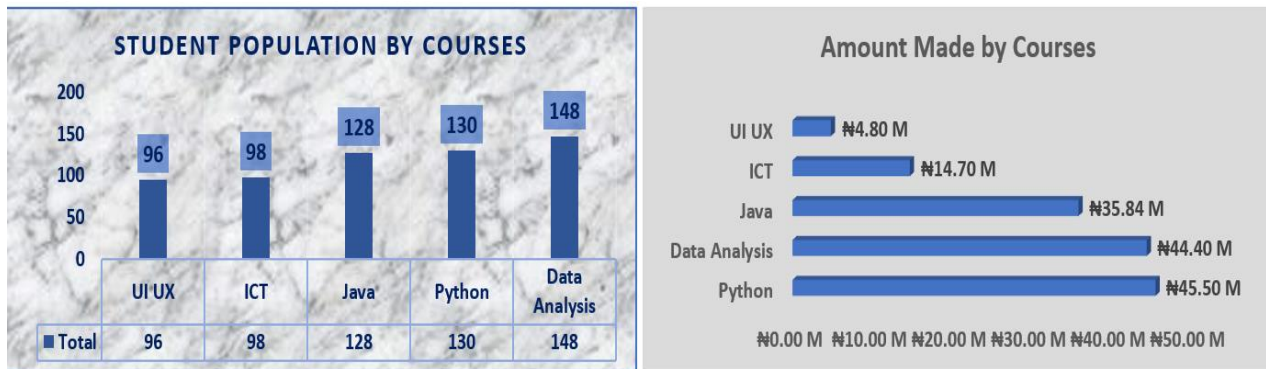
The above shows that a revenue of #84.02 M was made from male students while a lesser revenue of #61.22 M was made from the female students.

Based on sessions, it can be seen that there is a revenue of #84.79 M from the weekday session while the weekend session generated a lesser revenue of #60.45 M.

It can be inferred from above that Abuja region is the highest revenue generating region while the lowest revenue came from the Rivers region.

The Aso Rock center produced the highest revenue of #42.80 M and the lowest value came from the Surulere center with a value of #9.79 M. Efforts should be made on advertisements to create more awareness for poorly performing centers and perhaps discounts can be offered to boost sales.

WHAT ARE THE REVENUES AND STUDENT'S ENROLMENT FOR THE DIFFERENT COURSES?

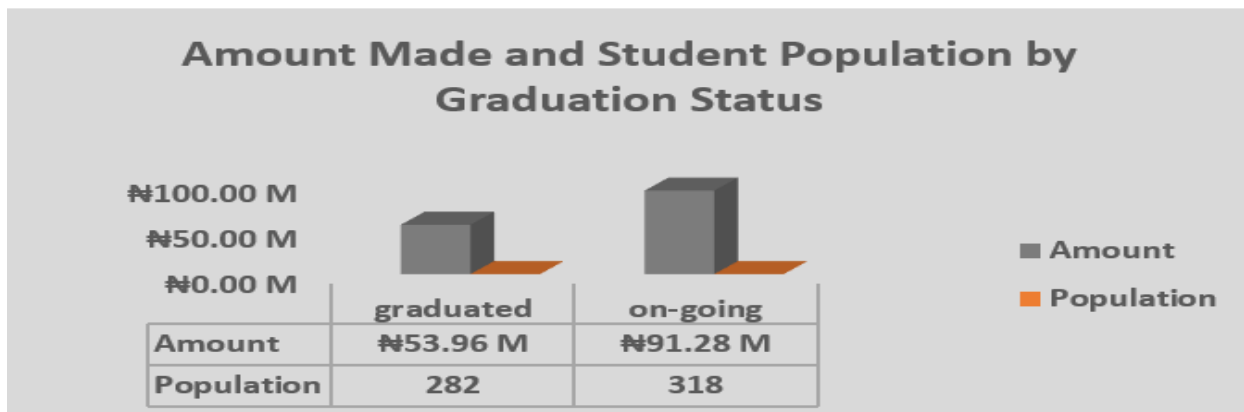


The highest student enrolment is in Data Analysis with 148 students and the lowest enrolment is in UI UX with 96 students.

Also, the highest revenue was from Python with a value of #45.50 M while UI UX produced the lowest revenue value of #4.80 M.

The company should look into ways to improve sales on the poorly performing courses (UI UX and ICT) - perhaps by promotional sales or better pricing system.

HOW DOES THE FIGURES OF THE PRESENT STUDENTS COMPARE WITH THOSE OF THE GRADUATED STUDENTS?

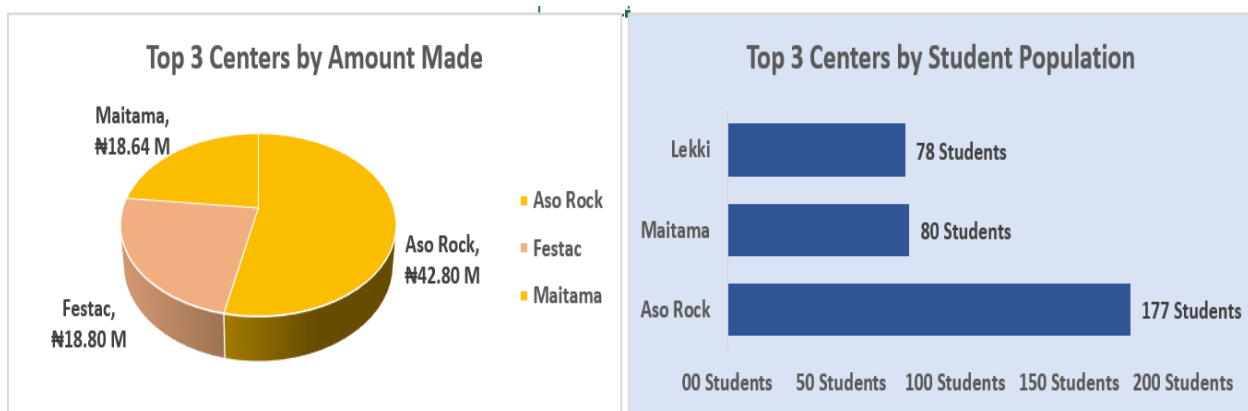


As at the time of the analysis, 282 students have finished their programs while 318 are still running their programs - this means 47% of the students have graduated while 53% are still on-going.

Also, about 37% of the total revenue is from the students that have graduated One key insight from the above is that strategic efforts ought to be made to promptly round up the on-going programs and commence new cohorts for the different courses in order to keep the cashflow coming in.

NB: The value from the above visual is bound to change from time to time depending on the day you run the analysis as it makes use of a dynamic function(=IF([enddate] >=TODAY(),"on-going","graduated")) in its creation.

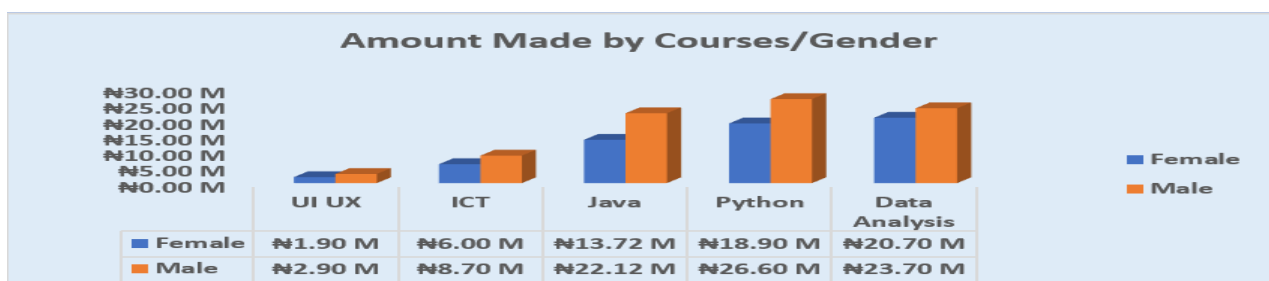
WHICH CENTERS ARE THE TOP PERFORMING CENTERS?



The Aso rock centers led both in population and revenue and this shows a good running of the center. Although the Festac and Maitama center both occupy the second and third place respectively in revenue, a lot needs to be done as both of them put together are not up to the Aso Rock center.

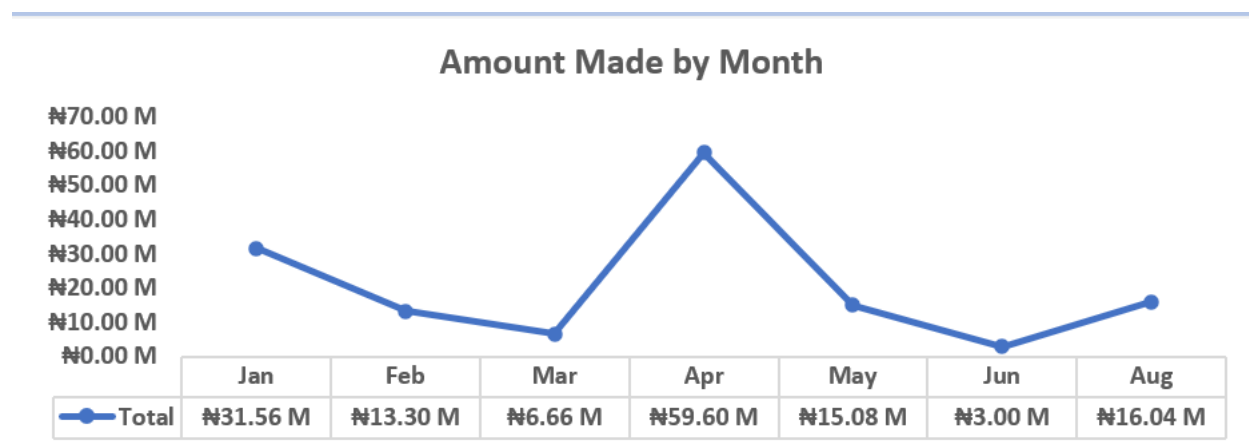
In the same vein, the bottom half centers need to do a better job to boost their revenues which are really low when compared to the top half.

HOW DOES THE COURSE REVENUES VARY WITH STUDENT GENDER?



Although some other underlying factors may be responsible for the revenue from the various courses offered at Dynamo Consulting – the available data shows that male gender generated higher revenue for all the courses. The school may need to work on strategies to reach out to prospective female students and perhaps offer higher discounts for the female gender to encourage them and at the same time boost the company's overall sales.

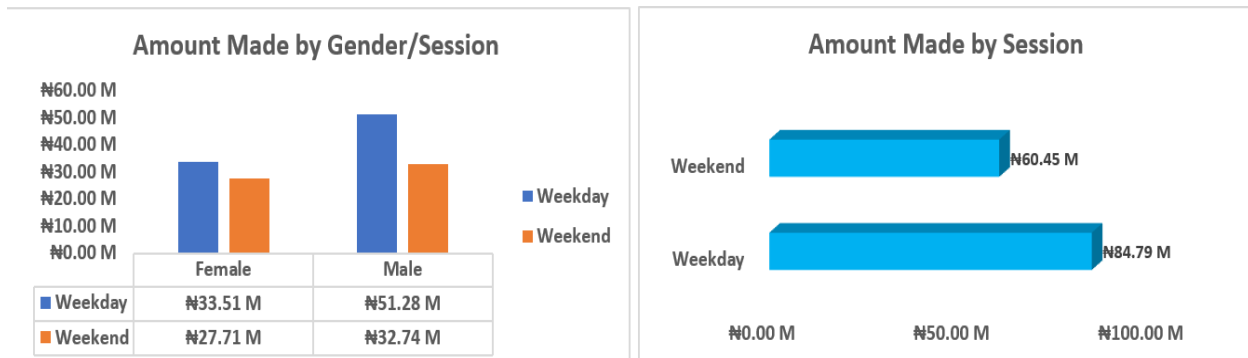
HOW DOES THE SALES VARY ACROSS THE MONTHS?



The sales made by Dynamo Consulting does not have a stable trend that it followed as it goes up and down across the months covered by the dataset. The month of April had the highest sales of #59.60 M while the lowest sales of #3.00 M was recorded in June. A further look into the sales of the 8 centers across the months covered in the dataset showed that some centers didn't have enrolments for some months.

The school can work on having some programs run concurrently and do a better job on strategic scheduling of the programs so that the cashflow can be more consistent and the overall sales can be increased.

WHICH SESSION HAS HIGHER REVENUE?



The visual above shows that higher revenue of #84.79M was made from the weekday session while only #60.49M came from the weekend session. The company may need to consider offering discounted sales for the weekend session and also do more work on creating awareness for the availability of the weekend session in order to boost sales from it.

SOME CALCULATIONS CREATED FOR BETTER ANALYSIS

There are some fields that were needed for proper analysis and visualization but were not explicitly available and they had to be created manually using some analytics functions(formulae).

The first one is IF function that was created to categorize students based on the completion time of their programs.

The IF formula used is as shown below:

=IF([enddate] >=TODAY(),"on-going","graduated")

The second one is the FORMAT function that was used to generate the abbreviated month name from the [startdate] column. The formula used is as shown below:

=FORMAT([startdate],"MMM")

IMPORTANT MEASURES IN THE ANALYSIS

