

Consumer Goods Ad Hoc Insights



CONTENTS

01

Objectives

Here you could describe
the topic of the section

02

Problem Statemetnet

Here you could
describe the topic of
the section

03

Body

Here you could describe
the topic of the section

04


Conculsion

Here you could describe
the topic of the section





Objective

- Atliq Hardwares are focused on increasing revenue by improving product strengths and creating in-demand products.
 - Atliq Hardwares are focused on increasing revenue by improving product strengths and creating in-demand products.
 - The Company seeks Insights for ad hoc requests.
- 



Problem Statement

Atliq Hardware is a leading manufacturer of computer hardware in India and other nations, but it struggles to make prompt and wise choices based on data. The management intends to add more junior data analysts to the data analytics team. Tony Sharma, the head of data analytics, conducts a SQL challenge to identify applicants with both technical and soft skills.



Company Details

- Atliq is a hardware company which manufactures and sells various electronic items such as personal computer's/mouse/printers and sell to different customers such as Croma/Best Buy/Flipkart/Staples(Online Stores) which can further be bought by consumers.
- Atliq hardware follows September-August Fiscal year patter i.e. Fiscal year 2021 started in August 2020 and ended in September 2021 📅

Data-Driven Decision making: Data should be the key aspect in making various decisions for the business.

DATA & REQUESTS



Codebasics SQL Challenge

Requests:

1. Provide the list of markets in which customer "Atliq Exclusive" operates its business in the APAC region.
2. What is the percentage of unique product increase in 2021 vs. 2020? The final output contains these fields,
unique_products_2020
unique_products_2021
percentage_chg
3. Provide a report with all the unique product counts for each segment and sort them in descending order of product counts. The final output contains 2 fields,
segment
product_count
4. Follow-up: Which segment had the most increase in unique products in 2021 vs 2020? The final output contains these fields,
segment
product_count_2020
product_count_2021
difference
5. Get the products that have the highest and lowest manufacturing costs. The final output should contain these fields,
product_code
product
manufacturing_cost

codebasics.io







6. Generate a report which contains the top 5 customers who received an average high pre_invoice_discount_pct for the fiscal year 2021 and in the Indian market. The final output contains these fields,
customer_code
customer
average_discount_percentage
7. Get the complete report of the Gross sales amount for the customer "**Atliq Exclusive**" for each month. This analysis helps to get an idea of low and high-performing months and take strategic decisions.
The final report contains these columns:
Month
Year
Gross sales Amount
8. In which quarter of 2020, got the maximum total_sold_quantity? The final output contains these fields sorted by the total_sold_quantity,
Quarter
total_sold_quantity
9. Which channel helped to bring more gross sales in the fiscal year 2021 and the percentage of contribution? The final output contains these fields,
channel
gross_sales_mln
percentage
10. Get the Top 3 products in each division that have a high total_sold_quantity in the fiscal_year 2021? The final output contains these fields,
division
product_code

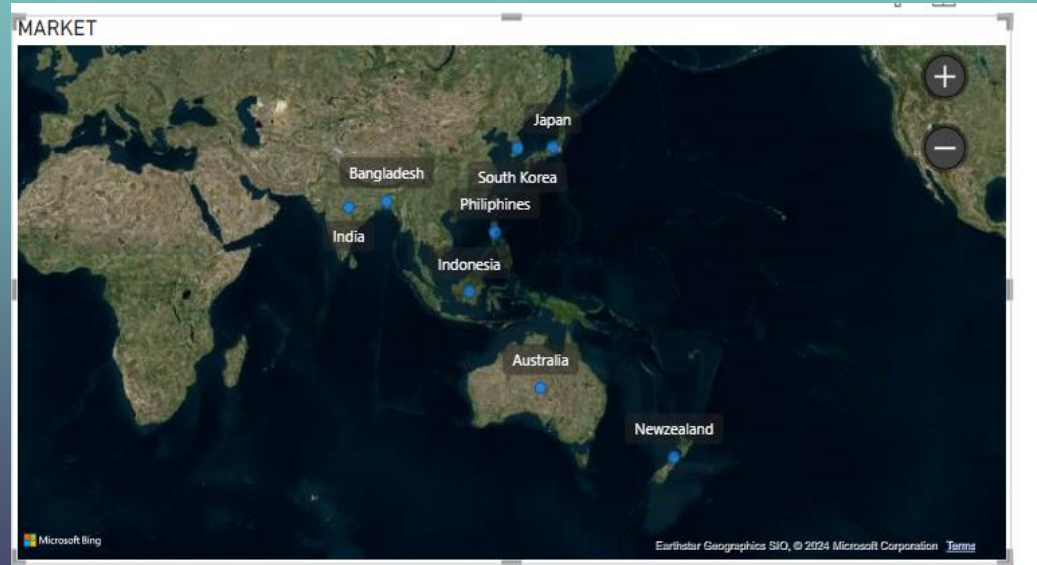
codebasics.io

Provide the list of markets in which customer "Atliq Exclusive" operates its business in the APAC region.

SQL OUTPUT



Result Grid			 Filter Rows:	
	MARKET			
	Australia			
	Bangladesh			
	India			
	Indonesia			
	Japan			
	Newzealand			
	Philiphines			
	South Korea			

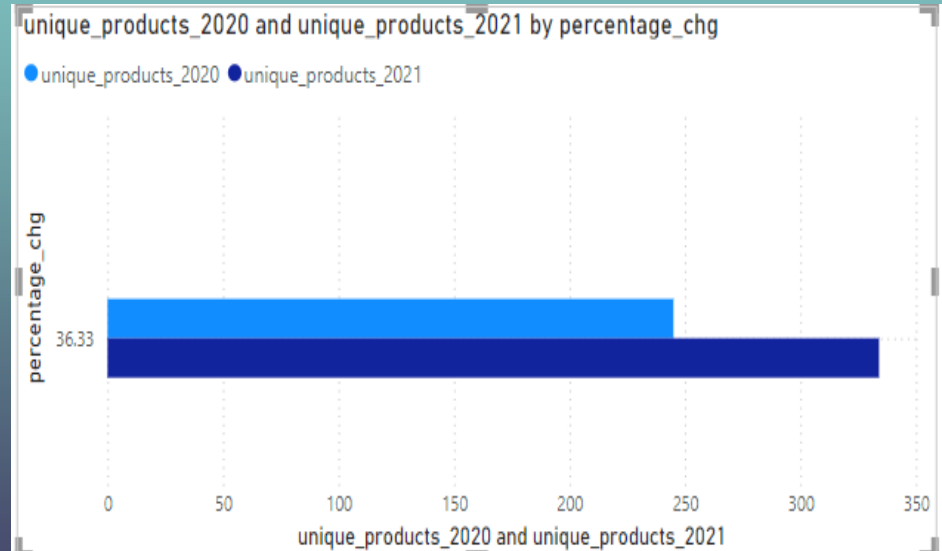


What is the percentage of unique product increase in 2021 vs. 2020? The final output contains these fields,

SQL OUTPUT



unique_products_2020	unique_products_2021	percentage_chg
245	334	36.33



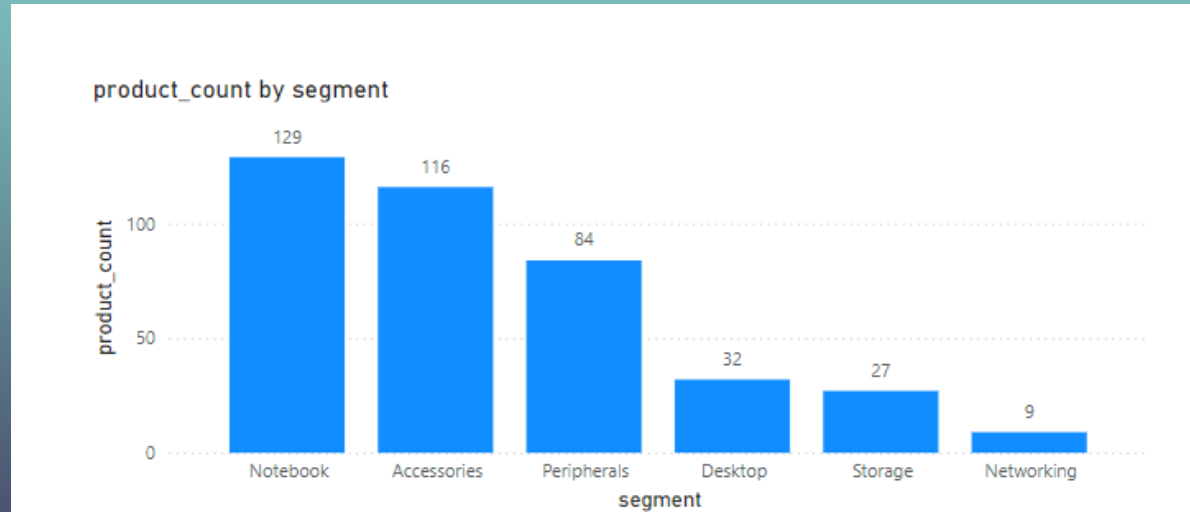
Percentage change is 36.33%
** Demand of product is increased

Provide a report with all the unique product counts for each segment and sort them in descending order of product counts.

SQL OUTPUT



Result Grid		Filter Rows:
segment	product_count	
Notebook	129	
Accessories	116	
Peripherals	84	
Desktop	32	
Storage	27	
Networking	9	



Notebook is Manufacturing significantly more than others

Which segment had the most increase in unique products in 2021 vs 2020?

SQL OUTPUT



Result Grid	Filter Rows:	Export:	Wrap Cell Content:
segment	product_count_2020	product_count_2021	difference
Accessories	69	103	34
Desktop	7	22	15
Networking	6	9	3
Notebook	92	108	16
Peripherals	59	75	16
Storage	12	17	5

segment	product_count_2020	product_count_2021	%difference
Accessories	69	103	38.20%
Notebook	92	108	17.98%
Peripherals	59	75	17.98%
Desktop	7	22	16.85%
Storage	12	17	5.62%
Networking	6	9	3.37%

Accessories is most increased product from 2020 to 2021

Get the products that have the highest and lowest manufacturing costs.

SQL OUTPUT



Result Grid			
Filter Rows:		Export:	Wrap
product_code	product	manufacturing_cost	
A6121110208	AQ HOME Allin1 Gen 2	263.4207	
A2118150101	AQ Master wired x1 Ms	0.8654	

Last product_code	manufacturing_cost
A6121110208	263.42
First product_code	manufacturing_cost
A2118150101	0.87

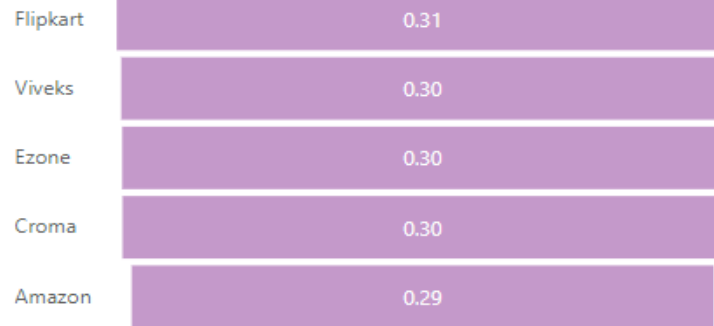
“AQ HOME Allin1 Gen 2” is highest manufacturing cost and “AQ Master wired x1 Ms” is lowest manufacturing cost

Generate a report which contains the top 5 customers who received an average high pre_invoice_discount_pct for the fiscal year 2021 and in the Indian market

SQL OUTPUT

Result Grid	Filter Rows:	Export:
customer_code	customer	average_discount_percentage
90002009	Flipkart	0.3083
90002006	Viveks	0.3038
90002003	Ezone	0.3028
90002002	Croma	0.3025
90002016	Amazon	0.2933



Average_discount_percentage by customer



“FlipKart is top 1 customer which having average high discount pct in India -2021

Get the complete report of the Gross sales amount for the customer “Atliq Exclusive” for each month. This analysis helps to get an idea of low and high-performing months and take strategic decisions.

SQL OUTPUT

Result Grid			 Filter Rows:	
	month	fiscal_year	Gross sales Amount	
	April	2020	6007493.5240	
	August	2020	8376236.5671	
	December	2020	43882482.1350	
	February	2020	11792179.4863	
	January	2020	14252643.8589	
	July	2020	11744639.3080	
	June	2020	9355713.1437	
	March	2020	9643465.8966	
	May	2020	10230609.2704	
	November	2020	70459845.4499	
	October	2020	44545756.1913	
	September	2020	41469135.7278	
	April	2021	9183069.6260	
	August	2021	11504213.6545	
	December	2021	68502464.7875	

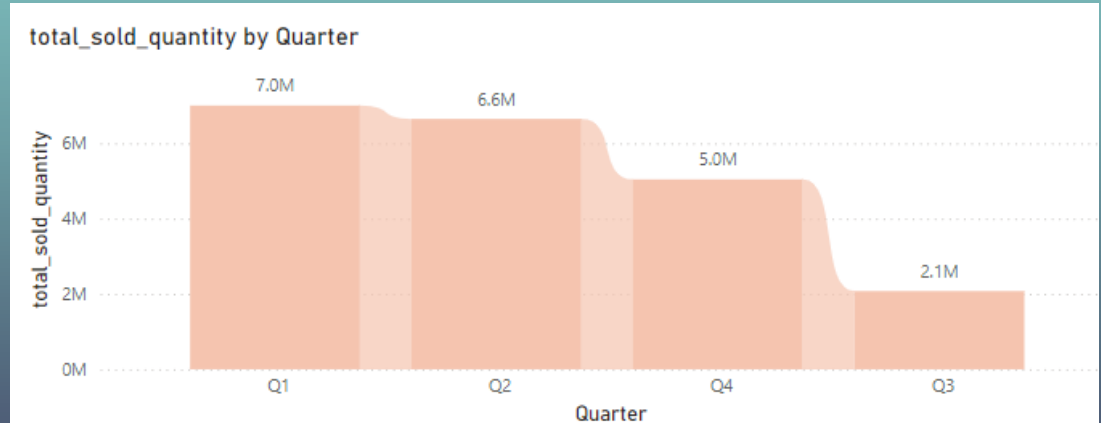
Gross Sales for fiscal year “2020”
is 281.1M

Gross Sales for fiscal year “2021”
is 428.3M

In which quarter of 2020, got the maximum total_sold_quantity?

SQL OUTPUT

Result Grid			Filter Rows:
	Quarter	total_sold_quantity	
▶	Q1	7005619	
	Q2	6649642	
	Q3	2075087	
	Q4	5042541	



Quarter1 is most sold quantity , significantly reduce the quantity of sold in FY 2020 by quarter

Which channel helped to bring more gross sales in the fiscal year 2021 and the percentage of contribution?

SQL OUTPUT

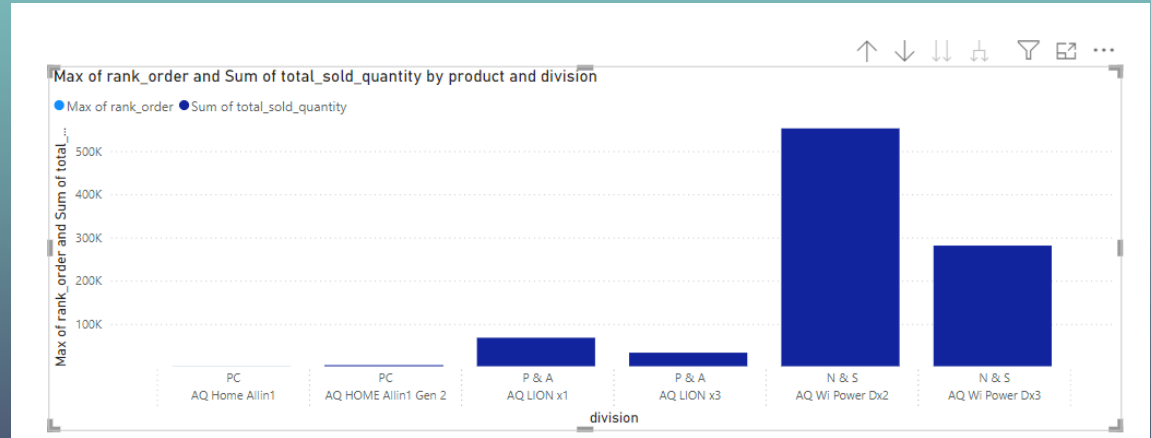
Result Grid			Filter Rows:
	channel	gross_sales_mln	
▶	Direct	797.97	
	Distributor	594.89	
	Retailer	3723.95	

Retailer has more gross sales than Distributors, which is three thousand Million sales differ and having 72.77% retailer ,11.6% Distributer sales

GET the Top 3 products in each division that have a high total_sold_quantity in the fiscal_year 2021?

SQL OUTPUT

Result Grid		Filter Rows:	Export:	Wrap Cell Content:	
	division	product_code	product	total_sold_quantity	rank_order
▶	N & S	A7219160201	AQ Wi Power Dx2	275328	1
	N & S	A7220160203	AQ Wi Power Dx2	277299	2
	N & S	A7321160301	AQ Wi Power Dx3	281363	3
	P & A	A3920150304	AQ LION x3	33523	1
	P & A	A3718150102	AQ LION x1	34022	2
	P & A	A3718150105	AQ LION x1	34080	3
	PC	A6018110106	AQ Home Allin1	2281	1
	PC	A6119110202	AQ HOME Allin1 Gen 2	2285	2
	PC	A6119110204	AQ HOME Allin1 Gen 2	2286	3



In Peripherals and Accessories division highest total sold quantity is 33523 and Networking and Storage division highest sold quantity is 275328 , Personal Computer division is 2281



THANK YOU