

Project Name: Sales Data analyst

Project description:

The goal of this project is to analyse sales data for sale outlet using SQL queries. The project helps managing director make better business decisions by tracking customer id, age, customer current city, sales profit and loss, customer demands for product, and facilities for employee and many more. By running different types of SQL queries, we can extract meaningful information such as best-selling products, customer purchase patterns, sale discount and total revenue. This project is ideal for showcasing SQL skills, including database design, data manipulation, and report generation. . The findings will help optimize sales strategies and enhance business and company growth.

1. Lead basic details:

- `SELECT current_city, COUNT(*) AS lead_count`

`FROM leads_basic_details`

`GROUP BY current_city`

`ORDER BY lead_count DESC;`

- `SELECT current_city, gender,`

`COUNT (*) AS gender_count`

`FROM leads_basic_details`

`GROUP BY current_city, gender`

`ORDER BY current_city, gender;`

- `SELECT current_city,`

`current_education,`

`COUNT(*) AS education_count`

FROM leads_basic_details

GROUP BY current_city, current_education

ORDER BY current_city, education_count DESC;

- SELECT *FROM leads_basic_details

WHERE current_education = 'Looking for Job';

- SELECT lead_gen_source, COUNT(*) AS source_count

FROM leads_basic_details

GROUP BY lead_gen_source

ORDER BY source_count DESC;

- SELECT current_city,

lead_gen_source,

COUNT (*) AS source_count

FROM leads_basic_details

GROUP BY current_city, lead_gen_source

ORDER BY current_city, source_count DESC;

- SELECT parent_occupation, COUNT(*) AS lead_count

FROM leads_basic_details

GROUP BY parent_occupation

ORDER BY lead_count DESC;

- SELECT parent_occupation,

AVG (age) AS avg_age

FROM leads_basic_details

GROUP BY parent_occupation;

- SELECT *FROM leads_basic_details

WHERE age > 100;

- SELECT *FROM leads_basic_details

WHERE lead_gen_source IS NULL OR lead_gen_source = '';

The screenshot shows the MySQL Workbench interface. The SQL Editor contains the following query:

```
1 SELECT *FROM leads_basic_details
2 WHERE
3 SELECT lead_gen_source, COUNT(*) AS source_count
4 FROM leads_basic_details
5 GROUP BY lead_gen_source
6 ORDER BY source_count DESC;
```

The Results window displays the following data:

| lead_gen_source | source_count |
|-----------------|--------------|
| user_referrals | 2 |
| social_media | 1 |

The Action Output window shows the execution progress of the query.

The screenshot shows the MySQL Workbench interface. The SQL Editor contains the following query:

```
1 SELECT *FROM leads_basic_details
2 WHERE current_education = 'Looking for Job';
3 SELECT lead_gen_source, COUNT(*) AS source_count
4 FROM leads_basic_details
5 GROUP BY lead_gen_source
6 ORDER BY source_count DESC;
```

The Results window displays the following data:

| lead_id | age | gender | current_city | current_education | parent_occupation | lead_gen_source |
|---------|-----|--------|--------------|-------------------|-------------------|-----------------|
| 1 | 25 | Male | New York | Looking for Job | Software Engineer | user_referrals |
| 2 | 30 | Female | Los Angeles | Looking for Job | Marketing Manager | social_media |

The Action Output window shows the execution progress of the query.

2. Leads demo watched details:

- SELECT language, COUNT(*) AS total_demos

FROM leads_demo_watched_details

GROUP BY language

ORDER BY total_demos DESC;

- SELECT language, AVG(watched_percentage) AS avg_watch_percentage

FROM leads_demo_watched_details

GROUP BY language

ORDER BY avg_watch_percentage DESC;

- SELECT demo_watched_date, COUNT(*) AS demos_watched

FROM leads_demo_watched_details

GROUP BY demo_watched_date

ORDER BY demo_watched_date;

- SELECT demo_watched_date, COUNT(*) AS demos_watched

FROM leads_demo_watched_details

GROUP BY demo_watched_date

ORDER BY demos_watched DESC

LIMIT 1;

- SELECT lead_id, demo_watched_date, language, watched_percentage

FROM leads_demo_watched_details

WHERE watched_percentage = 100;

- SELECT lead_id, demo_watched_date, language, watched_percentage

FROM leads_demo_watched_details

WHERE watched_percentage < 50;

- SELECT lbd.lead_id, lbd.current_city, lbd.current_education,

dwd.demo_watched_date, dwd.language, dwd.watched_percentage

FROM leads_basic_details AS lbd

JOIN leads_demo_watched_details AS d

ON lbd.lead_id = dwd.lead_id;

- SELECT lbd.current_city, AVG (dwd.watched_percentage) AS avg_watch_percentage

FROM leads_basic_details AS lbd

JOIN leads_demo_watched_details AS dwd

ON lbd.lead_id = dwd.lead_id

GROUP BY lbd.current_city

ORDER BY avg_watch_percentage DESC;

- SELECT *FROM leads_demo_watched_details

WHERE watched_percentage IS NULL OR watched_percentage = 0;

SELECT lbd.lead_id

FROM leads_basic_details AS lbd

LEFT JOIN leads_demo_watched_details AS dwd

ON lbd.lead_id = dwd.lead_id

WHERE dwd.lead_id IS NULL;

The screenshot shows the MySQL Workbench interface. The left sidebar displays the 'SCHEMAS' tree with 'class_project1' selected, showing tables like 'leads_basic_details', 'leads_demo_watched_details', and 'leads_interaction_details'. The main editor window contains the following SQL queries:

```

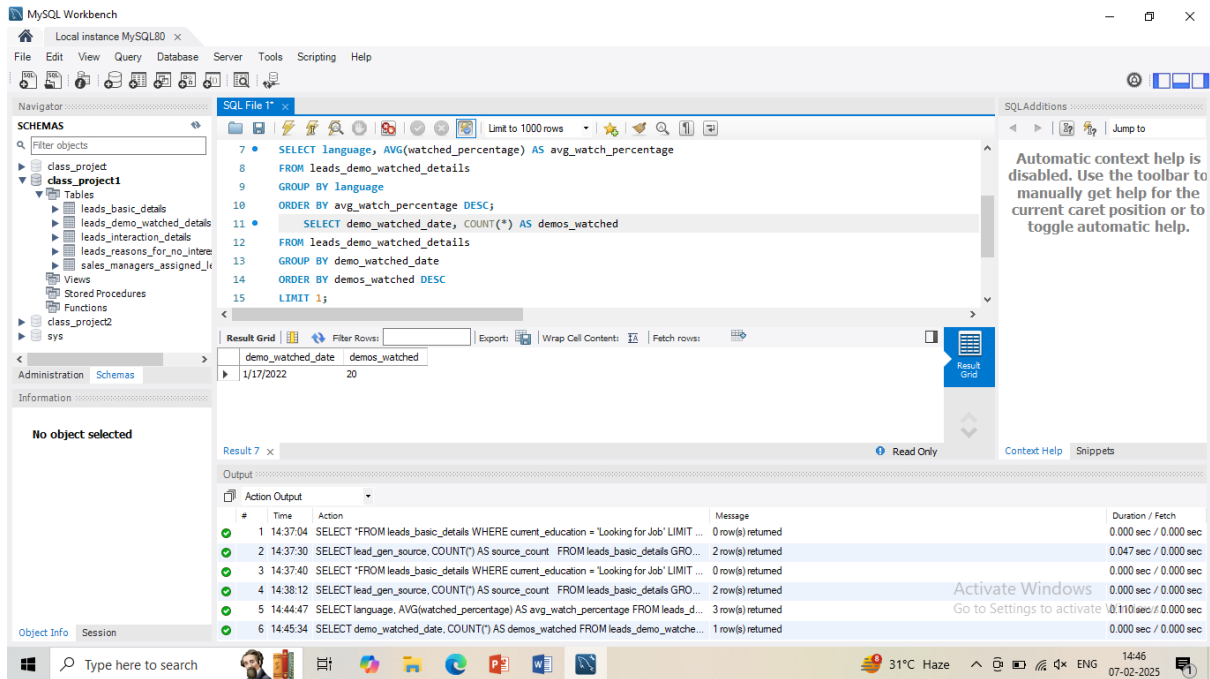
1 WHERE current_education = 'Looking for Job';
2
3 • SELECT lead_gen_source, COUNT(*) AS source_count
4   FROM leads_basic_details
5   GROUP BY lead_gen_source
6   ORDER BY source_count DESC;
7 • SELECT language, AVG(watched_percentage) AS avg_watch_percentage
8   FROM leads_demo_watched_details
9   GROUP BY language
10  ORDER BY avg_watch_percentage DESC;

```

The 'Result Grid' shows the results of the last query (Query 6):

| language | avg_watch_percentage |
|----------|----------------------|
| English | 60.0268 |
| Telugu | 53.1452 |
| Hindi | 48.4500 |

The 'Output' tab at the bottom shows the execution log with timestamps and messages for each query.



3. Leads interaction details

- `SELECT jnr_sm_id, COUNT (*) AS total_interactions`

`FROM leads_interaction_details`

`GROUP BY jnr_sm_id;`

- `SELECT lead_stage, call_status, COUNT (*) AS call_count`

`FROM leads_interaction_details`

`GROUP BY lead_stage, call_status;`

- `SELECT *FROM leads_interaction_details`

`WHERE lead_stage = 'conversion';`

- `SELECT lead_id, COUNT(*) AS interaction_count`

`FROM leads_interaction_details`

`GROUP BY lead_id`

`ORDER BY inter SELECT lead_stage, call_reason, COUNT (*) AS reason_count`

`FROM leads_interaction_details`

`GROUP BY lead_stage, call_reason`

ORDER BY lead_stage, reason_count DESC
naction_count DESC;

- SELECT lead_stage, call_reason, COUNT (*) AS reason_count

FROM leads_interaction_details

GROUP BY lead_stage, call_reason

ORDER BY lead_stage, reason_count DESC;

- SELECT DATE_FORMAT(call_done_date, '%Y-%m') AS month, COUNT(*) AS
interaction_count

FROM leads_interaction_details

GROUP BY month

ORDER BY month;

- SELECT jnr_sm_id, call_status, COUNT (*) AS status_count

FROM leads_interaction_details

GROUP BY jnr_sm_id, call_status;

4. Leads reason for not interested:

- SELECT lead_id

FROM leads_reasons_for_no_interest

WHERE reasons_for_not_interested_in_demo IS NULL

AND reasons_for_not_interested_to_consider IS NULL

AND reasons_for_not_interested_to_convert IS NOT NULL;

- SELECT DISTINCT reasons_for_not_interested_in_demo AS reason

FROM leads_reasons_for_no_interest

WHERE reasons_for_not_interested_in_demo NOT IN (

SELECT reasons_for_not_interested_to_consider FROM
leads_reasons_for_no_interest

UNION

```
SELECT reasons_for_not_interested_to_convert FROM  
leads_reasons_for_no_interest  
);
```

- SELECT reasons_for_not_interested_in_demo, COUNT(*) AS reason_count
FROM leads_reasons_for_no_interest
GROUP BY reasons_for_not_interested_in_demo
ORDER BY reason_count DESC;

5. Sales managers assigned leads_details

- SELECT snr_sm_id, COUNT(*) AS total_leads_assigned
FROM sales_managers_assigned_leads_details
GROUP BY snr_sm_id
ORDER BY total_leads_assigned DESC;

- SELECT jnr_sm_id, COUNT(*) AS total_leads_assigned
FROM sales_managers_assigned_leads_details
GROUP BY jnr_sm_id
ORDER BY total_leads_assigned DESC;

```
SELECT lead_id, cycle, COUNT(*) AS assignment_count  
FROM sales_managers_assigned_leads_details  
GROUP BY lead_id, cycle  
HAVING assignment_count > 1;
```

- SELECT snr_sm_id, COUNT(*) AS total_leads
FROM sales_managers_assigned_leads_details
GROUP BY snr_sm_id
ORDER BY total_leads DESC
LIMIT 1;

- SELECT *FROM sales_managers_assigned_leads_details
WHERE assigned_date IS NULL OR snr_sm_id IS NULL OR jnr_sm_id IS NULL;
SELECT jnr_sm_id, COUNT (*) AS leads_handled
FROM sales_managers_assigned_leads_details
GROUP BY jnr_sm_id
ORDER BY leads_handled DESC;
- SELECT lead_id, MAX(assigned_date) AS last_assigned_date
FROM sales_managers_assigned_leads_details
GROUP BY lead_id;
SELECT lead_id, COUNT (DISTINCT cycle) AS cycle_count
FROM sales_managers_assigned_leads_details
GROUP BY lead_id
HAVING cycle_count > 1;
SELECT jnr_sm_id, COUNT(DISTINCT cycle) AS total_cycles
FROM sales_managers_assigned_leads_details
GROUP BY jnr_sm_id
ORDER BY total_cycles DESC;
SELECT lead_id, assigned_date, cycle
FROM sales_managers_assigned_leads_details
WHERE assigned_date BETWEEN '2022-01-01' AND '2022-01-15';
SELECT lead_id
FROM sales_managers_assigned_leads_details
WHERE cycle = 2;

