The Story: Understanding Why Employees Leave



A Data Story by Rawan Sotohy Guided by Dina Mohsen @ NTI

The Situation

Employee retention is a growing concern for companies worldwide. Organizations invest heavily in hiring, training, and developing their

workforce – yet many employees still leave.

So the question is:

Why do people leave?

Is it age?

Salary?

Overtime?

Lack of satisfaction or training?

This project aims to turn raw data into real answers.

The Challenge

HR teams often rely on intuition, not data, to solve attrition problems.

They may ask:

- Who is more likely to quit younger or older employees?
- Is overtime driving people away?
- Are we paying enough to retain top performers?
- Which departments need the most attention?

But without data, these questions remain unanswered.



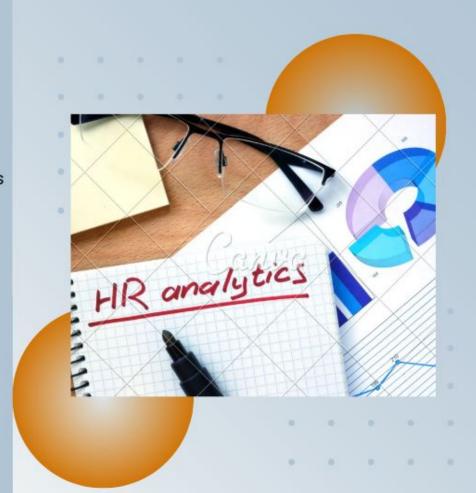
The Investigation 🔍



By using SQL, I analyzed HR data across several dimensions - gender, department, role, age, overtime, satisfaction, and more.

First finding?

Overall attrition rate = 16.12% — higher than ideal. Then the patterns started to emerge...



The Patterns Were Clear 📊

Factor	Insight
⊖ Age	Employees under 30 are nearly 2× more likely to leave.
^(†) Overtime	Those working overtime have 3× the attrition rate.
Role	Sales reps and lab technicians are the most at risk.
Salary	Leavers earn ~\$4,787/month — lower than stayers.
Satisfaction	Leavers average 2.47/4 in job satisfaction.
Training	Leavers attended just 2.6 training sessions per year.
Education Field	HR and Marketing backgrounds had the highest attrition.



For HR Teams:

Watch for overtime burnout – it's a strong red flag. Focus retention programs on young, early-career staff. Invest in training & development – it pays off. Address turnover in Sales and HR with targeted support.

For Decision Makers:

Data reveals who is leaving and why.

Use these insights to design smarter HR strategies.

Prevention is cheaper than replacement.

Final Thought

This wasn't just about numbers.

It was about people.

And with the right data, we can create workplaces where

they choose to stay.

Because great companies don't just hire talent – they understand what makes talent stay.

