

# Data Analyst

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September 2025



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# OUTLINE

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- Executive Summary
- Introduction
- Methodology
- Results
  - Visualization – Charts
  - Dashboard
- Discussion
  - Findings & Implications
- Conclusion
- Appendix

# EXECUTIVE SUMMARY

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- Coding trends according to StackOverflow
- Visualizations will show findings from data analysis
- Findings and implications are summarized
- Dashboards show aggregate visualized information
- Conclusion

# INTRODUCTION

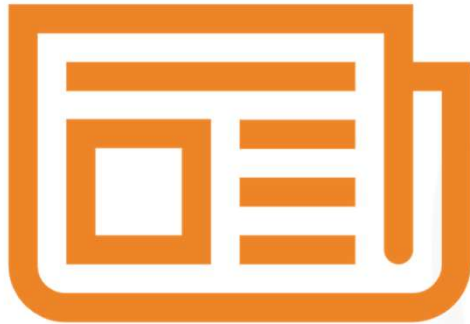
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- This presentation highlights trends in technology according to StackOverflow
- Focus on programming languages and types
- Many further data points are available
  - Age
  - Experience
  - Location
  - Salary
  - Etc
- This is intended for job seekers, employees, employers, and other stakeholders in the tech industry

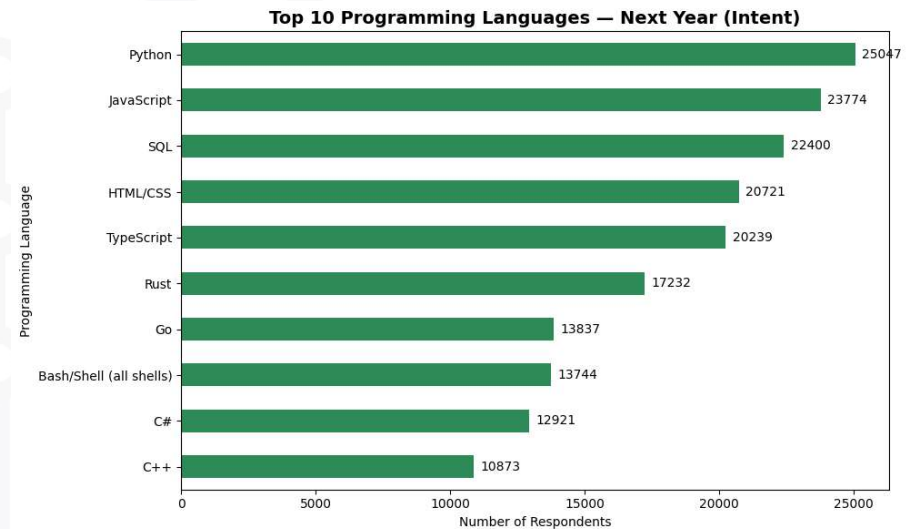
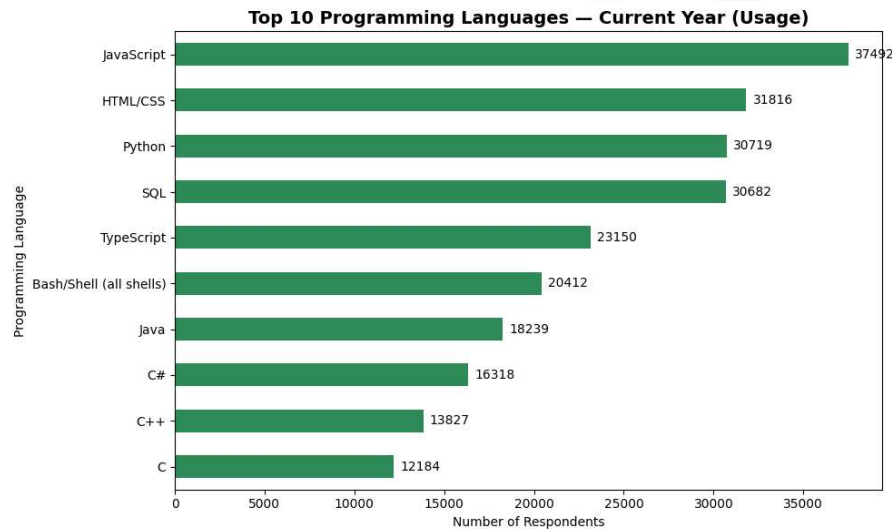
# METHODOLOGY

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- Data Cleaning
- Data Exploring
- Data Analysis
- Python, Jupyter, SQL
- Pandas, Matplotlib, Sqlite3, Numpy
- Visualization
  - Charts
  - Dashboards

# PROGRAMMING LANGUAGE TRENDS



# PROGRAMMING LANGUAGE TRENDS - FINDINGS & IMPLICATIONS

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## Findings

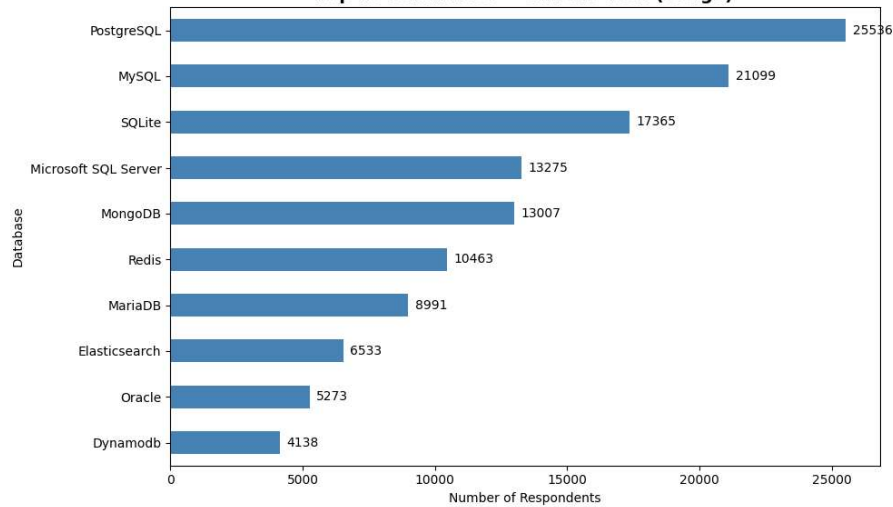
- The top five retain top five positions
- Python moves from 3<sup>rd</sup> to 1<sup>st</sup> place
- Rust and Go appear on the top ten

## Implications

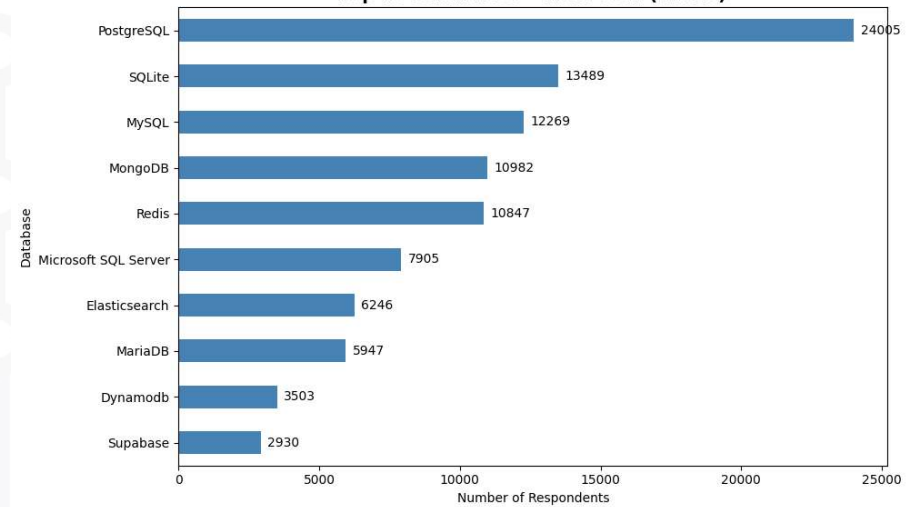
- The most popular languages are steady
- Python is dominating with ubiquity
- Rust and Go are trending strongly

# DATABASE TRENDS

Top 10 Databases — Current Year (Usage)



Top 10 Databases — Next Year (Intent)





# DATABASE TRENDS - FINDINGS & IMPLICATIONS

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## Findings

- PostgreSQL remains most popular
- SQLite overtakes MySQL for second place
- 4 of 5 of the top 5 remain in top 5

## Implications

- PostgreSQL declines and may lose first place in subsequent years
- SQLite is increasingly used for education and training
- The top database languages are steady, MS SQL Server dropped to 6<sup>th</sup> place

# DASHBOARD

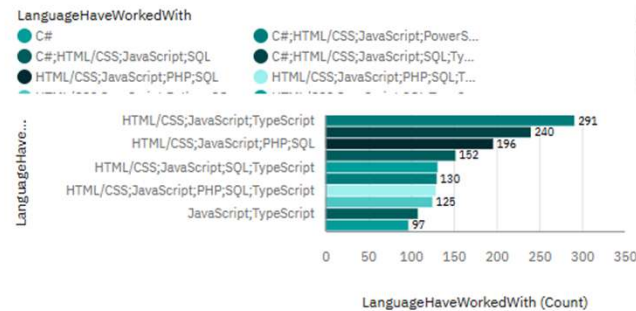
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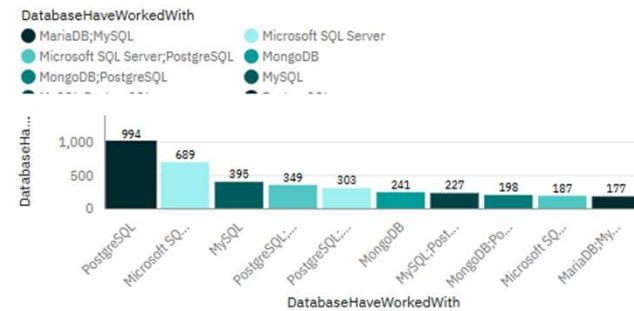
<Please present your dashboard in the following slides.>

# DASHBOARD TAB 1

Languages Have Worked With



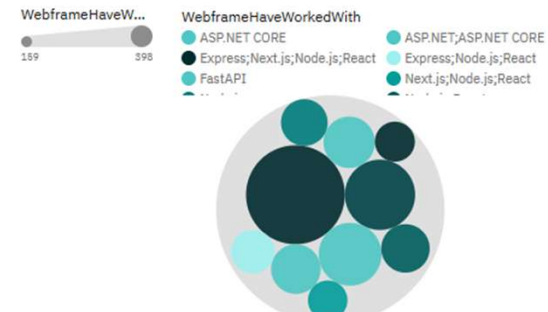
Database Have Worked With



Platform Have Worked With

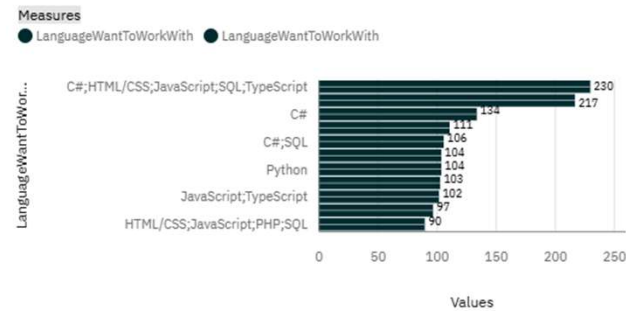


WebFrame Have Worked With

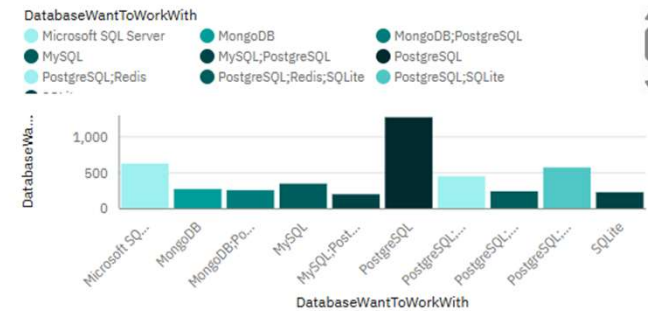


# DASHBOARD TAB 2

Language Want to Work With



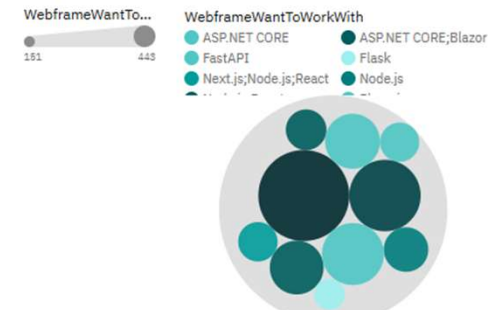
Database Want to Work With



Platform Want to Work With



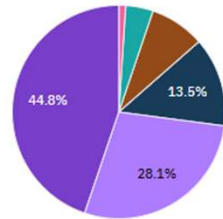
Webframe Want to Work With



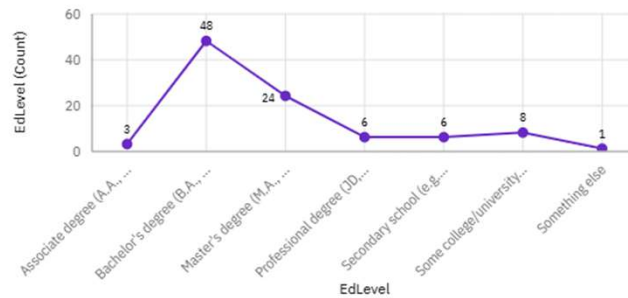
# DASHBOARD TAB 3

Respondent by Age

Age  
65 years or older 55-64 years old 18-24 years old 45-54 years old  
35-44 years old 25-34 years old

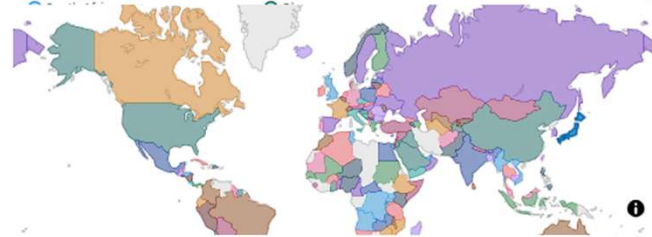


Respondent by Education



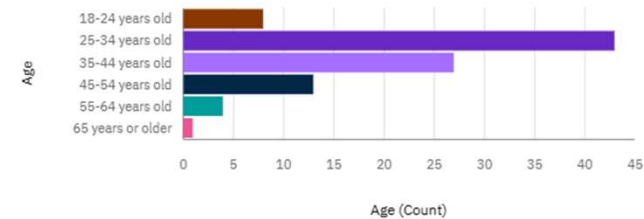
Respondent by Country

Country  
United Kingdom of Great Britain a... United States of America  
Austria United Republic of Tanzania  
Argentina Hungary



Respondent by Age

Age  
18-24 years old 25-34 years old 35-44 years old 45-54 years old  
55-64 years old 65 years or older



# DISCUSSION

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- This data comes from StackOverflow
- How would these results compare to analysis from different sources?
- Non-English sources?

# OVERALL FINDINGS & IMPLICATIONS

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## Findings

- Tech jobs are strongest in the US
- The preferred languages are fluctuating
- Salaries are good

## Implications

- Substack is mostly used for US jobs
- New languages are competing for space occupied by popular languages
- Coding will continue to be a reliable job sector in the future

# CONCLUSION

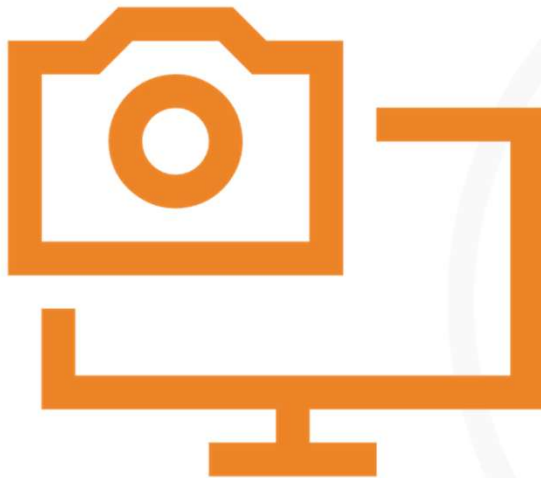
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- Learning programming is worthwhile
- The job market and salary are promising
- Coding is increasingly in demand across industries
- New languages are replacing some languages while other languages are remaining strong

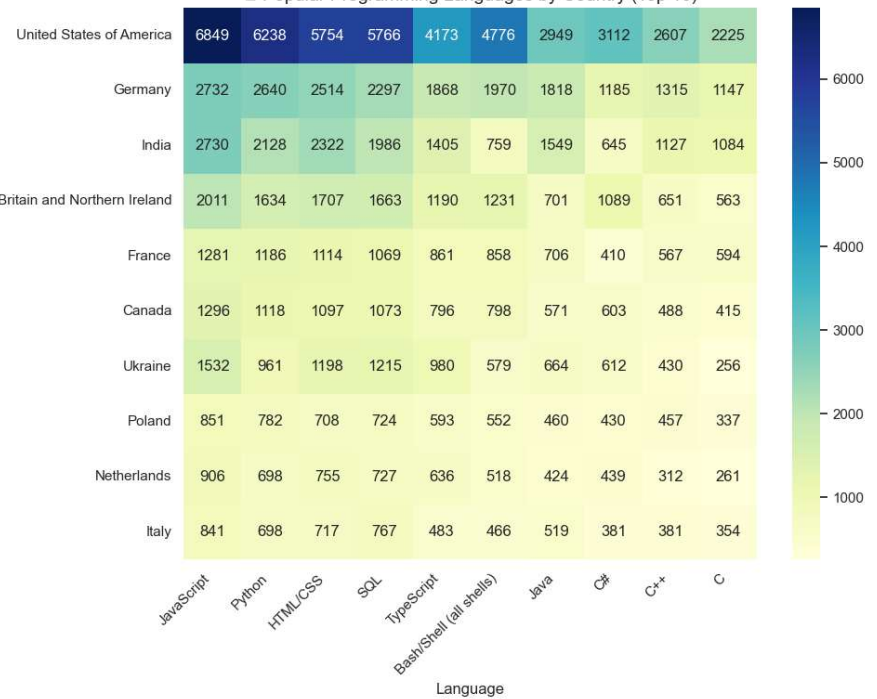


# APPENDIX

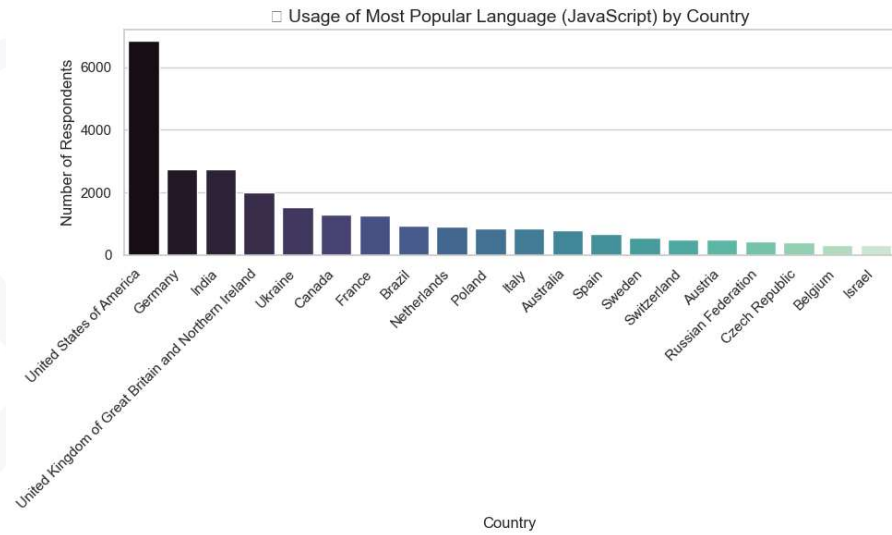
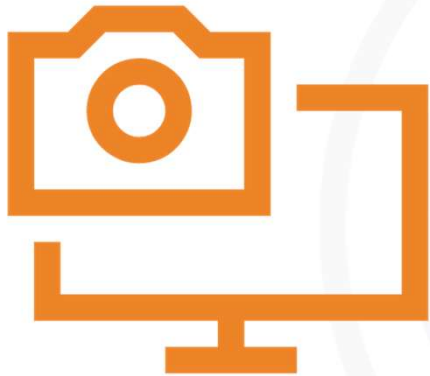


Country

Popular Programming Languages by Country (Top 10)

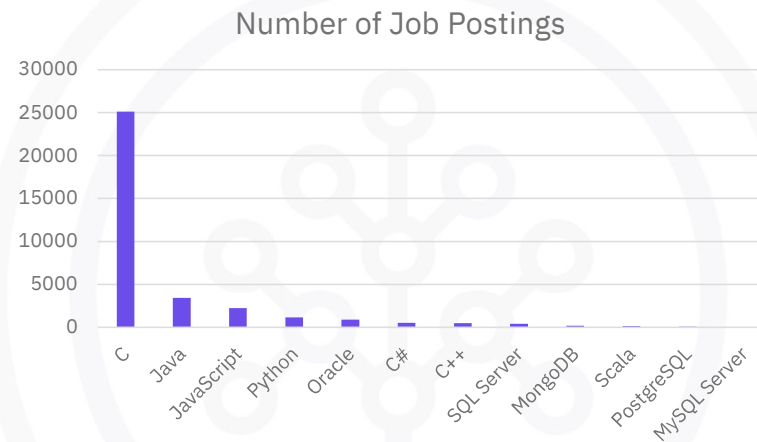


# APPENDIX



# JOB POSTINGS

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# POPULAR LANGUAGES

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