

# Programming Languages

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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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- People interested in languages are presented
- The desire of people who want to use languages is shown
- Which age is more interested in such languages
- People with which degree are interested in languages
- Gender gap

# INTRODUCTION

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- This is important to focus on such languages and how they are valuable in the future.
- When we know about the age of users, we can predict their desires as well.
- The countries interested in such languages are shown in the following, which can help us know which country is more interested in them.
- This report is good for people who need to understand the changes in trend of the usage of programming languages.
- The gender gap between participants

# METHODOLOGY

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- Data Collection
- Data Cleaning
- Data Exploration
- Visualization
- Presentation

# RESULTS

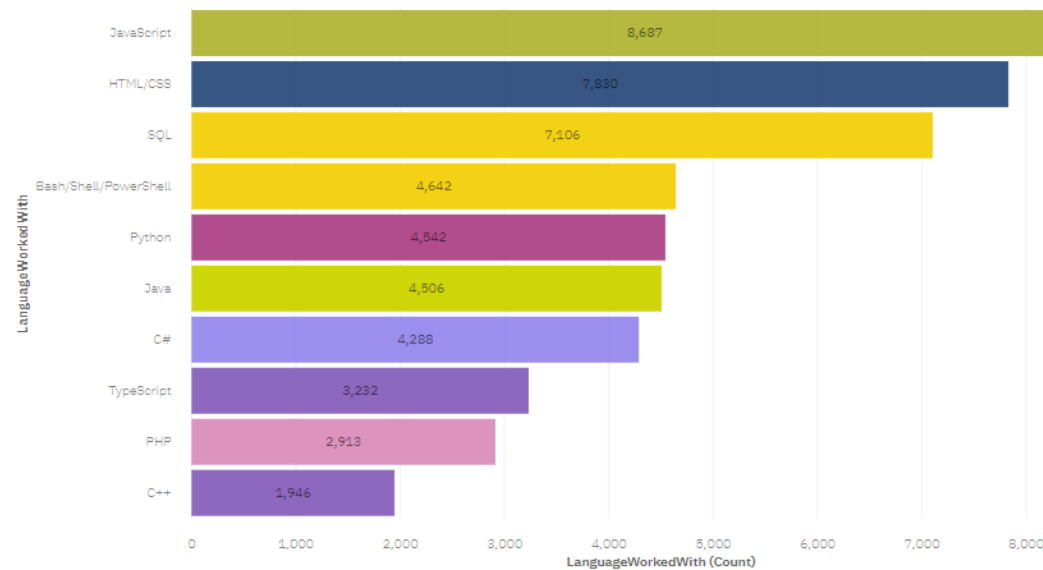
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**Almost all countries and people will use programming languages in the future.**

# PROGRAMMING LANGUAGE TRENDS

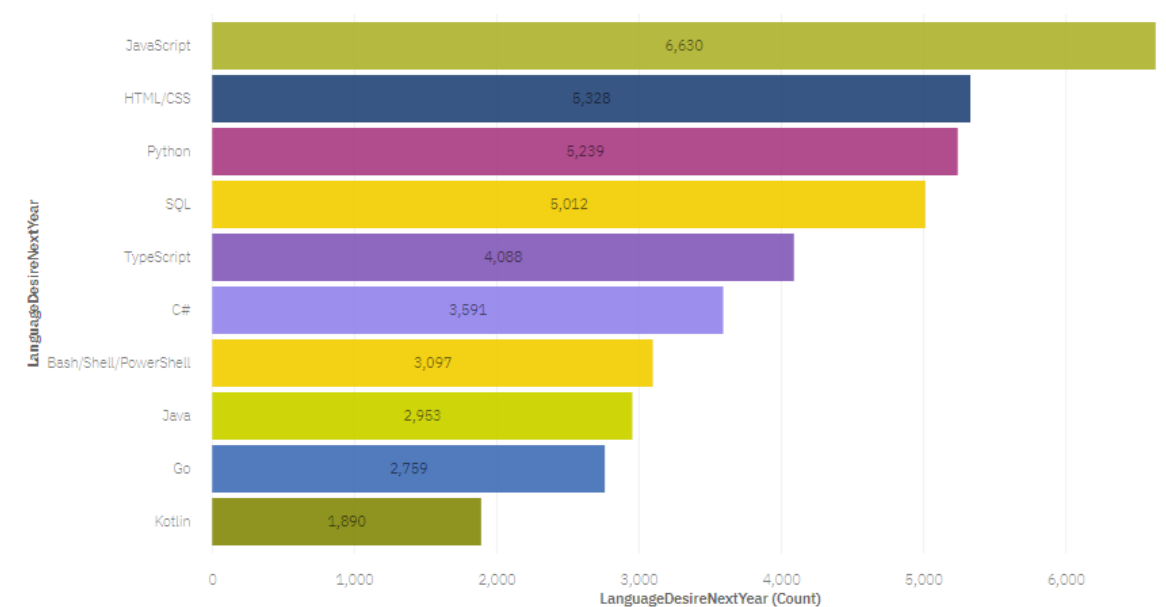
## Current Year

Top 10 Languages Worked With



## Next Year

Top 10 Languages Desired Next Year



# PROGRAMMING LANGUAGE TRENDS - FINDINGS & IMPLICATIONS

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## Findings Implications

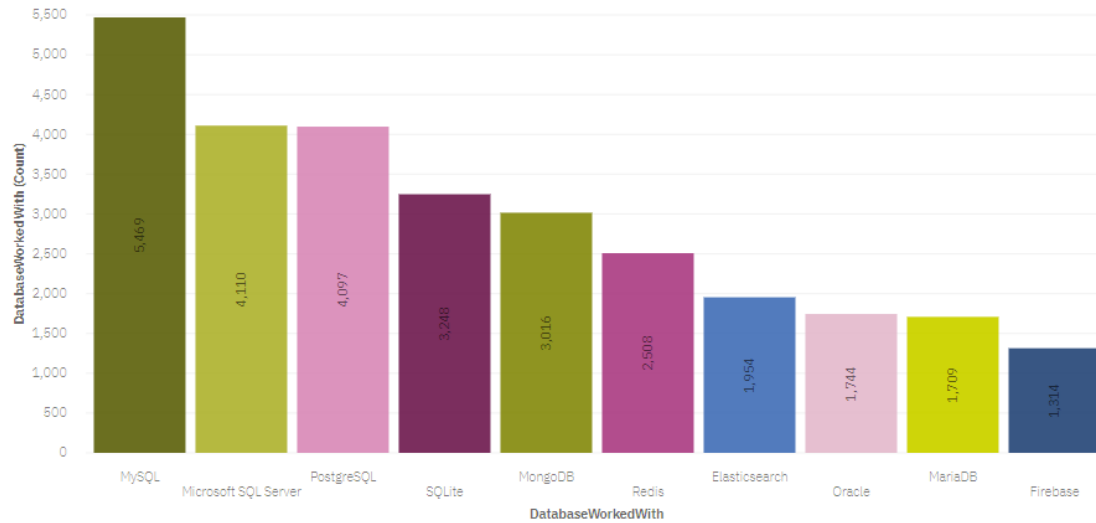
- JavaScript has a higher number
- Bash has a lower number in the future
- Python is popular next year
- Typescript is important for people in the future
- C++ will be used less
- People will use web-based programming languages
- Big Data is important for people



# DATABASE TRENDS

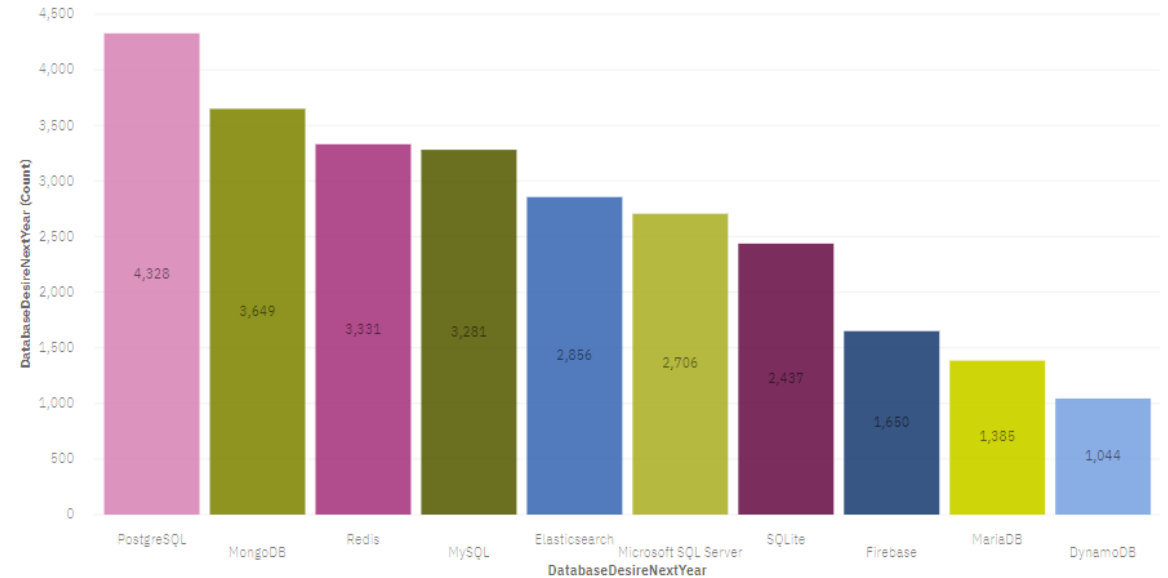
## Current Year

Top 10 Databases Worked With



## Next Year

Top 10 Databases Desired Next Year



# DATABASE TRENDS - FINDINGS & IMPLICATIONS

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## Findings

- Difference in Redis
- SQL-based ones will experience a jump
- Elasticsearch will be used more in the future
- MongoDB will be used more than before

## Implications

- More people will use SQL
- MySQL will be replaced by PostgreSQL
- Oracle will not be used in the future

# DASHBOARD

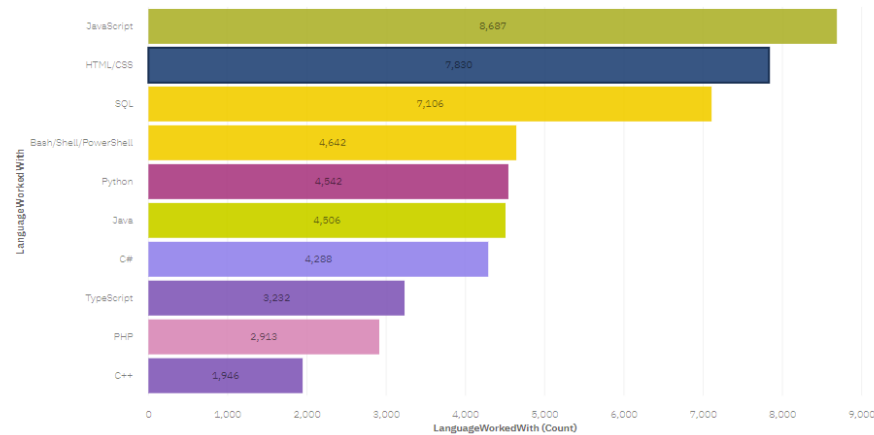
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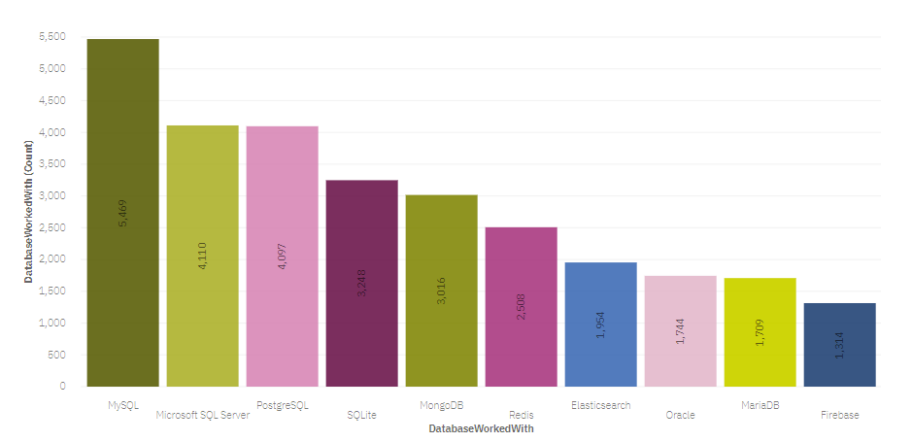
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# DASHBOARD TAB 1

Top 10 Languages Worked With



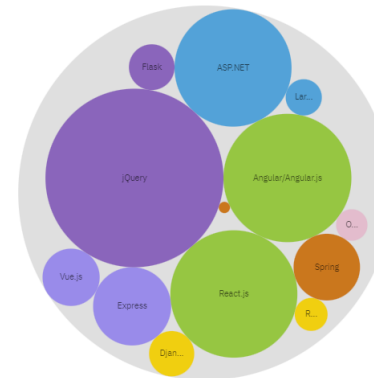
Top 10 Databases Worked With



Platforms Worked With

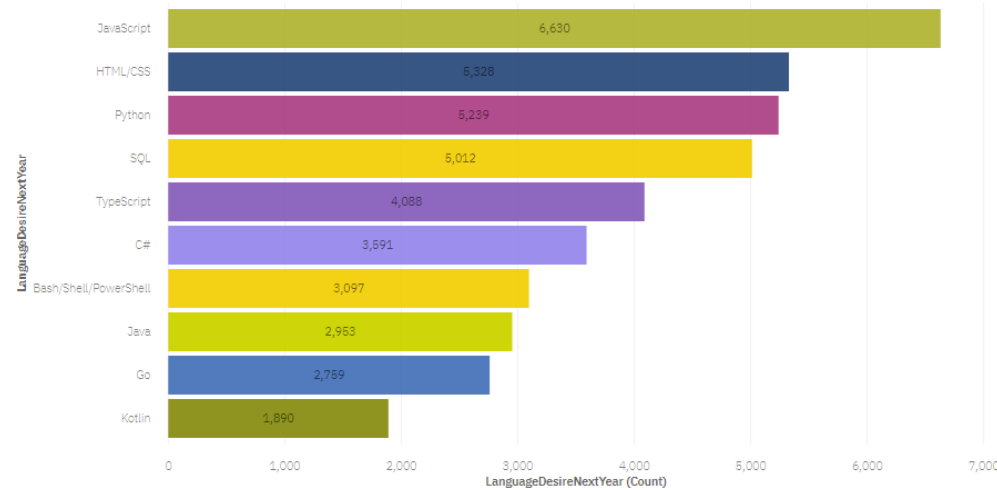


Top 10 Web Frames Worked With

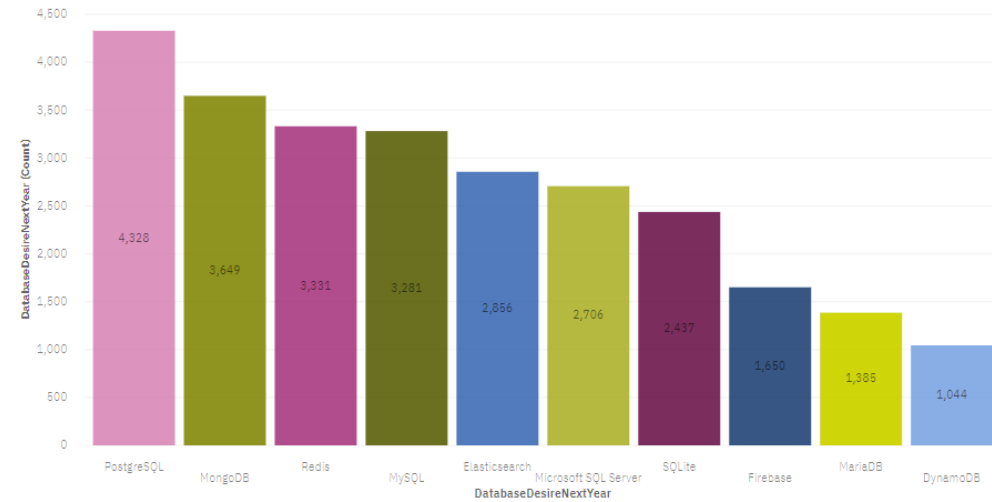


# DASHBOARD TAB 2

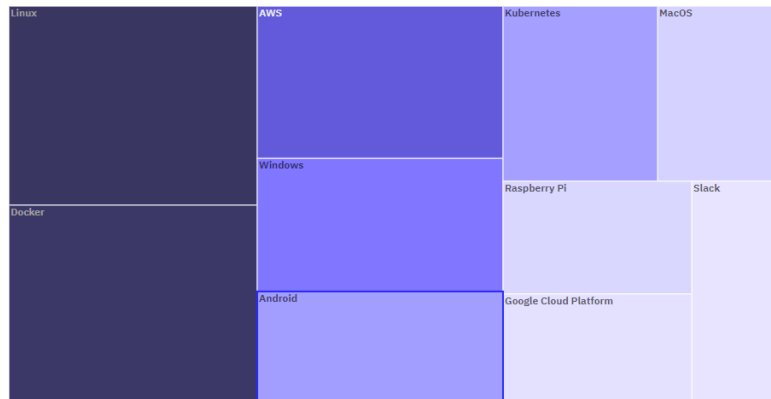
Top 10 Languages Desired Next Year



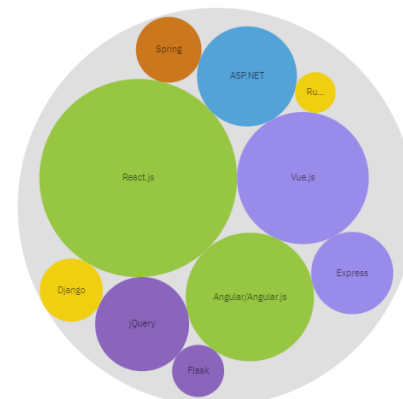
Top 10 Databases Desired Next Year



Top 10 Platforms Desired Next Year



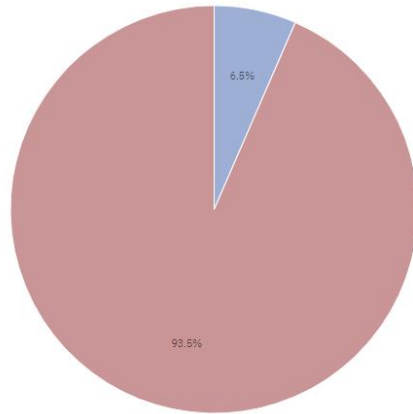
Top 10 Web Frames Desired Next Year



# DASHBOARD TAB 3

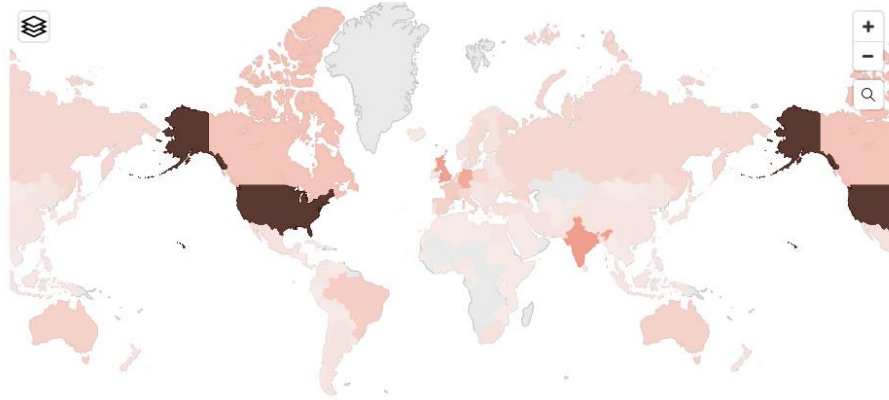
Survey Respondent Gender

Gender  
● Woman ● Man

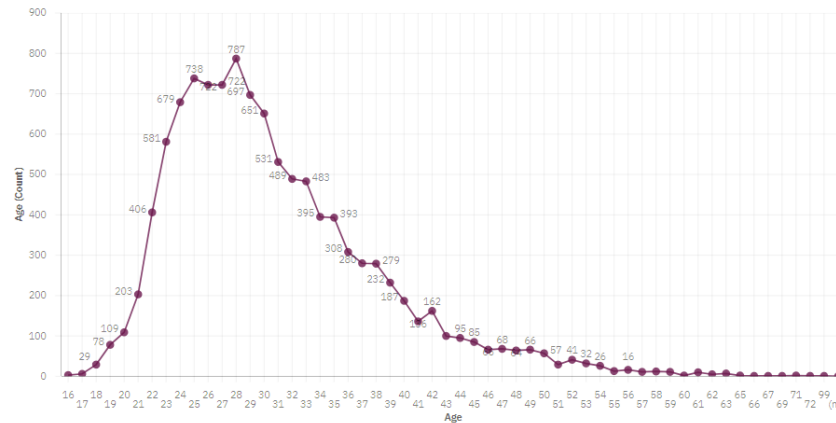


Respondent Countries

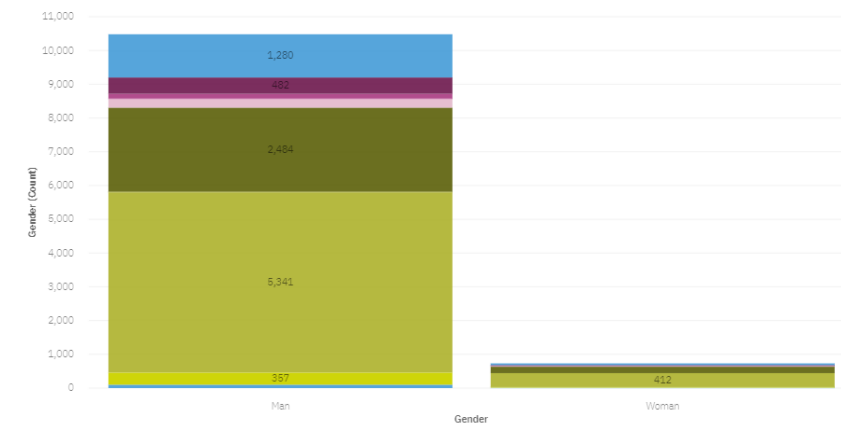
Country (Count)  
1 3,125



Respondent Count by Age



Respondent Count by Gender, Classified by Formal Education Level



# DISCUSSION

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- Thanks to the data and graphs, we can further research the usage of programming languages useful in data science in the future.
- Gender should be balanced in the future
- Regarding possible discrimination in education and employment, they should be avoided
- Workers should be trained in favor of these languages

# OVERALL FINDINGS & IMPLICATIONS

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## Findings

- SQL will be used higher
- Redis will be used more
- Those with a bachelor's degree are more interested in languages.
- Gender gap exists in such jobs
- SQL-based ones are popular in the future
- 28 is the most common age of the respondents

## Implications

- SQL platforms will be widely used in the next year
- People should improve their knowledge of programming to have more chances for finding a job
- Cloud-based ones are more popular in the future
- Companies should be adjustable regarding these changes in work environments



# CONCLUSION

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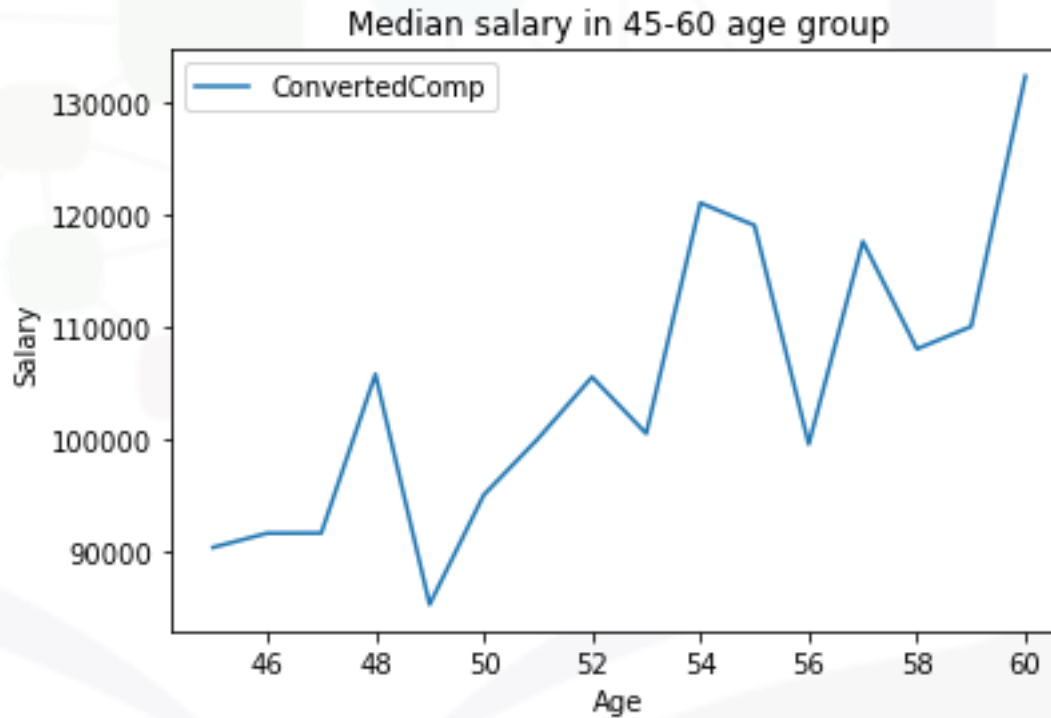
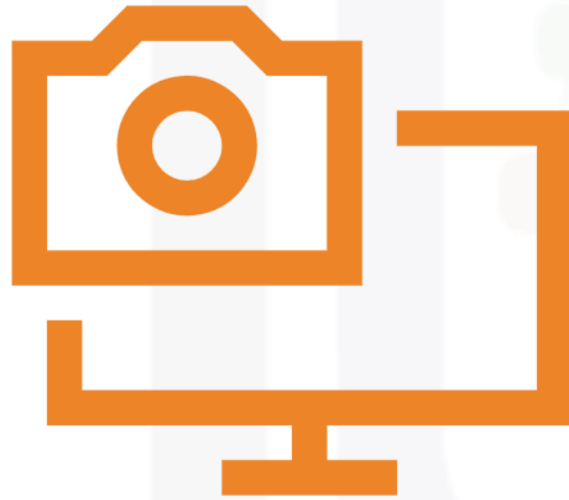


- Programming languages in data science will be used more in the future
- SQL will help people in the future
- Gender gap exists
- People should take steps to change some discriminations
- There are different trends for databases and programming languages in this year and the next year

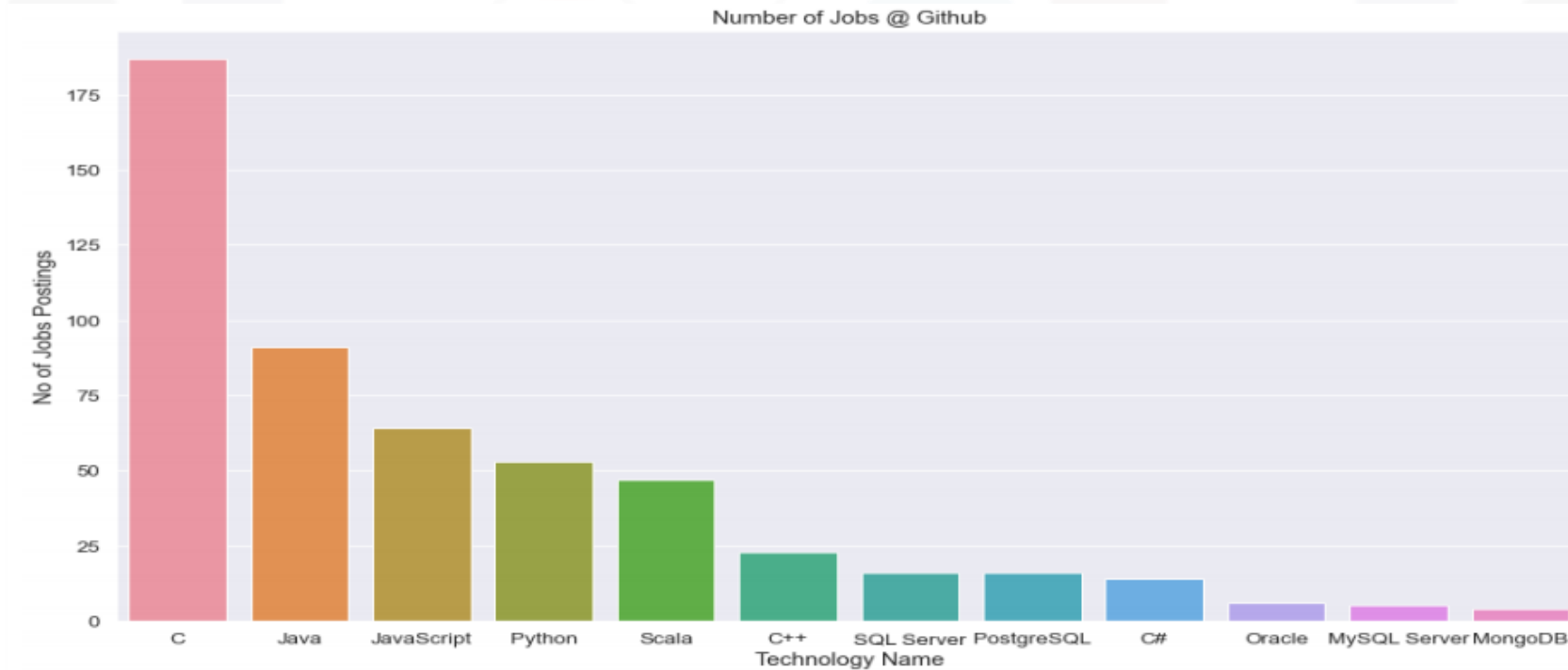
# APPENDIX

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- Salaries people 45 – 60 may gain



# GITHUB JOB POSTINGS



# POPULAR LANGUAGES

