



Survey of Current and Future Technologies

Rajat Veer

04/16/2022

OUTLINE



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

EXECUTIVE SUMMARY



- Current Technology Usage (Worked With)
 - Language
 - Database
 - Platform
 - Web Frame
- Future Technology Trend (Desire Next Year)
 - Language
 - Database
 - Platform
 - Web Frame
- Demographics
 - Country
 - Gender

INTRODUCTION



- Analyze the Current technologies people worked on and Future technologies that people wish to have.
- Purpose: Purpose of this data analysis is to find more insights of what will be trend in near future which people need to learn for Job securities and keep up with the market.
- Target Audience
 - Stakeholders
 - IT Industry
 - Programming Community
 - Data Analyst/Data Scientist

METHODOLOGY

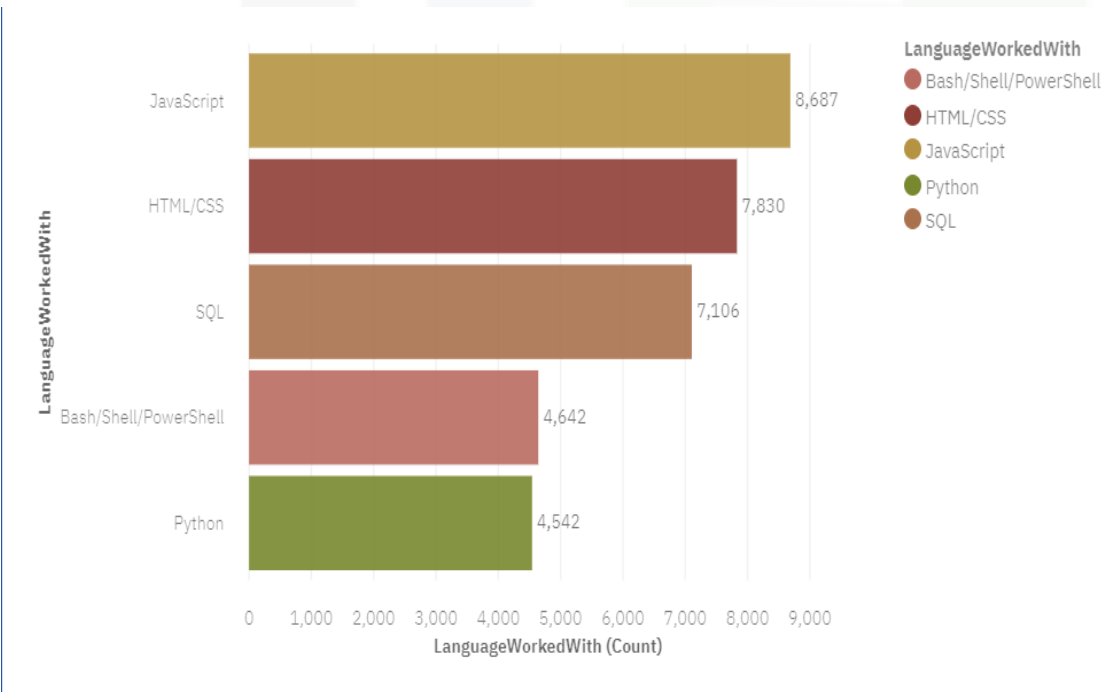


- Data Collection
 - Stack Overflow
 - Kaggle
 - Programming Community
- Data Wrangling
- Data Exploration
- Data Cleaning
- Data Visualization
 - IBM Cognos Analytics
 - Matplotlib.pyplot
- Presentation

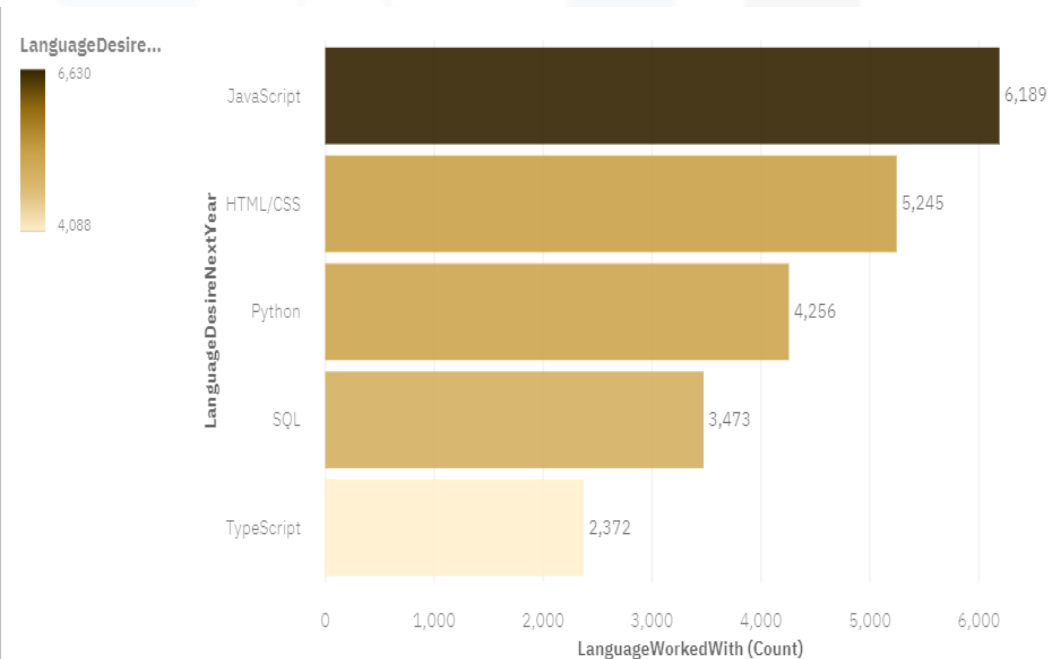
RESULTS

PROGRAMMING LANGUAGE TRENDS

Current Year (Top 5 Language)



Next Year (Top 5 Language)



PROGRAMMING LANGUAGE TRENDS - FINDINGS & IMPLICATIONS

Findings

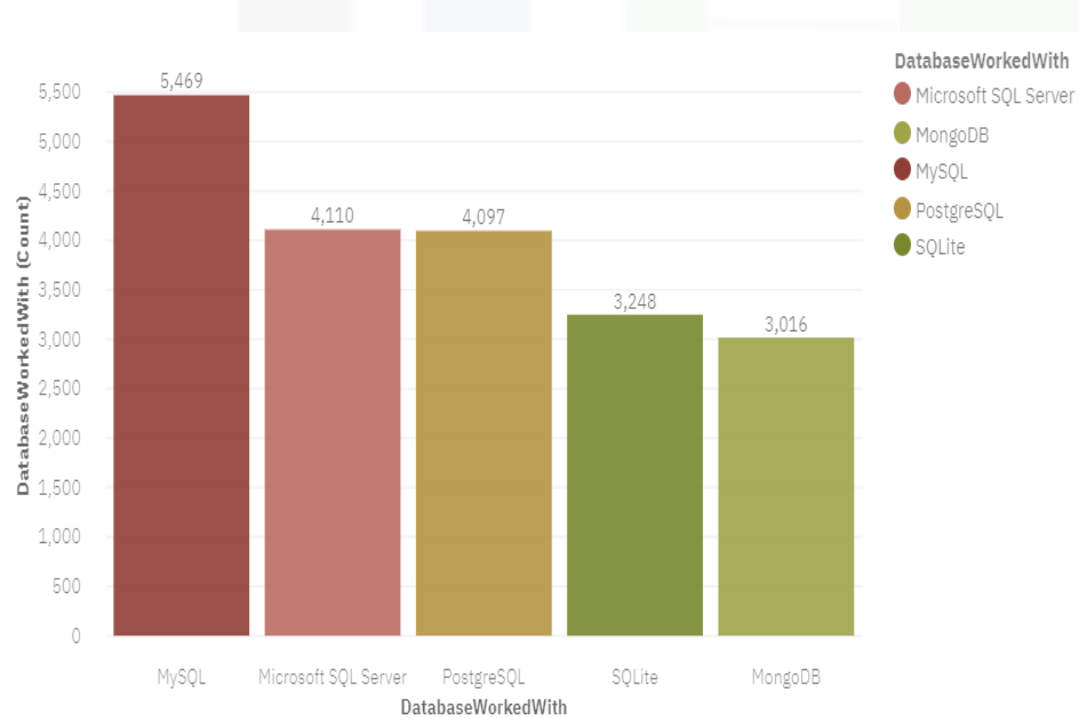
- Most popular language that people worked on and want to learn more about in future is JavaScript followed by HTML/CSS.
- Top 5th language that people worked with is Python which is 3rd most popular language people would like to learn.

Implications

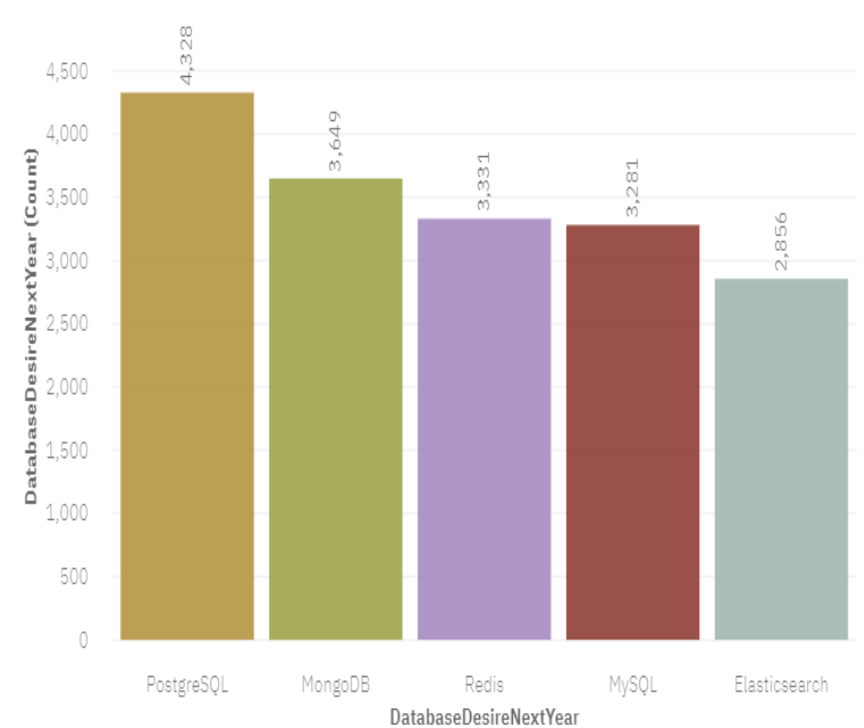
- Most popular language is and will be JavaScript.
- PowerShell is being outdated since people want to learn other languages depending on future.
- Python and SQL are becoming more popular.

DATABASE TRENDS

Current Year (Top 5 Databases)



Next Year (Top 5 Databases)



DATABASE TRENDS - FINDINGS & IMPLICATIONS

Findings

- MySQL is the most popular DB with the count of 5469.
- PostgreSQL will be the most popular DB, people would like to learn.
- Microsoft SQL server is going to be outdated DB in future.

Implications

- PostgreSQL and MongoDB will be in demand in future.
- Redis and Elasticsearch will be the new DB comes in demand.

DASHBOARD

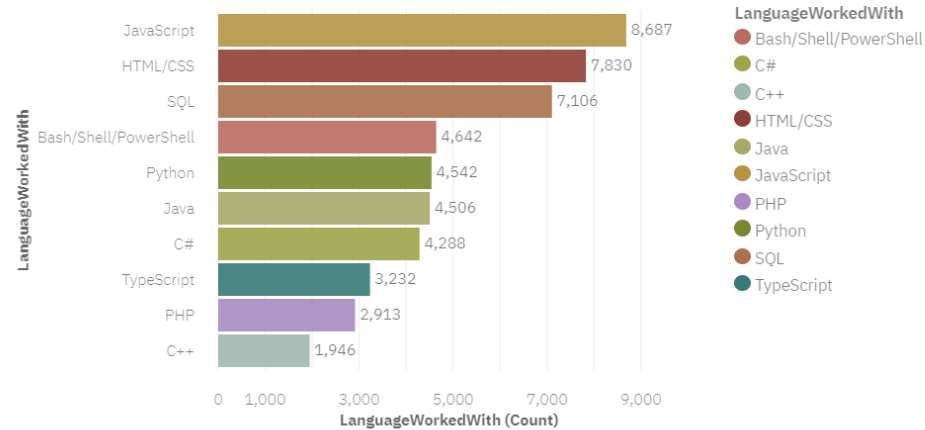


The permanent link of the read-only view of the Cognos dashboard:

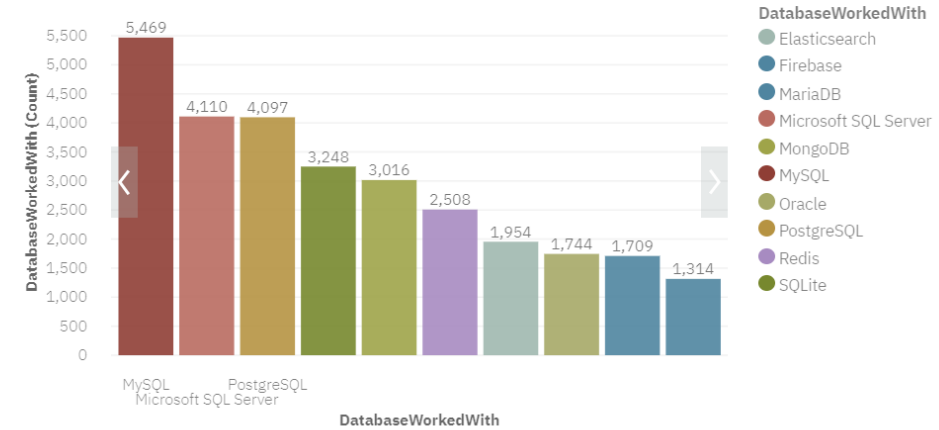
<https://dataplatform.cloud.ibm.com/dashboards/af18d53a-c3cb-4f0c-8065-85bfe526b95a/view/1d28f81813ea17c86fb6e6e4079e2a022f30710fb2bb8b0681d17b4907687597a86c46c5c82b4f098c130330f6ec125dcd>

Current Technology Usage

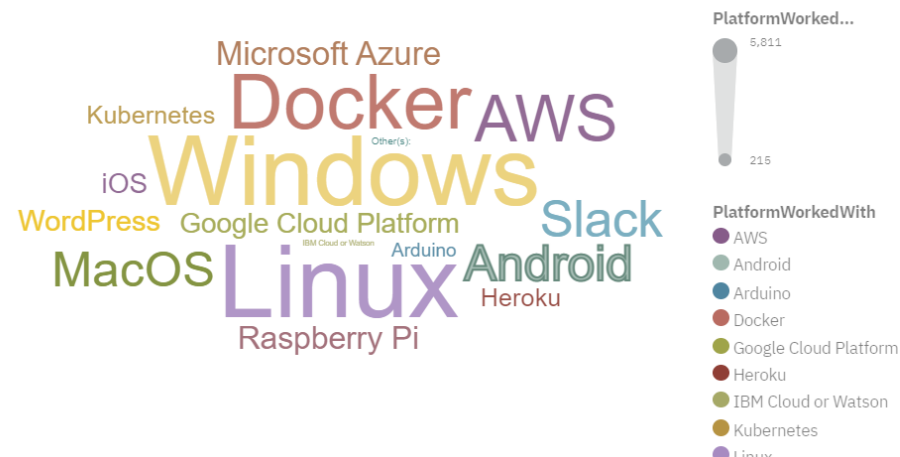
Top 10 Language Worked With



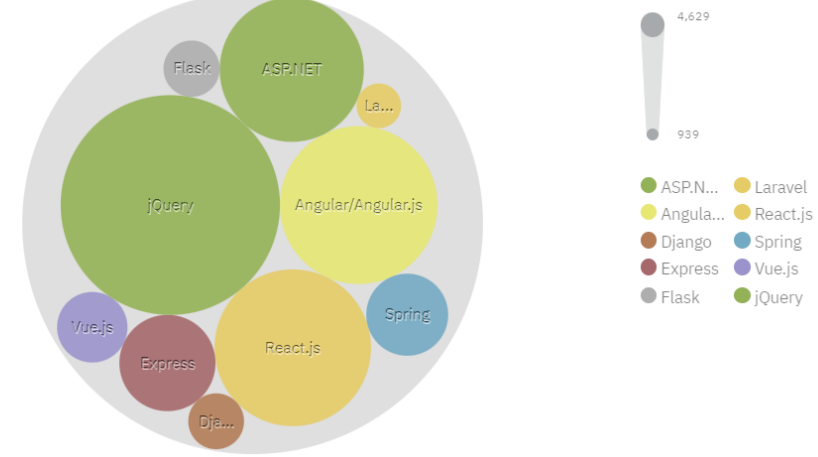
Top 10 Database Worked With



Platform Worked With

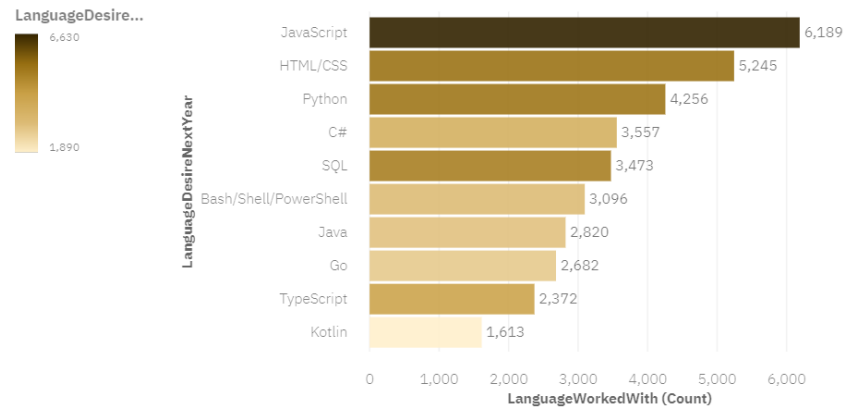


Top 10 Web Frame Worked With

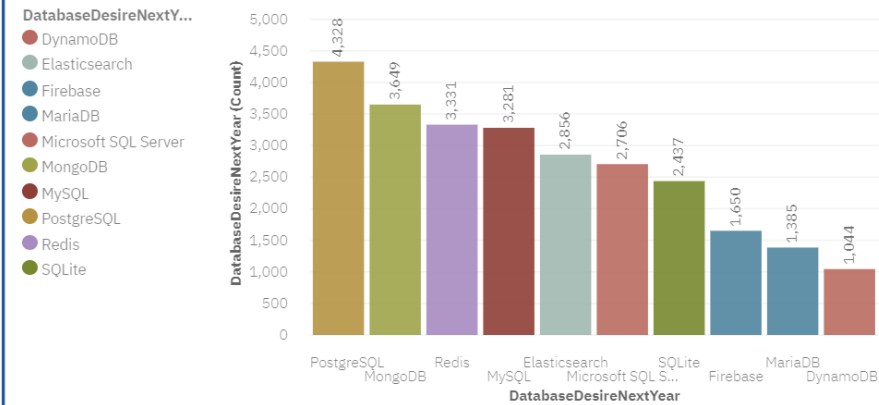


Future technology Trend

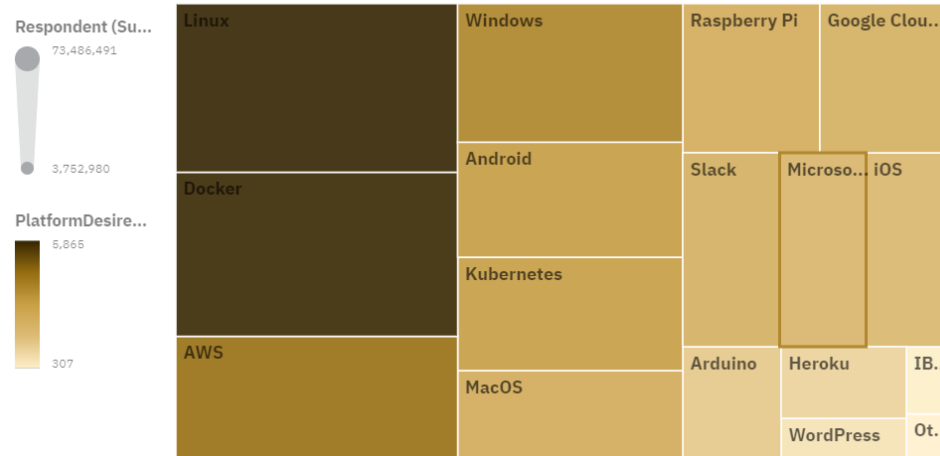
Top 10 Language Desire Next Year



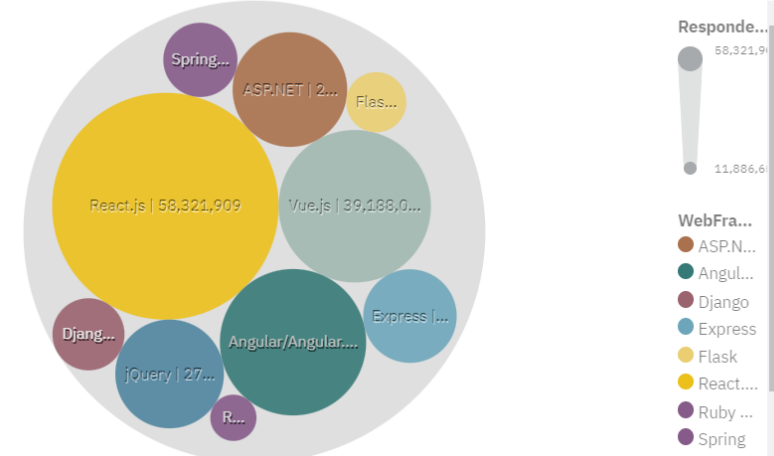
Top 10 Database Desire Next Year



Platform Desire Next Year



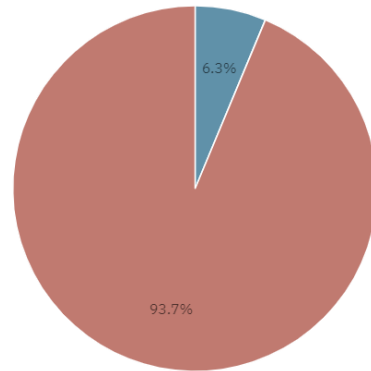
Top 10 Web Frame Desire Next Year



Demographics

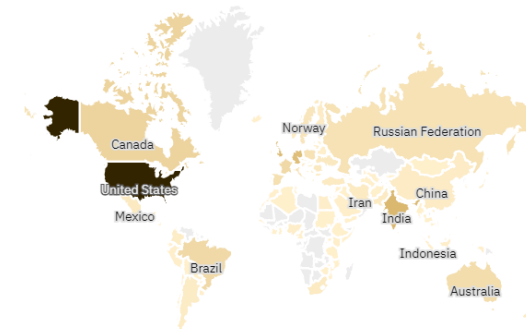
Respondent classified by Gender

Gender
● Woman ● Man

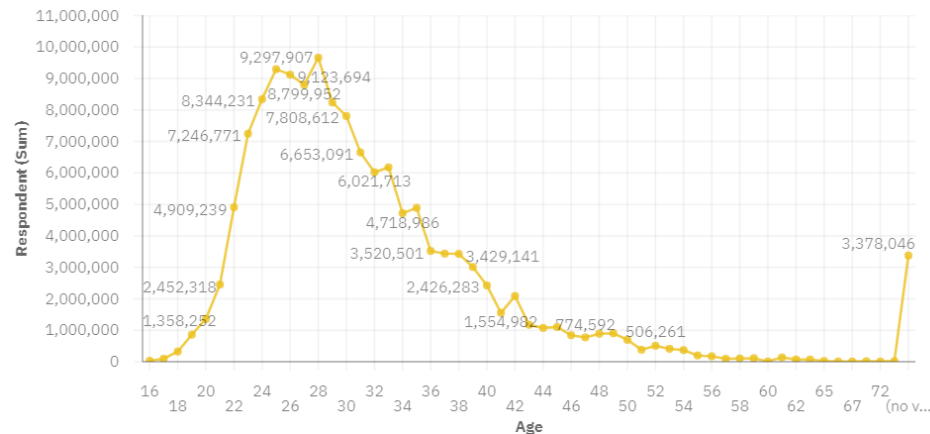


Respondent Count for Countries

Respondent (Sum)
865 38,170,293

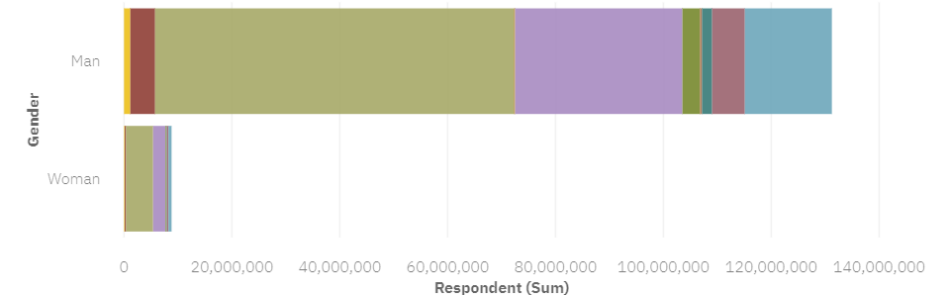


Respondent Count by Age



Respondent Count by Gender, classified by Formal Education Level

EdLevel
● (no value) ● Associate degree ● Bachelor's degree (BA, BS, B.E...
● I never completed any formal ... ● Master's degree (MA, MS, M.E... ● Other doctoral degree (Ph.D, E...
● Primary/elementary school ● Professional degree (JD, MD, e... ● Secondary school (e.g. Americ...
● Some college/university study ...



DISCUSSION



- How technology changes over time
- Top countries for current and future technology
- Gender wise distribution of technology across the world

OVERALL FINDINGS & IMPLICATIONS

Findings

- 97% respondent are men.
- Technology changes over time.
- USA is top country using Technology.
- 24 to 28 is the age group for most of the respondent with Bachelor's Degree.

Implications

- Vast Gender and age discrimination
- JavaScript is the most popular over the years
- Windows and Linux are the trending platform; whereas Linux and Docker will be the Future platform

CONCLUSION



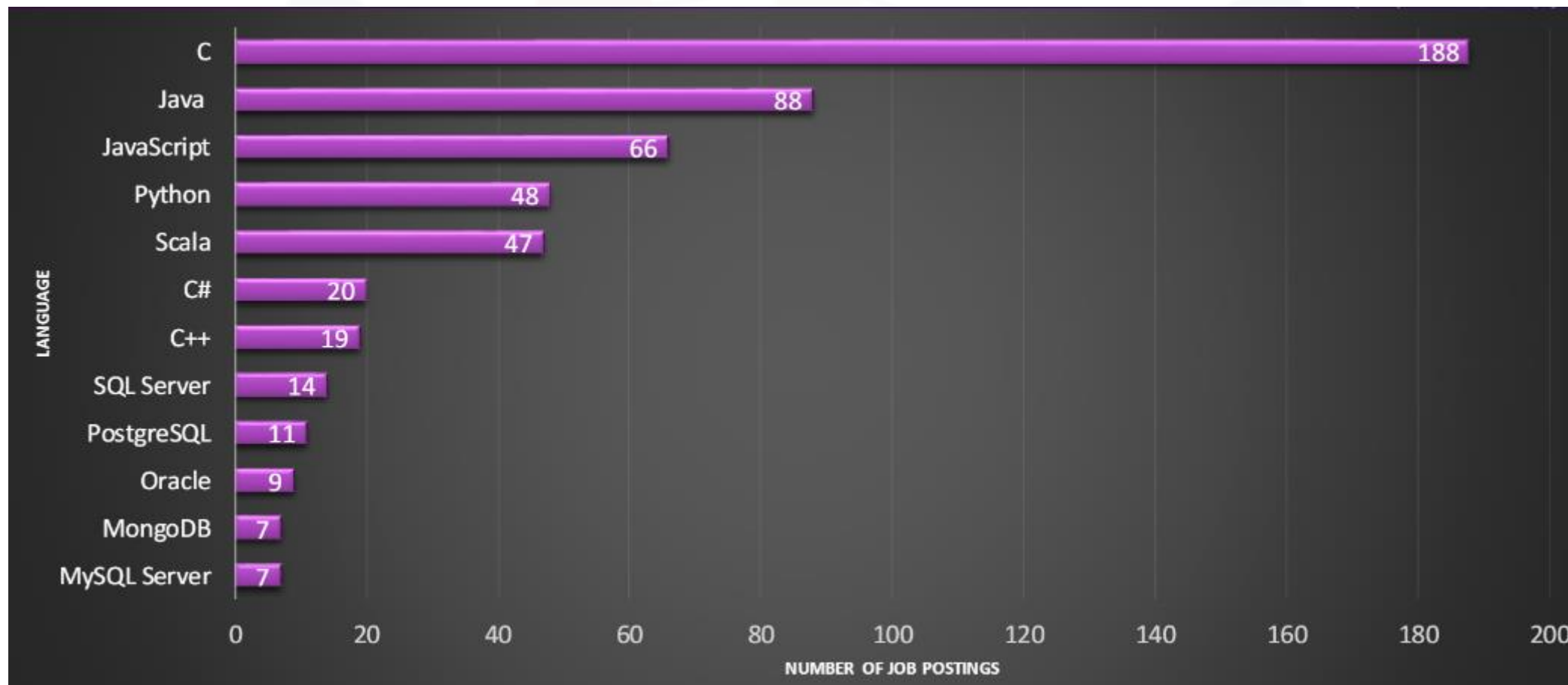
- C++ will be outdated after few years
- People are learning more of React.js web frame and jQuery is currently trending web frame
- Most qualified respondents have Bachelor's degree
- Young people are inclining towards technology

APPENDIX



- Include any relevant additional charts, or tables that you may have created during the analysis phase.

GITHUB JOB POSTINGS



POPULAR LANGUAGES

