SCRABBLE

SHRI VISHNU ENGINEERING COLLEGE FOR WOMEN

BHIMAVARAM

May 8, 2021

BATCH - 3

1.	BATCHU VEDA LIKITHA	19B01A1209	IT
2.	SHAIK RAHEEMA	19B01A05F7	CSE
3.	BOYINA SANTHOSHI	19B01A0528	CSE
4.	VILLA AMRUTHA	19B01A04I9	ECE
5.	PASALA YASASVINI	19B01A02B2	EEE
6.	MUTYALA RENUKA SAI	19B01A0336	MEC

PROBLEM STATEMENT

Scrabble is a word game in which two to four players score points by placing tiles, each bearing a single letter, onto a game board divided into a 15 by 15 grid of squares.

Figure 1: An image of SCRABBLE GAME

APPROACH

- Built code for tracking of players details.
- Next on design of game board.
- Calculated score values.
- Initialized tiles into bag.
- Checking of each word whether it is present in dictionary or not.
- Placed letters on respective positions.

PROGRESS

- Day - 1 :
  Amrutha, Raheema, Santhoshi - Designed game board.
  Likitha, Renuka, Yasasvini - Initialized score values.
- Day - 2 :
  Santhoshi, Renuka, Amrutha - Done with tracking of player details.
  Likitha, Yasasvini, Raheema - Implemented turn of chances.
- Day - 3 :
  Likitha, Amrutha, Santhoshi - Placing words on board.
  Raheema, Yasasvini, Renuka - Checking words whether valid or not.

- Day - 4 :
  Likitha, Raheema, Renuka - Updating score values.
  Santhoshi, Yasasvini, Amrutha - Game for multi user.
- Day - 5 : Implemented code to declare winner.

CHALLENGES

- We faced challenges while creating game for many players.
- We faced troubles while placing words on the board.
- To calculate score of player when he places tiles on premium squares like DLS, DWS, TLS, TWS.
- Faced difficulty to print Scrabble board on the screen
- Faced difficulty to check the word entered by player is formed from given input letters or not

LEARNINGS

- We gained knowledge on how to work as a team through virtually.
- Learnt how to make presentations in LaTeX.
- We attained how to work on project with Python language.
- We learnt through GitLab how to push files into repository.
- We have browsed for dictionary file from which we can get atmost valid words.

TECH STACKS

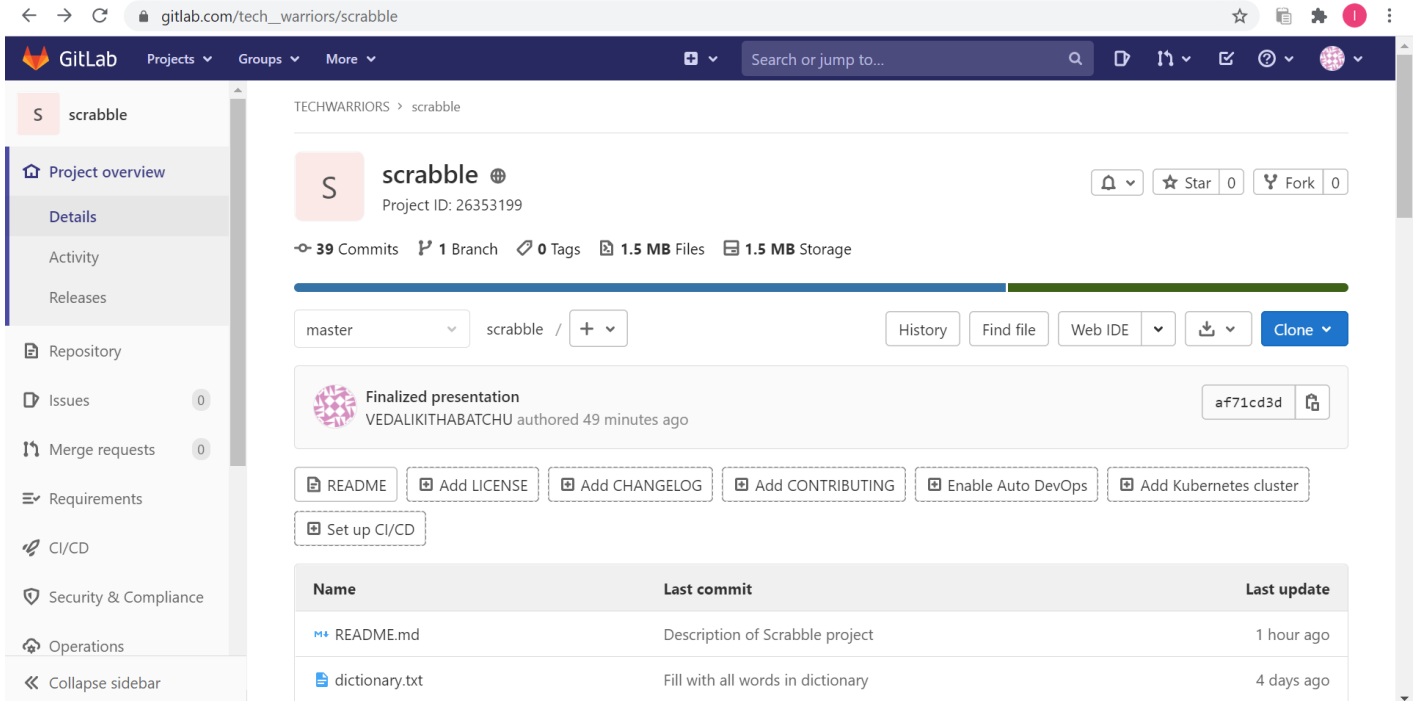
- We have used GitLab to store our files in Repository.
- We have used Git bash to write commands to store files in GitLab.
- Python language of (3.9.4 (64 bit) version to build our code as in PyCharm editor.
- Latex as a extension in Visual Studio Code to prepare presentations.
- Done whole project in Windows Operating System.

CODE STACKS

- We used some conditional statements (if else, else if ladder) and loops (while, for).
- We used global variables so as to not to call every variable every time.
- We uploaded dictionary.txt, tiles.txt, scrabble.tex, scrabble.txt, scrabble.pdf files.

STATISTICS

- Totally we used 9 functions such as, game board , player details, valid word, valid check, word from letters, board display, game play, score, update score.
- Our code consists of 185 lines.
- Commits



REFERENCE

- GitLab link

`https://gitlab.com/tech__warriors/scrabble`

- Refrence links
- https://www.scrapmaker.com/download/data/wordlists/dictionaries/dictionary.txt
- https://cdn.download-free-games.com/cf/images/nfe/uploads/board1.jpg
- https://www.lucidchart.com/techblog/2016/12/07/how-to-make-a-presentation-in-latex/
- https://scrabble-go.en.uptodown.com/android

FUTURE SCOPE

We can implement through GUI

BY TECH WARRIORS

P. Yasasvini
EEE
19B01A02B2

B.Veda Likitha
IT
19B01A1209

Shaik Raheema
CSE
19B01A05F7

V.Amrutha
ECE
19B01A04I9

M. Renuka Sai
ME
19B01A0336

B. Santhoshi
CSE
19B01A0528

THANK YOU !!!