# **ASSIGNMENT 2**

Progress #1 (Started on Jan 19-23 and then from Feb 11. Ended on Feb 25. Finished in 20 days)

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* Welcome to votecandidate.c programed by Samuela Abigail- 71762108039 \*

\* \*

\* \*

\* \*

\* AI & DS Department \*

\* Coimbatore Institute of Technology \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

#include <stdio.h>

#include <stdlib.h>

#include <string.h>

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* Start of colored text functions \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//red color

void red(){

printf("\033[1;31m");

}

void reset();

//green color

void green(){

printf("\033[1;32m");

}

void reset();

//yellow color

void yellow(){

printf("\033[1;33m");

}

void reset();

//blue color

void blue(){

printf("\033[1;34m");

}

void reset();

//purple color

void purple(){

printf("\033[1;35m");

}

void reset();

//cyan color

void cyan(){

printf("\033[1;36m");

}

void reset();

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of colored text functions \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* START of IMPORTANT functions \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//function to clear screen. Use cls for TurboC and clear for GCC/G++ compilers

void screen\_clear(void){

system("cls");

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of screen\_clear() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* END of IMPORTANT functions \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* Start of main() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

int main()

{

int option;//used for selecting menu option

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*Press ENTER key to start Machine\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n");

getchar();

screen\_clear();//clears screen

blue();

printf("\n\*\*\*\*\*\*\*\*\*WELCOME to Tamil Nadu State Electoral Commission E-system\*\*\*\*\*\*\*\*\*\*\n\n");

do {

cyan();

printf("\t1. View Candidates\n");

printf("\t2. Register Voter\n");

printf("\t3. Vote\n");

printf("\t4. View Voting Results and Summary\n");

printf("\t5. Quit\n");

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*PLEASE select a choice\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n\n");

yellow();

printf("\nEnter your choice: ");

scanf("%d", &option);

switch (option) {

case 1:

break;

case 2:

break;

case 3:

break;

case 4:

break;

case 5:

green();

printf("\nThank you for visiting. Goodbye!");

exit(0);

break;

default:

red();

printf("\nInvalid selection, please try again!\n\n");

}

} while (1);

return 0;

}

Progress #2

**Main**

#include <stdio.h>

#include <stdlib.h>

#include "votecandidate.h"//including header created by me so that I can call it's library functions here

int main()

{

vote\_candidate\_menu();//calling function from votecandidate.h header file

return 0;

}

**Source file (.c)**

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* Welcome to votecandidate.c programed by Samuela Abigail- 71762108039 \*

\* \*

\* \*

\* \*

\* AI & DS Department \*

\* Coimbatore Institute of Technology \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* Start of colored text functions \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//red color

void red(){

printf("\033[1;31m");

}

void reset();

//green color

void green(){

printf("\033[1;32m");

}

void reset();

//yellow color

void yellow(){

printf("\033[1;33m");

}

void reset();

//blue color

void blue(){

printf("\033[1;34m");

}

void reset();

//purple color

void purple(){

printf("\033[1;35m");

}

void reset();

//cyan color

void cyan(){

printf("\033[1;36m");

}

void reset();

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of colored text functions \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//function to clear screen. Use cls for TurboC and clear for GCC/G++ compilers

void screen\_clear()

{

system("cls");

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of screen\_clear() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

void vote\_candidate\_menu()

{

int option;//used for selecting menu option

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*Press ENTER key to start Machine\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n");

getchar();

screen\_clear();//clears screen

blue();

printf("\n\*\*\*\*\*\*\*\*\*WELCOME to Tamil Nadu State Electoral Commission E-system\*\*\*\*\*\*\*\*\*\*\n\n");

do {

cyan();

printf("\t1. View Candidates\n");

printf("\t2. Register Voter\n");

printf("\t3. Vote\n");

printf("\t4. View Voting Results and Summary\n");

printf("\t5. Quit\n");

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*PLEASE select a choice\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n\n");

yellow();

printf("\nEnter your choice: ");

scanf("%d", &option);

switch (option) {

case 1:

break;

case 2:

break;

case 3:

break;

case 4:

break;

case 5:

green();

printf("\nThank you for visiting. Goodbye!");

exit(0);

break;

default:

red();

printf("\nInvalid selection, please try again!\n\n");

}

} while (1);

}

**Header file (.h)**

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* Welcome to votecandidate.h programed by Samuela Abigail- 71762108039 \*

\* \*

\* \*

\* \*

\* AI & DS Department \*

\* Coimbatore Institute of Technology \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

#ifndef VOTECANDIDATE\_H\_INCLUDED

#define VOTECANDIDATE\_H\_INCLUDED

/\*\*\*\*\*\*\*\*function declarations\*\*\*\*\*\*\*\*/

//these will become library functions of this header file

void red();

void cyan();

void yellow();

void green();

void purple();

void blue();

void screen\_clear();

void vote\_candidate\_menu();

#endif // VOTECANDIDATE\_H\_INCLUDED

Progress #3 (only .c file)

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* Welcome to votecandidate.c programed by Samuela Abigail- 71762108039 \*

\* \*

\* \*

\* \*

\* AI & DS Department \*

\* Coimbatore Institute of Technology \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*global variables\*\*\*\*\*\*\*/

//for candidates

struct cand

{

char cand\_id[10];//candidate ID

char cand\_name[25];//candidate name

char cand\_par[25];//candidate party name

int cand\_div;//candidate division number (division 1 to division 4)

int count;//number of votes of candidate

};

struct cand candidate;

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* Start of colored text functions \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//red color

void red(){

printf("\033[1;31m");

}

void reset();

//green color

void green(){

printf("\033[1;32m");

}

void reset();

//yellow color

void yellow(){

printf("\033[1;33m");

}

void reset();

//blue color

void blue(){

printf("\033[1;34m");

}

void reset();

//purple color

void purple(){

printf("\033[1;35m");

}

void reset();

//cyan color

void cyan(){

printf("\033[1;36m");

}

void reset();

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of colored text functions \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//function to clear screen. Use cls for TurboC and clear for GCC/G++ compilers

void screen\_clear()

{

system("cls");

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of screen\_clear() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

void view\_candidates()//for viewing candidates in option 1 in menu

{

int option;

screen\_clear();

blue();

printf("\n\*\*\*\*\*\*\*\*\*WELCOME to List of Election Candidates\*\*\*\*\*\*\*\*\*\*\n\n");

cyan();

printf("\t1. View all candidates\n");

printf("\t2. View candidates by division\n");

printf("\t3. View candidates by party\n");

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*PLEASE select a choice\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n\n");

yellow();

printf("Enter your choice: ");

scanf("%d",&option);

green();

switch (option) {

case 1:

break;

case 2:

printf("Enter division name: ");

scanf("%d", candidate.cand\_div);

break;

case 3:

printf("Enter party name: ");

scanf("%s", candidate.cand\_par);

break;

default:

red();

printf("\nInvalid selection! Please try again.\n\n");

}

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of view\_candidates() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

void vote\_candidate\_menu()

{

int option;//used for selecting menu option

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*Press ENTER key to start Machine\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n");

getchar();

screen\_clear();//clears screen

do {

blue();

printf("\n\*\*\*\*\*\*\*\*\*WELCOME to Tamil Nadu State Electoral Commission E-system\*\*\*\*\*\*\*\*\*\*\n\n");

cyan();

printf("\t1. View Candidates\n");

printf("\t2. Register Voter\n");

printf("\t3. Vote\n");

printf("\t4. View Voting Results and Summary\n");

printf("\t5. Quit\n");

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*PLEASE select a choice\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n\n");

yellow();

printf("\nEnter your choice: ");

scanf("%d", &option);

switch (option) {

case 1:

view\_candidates();

break;

case 2:

break;

case 3:

break;

case 4:

break;

case 5:

screen\_clear();

green();

printf("\nThank you for visiting. Goodbye!");

exit(0);

break;

default:

red();

printf("\nInvalid selection, please try again!\n\n");

}

} while (1);

}

Progress #4

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* Welcome to votecandidate.c programed by Samuela Abigail- 71762108039 \*

\* \*

\* \*

\* \*

\* AI & DS Department \*

\* Coimbatore Institute of Technology \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

#include <time.h>//time is not working if I put this header in main.c

/\*\*\*\*\*global variables\*\*\*\*\*\*\*/

//for candidates

struct cand

{

char cand\_id[10];//candidate ID

char cand\_name[25];//candidate name

char cand\_par[25];//candidate party name

int cand\_div;//candidate division number (division 1 to division 4)

int count;//number of votes of candidate

};

struct cand candidate;

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* Start of colored text functions \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//red color

void red(){

printf("\033[1;31m");

}

void reset();

//green color

void green(){

printf("\033[1;32m");

}

void reset();

//yellow color

void yellow(){

printf("\033[1;33m");

}

void reset();

//blue color

void blue(){

printf("\033[1;34m");

}

void reset();

//purple color

void purple(){

printf("\033[1;35m");

}

void reset();

//cyan color

void cyan(){

printf("\033[1;36m");

}

void reset();

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of colored text functions \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//function to clear screen. Use cls for TurboC and clear for GCC/G++ compilers

void screen\_clear()

{

system("cls");

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of screen\_clear() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

void view\_candidates()//for viewing candidates in option 1 in menu

{

int option;

screen\_clear();

blue();

printf("\n\*\*\*\*\*\*\*\*\*WELCOME to List of Election Candidates\*\*\*\*\*\*\*\*\*\*\n\n");

cyan();

printf("\t1. View all candidates\n");

printf("\t2. View candidates by division\n");

printf("\t3. View candidates by party\n");

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*PLEASE select a choice\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n\n");

yellow();

printf("Enter your choice: ");

scanf("%d",&option);

green();

switch (option) {

case 1:

break;

case 2:

printf("Enter division name: ");

scanf("%d", candidate.cand\_div);

break;

case 3:

printf("Enter party name: ");

scanf("%s", candidate.cand\_par);

break;

default:

red();

printf("\nInvalid selection! Please try again.\n\n");

}

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of view\_candidates() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

void vote\_candidate\_menu()

{

int option;//used for selecting menu option

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*Press ENTER key to start Machine\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n");

getchar();

screen\_clear();//clears screen

do {

time\_t t;//for showing actual time

time(&t);//I used time to make this machine look pretty, although not sure if real EVMs display time

blue();

printf("\n\*\*\*\*\*\*\*\*\*WELCOME to Tamil Nadu State Electoral Commission E-system\*\*\*\*\*\*\*\*\*\*");

green();

printf(" %s\n\n",ctime(&t));//displays time

cyan();

printf("\t1. View Candidates\n");

printf("\t2. Register Voter\n");

printf("\t3. Vote\n");

printf("\t4. View Voting Results and Summary\n");

printf("\t5. Quit\n");

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*PLEASE select a choice\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n\n");

yellow();

printf("\nEnter your choice: ");

scanf("%d", &option);

switch (option) {

case 1:

view\_candidates();

break;

case 2:

break;

case 3:

break;

case 4:

break;

case 5:

screen\_clear();

green();

printf("\nThank you for visiting. Goodbye!");

exit(0);

break;

default:

red();

printf("\nInvalid selection, please try again!\n\n");

}

} while (1);

}

Progress #5

**Header**

#ifndef VOTECANDIDATE\_H\_INCLUDED

#define VOTECANDIDATE\_H\_INCLUDED

/\*\*\*\*\*\*\*\*function declarations\*\*\*\*\*\*\*\*/

//these will become library functions of this header file

void red();

void cyan();

void yellow();

void green();

void purple();

void blue();

void screen\_clear();

void real\_clock();

void view\_candidates();

void full\_candidate\_list();

void par\_list(struct cand candidate);

void div\_list(struct cand candidate);

void register\_voter();

void vote\_candidate\_menu();

#endif // VOTECANDIDATE\_H\_INCLUDED

**Source**

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* Welcome to votecandidate.c programed by Samuela Abigail- 71762108039 \*

\* \*

\* \*

\* \*

\* AI & DS Department \*

\* Coimbatore Institute of Technology \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

#include <time.h>//time is not working if I put this header in main.c

#include <stdio.h>//otherwise it's saying unknown type FILE

/\*\*\*\*\*global variables\*\*\*\*\*\*\*/

//for candidates

struct cand

{

char cand\_id[10];//candidate ID

char cand\_name[25];//candidate name

char cand\_par[25];//candidate party name

int cand\_div;//candidate division number (division 1 to division 4)

int count;//number of votes of candidate

};

struct cand candidate;

//for voters

struct vote

{

char voter\_id[10];//voter ID

char voter\_name[25];//voter name

char status;//Y means already voted, N means not voted

int voter\_div;//voter division number (division 1 to division 4)

int age;//age of voter should be >=18

};

struct vote voter;

/\*\*\*\*\*End of global variables\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*\*Accessory functions\*\*\*\*\*\*\*\*\*\*\*\*/

//red color

void red(){

printf("\033[1;31m");

}

void reset();

//green color

void green(){

printf("\033[1;32m");

}

void reset();

//yellow color

void yellow(){

printf("\033[1;33m");

}

void reset();

//blue color

void blue(){

printf("\033[1;34m");

}

void reset();

//purple color

void purple(){

printf("\033[1;35m");

}

void reset();

//cyan color

void cyan(){

printf("\033[1;36m");

}

void reset();

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of colored text functions \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//function to clear screen. Use cls for TurboC and clear for GCC/G++ compilers

void screen\_clear()

{

system("cls");

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of screen\_clear() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//function which displays real/actual time

void real\_clock()

{

time\_t t;//for showing actual time

time(&t);//I used time to make this machine look pretty, although not sure if real EVMs display time

//made this much space characters so that clock will be placed in right most corner

green();

printf(" \*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n");

printf(" %s",ctime(&t));//displays time

printf(" \*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n\n");

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of real\_clock() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*\*\*\*End of accessory functions\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*Menu option 1 functions\*\*\*\*\*\*\*\*\*\*\*/

//displays list of all candidates

void full\_candidate\_list()

{

char line[500];

FILE\* fptr;

if ((fptr = fopen("D:\\candidate\_list.txt", "r")) == NULL)

{

red();

printf("Candidate list is empty.");

}

//read file line by line

while (fgets(line, sizeof(line), fptr)) {

printf("%s", line);

}

fclose(fptr);

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of full\_candidate\_list() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//for displaying candidate list division-wise

void div\_list(struct cand candidate)

{

printf("Enter division name: ");

scanf("%d", candidate.cand\_div);

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of div\_list() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//for displaying candidate list party-wise

void par\_list(struct cand candidate)

{

printf("Enter party name: ");

scanf("%s", candidate.cand\_par);

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of par\_list() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//for viewing candidates in option 1 in menu

void view\_candidates()

{

int option;

screen\_clear();

blue();

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*WELCOME to List of Election Candidates\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*");

real\_clock();

cyan();

printf("\t1. View all candidates\n");

printf("\t2. View candidates by division\n");

printf("\t3. View candidates by party\n");

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*PLEASE select a choice\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n\n");

yellow();

printf("Enter your choice: ");

scanf("%d",&option);

green();

switch (option) {

case 1:

screen\_clear();

full\_candidate\_list();

break;

case 2:

screen\_clear();

div\_list(candidate);

break;

case 3:

screen\_clear();

par\_list(candidate);

break;

default:

red();

printf("\nInvalid selection! Please try again.\n\n");

}

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of view\_candidates() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*End of Menu option 1 functions\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*Menu option 2 functions\*\*\*\*\*\*\*\*\*\*\*/

//to register as voter

void register\_voter()

{

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of register\_voter() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*End of Menu option 2 functions\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*\*\*Function to be called inside main() function\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

void vote\_candidate\_menu()

{

int option;//used for selecting menu option

do {

blue();

printf("\n\*\*\*\*\*\*\*\*\*WELCOME to Tamil Nadu State Electoral Commission E-system\*\*\*\*\*\*\*\*\*\*");

real\_clock();//calling to display time

cyan();

printf("\t1. View Candidates\n");

printf("\t2. Register Voter\n");

printf("\t3. Vote\n");

printf("\t4. View Voting Results and Summary\n");

printf("\t5. Quit\n");

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*PLEASE select a choice\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n\n");

yellow();

printf("\nEnter your choice: ");

scanf("%d", &option);

switch (option) {

case 1:

view\_candidates();

break;

case 2:

register\_voter();

break;

case 3:

break;

case 4:

break;

case 5:

screen\_clear();

green();

printf("\nThank you for visiting. Goodbye!");

exit(0);

break;

default:

red();

printf("\nInvalid selection, please try again!\n\n");

}

} while (1);

}

**Main**

#include <stdio.h>

#include <stdlib.h>

#include <time.h>

#include "votecandidate.h"//including header created by me so that I can call it's library functions here

int main()

{

int option;

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*Press ENTER key to start Machine\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n");

getchar();

screen\_clear();//clears screen

blue();

printf("\n\*\*\*\*\*\*\*\*\*WELCOME to Tamil Nadu State Electoral Commission E-system\*\*\*\*\*\*\*\*\*\*");

real\_clock();//calling to display time

cyan();

printf("\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*WHO ARE YOU?\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n");

printf("\t1. I'm a Candidate\n");

printf("\t2. I'm a Voter\n");

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*PLEASE select a choice\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n\n");

yellow();

printf("Enter your choice: ");

scanf("%d",&option);

switch (option) {

case 1:

screen\_clear();

break;

case 2:

screen\_clear();

vote\_candidate\_menu();//calling function from votecandidate.h header file

break;

default:

red();

printf("\nInvalid selection! Please try again.\n\n");

}

return 0;

}

Progress #6

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* Welcome to votecandidate.c programed by Samuela Abigail- 71762108039 \*

\* \*

\* \*

\* \*

\* AI & DS Department \*

\* Coimbatore Institute of Technology \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//while running program, run this file along with main file. If only main file is run, it may not work properly

#include <time.h>//time is not working if I put this header in main.c

#include <stdio.h>//otherwise it's saying unknown type FILE

/\*\*\*\*\*global variables\*\*\*\*\*\*\*/

//for candidates

struct cand

{

char cand\_id[20][25];//candidate ID

char cand\_name[20][25];//candidate name

char cand\_par[10][25];//candidate party name

int cand\_div;//candidate division number (division 1 to division 4)

int count;//number of votes of candidate

};

struct cand candidate;

//for voters

struct vote

{

char voter\_id[25][100];//voter ID

char voter\_name[20][25];//voter first name

char status;//Y means already voted, N means not voted

int voter\_div;//voter division number (division 1 to division 4)

int age;//age of voter should be >=18

};

struct vote voter;

/\*\*\*\*\*End of global variables\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*\*Accessory functions\*\*\*\*\*\*\*\*\*\*\*\*/

//red color

void red(){

printf("\033[1;31m");

}

void reset();

//green color

void green(){

printf("\033[1;32m");

}

void reset();

//yellow color

void yellow(){

printf("\033[1;33m");

}

void reset();

//blue color

void blue(){

printf("\033[1;34m");

}

void reset();

//purple color

void purple(){

printf("\033[1;35m");

}

void reset();

//cyan color

void cyan(){

printf("\033[1;36m");

}

void reset();

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of colored text functions \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//function to clear screen. Use cls for TurboC and clear for GCC/G++ compilers

void screen\_clear()

{

system("cls");

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of screen\_clear() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//function which displays real/actual time

void real\_clock()

{

time\_t t;//for showing actual time

time(&t);//I used time to make this machine look pretty, although not sure if real EVMs display time

//made this much space characters so that clock will be placed in right most corner

green();

printf(" \*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n");

printf(" %s",ctime(&t));//displays time

printf(" \*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n\n");

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of real\_clock() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*\*\*\*End of accessory functions\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*Menu option 1 functions\*\*\*\*\*\*\*\*\*\*\*/

//displays list of all candidates

void full\_candidate\_list()

{

char line[500];

FILE\* fptr;

if ((fptr = fopen("D:\\candidate\_list.txt", "r")) == NULL)

{

red();

printf("Candidate list is empty.\n");

}

//read file line by line

while (fgets(line, sizeof(line), fptr)) {

printf("%s", line);

}

fclose(fptr);

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of full\_candidate\_list() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//for displaying candidate list division-wise

void div\_list(struct cand candidate)

{

printf("Enter division name: ");

scanf("%d", candidate.cand\_div);

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of div\_list() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//for displaying candidate list party-wise

void par\_list(struct cand candidate)

{

printf("Enter party name: ");

scanf("%s", candidate.cand\_par);

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of par\_list() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//for viewing candidates in option 1 in menu

void view\_candidates()

{

int option;

screen\_clear();

blue();

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*WELCOME to List of Election Candidates\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*");

real\_clock();

cyan();

printf("\t1. View all candidates\n");

printf("\t2. View candidates by division\n");

printf("\t3. View candidates by party\n");

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*PLEASE select a choice\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n\n");

yellow();

printf("Enter your choice: ");

scanf("%d",&option);

green();

switch (option) {

case 1:

screen\_clear();

full\_candidate\_list();

break;

case 2:

screen\_clear();

div\_list(candidate);

break;

case 3:

screen\_clear();

par\_list(candidate);

break;

default:

red();

printf("\nInvalid selection! Please try again.\n\n");

}

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of view\_candidates() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*End of Menu option 1 functions\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*Menu option 2 functions\*\*\*\*\*\*\*\*\*\*\*/

//to register as voter

void register\_voter()

{

char temp[100], line[100], str[]="@EVM#";

int i=0,j=0,len,k, dup\_flag=0, no\_space\_flag=1;

screen\_clear();

blue();

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*WELCOME to Voter Registration Portal\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*");

real\_clock();

for(k=1;k<2;k++ )//for the sake of having a loop to apply break statement.

//We have specified conditions so that for loop will be executed only once,

//otherwise it'll be infinite loop if left as for ( ; ; )

{

yellow();

printf("\nEnter your full name: ");

printf("\n(In case of initials, please leave space. Example- S Sakthisree)\n");

getchar();//if not used means scanf won't work for strings involving space characters

scanf("%[^\n]s", voter.voter\_name);

FILE \*file=(fopen("D:\\voter\_list.txt","r"));//opening file in reading mode

if(file==NULL){

red();

printf("\nError! Couldn't open file\n\n");

exit(1);

}

while ( fgets ( line, sizeof(line), file )!=NULL)//checking each line for duplicate voter name

{

char \*ptr = strstr(line, voter.voter\_name);

if (ptr != NULL)

{

dup\_flag=1;//voter name is already registered

}

}

fclose(file);

if(dup\_flag)//breaks out of loop if flag is set to 1

{

red();

printf("Already registered as voter!\n\n");

break;

}

printf("\nEnter your age: ");

scanf("%d", &voter.age);

if(voter.age <18)

{

red();

printf("\nYou are not eligible to be vote!\n\n");

break;

}

printf("\nEnter your division number (1-4): ");

scanf("%d", &voter.voter\_div);

if(voter.voter\_div <1 || voter.voter\_div >4)

{

red();

printf("\nInvalid division number!\n\n");

break;

}

green();

printf("\n\nYou have successfully registered as a voter!");

printf("\nHere is your voter ID, PLEASE keep it carefully: ");

len=strlen(voter.voter\_name);

strcpy(temp, voter.voter\_name);//storing voter name in temp.

//If voter.voter\_name itself used means concatenated name will be saved in file in place of actual name

for(i=0,j=0 ; i<len ; i++)//for removing space characters, but won't work for names without space characters,

//and hence their voter ID's will be blank

{

if(temp[i] == ' ' && temp[i]!=NULL)

{

for(j=i ; j<len ; j++)

{

temp[j] = temp[j+1];

}

len--;

no\_space\_flag=0;//flag is set to 0 since voter name has space character

//if voter name doesn't have space character (example- Sasha),it won't go inside above loop and voter ID won't be generated

}

}

temp[j]='\0';//assigning NULL at end of string

if(no\_space\_flag)//generating voter ID for names without space character

{

strcpy(temp,voter.voter\_name);//if I remove this here despite already applying it above for loop, it's not working

strcat(temp, str);//concatenating

strcpy(voter.voter\_id,temp);//voter ID is voter name only with @EVM# in end

}

else//for voters having space character in their name

{

strcpy(voter.voter\_id,temp);//assigning voter ID

}

purple();

printf("%s\n\n", voter.voter\_id);

voter.status='N';

FILE \*fptr=(fopen("D:\\voter\_list.txt","a"));//opening file in appending mode

if(fptr==NULL){

red();

printf("\nError! Couldn't open file\n\n");

exit(1);

}

//storing full name, voter ID, age, division, and status of voter in file

fprintf(fptr,"\n%s %s %d %d %c", voter.voter\_name, voter.voter\_id, voter.age, voter.voter\_div, voter.status);

fclose(fptr);

}

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of register\_voter() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*End of Menu option 2 functions\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*\*\*Function to be called inside main() function\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

void vote\_candidate\_menu()

{

int option;//used for selecting menu option

do {

blue();

printf("\n\*\*\*\*\*\*\*\*\*WELCOME to Tamil Nadu State Electoral Commission E-system\*\*\*\*\*\*\*\*\*\*");

real\_clock();//calling to display time

cyan();

printf("\t1. View Candidates\n");

printf("\t2. Register Voter\n");

printf("\t3. Vote\n");

printf("\t4. View Voting Results and Summary\n");

printf("\t5. Quit\n");

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*PLEASE select a choice\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n\n");

yellow();

printf("\nEnter your choice: ");

scanf("%d", &option);

switch (option) {

case 1:

view\_candidates();

break;

case 2:

register\_voter();

break;

case 3:

break;

case 4:

break;

case 5:

screen\_clear();

green();

printf("\nThank you for visiting. Goodbye!\n\n");

exit(0);

break;

default:

red();

printf("\nInvalid selection, please try again!\n\n");

}

} while (1);

}

Progress #7

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* Welcome to votecandidate.c programed by Samuela Abigail- 71762108039 \*

\* \*

\* \*

\* \*

\* AI & DS Department \*

\* Coimbatore Institute of Technology \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//while running program, run this file along with main file. If only main file is run, it may not work properly

#include <time.h>//time is not working if I put this header in main.c

#include <stdio.h>//otherwise it's saying unknown type FILE

/\*\*\*\*\*global variables\*\*\*\*\*\*\*/

//for candidates

struct candidate

{

char cand\_id[20][25];//candidate ID

char cand\_name[20][25];//candidate name

char cand\_par[10][25];//candidate party name

int cand\_div;//candidate division number (division 1 to division 4)

int count;//number of votes of candidate

}cand;

//for voters

struct voters

{

char voter\_id[25][100];//voter ID

char voter\_name[20][25];//voter first name

char status;//Y means already voted, N means not voted

int voter\_div;//voter division number (division 1 to division 4)

int age;//age of voter should be >=18

}voter;

/\*\*\*\*\*End of global variables\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*\*Accessory functions\*\*\*\*\*\*\*\*\*\*\*\*/

//red color

void red(){

printf("\033[1;31m");

}

void reset();

//green color

void green(){

printf("\033[1;32m");

}

void reset();

//yellow color

void yellow(){

printf("\033[1;33m");

}

void reset();

//blue color

void blue(){

printf("\033[1;34m");

}

void reset();

//purple color

void purple(){

printf("\033[1;35m");

}

void reset();

//cyan color

void cyan(){

printf("\033[1;36m");

}

void reset();

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of colored text functions \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//function to clear screen. Use cls for TurboC and clear for GCC/G++ compilers

void screen\_clear()

{

system("cls");

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of screen\_clear() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//function which displays real/actual time

void real\_clock()

{

time\_t t;//for showing actual time

time(&t);//I used time to make this machine look pretty, although not sure if real EVMs display time

//made this much space characters so that clock will be placed in right most corner

green();

printf(" \*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n");

printf(" %s",ctime(&t));//displays time

printf(" \*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n\n");

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of real\_clock() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*\*\*\*End of accessory functions\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*Menu option 1 functions\*\*\*\*\*\*\*\*\*\*\*/

//displays list of all candidates

void full\_candidate\_list()

{

char line[500];

FILE\* fptr;

if ((fptr = fopen("D:\\candidate\_list.txt", "r")) == NULL)

{

red();

printf("Candidate list is empty.\n");

}

//read file line by line

while (fgets(line, sizeof(line), fptr))

{

printf("%s", line);

}

fclose(fptr);

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of full\_candidate\_list() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//for displaying candidate list division-wise

void div\_list()

{

int division,i,j;

char line[500][200];

FILE\* fptr;

printf("Enter division number: ");

scanf("%d", &division);

if ((fptr = fopen("D:\\candidate\_list.txt", "r")) == NULL)

{

red();

printf("Candidate list is empty.\n");

}

//read file line by line

while (fgets(line, sizeof(line), fptr))

{

for(i=0;i<sizeof(line);i++)

{

for(j=0;j<sizeof(line[i]);j++)

{

if(strcmp(line[i][j],division)==0)

printf("%s", line);

}

}

}

fclose(fptr);

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of div\_list() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//for displaying candidate list party-wise

void par\_list()

{

int i=0;

char line[500][200];

char party[50];

FILE\* fptr;

printf("Enter party name: ");

getchar();

scanf("%[^\n]s", party);

if ((fptr = fopen("D:\\candidate\_list.txt", "r")) == NULL)

{

red();

printf("Candidate list is empty.\n");

}

//read file line by line

/\*while (fgets(line, sizeof(line), fptr)) {

if(strcmp(line[i],division)==0)

printf("%s", line);

i++;

}\*/

fclose(fptr);

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of par\_list() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//for viewing candidates in option 1 in menu

void view\_candidates()

{

int option;

screen\_clear();

blue();

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*WELCOME to List of Election Candidates\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*");

real\_clock();

cyan();

printf("\t1. View all candidates\n");

printf("\t2. View candidates by division\n");

printf("\t3. View candidates by party\n");

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*PLEASE select a choice\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n\n");

yellow();

printf("Enter your choice: ");

scanf("%d",&option);

green();

switch (option) {

case 1:

screen\_clear();

full\_candidate\_list();

break;

case 2:

screen\_clear();

div\_list();

break;

case 3:

screen\_clear();

par\_list();

break;

default:

red();

printf("\nInvalid selection! Please try again.\n\n");

}

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of view\_candidates() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*End of Menu option 1 functions\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*Menu option 2 functions\*\*\*\*\*\*\*\*\*\*\*/

//to register as voter

void register\_voter()

{

char temp[100], line[100], str[]="@EVM#";

int i=0,j=0,len,k, dup\_flag=0, no\_space\_flag=1;

screen\_clear();

blue();

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*WELCOME to Voter Registration Portal\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*");

real\_clock();

for(k=1;k<2;k++ )//for the sake of having a loop to apply break statement.

//We have specified conditions so that for loop will be executed only once,

//otherwise it'll be infinite loop if left as for ( ; ; )

{

cyan();

printf("\*You should be at least 18 years old to register as voter.\n");

printf("\*Your division number should be from 1 to 4.\n");

printf("\*While entering name, please leave space in case of initials. Example- S Sakthisree\n\n\n");

yellow();

printf("\nEnter your full name: ");

getchar();//if not used means scanf won't work for strings involving space characters

scanf("%[^\n]s", voter.voter\_name);

FILE \*file=(fopen("D:\\voter\_list.txt","r"));//opening file in reading mode

if(file==NULL){

red();

printf("\nError! Couldn't open file\n\n");

exit(1);

}

while ( fgets ( line, sizeof(line), file )!=NULL)//checking each line for duplicate voter name

{

char \*ptr = strstr(line, voter.voter\_name);

if (ptr != NULL)

{

dup\_flag=1;//voter name is already registered

}

}

fclose(file);

if(dup\_flag)//breaks out of loop if flag is set to 1

{

red();

printf("Already registered as voter!\n\n");

break;

}

printf("\nEnter your age: ");

scanf("%d", &voter.age);

if(voter.age <18)

{

red();

printf("\nYou are not eligible to be vote!\n\n");

break;

}

printf("\nEnter your division number: ");

scanf("%d", &voter.voter\_div);

if(voter.voter\_div <1 || voter.voter\_div >4)

{

red();

printf("\nInvalid division number!\n\n");

break;

}

green();

printf("\n\nYou have successfully registered as a voter!");

printf("\nHere is your voter ID, PLEASE keep it carefully: ");

len=strlen(voter.voter\_name);

strcpy(temp, voter.voter\_name);//storing voter name in temp.

//If voter.voter\_name itself used means concatenated name will be saved in file in place of actual name

for(i=0,j=0 ; i<len ; i++)//for removing space characters, but won't work for names without space characters,

//and hence their voter ID's will be blank

{

if(temp[i] == ' ' && temp[i]!=NULL)

{

for(j=i ; j<len ; j++)

{

temp[j] = temp[j+1];

}

len--;

no\_space\_flag=0;//flag is set to 0 since voter name has space character

//if voter name doesn't have space character (example- Sasha),it won't go inside above loop and voter ID won't be generated

}

}

temp[j]='\0';//assigning NULL at end of string

if(no\_space\_flag)//generating voter ID for names without space character

{

strcpy(temp,voter.voter\_name);//if I remove this here despite already applying it above for loop, it's not working

strcat(temp, str);//concatenating

strcpy(voter.voter\_id,temp);//voter ID is voter name only with @EVM# in end

}

else//for voters having space character in their name

{

strcpy(voter.voter\_id,temp);//assigning voter ID

}

purple();

printf("%s\n\n", voter.voter\_id);

voter.status='N';

FILE \*fptr=(fopen("D:\\voter\_list.txt","a"));//opening file in appending mode

if(fptr==NULL){

red();

printf("\nError! Couldn't open file\n\n");

exit(1);

}

//storing full name, voter ID, age, division, and status of voter in file

fprintf(fptr,"\n%s\t%s\t%d\t%d\t%c", voter.voter\_name, voter.voter\_id, voter.age, voter.voter\_div, voter.status);

fclose(fptr);

}

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of register\_voter() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*End of Menu option 2 functions\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*\*\*Function to be called inside main() function\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

void vote\_candidate\_menu()

{

int option;//used for selecting menu option

do {

blue();

printf("\n\*\*\*\*\*\*\*\*\*WELCOME to Tamil Nadu State Electoral Commission E-system\*\*\*\*\*\*\*\*\*\*");

real\_clock();//calling to display time

cyan();

printf("\t1. View Candidates\n");

printf("\t2. Register Voter\n");

printf("\t3. Vote\n");

printf("\t4. View Voting Results and Summary\n");

printf("\t5. Quit\n");

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*PLEASE select a choice\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n\n");

yellow();

printf("\nEnter your choice: ");

scanf("%d", &option);

switch (option) {

case 1:

view\_candidates();

break;

case 2:

register\_voter();

break;

case 3:

break;

case 4:

break;

case 5:

screen\_clear();

green();

printf("\nThank you for visiting. Goodbye!\n\n");

exit(0);

break;

default:

red();

printf("\nInvalid selection, please try again!\n\n");

}

} while (1);

}

Progess #8

**Main source file-**

#include <stdio.h>

#include <stdlib.h>

#include <time.h>

#include "votecandidate.h"//including header created by me so that I can call it's library functions here

#include "addcandidate.h"//including header created by Merlin so that I can call it's library functions here

int main()

{

int option;

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*Press ENTER key to start Machine\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n");

getchar();

screen\_clear();//clears screen

blue();

printf("\n\*\*\*\*\*\*\*\*\*WELCOME to Tamil Nadu State Electoral Commission E-system\*\*\*\*\*\*\*\*\*\*");

real\_clock();//calling to display time

cyan();

printf("\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*WHO ARE YOU?\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n");

printf("\t1. I'm a Candidate\n");

printf("\t2. I'm a Voter\n");

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*PLEASE select a choice\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n\n");

yellow();

printf("Enter your choice: ");

scanf("%d",&option);

switch (option) {

case 1:

screen\_clear();

candidate\_menu();//calling function from addcandidate.h header file

break;

case 2:

screen\_clear();

voter\_menu();//calling function from votecandidate.h header file

break;

default:

red();

printf("\nInvalid selection! Please try again.\n\n");

}

return 0;

}

**Votecandidate.c**

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* Welcome to votecandidate.c programed by Samuela Abigail- 71762108039 \*

\* \*

\* \*

\* \*

\* AI & DS Department \*

\* Coimbatore Institute of Technology \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//while running program, run this file along with main file. If only main file is run, it may not work properly

#include <time.h>

#include <stdio.h>

#include <stdlib.h>

#include <string.h>

#include "votecandidate.h"

/\*\*\*\*\*global variables\*\*\*\*\*\*\*/

//for candidates

struct candidate

{

char cand\_id[100][45];//candidate ID

char cand\_name[100][45];//candidate name

char cand\_par[25][45];//candidate party name

int cand\_div;//candidate division number (division 1 to division 4)

int count;//number of votes of candidate

}cand;

//for voters

struct voters

{

char voter\_id[100][45];//voter ID

char voter\_name[100][45];//voter first name

char status;//Y means already voted, N means not voted

int voter\_div;//voter division number (division 1 to division 4)

int age;//age of voter should be >=18

}voter;

/\*\*\*\*\*End of global variables\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*\*Accessory functions\*\*\*\*\*\*\*\*\*\*\*\*/

//red color

void red(){

printf("\033[1;31m");

}

void reset();

//green color

void green(){

printf("\033[1;32m");

}

void reset();

//yellow color

void yellow(){

printf("\033[1;33m");

}

void reset();

//blue color

void blue(){

printf("\033[1;34m");

}

void reset();

//purple color

void purple(){

printf("\033[1;35m");

}

void reset();

//cyan color

void cyan(){

printf("\033[1;36m");

}

void reset();

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of colored text functions \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//function to clear screen. Use cls for TurboC and clear for GCC/G++ compilers

void screen\_clear()

{

system("cls");

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of screen\_clear() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//function which displays real/actual time

void real\_clock()

{

time\_t t;//for showing actual time

time(&t);//I used time to make this machine look pretty, although not sure if real EVMs display time

//made this much space characters so that clock will be placed in right most corner

green();

printf(" \*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n");

printf(" %s",ctime(&t));//displays time

printf(" \*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n\n");

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of real\_clock() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*\*\*\*End of accessory functions\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*Menu option 1 functions\*\*\*\*\*\*\*\*\*\*\*/

//displays list of all candidates

void full\_candidate\_list()

{

char line[500];

FILE\* fptr;

if ((fptr = fopen("D:\\candidate\_list.txt", "r")) == NULL)

{

red();

printf("Candidate list is empty.\n");

}

//read file line by line

while (fgets(line, sizeof(line), fptr))

{

printf("%s", line);

}

fclose(fptr);

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of full\_candidate\_list() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//for displaying candidate list division-wise

void div\_list()

{

int division,i,j;

char line[500][200];

FILE\* fptr;

printf("Enter division number: ");

scanf("%d", &division);

if ((fptr = fopen("D:\\candidate\_list.txt", "r")) == NULL)

{

red();

printf("Candidate list is empty.\n");

}

//read file line by line

while (fgets(line, sizeof(line), fptr))

{

for(i=0;i<sizeof(line);i++)

{

for(j=0;j<sizeof(line[i]);j++)

{

if(strcmp(line[i][j],division)==0)

printf("%s", line);

}

}

}

fclose(fptr);

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of div\_list() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//for displaying candidate list party-wise

void par\_list()

{

int i=0;

char line[500][200];

char party[50];

FILE\* fptr;

printf("Enter party name: ");

getchar();

scanf("%[^\n]s", party);

if ((fptr = fopen("D:\\candidate\_list.txt", "r")) == NULL)

{

red();

printf("Candidate list is empty.\n");

}

//read file line by line

/\*while (fgets(line, sizeof(line), fptr)) {

if(strcmp(line[i],division)==0)

printf("%s", line);

i++;

}\*/

fclose(fptr);

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of par\_list() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

//for viewing candidates in option 1 in menu

void view\_candidates()

{

int option;

screen\_clear();

blue();

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*WELCOME to List of Election Candidates\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*");

real\_clock();

cyan();

printf("\t1. View all candidates\n");

printf("\t2. View candidates by division\n");

printf("\t3. View candidates by party\n");

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*PLEASE select a choice\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n\n");

yellow();

printf("Enter your choice: ");

scanf("%d",&option);

green();

switch (option) {

case 1:

screen\_clear();

full\_candidate\_list();

break;

case 2:

screen\_clear();

div\_list();

break;

case 3:

screen\_clear();

par\_list();

break;

default:

red();

printf("\nInvalid selection! Please try again.\n\n");

}

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of view\_candidates() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*End of Menu option 1 functions\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*Menu option 2 functions\*\*\*\*\*\*\*\*\*\*\*/

//to register as voter

void register\_voter()

{

char temp[100], line[100], str[]="@EVM#";

int i=0,j=0,len,k, dup\_flag=0, no\_space\_flag=1;

screen\_clear();

blue();

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*WELCOME to Voter Registration Portal\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*");

real\_clock();

for(k=1;k<2;k++ )//for the sake of having a loop to apply break statement.

//We have specified conditions so that for loop will be executed only once,

//otherwise it'll be infinite loop if left as for ( ; ; )

{

cyan();

printf("\*You should be at least 18 years old to register as voter.\n");

printf("\*Your division number should be from 1 to 4.\n");

printf("\*While entering name, please leave space in case of initials. Example- S Sakthisree\n\n\n");

yellow();

printf("\nEnter your full name: ");

getchar();//if not used means scanf won't work for strings involving space characters

scanf("%[^\n]s", voter.voter\_name);

FILE \*file=(fopen("D:\\voter\_list.txt","r"));//opening file in reading mode

if(file==NULL){

red();

printf("\nError! Couldn't open file\n\n");

exit(1);

}

while ( fgets ( line, sizeof(line), file )!=NULL)//checking each line for duplicate voter name

{

char \*ptr = strstr(line, voter.voter\_name);

if (ptr != NULL)

{

dup\_flag=1;//voter name is already registered

}

}

fclose(file);

if(dup\_flag)//breaks out of loop if flag is set to 1

{

red();

printf("Already registered as voter!\n\n");

break;

}

printf("\nEnter your age: ");

scanf("%d", &voter.age);

if(voter.age <18)

{

red();

printf("\nYou are not eligible to be vote!\n\n");

break;

}

printf("\nEnter your division number: ");

scanf("%d", &voter.voter\_div);

if(voter.voter\_div <1 || voter.voter\_div >4)

{

red();

printf("\nInvalid division number!\n\n");

break;

}

green();

printf("\n\nYou have successfully registered as a voter!");

printf("\nHere is your voter ID, PLEASE keep it carefully: ");

len=strlen(voter.voter\_name);

strcpy(temp, voter.voter\_name);//storing voter name in temp.

//If voter.voter\_name itself used means concatenated name will be saved in file in place of actual name

for(i=0,j=0 ; i<len ; i++)//for removing space characters, but won't work for names without space characters,

//and hence their voter ID's will be blank

{

if(temp[i] == ' ' && temp[i]!=NULL)

{

for(j=i ; j<len ; j++)

{

temp[j] = temp[j+1];

}

len--;

no\_space\_flag=0;//flag is set to 0 since voter name has space character

//if voter name doesn't have space character (example- Sasha),it won't go inside above loop and voter ID won't be generated

}

}

temp[j]='\0';//assigning NULL at end of string

if(no\_space\_flag)//generating voter ID for names without space character

{

strcpy(temp,voter.voter\_name);//if I remove this here despite already applying it above for loop, it's not working

strcat(temp, str);//concatenating

strcpy(voter.voter\_id,temp);//voter ID is voter name only with @EVM# in end

}

else//for voters having space character in their name

{

strcpy(voter.voter\_id,temp);//assigning voter ID

}

purple();

printf("%s\n\n", voter.voter\_id);

voter.status='N';

FILE \*fptr=(fopen("D:\\voter\_list.txt","a"));//opening file in appending mode

if(fptr==NULL){

red();

printf("\nError! Couldn't open file\n\n");

exit(1);

}

//storing full name, voter ID, age, division, and status of voter in file

fprintf(fptr,"\n%s\t%s\t%d\t%d\t%c", voter.voter\_name, voter.voter\_id, voter.age, voter.voter\_div, voter.status);

fclose(fptr);

}

}

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* End of register\_voter() function \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*End of Menu option 2 functions\*\*\*\*\*\*\*\*\*\*\*\*/

/\*\*\*\*\*\*\*\*\*\*\*\*Function to be called inside main() function\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

void voter\_menu()

{

int option;//used for selecting menu option

do {

blue();

printf("\n\*\*\*\*\*\*\*\*\*WELCOME to Tamil Nadu State Electoral Commission E-system\*\*\*\*\*\*\*\*\*\*");

real\_clock();//calling to display time

cyan();

printf("\t1. View Candidates\n");

printf("\t2. Register Voter\n");

printf("\t3. Vote\n");

printf("\t4. View Voting Results and Summary\n");

printf("\t5. Quit\n");

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*PLEASE select a choice\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n\n");

yellow();

printf("\nEnter your choice: ");

scanf("%d", &option);

switch (option) {

case 1:

view\_candidates();

break;

case 2:

register\_voter();

break;

case 3:

break;

case 4:

break;

case 5:

screen\_clear();

green();

printf("\nThank you for visiting. Goodbye!\n\n");

exit(0);

break;

default:

red();

printf("\nInvalid selection, please try again!\n\n");

}

} while (1);

}

**Addcandidate.c**

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* Welcome to addcandidate.c programed by Merlin Might V S- 71762108027 \*

\* \*

\* \*

\* \*

\* AI & DS Department \*

\* Coimbatore Institute of Technology \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

#include <stdio.h>

#include "addcandidate.h"

#include "votecandidate.h"//to access color, screen\_clear, and real\_clock functions and struct candidate

#include <stdlib.h>

#include <string.h>

//inclusion of struct candidate which is already present in votecandidate.c causes error

/\*\*\*\*\*\*\*\*\*\*\*\*Function to be called inside main() function\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

void candidate\_menu()

{

int option;//used for selecting menu option

do {

blue();

printf("\n\*\*\*\*\*\*\*\*\*WELCOME to Tamil Nadu State Electoral Commission E-system\*\*\*\*\*\*\*\*\*\*");

real\_clock();//calling to display time

cyan();

printf("\t1. Add Candidate\n");

printf("\t2. View Candidates\n");

printf("\t3. Quit\n");

printf("\n\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*PLEASE select a choice\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\n\n");

yellow();

printf("\nEnter your choice: ");

scanf("%d", &option);

switch (option) {

case 1:

break;

case 2:

break;

case 3:

screen\_clear();

green();

printf("\nThank you for visiting. Goodbye!\n\n");

exit(0);

break;

default:

red();

printf("\nInvalid selection, please try again!\n\n");

}

} while (1);

}

**Votecandidate.h**

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* Welcome to votecandidate.h programed by Samuela Abigail- 71762108039 \*

\* \*

\* \*

\* \*

\* AI & DS Department \*

\* Coimbatore Institute of Technology \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

#ifndef VOTECANDIDATE\_H\_INCLUDED

#define VOTECANDIDATE\_H\_INCLUDED

/\*\*\*\*\*\*\*\*function declarations\*\*\*\*\*\*\*\*/

//these will become library functions of this header file

void red();

void cyan();

void yellow();

void green();

void purple();

void blue();

void screen\_clear();

void real\_clock();

void view\_candidates();

void full\_candidate\_list();

void par\_list();

void div\_list();

void register\_voter();

void vote\_candidate\_menu();

#endif // VOTECANDIDATE\_H\_INCLUDED

**Addcandidate.h**

/\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

\* Welcome to addcandidate.h programed by Merlin Might V S- 71762108027 \*

\* \*

\* \*

\* \*

\* AI & DS Department \*

\* Coimbatore Institute of Technology \*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*/

#ifndef ADDCANDIDATE\_H\_INCLUDED

#define ADDCANDIDATE\_H\_INCLUDED

void candidate\_menu();

#endif // ADDCANDIDATE\_H\_INCLUDED