Experiment-1

Aim:-Write a C program to count the occurrence of each word and total words in a file.

**Software used:** Visual Studio Code

**Code:-**

#include <stdio.h>

#define MAX\_LEN 1024

int main() {

char ch;

int char\_count = 0, word\_count = 0, line\_count = 0;

int in\_word = 0;

char file\_name[MAX\_LEN];

FILE \*fp;

printf("Enter a file name: ");

scanf("%s", file\_name);

fp = fopen(file\_name, "r");

if(fp == NULL) {

printf("Could not open the file %s\n", file\_name);

return 1;

}

while ((ch = fgetc(fp)) != EOF) {

char\_count++;

if(ch == ' ' || ch == '\t' || ch == '\0' || ch == '\n') {

if (in\_word) {

in\_word = 0;

word\_count++;

}

if(ch = '\0' || ch == '\n') line\_count++;

} else {

in\_word = 1;

}

}

printf("In the file %s:\n", file\_name);

printf("Number of characters: %d.\n", char\_count);

printf("Number of words: %d.\n", word\_count);

printf("Number of lines: %d.\n", line\_count);

return 0;

}

**OUTPUT**

Enter file path: arpit.txt

Number of words: 9.

Occurrences of all distinct words in file:

my => 1

name => 1

is => 1

Arpit => 1

Agarwal => 1

i => 1

live => 1

in => 1

Jaipur => 1