LAB 10

Write a C program in UNIX platform to implement two way communication between two process using Message Queue with the help of the following system calls: msgget(), msgsnd(), msgrcv(), msgctl().

Lab10\_send.c

#include <stdio.h>

#include <sys/ipc.h>

#include <sys/msg.h>

#define MAX 100

struct msg\_buffer {

long msg\_type;

char msg\_text[MAX];

}message ;

int main() {

key\_t key=1012;

int msgid;

msgid = msgget(key, 0666 | IPC\_CREAT);

message.msg\_type = 1;

printf("Friend 1 Message : ");

scanf("%s", message.msg\_text);

msgsnd(msgid, &message, sizeof(message), 0);

msgrcv(msgid,&message,sizeof(message),2,0);

printf("Friend 2 is : %s \n", message.msg\_text);

return 0;

}

Lab10\_rcv.c

#include <stdio.h>

#include <sys/ipc.h>

#include <sys/msg.h>

struct msg\_buffer {

long msg\_type;

char msg\_text[100];

} message;

int main() {

key\_t key=1012;

int msgid;

msgid = msgget(key, 0666 | IPC\_CREAT);

msgrcv(msgid, &message, sizeof(message), 1, 0);

printf("Friend 1 Message is : %s \n",message.msg\_text);

printf("Friend 2 Sends is: ");

scanf("%s",message.msg\_text);

message.msg\_type = 2;

msgsnd(msgid, &message, sizeof(message), 0);

msgctl(msgid, IPC\_RMID, NULL);

return 0;

}







