**Practical No 11**

**Implementation of animation programs (using basic inbuilt graphical functions).**

**Aim: Write a program to implement an animation programs using basic inbuilt graphical functions.**

**Theory:**

Animation means giving life to any object in computer graphics. It has the power of injecting energy and emotions into the most seemingly inanimate objects. Computer-assisted animation and computer-generated animation are two categories of computer animation. It can be presented via film or video. The basic idea behind animation is to play back the recorded images at the rates fast enough to fool the human eye into interpreting them as continuous motion. Animation can make a series of dead images come alive. Animation can be used in many areas like entertainment, computer aided-design, scientific visualization, training, education, e-commerce, and computer art. To create the illusion of movement, an image is displayed on the computer screen then quickly replaced by a new image that is similar to the previous image, but shifted slightly. This technique is identical to how the illusion of movement is achieved with television and motion pictures. Computer animation is essentially a digital successor to the art of stop motion animation of 3D models and frame-by-frame animation of 2D illustrations. For 3D animations, objects (models) are built on the computer monitor (modelled) and 3D figures are rigged with a virtual skeleton. For 2D figure animations, separate objects (illustrations) and separate transparent layers are used, with or without a virtual skeleton. Then the limbs, eyes, mouth, clothes, etc. of the figure are moved by the animator on key frames.

**Conclusion: We have implemented an animation programs using basic inbuilt graphical functions.**

**Code:**

#include<graphics.h>

#include<iostream.h>

#include<conio.h>

#include<alloc.h>

#include<dos.h>

void main() {

int gd=DETECT,gm;

initgraph(&gd,&gm,"C:\\TURBOC3\\BGI");

void \*buffer;

unsigned int size;

line(230,330,370,330);

line(230,350,370,350);

line(226,335,226,345);

line(226,335,230,330);

line(226,345,230,350);

line(374,335,374,345);

line(374,335,370,330);

line(374,345,370,350);

outtextxy(235,365,"Loading Program...");

int x=232,y=336,x1=236,y1=344;

for(int i=1;i<5;i++) {

setfillstyle(1,WHITE);

bar(x,y,x1,y1);

x=x1+2;

x1=x1+6; }

size=imagesize(232,336,256,344);

buffer=malloc(size);

getimage(232,336,256,344,buffer);

x=232;

int m=0;

while(!kbhit()) {

putimage(x,336,buffer,XOR\_PUT);

x=x+2;

if(x>=350) {

m++;

x=232;

if(m==5)

return; }

putimage(x,336,buffer,XOR\_PUT);

delay(20); }

getch(); }

**Output:**



