

Базовые растровые алгоритмы

Код программы:

```
procedure TForm1.HNailsL(x,y:integer);
var i: integer;
begin
  with PaintBox1.Canvas do begin
    for i:=0 to 2 do
      begin
        MoveTo(x+10*i,y);
        LineTo(x+10*i,y+10);
        LineTo(x+5+10*i,y+15);
      end;
    end;
  end;
```

```
procedure TForm1.HNailsR(x,y:integer);
var i: integer;
begin
  with PaintBox1.Canvas do begin
    for i:=0 to 2 do
      begin
        MoveTo(x+10*i,y);
        LineTo(x+10*i,y+10);
        LineTo(x-5+10*i,y+15);
      end;
    end;
  end;
```

```
procedure TForm1.LNailsL(x,y: integer);
var i: integer;
begin
  with PaintBox1.Canvas do begin
    for i:=0 to 2 do
      begin
        MoveTo(x+8*i,y+5*i);
        LineTo(x-10+8*i,y+2+5*i);
        LineTo(x-20+8*i,y+10+5*i);
      end;
    end;
```

end;

procedure TForm1.LNailsR(x,y: integer);

var i: integer;

begin

with PaintBox1.Canvas do begin

for i:=0 to 2 do

begin

MoveTo(x-8*i,y+5*i);

LineTo(x+10-8*i,y+2+5*i);

LineTo(x+20-8*i,y+10+5*i);

end;

end;

end;

procedure TForm1.Eyes(xx1,xx2,y: integer; c: TColor);

begin

with PaintBox1.Canvas do begin

Pen.Style:=psClear;

Pen.Color:=c;

Brush.Color:=c;

Ellipse(xx1,y,xx1+10,y+15);

Ellipse(xx2,y,xx2+10,y+15);

end;

end;

procedure TForm1.Button1Click(Sender: TObject);

begin

BodyColor:=RGBToColor(188,98,18);

OtherThColor:=RGBToColor(112,55,6);

LineColor:=RGBToColor(60,30,5);

with PaintBox1.Canvas do begin

Pen.Color:=BodyColor;

Brush.Color:=BodyColor;

Ellipse(100,20,300,200);

Ellipse(60,120,340,360);

Pen.Color:=OtherThColor;

Brush.Color:=OtherThColor;

Ellipse(125,25,145,45);

Ellipse(150,40,170,60);

```
Ellipse(105,45,125,65);
Ellipse(120,70,140,90);
Polygon([Point(142,28),Point(167,43),Point(153,57),Point(128,42)]);
Polygon([Point(128,28),Point(142,42),Point(122,62),Point(108,47)]);
Polygon([Point(108,62),Point(122,47),Point(137,73),Point(123,87)]);
```

```
Ellipse(230,40,250,60);
Ellipse(260,70,280,90);
Ellipse(255,25,275,45);
Ellipse(275,45,295,65);
Polygon([Point(247,57),Point(233,43),Point(258,28),Point(272,42)]);
Polygon([Point(258,42),Point(272,28),Point(292,48),Point(278,62)]);
Polygon([Point(278,48),Point(292,62),Point(277,87),Point(263,73)]);
```

```
Ellipse(50,180,130,300);
Ellipse(270,180,350,300);
Ellipse(100,340,205,380);
Ellipse(195,340,300,380);
```

```
Ellipse(140,65,260,135);
```

```
Pen.Color:=clBlack;
Brush.Color:=clBlack;
Ellipse(170,110,230,150);
```

```
Brush.Color:=clWhite;
Ellipse(160,90,180,120);
Ellipse(220,90,240,120);
Pen.Color:=clWhite;
Ellipse(180,120,200,130);
```

```
Pen.Color:=LineColor;
Brush.Color:=LineColor;
Ellipse(160,60,180,65);
Ellipse(220,60,240,65);
Pen.Width:=(PaintBox1.Canvas.Pen.Width)*2;
x1:=80;
y1:=290;
HNailsL(x1,y1);
x1:=300;
HNailsR(x1,y1);
```

```

x1:=120;
y1:=360;
LNailsL(x1,y1);
x1:=280;
LNailsR(x1,y1);

Arc(60,150,180,270,170,170,120,150);
Arc(170,110,230,170,180,160,220,160);

x1:=170;
x2:=230;
y1:=102;
Eyes(x1,x2,y1,clBlack);
end;

Timer1.Interval:=300;
Timer1.Enabled:=True;
end;

procedure TForm1.Timer1Timer(Sender: TObject);
begin
    Eyes(x1,x2,y1,clWhite);
    x1:=x1-1;
    x2:=x2-1;
    Eyes(x1,x2,y1,clBlack);

    if x1=162 then
    begin
        Eyes(x1,x2,y1,clWhite);
        x1:=170;
        x2:=230;
        Eyes(x1,x2,y1,clBlack);
    end;
end;

```

Пользовательский интерфейс:



Нарисуй