

## GAUTENG DEPARTMENT OF EDUCATION

## SENIOR CERTIFICATE EXAMINATION

COMPUTER STUDIES HG  
(First Paper: Practical)

---



---

**Possible Answers**  
**Feb / Mar 2006**


---



---

```

unit Vraag1U;

interface

uses
  Windows, Messages, SysUtils, Variants, Classes, Graphics, Controls, Forms,
  Dialogs, Buttons, StdCtrls, ComCtrls;

type
  TfrmVraag1 = class(TForm)
    gpbLeer: TGroupBox;
    edtLeerNaam: TEdit;
    Label1: TLabel;           //Names ✓
    btnVertoon: TButton;     //Captions ✓
    redAfvoer: TRichEdit;
    bmbClose: TBitBtn;
    btnKombineer: TButton;
    procedure btnVertoonClick(Sender: TObject);
    procedure FormActivate(Sender: TObject);
    procedure btnKombineerClick(Sender: TObject);
  private
    { Private declarations }
  public
    { Public declarations }
  end;

  TRekord = record
    LidNom : string[6];
    Geslag : char;           ✓✓
    Voorl  : string[4];
    Van    : string[30];
  end;

var
  frmVraag1: TfrmVraag1;
  DLeerMan, DLeerVrou, DLeer✓ : file of TRekord; ✓

implementation

{$R *.dfm}

```



```

procedure TfrmVraag1.btnVertoonClick(Sender: TObject);
var
  Persoon : TRekord; ✓
begin
  redAfvoer.Clear; ✓
  redAfvoer.Lines.Add('Lidnom Van Voorl Geslag'); ✓
  AssignFile(DLeer,edtLeerNaam.Text); ✓
  reset(DLeer); ✓
  while not eof(DLeer) do ✓
  begin
    read(DLeer,Persoon); ✓
    with Persoon do ✓
      redAfvoer.Lines.Add(LidNom + #9 + Van + #9 + Voorl + #9 + Geslag); ✓✓
  end;
end;

```

```

procedure TfrmVraag1.btnKombineerClick(Sender: TObject);
var
  Persoon : TRekord; ✓
begin
  AssignFile(DLeerMan,'c:\gpy\Manlik.dat'); ✓
  AssignFile(DLeerVrou,'c:\gpy\Vroulik.dat'); ✓
  AssignFile(DLeer,'c:\gpy\AlleLede.dat'); ✓
  rewrite(DLeer); ✓
  reset(DLeerMan); ✓
  while not eof(DLeerMan) do ✓
  begin
    read(DLeerMan,Persoon); ✓
    write(DLeer,Persoon); ✓
  end;
  CloseFile(DLeerMan); ✓
  reset(DLeerVrou); ✓
  while not eof(DLeerVrou) do ✓
  begin
    read(DLeerVrou,Persoon); ✓
    write(DLeer,Persoon); ✓
  end;
  CloseFile(DLeerVrou); ✓
  CloseFile(DLeer); ✓
end;

```

```

procedure TfrmVraag1.FormActivate(Sender: TObject);
begin
  redAfvoer.Paragraph.TabCount := 3; ✓
  redAfvoer.Paragraph.Tab[0] := 54;
  redAfvoer.Paragraph.Tab[1] := 202; ✓
  redAfvoer.Paragraph.Tab[2] := 250
end;

end.

```



```

unit Vraag2U;

interface

uses
  Windows, Messages, SysUtils, Classes, Graphics, Controls, Forms, Dialogs,
  StdCtrls, Buttons;

type
  TfrmPrente = class(TForm)
    edtToevoer: TEdit;
    Label1: TLabel; //Names✓
    btnVerwerk: TButton; //Captions✓
    redPrent: TMemo;
    BitBtn1: TBitBtn;
    procedure btnVerwerkClick(Sender: TObject);
  private
    { Private declarations }
  public
    { Public declarations }
  end;

  TwoordSkik = array[1..100] of string;

var
  frmPrente: TfrmPrente;

implementation

{$R *.DFM}

procedure Sorteer(var✓ _arWoord : TwoordSkik✓; _Tel : integer✓);
var
  I,J : integer;
  Stoor : string;
begin
  for I := 1✓ to _Tel - 1✓ do
    for J := I + 1✓ to _Tel✓ do
      if (_arWoord[J] < _arWoord[I]) then✓
        begin
          Stoor := _arWoord[I];
          _arWoord[I] := _arWoord[J]; ✓✓
          _arWoord[J] := Stoor;
        end;
    end;
end;

```



```

procedure TfrmPrente.btnVerwerkClick(Sender: TObject);
var
  TFileAfr, TFileVreemd      : TextFile; ✓
  arAfr, arVreemd, arWoord   : TWordSkik; ✓
  I, J, TelA, TelW, Spasie   : integer;
  Sin                        : string; ✓
  Gevind                     : boolean; ✓
begin
  // LEES TEKSLEERS NA SKIKKINGS //
  AssignFile(TFileAfr, 'c:\gpy\Afr.txt'); ✓
  AssignFile(TFileVreemd, 'c:\gpy\Vreemd.txt'); ✓
  TelA := 0; ✓
  reset(TFileAfr); ✓
  while not eof(TFileAfr) do ✓
  begin
    inc(TelA); ✓
    readln(TFileAfr, arAfr[TelA]); ✓
  end;
  CloseFile(TFileAfr); ✓
  TelA := 0;
  reset(TFileVreemd);
  while not eof(TFileVreemd) do
  begin
    inc(TelA); ✓
    readln(TFileVreemd, arVreemd[TelA]); ✓✓✓✓
  end;
  CloseFile(TFileVreemd);

  // MAAK HOOFLETTERS //
  Sin := edtToevoer.Text + ' '; ✓
  for I := 1 to length(Sin) do ✓✓
    Sin[I] := upcase(Sin[I]); ✓

  // BREEK TOEVOER OP IN WOORDE //
  TelW := 0; ✓
  while (length(Sin) > 0) do
  begin
    inc(TelW); ✓
    Spasie := pos(' ', Sin); ✓
    arWoord[TelW] := copy(Sin, 1, Spasie - 1); ✓
    delete(Sin, 1, Spasie); ✓
  end;

  // SORTEER WOORDE ALFABETIES //
  Sorteert(arWoord, TelW); ✓

```



```

// SOEK ELKE WOORD EN SY VERTALING //
for I := 1 to TelW do
begin
  Gevind := false;
  J := 0;
  while not Gevind and (J <= TelA) do
  begin
    inc(J);
    if (arAfr[J] = arWoord[I]) then
      Gevind := true;
  end;
  redPrent.Lines.Add(arVreemd[J]); // VOEG VERTALING BY MEMO //
end;

end;

end.

unit Vraag2U;

interface

uses
  Windows, Messages, SysUtils, Classes, Graphics, Controls, Forms, Dialogs,
  StdCtrls, Buttons;

type
  TfrmPrente = class(TForm)
    edtToevoer: TEdit;
    Label1: TLabel;
    btnVerwerk: TButton; //Names
    redPrent: TMemo; //Captions
    BitBtn1: TBitBtn;
    procedure btnVerwerkClick(Sender: TObject);
  private
    { Private declarations }
  public
    { Public declarations }
  end;

  TWoordSkik = array[1..100] of string;

var
  frmPrente: TfrmPrente;

implementation

{$R *.DFM}

```

```

procedure Sorteert(var _arWoord : TWoordSkik; _Tel : integer);
var
  I,J : integer;
  Stoor : string;
begin
  for I := 1 to _Tel - 1 do
    for J := I + 1 to _Tel do
      if (_arWoord[J] < _arWoord[I]) then
        begin
          Stoor := _arWoord[I];
          _arWoord[I] := _arWoord[J];
          _arWoord[J] := Stoor;
        end;
      end;
    end;
  end;
end;

```

```

procedure TfrmPrente.btnVerwerkClick(Sender: TObject);
var
  TFileAfr, TFileVreemd : TextFile;
  arWoord : TWoordSkik;
  I, J, TelA, TelW, Spasie : integer;
  Sin, WoordA, WoordV : string;
  Gevind : boolean;
begin
  // MAAK HOOFLETTERS //
  Sin := edtToevoer.Text + ' ';
  for I := 1 to length(Sin) do
    Sin[I] := upcase(Sin[I]);

    // BREEK TOEVOER OP IN WOORDE EN PLAAS IN SKIK //
    TelW := 0;
    while (length(Sin) > 0) do
      begin
        inc(TelW);
        Spasie := pos(' ', Sin);
        arWoord[TelW] := copy(Sin, 1, Spasie - 1);
        delete(Sin, 1, Spasie);
      end;

      // SORTTEER WOORDE ALFABETIES //
      Sorteert(arWoord, TelW);
    end;
  end;
end;

```



```

// SOEK ELKE WOORD EN SY VERTALING //
AssignFile(TFileAfr, 'c:\gpy\Afr.txt'); ✓
AssignFile(TFileVreemd, 'c:\gpy\Vreemd.txt'); ✓
for✓ I := 1 to TelW✓ do
begin
  Tela := 0; ✓
  Gevind := False; ✓
  reset(TFileAfr); ✓
  while✓ not eof(TFileAfr) ✓ and not Gevind✓ do
  begin
    readln✓ (TFileAfr, WoordA); ✓
    inc(Tela); ✓
    if✓ (WoordA = arWoord[I]) ✓ then
      Gevind := True; ✓
  end;
  if Gevind✓ then
  begin
    reset(TFileVreemd); ✓
    for✓ J := 1 to Tela✓ do
      Readln✓ (TFileVreemd, WoordV); ✓
      redPrent.Lines.Add(WoordV); ✓
    end;
  end;
  CloseFile(TFileAfr); ✓
  CloseFile(TFileVreemd); ✓
end;

end.

```

```

program Pascal_Vr1;

```

```

{$APPTYPE CONSOLE}

```

```

type

```

```

  TRekord = record
    LidNom : string[6];
    Geslag : char;           ✓✓
    Voorl  : string[4];
    Van    : string[30];
  end;

```

```

var

```

```

  DLeerMan, DLeerVrou, DLeer✓ : file of TRekord; ✓
  Keuse                        : integer;

```

```

procedure VertoonLeer;
var
  Persoon : TRekord; ✓
  LNaam   : string;
begin
  clrscr; ✓
  writeln('Wat is die leernaam?'); ✓
  readln(LNaam);
  writeln('Lidnom Van                               Voorl Geslag'); ✓
  Assign(DLeer,LNaam); ✓
  reset(DLeer); ✓
  while not eof(DLeer) do ✓
  begin
    read✓ (DLeer,Persoon); ✓
    with Persoon do ✓
      writeln(LidNom,':1,Van,':20 - length(Van),Voorl,Geslag); ✓✓
  end;
end;

```

```

procedure Kombineer;
var
  Persoon : TRekord; ✓
begin
  Assign✓ (DLeerMan,'c:\gpy\Manlik.dat'); ✓
  Assign(DLeerVrou,'c:\gpy\Vroulik.dat'); ✓
  Assign(DLeer,'c:\gpy\AlleLede.dat'); ✓
  rewrite(DLeer); ✓
  reset(DLeerMan); ✓
  while not eof(DLeerMan) ✓ do
  begin
    read✓ (DLeerMan,Persoon); ✓
    write✓ (DLeer,Persoon); ✓
  end;
  Close(DLeerMan); ✓
  reset(DLeerVrou); ✓
  while not eof(DLeerVrou) do ✓
  begin
    read✓ (DLeerVrou,Persoon); ✓
    write✓ (DLeer,Persoon); ✓
  end;
  Close(DLeerVrou); ✓
  Close(DLeer); ✓
end;

```



```

begin
  Keuse = 0;
  while (Keuse <> 3) do
  begin
    clrscr;
    writeln('1. Vertoon die inhoud van 'n datalêer. ');
    writeln('2. Kombineer. ');
    writeln('3. Eindig. ');
    writeln('Wat is u keuse? ');
    readln(Keuse);
    case Keuse of
      1 : VertoonLeer;
      2 : Kombineer;
    end;
  end;
end.

program Pascal_Vr2;

{$APPTYPE CONSOLE}

type

  TwoordSkik = array[1..100] of string;

var
  TFileAfr, TFileVreemd      : TextFile;
  arWoord                    : TwoordSkik;
  I, J, TelA, TelW, Spasie   : integer;
  Sin, WoordA, WoordV        : string;
  Gevind                     : boolean;

procedure Sorteer(var _arWoord : TwoordSkik; _Tel : integer);
var
  I, J : integer;
  Stoor : string;
begin
  for I := 1 to _Tel - 1 do
    for J := I + 1 to _Tel do
      if (_arWoord[J] < _arWoord[I]) then
      begin
        Stoor := _arWoord[I];
        _arWoord[I] := _arWoord[J];
        _arWoord[J] := Stoor;
      end;
    end;
  end;
end;

```



```

begin
  clrscr;
  writeln('Tik die toevoersin in');    ✓✓
  readln(Sin);

  // MAAK HOOFLETTERS //
  Sin := Sin✓ + ' '; ✓
  for I := 1 to length(Sin) do✓✓
    Sin[I] ✓ := upcase(Sin[I]); ✓

  // BREEK TOEVOER OP IN WOORDE EN PLAAS IN SKIK //
  TelW := 0; ✓
  while (length(Sin) > 0) do✓
  begin
    inc(TelW); ✓
    Spasie := pos✓ (' ',Sin); ✓
    arWoord[TelW] ✓ := copy(Sin,1✓,Spasie - 1✓);
    delete✓ (Sin,1,Spasie); ✓
  end;

  // SORTEER WOORDE ALFABETIES //
  Sorteert(arWoord,TelW); ✓

  // SOEK ELKE WOORD EN SY VERTALING //
  Assign(TFileAfr,'c:\gpy\Afr.txt'); ✓
  Assign(TFileVreemd,'c:\gpy\Vreemd.txt'); ✓
  for✓ I := 1 to TelW do✓
  begin
    Tela := 0; ✓
    Gevind := False; ✓
    reset(TFileAfr); ✓
    while✓ not eof(TFileAfr) ✓ and not Gevind✓ do
    begin
      readln✓ (TFileAfr,Woorda); ✓
      inc(Tela); ✓
      if✓ (Woorda = arWoord[I]) ✓ then
        Gevind := True; ✓
    end;
    if Gevind✓ then
    begin
      reset(TFileVreemd); ✓
      for✓ J := 1 to Tela✓ do
        Readln✓ (TFileVreemd,WoordV); ✓
        writeln(WoordV); ✓
      end;
    end;
    Close(TFileAfr); ✓
    Close(TFileVreemd); ✓
  end.

```