



ESTRUCTURA DE DATOS

Dr. Said Polanco Martagón

PROGAMARIO NO.2

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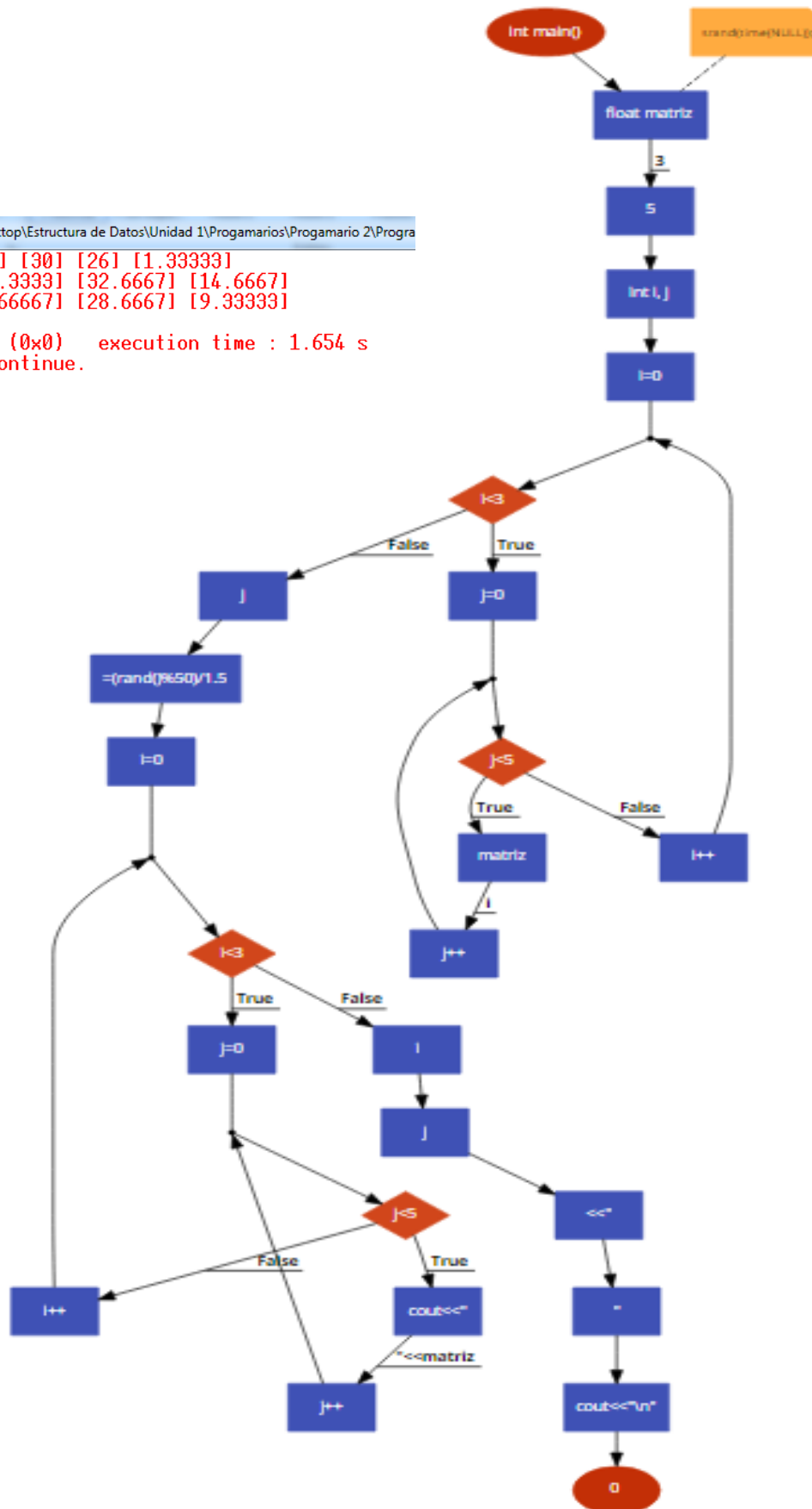
Febrero de 2017

Programa 1.

"C:\Users\Armando Isaac\Desktop\Estructura de Datos\Unidad 1\Programarios\Programario 2\Progra

```
[19.3333] [32.6667] [30] [26] [1.33333]
[14] [4.66667] [31.3333] [32.6667] [14.6667]
[18] [22.6667] [8.66667] [28.6667] [9.33333]
```

Process returned 0 (0x0) execution time : 1.654 s
Press any key to continue.

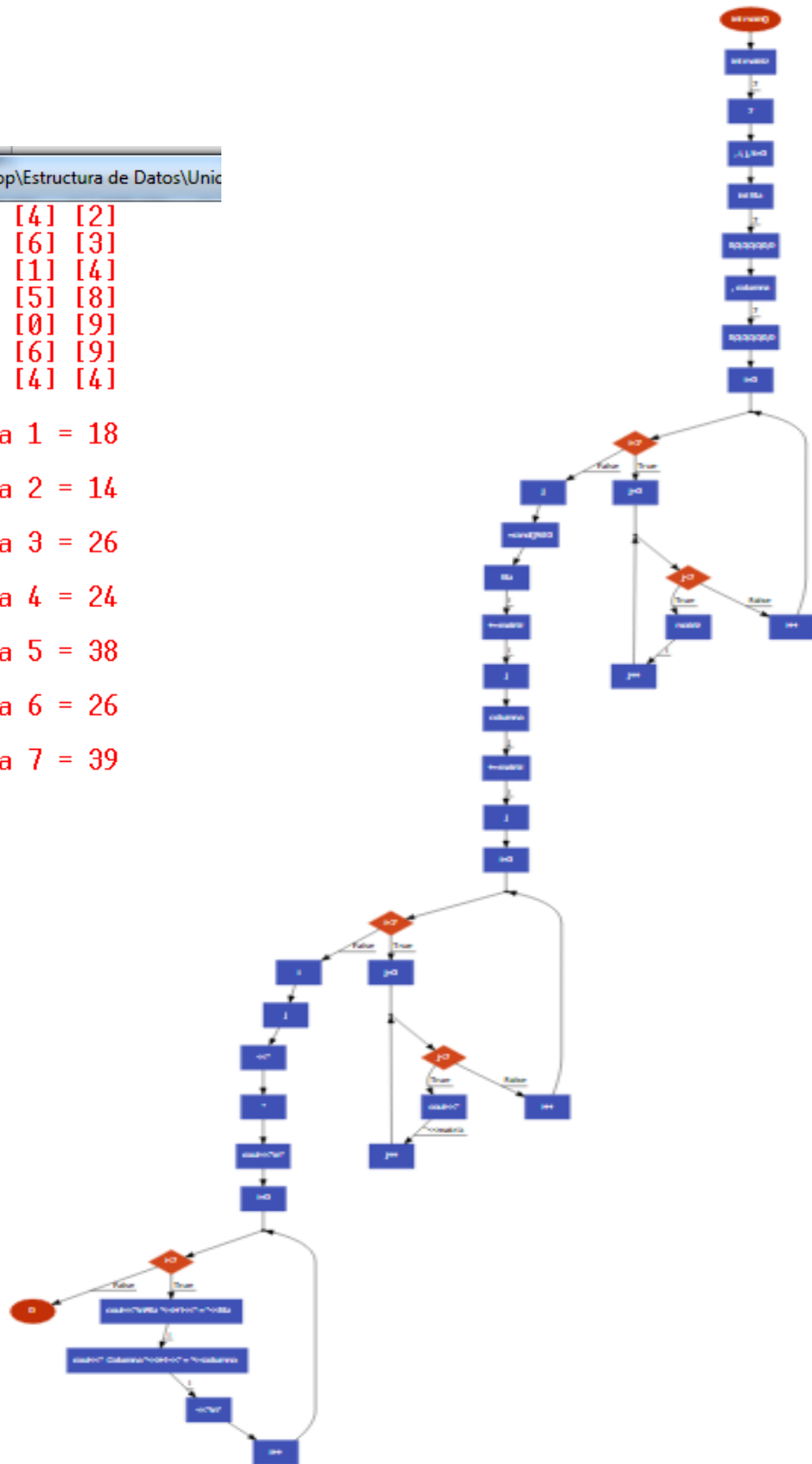


Programa 2

```

"C:\Users\Armando Isaac\Desktop\Estructura de Datos\Unic
[0] [2] [8] [4] [8] [4] [2]
[1] [1] [2] [3] [0] [6] [3]
[9] [0] [0] [1] [5] [1] [4]
[0] [4] [6] [0] [5] [5] [8]
[0] [7] [5] [9] [4] [0] [9]
[8] [0] [5] [4] [8] [6] [9]
[0] [0] [0] [3] [8] [4] [4]

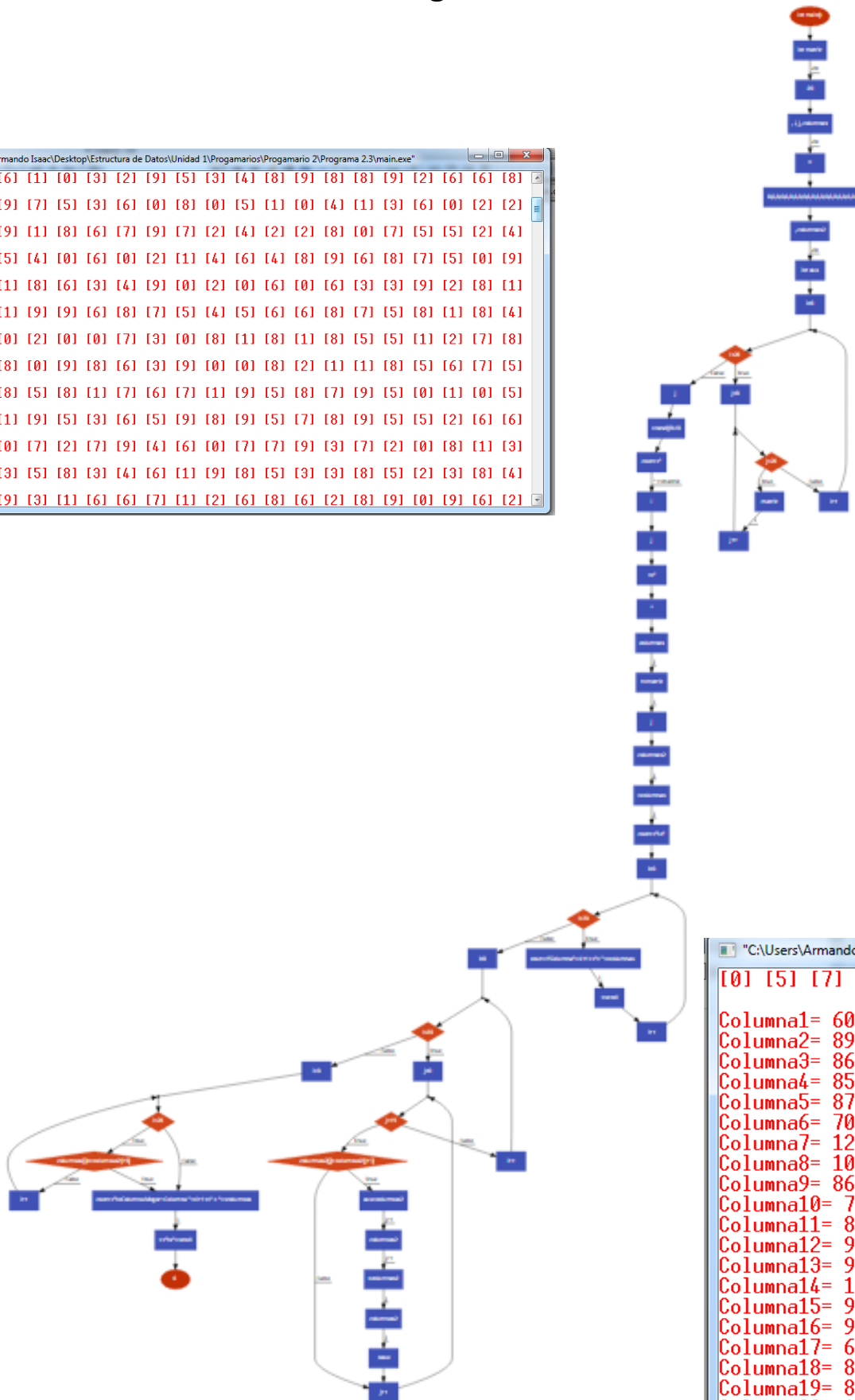
Fila 1 = 28  Columna 1 = 18
Fila 2 = 16  Columna 2 = 14
Fila 3 = 20  Columna 3 = 26
Fila 4 = 28  Columna 4 = 24
Fila 5 = 34  Columna 5 = 38
Fila 6 = 40  Columna 6 = 26
Fila 7 = 19  Columna 7 = 39
  
```



Programa 3

"C:\Users\Armando Isaac\Desktop\Estructura de Datos\Unidad 1\Programarios\Programario 2\Programa 2.3\main.exe"

| | | | | | | | | | | | | | | | | | | | |
|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|
| [2] | [7] | [6] | [1] | [0] | [3] | [2] | [9] | [5] | [3] | [4] | [8] | [9] | [8] | [8] | [9] | [2] | [6] | [6] | [8] |
| [2] | [2] | [9] | [7] | [5] | [3] | [6] | [0] | [8] | [0] | [5] | [1] | [0] | [4] | [1] | [3] | [6] | [0] | [2] | [2] |
| [3] | [9] | [9] | [1] | [8] | [6] | [7] | [9] | [7] | [2] | [4] | [2] | [2] | [8] | [0] | [7] | [5] | [5] | [2] | [4] |
| [1] | [9] | [5] | [4] | [0] | [6] | [0] | [2] | [1] | [4] | [6] | [4] | [8] | [9] | [6] | [8] | [7] | [5] | [0] | [9] |
| [2] | [4] | [1] | [8] | [6] | [3] | [4] | [9] | [0] | [2] | [0] | [6] | [0] | [6] | [3] | [3] | [9] | [2] | [8] | [1] |
| [6] | [2] | [1] | [9] | [9] | [6] | [8] | [7] | [5] | [4] | [5] | [6] | [6] | [8] | [7] | [5] | [8] | [1] | [8] | [4] |
| [6] | [4] | [0] | [2] | [0] | [0] | [7] | [3] | [0] | [8] | [1] | [8] | [1] | [8] | [5] | [5] | [1] | [2] | [7] | [8] |
| [6] | [4] | [8] | [0] | [9] | [8] | [6] | [3] | [9] | [0] | [0] | [8] | [2] | [1] | [1] | [8] | [5] | [6] | [7] | [5] |
| [0] | [1] | [8] | [5] | [8] | [1] | [7] | [6] | [7] | [1] | [9] | [5] | [8] | [7] | [9] | [5] | [0] | [1] | [0] | [5] |
| [1] | [3] | [1] | [9] | [5] | [3] | [6] | [5] | [9] | [8] | [9] | [5] | [7] | [8] | [9] | [5] | [5] | [2] | [6] | [6] |
| [8] | [5] | [0] | [7] | [2] | [7] | [9] | [4] | [6] | [0] | [7] | [7] | [9] | [3] | [7] | [2] | [0] | [8] | [1] | [3] |
| [7] | [0] | [3] | [5] | [8] | [3] | [4] | [6] | [1] | [9] | [8] | [5] | [3] | [3] | [8] | [5] | [2] | [3] | [8] | [4] |
| [0] | [6] | [9] | [3] | [1] | [6] | [6] | [7] | [1] | [2] | [6] | [8] | [6] | [2] | [8] | [9] | [0] | [9] | [6] | [2] |



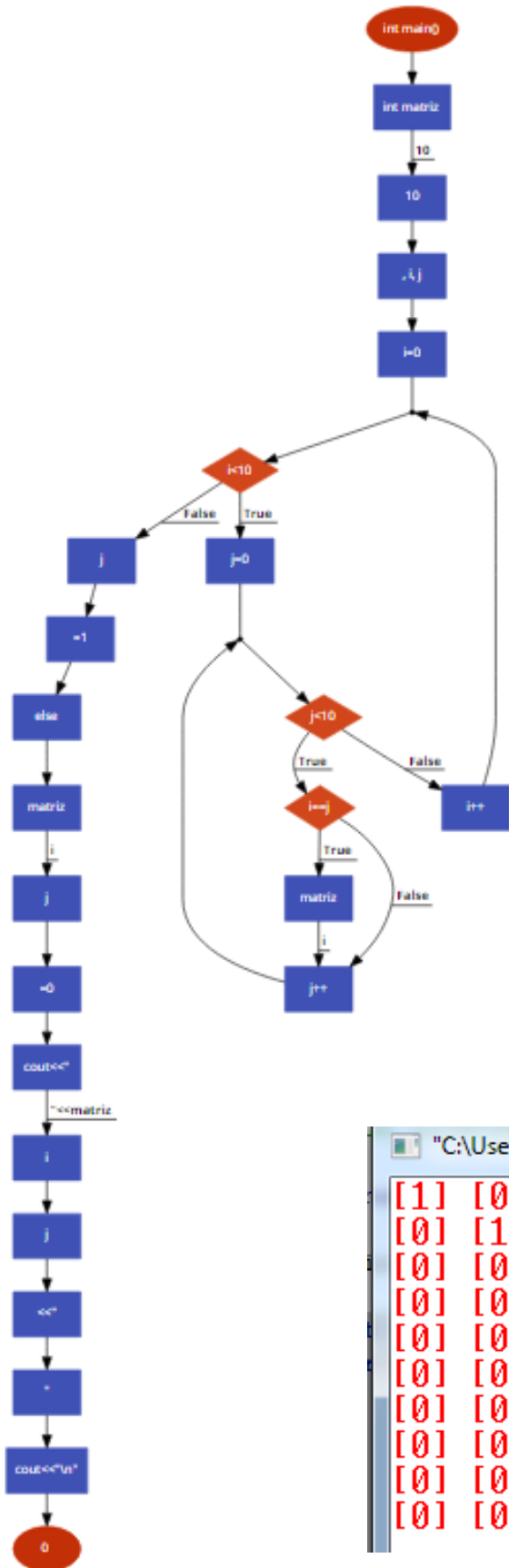
"C:\Users\Armando Isaac\Desktop\Estructura de Datos\Unidad 1\Programarios\Programario 2\Programa 2.3\main.exe"

| | | | | | | | | |
|-----|-----|-----|-----|-----|-----|-----|-----|-----|
| [0] | [5] | [7] | [3] | [1] | [2] | [1] | [4] | [1] |
|-----|-----|-----|-----|-----|-----|-----|-----|-----|

Columna1= 60
 Columna2= 89
 Columna3= 86
 Columna4= 85
 Columna5= 87
 Columna6= 70
 Columna7= 120
 Columna8= 102
 Columna9= 86
 Columna10= 77
 Columna11= 86
 Columna12= 94
 Columna13= 99
 Columna14= 118
 Columna15= 94
 Columna16= 99
 Columna17= 66
 Columna18= 89
 Columna19= 87
 Columna20= 108

Columna Mayor: Columna 7 = 120

Programa 4

[illegible]

Programa 5

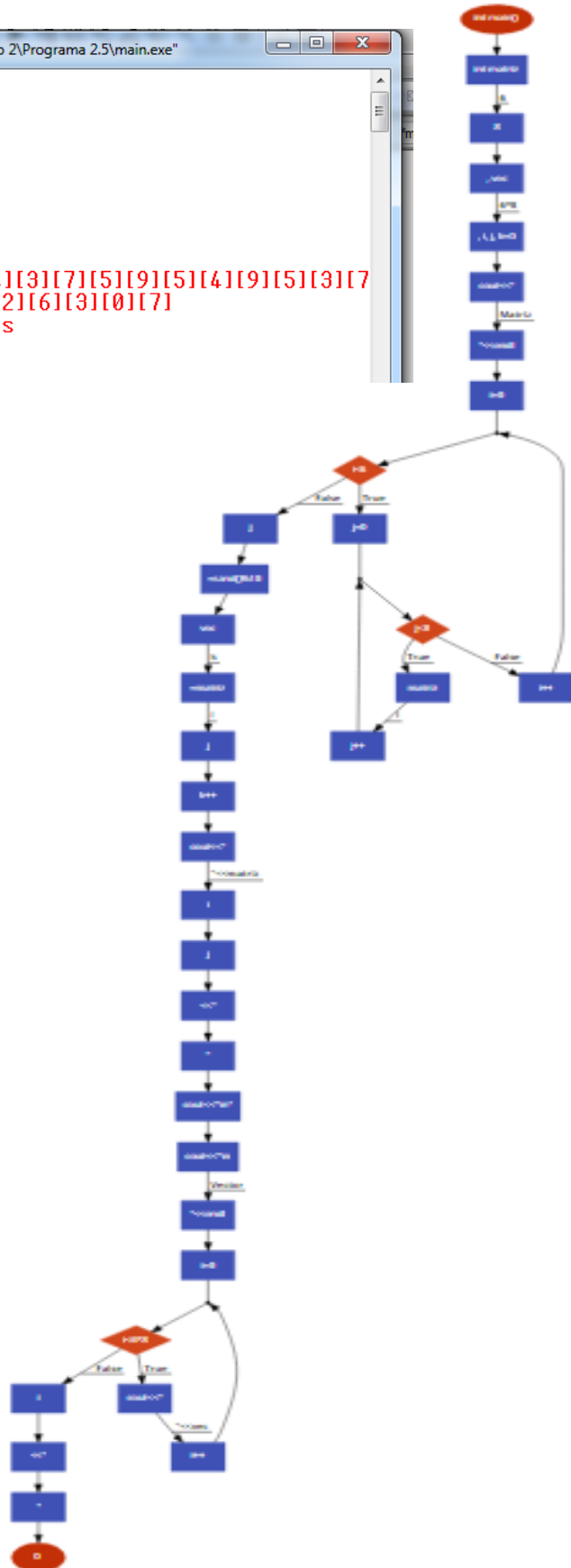
```

"C:\Users\Armando Isaac\Desktop\Estructura de Datos\Unidad 1\Progamarios\Progamario 2\Programa 2.5\main.exe"

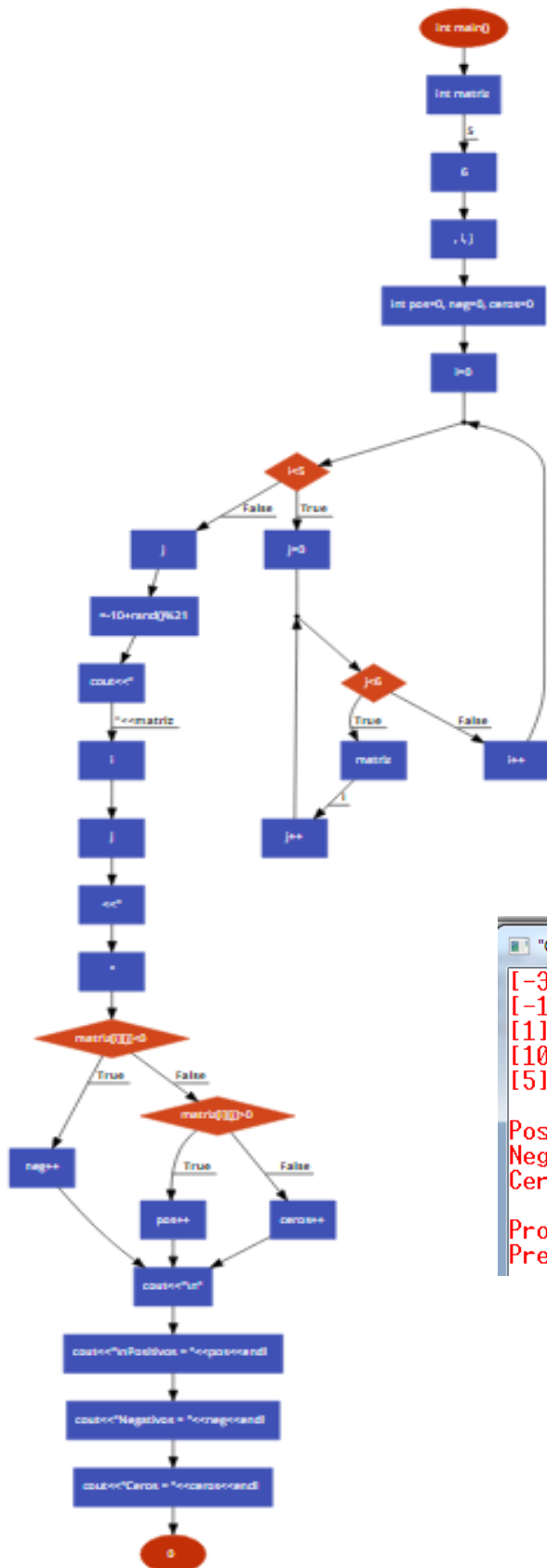
[Matriz]
[6] [4] [7] [8] [8] [4] [9] [9]
[5] [4] [4] [3] [7] [8] [5] [8]
[4] [3] [7] [5] [9] [5] [4] [9]
[5] [3] [7] [8] [1] [7] [2] [5]
[1] [4] [8] [4] [2] [4] [9] [1]
[3] [9] [2] [2] [6] [3] [0] [7]

[Vector]
[6][4][7][8][8][4][9][9][5][4][4][3][7][8][5][8][4][3][7][5][9][5][4][9][5][3][7]
[8][1][7][2][5][1][4][8][4][2][4][9][1][3][9][2][2][6][3][0][7]
Process returned 0 (0x0)   execution time : 3.843 s
Press any key to continue.

```



Programa 6



```
C:\Users\Armando Isaac\Desktop\Estructura de Datos\Unidad 1\Programarios\Programario 2'
[-3] [-2] [9] [1] [-5] [3]
[-10] [-1] [-7] [-2] [5] [-3]
[1] [-9] [1] [10] [0] [-3]
[10] [2] [-5] [7] [-4] [-9]
[5] [6] [-7] [8] [-9] [3]

Positivos = 14
Negativos = 15
Ceros = 1

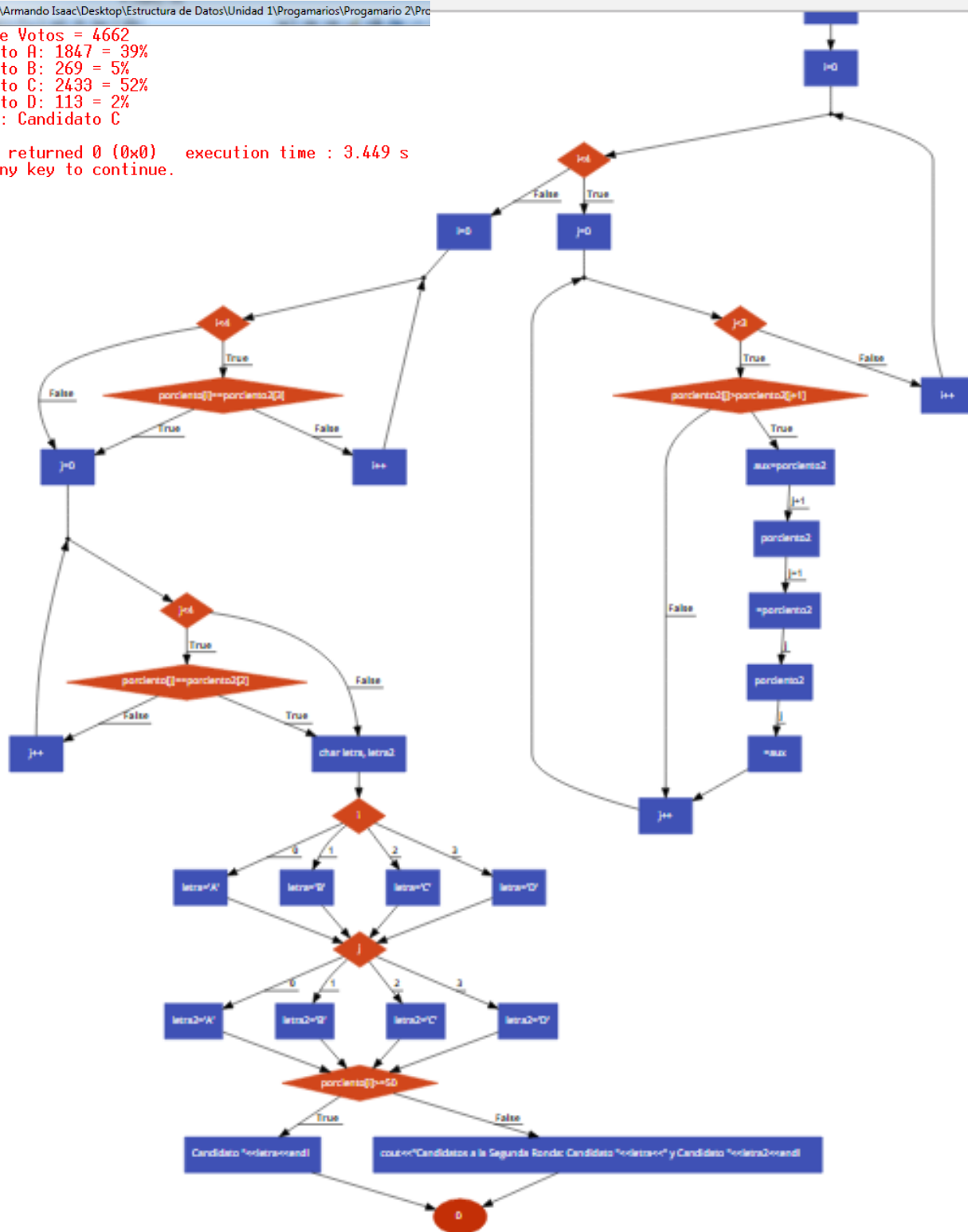
Process returned 0 (0x0)   execution time : 4.641 s
Press any key to continue.
```

Programa 7

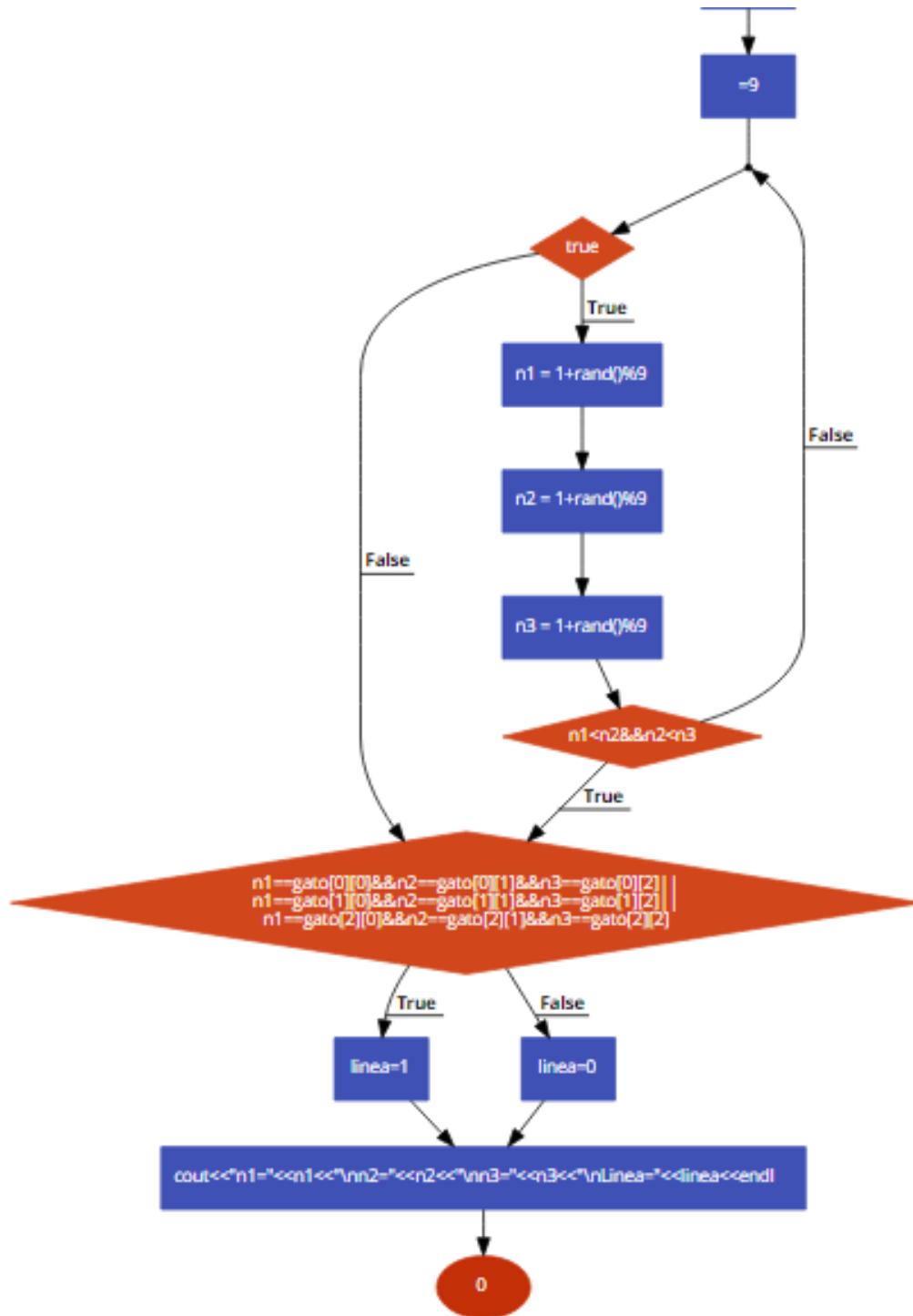
"C:\Users\Armando Isaac\Desktop\Estructura de Datos\Unidad 1\Progamarios\Progamario 2\Pro

Total de Votos = 4662
Candidato A: 1847 = 39%
Candidato B: 269 = 5%
Candidato C: 2433 = 52%
Candidato D: 113 = 2%
Ganador: Candidato C

```
Process returned 0 (0x0)   execution time : 3.449 s
Press any key to continue.
```



Programa 8

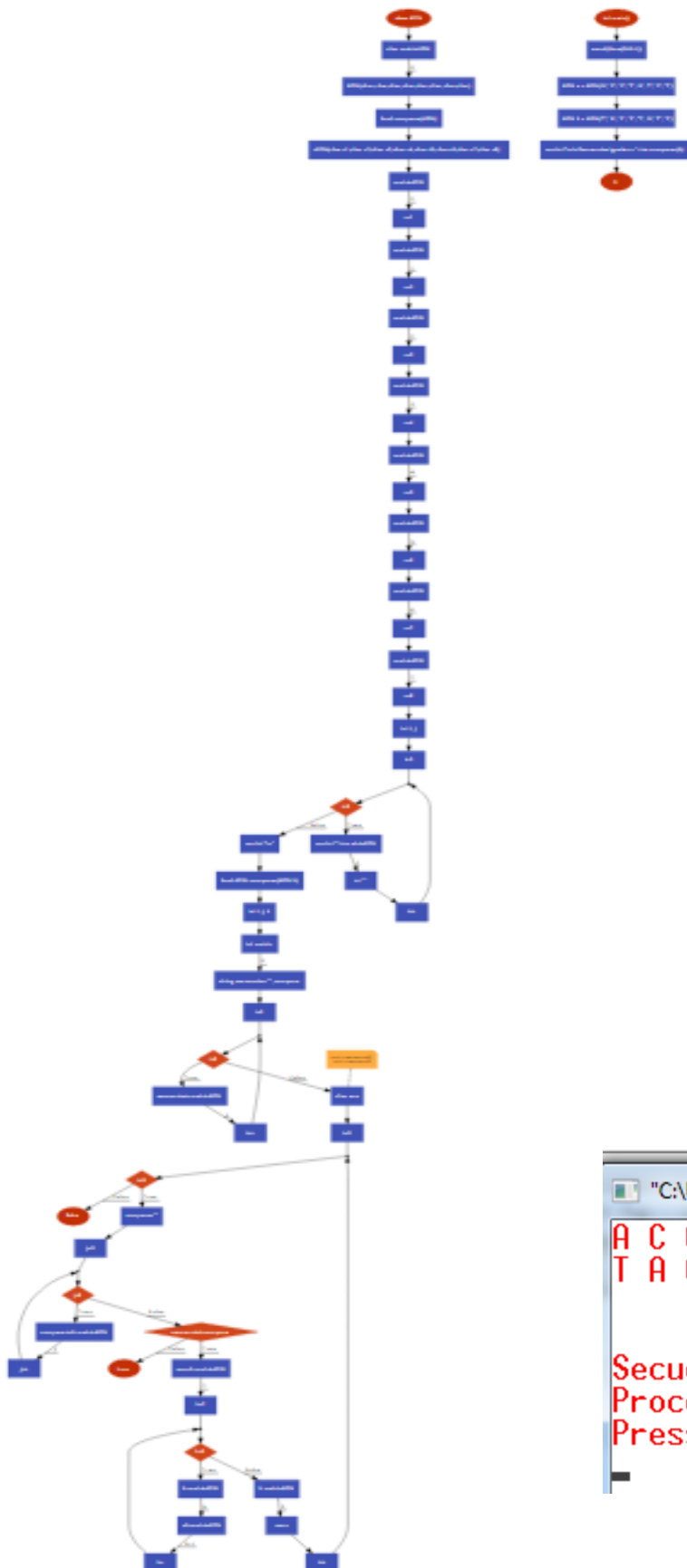


```

[0] n1=1
[1] n2=6
[2] n3=9
[3] Linea=0
[4]
[5] Process returned 0 (0x0)   e
[6] Press any key to continue.

```

Programa 9

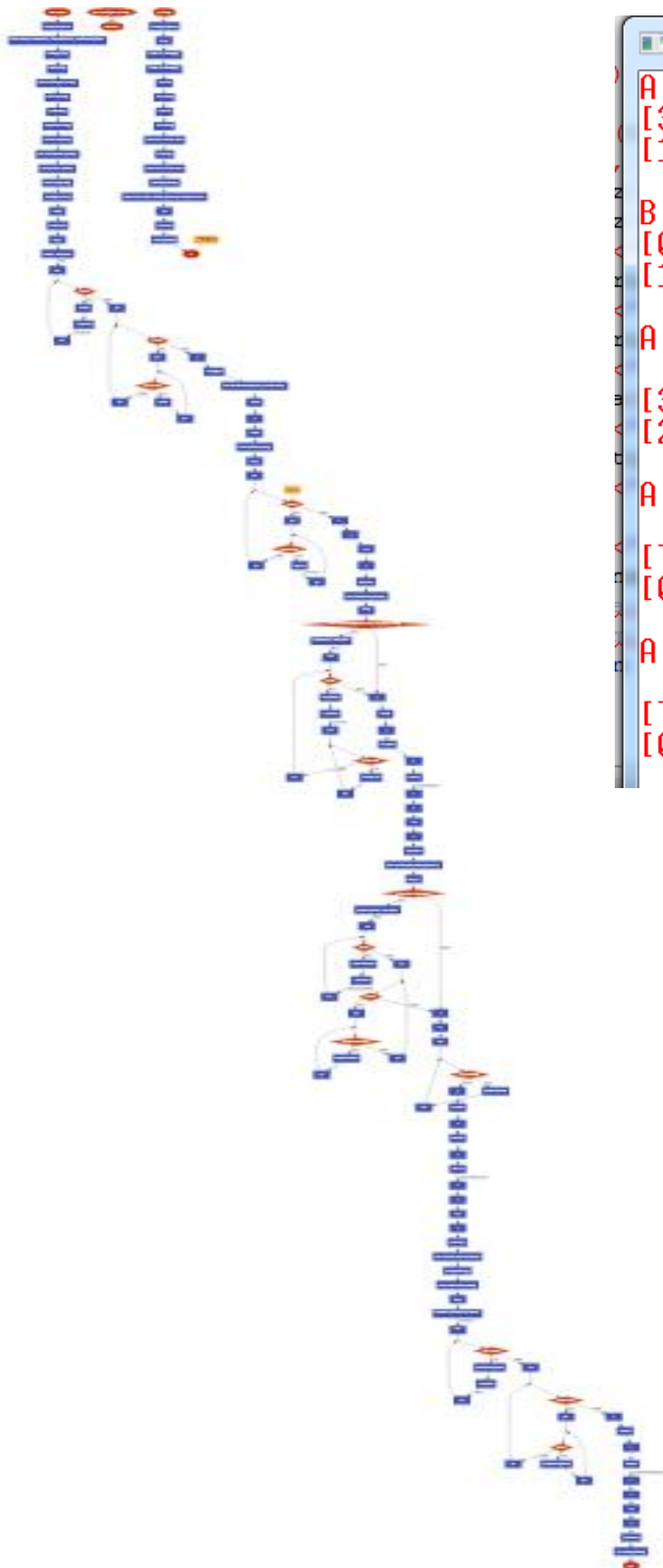


"C:\Users\Armando Isaac\Desktop\Estructura de I

| | | | | | | | |
|---|---|---|---|---|---|---|---|
| A | C | C | T | A | T | C | T |
| T | A | C | C | T | A | T | C |

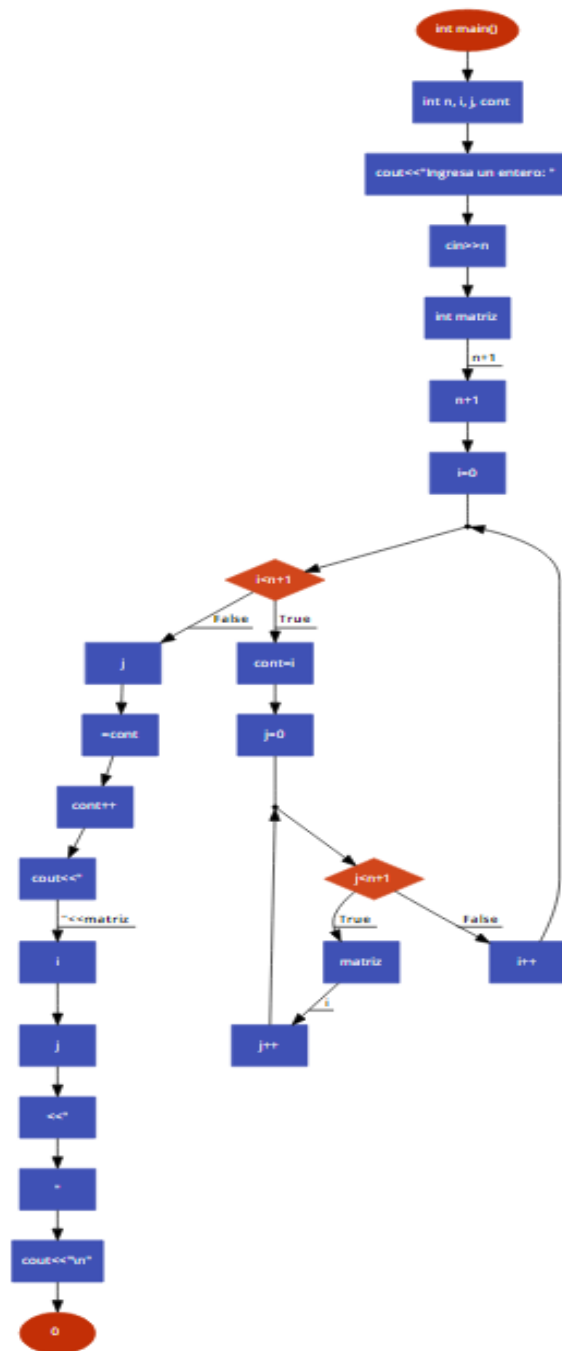
```
Secuencias Iguales = 1
Process returned 0 (0x0)   e:
Press any key to continue.
```

Programa 10



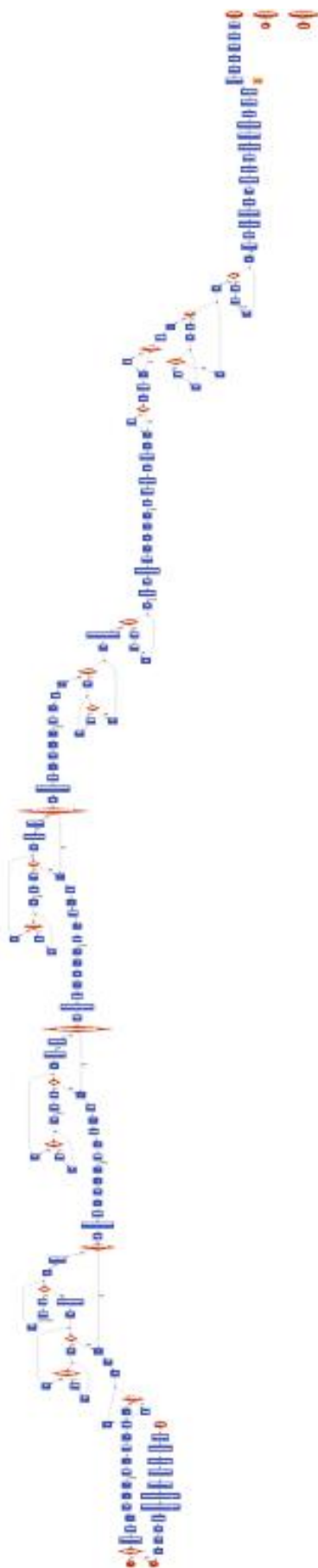
```
"C:\Users\Armando Isaac\Desktop\Estructura de Datos\Unida  
A:  
[3] [7]  
[1] [0]  
  
B:  
[0] [6]  
[1] [1]  
  
A + B:  
[3] [13]  
[2] [1]  
  
A x B:  
[7] [25]  
[0] [6]  
  
A x B (con sobrecarga de operador):  
[7] [25]  
[0] [6]
```

Programa 11



```
"C:\Users\Armando Isaac\Desktop\Estructura
Ingresar un entero: 4
[0] [1] [2] [3] [4]
[1] [2] [3] [4] [5]
[2] [3] [4] [5] [6]
[3] [4] [5] [6] [7]
[4] [5] [6] [7] [8]
```

Programa 12

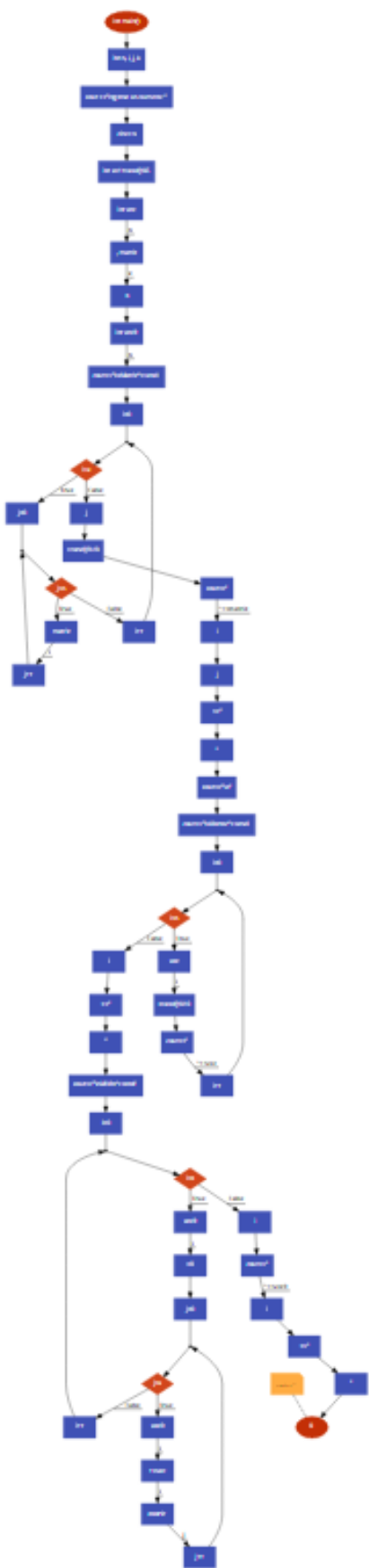


```
"C:\Users\Armando Isaac\Desktop\Estru
Matriz A
[6] [8] [0] [0] [0]
[0] [6] [1] [0] [0]
[5] [0] [3] [0] [0]
[1] [0] [2] [0] [0]
[3] [1] [0] [0] [0]

Matriz B
[8] [6] [0] [0] [0]
[0] [0] [0] [8] [6]
[0] [9] [0] [0] [8]
[0] [6] [0] [0] [0]
A simetrica = 1
B simetrica = 0

Matriz Transpuesta
[6] [0] [5] [1] [3]
[8] [6] [0] [0] [1]
[0] [1] [3] [2] [0]
[0] [0] [0] [0] [0]
[0] [0] [0] [0] [0]
```

Programa 13



"C:\Users\Armando Isaac\Desktop\Estruc

Ingrese un numero: 3

Matriz

[8] [3] [8]

[2] [2] [0]

[9] [1] [1]

Vector

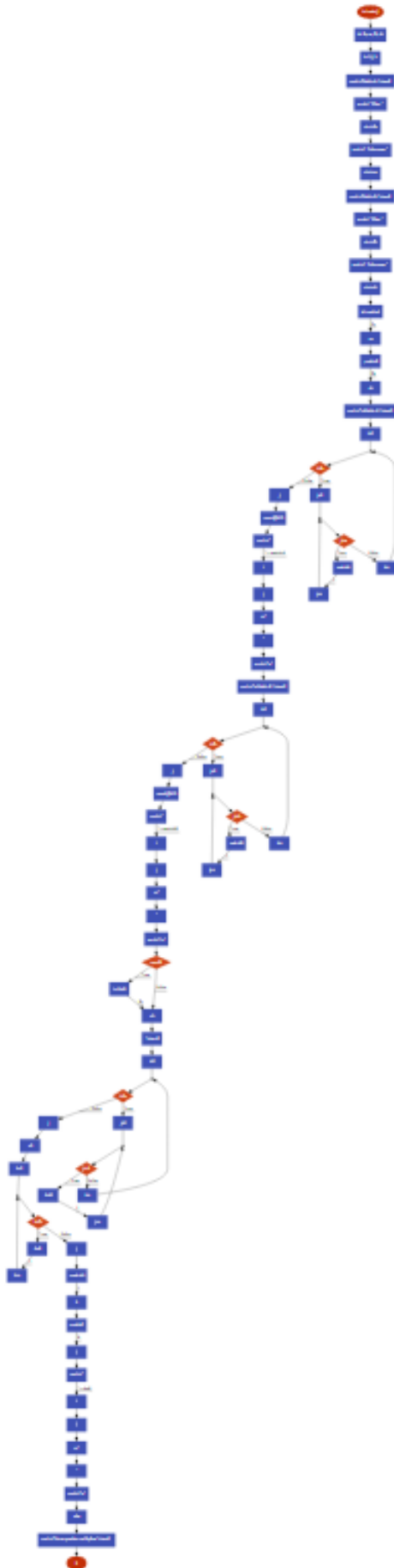
[9] [9] [9]

$$H \approx V$$

[171] [54] [81]

10

Programa 14



```

"C:\Users\Armando Isaac\Desktop\Estruc
Matriz A:
Filas: 3
Columnas: 4
Matriz B:
Filas: 4
Columnas: 2

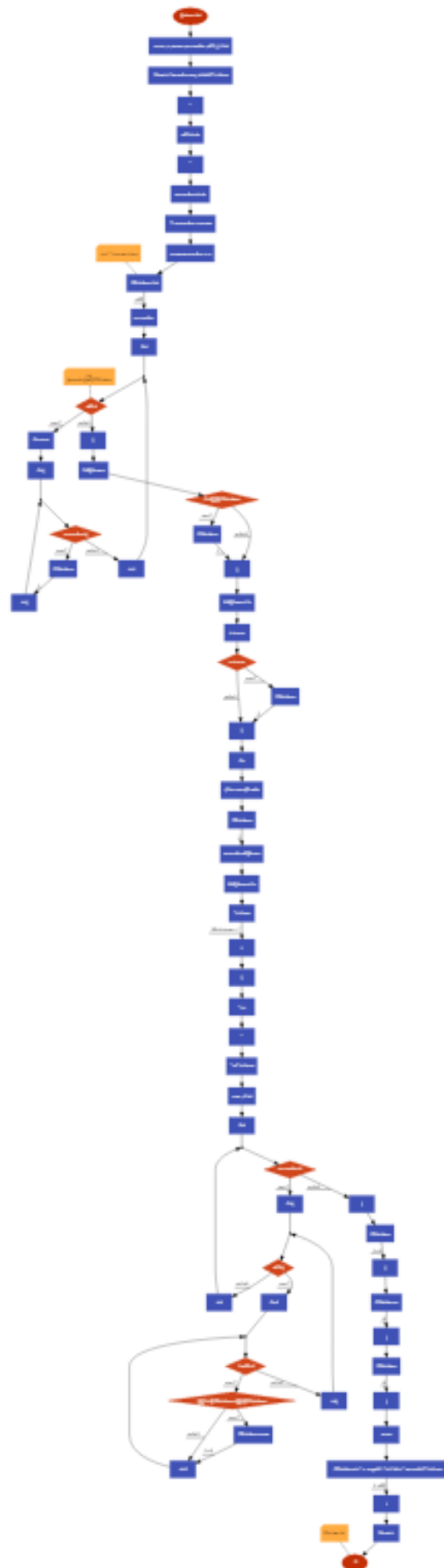
Matriz A:
[7] [4] [8] [6]
[4] [8] [8] [5]
[7] [2] [9] [6]

Matriz B:
[3] [9]
[4] [1]
[1] [8]
[0] [6]

AxB:
[0] [36]
[0] [30]
[0] [36]

Process returned 0 (0x0)
Press any key to continue
  
```

Programa 15



```
"C:\Users\Armando Isaac\Desktop\Estructura de Datos\Unidad 1\Programa 15"
Matriz poco densa
Filas: 6
Columnas: 7
[9] [0] [0] [2] [6] [0] [0]
[8] [8] [0] [4] [0] [0] [0]
[0] [0] [0] [3] [3] [0] [6]
[0] [2] [0] [3] [8] [0] [0]
[8] [4] [3] [0] [0] [0] [0]
[0] [0] [7] [0] [0] [0] [4]
Columna 1: Mayor = 9
Columna 2: Mayor = 8
Columna 3: Mayor = 7
Columna 4: Mayor = 4
Columna 5: Mayor = 8
Columna 6: Mayor = 0
Columna 7: Mayor = 4
Process returned 0 (0x0)   execution time: 0.000 s
Press any key to continue.
```