- **Question 1**

1 out of 1 points

A control structure alters the normal sequential flow of execution in a program.

Answer

Selected Answer: ☑ True

Correct Answer: ☑ True

- **Question 2**

0 out of 1 points

The symbol > is a logical operator.

Answer

Selected Answer: ☑ False

Correct Answer: ☑ False

- **Question 3**

0 out of 1 points

In C++, both `!` and `!=` are relational operators.

Answer

Selected Answer: ☑ False

Correct Answer: ☑ False

- **Question 4**

1 out of 1 points

In C++, the logical operator AND is `&&`.

Answer

Selected Answer: ☑ True

Correct Answer: ☑ True

- **Question 5**

1 out of 1 points

In C++, `!`, `&&`, and `||` are called relational operators.

Answer

Selected Answer: ☑ False

Correct Answer: ☑ False

- **Question 6**

0 out of 1 points

The expression `(x >= 0 && x <= 100)` evaluates to `false` if either `x < 0` or `x >= 100`.

Answer

Selected Answer: ☑ False

Correct Answer: ☑ False

- **Question 7**

1 out of 1 points

Suppose `P` and `Q` are logical expressions. The logical expression `P && Q` is true if both `P` and `Q` are true.

Answer

Selected Answer: ☑ True

Correct Answer: ☑ True

- **Question 8**

1 out of 1 points

The value of the expression `'a' < 'A'` is true.

Answer

Selected Answer: ☑ False

Correct Answer: ☑ False

- **Question 9**

1 out of 1 points

The value of the expression `7 + 8 <= 15` is true.

Answer

Selected Answer: ☑ True
Correct Answer: ☑ True

- **Question 10**

1 out of 1 points

In C++, `&&` has a higher precedence than `||`.
Answer
Selected Answer: ☑ True
Correct Answer: ☑ True

- **Question 11**

0 out of 1 points

In C++, all relational operators are evaluated before logical operators.
Answer
Selected Answer: ☑ False
Correct Answer: ☑ False

- **Question 12**

1 out of 1 points

The operators != and == have the same order of precedence.
Answer
Selected Answer: ☑ True
Correct Answer: ☑ True

- **Question 13**

1 out of 1 points

Suppose `found = true` and `num = 6`. The value of the expression `(!found) || (num > 6)` is `false`.
Answer
Selected Answer: ☑ True
Correct Answer: ☑ True

- **Question 14**

1 out of 1 points

Suppose `x = 10` and `y = 20`. The value of the expression `((x >= 10) && (y <= 20))` is `true`.


Answer

Selected Answer: ☑ True

Correct Answer: ☑ True

- **Question 15**

1 out of 1 points

The value of the expression

```
6 < 5 || 'g' > 'a' && 7 < 4
```


is `true`.

Answer

Selected Answer: ☑ False

Correct Answer: ☑ False

- **Question 16**

1 out of 1 points

The result of a logical expression cannot be assigned to an `int` variable, but it can be assigned to a `bool` variable.


Answer

Selected Answer: ☑ False

Correct Answer: ☑ False

- **Question 17**

1 out of 1 points

Consider the following statements.

```
int score;
string grade;
```

```
if (score >= 65)
    grade = "pass";
else
    grade = "fail";
```

If `score` is equal to `75`, the value of `grade` is `"pass"`.
Answer

Selected Answer: ☑ True
Correct Answer: ☑ True

- **Question 18**

1 out of 1 points

Every `if` statement must have a corresponding `else`.
Answer

Selected Answer: ☑ False
Correct Answer: ☑ False

- **Question 19**

1 out of 1 points

The expression in the following `if` statement evaluates to `true` only if the value of `score` is `50`.

```
if (score = 50)
   grade = 'Z';
```

Answer

Selected Answer: ☑ False
Correct Answer: ☑ False

- **Question 20**

1 out of 1 points

Suppose `x` is `5` and `y` is `7`. Choose the value of the following expression:

```
(x != 7) && (x <= y)
```

Answer

Selected Answer: ☑

`true`

Correct Answer: ✅
`true`

- **Question 21**

0 out of 1 points

Suppose that `x` is an `int` variable. Which of the following expressions always evaluates to true?
Answer

Selected Answer: ✅
`(x > 0) || ( x <= 0)`

Correct Answer: ✅
`(x > 0) || ( x <= 0)`

- **Question 22**

1 out of 1 points

Which of the following operators has the highest precedence?
Answer

Selected Answer: ✅
!

Correct Answer: ✅
!

- **Question 23**

1 out of 1 points

Which of the following expressions correctly determines that `x` is greater than `10` and less than `20`?
Answer

Selected Answer: ✅
`10 < x && x < 20`

Correct Answer: ✅
`10 < x && x < 20`

- **Question 24**

1 out of 1 points

What is the output of the following C++ code?

```
int x = 35;
int y = 45;
int z;

if (x > y)
    z = x + y;
else
    z = y - x;

cout << x << " " << y << " " << z << endl;
```

Answer

Selected Answer: ✅
35 45 10

Correct Answer: ✅
35 45 10

- **Question 25**

1 out of 1 points

What is the output of the following code?

```
if (6 > 8)

    cout << " ** " << endl ;
else if (9 == 4)
    cout << "***" << endl;
else
    cout << "*" << endl;
```

Answer

Selected Answer: ✅
*

Correct Answer: ✅
*