Bitwise Operators, switch case, typedef, enum

C Programming

Trainer: Smita Kadam

Email ID: smita@sunbeaminfo.com



Bitwise Operators

• Bitwise Binary Operators

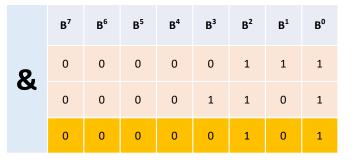
& bitwise AND operator
| bitwise OR operator
^ bitwise XOR operator
> bitwise left shift operator
bitwise right operator

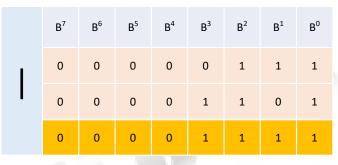
Bitwise Unary Operators

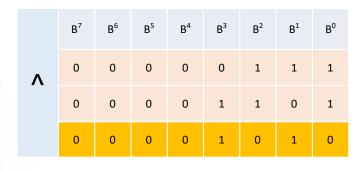
~ bitwise complement operator

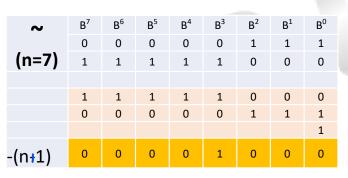


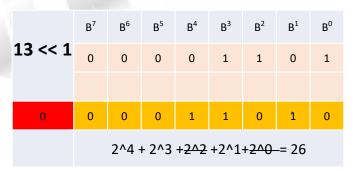
Bitwise Operators

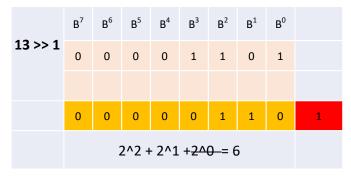












13<<1 = 26

13>>1 = 6

2's Compliment number + 1



Decision Control - switch case

Syntax:



Decision Control - switch case

Points To Note:

- 1. Each case should be followed by integer constant.
- 2. Can not add duplicate cases.
- 3. Use of break is suggested in each case at the last. Else execution control is given to next case even though next case is not satisfied.
- 4. Use of default case is optional.
- 5. Sequence of case does not matter.



typedef

Syntax:

typedef <existing data type> <another name/alias>;

Points To Note:

- 1. Helps to give another name to existing data type.
- 2. Improves readability of source code.
- 3. Helps to port code across multiple architecture/platforms.
- 4. Helps to simplify complicated declarations



User Defined Data Type: enum

Syntax:

enum <tag name> {[<enumated fields>,..]}; e.g enum colors{RED,BLUE,GREEN};

- 1. Helps to define new data type.
- 2. Collection of enumerated fields.
- 3. Each enumerated field represent integer constant and also can be initialised with integer constant.
- 4. Helps to improve readability of source code.
- 5. If we do not initialise first field by default it represents integer 0 value. And next fields carry step 1 value ahead of previous.





Thank you!

