PPS Lab Exercise-2 – Operators

1. Given two numbers dividend and divisor, divide two numbers. The result of division should truncate toward zero, which means losing its fractional part. For example, 8.345 would be truncated to 8, and -2.7335 would be truncated to -2. Assume we are dealing with an environment that could store dividend as signed long long integer and divisor as double.

Example

Input: dividend = 922337203685, divisor = 12.6 Output: 73201365371

- 2. Write a C program to find largest among 3 numbers using ternary (conditional) operator.
- 3. Consider the following code segments and tabulate value of each variable at each line of the segment.

i) int
$$a = 3$$
;
int $b = 2$;
int $c = a++*b$;
int $d = ++a*b$;

Expression	Value of a	Value of b	Value of c
c = a++*b;			
d = ++a * b;			

ii)
$$a=5, b=10$$

 $c = b * (++a) + 5 * (++a);$
 $d = b*(a++)+5*(a++);$
 $d = b*(a++)+c*(a++);$

Expression	Value of a	Value of b	Value of c	Value of d
c = b * (++a) + 5 * (++a);				
d = b*(a++)+c*(a++)				
d = b*(a++)+c*(a++);				

4. Find the output of the following statements

i) int
$$a = 10$$
, $b = 10$, $c = 3$, d;
 $d = a == b \&\& c$;
 $a = 4 \&\& -1$

ii) int
$$a = 5$$
, $b = 6$, $c = 7$, $d = 4$, e; $e = a > b & c > d \parallel a > d$;

iii)
$$x=6, y=15$$

 $z = x++ < 10 & x + y < 20$

5. Find the value of **res** when q=10 and q=4 int p = 10, q; bool res = ((p == q) && printf("Chocolate"));