

**QUIZ 5 (Dated: 21 Sep, 2022)**  
**Object Oriented Programming (BSDS Spring 2022)**

**Roll No:** \_\_\_\_\_

**Name:** \_\_\_\_\_

**Q.** Write a class Rational having two private data member's p & q. Write following member functions in the class?

- initialize function, assign 0 to p and 1 to q
- set function, assign p without checking. Check q, if zero assign 1, otherwise assign q
- str function, return string form of object like "p/q" (2/5)
- overload comparison operator, check if both p & q match, return 1 otherwise return 0
- overload – operator, take new object. Assign values to p & q using following formula:
  - $q = a.q \times b.q$
  - $p = a.p \times b.q - b.p \times a.q$