

# Bank of Baroda Previous Year Question Paper: Quantitative (2010)

One night 18 percent of the female officers on a police force were on duty. If 180 officers were on duty that night and half of these were female officers, how many female officers were on the police force?

- (A) 90
- (B) 180
- (C) 270
- (D) 500
- (E) 1,000

If an integer  $n$  is divisible by both 6 and 8, then it must also be divisible by which of the following?

- (A) 10
- (B) 12
- (C) 14
- (D) 16
- (E) 18

On the number line, if  $x$  is halfway between  $-5$  and  $3$ , and if  $y$  is halfway between  $-2$  and  $6$ , what number is halfway between  $x$  and  $y$ ?

- (A)  $-1$
- (B)
- (C)  $0$
- (D)
- (E)  $1$

Out of their annual net income, a couple spent 25 percent for food, 13.5 percent for entertainment, 20 percent for housing, 8 percent for car expenses, 15 percent for clothing, and saved the rest. What was the ratio of the amount saved to the amount spent for entertainment?

- (A)  $19/27$
- (B)  $6/5$
- (C)  $37/27$
- (D)  $19/9$
- (E)  $7/3$

If  $z+3/(z-1) + z+1/(z-3) = 2$ , then  $z =$

- (A)  $2$
- (B)  $1$
- (C)  $-1$
- (D)  $-2$
- (E)  $-3$

The population of city X increased from 325,000 in 1980 to 350,000 in 1990, and it is projected that the population will increase by the same number from 1990 to 2000. Approximately what is the projected percent increase in population from 1990 to 2000?

- (A) 7.1%
- (B) 7.7%

- (C) 8.3%
- (D) 14.3%
- (E) 15.3%

Of the  $z$  students at a certain college,  $x$  are studying French and  $y$  are studying German. If  $w$  are studying both French and German, which of the following expresses the number of students at the college not studying either French or German ?

- (A)  $z + w - x - y$
- (B)  $z - w - x - y$
- (C)  $z - w - x + y$
- (D)  $w + x + y - z$
- (E)  $w - x - y - z$

Of the science books in a certain supply room, 50 are on botany, 65 are on zoology, 90 are on physics, 50 are on geology, and 110 are on chemistry. If science books are removed randomly from the supply room, how many must be removed to ensure that 80 of the books removed are on the same science?

- (A) 81
- (B) 159
- (C) 166
- (D) 285
- (E) 324

A certain shade of gray paint is obtained by mixing 3 parts of white paint with 5 parts of black paint. If 2 gallons of the mixture is needed and the individual colors can be purchased only in one-gallon or half-gallon cans, what is the least amount of paint, in gallons, that must be purchased in order to measure out the portions needed for the mixture?

- (A) 2
- (B) 2.5
- (C) 3
- (D) 3.5
- (E) 4

$$-2(-4 - (-3 + 5)) =$$

- (A) -16
- (B) -10
- (C) 6
- (D) 12
- (E) 16

On a certain test, 3 students each had a score of 90, 9 students each had a score of 80, 4 students each had a score of 70, and 4 students each had a score of 60. What was the average (arithmetic mean) score for the 20 students ?

- (A) 70.5
- (B) 75.0
- (C) 75.5
- (D) 80.0
- (E) 80.5

. In the manufacture of a certain product, 5 percent of the units produced are defective and 4 percent of the defective units are shipped for sale. What percent of the units produced are defective units that are shipped for sale?

- (A) 0.125%
- (B) 0.2%
- (C) 0.8%
- (D) 1.25%
- (E) 2.0%

The numbers in which of the following pairs do NOT have a pair of distinct prime divisors in common ?

- (A) 10 and 20
- (B) 12 and 18
- (C) 24 and 32
- (D) 21 and 63
- (E) 22 and 88.

A certain fraction is equivalent to  $\frac{2}{5}$  . If the numerator of the fraction is increased by 4 and the denominator is doubled, the new fraction is equivalent to  $\frac{1}{3}$  . What is the sum of the numerator and denominator of the original fraction?

- (A) 49
- (B) 35
- (C) 28
- (D) 26
- (E) 21

If all of the telephone extensions in a certain company must be even numbers, and if each of the extensions uses all four of the digits 1, 2, 3, and 6, what is the greatest number of four-digit extensions that the company can have?

- (A) 4
- (B) 6
- (C) 12
- (D) 16
- (E) 24

The product of the first twelve positive integers is divisible by all of the following EXCEPT

- (A) 210
- (B) 88
- (C) 75
- (D) 60
- (E) 34