Directions- (1-5) Answer the questions based on the information given below.

The table given below shows the distribution of employees in five different companies in 2019.

Company	Number of Zones	Average number of employees per zone	Number of male employees : Number of female employees
TCS	50	420	4:3
Genpact	35	610	3:2
Infosys	44	500	3:1
Google	42	525	1:4
Microsoft	40	470	5:3

1. What are total numbers of female employees working in Genpact and Google together in 2019?

A. 26,250
B. 28,670
C. 25,170
D. 26,180
E. 24,170

Correct Answer-D. 26,180

Total number of employees in Genpact in 2019 = 35 × 610 = 21,350

Total number of female employees in Genpact in 2019 = (2/5) × 21350 = 8,540

Total number of employees in Google in 2019 = 42 × 525 = 22,050

Total number of female employees in Google in 2019 = (4/5) × 22050 = 17,640

Total number of female employees in Genpact and Google together in 2019 = 8540 + 17640 = 26,180

2. Which company has the second highest number of employees in 2019?

A. TCS

B. Genpact
C. Microsoft
D. Google
E. Infosys

Correct Answer-E. Infosys

Total number of employees in TCS in 2019 = 50 × 420 = 21,000

Total number of employees in Genpact in 2019 = 35 × 610 = 21,350

Total number of employees in Infosys in 2019 = 44 × 500 = 22,000(Second highest)

Total number of employees in Google in 2019 = 42 × 525 = 22,050

Total number of employees in Microsoft in 2019 = 40 × 470 = 18,800

So, Infosys has second highest number of employees in 2019.

3.What is the ratio of male employees in Genpact to the female employees of Infosys in 2019?
A. 1120:600
B. 1281:550
C. 1225:675
D. 1175:650
E. 1325:825

Correct Answer-B. 1280:550

Total number of employees in Genpact in 2019 = 35 × 610 = 21,350

Total number of male employees in Genpact in 2019 = (3/5) × 21350 = 12,810

Total number of employees in Infosys in 2019 = 44 × 500 = 22,000

Total number of female employees in Infosys in 2019 = (1/4) × 22000 = 5,500

Desired ratio = 12810: 6930 = 1281: 550

4.In 2020, if the number of female employees in Microsoft is increased by 24% and number of male employees in Microsoft is decreased by 24% with respect to 2019, then find the total number of employees in Microsoft company in 2020.

A. 18,470
B. 17,520
C. 17,672
D. 18,570
E. 15,772

Correct Answer-C. 17,672

Total number of employees in Microsoft in 2019 = 40 × 470 = 18,800

Total number of male employees in Microsoft in 2019 = (5/8) × 18800 = 11,750

Total number of female employees in Microsoft in 2019 = (3/8) × 18800 = 7,050

Total number of male employees in Microsoft in 2020 = 0.76 × 11,750 = 8,930

Total number of female employees in Microsoft in 2020 = 1.24 × 7,050 = 8,742

Total number of employees in Microsoft in 2020 = 8930 + 8742 = 17,672

5.What is the average number of female employees working in each of these five companies in 2019?

A. 9,546
B. 9,248
C. 9,458
D. 9,158
E. 9,558

Correct Answer- A. 9,546

=21000*3/7 + 21350*2/5 + 22000*1/4 + 22050*4/5 + 18800*3/8

=9000+8540+5500+17640+7050=47730

Average Number of female employees=47730/5=9546

Directions: (6-10) Table given below shows total products sold by 6 sellers. Products are of only two types 'P' and 'Q'. Some data is missing in table. Students are expected to

calculate the missing data according to questions. Study the data carefully and answer the following questions.

Sellers	Total Products Sold	'P' type sold(in absolute)	'Q' type sold(in %)
Ajay	580	-	60%
Vimal	-	360	52%
Shubham	-	520	-
Saket	920	-	-
Avdesh	-	636	40%
Rahul	1000	-	-

Note :- 1. Total Products = 'P' type + 'Q' type

6.Total Products sold by Avdesh and Rahul together is what percent more than total products sold by Saket and Vimal together?

A. 23.75%
B. 23.25%
C. 24.50%
D. 23.35%
E. 25%

Correct Answer- D. 23.35%

$$\text{Total Products sold by Avdesh} = \frac{636}{60} \times 100 = 1060$$

$$\text{Total Products sold by Rahul} = 1000$$

$$\text{Total Products sold by Saket} = 920$$

$$\text{Total Products sold by Vimal} = \frac{360}{48} \times 100 = 750$$

$$\text{Required \%} = \frac{(1060 + 1000) - (920 + 750)}{100} \times 100$$

$$= \frac{2060 - 1670}{1670} \times 100 = \frac{390}{1670} \times 100 = 23.35\%$$

7.'P' type product sold by Saket is 25% more than 'P' type product sold by Vimal. Find 'P' type product sold by Saket is what percent of 'Q' type product sold by Saket?

A. 95.74%
B. 75%
C. 65%
D. 50%
E. None of these

Correct Answer- A. 95.74%

$$'P' \text{type product sold by Saket} = \frac{125}{100} \times 360 = 450$$

$$\text{Required } \% = \frac{450}{920 - 450} \times 100 = \frac{450}{470} \times 100 = 95.74\%$$

8.'Q' type product sold by Ajay is how much less than 'Q' type product sold by Shubham if total product sold by Shubham is 55% more than total products sold by Ajay.

A. 120
B. 60
C. 31
D. 150
E. None of these

Correct Answer- C. 31

$$\text{Total Products sold by Shubham} = \frac{155}{100} \times 580 = 899$$

$$'Q' \text{type product sold by Shubham} = 899 - 520 = 379$$

$$'Q' \text{type product sold by Ajay} = 580 \times \frac{60}{100} = 348$$

$$\text{Required difference} = 379 - 348 = 31$$

9. If ratio of 'Q' type product sold by Vimal to 'Q' type product sold by Rahul is 4 : 3, then, find the average number of 'P' type products sold by Ajay and Rahul together?

A. 220
B. 260

C. 255
D. 244
E. 241

Correct Answer- E. 241

$$'Q'\text{type product sold by Vimal} = \frac{360}{48} \times 100 = 750, \quad 750 \times \frac{52}{100} = 390$$

$$'Q'\text{type product sold by Rahul} = \frac{1000}{4} \times 3 = 750$$

$$'P'\text{type product sold by Rahul} = 1000 - 750 = 250$$

$$'P'\text{type product sold by Ajay} = \frac{580 \times 40}{100} = 232$$

$$\text{Required Average} = \frac{250 + 232}{2} = 241$$

10.If 'Q' type product sold by Shubham is 25% more than 'Q' type product sold by Avdesh then, find total product sold by Shubham is what percent more/less than total product sold by Avdesh?

A. 2%
B. 0%
C. -4%
D. -0.94%
E. None of these

Correct Answer- D. -0.94%

$$'Q'\text{type product sold by Avdesh} = \frac{636}{60} \times 40 = 424$$

$$'Q'\text{type product sold by Shubham} = 424 \times \frac{5}{4} = 530$$

$$\text{Total product sold by Avdesh} = 636 + 424 = 1060$$

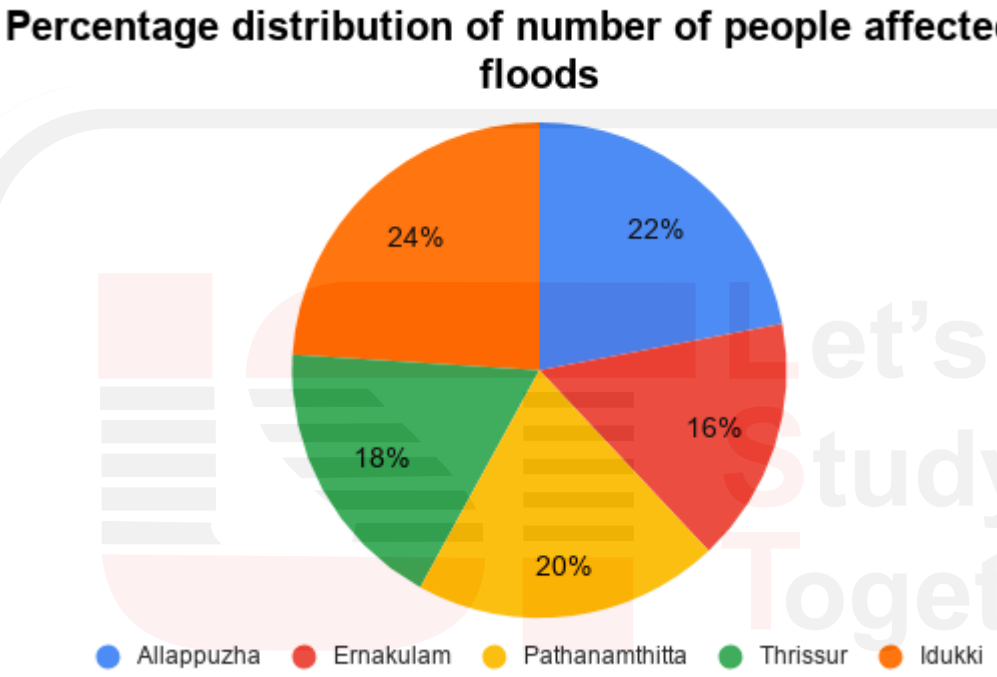
$$\text{Total product sold by Shubham} = 530 + 520 = 1050$$

$$\text{Required \%} = \frac{1050 - 1060}{1060} \times 100 = -0.94\%$$

Directions-(11-15) Answer the questions based on the information given below.

The given pie chart shows the data regarding the percentage distribution of the number of people affected by floods in five different districts in Indian state of Kerala. Total number of people affected in the given 5 districts is 24500.

Total people affected (in each district) = Males + Females



11.Find the average of number of people affected by flood in Allappuzha, Pathanmathitta, and Idukki district of Kerala.

A. 3,920
B. 4,410
C. 5,390
D. 5,880
E. None of these

Correct Answer- C. 5390

Number of people affected by flood in Allappuzha = 0.22 × 24500 = 5390

Number of people affected by flood in Pathanmathitta = 0.2 × 24500 = 4900

Number of people affected by flood in Idukki = 0.24 × 24500 = 5880

Therefore, required average = (5390 + 4900 + 5880)/3 = 5390

12. If the ratio of males to females affected by flood in Ernakulam district and Pathanmathitta is same, that is 4:3 respectively, then the number of females affected by flood in Ernakulam district is what percentage more or less than the number of females affected by flood in Pathanmathitta district?

A. 20%
B. 25%
C. 40%
D. 50%
E. 80%

Correct Answer- A. 20%

Number of people affected by flood in Ernakulam = 0.16 × 24500 = 3920

Number of people affected by flood in Pathanmathitta = 0.2 × 24500 = 4900

So, number of females affected by flood in Ernakulam = (3/7) × 3920 = 1680

Number of females affected by flood in Pathanmathitta = (3/7) × 4900 = 2100

Therefore, required percentage = [(2100 – 1680)/2100] × 100 = 20%

13. Find the difference between the average of number of people affected by flood in Allappuzha and Ernakulam district taken together and average of number of people affected by flood in Pathanmathitta and Idukki district taken together.

A. 575
B. 645
C. 735
D. 825
E. 965

Correct Answer- C. 735

Number of people affected by flood in Allappuzha = 0.22 × 24500 = 5390

Number of people affected by flood in Ernakulam = 0.16 × 24500 = 3920

Number of people affected by flood in Pathanmathitta = 0.2 × 24500 = 4900

Number of people affected by flood in Idukki = 0.24 × 24500 = 5880

Therefore, required difference = (5880 + 4900)/2 – (5390 + 3920)/2 = 5390 – 4655 = 735

14. Find the ratio of number of people affected by flood in Thrissur to the number of people affected by flood in Idukki district.

A. 2:3
B. 3:4
C. 4:5
D. 5:6
E. None of these

Correct Answer- B. 3:4

Number of people affected by flood in Thrissur = 0.18 × 24500 = 4410

Number of people affected by flood in Idukki = 0.24 × 24500 = 5880

Therefore, required ratio = 4410: 5880 = 3: 4

15. Prime Minister office under PMNRF (Prime Minister's National Relief Fund) decided to give aid to people affected by flood in Kerala. The ratio of amount given to a male and a female is 5:4, and the ratio of males to females affected by flood in Thrissur district is 4:3. If the total amount given under PMNRF to Thrissur district is Rs. 30.24 lacs, then find the amount received by each male in Thrissur district.

A. Rs.250
B. Rs.500
C. Rs.750
D. Rs.1000
E. None of these

Correct Answer- C. Rs. 750

Number of people affected by flood in Thrissur = 0.18 × 24500 = 4410

Number of males affected by flood in Thrissur = (4/7) × 4410 = 2520

Number of females affected by flood in Thrissur = (3/7) × 4410 = 1890

Let, amount given to each male and female be Rs. 5x and 4x respectively.

According to question,

$2520 \times 5x + 1890 \times 4x = 30.24 \times 10^5$

12600x + 7560x = 3024000

20160x = 3024000

x = 3024000/20160 = 150

Therefore, amount given to each male = 5 × 150 = Rs. 750

Directions-(16-20) Answer the questions based on the information given below.

The given table shows the data regarding the number of medals won by different countries in Asian Games in a particular year.

Note: Total medals (won by individual country) = Gold Medal + Silver Medal + Bronze Medal

Country	**Total Medals**	**Gold Medals**	**Ratio of Silver Medal to Bronze Medal**
India	56	12	6:5
Japan	72	18	5:4
China	118	31	2:1
Korea	96	26	4:3
Indonesia	80	15	8:5

16.Find the average of number of Bronze medals won by India, Korea and Indonesia taken together in Asian Games.

A. 18
B. 22
C. 25
D. 30
E. 32

Correct Answer- C. 25

Country	Total Medals	Gold Medals	Sum of Silver Medal and Bronze Medal	Silver Medals	Bronze Medals
India	56	12	56 – 12 = 44	(6/11) × 44 = 24	(5/11) × 44 = 20
Japan	72	18	72 – 18 = 54	(5/9) × 54 = 30	(4/9) × 54 = 24
China	118	31	118 – 31 = 87	(2/3) × 87 = 58	(1/3) × 87 = 29
Korea	96	26	96 – 26 = 70	(4/7) × 70 = 40	(3/7) × 70 = 30
Indonesia	80	15	80 – 15 = 65	(8/13) × 65 = 40	(5/13) × 65 = 25

17. Total number of Silver medals won by Japan and China taken together is what percentage more or less than the total number of Bronze medals won by Korea and Indonesia taken together?

A. 30%
B. 40%
C. 50%
D. 60%
E. 70%

Correct Answer- D. 60%

Country	Total Medals	Gold Medals	Sum of Silver Medal and Bronze Medal	Silver Medals	Bronze Medals
India	56	12	56 – 12 = 44	(6/11) × 44 = 24	(5/11) × 44 = 20

Japan	72	18	72 – 18 = 54	(5/9) × 54 = 30	(4/9) × 54 = 24
China	118	31	118 – 31 = 87	(2/3) × 87 = 58	(1/3) × 87 = 29
Korea	96	26	96 – 26 = 70	(4/7) × 70 = 40	(3/7) × 70 = 30
Indonesia	80	15	80 – 15 = 65	(8/13) × 65 = 40	(5/13) × 65 = 25

Total number of Silver medals won by Japan and China taken together = 30 + 58 = 88

Total number of Bronze medals won by Korea and Indonesia taken together = 30 + 25 = 55

Therefore, required percentage = [(88 - 55)/55] × 100 = 60%

18. Find the ratio of number of Silver medals won by India to the number of Bronze medals won by Japan.

A. 1:1
B. 5:4
C. 3:4
D. 3:2
E. None of these

Correct Answer- A. 1:1

Country	Total Medals	Gold Medals	Sum of Silver Medal and Bronze Medal	Silver Medals	Bronze Medals
India	56	12	56 – 12 = 44	(6/11) × 44 = 24	(5/11) × 44 = 20
Japan	72	18	72 – 18 = 54	(5/9) × 54 = 30	(4/9) × 54 = 24
China	118	31	118 – 31 = 87	(2/3) × 87 =	(1/3) × 87 =