| $+$ 0 $\qquad$ <br> Department of Mathematics © © (1) $\qquad$ (a) |  |  | INDIAN SCHOOL AL WADI AL KABIR <br> Class VIII, Mathematics Worksheet 2-with answers <br> DATA HANDLING <br> 07-12-2020 |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| OBJECTIVE TYPE (1 Mark) |  |  |  |  |  |  |  |  |
| Q.1. | What is the upper limit of the class 225-250 |  |  |  |  |  |  |  |
|  | A | 225 | B | 25 | C | 250 | D | 50 |
| Q.2. | A ----------- shows the relationship between a whole and its part. |  |  |  |  |  |  |  |
|  | A | Frequency | B | Pie chart | C | Histogram | D | Ungrouped data |
| Q.3. | Tally marks are used to find which of the following? |  |  |  |  |  |  |  |
|  | A | Frequency | B | upper limit | C | lower limit | D | Class marks |
| Q.4. | The width or size of the class interval 30-40 is: |  |  |  |  |  |  |  |
|  | A | 30 | B | 40 | C | 10 | D | 70 |
| Q.5. | YearsNumbers of <br> workers |  |  |  |  |  |  |  |
|  |  | 1992-93 | 25 |  |  |  |  |  |
|  |  | 1993-94 | 18 |  |  |  |  |  |
|  |  | 1994-95 | 11 |  |  |  |  |  |
|  |  | 1995-96 | 30 |  |  |  |  |  |
|  | Which class has the lowest frequency? |  |  |  |  |  |  |  |
|  | A | 1993-94 | B | 1992-93 | C | 1994-95 | D | 1995-96 |
| Q.6. | Which of the following is the probability of sure event? |  |  |  |  |  |  |  |
|  | A | 0 | B | 1 | C | 10 | D | 2 |
| Q.7. | A dice is thrown, the probability of getting number 5 is: |  |  |  |  |  |  |  |
|  | A | $\frac{1}{5}$ | B | $\frac{1}{6}$ | C | $\frac{5}{6}$ | D | $\frac{4}{5}$ |


| Q.8. | In grouped data, each of the group is called: |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | A | Class interval | B | Collection of data | C | frequency | D | Grouped frequency distribution |
| Q.9. | The difference between the upper-class limit and lower-class limit of a class interval is called: |  |  |  |  |  |  |  |
|  | A | width | B | frequency | C | histogram | D | event |
| Q. 10 | If a coin is tossed 20 times and tail appeared 5 times. what is the probability of getting a tail? |  |  |  |  |  |  |  |
|  | A | $\frac{2}{5}$ | B | $\frac{1}{5}$ | C | $\frac{1}{4}$ | D | $\frac{5}{10}$ |
| Fill in the blanks(1mark) |  |  |  |  |  |  |  |  |
| Q11. | $\qquad$ gives the number of times that a particular entry occurs in a frequency distribution table. |  |  |  |  |  |  |  |
| Q12. | In the class interval, 10-20, 10 is called the ------------- |  |  |  |  |  |  |  |
| Q13. | The above pie chart shows the different types of ice-creams liked by the students of a school. If 1000 students were surveyed, how many students like vanilla ice cream? |  |  |  |  |  |  |  |
| Q14. | What is the probability to get a vowel in the word 'mathematics'? |  |  |  |  |  |  |  |
| Q15. | When two coins are tossed together. The possible outcomes are -------- |  |  |  |  |  |  |  |
| SECTION B (2 marks ) |  |  |  |  |  |  |  |  |
| Q16. |  <br> A survey conducted on the number of hours spent by students per week on reading. Answer the following questions: |  |  |  |  |  |  |  |


|  | a) Which class interval has maximum number of students? <br> b) How many students read more than 5 hours? |
| :---: | :---: |
| Q17. | A spinning wheel with 6 green sectors, 2 blue sector and 2 red sector, what is the probability of getting a green sector? What is the probability of getting a blue sector? |
| Q18. | A dice is rolled once. What is the probability that the number on the top will be <br> a) Even number? b) A number less than 5? |
| Q19. | Weight of <br> students (in <br> kg.) Number of <br> students <br> $30-40$ 6 <br> $40-50$ 17 <br> $50-60$ 13 <br> $60-70$ 4 <br> A frequency table is given that the weight of students in class VIII. Answer the following questions: <br> 1) Which class interval has the maximum number of students? <br> 2) What is the upper-class limit of third-class interval? <br> 3) What is the width of the class interval? <br> 4) Which class interval has the lowest frequency? |
| Q20. | Given pie chart shows Ajay's family expenditure in a month. If the expenditure on food is Rs. 300, What is the expenditure on transport? |
|  | SECTION C (4marks) |
| Q21. | Prepare a grouped frequency distribution table for the following data: (taking one of the class intervals as 50-100). <br> $114,108,100,98,101$, <br> $109,117,119,126,131$, <br> $136,143,156,169,182$, <br> $195,207,219,235,118$. |


| Q22. | A school has a strength of 7200 students. Observe the above histogram and answer the following question: <br> a) What is the number of students interested in mathematics? <br> b) How many students are interested in social studies? <br> c) Which subject is liked by most of them? <br> d) What is the number of students interested in languages? |
| :---: | :---: |
| Q23. |  <br> Observe the above histogram and answer the following: <br> a) If the pass mark is 20 , how many students failed in the test? <br> b) How many students secured marks between 30 and 50 ? <br> c) How many students secured more than $80 \%$ marks? <br> d) What is the number of students, who got less than 10 marks? |
| Q24. | The following data shows the grades received by class VIII students in an art competition. Draw a pie chart for the following data: |
|  | GRADE $\quad$ NUMBER OF STUDENTS |
|  | A 40 |
|  | B 60 |
|  | C 20 |
|  | D 60 |


| Q25. | Draw a histogram for the following data: |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Class interval |  | 140-145 |  | 145-150 | 150-155 |  | 155-160 | 160-165 |
|  | Frequency |  | 8 |  | 12 | 18 |  | 10 | 5 |
| Answers |  |  |  |  |  |  |  |  |  |
|  | 1 | 250 |  | 2 | Pie chart | 3. | Frequency | 4 | 10 |
|  | 5 | 1994-95 |  | 6 | 1 | 7 | $\frac{1}{6}$ | 8 | Class interval |
|  | 9 | width |  | 10 | $\frac{1}{4}$ | 11 | Frequency | 12 | Lower class <br> limit |
|  | 13 | 250 |  | 14 | $\frac{4}{11}$ | 15 | HH, HT, TH, TT | 16 | a) $4-5$ <br> b) $8+6=14$ |
|  | 17 | a) $\mathrm{P}($ green $)=$ <br> b) P (blue) $=$ $\frac{2}{10}=$ |  | 18 | a) $P($ even $)=\frac{3}{6}$ $=\frac{1}{2}$ <br> b) $\mathrm{P}($ less than 5$)=$ $\frac{4}{6}=\frac{2}{3}$ | 19 | 1) $40-50$ <br> 2) 60 <br> 3) 10 <br> 4) $60-70$ | 20 | Rs. 125 |
|  | 22 | a) 2520 <br> b) 720 <br> c) Mat <br> d) 1800 | ematics | 23 | a) $12+6=18$ <br> b) $24+18=42$ <br> c) 18 <br> d) 6 |  |  |  |  |

