

**INTERNATIONAL INDIAN SCHOOL**

**BURAIDAH**

Worksheet For The Academic Year 2024-25

**CLASS: VIII SUBJECT: Mathematics DATE: 27/10/2024**

**LESSON-7 Cubes & Cube roots**

- 1) Cube numbers are obtained by multiplying a number by itself \_\_\_\_ times.
- 2) Find the cubes of: a) 21 b) 40 c) 302
- 3) Which of the following are perfect cubes?  
a) 64 b) 108 c) 1728 d) 243
- 4) Find the smallest number by which 392 must be multiplied so that the product is a perfect cube?
- 5) What is the smallest number by which 8640 must be divided so that the quotient is a perfect cube?
- 6) If one side of a cube is 16m , find its volume.
- 7) Find the cube root of the following using prime factorisation method:  
a) 1728 b) 1331 c) 4096 d) 2744
- 8) Find the smallest number by which 2560 has to be multiplied to get a perfect cube.
- 9) Find the least number by which 3087 has to be divided to get a perfect cube.
- 10) Evaluate:  $(\frac{2}{3})^3$
- 11) Which of the following are cubes of even numbers?  
a) 8000 b) 1331 c) 216 d) 729 e) 3375
- 12) Find the least number by which the following numbers must be multiplied to make it a perfect cube:  
a) 196 b) 1372 c) 1323
- 13) Find cubes of: a) 0.21 b) 0.07 c) 1.6

14) What is the least number by which the following numbers should be divided to make it a perfect cube?

a) 1600   b) 28561

15) Find the cube root of the following numbers using estimation method:

a) 6859   b) 2197   c) 551368   d) 226981

**ANSWERS**

|                        |                         |                   |
|------------------------|-------------------------|-------------------|
| 4) 7                   | 7) c) 16   d) 14        | 14) a) 25   b) 13 |
| 5) 5                   | 8) 25                   | 15) a) 19   b) 13 |
| 6) 4096 m <sup>3</sup> | 9) 9                    | 15) c) 82   d) 61 |
| 7) a) 12   b) 11       | 12) a) 14   b) 2   c) 7 |                   |