

Subject: Maths

Class: 8

Topic: Exponents and Powers

Watch video #10 and solve the following exercise:

EXERCISE 3.7

Use Cordova Smart Class Software on the smart board in class to do Exercise.

1. Simplify the following and write in the form of $\frac{p}{q}$.

(i) $\sqrt{\frac{16}{25}}$

(ii) $\sqrt{6\frac{1}{4}}$

(iii) $\sqrt{27\frac{1}{25}}$

(iv) $\sqrt{7\frac{9}{16}}$

2. Simplify :

(i) $\sqrt{\frac{80}{405}}$

(ii) $\sqrt{\frac{1225}{12321}}$

(iii) $\sqrt{1\frac{155}{169}}$

(iv) $\sqrt{6\frac{145}{256}}$

(v) $\sqrt{84\frac{37}{121}}$

(vi) $\sqrt{\frac{1183}{2023}}$

(vii) $\sqrt{80\frac{244}{729}}$

(viii) $\sqrt{75\frac{46}{49}}$

3. The area of a square field is $23\frac{394}{729}$ sq.m. Find its side.

4. The area of a square field is $35\frac{1}{144}$ sq.m. Find its side.

5. Evaluate :

(i) $\frac{\sqrt{441} + \sqrt{169}}{\sqrt{441} - \sqrt{169}}$

(ii) $\frac{\sqrt{576} + \sqrt{196}}{\sqrt{576} - \sqrt{196}}$

EXERCISE 3.8

Use Cordova Smart Class Software on the smart board in class to do Exercise.

1. Find the square root of the following numbers :

(i) 5.0625

(ii) 31.36

(iii) 51.84

(iv) 98.01

(v) 0.1521

(vi) 497.29

2. Find the square root of the following, correct to three places of decimal :

(i) 3

(ii) 7

(iii) 11

(iv) 0.9

(v) $\frac{7}{8}$

(vi) $4\frac{2}{3}$

(vii) 0.021609

(viii) 0.00155236

3. What is the fraction which when multiplied by itself gives 0.1764?

4. What is the fraction which when multiplied by itself gives 0.7225?

5. The area of a square field is 1892.25 sq. m. Find the side of the square field.

6. The area of a square field is 37056.25 sq. m. Find the side of the square field.

