Decimal Forms


ITALIAN RECIPES
PIZZA
CLASSIC ITALIAN RECIPES
Small pizza ..... ₹ 97.5
Medium pizza..... ₹ 225.75
Large pizza..... ₹ 526.01

Decimal Forms

Visualising Decimals

Decimal (or) Decimus (in Latin)

97.5

225.75

526.01

BTLA Video

Grade:	09 - KL
Chapter:	Decimal Forms
Subtopic:	Interconversion of Fractions and Decimals
Timings:	00:03:18 – 00:03:48
Start:	You all know some awesome news now…
End:	… $\frac{87654}{1000}$ that's it.
Duration:	00:00:30
Link:	-----

Convert the following prices of pizzas into fractions:

a) ₹97.5

b) ₹225.75

c) ₹526.01

Poll Question

Convert 12.752 into a fraction.

A $\frac{12752}{100}$

B $\frac{12752}{1000}$

C $\frac{12752}{10}$

D $\frac{127520}{100}$

Convert 12.752 into a fraction.

A $\frac{12752}{100}$

B $\frac{12752}{1000}$

C $\frac{12752}{10}$

D $\frac{127520}{100}$

Visualise the following decimals as fractions:

a) **0.52**

b) **0.483**

c) **0.06**

Visualising Decimals (BHLP)

Grade: 09 - KL

Chapter: Decimal Forms

Subtopic: -----

Timings: 00:10:37 – 00:12:19

Start: Point four five three...

End: ...after the decimal

Duration: 00:01:42

Link: https://byju.s.llnwi.net/d/c71b0f2b/ql00c7/dash/h264.mpd

Visualise the following decimals as fractions:

a) **0.52**

b) **0.483**

c) **0.06**

0.52 = ☐ = ☐ + ☐

= ☐ + ☐

Visualise the following decimals as fractions:

a) 0.52
b) 0.483
c) 0.06

0.52 $= \frac{52}{100} = \frac{5}{10} + \frac{2}{100}$

0.483 $= \square = \square + \square + \square$

$= \square + \square + \square$

Visualise the following decimals as fractions:

a) 0.52
b) 0.483
c) 0.06

0.52 $= \frac{52}{100} = \frac{5}{10} + \frac{2}{100}$

0.483 $= \frac{483}{1000} = \frac{4}{10} + \frac{8}{100} + \frac{3}{1000}$

0.06 $= \square = \square + \square = \square$

Poll Question

Rewrite 0.752 using place values.

A $\frac{7}{10} + \frac{5}{100} + \frac{2}{1000}$

B $\frac{7}{1000} + \frac{5}{100} + \frac{2}{10}$

Rewrite 0.752 using place values.

A $\frac{7}{10} + \frac{5}{100} + \frac{2}{1000}$

B $\frac{7}{1000} + \frac{5}{100} + \frac{2}{10}$

Represent Each Piece in the Decimal Form

Fractions with denominator in powers of 10 to decimals.

Grade:	09 - KL
Chapter:	Decimal Forms
Subtopic:	Interconversion of fractions and Decimals.
Timings:	00:00:06 to 00:00:30
Start:	Like how seven tens is actually 0.7…
End:	…what about $\frac{9}{10}$, 0.9 also simple.
Duration:	00:00:24
Link:	-----

Fraction to Decimal

$\frac{1}{10}$

$\frac{31}{100}$

$\frac{55}{1000}$

Poll Question

Represent $\frac{631}{100}$ in its decimal form.

A 6.31

B 63.1

C 0.631

D 631.0

Represent $\frac{631}{100}$ in its decimal form.

A 6.31

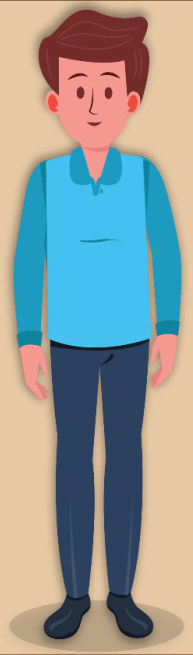
B 63.1

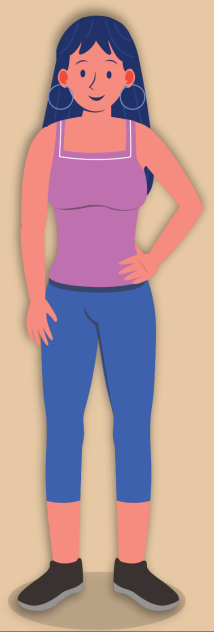
C 0.631

D 631.0

Alex and His Family Ordered Pizzas

$\frac{1}{5}$





$\frac{1}{5}$ in Decimal Form

$\frac{1}{5}$

Fractions with denominators as 2’s and 5’s

Grade:	09 - KL
Chapter:	Decimal Forms
Subtopic:	Interconversion of fractions and Decimals.
Timings:	00:00:31 to 00:02:44
Start:	What about something like $\frac{1}{5}$ …
End:	…Convert into decimals now, 0.75.
Duration:	00:02:13
Link:	-----

Convert the Given Fractions into Decimals

$\frac{1}{5}$

$\frac{1}{2}$

Convert $\frac{3}{40}$ into its decimal form.

Poll Question

The decimal form of $\frac{2}{25}$ is:

A 0.8

B 0.4

C 0.08

D 0.04

The decimal form of $\frac{2}{25}$ is:

A 0.8

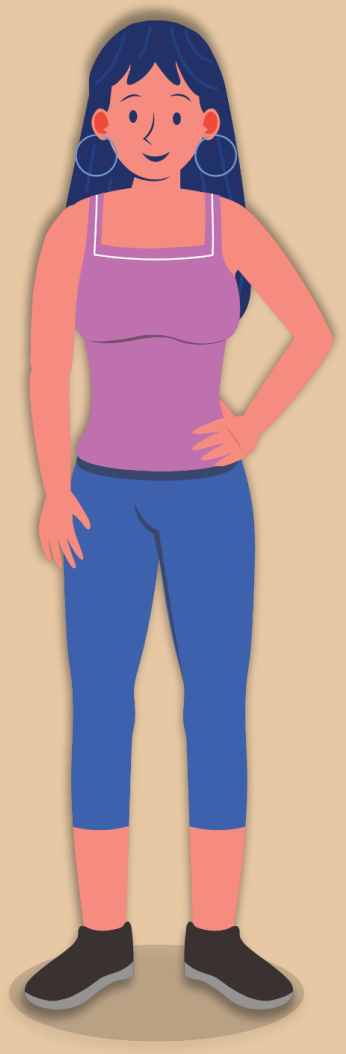
B 0.4

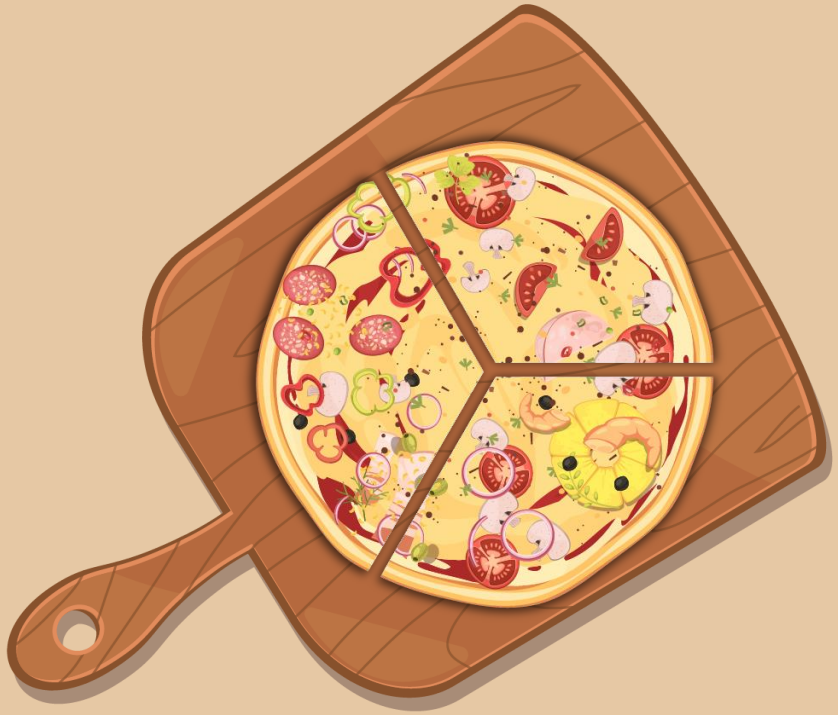
C 0.08

D 0.04

Doubt Board

$\frac{1}{3}$ in Decimal Form





$\frac{1}{3}$

BHLP

Grade: 09 - KL

Chapter: ----- Decimal Forms

Subtopic: -----

Timings: ----- 00:28:03 – 00:31:45

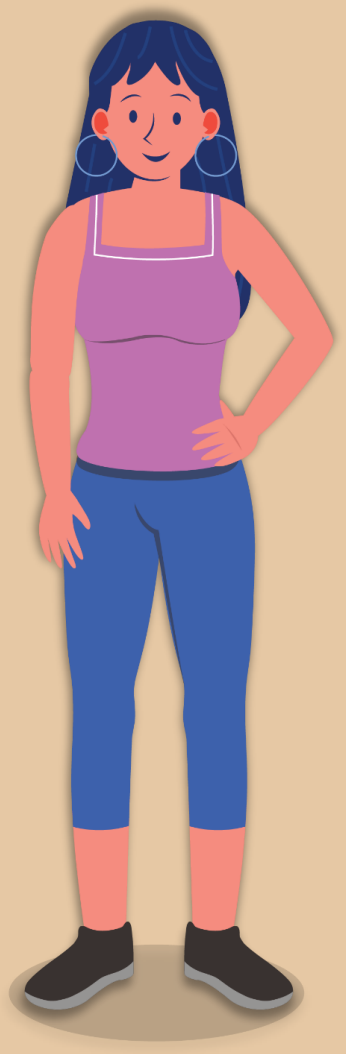
Start: ----- so our fraction is...

End: ----- ...is the value of 1/3.

Duration: ----- 00:03:42

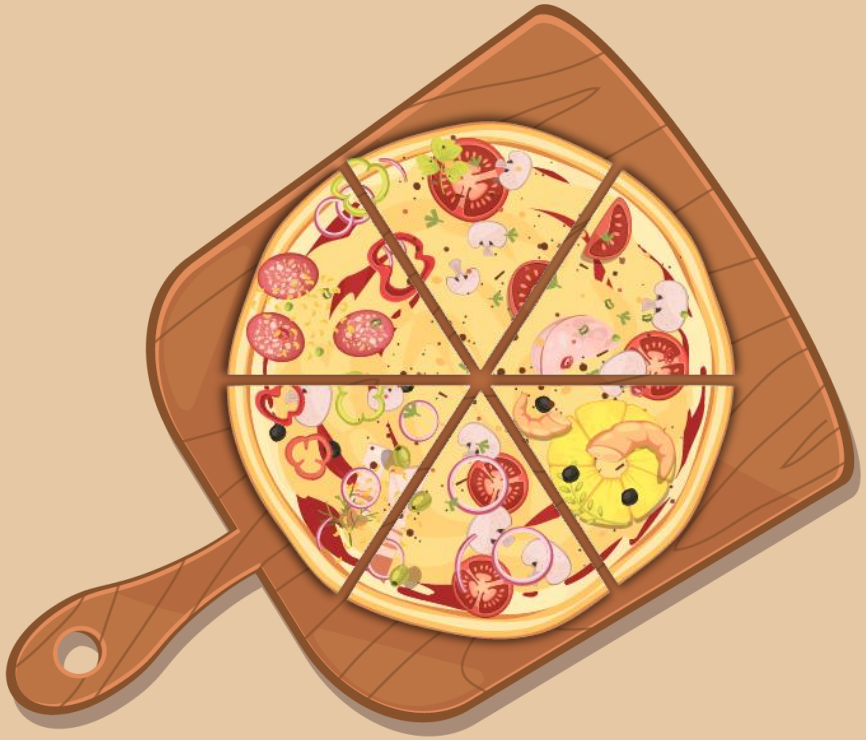
Link: https://byju.s.llnwi.net/d/c71b0f2b/ql00c7/dash/h264.mpd

$\frac{1}{3}$ in Decimal Form



$\frac{1}{3}$ =

Convert $\frac{1}{6}$ into its decimal form.



Convert $\frac{1}{6}$ into its decimal form.

Step **01**

Multiply the numerator and the denominator by 10.

Convert $\frac{1}{6}$ into its decimal form.

Step **01**

Multiply the numerator and the denominator by 10.

$$\frac{1}{10} + \frac{1}{15}$$

Step **02**

Multiply the numerator and the denominator by 100.

Convert $\frac{1}{6}$ into its decimal form.

Step **01** Multiply the numerator and the denominator by 10.

$$\frac{1}{10} + \frac{1}{15}$$

Step **02** Multiply the numerator and the denominator by 100.

$$\frac{16}{100} + \frac{1}{150}$$

Step **03** Multiply the numerator and the denominator by 1000.

Poll Question

On multiplying the numerator and the denominator by 1000, $\frac{1}{6}$ becomes ____.

A $\frac{1}{1000} + \frac{1}{1500}$

B $\frac{116}{1000} + \frac{1}{1500}$

C $\frac{166}{100} + \frac{1}{150}$

D $\frac{166}{1000} + \frac{1}{1500}$

On multiplying the numerator and the denominator by 1000, $\frac{1}{6}$ becomes ____.

A $\frac{1}{1000} + \frac{1}{1500}$

B $\frac{116}{1000} + \frac{1}{1500}$

C $\frac{166}{100} + \frac{1}{150}$

D $\frac{166}{1000} + \frac{1}{1500}$

Convert $\frac{1}{6}$ into its decimal form.

Step **01** Multiply the numerator and the denominator by 10.

$$\frac{1}{10} + \frac{1}{15}$$

Step **02** Multiply the numerator and the denominator by 100.

$$\frac{16}{100} + \frac{1}{150}$$

Step **03** Multiply the numerator and the denominator by 1000.

$$\frac{166}{1000} + \frac{1}{1500}$$

Convert $\frac{1}{6}$ into its decimal form.

Analysis

$$\frac{1}{6} - \frac{1}{10} = \frac{1}{15}$$

$$\frac{1}{6} - \frac{16}{100} = \frac{1}{150}$$

$$\frac{1}{6} - \frac{166}{1000} = \frac{1}{1500}$$

The value of $\frac{1}{6}$ is

Convert $\frac{1}{7}$ into its decimal form.

BHLP

Grade: 09 - KL

Chapter: ----- Decimal Forms

Subtopic: -----

Timings: ----- 00:39:51 – 00:44:13

Start: ----- so the first step...

End: ----- ...would keep repeating

Duration: ----- 00:04:22

Link: https://byju.s.llnwi.net/d/c71b0f2b/ql00c7/dash/h264.mpd

Convert $\frac{1}{7}$ into its decimal form.

$\frac{10}{7}$	=	$1\frac{3}{7}$
$\frac{100}{7}$	=	$14\frac{2}{7}$
$\frac{1000}{7}$	=	
$\frac{10^4}{7}$	=	
$\frac{10^5}{7}$	=	
$\frac{10^6}{7}$	=	
$\frac{10^7}{7}$	=	

Poll Question

If $\frac{100}{3} = 33\frac{1}{3}$, then $\frac{1000}{3} =$ _____.

A $333\frac{1}{3}$

B $133\frac{1}{3}$

C $33\frac{1}{3}$

D $13\frac{1}{3}$

If $\frac{100}{3} = 33\frac{1}{3}$, then $\frac{1000}{3} =$ _____.

A $333\frac{1}{3}$

B $133\frac{1}{3}$

C $33\frac{1}{3}$

D $13\frac{1}{3}$

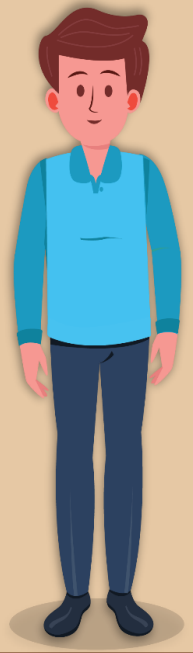
Convert $\frac{1}{9}$ into its decimal form.

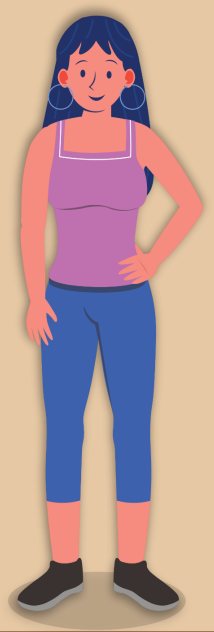
Fractions and Their Decimal Forms

$\frac{1}{5} = 0.2$

$\frac{1}{2} =$

$\frac{1}{3} =$





Terminating and Recurring Decimals

$\frac{1}{5} = 0.2$

$\frac{1}{2} =$

$\frac{1}{3} =$

Convert the recurring decimal 0.2222… into a fraction.

Poll Question

The recurring decimal 0.1111… gets closer and closer to _____.

A $\frac{1}{3}$

B $\frac{1}{10}$

C $\frac{1}{9}$

D $\frac{1}{11}$

The recurring decimal 0.1111… gets closer and closer to _____.

A $\frac{1}{3}$

B $\frac{1}{10}$

C $\frac{1}{9}$

D $\frac{1}{11}$


ITALIAN RECIPES
PIZZA
CLASSIC ITALIAN RECIPES
Small
Medi
Large
Pizza Palace
Item Qty Price
Large Pizza 1 ₹ 97.5
Medium Pizza 1 ₹ 225.75
Small Pizza 1 ₹ 526.01
Total Price = ₹ 850
PAID
THANK YOU


PIZZA
24
We had a nice time learning decimal forms while enjoying our pizza.

Doubt Board

SUMMARY

1. Visualisation of decimal forms and their place values
2. Conversion of fractions with denominators in the powers of 2's and 5's into their decimal forms
3. Conversion of fractions with denominators that are not in the powers of 2's and 5's into their decimal forms
4. Conversion of recurring decimals into fractions