# Time <br> Fractions and Decimals of an Hour <br> Fractions and Decimals of an Hour 

We are learning to write fractions and decimals of hours as hours and minutes.

## Exercise 1

Use the Number Wall to help find the number of minutes in each of the following fractions of an hour. You may want to record these special fractions on a table in your work book.


1) $\frac{1}{2}$ an hour
(2) $\frac{1}{3}$ of an hour
2) $\frac{1}{5}$ of an hour
(5) $\frac{1}{10}$ of an hour
(3) $\frac{1}{4}$ of an hour

Complete these
6) $\quad \frac{1}{2}$ an hour is $\frac{1}{2}$ of 60 minutes $=\square$
7) $\quad \frac{1}{3}$ of an hour is $\frac{1}{3}$ of 60 minutes $=\square$
8) $\frac{1}{4}$ of an hour is $\frac{1}{4}$ of 60 minutes $=$
9) $\frac{1}{5}$ of an hour is $\frac{1}{5}$ of 60 minutes $=$ $\qquad$
10) $\quad \frac{1}{10}$ of an hour is $\frac{1}{10}$ of 60 minutes $=\square$

Find how many minutes in the following fractions of an hour. You can use your answers to the previous questions or the fraction wall to help work out the answers
11) $\frac{2}{3}$ of an hour
(12) $\frac{3}{4}$ of an hour
(13) $\frac{2}{5}$ of an hour
14) $\frac{4}{5}$ of an hour
(15) $\frac{1}{6}$ of an hour
(16) $\frac{5}{6}$ of an hour
17) $\frac{3}{5}$ of an hour
(18) $\frac{7}{10}$ of an hour
(19) $\frac{2}{6}$ of an hour
20) $\frac{1}{12}$ of an hour
(21) $\frac{5}{12}$ of an hour
(22) $\frac{3}{10}$ of an hour
23) $1 \frac{1}{4}$ hours
(24) $3 \frac{2}{5}$ hours
(25) $2 \frac{2}{3}$ hours

## Exercise 2

Find how many minutes in each of the following decimal fractions of an hour. Your answers to Exercise 1 may be helpful in solving the questions in this exercise.
eg $\quad 0.2$ of an hour is $\frac{2}{10}$ of an hour $=12$ minutes $(0.2 \times 60)$
1.25 hours is $1 \frac{1}{4}$ hours $=1$ hour 15 minutes $(75$ minutes $)$

| 1) | 1.5 hours | (2) 3.5 hours | (3) 7.5 hours |  |
| :--- | :--- | :--- | :--- | :--- |
| 4) | 2.6 hours | (5) | 4.2 hours | (6) 5.6 hours |
| 7) | 6.1 hours | (8) 8.7 hours | (9) 9.3 hours |  |
| $10)$ | 6.4 hours | (11) 4.9 hours | (12) 2.3 hours |  |
| 13) 2.25 hours | (14) 5.25 hours | (15) 7.75 hours |  |  |

## Exercise 3

Find the following decimal fractions of an hour as hours and minutes. You may use a calculator for these problems
eg $\quad 3.45$ hours is 3 hours $+0.45 \times 60$ minutes $=3$ hours 27 minutes.

1) 2.35 hours
(2) 4.15 hours
(3) 7.45 hours
2) 2.65 hours
(5) 4.38 hours
(6) 5.28 hours
3) $\quad 7.85$ hours
(8) 6.95 hours
(9) 2.875 hours

## Exercise 4

Answer True or False for each of the following

1) 2.45 hours $=2$ hours 45 minutes
2) 2.30 hours $=2$ hours 30 minutes
3) $\quad 12.75$ hours $=12$ hours 75 minutes
4) $\quad 11 \mathrm{hrs} 75 \mathrm{mins}=12 \mathrm{hrs} 15 \mathrm{mins}$
5) 2.5 hours $=150$ minutes
6) 100 minutes $=1 \frac{2}{3}$ hours
7) $\frac{5}{6}$ hour $=56$ minutes
8) $\frac{7}{12}$ hour $=36$ minutes
9) $\frac{5}{4}$ hour $=1$ hour 15 minutes
10) 2.85 hours $=3$ hours 15 minutes

# Fractions and Decimals of an Hour Answers 

## Exercise 1

| 1) | 30 mins | (2) | 20 mins | (3) | 15 mins | (4) | 12 mins |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |
| 5) | 6 mins |  |  |  |  |  |  |
| 6) | 30 mins | (7) | 20 mins | (8) | 15 mins | (9) | 12 mins |
| 10) | 6 mins | (11) | 40 mins | (12) | 45 mins | (13) | 24 mins |
| 14) | 48 mins | (15) | 10 mins | (16) | 50 mins | (17) | 36 mins |
| 18) | 42 mins | (19) | 20 mins | $(20)$ | 5 mins | (21) | 25 mins |
| 22) | 18 mins | (23) | 75 mins | $(24)$ | 204 mins | (25) | 160 mins |

## Exercise 2

1) $\quad 1$ hour $30 \mathrm{mins}=90 \mathrm{mins}$
2) 7 hours $30 \mathrm{mins}=450 \mathrm{mins}$
3) 4 hours $12 \mathrm{mins}=252 \mathrm{mins}$
4) 6 hours $6 \mathrm{mins}=366 \mathrm{mins}$
5) 9 hours $18 \mathrm{mins}=558 \mathrm{mins}$
6) 4 hours $54 \mathrm{mins}=294 \mathrm{mins}$
7) 2 hours $15 \mathrm{mins}=135 \mathrm{mins}$
8) 7 hours 45 minutes $=465 \mathrm{mins}$
(2) 3 hours $30 \mathrm{mins}=210 \mathrm{mins}$
(4) 2 hours $36 \mathrm{mins}=156 \mathrm{mins}$
(6) 5 hours $36 \mathrm{mins}=336 \mathrm{mins}$
(8) 8 hours $42 \mathrm{mins}=522 \mathrm{mins}$
(10) 6 hours $24 \mathrm{mins}=384 \mathrm{mins}$
(12) 2 hours $18 \mathrm{mins}=138 \mathrm{mins}$
(14) 5 hours 15 minutes $=315 \mathrm{mins}$

## Exercise 3

1) 2 hours 21 mins
(2) 4 hours 9 mins
(3) 7 hours 27 mins
2) 2 hours 39 mins
(5) 4 hours 22.8 mins
(6) 5 hours 16.8 mins
3) 7 hours 51 mins
(8) 6 hours 57 mins
(9) 2 hours 52.5 mins

## Exercise 4

1) F
(2)
(3) F
(4) T
(5) T
2) $T$
(7) F
(8) F
(9) T
(10) F
