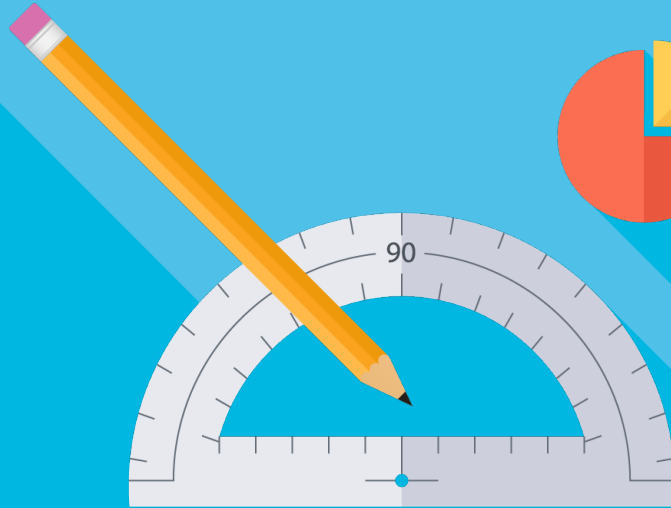
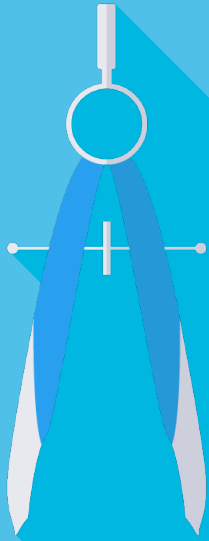


Wednesday Week 2

Maths Task



Measurement & Geometry

Time

WALT: Determine and compare the duration of events.



Elapsed Time



twinkl

What is Elapsed Time?

Elapse means to **pass** or **go by**.

So when we talk about **elapsed time**, we are talking about the time that has **passed**, or **gone by**, between two given time periods.

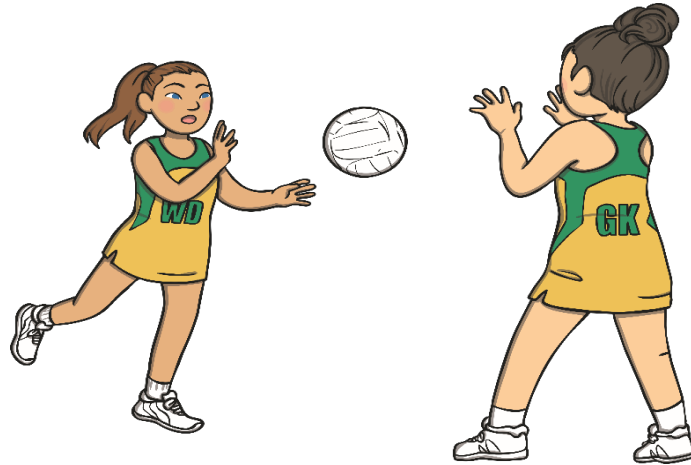
In other words, elapsed time is the difference between a start time and an end time.



Let's Look at Some Examples

If a class starts at **9:00am** and ends at **10:00am**, the difference between the start time and end time is **1 hour**.

So, the **elapsed time = 1 hour**.



If netball practice starts at **3:00pm** and ends at **3:45pm**, the difference between the start time and end time is **45 minutes**.

So, the **elapsed time = 45 minutes**.

Why Is Understanding Elapsed Time Important?

Understanding how to calculate elapsed time is important because it allows you to work out how long it takes to do things.

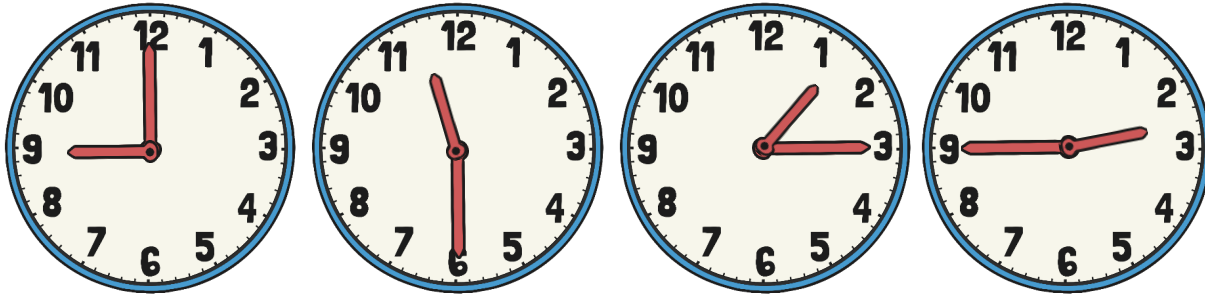
This is especially important when we have busy schedules.



How Do You Work Out Elapsed Time?

To work out elapsed time you need to be able to read a clock and understand how to measure time.

Can you read a clock?



Calculating Elapsed Time

To calculate elapsed time you need to work out the **difference between** the **start time** and the **end time**.

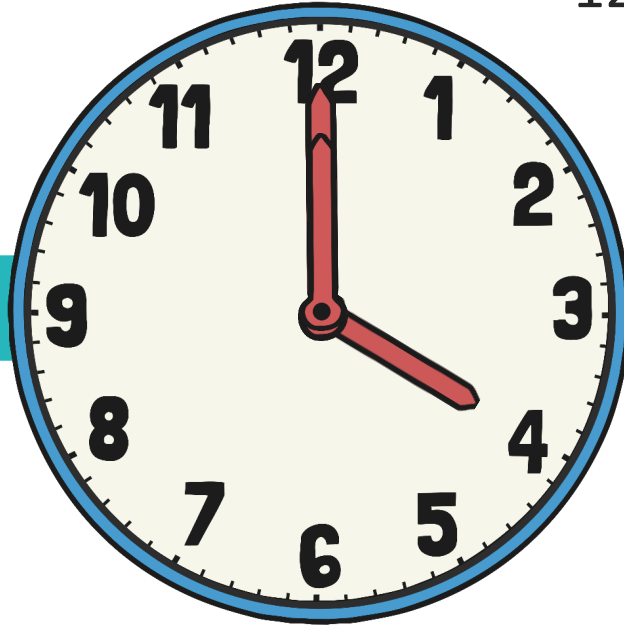


The start time is when something starts.
The end time is when something ends.

Elapsed Time

Count the elapsed time from
12:00pm to 4:00pm.

Start time: 12:00pm
End time: 4:00pm



4 hours go by. The elapsed time is 4 hours.

Elapsed Time

Count the elapsed time from
12:00pm to 7:00pm.

Start time: 12:00pm
End time: 7:00pm

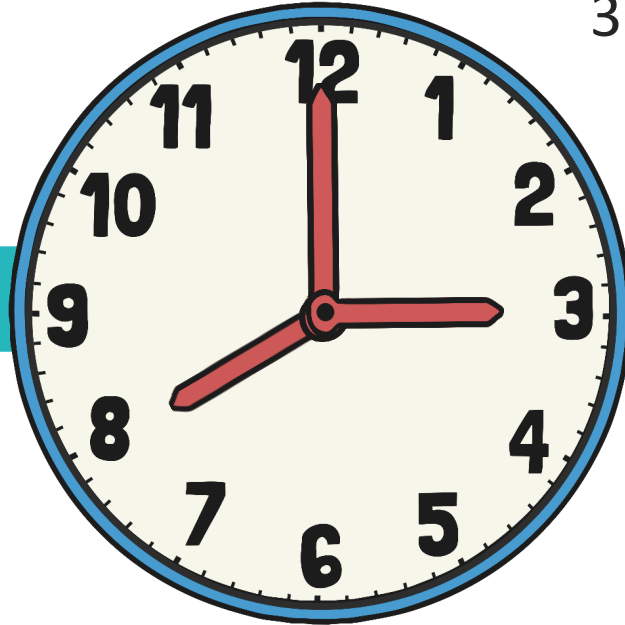


7 hours go by. The elapsed time is 7 hours.

Elapsed Time

Count the elapsed time from
3:00pm to 8:00pm.

Start time: 3:00pm
End time: 8:00pm



5 hours go by. The elapsed time is 5 hours.

Calculating Complex Time Periods

Sometimes we need to calculate time periods that don't sit within hourly blocks. This is a bit more complicated as we need to count the hours **and the minutes**.

For example:

Start time: **3:00pm**

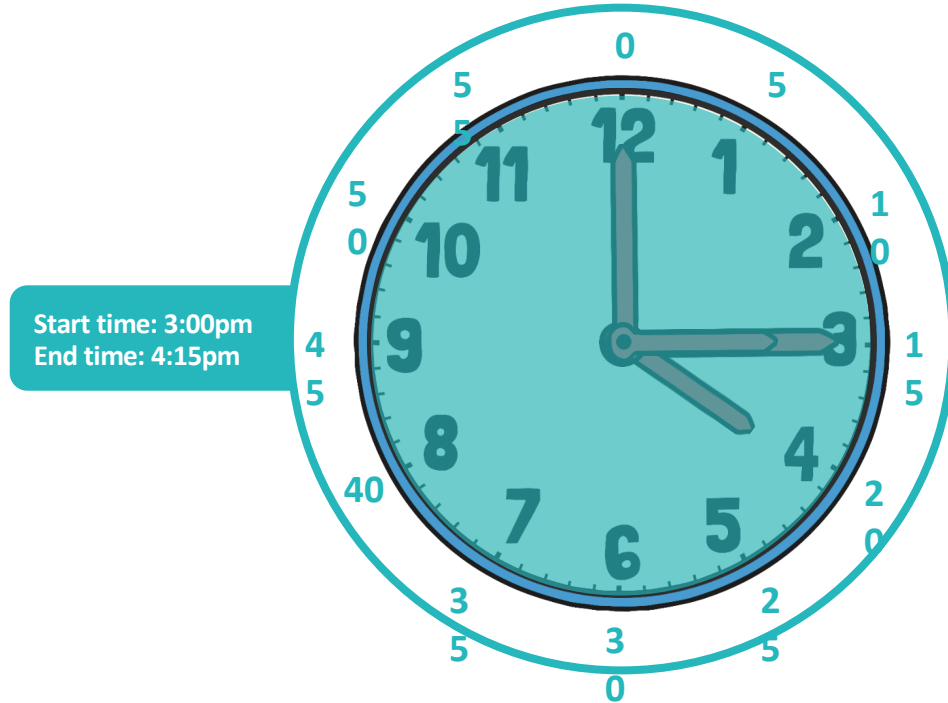
End time: **4:15pm**

Elapsed time: **1 hour 15 minutes**



Elapsed Time

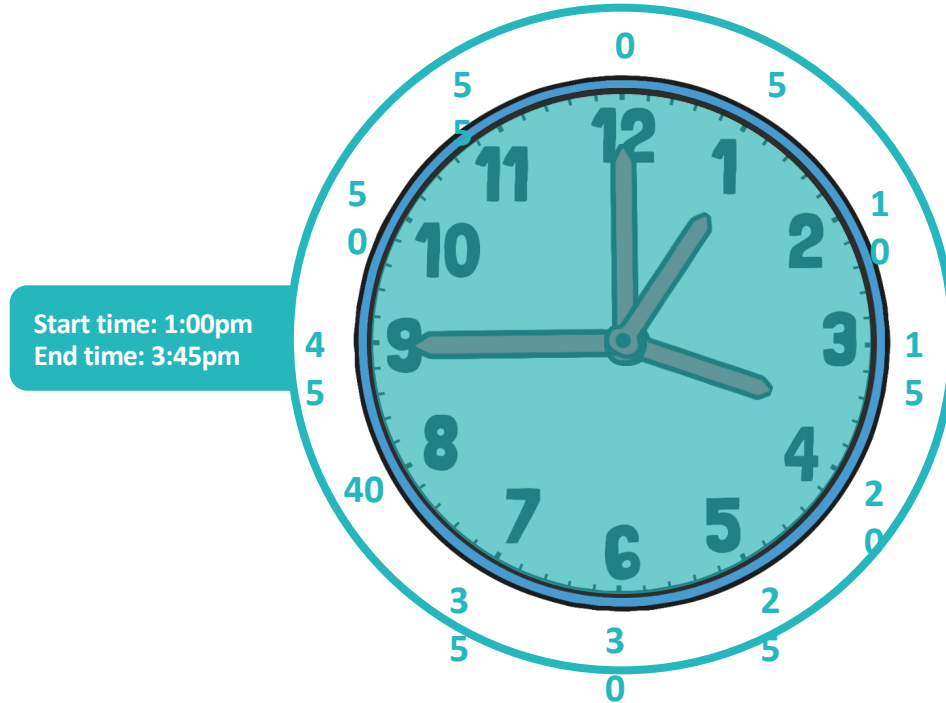
Count the elapsed time from 3:00am to 4:15am.



1 hour and 15 minutes go by. The elapsed time is 1 hour and 15 minutes.

Elapsed Time

Count the elapsed time from 1:00pm to 3:45pm.



2 hours and 45 minutes go by. The elapsed time is 2 hours and 45 minutes.

Using a T Chart to Calculate the Elapsed Time

Mohamed starts football training at 3:15pm and finishes at 4:45pm.



The elapsed time is 1 hour and 30 minutes.

Using a T Chart to Calculate Elapsed Time

3:15	Hours Passed	4:15	Minutes Passed
4:15	1	4:20	5
		4:25	10
		4:30	15
		4:35	20
		4:40	25
		4:45	30

The elapsed time is 1 hour and 30 minutes.

BLUE	RED	GREEN
<p>How many hours pass between the following times?</p> <p>a) 2:00pm to 4:00pm =</p> <p>b) 3:00pm to 6:00pm =</p> <p>c) 10:30am to 1:30pm =</p> <p>d) 3:30pm to 10:30pm =</p> <p>e) 2:30pm to 11:30pm =</p> <p>f) 9:30pm to 1:30am (the next day) =</p>	<p>How much time passes between the following times?</p> <p>a) 3:00pm to 4:15pm =</p> <p>b) 3:15pm to 3:30pm =</p> <p>c) 10:30am to 12:45pm =</p> <p>d) 5:30pm to 8:15pm =</p> <p>e) 2:15pm to 8:30pm =</p> <p>f) 11:30pm to 2:00am (the next day) =</p>	<p>How much time passes between the following times?</p> <p>a) 3:10pm to 4:15pm =</p> <p>b) 2:15pm to 3:40pm =</p> <p>c) 10:40am to 12:50pm =</p> <p>d) 5:10pm to 8:50pm =</p> <p>e) 7:20pm to 11:10pm =</p> <p>f) 10:20pm to 2:40am (the next day) =</p>
<p>1. I leave school at 3:15pm. It takes me 30 minutes to walk home. What time do I arrive?</p> <p>2. Maths finishes at 12:30pm. We then have lunch for 45 minutes. What time does lunch end?</p> <p>3. I get off the bus at 2:45pm. The journey lasted 30 minutes. What time did the bus leave?</p>	<p>1. I set off to walk to my grandma's house at 3:20pm. It takes me 40 minutes to walk there. What time do I arrive?</p> <p>2. My dance lesson starts at 11:40am. It lasts 1 hour and 10 minutes. What time does it end?</p> <p>3. I flew from London to Madrid. The flight lasted 2 hours and 30 minutes and the plane landed at 1:40pm. What time did it take off?</p>	<p>1. French starts at 1:20pm and lasts 55 minutes. What time does it finish?</p> <p>2. My favourite TV show starts at 6:55pm. It lasts 1 hour and 10 minutes. What time does it finish?</p> <p>3. I woke up at 12:35am. I had been asleep for 1 hour and 20 minutes. What time did I go to sleep?</p>
<p>Choose the correct answers for the following question:</p> <p>Poppy walks to her friend's house. She sets off at 4:15pm. It takes her 30 minutes to get there. What time does she arrive?</p> <p>a) 4:45pm</p> <p>b) quarter past 5</p> <p>c) 4:45am</p> <p>d) quarter to 5</p>	<p>Choose the correct answers for the following question:</p> <p>Keenan finishes tidying his bedroom at 11:30am. It took him 45 minutes to tidy it. When did he start?</p> <p>a) quarter past 12</p> <p>b) 10:45am</p> <p>c) quarter to 11</p> <p>d) 10:45pm</p>	<p>Choose the correct answer for the following question:</p> <p>Carla's birthday party finished at 4:25pm. The party lasted 1 hour and 40 minutes. What time did it start?</p> <p>a) 1:45pm</p> <p>b) quarter to 2</p> <p>c) 2:45pm</p> <p>d) quarter to 3</p> <p>e) 2:40pm</p>
<p>Use a T Chart to calculate the elapsed time.</p> <p>Jacob starts cooking dinner at 5:45pm and finishes at 7:20pm.</p>	<p>Use a T Chart to calculate the elapsed time.</p> <p>Henry arrives at the train station at 11:10am. The train journey took 45 minutes. When did he start?</p>	<p>Use a T Chart to calculate the elapsed time.</p> <p>My dad drove to my auntie's house. The journey took 1 hour and 15 minutes. What time did he start?</p>

Extension Task (Part 1)

1. Convert these times to either 12 or 24 hours times.

a. 18:00 =	b. 2:00 pm =
c. 21:00 =	d. 10:00 pm =
e. 11:00 am =	f. 00:30 =

2. Chicken needs to be cooked for 20 minutes for every kg.

Lamb needs to be cooked for 30 minutes for every kg.

Complete the table below:

kgs	1	1.5	2	2.5	3	3.5
lamb cooking time (mins)						
Chicken cooking time (mins)						

Extension Task (Part 2)

3. Complete the train timetable below and answer the questions:

	Journey 1	Journey 2	Journey 3
Sheffield	10:14	10:41	
Dore and Totley	10:21	10:48	
Hope	10:39	11:06	
Brinnington	11:16	11:43	
Manchester Piccadilly	11:32	11:59	

a. What time does the 10:14 from Sheffield arrive at Brinnington?

b. You need to get to Manchester for 1pm. Which train from Sheffield should you get?

Additional Task

Answer the following questions.

Just Passing the Time...

Can you calculate how much time has passed between the two times below?



1. 7:40a.m. to 9:32a.m. = _____

9. 10:40a.m. to 2:26p.m. = _____

2. 4:00p.m. to 8:58p.m. = _____

10. 10:20a.m. to 1:43p.m. = _____

3. 3:00a.m. to 5:54a.m. = _____

11. 2:00p.m. to 5:15p.m. = _____

4. 2:00a.m. to 5:55a.m. = _____

5. 12:40a.m. to 2:08a.m. = _____

6. 8:40p.m. to 10:39p.m. = _____

7. 7:00a.m. to 10:15a.m. = _____

8. 10:00p.m. to 12:16a.m. = _____

12. 8:00p.m. to 10:24p.m. = _____

13. 4:20p.m. to 8:56p.m. = _____

14. 12:00p.m. to 1:14p.m. = _____

15. 11:40a.m. to 1:01p.m. = _____