

Good morning Class 6 as it is a Thursday, this is Mrs McCullough setting you work for today. It's very strange not to be with you all but I am glad that we are all working together to do our very best to help keep everyone safe.

I will be setting you some Investigative Maths and Reading Comprehension work and I hope you will also find some time to get involved in some other activities, there are so many opportunities to spend the time doing something creative - perhaps learning a new skill or taking up a new hobby. It's a good idea to make the most of the good weather and get outside in your garden to run off some steam and don't forget to keep reading. You also have your Reading Missions at home with you and may choose to do these at any time.

I will be keeping an eye on the class email all day (as well as supervising my three children who are also learning from home) so do contact me that way if you have any questions or would like to show me your work or tell me about what you have been getting up to.

The answers for today's work will be included in tomorrow's page of home learning so don't forget to check how you have done tomorrow morning

Mrs McCullough

INVESTIGATIVE MATHS

Just a reminder that when we work on maths investigations I am not so much concerned with how far you get with a problem, I am more interested in your thinking skills and how you approach your work. Remember to use thought bubbles to record your thinking as you go. You should not spend more than an hour on this task and I do not expect everyone to have finished in that time, some of you may only get the first few questions done. Think about how you record your work – you may find coloured pencils or fineliners useful to distinguish the different shapes.

Part A

Draw a 4 quadrant coordinate grid (From -6 to 6 on both the x and y axis.)

Each of the sets of coordinates below give three vertices (corners) of a quadrilateral. Plot the points and then work out where the 4th point should be to make the shape name given.

Remember coordinate points are organised (x,y) so you need to go ALONG the corridor then UP/DOWN the stairs when you plot the points and watch out for the minus numbered points!

Plot the point on the grid, complete the shape and write down the missing coordinate. Remember to think about the properties of shapes which we have been learning (look them up if you are not sure). I suggest you use a different colour to draw each shape.

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|-----------------------|--------------------------|
| 1. SQUARE | (0,4), (-3,5), (-4,2) |
| 2. ARROWHEAD | (-1,-4), (5,-2), (3,-4) |
| 3. PARALLELOGRAM | (-6,-3), (-4,-1), (1,-1) |
| 4. ISOCELES TRAPEZIUM | (4,0), (4,6), (1,4) |

Part B

Now it gets a bit more challenging....

Each of the sets of coordinates below give two vertices (corners) of a triangle. Plot the points and then work out where the 3rd point could be to make the shape name given. In Part A there was only one place the last point could be but this time you will see that there are lots of different possible solutions for the final point. To start with choose just one point.

You will probably need to use a new coordinate grid for each of these questions.

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|----|--------------------------------|--------------------|
| 5. | RIGHT-ANGLED TRIANGLE | $(-5,-2), (-1,-4)$ |
| 6. | ISOCELES TRIANGLE | $(3,5), (2,1)$ |
| 7. | ISOCELES TRIANGLE | $(2,-1), (2,-5)$ |
| 8. | RIGHT-ANGLED ISOCELES TRIANGLE | $(-3,1), (0,4)$ |

PART C (EXTENSION)

I am very interested in all the different possible points for each of the triangles above. Plot all the ones you can think of on the coordinate grid and describe what you notice. Have a think about how you could describe them in a general way. Can you do this using algebra?

ENGLISH – READING COMPREHENSION

Read the text MAYDAY, MAYDAY which you can find below then answer the questions set out on the following page.

MAYDAY MAYDAY

The waters that had rocked us gently to sleep the night before, and had been so still when we had woken the following morning, now began to breathe heavier, deeper. As nightfall crept forward, the winds began to press hard against us. Dark, ominous clouds rolled in, black stallions galloping across the waves to pastures new.

Helpless, cold and huddled together in the belly of the boat, we begged the storm to leave us alone. But she would not listen to our cries for mercy.

Instead, she mocked us. The salty sea air engulfed our nostrils as she rattled the cupboard doors. Cups and plates chattered inside. The boat's sail danced wildly somewhere on deck and the mast and the rigging creaked and groaned high above us.

Suddenly, the boat lurched to starboard and the table we were hiding under made its bid to escape the giant's rage.

"Mayday, mayday, this is Roger Hemmingway of The Calypso Princess, is there anybody out there? I repeat, this is Roger Hemmingway of The Calypso Princess, calling for *immediate* assistance".

I shot forward, my head spinning, icy beads of sweat trickling down my forehead.

It had been three days since the storm.

Three days of not knowing whether Alexandra was alive or dead.

Three days of this nightmare playing itself over and over again in my mind's eye.

Three days of watching helplessly as the idea of being rescued sank into the watery depths.

All I could do now was to fight: fight to stay alive and fight not to let go of the one precious thing I had left...hope.

I looked out to the horizon beyond and prayed.

Answer the following questions in sentences. Where you can, try to use evidence from the text to explain just like we have been practicing in class.

1. This type of narrative is known as a flashback. Writers often use a dream of some kind to revisit past events when telling a story. As such, there are two parts to this narrative, one set in the past and one in the present. Draw a line to show where the narrative switches from flashback to the present. (Clue: the narrator wakes up suddenly at this point)
2. Do you think they slept well the night before the storm hit them?
3. How does the writer describe the clouds and what does this suggest about the storm itself?
4. Why do you think they are huddled together under the table?
5. Highlight paragraph 6. Where do you think the writer is at this point?
6. In paragraph 10 the writer describes himself as "watching helplessly". What he is watching or looking for and why does he describe his actions as helpless?
7. Why do you think he prays at the end of the passage and what effect does this have on the reader?
8. Highlight the word "ominous". Is this a positive or negative word and what do you think it means?
9. Highlight the phrase "The salty air engulfed our nostrils". What impression does this give the reader about the situation?
10. Highlight the word "lurched". Think of three alternative words which could be used here.
11. Highlight the word written in italics. Why has the writer chosen to write this word differently? What effect would this have on the reader?
12. What is the name of the boat? What does the name suggest about the size of the boat, what other evidence is there in the text which backs up your answer?