



Birchfield
PRIMARY SCHOOL

Year 3 Curriculum Overview
Term 2.2

Teaching Team:

Miss Rose, Mr Taylor, Miss Coughlan
Teaching Assistant: Miss Brown
SLT: Mr Aldred

PE Days:

Tuesday and Wednesday

Homework:

A single piece of homework to support the weeks learning will be sent home on a **Tuesday**. This will be grammar or mental maths related.

Weekly homework will be sent out on a Friday and should be **returned by Wednesday** of the following week.

Children may also be provided with additional projects to complete during half term holidays.

Reading books will be changed weekly and should be signed by an adult and a comment made by an appropriate adult or the child themselves.

Please see below an overview of the main themes, knowledge and skills we will be covering this half term.

Enquiry Question	What is that noise under the ground?
Significant people	Maurice and Katia Krafft (School Values) Danial Azahan (Science) Mary Anning (History)
Significant places	Pompeii (History)
Class Text	The Firework Maker's Daughter
Reading	In Reading this half term we will be using our book, 'The Firework Maker's daughter' to develop our inference skills. We will be focussing on making inferences from the text, using evidence from the text and our prior knowledge. We will also be looking at making comparisons within a text. This will involve comparing characters throughout the story. As well as comparing the characters from 'The Firework Maker's daughter' to other well-known characters.
Writing	In Writing this half term, we will be looking at and writing our own newspaper articles based on events in the book 'The Firework Maker's Daughter.' We also be writing our own narratives based on the book.
Maths	In Maths this half term we will mainly be focussing on multiplication and division as well as length and perimeter. Children will continue to recall their timetables and will learn skills including formal and informal methods, units of measure and estimating. They will be comparing measurements (millimetres, centimetres and metres) and learning about perimeters and how to calculate these.
Science	The focus for Science during this half term will be plants. Including the anatomy of different plants, pollination and seeds and seed dispersal.
Geography	In Geography, children will learn about earthquakes and tsunamis and we will be making and labelling model volcanoes.
DT	In DT this half term, children be introduced to a range of mechanisms in order to make a model that moves.
Music	In Music this half term children will be continuing with learning the recorder and revisiting the different notes and learning new songs.
Computing	In Computing, children will begin to construct a branching database.
PSHE	In PSHE children will be focussing on the key question 'What makes a community?' They will learn about a variety of communities and how a sense of belonging is created.
RE	In RE this half term children will focus on the two key themes 'Remembering Roots' and 'Being Loyal and Steadfast' and how different religions complement these dispositions.
PE	In PE this half term children will be learning about dance and dodgeball.

Book Knowledge Organiser - Firework Maker's Daughter by Philip Pullman

Important Information

Plot

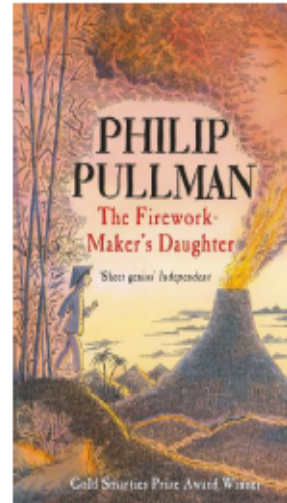
The book tells the story of Lila disagreeing with her father and making the journey to get Royal Sulphur from Razvani the Fire Fiend at Mount Merapi, as all aspirant firework-makers must do.

Themes

Talent, courage, **resilience**, good fortune, **determination** and **ambition**

Setting

The Firework Makers Daughter is set in Indonesia.



Characters

Lila	The daughter of Lalchand and the main character. She has big dreams of becoming a firework maker.
Lalchand	Lila's father, the firework maker. He believes this is an unsuitable job for girls.
Hamlet	A talking white elephant.
Chulak	The white elephant's carer and Lila's best friend.
Razvani	A fire-fiend who lives in the heart of a volcano.
Rambashi	Leader of pirates, Chulak's uncle and lead singer of <i>Rambashi's Melody Boys</i> .
The King	The ruler and owner of the white elephant.
Dr Puffenflask	A German firework maker.
Signor Scorcini	An Italian firework maker.
Colonel Sam Sparkington	An American firework maker.

Name of Book:

Firework Makers Daughter

First Published: 1995

Author: Philip Pullman

Genre: Children's Literature/ Fantasy

Link to Enquiry

The plot of the book leads Lila to Razvani, a great fire fiend who resides in Mt. Merapi (a fictional volcano) in Indonesia

Key Questions/Reflection Points

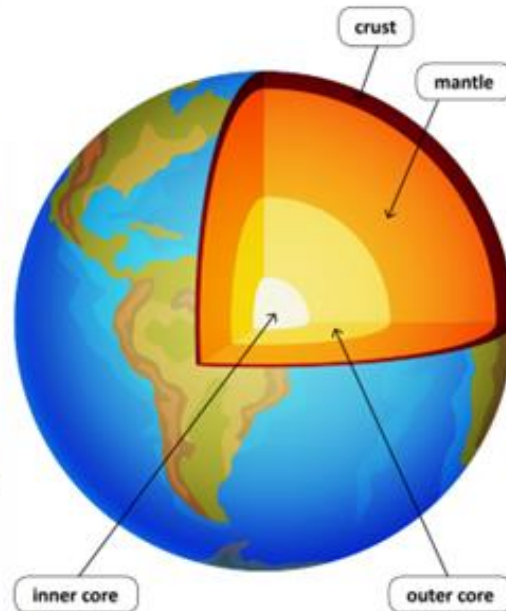
- How does Lila feel before she embarks on her mission?
- Does Lila believe she could be a firework maker like her father?
- What might have happened if Lila had given up?
- Select descriptive language you like within the story.
- Describe Lila's personality. Explain your reasoning.
- Describe the emotions Lalchand feels throughout the story - Emotion graph.

Key Vocabulary

scrupulous	Something that is done very carefully and with attention to detail.
pyrotechnics	A firework display.
scarcely	Almost never.
swathed	Wrapped in several layers of fabric.
gesticulating	To use dramatic hand gestures.
palanquin	A covered carriage usually carried by four or six servants.
disconsolately	Feeling very unhappy and unable to be cheered up.
sonorous	A deep and loud sound.
Stetson	A cowboy hat.
solemn	Not cheerful or smiling. Very serious.
sarong	A long piece of cloth wrapped around the waist.
procession	A group of people moving in an orderly fashion, especially as part of a ceremony.

Structure of the Earth

Earth is made up of four layers. These are the crust, mantle, outer core and inner core. The crust is a thin layer of rock on the surface that is broken into large pieces called tectonic plates. The mantle is made up of molten and semi-molten rock called magma. The outer core is a liquid layer of metal. The inner core is solid metal, and the hottest part of the Earth.



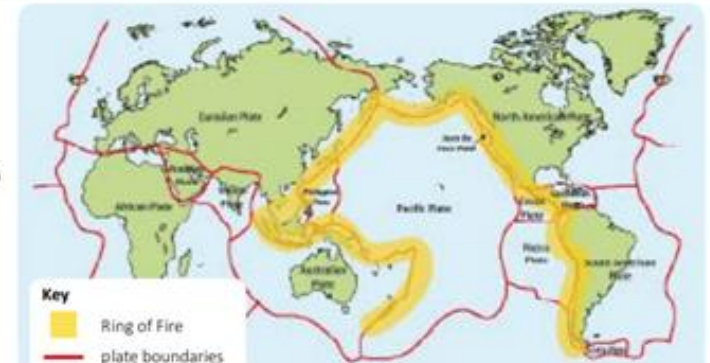
Volcanoes

Volcanoes are mountains or hills with vents at the top through which lava, gases and ash erupt. There are four different types of volcano. These are shield, stratovolcano, cinder cone and lava dome. Volcanoes are classed as active, dormant or extinct. Active volcanoes are likely to erupt again. Dormant volcanoes might erupt again in the future. Extinct volcanoes will not erupt again.



Plate Tectonics

The tectonic plates that make up the Earth's crust float on top of the mantle and are constantly moving. The places where tectonic plates meet are called plate boundaries. Tectonic plates can push together, pull apart or slide against each other. This movement at the plate boundaries can cause volcanic eruptions, earthquakes and tsunamis.



What is that noise under the ground? Year 3 Spring Term 2.1

Mary Anning

Mary Anning (1799-1847) was an English fossil collector. She lived in Lyme Regis in Dorset, in an area now known as the Jurassic Coast. Mary had little formal education but was taught fossil hunting by her father. She made many important fossil discoveries during her lifetime, including an Ichthyosaur fossil in 1811 and a fossilised Plesiosaur in 1823.



fossilised Plesiosaur skeleton



Mount Vesuvius

Glossary

Erode - Be gradually worn away.

Impermeable - Not allowing water to pass through. Also described as waterproof.

Lava - Hot, molten rock that comes out of a volcano.

Liquid - A material that is runny, can be poured easily and takes the shape of its container.

Magma - Hot molten rock found in the Earth's mantle.

Molten - Metal or rock that is in a liquid state because of great heat.

Organic matter - Dead and decaying plants and animals.

Ring of Fire - Area around the Pacific Ocean where many earthquakes and volcanic eruptions occur.

Tectonic plate - A large, slow-moving piece of rock that makes up the Earth's crust.

Vent - An opening in the Earth's crust through which lava escapes.

Volcanic eruption - The sudden and violent explosion of lava, gas, ash and rock out of a volcano.

Key Vocabulary

Force - the things that allow the movement of all objects around us.

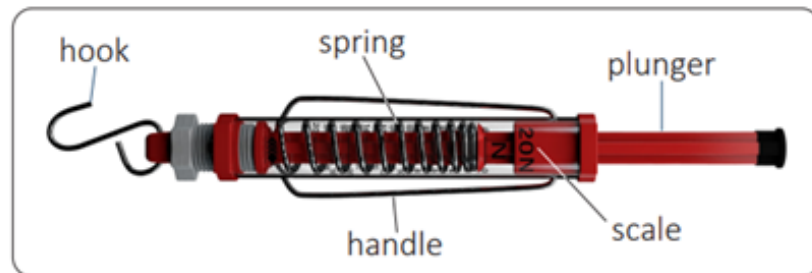
Force meter - is a device that can measure the force of an object.

Attraction - When one object moves towards another object.

Magnetic - a metal object or material that are able to attract objects or materials containing iron or steel

Force Meters

A force meter is a piece of scientific equipment that measures force. It can also be called a newton meter or a spring balance. Forces are measured in newtons (N). A force meter has a handle, hook, plunger, spring and scale.



What is a force?

A force is simply a push or a pull that makes something move. Forces act in pairs that oppose each other. Forces cause objects to move, change their speed or change their shape.



Contact Forces

Contact forces happen when two objects or bodies physically touch each other. Frictional forces are a type of contact force.



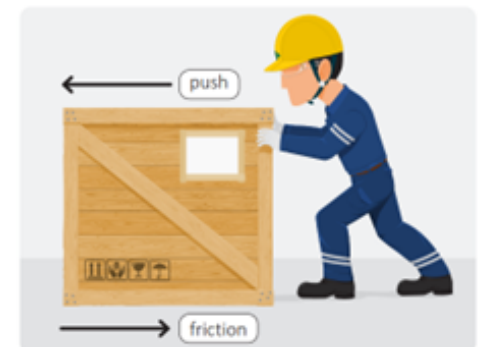
foot pushes ball



hand pulls fishing rod

Frictional Forces

Friction is a force between two surfaces as they move across each other. Friction acts in the opposite direction to the movement. Friction always slows down a moving object. It also produces heat.



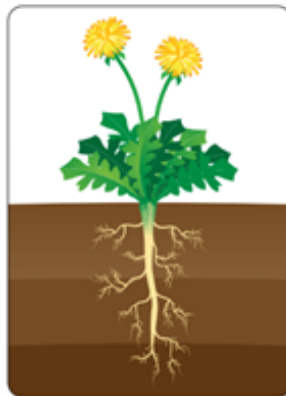
Roots

Roots have two main functions. They anchor the plant securely in the ground and take in water and nutrients from the growing medium, such as soil.

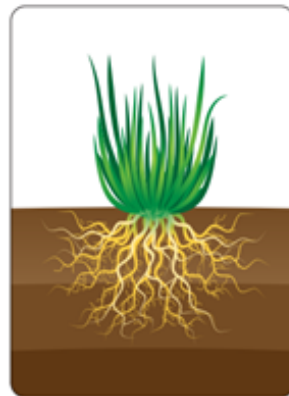
There are two main types of root systems: taproots and fibrous roots.

A taproot system has a large primary root that grows deep into the soil to anchor the plant. Some taproots are edible, such as carrots and beetroots.

A fibrous root system has many thin roots that grow out from the stem and anchor the plant just under the soil's surface. Fibrous roots spread far from the plant to reach water and nutrients.



taproot



fibrous roots

Glossary

Pollinator - An animal that transfers pollen for the process of pollination

Vessel - A tube that transports liquids.

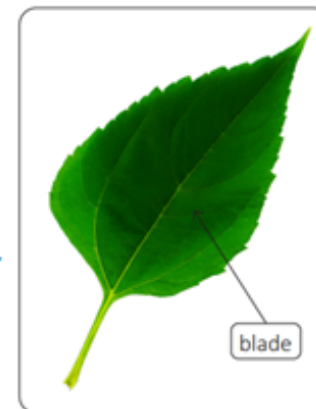
Stems

Stems have two main functions. They transport water, nutrients and food around the plant and they support the leaves and flowers. Stems transport water, nutrients and food around the plant through vessels called xylem and phloem. Xylem transport water and nutrients from the roots to the leaves. Phloem transport food made in the leaves to the rest of the plant. A stem also supports the flowers to attract pollinators and the leaves so they can capture sunlight.



Leaves

Leaves have two main functions. They make food for the plant through a process called photosynthesis. They also lose water from their underside in a process called transpiration. The structure of leaves allows them to carry out these functions. The blade captures sunlight, and the stalk and veins transport water into and out of the leaf.



blade



vein

stalk

Written Multiplication Methods - No Regrouping

Tens	Ones

$23 \times 3 = 69$

	T	O
	2	3
x		3
	6	9

Written Multiplication Methods - With Regrouping

Tens	Ones

$24 \times 4 = 96$

	T	O
	2	4
x		4
	9	6
	1	

Written Division Methods - No Regrouping

Tens	Ones

$84 \div 4 = 21$

	2	1
4	8	4

$84 \div 4$

$80 \div 4$ $4 \div 4$

Written Division Methods - With Regrouping

Tens	Ones

$45 \div 3 = 15$

	1	5
3	4	5

$45 \div 3$

$30 \div 3$ $15 \div 3$

Key Vocabulary

- metre (m)
- centimetre (cm)
- millimetre (mm)
- height
- length
- width
- perimeter
- further/furthest
- higher/highest
- longer/longest
- shorter/shortest
- taller/tallest

Perimeter

5cm
2cm 2cm
5cm
 $5\text{cm} + 2\text{cm} + 5\text{cm} + 2\text{cm} = 14\text{cm}$

3cm
 $3\text{cm} + 3\text{cm} + 3\text{cm} + 3\text{cm} + 3\text{cm} = 15\text{cm}$

perimeter = 20cm
 $6\text{cm} + 6\text{cm} = 12\text{cm}$
 $20\text{cm} - 12\text{cm} = 8\text{cm}$
 $8\text{cm} \div 2 = 4\text{cm}$

..... = perimeter

Equivalent Length

100 centimetres = 1 metre

10 millimetres = 1 centimetre

$\div 10$ (mm to cm)
 $\times 10$ (cm to mm)
 $\div 100$ (cm to m)
 $\times 100$ (m to cm)

317cm	
300cm	17cm
3m	17cm
3m 17cm	

Compare Lengths

$6\text{mm} < 6\text{cm}$
 $6\text{cm} = 60\text{mm}$
 6mm is shorter than 6cm

$320\text{cm} > 2\text{m } 6\text{cm}$
 $320\text{cm} > 200\text{cm} + 60\text{cm}$
 320cm is longer than 2m 60cm

Measure Length

5mm 5cm

10mm = 1cm

4cm 6mm

28mm

Useful Links:

Reading:

[Oxford Owl for School and Home](#)

[Reading and comprehension - English - Learning with BBC Bitesize - BBC Bitesize](#)

[Books for Year 3 children aged 7-8 | School Reading List](#)

Phonics:

[Letters and Sounds, English Games for 5-7 Years - Topmarks](#)

[PhonicsPlay](#)

[Phase 2 Games – Letters and Sounds \(letters-and-sounds.com\)](#)

Writing:

[Year 3 English - BBC Bitesize](#)

[Writing in Year 3 \(age 7–8\) - Oxford Owl for Home](#)

[Spelling and Grammar, English Games for 7-11 Years - Topmarks](#)

Maths:

[Year 3 Maths Curriculum Toolkit | 7 & 8 Year Olds | Home Learning \(thirdspacelearning.com\)](#)

[YEAR 3 MATHS - Topmarks Search](#)

[IXL - Year 3 maths practice](#)

Science:

[Forces – Year 3-4 / P4-5 Science Collection - Home Learning with BBC Bitesize - BBC Bitesize](#)

[Plants - Year 3/4 - P4/5 - Science Collection - Home Learning with BBC Bitesize - BBC Bitesize](#)

[Home | WowScience - Science games and activities for kids](#)

History/Geography:

[Explore volcanoes - BBC Bitesize](#)

[Who was the fossil hunter Mary Anning? - BBC Bitesize](#)

[The Lost City of Pompeii \(nationalgeographic.com\)](#)

Computing:

[Is my child safe online? Parent's questions answered | Barnardo's \(barnardos.org.uk\)](#)

[Parents and Carers - UK Safer Internet Centre](#)

[Parental Controls & Privacy Settings Guides | Internet Matters](#)

PSHE:

[Talk PANTS & Join Pantosaurus - The Underwear Rule | NSPCC](#)

[How to make an emergency 999 call – West Midlands Ambulance Service University NHS Foundation Trust \(wmas.nhs.uk\)](#)

PE:

[Nutrition Based Physical Activity Games - Action for Healthy Kids](#)

[Kids Active Learning & PE at Home – Think Active](#)