CAYTON SCHOOL

MEDIUM TERM CURRICULUM PLAN
YEAR 2 - AUTUMN 2

Learn from yesterday, seek today and aim for tomorrow

September 2021

Science Driver: Materials

Key Enquiry: How would traction have been used to build our school?

Science Driver

Working Scientifically

❑ Ask questions such as:
  • Why do some trees lose their leaves in Autumn and others do not?
  • How long are roots of tall trees?
  • Why do some animals have underground habitats?

❑ Use equipment such as thermometers and rain gauges to help observe changes to local environment as the year progresses
❑ Use microscopes to find out more about small creatures and plants
❑ Know how to set up a fair test and do so when finding out about how seeds grow best
❑ Classify or group things according to a given criteria, e.g. deciduous and coniferous trees
❑ Draw conclusions from fair tests and explain what has been found out
❑ Use measures (within Year 2 mathematical limits) to help find out more about the investigations they are engaged with

What I need the children to learn	Possible learning experiences
Everyday Materials	
Identify different materials *Name everyday materials* *Properties of materials* *Compare the use of different materials* *Compare movement on different surfaces*	
• Know how materials can be changed by squashing, bending, twisting and stretching • Know why a material might or might not be used for a specific job	***Look at a range of materials – metal spoon, wooden scrubbing brush, string, plastic dolls, linked to the story characters in Traction man to identify materials and begin to use vocabulary about their properties.*** **Scientific enquiry to make boats out of playdoh that will float. This will address the misconception that heavy things sink and light things float as we think about metal ships. Also how materials are changed by squashing, bending, twisting and stretching when using playdoh compared to how we could form metal.**

Computing

What I need the children to learn	Possible learning experiences
Algorithms	
Pupils should be taught to understand what algorithms are; how they are implemented as programs on digital devices; and that programs execute by following precise and unambiguous instructions	
• understand that algorithms are used on digital devices	*iAlgorithms (Y1/Y2) Recap on Y1 work. 5 sessions combined* *iProgram (Y2) 2.2.1 – 2.2.3 3 sessions*
Reasoning	
Pupils should be taught to use logical reasoning to predict the behaviour of simple programs	
• predict what the outcome of a simple program will be (logical reasoning).	*Cover within iProgram* *Children to use beebots for coding and code.org Minecraft games to set codes of instructions to complete tasks.*

Geography

What I need the children to learn		Possible learning experiences
Locational Knowledge		
Name, locate and identify characteristics of the four countries and capital cities of the United Kingdom and its surrounding seas	*Name and locate the world's seven continents and five oceans*	
• Know the names of and locate the seven continents of the world • Know the names of and locate the five oceans of the world • Know the name of and locate the four capital cities of England, Wales, Scotland and Northern Ireland		*Map work of the UK linked to Beebot work.*

Physical Education – Follow Real P.E. and supplement with NC P.E. experiences

What I need the children to learn	Possible learning experiences
Gymnastic Movements	
Developing balance, agility and co-ordination, and begin to apply these in a range of activities	
• plan and perform a sequence of movements • improve sequence based on feedback think of more than one way to create a sequence which follows some 'rules'	
Basic movements and Team Games	
Master basic movements including running, jumping, throwing and catching, as well as participate in team games, developing simple tactics for attacking and defending	
• use hitting, kicking and/or rolling in a game • decide the best space to be in during a game • use a tactic in a game follow rules	
Dance	***X2 Weeks***
Perform dances using simple movement patterns	
• change rhythm, speed, level and direction in dance • make a sequence by linking sections together use dance to show a mood or feeling	***Group dance sequences to the count of 4 Links to Real PE unit 2***
Real P.E.	
Unit 2 Social • I can help praise and encourage others in their learning.	
Nigel Carson Sessions	

Music

What I need the children to learn	Possible learning experiences
Singing	
Pupils should be taught to use their voices expressively and creatively by singing songs and speaking chants and rhymes	
• make different sounds with voice and with instruments • follow instructions about when to play and sing	**Nativity songs (unable due to covid)**
Create own music	
Pupils should be taught to experiment with, create, select and combine sounds using the inter-related dimensions of music	
• order sounds to create a beginning, middle and an end • create music in response to different starting points	**Covered in Autumn 1**

Design Technology

What I need the children to learn	Possible learning experiences
Designing	
Design - purposeful, functional, appealing products for themselves and other users based on design criteria *Design - generate, develop, model and communicate their ideas through talking, drawing, templates, mock-ups and, where appropriate, information and communication technology*	
• think of an idea and plan what to do next • explain why they have chosen specific textiles	***Plan a design for a moving vehicle, think about properties of materials each part of the car would need eg transparency for windows, rigid axle and chassis, soft chairs for comfort, textured rubber tyres for grip or smooth if designing a racing car (discuss traction/friction)***
Making	
Select from and use a range of tools and equipment to perform practical tasks [for example, cutting, shaping, joining and finishing] *Select from and use a wide range of materials and components, including construction materials, textiles and ingredients, according to their characteristics*	
• choose tools and materials and explain why they have chosen them • join materials and components in different ways • measure materials to use in a model or structure	***Children to be shown how to use a ruler, bench hook and junior hacksaw safely and accurately to cut the correct length for their axles on their moving vehicles and to join onto the body of the vehicle using a glue gun.*** ***Children to select different materials to add to their vehicles thinking about the properties needed.***
Evaluating	
Explore and evaluate a range of existing products *Evaluate their ideas and products against design criteria*	**Evaluate their designs after looking at everyone's finished products.**
• explain what went well with their work	***Evaluate best material for purpose***
Technical Knowledge	
Build structures, exploring how they can be made stronger, stiffer and more stable *Explore and use mechanisms [for example, levers, sliders, wheels and axles], in their products.*	
• make a model stronger and more stable • use wheels and axles, when appropriate to do so	**As above**

PSHE

What I need the children to learn	Possible learning experiences
Celebrating Difference	**Resource links from: Jigsaw**
• Know there are stereotypes about boys and girls • Know that it is OK not to conform to gender stereotypes • Know it is good to be yourself • Know that sometimes people get bullied because of difference • Know the difference between right and wrong and the role that choice has to play in this • Know that friends can be different and still be friends • Know where to get help if being bullied • Know the difference between a one-off incident and bullying	In this Puzzle (unit) the class talk about gender stereotypes, that boys and girls can have differences and similarities and that is OK. They talk about children being bullied because they are different, that this shouldn't happen and how to support a classmate who is being bullied. The children talk about feelings associated with bullying and how and where to get help. They talk about similarities and differences and that it is OK for friends to have differences without it affecting their friendship.

https://jigsawlivestcmsuk.blob.core.windows.net/umbraco-media/l5fjlywi/03-ages-6-7-jigsaw-skills-and-knowledge-progression-for-parents.pdf

Religious Education

What I need the children to learn	Possible learning experiences
L1.6	
• How and why do we celebrate special and sacred times? (Different festival focus)	*Learn about the significance of festivals and celebrations across different faiths.* *Compare Diwali and Christianity particularly light and what it represents.* *Make Christingles*

Cayton Creation

Afternoon making superhero themed crafts (following the theme of Traction Man) linked to shape and role playing with masks and puppets.

Cayton Conclusion

Make paper rockets (using different designs and different materials added) to see which rocket flies the furthest on the playground from the rocket launch pad.

English

What I need the children to learn	Possible learning experiences
Can I write about real events?	Can I write a recount of my holiday?
Can I compare fiction and non-fiction texts?	Introduce some superhero fiction books including Traction Man and non-fiction books about materials (links to science driver).
Can I learn about features in fiction texts including characters and settings?	Introduce Traction Man story and write descriptive sentences about the characters and settings.
Can I use possessive apostrophes?	Write sentences about Traction Man story scenes set up around the classroom using possessive apostrophes.
Can I verbalise my ideas for writing sentences?	Can I role play out different mini-stories by making my inanimate objects become characters?
Can I begin to use the conjunction 'because'?	Children to design, make and write Christmas cards to family.
Can I write for different purposes with an awareness of an increased amount of fiction structures?	Children to write their own super-hero story thinking about characters, setting , problems, resolutions and description for effect.
Can I plan what I am going to write about, including writing down ideas and/or key words and new vocabulary?	
Can I learn what contraction words are and spell more words with contracted forms, e.g. can't, didn't, hasn't, couldn't, it's, I'll?	Can I write speech bubbles for what each character might say next in our story Traction Man using contracted words?
Can I begin to use inverted commas for speech very simply?	Can I look at a good example of a letter to Santa and highlight some writing features?
Can I continue to use full stops, capital letters, commas in a list, adjectives and question marks in letter writing.	Can I write a letter to Santa?

Mathematics

What I need the children to learn	Possible learning experiences
Subtract a 2-digit number from a 2-digit number – not crossing ten	
Subtract a 2-digit number from a 2-digit number – crossing ten – subtract ones and	
Find and make number bonds	
Bonds to 100 (tens and ones)	
Add three 1-digit numbers	
Recognising coins and notes	
Count money – pence	
Count money – pounds (notes and coins)	
Count money – notes and coins	
Select money	
Make the same amount	
Compare money	
Find the total	
Find the difference	
Find change	
Two-step problems	
Recognise 2-D and 3-D shapes	
Count sides on 2-D shapes	
Count vertices on 2-D shapes	
Draw 2-D shapes	
Lines of symmetry	
Sort 2-D shapes	
Make patterns with 2-D shapes	
Count faces on 3-D shapes	
Count edges on 3-D shapes	
Count vertices on 3-D shapes	
Sort 3-D shapes	
Make patterns with 3-D shapes	

Year 2 Materials Knowledge Mat