2023
P6 Science Curriculum Information

Curriculum

Themes and Topics Covered in P6

Theme	Topic
Energy	• Forms and Uses of Energy • Sources of Energy • Energy Conversion
Interaction	• Forces • Types of Forces • Living Together • Characteristics of the Environment/Factors affecting the environment • Food Chains and Food Webs • Adaptation for Survival • Man's Impact on the Environment

Pedagogy

Teaching Strategies

- **Inquiry-Based Learning approach (IBL)** incorporating **Differentiated Instructions (DI)**
- **L.A.S.E.R.** program
- **Teaching Resources** from Internet, PowerPoint slides, Science-based videos and Science Simulations.
- **Hands-On Experience**
  - ✓ Laboratory Experiments
  - ✓ Outdoor experiential learning experiences
- **Learning Journey**
  (Subject to COVID-19 SMM)

Inquiry-Based Learning

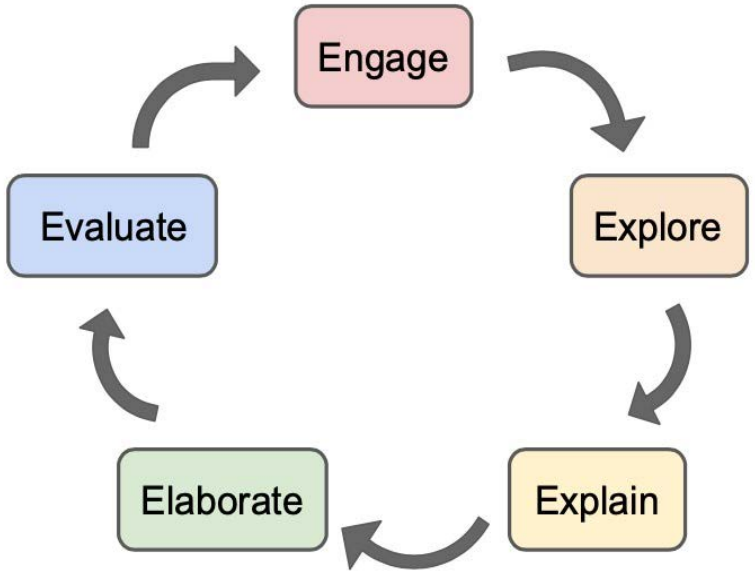


Figure 1: 5Es in Inquiry-Based Learning

Inquiry-Based Learning (IBL) approach is adopted in the learning of Science. The process of **inquiry** is facilitated by teachers who would help students make connections and build their understanding of Science concepts using the 5Es – Engage, Explore, Explain, Elaborate and Evaluate.

L.A.S.E.R. Program

- **L.A.S.E.R** stands for **Learners' Assembly for Science Examination Requirements**
- **Progressively equips** students with strategies and techniques to handle examination questions **from P3 to P6**
- **Exposes** students to different question types and problem stimuli.
- **Empowers** students with necessary skills and knowledge to understand and answer examination questions proficiently.
- **L.A.S.E.R.** worksheets would complement the PowerPoint teaching slides used in the classroom .

Materials used:

- My Pals Are Here Textbooks & Activity books
- Topical Science Notes
- Topical Worksheets
- L.A.S.E.R. Worksheets
- PSLE Booklet (2020 - 2022)
- Practice Papers (Past SA1/Prelims from TNS and other schools)

Assessment

Assessment Objectives of Science PSLE

The PSLE Science Paper assesses students' attainment in Science with respect to the aims of Primary Science Education as stated in [the 2014 Science Syllabus]

The assessment objectives are as follows:

I. Knowledge with Understanding

Students should be able to demonstrate knowledge and understanding of scientific facts, concepts and principles.

II. Application of Knowledge and Process Skills

Students should be able to

a. apply scientific facts, concepts and principles to new situations.

b. interpret information (including pictorial, tabular and graphical) and investigate using one or a combination of the following process skills:

- Inferring
- Predicting
- Analysing
- Evaluating
- Generating possibilities
- Formulating hypothesis
- Communicating

Prelim/PSLE Examination Format (Standard Science)

Booklet	Item Type	Number of questions	Number of marks per question	Marks
A	Multiple-choice	28	2	56
B	Open-ended	12 - 13	2 - 5	44

Duration of paper : 1 hour 45 minutes.

Prelim/PSLE Examination Format (Foundation Science)

Booklet	Item Type	Number of questions	Number of marks per question	Marks
A	Multiple-choice	18	2	36
B	Structured	6 - 7	2 - 3	14
	Open-ended	5 - 6	2 - 4	20

Duration of paper : 1 hour 15 minutes.

Provision of Word List

The Foundation Science paper focuses on assessing students' grasp of basic scientific knowledge. **A word list is provided during the examination to allow students to display their knowledge and understanding without being unduly disadvantaged by their weakness in the English language**. It should be appreciated that the list is not exhaustive.

Table of specifications for PSLE Standard Science/Foundation Science

Theme	Life Science	Physical Science	Weighting
Diversity	• Diversity of Living things P3	• Diversity of non-living things P3 • Diversity of materials P3	5-10%
Cycles	• Life cycles of plants & animals P4	• Cycles in matter P4 Cycles in water P5	20-25%
Systems	• Plant system P5 • Human system P5 • Cell system P5	• Electrical system P5	15-25%
Interactions	• Interaction within the environment P6	• Interaction of forces P3 (Magnetic force) and P6 (Gravitational force, Frictional force, Elastic Spring Force)	25-30%
Energy	• Energy forms & uses (Photosynthesis) P5	• Energy forms & uses P4 & P6 • Energy conversion P6	15-20%
Weighting	45-55%	45-55%	100%

2023 Assessment Overview

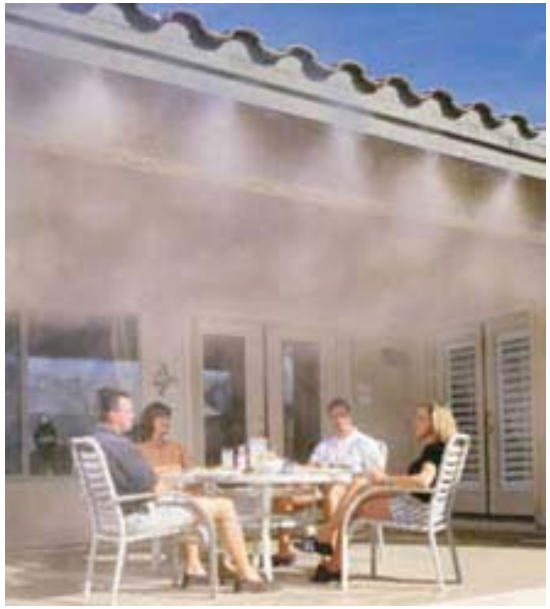
P6 Science	Term 2		Term 3	
	Common-timed Practice (0%)		Preliminary Examination (100%)	
Topics Tested	P3 to P6 topics (excluding man's impact on the environment)		P3 to P6 [All themes]	
Duration of paper	1 h 45 min		1 h 45 min	
Paper/Booklet	Booklet A	Booklet B	Booklet A	Booklet B
Type of Questions	MCQ	OE	MCQ	OE
No. of Questions	28	12-13	28	12-13
Marks per Question	2	2,3,4,5	2	2,3,4,5
Total for each section	56	44	56	44
Total marks for the paper	100		100	
Overall Weighting	0%		100%	

Home-School Partnership

Strategies to help your child

a) Help your child to be familiar with the concepts/facts of the topics taught.

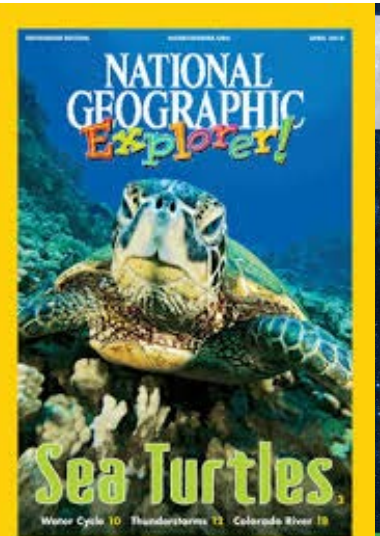
b) Point out real life scenarios for your child to apply his/her Science concept.

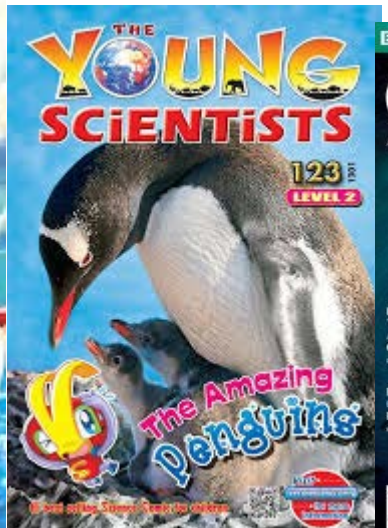


Strategies to help your child

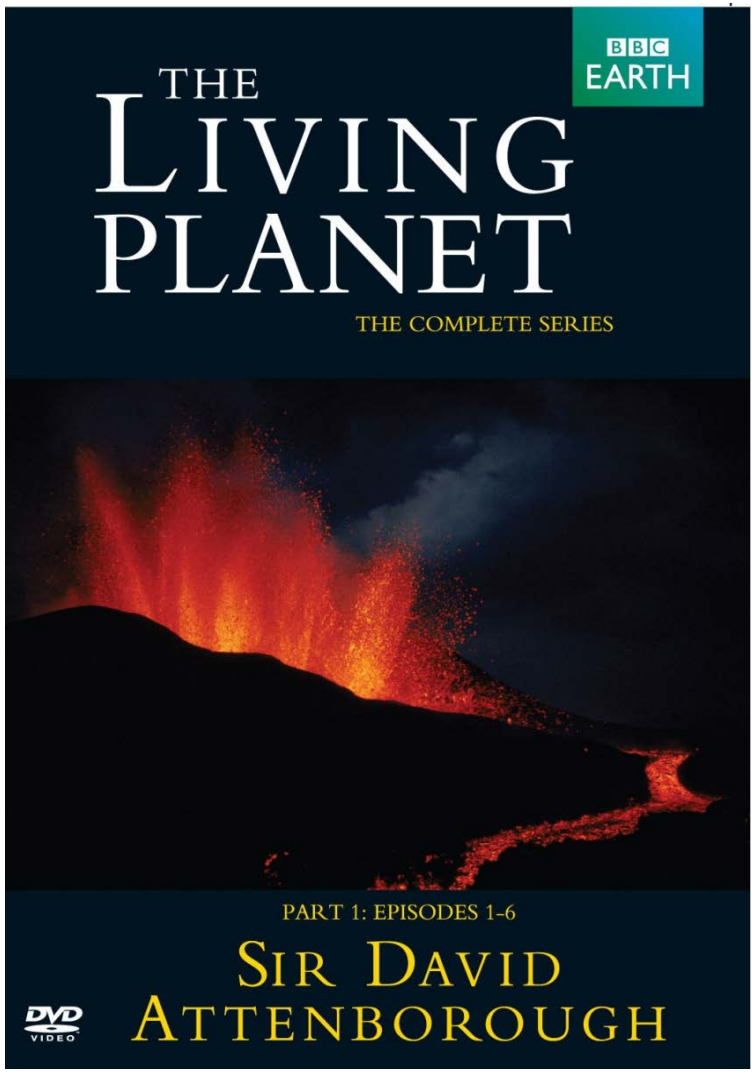
c) Ensure that all homework is carefully completed and submitted punctually.

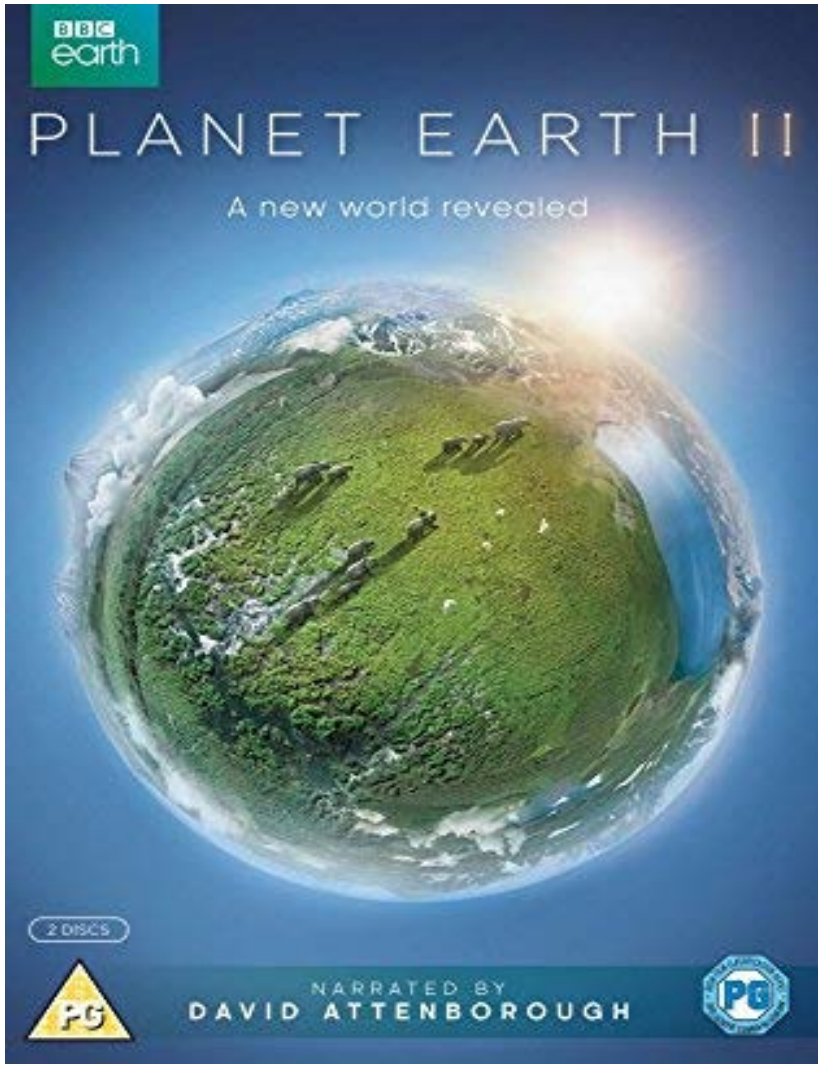
d) Encourage your child to read a wide variety of <u>Science-related reading materials</u>.





e) Encourage your child to watch Science documentaries. (Eg: Animal Planets, National Geographic channels, and other BBC videos)





Strategies to help your child

f) Revise P3 to P5 Science concepts.

g) Use concept maps or mind maps to organise notes.

h) Go through the work (Activity books/topical worksheets/Practice papers) marked by the teachers to learn from the mistakes made.


Thank you.