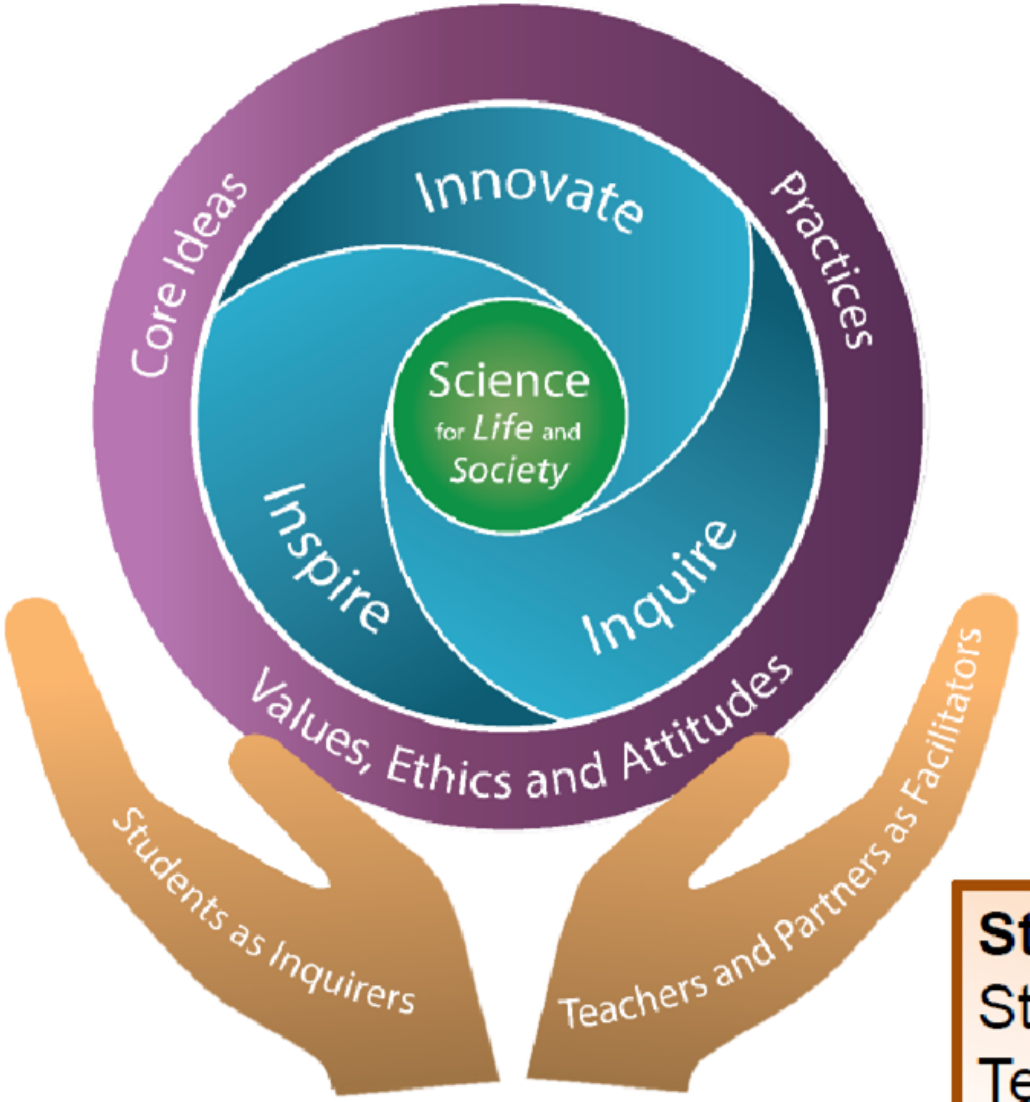
Curriculum Briefing 2024

Primary 4

REVISED SCIENCE CURRICULUM FRAMEWORK



Goals
Science for Life and Society

Vision - 3Ins
Inspire
Inquire
Innovate

Three Domains
Core Ideas
Practices
Values, Ethics and Attitudes

Stakeholders
Students as Inquirers
Teachers & Partners as Facilitators

GOALS OF SCIENCE EDUCATION
Science for Life and Society

Personal/Functional	Cultural/Civic	Professional/Economic
Possess scientific mind-sets and practical knowledge of science and its applications to make everyday decisions, solve problems, and improve one's life	Appreciate science as humanity's intellectual and cultural heritage, the beauty and power of its ideas, as well as participate in socio-scientific issues ethically and in an informed manner	Apply scientific knowledge and skills, as well as adopt scientific attitudes and mind-sets to innovate and push new frontiers

To enthuse and nurture all students to be scientifically literate

To provide strong science fundamentals for students to innovate and pursue STEM for future learning and work

Grounded in strong science fundamentals:
Scientific Knowledge, Practices and Values

Vision – encapsulates the overall experience of our students in Science education

Inspired by Science

Enjoys learning Science

Discovers how Science solves global challenges

Sees connections between everyday phenomena and Science

Inquire like scientists

Possesses the spirit of scientific inquiry

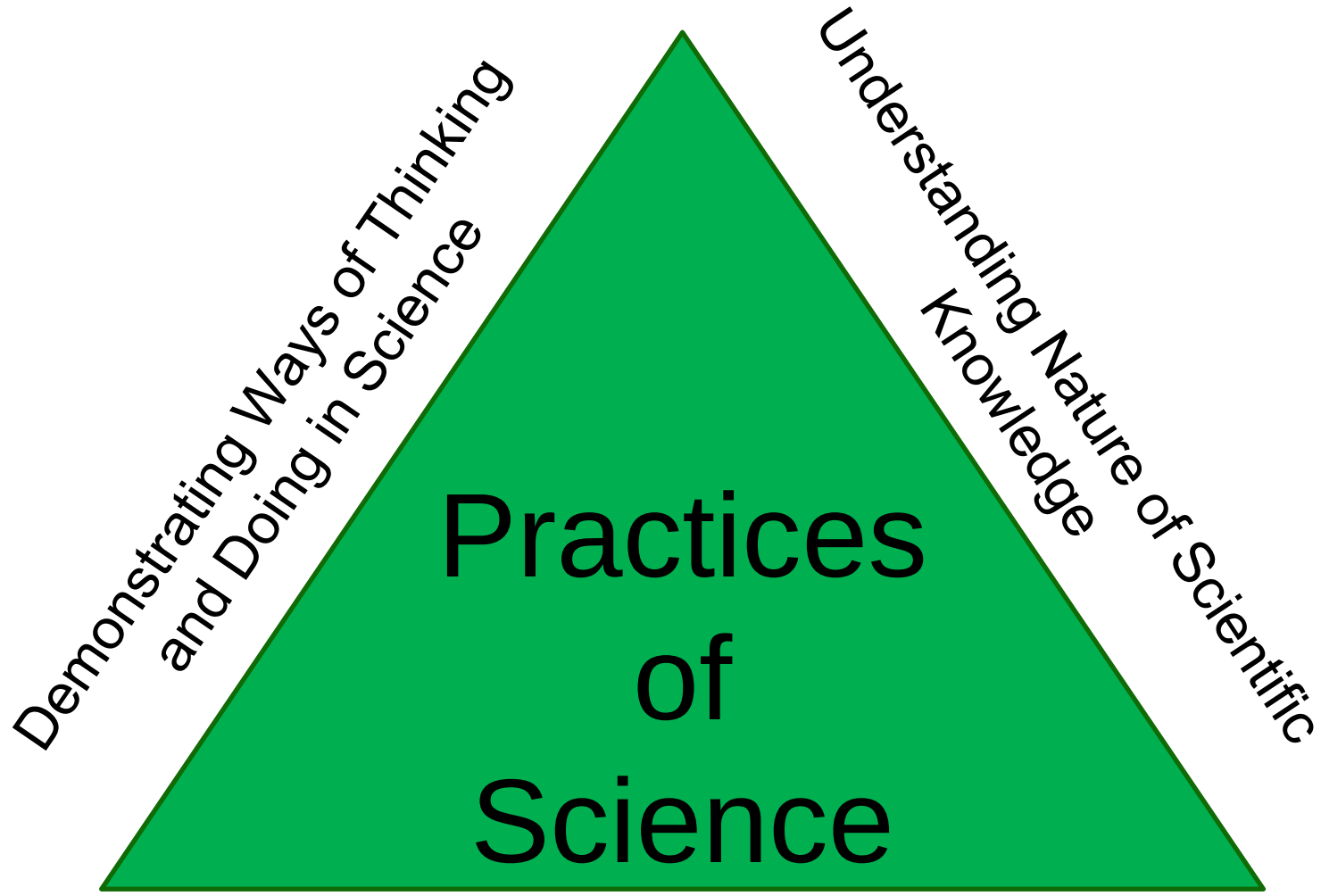
Engages confidently in the Practices of Science

Relates to the roles played by Science in daily life, society and the environment

Innovate using Science

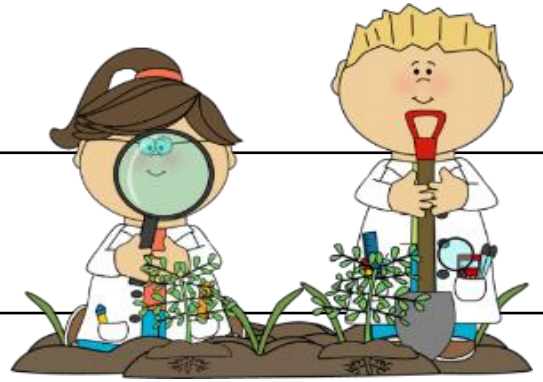
Applies Science to daily life experiences

Generates creative solutions to solve a wide range of real-world problems



Relating Science-Technology-Society-Environment

Demonstrating Ways of Thinking and Doing in Science

Investigating	Evaluating & Reasoning	Developing & Evaluating Solutions
Posing questions and defining problems	Communicating, evaluating and defending ideas with evidence	Using and developing models
Designing investigations	Making informed decisions and taking responsible actions	Constructing explanations and designing solutions
Conducting experiments and testing solutions		
Analysing and interpreting data		

Understanding Nature of Scientific Knowledge

- Science is an evidence-based, model-building enterprise to understand the real world
- Science assumes natural causes, order and consistency in natural systems
- Scientific knowledge is generated through established procedures and critical debate
- Scientific knowledge is reliable, durable, open to change with new evidence

Relating Science-Technology-Society-Environment

- There are risks and benefits associated with the applications of Science in society
- Applications of Science often have ethical, social, economic and environmental implications
- Application of new scientific discoveries often drive technological advancement while advances in technology enable scientists to make new or deeper inquiry

Values, Ethics & Attitudes: foster an awareness and appreciation of values to sensitise students to the ethical implications of the application of Science in society

Themes and Topics in P4

Themes	Topics
Systems	• Plant System • Human Systems
Cycles	• Matter
Energy	• Light • Shadows • Heat • Effects of Heat

Pedagogy


Cognitive PLAY
Physical PLAY
Object PLAY
Dramatic PLAY
ICT PLAY

Key Focus Programmes

- Makers infused lessons
- Environmental education
- School wide sustainability efforts

2024 Assessment Overview

P4	WA 1	WA 2	WA 3	EYE
Duration	25 min	25 min	25 min	1 h 45 min
Weighting	15 marks	15 marks	10 marks	100 marks
Type of questions	MCQ / Open-ended		Online Performance Task	MCQ / Open-ended



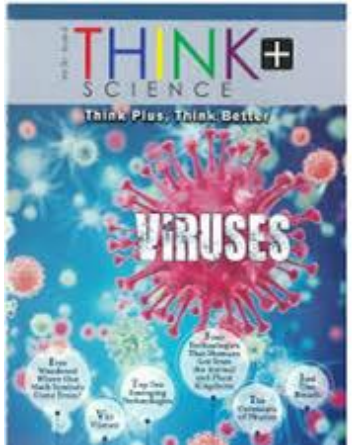
Other forms of assessments during daily lessons

How Parents Can Support Learning

- Observe Science everywhere and in everyday life
- Encourage your child to ask questions
- Lead family discussions on science-related topics
- Explore non-formal education sites as a family

  https://www.discoverymindblown.com/

  https://climatekids.nasa.gov/
- Monitor your child's work regularly
- Encourage thinking aloud and discuss solutions



Thank you