

G4 A Year		Unit 1
Learning will include the development of the following knowledge, concepts and skills		Learning outcomes Students will be able to:
<p>Transdisciplinary theme</p> <h1>1. Who we are</h1> <p>An inquiry into the nature of the self; beliefs and values; personal, physical, mental, social and spiritual health; human relationships including families, friends, communities, and cultures; rights and responsibilities; what it means to be human.</p> <p>Central idea - Classification of living things</p> <p>Learner Profile Attributes reflective, balanced</p> <p>Key concepts Reflection, causation, change</p> <p>Related concepts Diversity, adaptation</p> <p>Lines of inquiry</p> <ul style="list-style-type: none"> • Nature vs Nurture (culture) • Changes in animal behavior • Heredity and changes in genes 	<p>Transdisciplinary strands</p> <p>Science Living things</p> <p>Skills a. Observe carefully in order to gather data b. Interpret and evaluate data gathered in order to draw conclusions</p> <p>Social Studies Continuity and change through time</p> <p>Skills a. Use and analyze evidence from a variety of historical, geographical and societal sources b. Assess the accuracy, validity and possible bias of sources</p> <p>Language Phase 4 Visual language—Viewing & presenting Written language—Reading & Writing</p> <p>PSPE Phase 4 Identity</p> <p>Math Phase 4 Pattern and function</p> <p>Additional resources <i>Harry Potter and the Sorcerer’s Stone</i> <i>Howl’s Moving Castle</i> <i>Anne of Green Gables</i> RAZ Journeys:</p>	<p>Science</p> <ul style="list-style-type: none"> • Demonstrate living things have internal/external structures that function to support reproduction • Be able to distinguish which features are attributable to nature vs nurture & which can not be distinguished <p>Social Studies</p> <ul style="list-style-type: none"> • Interpret cultural beliefs or values using evidence provided by rituals, tradition & artifacts • Understand how experience & others’ opinions may influence individuals <p>Language</p> <ul style="list-style-type: none"> • Develop ideas & opinions through discussion • Confidently use a range of resources to find information or support their inquiries <p>PSPE Phase 4</p> <ul style="list-style-type: none"> • Examine the complexity of their own evolving identities • Motivate themselves intrinsically & behave with believe in themselves • Reflect on how they cope with change in order to approach & manage situation of adversity <p>Math Phase 4</p> <ul style="list-style-type: none"> • understand that patterns can be represented, analysed and generalized using tables, graphs, words, and, when possible, symbolic rules.

G4 A Year		
Learning will include the development of the following knowledge, concepts and skills		Learning outcomes Students will be able to:
<p>Transdisciplinary theme</p> <p>6. Where we are in place and time</p> <p>An inquiry into organization in place and time; personal histories; homes and journeys; the discoveries, explorations and migrations of humankind; the relationships between and the interconnectedness of individuals and civilizations, from local and global perspectives.</p> <p>Central idea The relationship between the universe and human beings.</p> <p>Learner Profile Attributes knowledgeable, thinker</p> <p>Key concepts Form, perspective, reflection</p> <p>Related concepts Continuity, progress, technology</p> <p>Lines of inquiry</p> <ul style="list-style-type: none"> • The effects of gravity and orbital motion • Gravity and its effects • How we track time 	<p>Transdisciplinary strands</p> <p><u>Social Studies</u> Continuity and change through time</p> <p>Skills a. Formulate and ask questions about the past, the future, places and society b. Use and analyze evidence from a variety of historical, geographical and societal sources c. Orientate in relation to place and time</p> <p><u>Science</u> Earth and Space</p> <p>Skills c. Use a variety of instruments and tools to measure data accurately h. Consider scientific models and applications of this models (including their limitations)</p> <p><u>Language Phase 4</u> Visual language—Viewing & presenting Written language—Reading & Writing</p> <p><u>PSPE Phase 4</u> Interactions</p> <p><u>Math Phase 4</u> Measurement</p> <p>Additional resources RAZ Journeys <i>The Hobbit</i> <i>Ender's Game</i> <i>The Phantom Tollbooth</i></p>	<p><u>Science</u></p> <ul style="list-style-type: none"> • Explain the scale of the solar system, galaxies, & the universe; • Examine how we know the universe is expanding & the future of the universe <p><u>Social Studies</u></p> <ul style="list-style-type: none"> • analyze information about past technological advances & societal systems (Greek mathematical models/ philosophies & their reception) • predict societal & technological changes in the future <p><u>Language</u></p> <ul style="list-style-type: none"> • Work independently to produce written work that is legible & well-presented either by hand or in digital format • Recognize the author's purpose, for example to inform, entertain, persuade, instruct <p><u>PSPE</u></p> <ul style="list-style-type: none"> • Embrace optimism to shape a positive attitude towards themselves & their future • Motivate themselves intrinsically & behave with confidence. <p><u>Math Phase 4</u></p> <ul style="list-style-type: none"> • timetables and schedules (12-hour and 24-hour clocks) in real-life situations

G4 A Year	Unit	
<p>Learning will include the development of the following knowledge, concepts and skills</p>	<p>Learning outcomes Students will be able to:</p>	
<p>Transdisciplinary theme</p> <h1>2.How we express ourselves</h1> <p>An inquiry into the ways in which we discover and express ideas, feelings, nature, culture, beliefs and values; the ways in which we reflect upon, extend and enjoy our creativity; our appreciation of the aesthetic</p> <p>Central idea Impressions can lead to preconceptions and misconceptions</p> <p>Learner Profile Attributes inquirer, communicator</p> <p>Key concepts Function, reflection, perspective</p> <p>Related concepts Interpretation, communication, subjectivity</p> <p>Lines of inquiry</p> <ul style="list-style-type: none"> • How our bodies work • What we sense and what our brain interprets • Preconceptions/Misconceptions and how we overcome them 	<p>Transdisciplinary strands</p> <p>Science Living things Forces and energy</p> <p>Skills</p> <ol style="list-style-type: none"> Make and test predictions Interpret and evaluate data gathered in order to draw conclusions Consider scientific models and applications of this models (including their limitations) <p>Social Studies Social organizations and culture</p> <p>Skills</p> <ol style="list-style-type: none"> Formulate and ask questions about the past, the future, places and society Use and analyze evidence from a variety of historical, geographical and societal sources <p>Language Phase 4 Visual language—Viewing & presenting Written language—Reading & Writing Oral language—listening & speaking</p> <p>PSPE Phase 4 Identity Active living</p> <p>Math Phase 4 Numbers</p> <p>Additional resources <i>Coraline</i> <i>Phantom Tollbooth</i> <i>Harry Potter and the Sorcerer’s Stone</i> <i>Howl’s Moving Castle</i> <i>Alice in Wonderland</i> RAZ Journeys Write a Narrative - Artifacts, rituals and traditions in your life</p>	<p>Science</p> <ul style="list-style-type: none"> • Explain the impact of diet in providing the body with sources of potential energy • Identify and describe the functions of the body <p>Social Studies</p> <ul style="list-style-type: none"> • reflect on his or her own misconceptions about people (for example, relating to age, race, gender, disability). • Be able to understand how experience and others’ opinions may influence individuals <p>Language</p> <ul style="list-style-type: none"> • use appropriate paragraphing to organize ideas • demonstrate an increasing understanding of how grammar works <p>PSPE Phase 4</p> <ul style="list-style-type: none"> • Analyze how assumptions can lead to misconceptions • Use emotional awareness and personal skills to relate to and help others • Identify realistic goals and strategies to improve physical fitness <p>Math Phase 4</p> <ul style="list-style-type: none"> • read, write, compare and order percentages • use fractions, decimals and percentages interchangeably in real-life

G4 A Year		
Learning will include the development of the following knowledge, concepts and skills		Learning outcomes Students will be able to:
<p>Transdisciplinary theme</p> <h1>4.How the World Works</h1> <p>An inquiry into the natural world and its laws; the interaction between the natural world (physical and biological) and human societies; how humans use their understanding of scientific principles; the impact of scientific and technological advances on society and on the environment.</p> <p>Central idea Energy may be converted from one form to another and stored in various ways</p> <p>Learner Profile Attributes risk-taker, knowledgeable</p> <p>Key concepts Form, change, connection</p> <p>Related concepts Transformation, chemical and physical changes</p> <p>Lines of inquiry</p> <ul style="list-style-type: none"> • Different forms of energy- Kinetic/Potential (chemical/gravitational/elastic/electric) (Thermodynamic) • The storage and transformation of energy, and their byproducts • Conservation of energy 	<p>Transdisciplinary strands</p> <p>Science Forces and energy</p> <p>Skills a. Identify or generate a question or problem to be explored b. Consider scientific models and applications of this models (including their limitations)</p> <p>Social Studies Continuity and change through time</p> <p>Skills a. Use and analyze evidence from a variety of historical, geographical and societal sources b. Orientate in relation to place and time</p> <p>Language Phase 4 Oral language—listening and speaking Visual language—viewing and presenting</p> <p>PSPE Phase 4 Interactions</p> <p>Math Phase 4 Data handling</p> <p>Additional resources Journeys</p> <p>RAZ</p> <p><i>Ender’s Game</i> <i>The Phantom Tollbooth</i> <i>Series of Unfortunate Events</i> <i>Anne of Green Gables</i></p>	<p>Science</p> <ul style="list-style-type: none"> • Investigate energy transformations and conversions • Support the argument that the gravitational force exerted by Earth on objects is directed down • Develop a model to describe that when the arrangement of objects interaction at a distance changes, different amounts of potential energy are stored in the system <p>Social Studies</p> <ul style="list-style-type: none"> • Investigate which simple machines were developed by past civilizations • Explore scientific and technological developments that help people understand and respond to the changing Earth. <p>Language</p> <ul style="list-style-type: none"> • Apply knowledge of presentation techniques in original and innovative ways; explain their own ideas for achieving desired effects • Participate in collaborative learning, considering multiple perspectives and working with peers to co-construct new understanding <p>PSPE Phase 4</p> <ul style="list-style-type: none"> • Reflect critically on the effectiveness of the group during and at the end of the process • Identify how their attitudes, opinions, and beliefs affect the way they act and how those of others also impact their actions • Participate in collaborative learning, considering multiple perspectives and working with peers to co-construct new understanding <p>Math Phase 4</p> <ul style="list-style-type: none"> • understand that different types of graphs have special purposes

G4 A Year		
Learning will include the development of the following knowledge, concepts and skills		Learning outcomes Students will be able to:
<p>Transdisciplinary theme</p> <p>3.How we organize ourselves</p> <p>An inquiry into the interconnectedness of human-made systems and communities; the structure and function of organizations; societal decision-making; economic activities and their impact on humankind and the environment.</p> <p>Central idea Governmental systems and decisions can affect human rights, the environment, and other living organisms.</p> <p>Learner Profile Attributes caring, principled</p> <p>Key concepts Function, responsibility, connection</p> <p>Related concepts Government, ecosystems, habitat</p> <p>Lines of inquiry</p> <ul style="list-style-type: none"> Types of governance Principles of human rights and social justice Ways in which organisms and environments are interconnected in nature (Including human interaction) (Interdependence) 	<p>Transdisciplinary strands</p> <p>Science Living things</p> <p>Skills a. Identify or generate a question or problem to be explored b. Make & test predictions</p> <p>Social Studies Human systems & economic activities Resources & the environment</p> <p>Skills a. Use and analyze evidence from a variety of historical, geographical and societal sources b. Assess the accuracy, validity and possible bias of sources</p> <p>Language Phase 4 Oral language—listening and speaking Visual language—viewing and presenting Written language—reading</p> <p>PSPE Phase 4 Active living Interactions</p> <p>Math Phase 4 Shape and space</p> <p>Additional resources Journeys RAZ <i>Coraline</i> <i>The Hobbit</i> <i>The Phantom Tollbooth</i></p>	<p>Science</p> <ul style="list-style-type: none"> Recognize that plants and animals go through predictable life cycles Identify the structures of plants and animals that are responsible for reproduction <p>Social studies</p> <ul style="list-style-type: none"> Explain how human activities can have positive or adverse effects on local and other environments Explain principles of human rights (distinguish between personal beliefs and belief systems) <p>Language</p> <ul style="list-style-type: none"> Participate appropriately as listener and speaker in discussions, conversations, debates and group presentations Identify and describe the elements of a story and explain how they contribute to its effectiveness Reread, edit and revise their own writing <p>PSPE Phase 4</p> <ul style="list-style-type: none"> Identify and discuss the changes that occur during puberty and their impact on well-being Work towards consensus, understanding the need to negotiate and compromise <p>Math Phase 4</p> <ul style="list-style-type: none"> understand that geometric ideas and relationships can be used to solve problems in other areas of mathematics and in real life.

G4 A Year		
Learning will include the development of the following knowledge, concepts and skills		Learning outcomes Students will be able to:
<p>Transdisciplinary theme</p> <p>5.Sharing the planet</p> <p>An inquiry into rights and responsibilities in the struggle to share finite resources with other people and with other living things; communities and the relationships within and between them; access to equal opportunities; peace and conflict resolution</p> <p>Central idea Conservation of energy requires responsibility.</p> <p>Learner Profile Attributes open-minded, thinker</p> <p>Key concepts Form, change, perspective, causation</p> <p>Related concepts transformation</p> <p>Lines of inquiry</p> <ul style="list-style-type: none"> • Types of matter/ types of changes to matter • Types of energy/ energy transformations • Scarcity and Interconnectedness • How to approach problems/questions objectively 	<p>Transdisciplinary strands</p> <p><u>Social Studies</u> Resources and the environment</p> <p>Skills</p> <p>a. Use and analyze evidence from a variety of historical, geographical and societal sources</p> <p>b. Identify roles, rights and responsibilities in society</p> <p><u>Science</u> Forces and energy Matter</p> <p>Skills</p> <p>a. Observe carefully in order to gather data</p> <p>c. Use scientific vocabulary to explain their observations and experiences</p> <p>h. Consider scientific models and applications of this models (including their limitations)</p> <p><u>Language Phase 4</u> Oral language—listening and speaking Visual language—viewing and presenting Written language—reading</p> <p><u>PSPE Phase 4</u> Identity Interactions</p> <p><u>Math Phase 4</u> Data handling</p> <p>Additional resources <i>The Hobbit</i> <i>Alice in Wonderland</i> Journeys RAZ</p>	<p><u>Social Studies</u></p> <ul style="list-style-type: none"> • reflect on his or her own strategies in dealing with situations of personal conflict. • evaluate effectiveness of real-life conflict management (for example, research and analyze a global conflict situation) <p><u>Science</u></p> <ul style="list-style-type: none"> • Understand what it means to be scientifically minded and the scientific method • Investigate the ways materials can be changed <p><u>Language</u></p> <ul style="list-style-type: none"> • Verbalize their thinking and explain their reasoning • Paraphrase and summarize when communicating • Distinguish between fact and opinion <p><u>PSPE Phase</u></p> <ul style="list-style-type: none"> • Discuss ideas and ask questions to clarify meaning • Reflect on the perspectives and ideas of others <p><u>Math Phase 4</u></p> <ul style="list-style-type: none"> • design a survey and systematically collect, record, organize and display the data in a bar graph, circle graph, line graph