# redbricks | school

# Semester Overview 2021 - 2022

Class: 8		October 2021 - March 2022
Subject	Name of Units	Skills
ENGLISH	A Shot in the Dark (Prose)  The Inchcape Rock (Poem)  A Boy's Best Friend (Prose)  If (Poem)  Dreaming of the Dawn Wall (Prose)  Last Lesson of the Afternoon (Poem)	Reading and viewing:  • Read fluently and demonstrate comprehension and interpretation of a range of grade-appropriate literary texts, featuring some complexity in
	Diary of A Nobody (Prose)  A Christmas Carol (Novel)	<ul> <li>Demonstrate comprehension of visual texts with specialized features and complex ideas (e.g., visual components of media such as magazines, newspapers, web sites, reference books, graphic novels, broadcast media, videos, advertising and promotional materials)</li> <li>Select and use various strategies</li> </ul>

- before reading and viewing to develop understanding of text, including setting a purpose, accessing prior knowledge to make and share connections, making predictions, asking questions, previewing texts
- Select and use various strategies during reading and viewing to construct, monitor, and confirm meaning, including predicting, making connections, asking and answering questions, making inferences and drawing conclusions, figuring out unknown reading selectively, words, determining the importance of ideas/events, summarizing and synthesizing, identifying facts, opinions and writers'/narrator's/characters' bias
- Select and use various strategies after reading and viewing to confirm and extend meaning, including making inferences and drawing conclusions, reflecting and responding, using graphic organizers to record information and summarizing and synthesizing
- Respond to selections they read or view, by expressing opinions and making judgements supported by reasons, explanations, and evidence, explaining connections

(text-to-self, text-to-text, and text-to-world), identifying personally meaningful selections, passages, and images comparing various viewpoints, analysing descriptive texts to infer meaning, opinion and attitude and synthesizing new ideas

Identify how structures and features of text work to develop meaning, including form, function, and genre of text (e.g., brochure about to smoking inform students; genre is persuasive) 'text features' (e.g., copyright, table of contents, headings, index, glossary, diagrams, sidebars, hyperlink, pull-quotes) elements literary (e.g., characterization, mood, setting, viewpoint, foreshadowing, conflict, protagonist, antagonist, theme, descriptions) non-fiction elements (e.g., topic sentence, development of ideas with supporting details, central idea, evidence or example, explanation) literary devices imagery, onomatopoeia, (e.g., metaphor, symbolism, simile, personification and other figures of speech) idiomatic expressions

### Writing:

 Write a variety of clear personal, formal, instructional, persuasive, argumentative,

- imaginative and visual representations that demonstrate connections to experiences, ideas, opinions and visual clues
- Clearly develop ideas, mood and setting by using effective supporting details, explanations, analysis, insights and sensory details
- Demonstrate sentence fluency through strong, well-constructed sentences that demonstrate a variety of lengths and patterns, with an increasingly fluid style, rhythm and flow
- Demonstrate effective word choice through the use of precise nouns, verbs, adjectives and modifiers, purposeful use of figurative and sensory language with increasing sophistication
- Demonstrate the effective use of tone and voice (first person, second person, omniscient narrator etc.) to suit the purpose and audience
- Use a format and/or organisation that is meaningful, logical, effective and appropriate to the purpose and audience with an appropriate beginning (e.g. salutation in a letter, address, indentation etc.) middle (subject

- line, paragraphing etc.) and ending (closing etc.)
- Demonstrate effective control over all aspects of coherence and cohesion (cohesive devices, referencing, substitution, sequence markers, establishing logical relationships, conjunctions, connectives etc.)
- Select and use various strategies before writing and representing, including establishing a purpose, identifying an audience, genre, and form and generating, selecting, developing, and organizing ideas from personal interest, prompts, texts, and/or research
- Select and use various strategies during writing and representing to express and refine thoughts, including analysing models of accessing literature multiple sources of information consulting reference materials considering applying feedback from and discussions to revise ideas. organization, voice, word choice, and sentence fluency revising and editing
- Select and use various strategies after writing and representing to improve their work, including checking their work against established criteria revising to

- enhance writing traits (e.g., ideas, sentence fluency, word organization) choice. voice, conventions (e.g., editing for usage, grammar and capitalization, punctuation, spelling
- Use writing and representing to critique, express personal responses and relevant opinions, and respond to experiences and texts Write short pieces of continuous prose in response to questions by developing explanations, analysing the relationships in ideas and information, making speculating generalizations, viewpoints, about alternative providing supporting evidence and presenting personal opinions
- the features and Use of conventions language accurately to express meaning in representing, writing and including simple, complete compound, and complex sentences subordinate and independent clauses correct subject-verb and pronoun agreement in sentences with compound subjects correct and effective use of punctuation conventional Canadian spelling for familiar and frequently used words spelling unfamiliar words applying strategies by (e.g.,

phonic knowledge, use of common spelling patterns, dictionaries, thesaurus) legible writing appropriate to context and purpose

### Grammar and Vocabulary:

- Identify and explain how syntactic and structural features convey meaning
- Use tenses (simple, continuous, perfect and perfect continuous) accurately to convey time and sequence of events
- Use pronouns, referencing and substitution accurately to indicate clear relationships within and between sentence
- Identify and use a wide range of simple, compound and complex sentences with flexibility and accuracy to suit the purpose and format of the text
- Explore and use varied sentence structures to convey the same meaning
- Use punctuation and other structural clues to infer and convey meaning
- Select and use words (verbs, noun phrases, adjectives and adjective phrases, adverbs, modifiers) to convey precise

		<ul> <li>meaning, nuances, intensity, mood, attitude, register, tone and opinion</li> <li>Identify and use synonyms and paraphrase effectively</li> </ul>
		Identify and record how descriptive language is used in texts to convey meaning
		<ul> <li>Use a wide range of vocabulary, including phrasal verbs and idiomatic expressions fluently and flexibly to convey precise meaning</li> </ul>
		Demonstrate an awareness of style and collocation
		Demonstrate full control over spelling and word formation
HINDI	Chapter 11: Mera naya bachpan  Chapter 13: Anokha badla  Chapter 14: Rotiyan  Chapter 18: Zaike ka safar  Along with Abyas Pustika and Sparsh  Vyakaran	<ul> <li>Reading</li> <li>Read fluently and demonstrate comprehension also enjoy the experience of reading challenging literature</li> <li>Read complex texts actively, recognize key passages and comprehend the literal and figurative uses of language</li> <li>Increase understanding and recall of what is read including facts and importance of the main idea</li> <li>Critically analyze and evaluate reading material</li> <li>Perceive themselves as achieving</li> </ul>

- grade level reading skills.
- Identify main idea in reading material
- Discuss and respond to content of reading Read longer works in variety of style including drama, poetry, essays and short stories
- Continue to use resources to increase vocabulary and gain deeper understanding by using context clues
- Summarize stories and discuss author's use of word choice

### Writing

- Write short and long answer independently
- Demonstrate effective word choice through the use of precise nouns, verbs, adjectives and modifiers, purposeful use of figurative and sensory language with increasing sophistication
- Construct essays (200 words) integrating critical thinking coherently and accurately using vocabulary in all time frames -present, past and future with paragraph length connected discourse
- Engage in formal writing assignments that require utilization of all stages of the writing process (letter writing)
- Express themselves effectively in a variety of forms (news, diary, and picture composition)
- Engage in revision in the

following areas:

- -clear, understandable, and accurate language
- -incorporation of sentence variety (simple, compound, complex)
- Choose and use a relevant pre-writing strategy that will help them to prepare for the assignment
- Evaluate their own writing according to established criteria and rubrics
- Maintain neatly organized writing portfolios for use in tracking their growth as maturing writers Use correct and effective use of punctuation

### Listening and speaking

- Speak and listen to interact with others
- Listen critically to understand
- and analyze ideas
- Demonstrate enhanced vocabulary knowledge and usage
- Verbally participate in group discussions appropriately and spontaneously.
- Spontaneously produce a wide variety of grammatically simple and complex sentences
- Recognize and use words to describe concepts/ideas
- Use language to communicate physical and emotional feelings, and to demonstrate an understanding of the feelings of others

 Use visual content like pictures, audio, graphics and music to present their thoughts

#### Grammar

- Identify and explain how syntactic and structural features convey meaning
- Use all four forms of 'Ra'( Padon, Ref etc) in words
- Understand Tatsam and tadbhav
- Understand the difference between ki and kii
- Understand sanyukt akshar and Sanyukt vyanjan
- Identify and use'Nipaat' (To, bhi, par)
- Use tenses (past,present and future) accurately to convey time and sequence events
- Understand different types of sentences (simple, compound and complex)
- Identify and use noun (vyakti vachak, iati vachak and bhavvachak sangya) with examples and uses) and pronoun (purush vachak, prashan vachak, sambandh vachak, nij vachak and nishay and anishchay vachak with examples and uses) Use direct and indirect speech effectively with appropriate punctuation
- Identify and use antonyms, synonyms, gender, singular plural and paraphrase effectively
   Use a wide range of vocabulary, including phrasal verbs and

### idiomatic expressions • Use karak chinha, prefix and suffix and also identify vartini ki ashudhiyan • Demonstrate effective control over use of verbs (types of verbs - akarmak aur sakarmak kriya) • Understand use of adverbs • Demonstrate effective control over use of verbs, adjectives and noun • Use direct and indirect speech effectively with appropriate punctuation Demonstrate full control over spelling and word formation MATHS Number Sense: • Recognize different types of Rational Numbers number systems Playing with Numbers Understand the arithmetical properties of the numbers Sets Percentage Represent a rational number on Compound Interest number line Direct and Inverse Write a 2 and 3 digit number in variation generalized form Time and Work Deduce the divisibility test rules of 2,3,5,9,10 for a 2 or a 3 digit number expressed in the general form Identify similar objects and group them in the form of sets Describe conventions used to list sets • Represent a set using roster notation and set builder form • List the elements of a set by describing the set and the rules that its elements follows

- Define finite, infinite, countable, finite set, infinite set, empty, and null set
- Determine if a given set is finite or infinite. Describe examples of null sets from the real world
- Examine the logical and visual relationship between a set and its complement using set-builder notation.
- Recognize that there are several different ways to represent the complement of a set
- Perform the operations like union and intersection of two sets.
   Describe their properties
- Solve percentage problems involving profit and loss, discount and tax.
- Define principal, interest, interest rate and time
- Describe and apply the formula for finding simple interest and compound interest
- Describe an alternate procedure for finding simple interest and compound interest
- Recognize the importance of converting time from months to years before applying the formula for interest
- Differentiate between simple and compound interest
- Identify direct and indirect variation in the given situation
- Explain the concepts of direct and indirect variations using real life examples
- Apply the rules of

### Algebra:

Algebraic Expressions Linear Equations in one variable Factorization

### Mensuration:

Volume and Surface Area of Solids

- direct/indirect variations to solve real world problems
- Compare the ratio proportion method and unitary method to solve same problem
- Apply the rules of unitary method to solve real world problems involving:
- Number of days and work done
- Perform operations on algebraic expressions
- Define a linear equation and simple linear equation
- Describe the rules to solve a simple linear equation
- Explain the rules of transposition
- Apply the rules for solving a simple linear equations to solve word problems
- Define a perfect square trinomial
- Factorise a perfect square trinomial
- Describe different factorization strategies to factor a polynomial
- Apply different factorization strategies to factor polynomials completely
- State/apply the formulas to calculate volume and surface area of cube, cuboid and cylinder.
- State the relation between different units of volume
- Apply the concepts of mensuration to solve real world

		problems
	Geometry: Construction of quadrilaterals Data Handling:	<ul> <li>Construct quadrilaterals using different properties.</li> <li>Effectively display the information in graphically in the form of a pie chart</li> </ul>
PHYSICS	Chapter 5:Light Energy	<ul> <li>Define refraction</li> <li>Discuss examples of refraction</li> <li>Describe a spherical mirror</li> <li>Describe a concave and a convex mirror</li> <li>Define the terms - principal axis, centre and radius of curvature, focus and focal length for a spherical mirror</li> <li>Describe rules for making ray diagrams for spherical mirror</li> <li>Distinguish between real and virtual images</li> <li>Use a ray diagram to show formation of a real image formed by a spherical mirror</li> <li>Describe the characteristics of a real image formed by a spherical mirror</li> <li>Describe dispersion of white by a prism into constituent colours</li> <li>Display a scientific attitudes while making models</li> <li>Show a creative mindset while studying real world optical phenomena</li> <li>Communicate logical reasoning and explanations effectively using scientific terms</li> </ul>

# **Chapter 6:** Heat Transfer

- Compare and contrast boiling and evaporation
- Describe thermal expansion of matter
- Describe linear, area( superficial) and volume expansion Compare expansivity in solids, liquids and gases
- Construct models based on scientific process
- Observe and site multiple physical phenomena from one experiment

### Chapter 7: Sound

- Relate pitch and frequency
- Understand pitch and frequency in relation to working of musical instruments
- Explain monotone
- Relate loudness and amplitude
- State the unit of loudness in decibels

## Chapter 8: Electricity

- Describe household consumption of electricity
- Identify live wire, neutral wire and earth wire in terms of their energy and path they travel
- Describe safety components( fuses, circuits and breakers)
- Describe phenomenon of static electricity
- Explain conservation of charges
- Describe conduction and working of an electroscope
- Describe a lightning conductor
- Identify dangers of electricity
- Conduct scientific experiments

		keeping in mind all the parameters  Study the impact of energy consumption and draw conclusions from the same and suggest alternate approaches  Apply the safety precautions while dealing with electrical appliances
CHEMISTRY	Chapter 5: Language of chemistry	<ul> <li>Recall the symbols of different elements</li> <li>Derive the formulae of compounds on the basis of valencies of elements and radicals</li> <li>Write chemical equations of a reaction</li> <li>Balance chemical equations by applying the law of conservation of mass</li> </ul>
	Chapter 6:Chemical reactions	<ul> <li>Describe differeb=nt types of chemical reactions with examples</li> <li>Identify the type of chemical reaction</li> <li>Identify different oxides as acidic, basic, amphoteric and neutral</li> <li>Explain the effect of heat on oxides of some metals</li> </ul>
	Chapter 7: Water	<ul> <li>Describe that water dissolves many substances</li> <li>Identify a solution , suspension and colloids</li> <li>State difference between saturated, unsaturated and supersaturated solutions</li> </ul>

	Chapter 8: Carbon and its compounds	<ul> <li>Describe water of crystallization Write equations of metals with cold water and steam</li> <li>Describe hard water and soft water</li> <li>Discuss the different methods of softening of water</li> <li>Explain the term allotropy and describe different allotropes of carbon</li> <li>State the properties of graphite and diamond</li> <li>Prepare carbon dioxide in lab</li> <li>Describe the uses of carbon dioxide</li> </ul>
BIOLOGY	Chapter 7:Nervous system	<ul> <li>Explain the importance of control and coordination system in living beings</li> <li>Make a flow chart of the process involved from getting a stimulus to producing the response.</li> <li>Draw and label the structure of a neuron.</li> <li>Identify and name various regions in the given diagram of the brain.</li> <li>Interpret the problems associated with malfunctioning of different parts of the brain.</li> <li>Differentiate between ANS and PNS</li> <li>Rearrange the steps of reflex pathway</li> </ul>
	Chapter 5: Endocrine system and Adolescence	<ul> <li>Understand the difference between endocrine and exocrine glands.</li> </ul>

#### locate the endocrine glands in the given diagram/model human body • List down the names and role of various endocrine glands Comprehend the different changes that during occur puberty Address the problems of adolescence understand Chapter 2: Define and the importance of reproduction Reproduction in Plants • Differentiate between asexual and sexual reproduction. • Enlist explain and give examples for various methods of asexual reproduction in plants • Draw, label and identify the importance of various parts of plants Explain the process of sexual reproduction in plants • Dissect a flower and identify its parts Define and understand the types of pollination Chapter 3: Label the diagrams of male and Reproduction in female human reproductive Humans systems • Explain the role of main organs of male and female reproductive system Comprehend the integrated functioning of human reproductive system Chapter 4: Understand biotic and abiotic

	Ecosystems	factors of ecosystem  Comprehend the interdependence between various factors of an ecosystem  Explain various factors through the example of forest ecosystem
History	Unit 3: The Decline of the Mughal Empire	<ul> <li>Analyse the causes responsible for the decline of the Mughal Empire</li> </ul>
	Unit 4: Traders to Rulers	<ul> <li>Understand the purpose of East India Company         Understand the importance of battles of Plassey and Buxar in the rise of the East India Company             Analyse the gradual change in the nature of the East India Company and its rise in India     </li> </ul>
	Unit 5: The Great Uprising of 1857	<ul> <li>Analyze the causes for the great uprising</li> <li>Evaluate naming of this event: Sepoy rebellion vs. the first war of independence</li> <li>Examine the consequences of the great uprising of 1857</li> </ul>
Civics	Unit 2: United Nations	<ul> <li>Analyse the relevance and purpose of the UN</li> <li>Understand the functions of General Assembly, Security Council, International Court of Justice</li> <li>Understand the functions of UN bodies, such as UNESCO,</li> </ul>

		UNICEF, WHO
Geography	Unit 7: India Geographical features	<ul> <li>Interpret location and extent of India with reference to other countries of Asia</li> <li>Locate important mountains, plateaus, deserts , islands rivers on the map of India</li> <li>Compare the relief , climate and vegetation of India with other parts of Asia</li> <li>Discuss the importance of monsoon and its impact on the social and cultural unity of India</li> </ul>
	Unit 8: India - Human Resources	<ul> <li>Discuss the meaning of human resources</li> <li>Describe the role of health and education in developing human resources</li> <li>Understand the meaning of skilled and unskilled human resources</li> <li>Identify areas in India lagging behind in development due to unavailability of skilled resources</li> <li>Analyse factors responsible for development of any area</li> </ul>
	Unit 9: Representation of Geographical features	<ul> <li>Interpret contours on the topo sheet</li> <li>Identify landforms through contours</li> <li>Understand various settlement patterns</li> <li>Interpret and analyze the given toposheet</li> </ul>

### Gujarati

## Chapter-15

Subhashito

### Chapter-10

Bhool ni saja

Chapter - Charanoma

Letter Writing
Story Writing
Gender
Vachan
Kriya shabda
Essay, Adjectives

Ch: Apang na Ojas

### Listening and Speaking Skill

- Adapt the pace and volume of speaking when performing or reading aloud
- Evaluate what is heard and give reasons for agreement or disagreement
- Adapt the pace and volume of speaking when performing or reading aloud
- Understand the gist or the significant points of an account
- Speak on any topic confidently

### Grammar

- Establish the use of punctuation marks (question mark, full stop, comma, exclamation)
- Establish the use of tenses
- Understand one word for a group of words, rhyming words, gender related words, singular-plural (vachan), adjective
- Understand the meaning of synonym, antonym, and their use in language
- Identify a noun, pronoun, verb (kriya shabd) and adjective through reading comprehension
- Establish the use of punctuation marks (question mark, full stop, comma, exclamation)
- Write a simple article

### Reading

 Pronounce all the words correctly and clearly while reading and be able to understand their mistakes and try to correct them

		on their own  Read articles, stories, dramas, jokes and poems with expression and correct articulation and enunciation  Read new and old story books and learn from them  Writing  Write short and long answers on their own (2-4 sentences)  Write a letter (formal and informal)  Write small essays (100-150 words) and poems on their own  Write a character sketch (at least 10 sentences)  Engage in creative activities such as story writing, article writing and jokes writing  Write simple reports and picture compositions using descriptive
		words and phrases  Write their views and experiences in their own words using correct language
ΙCΤ	Chapter 6: Introduction to visual basic	<ul> <li>Literals, data types, keywords, literals, operators</li> <li>Decision making statements (if-else and if-else-if)</li> </ul>
	Chapter 1: Operating system	<ul> <li>Definition and function of operating system, Types of operating system, CUI and GUI</li> </ul>
	Chapter 4:App development	<ul> <li>Features and uses of application,</li> <li>Types of application software,</li> <li>types of applications</li> </ul>

	<ul> <li>Development of an application, scratch user interface, AppInventor</li> </ul>
Chapter 7: Internet	<ul> <li>E-commerce</li> <li>Internet Ethics</li> <li>Blogging</li> <li>Social media- advantages and disadvantages</li> </ul>
Chapter 8: Networking concepts	<ul> <li>Computer networks, Types of computer networks (LAN, MAN, WAN, PAN, CAN)</li> <li>Network topologies</li> <li>Protocols (HHTP, FTP, TCP/IP, IMAP, SMTP)</li> <li>Transmission media</li> <li>Network devices (Modem, switch, hub, router, gateways)</li> <li>Network security and terms related to internet (Intranet, URL, ISP, IP address, DNS, bandwidth)</li> <li>Cloud computing- characteristics and advantages)</li> </ul>