

INSTRUCTIONS FOR USING REMOTE LEARNING PROJECTS

These materials were developed with the intention of easing the transition between in-class and temporary remote learning. Learning experiences are aligned with curricular outcomes and assessment tools have been included with each project.

Note:

1. The teacher either sends a link to the appropriate project or sends the document itself.
2. The teacher ensures that parents/caregivers receive any required school supplies (bin with pencils, markers, paper, etc.).
3. The teacher reassures parents/caregivers that communication will be maintained between home and school.
4. Parents/caregivers may access additional resources at:
 - My Learning at Home (www.edu.gov.mb.ca/k12/mylearning)
 - My Child in School (www.edu.gov.mb.ca/k12/mychild/index.html)

PROJECT OVERVIEW

Grade:	7
Main Subject:	Mathematics
Big Idea:	Recognize and use patterns to solve problems
Title:	AN EXPLORATION OF VISUAL PATTERNS
Strand:	Patterns and Relations
Duration:	3 weeks for the entire sequence of lessons
Materials:	Non-specific materials from home PowerPoint slides: It is recommended that you explore Slides 1 to 36 initially, then return to complete the study of Slides 37 to the end at a later date. It is not recommended to reverse this order.
Short Description:	Students will explore the progression of how patterns can be plotted on a T-table or graph. Students will then explore how patterns have rules that can generate equations. These equations can be used to solve problems.

LEARNING OUTCOMES

Mathematics: www.edu.gov.mb.ca/k12/cur/essentials/docs/glance_kto9_math.pdf
7.PR.1, 7.PR.2, 7.PR.3, 7.PR.4, 7.PR.5, 7.PR.6, 7.PR.7

This sequence of lessons uses mathematics outcomes as its lens. Feel free to make cross-curricular connections as you see it.

ASSESSMENT

LANGUAGE ARTS					MATHEMATICS			SCIENCE			SOCIAL STUDIES		
COMP. Listening & Viewing	COMP. Reading	COMM. Speaking & Represent.	COMM. Writing	Critical Thinking	Knowledge and Understanding	Mental Math & Estimation	Problem Solving	Knowledge and Understanding	Scientific Inquiry Process	Design Process & Problem Solving	Knowledge and Understanding	Research and Communication	Critical Thinking and Citizenship
					X	X	X						

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LEARNING EXPERIENCES AND ASSESSMENT

Question: What are patterns, why are they important, and how can they help your mathematics learning?

Teacher's instructions

This unit unfolds through the attached Grade 7 PowerPoint presentation—an exploration of visual patterns. The scope and sequence is critical to the development of algebraic thinking for students. The slides with blue trim are directed at teachers. The slides with orange trim are tasks to engage students. Please note that teachers may wish to augment the quantity of these student tasks. The learning cycle included in the preamble serves as a framework by which to explore a topic.

APPENDIX (PRINTABLE SUPPORT MATERIALS INCLUDING ASSESSMENT)

Grade 7: An Exploration of Visual Patterns.pptx