|  |
| --- |
| 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](http://www.edu.gov.mb.ca/k12/mylearning))
		+ My Child in School ([www.edu.gov.mb.ca/k12/mychild/index.html](http://www.edu.gov.mb.ca/k12/mychild/index.html))
 |

|  |
| --- |
| PROJECT OVERVIEW  |
| Grade: | Kindergarten |
| Main Subject: | Mathematics |
| Big Idea: | Numbers are related to each other through a variety of number relationships |
| Title: | EXPLORING THE NUMBER 5 |
| Strand: | Number |
| Duration: | 2 weeks |
| Materials: | See PowerPoint slides |
| Short Description: | Four number relationships will be explored through the lessons in order for students to understand the importance of the number five. Highlighting these number relationships is crucial to supporting students’ development of number sense. The lessons focus on developing and strengthening these number relationships.* One and Two More/Less
* Anchors and Benchmarks of Five and Ten
* Part-Part-Whole Relationships
* Spatial Relationships (Subitizing)
 |

|  |
| --- |
| Learning Outcomes  |
| Mathematics: [www.edu.gov.mb.ca/k12/cur/essentials/docs/glance\_kto9\_math.pdf](http://www.edu.gov.mb.ca/k12/cur/essentials/docs/glance_kto9_math.pdf) K.N.1, K.N.3, K.N.4, K.N.5, K.N.6 |

|  |
| --- |
| 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 andUnderstanding | Scientific Inquiry Process | Design Process & Problem Solving | Knowledge and Understanding | Research and Communication | Critical Thinking and Citizenship |
|  |  |  |  |  | X |  | X |  |  |  |  |  |  |

|  |  |
| --- | --- |
| Original concept created by:  | Sherry Perih |

|  |
| --- |
| Learning Experiences and Assessment |
| Overall |
| Teacher’s instructionsSee PowerPoint PresentationStep-by-step instructions for students:See PowerPoint Presentation |

|  |
| --- |
| APPENDIX (Printable Support Materials Including Assessment) |
| Kindergarten: Exploring the Number 5.pptxKindergarten: Appendix A: Exploring the Number 5 Rubric.docxKindergarten: Appendix B: Four Kings Game.pdfKindergarten: Appendix C: Schedule for Week 1 and Week 2.docx |

|  |
| --- |
| **Exploring the Number 5 Rubric** |
| **Student:**  | ***Basic descriptors to help guide your formative assessments.*** |
| **Full details of the student achievement profiles can be found here:**[**Mental Math and Estimation**](https://www.edu.gov.mb.ca/k12/assess/report_cards/grading/docs/mental_math.pdf)[**Knowledge**](https://www.edu.gov.mb.ca/k12/assess/report_cards/grading/docs/math_knowledge_understanding.pdf) **and Understanding**[**Problem Solving**](https://www.edu.gov.mb.ca/k12/assess/report_cards/grading/docs/math_problem_solving.pdf)  | **Requires considerable ongoing teacher support.** | **Requires occasional teacher or peer support.** | **Accurate, clear, and uses appropriate strategies and procedures. Requires occasional prompting for clarification.** | **Accurate, clear, flexible, consistent, and efficient. Justifies and explains reasoning clearly and completely using accurate math vocabulary.** |
|  | **Limited** | **Basic** | **Good** | **Very Good/Excellent** |
| ***Tracking student data throughout these learning experiences allows the teacher to make an informed assessment about a student’s level of achievement of these outcomes.*** |
| Recite the number sequence by 1s, starting anywhere from 1 to 10. |  |  |  |  |
| Subitize and name arrangements of 1 to 6 dots. |  |  |  |  |
| Relate a numeral, 1 to 10, to its respective quantity. |  |  |  |  |
| Represent and describe the number 5 in two parts, concretely and pictorially. |  |  |  |  |
| Demonstrate an understanding of counting to 10. |  |  |  |  |
| Can solve problems with quantities to 5.  |  |  |  |  |

**Suggested Codes for daily record keeping purposes:**

* I – Knowledge has been demonstrated individually
* H – Used when knowledge has been demonstrated individually, but with help from the teacher or a peer
* G – Used when knowledge has been demonstrated within a group
* X – Used when a question has been attempted but answered incorrectly
* N – Used when a question has not been attempted

Adapted from: Liljedahl, P. (2021). *Building thinking classrooms in mathematics, grades K-12: 14 teaching practices for enhancing learning*. Thousand Oaks, CA: Corwin Press Inc.

**Appendix B: Four Kings**



Appendix C:

WEEK 1—Kindergarten—Exploring the Number 5

|  |  |  |  |
| --- | --- | --- | --- |
| **Day** | **Opening Routine and Learning Experiences** | **Learning Outcome** | **Big Idea (from** [*Glance Across the Grades*](https://www.edu.gov.mb.ca/k12/cur/math/glance_k-9/index.html)**)** |
| **Monday** | Five Frame FlashAction Cards: Counting Counting Collections | K.N.1. Say the number sequence by 1s, starting anywhere from 1 to 30 and from 10 to 1.K.N.2. Subitize and name familiar arrangements of 1 to 6 dots (or objects).K.N.3. Relate a numeral, 1 to 10, to its respective quantity.K.N.5. Demonstrate an understanding of counting to 10 by* indicating that the last number said identifies “how many”
* showing that any set has only one count
 | * Counting tells how many and how much.
* Numbers are related to each other through a variety of number relationships.
* There are different but equivalent representations of numbers.
* Quantities can be represented concretely, pictorially, and symbolically.
* There are different but equivalent representations of numbers.
 |
| **Tuesday** | Counting Which One Doesn’t BelongCollections in our Home | K.N.1. Say the number sequence by 1s, starting anywhere from 1 to 30 and from 10 to 1.K.N.3. Relate a numeral, 1 to 10, to its respective quantity.K.N.5. Demonstrate an understanding of counting to 10 by* indicating that the last number said identifies “how many”
* showing that any set has only one count
 | * Counting tells how many and how much.
* Numbers are related to each other through a variety of number relationships.
* There are different but equivalent representations of numbers.
* Quantities can be represented concretely, pictorially, and symbolically.
* There are different but equivalent representations of numbers.
 |
| **Wednesday** | What do you notice?What do you wonder?Ways to Show 5 | K.N.1. Say the number sequence by 1s, starting anywhere from 1 to 30 and from 10 to 1.K.N.3. Relate a numeral, 1 to 10, to its respective quantity.K.N.4. Represent and describe numbers 2 to 10 in two parts, concretely and pictorially.K.N.6. Compare quantities, 1 to 10,* using one-to-one correspondence
* by ordering numbers representing different quantities
 | * Counting tells how many and how much.
* Numbers are related to each other through a variety of number relationships.
* There are different but equivalent representations of numbers.
* Quantities can be represented concretely, pictorially, and symbolically.
* There are different but equivalent representations of numbers.
 |
| **Thursday** | Showing Number Relationships with the Action CardsWhat do you notice?Using the Number Path | K.N.3. Relate a numeral, 1 to 10, to its respective quantity.K.N.5. Demonstrate an understanding of counting to 10 by* indicating that the last number said identifies “how many”
* showing that any set has only one count

K.N.6. Compare quantities, 1 to 10, * using one-to-one correspondence
* by ordering numbers representing different quantities
 | * Counting tells how many and how much.
* Numbers are related to each other through a variety of number relationships.
* There are different but equivalent representations of numbers.
* Quantities can be represented concretely, pictorially, and symbolically.
* There are different but equivalent representations of numbers.
* Benchmark numbers are useful for comparing, relating, and estimating numbers.
 |
| **Friday** | Counting StrategiesFind the Missing Number on the Number PathThe Number PathGame: Four Kings | K.N.1. Say the number sequence by 1s, starting anywhere from 1 to 30 and from 10 to 1.K.N.3. Relate a numeral, 1 to 10, to its respective quantity.K.N.6. Compare quantities, 1 to 10,* using one-to-one correspondence
* by ordering numbers representing different quantities
 | * Counting tells how many and how much.
* Numbers are related to each other through a variety of number relationships.
* There are different but equivalent representations of numbers.
* Quantities can be represented concretely, pictorially, and symbolically.
* There are different but equivalent representations of numbers.
* Benchmark numbers are useful for comparing, relating, and estimating numbers.
 |

Appendix C:

WEEK 2—Kindergarten—Exploring the Number 5

|  |  |  |  |
| --- | --- | --- | --- |
| **Day** | **Opening Routine and Learning Experiences** | **Learning Outcome** | **Big Idea (from** [*Glance Across the Grade****s***](https://www.edu.gov.mb.ca/k12/cur/math/glance_k-9/index.html)**)** |
| **Monday** | Frame Flash: One more, One lessComparing QuantitiesMaking a Number Path | K.N.1. Say the number sequence by 1s, starting anywhere from 1 to 30 and from 10 to 1.Subitize and name familiar arrangements of 1 to 6 dots (or objects).K.N.3. Relate a numeral, 1 to 10, to its respective quantity.K.N.5. Demonstrate an understanding of counting to 10 by* indicating that the last number said identifies “how many”
* showing that any set has only one count

K.N.6. Compare quantities, 1 to 10,* using one-to-one correspondence

by ordering numbers representing different quantities. | * Counting tells how many and how much.
* Numbers are related to each other through a variety of number relationships.
* There are different but equivalent representations of numbers.
* Quantities can be represented concretely, pictorially, and symbolically.
* There are different but equivalent representations of numbers.
 |
| **Tuesday** | Subitize and name familiar arrangements of 1 to 6 dots (or objects).Stories about 5 | K.N.3. Relate a numeral, 1 to 10, to its respective quantity.K.N.4. Represent and describe numbers 2 to 10 in two parts, concretely and pictorially.K.N.5. Demonstrate an understanding of counting to 10 by* indicating that the last number said identifies “how many”
* showing that any set has only one count
 | * Counting tells how many and how much.
* Numbers are related to each other through a variety of number relationships.
* There are different but equivalent representations of numbers.
* Quantities can be represented concretely, pictorially, and symbolically.
* There are different but equivalent representations of numbers.
 |
| **Wednesday** | What do you notice? What do you wonder?Compatible Numbers of 5 | K.N.1. Say the number sequence by 1s, starting anywhere from 1 to 30 and from 10 to 1.K.N.3. Relate a numeral, 1 to 10, to its respective quantity.K.N.4. Represent and describe numbers 2 to 10 in two parts, concretely and pictorially.K.N.6. Compare quantities, 1 to 10,* using one-to-one correspondence
* by ordering numbers representing different quantities
 | * Counting tells how many and how much.
* Numbers are related to each other through a variety of number relationships.
* There are different but equivalent representations of numbers.
* Quantities can be represented concretely, pictorially, and symbolically.
* There are different but equivalent representations of numbers.
 |
| **Thursday** | Five Frame: How many to 5?Story Problems | K.N.3. Relate a numeral, 1 to 10, to its respective quantity.K.N.4. Represent and describe numbers 2 to 10 in two parts, concretely and pictorially.K.N.5. Demonstrate an understanding of counting to 10 by* indicating that the last number said identifies “how many”
* showing that any set has only one count

K.N.6. Compare quantities, 1 to 10, * using one-to-one correspondence
* by ordering numbers representing different quantities
 | * Counting tells how many and how much.
* Numbers are related to each other through a variety of number relationships.
* There are different but equivalent representations of numbers.
* Quantities can be represented concretely, pictorially, and symbolically.
* There are different but equivalent representations of numbers.
* Benchmark numbers are useful for comparing, relating, and estimating numbers.
 |
| **Friday** | What do you notice? What do you wonder?Missing Part CardsAll about 5 | K.N.1. Say the number sequence by 1s, starting anywhere from 1 to 30 and from 10 to 1.K.N.2. Subitize and name familiar arrangements of 1 to 6 dots (or objects).K.N.3. Relate a numeral, 1 to 10, to its respective quantity.K.N.4. Represent and describe numbers 2 to 10 in two parts, concretely and pictorially.K.N.5. Demonstrate an understanding of counting to 10 by* indicating that the last number said identifies “how many”
* showing that any set has only one count

K.N.6. Compare quantities, 1 to 10,* using one-to-one correspondence
* by ordering numbers representing different quantities
 | * Counting tells how many and how much.
* Numbers are related to each other through a variety of number relationships.
* There are different but equivalent representations of numbers.
* Quantities can be represented concretely, pictorially, and symbolically.
* There are different but equivalent representations of numbers.
* Benchmark numbers are useful for comparing, relating, and estimating numbers.
 |