Mathology Kindergarten Correlation (Number) – Alberta

Organizing Idea:
Quantity is measured with numbers that enable counting, labelling, comparing, and operating.

Guiding Question: How can quantity contribute meaning to daily life?
Learning Outcome: Children investigate quantity to 10.

Knowledge	Understanding	Skills & Procedures	Mathology Little Books
Quantity can be represented using • objects • pictures • words • numerals	Quantity can be the number of objects in a set.	Recognize a number of familiar objects as a quantity.	A Warm, Cozy Nest Lots of Dots!
		Represent a quantity in different ways.	Lots of Dots!
		Relate a numeral to a specific quantity.	A Warm, Cozy Nest Lots of Dots!
Quantity can be determined by counting.	A quantity is always counted using the same sequence of words (counting principle: stable order). A quantity remains the same no matter the order in which the objects are counted (counting principle: order irrelevance). A quantity can be determined by counting each object in a set once and only once (counting principle: one-to-one correspondence).	Count within 10, forward and backward, starting at any number, according to the counting principles.	A Warm, Cozy Nest Lots of Dots! Animals Hide Dan's Doggy Daycare Acorns for Wilaiya

	The last number used to count represents the quantity (counting principle: cardinality). Any quantity of like or unlike objects can be counted as a set (counting principle: abstraction).		
A small quantity can be recognized at a glance (subitized).	Quantity can be determined without counting.	Subitize quantities to 5.	A Warm, Cozy Nest Lots of Dots!
Comparisons of quantity can be described by using words such as • more • less • same • enough • not enough	A quantity can be described relative to another quantity. A quantity can be described in relation to a purpose or need.	Compare the size of two sets using one-to-one correspondence.	Acorns for Wilaiya Spot Check! Time for Games Let's Play Waltes!
		Describe quantities relative to each other using comparative language.	Acorns for Wilaiya Spot Check! Time for Games Let's Play Waltes!
		Describe a quantity in relation to a purpose or need using comparative language.	A Warm, Cozy Nest Acorns for Wilaiya
		Solve problems in familiar situations by counting.	Dan's Doggy Daycare Time for Games Let's Play Waltes!

Guiding Question: In what ways can quantity be composed? **Learning Outcome:** Children interpret compositions of quantities within 10.			
Knowledge	**Understanding**	**Skills & Procedures**	**Mathology Little Books**
Quantity can be arranged in various ways.	A quantity remains the same no matter how the objects are grouped or arranged (counting principle: conservation).	Identify a quantity in various groups or arrangements.	Lots of Dots! Spot Check!
		Compose quantities within 10.	Lots of Dots! Dan's Doggy Daycare Let's Play Waltes!
		1. Recognize various ways to make 5 and 10.	2. Spot Check! 3. Lots of Dots! 4. Dan's Doggy Daycare

Mathology Kindergarten Correlation (Geometry) – Alberta

Organizing Idea:
Shapes are defined and related by geometric attributes.

Guiding Question: How can shape bring meaning to the space in an environment? **Learning Outcome:** Children investigate shape.			
Knowledge	**Understanding**	**Skills & Procedures**	**Mathology Little Books**
A shape can be represented using objects, pictures, or words. Familiar two- and three-dimensional shapes can be found in nature, such as • circles • triangles • cubes • cylinders First Nations, Métis, and Inuit relate specific shapes to those found in nature.	Shape is structured two-dimensional or three-dimensional space.	Relate shapes in nature to various two-dimensional and three-dimensional shapes.	The Castle Wall Zoom In, Zoom Out
		Identify familiar two- and three-dimensional shapes.	The Castle Wall Zoom In, Zoom Out
		Investigate three-dimensional shapes by rolling, stacking, or sliding.	The Castle Wall
		Describe a shape using words such as flat, curved, straight, or round.	The Castle Wall Zoom In, Zoom Out

Mathology Kindergarten Correlation (Measurement) – Alberta

Organizing Idea:
Attributes such as length, area, volume, and angle are quantified by measurement.

Guiding Question: In what ways can size be distinguished? **Learning Outcome:** Children explore size through direct comparison.			
Knowledge	**Understanding**	**Skills & Procedures**	**Mathology Little Books**
Size can be interpreted in many ways (according to measurable attributes), such as • the length of an object • how much flat space an object covers (area) • how much a container holds (capacity) • the heaviness of an object (weight)	Size describes the amount of one measurable attribute of an object or a space.	Identify measurable attributes of familiar objects to which size may refer.	To Be Long *(Addresses length)* The Best in Show *(Addresses height, length, weight, and distance)* <u>Grade 1</u> The Amazing Seed *(Addresses height, length, capacity)* **Area is not addressed*
Comparisons of size can be described by using words such as • longer • shorter • heavier • lighter • too big • too small	Size may refer to only one measurable attribute at a time. The size of two objects can be compared directly. The size of an object can be described in relation to a purpose or need.	Compare the length, area, weight, or capacity of two objects directly.	To Be Long *(Addresses length)* The Best in Show *(Addresses height, length, weight, and distance)*
		Describe the size of an object in relation to another object, using comparative language.	To Be Long *(Addresses length)* The Best in Show *(Addresses height, length, weight, and distance)*
		Describe the size of an object in relation to a purpose or need, using comparative language.	To Be Long *(Addresses length)* The Best in Show *(Addresses height, length, weight, and distance)* <u>Grade 1</u> The Amazing Seed *(Addresses height, length, capacity)*

Mathology Kindergarten Correlation (Patterns) – Alberta

Organizing Idea:
Awareness of patterns supports problem solving in various situations.

Guiding Question: How can patterns be recognized? **Learning Outcome:** Children identify and create repeating patterns.			
Knowledge	**Understanding**	**Skills & Procedures**	**Mathology Little Books**
Patterns exist everywhere. A pattern can involve elements such as • sounds • objects • pictures • symbols • actions Repeating patterns have one or more elements that repeat.	A pattern is characterized by how the elements change or remain constant.	Recognize repeating patterns encountered in daily routines and play, including songs or dances.	A Lot of Noise
		Recognize change or constancy between elements in a repeating pattern.	A Lot of Noise We Can Bead!
		Predict the next elements in a repeating pattern.	A Lot of Noise We Can Bead!
		Create a repeating pattern with up to three repeating elements.	A Lot of Noise We Can Bead!

Mathology Kindergarten Correlation (Time) – Alberta

Organizing Idea:
Duration is described and quantified by time.

Guiding Question: In what ways can time be described? **Learning Outcome:** Children interpret time as a sequence of events.			
Knowledge	**Understanding**	**Skills & Procedures**	**Mathology Little Books**
Sequence in time can be described in words, such as • first • next • today Ordinal numbers can indicate order in time.	Time can be perceived as a sequence.	Sequence events, limited to two events, according to time using words or ordinal numbers.	
		Describe daily events as occurring yesterday, today, or tomorrow.	

Mathology Kindergarten Correlation (Financial Literacy) – Alberta

Organizing Idea:
Informed financial decision making contributes to the well-being of individuals, groups, and communities.

Guiding Question: What is money? **Learning Outcome:** Children explore money.			
Knowledge	**Understanding**	**Skills & Procedures**	**Mathology Little Books**
Canadian money comes in many forms, such as • coins • bills Canadian coins and bills come in different denominations, such as • loonies • toonies • $5 • $10 Canadian coins and bills have different features, such as • colour • number • images • size	Money has unique features to represent its value.	Explore the value of Canadian coins and bills. Identify features of Canadian coins and bills.	