

Pattern Starters

Math K-2: Algebra: Patterns, Algebraic Concepts and Relationships: Patterns/Sequences/Series

From NWEA's Learning Continuum:

131-140:

- Extends a repeating pattern:
AAB, AABB, AB, ABB, ABC

141-150:

- Extends a repeating pattern:
AAB, AABB, AABC, AB, ABB, ABC, ABCD
- Identifies the repeating core in a pattern: AAAB, AAB, AB

151-160:

- Extends a repeating pattern: ABB, ABC
- Identifies the repeating core in a pattern: ABB, ABCC

161-170:

- Creates a new pattern with the same AAB structure as a pattern shown
- Creates a new pattern with the same ABB structure as a pattern shown
- Extends a decreasing pattern with objects based on the "one less" rule
- Identifies the repeating core in an ABC pattern
- Identifies the repeating core in an ABCC pattern

171-190:

- Extends a decreasing pattern with objects based on the "one less" rule
- Extends a decreasing pattern with objects based on the "two less" rule
- Extends a growing pattern with objects based on the "one more" rule
- Extends a growing pattern with objects based on the "two more" rule

191-200:

- Identifies the "add 3" rule in a growing pattern of objects
-

For All Students:

Working with individual students or in small groups, demonstrate patterns the pieces or using colored blocks or other solid-colored objects. Start a pattern and have students complete it. Repeat with other patterns, each more than once as time allows and based on students' need.

Resources: Solid color objects such as blocks or balls, pattern pieces and starters, printed and cut out

Means of Assessment: Observation, correctly completed patterns

Lower Lesson/Activity:

- Patterns: AAB, AABB, AB, ABB, ABC

After introduction and practice, assign students to complete the patterns individually or with a partner. When patterns are complete, have students use remaining pattern pieces to show the repeating core for each pattern.

- Level 1 Pattern Starters

Middle Lesson/Activity:

- Patterns: AABC, ABCC, ABCD, decreasing patterns (one less)

After introduction and practice, assign students to complete the patterns individually or with a partner. When patterns are complete, have students use remaining pattern pieces to show the repeating core for each pattern. Then have students use the loose pieces to create a new pattern with each pattern structure.

- Level 2 Pattern Starters

Higher Lesson/Activity:

Patterns: decreasing (one, two less), increasing (one, two more)

After introduction and practice, assign students to complete the patterns individually or with a partner. Then have students use the loose pieces to create a new pattern with each pattern structure.

- Level 3 Pattern Starters

Closure:

- Review patterns. Encourage students to look for patterns outside of school.