DMT INSTITUTE

Developing Mathematical Thinking Institute (DMTI)

Professional Development

Curricular Resources

Assessment

Jonathan Brendefur, PhD

Grade 1: Data - Categorical

DMTI VARIED PRACTICE

DMTI Varied Practice Worksheets

This PowerPoint or PDF displays the worksheets that have varied situations (context, visual, equations, and other mathematical models) for children to work on. By completing these worksheets, children increase their foundational skills in the topic, which will help them with these standards and future mathematical topics.

1. If using a journal, have children present the worksheet and complete all the problems.

2. Or print the 'Varied Practice Worksheet Slides' for them to work on. Then, you can return to the PowerPoint or PDF to look at the keys to check their work.

DMT 🔷 **INSTITUTE**

Grade 1: Data - Categorical

Materials Needed

Print Bar Graph Template (or create own graph on blank paper)
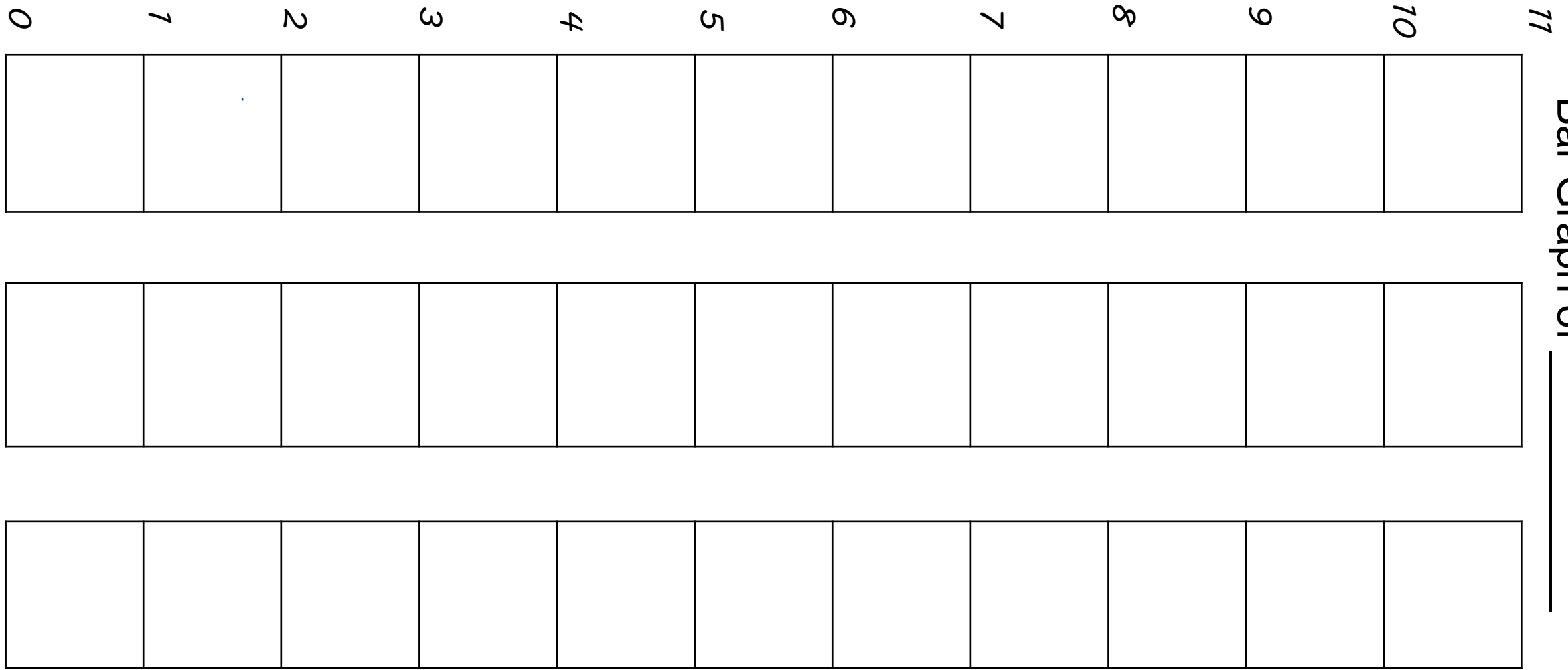
Blank paper

Grade 1: Data - Categorical

Instructions

Part 1

1. Choose a topic from below or create your own topic and three different categories within that topic.
  - Ice cream: vanilla, chocolate, strawberry
  - Sports: soccer, football, baseball
  - Color: red, blue, yellow
  - Pizza: cheese, pepperoni, ham

2. Survey 10-20 different people on their favorite choice from the chosen topic and categories. Record the data on blank paper.

3. Transfer the data into a bar graph representation (use template or create own).

4. Color a box for each data entry (use any color) or put an X in the box.

Bar Graph Template

0   1   2   3   4   5   6   7   8   9   10   11

Bar Graph of _____

Bar Graph Template

Number of People

0   1   2   3   4   5   6   7   8

Favorite Ice Cream Flavor

Vanilla

Chocolate

Strawberry

Grade 1: Data - Categorical

Materials Needed

Optional: Blank paper

Instructions

Part 2

1. Child answers questions verbally or in written form.

NOTES:

1. Feel free to add your own questions to the list.

2. No answer key is provided since the answers will all depend upon the data collected.

Grade 1: Data - Categorical Questions

1. How many people liked _____ and _____ ?

2. Which category was the favorite?

3. Which category was the least favorite?

4. How many people are represented in the graph? How could you answer this besides counting one at a time?

5. How many are together with the most and the least?

6. How many more people liked _____ than _____?

7. How many fewer people liked _____ than _____ ?

8. Order the choices, least favorite to most favorite.

9. Order the choices, most favorite to least favorite.

10. If you were to survey one more person, what do you predict their answer would be? Why would you make that choice?

"The Developing Mathematical Thinking Institute (DMTI) is dedicated to enhancing students' learning of mathematics by supporting educators in the implementation of research-based instructional strategies through high-quality professional development, curricular resources and assessments."

For more information contact
Dr. Brendefur at **jbrendefur@dmtinstitute.com**