

# Super Fun Lesson Using Pictographs and Smarties



Smarties?!

## Remember these terms?

Maximum Smallest

Minimum

Range

Biggest

Greatest

Least



### Smarties Estimation Sheet






| <b>Smarties Colour</b> | How many I think there are (guess) | How many there actually are (real) | How much I was off by (difference between real and guessed) | Order from greatest to least (number them!) |
|------------------------|------------------------------------|------------------------------------|---|---|
| Red                    | 10                                 | 9                                  |   |   |
| Purple                 | 15                                 | 18                                 |   |   |
| Green                  | 10                                 | 15                                 |   |   |
| Pink                   | 12                                 | 17                                 |   |   |
| Orange                 | 5                                  | 8                                  |   |   |
| Brown                  | 7                                  | 14                                 |   |   |
| Yellow                 | 20                                 | 14                                 |   |   |
| <b>Total</b>           | 79                                 | 95                                 | .   | .   |


# Instructions

1. Use the **Smarties Estimation Sheet** to guess how many of each colour are in the box. Also guess the total number of Smarties in the box.
2. Count how many of each colour you have, and the total.
3. How much were you off by? Subtract the real number and the number you guessed.
4. Order the colours from greatest to least.

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| Friend | Number of Candies Collected  | Frequency |
|--------|--|-----------|
| Sam    |  |           |
| Steve  |  |           |
| Tony   |  |           |
| Jill   |  |           |
| Stacy  |   |           |

 = 5 Candies

# Pictograph Instructions

1. Label your top and side axes. Label your title.
2. Line up all your Smarties by colour.
3. Count them.
4. Think about what scale you will use. Make sure it will fit in the pictograph (limited to 10 spaces).
5. Fill in your scale value.
6. With coloured pencil or marker, draw in your Smarties pictures on your pictograph.
7. Write the frequency (number of each colour).





















### Smarties Challenge Analysis Sheet

|   |  |
|---|--|
| Which color did your smarties box have the <b>most</b> of?  |  |
| Which color did your smarties box have the <b>least</b> of?   |  |
| What is the difference between the <b>most</b> smarties color and the <b>least</b> smarties color?        |  |
| How many smarties do you have if you only count the <b>red, blue, and purple</b> ?                        |  |
| How many smarties do you have if you only count the _____, _____, and _____?<br>(Choose your own colours) |  |

## Smarties Challenge - Self Assessment

Name:

Date:

|   | Always   | Sometimes  | Rarely   |
|---|--|--|--|
| 1. I like using smarties to make a graph.                         |   |   |   |
| 2. I was able to make good estimates and record the data.         |   |   |   |
| 3. I was able to sort and count my smarties according to colour.  |   |   |   |
| 4. I was able to make a pictograph easily.                        |   |   |   |
| 5. I can explain my graph to others and answer all the questions. |   |   |   |
| 6. Smarties challenge was easy for me.                            |  |  |  |

# **Textbook Questions on Pictographs**

Grade 4 Math Makes Sense Textbook

- Page 171, Question 1 and 5
- Page 179, Question 1 to 4

Grade 5 Math Makes Sense Textbook

- Page 159, Question 3