Shaded Share Sort

Compare two groups using segmented bars.

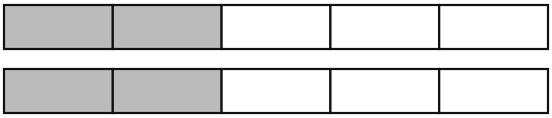
8A.DSP.C "The association between two categorical variables is typically represented by using two-way tables and segmented bar graphs."

NAME _____ DATE _____

SAME SHARE

Each bar represents a group. When the shaded share is equal in both bars, the graph shows no association between the group and the shaded response.

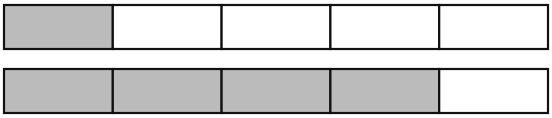
Both bars have 2 of 5 parts shaded.



DIFFERENT SHARE

When the shaded share is not equal in the two bars, the graph shows an association between the group and the shaded response.

One bar has 1 of 5 parts shaded. The other has 4 of 5 parts shaded.



1 SORT

8 items

Circle SAME or DIFFERENT for each figure, then choose one figure from each category and explain how the shaded shares show your choices.

1.

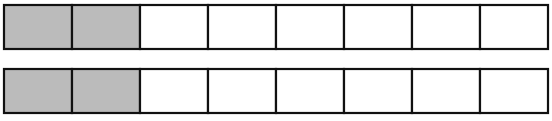


Figure 1

SAME DIFFERENT

2.

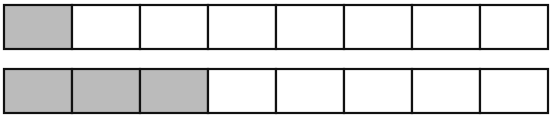


Figure 2

SAME DIFFERENT

3.

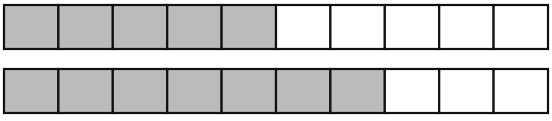


Figure 3

SAME DIFFERENT

4.



Figure 4

SAME **DIFFERENT**

5.

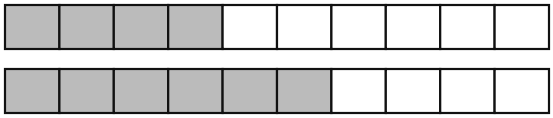


Figure 5

SAME **DIFFERENT**

6.



Figure 6

SAME **DIFFERENT**

7.

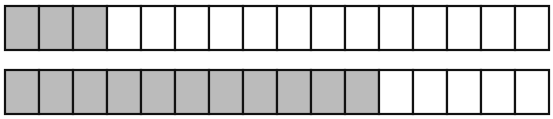


Figure 7

SAME **DIFFERENT**

8.



Figure 8

SAME **DIFFERENT**

2 PROVE IT

Explain your thinking

Choose one figure from each category and explain how the shaded shares show your choices.

ITEM # _____ **HOW I KNEW** _____

ITEM # _____ **HOW I KNEW** _____

3 MAKE YOUR OWN

One of each

Draw one new pair of bars with the SAME shaded share and one new pair with DIFFERENT shaded shares.

SAME

DIFFERENT

CHALLENGE

Draw two bars divided into different numbers of parts but showing the SAME shaded share, and explain why the shares match.

ANSWER KEY

Shaded Share Sort

GRADE 8 · 8A.DSP.C

PART 1 · SORT

#	ITEM	CATEGORY	WHY
1	Figure 1 (fractionbars)	**SAME**	Both bars show 2/8 shaded.
2	Figure 2 (fractionbars)	**DIFFERENT**	The shaded shares are 1/8 and 3/8.
3	Figure 3 (fractionbars)	**DIFFERENT**	The shaded shares are 5/10 and 7/10.
4	Figure 4 (fractionbars)	**SAME**	Both bars show 9/12 shaded.
5	Figure 5 (fractionbars)	**DIFFERENT**	The shaded shares are 4/10 and 6/10.
6	Figure 6 (fractionbars)	**DIFFERENT**	The shaded shares are 2/12 and 8/12.
7	Figure 7 (fractionbars)	**DIFFERENT**	The shaded shares are 3/16 and 11/16.
8	Figure 8 (fractionbars)	**SAME**	Both bars show 7/10 shaded.

PART 2 · PROVE IT

Task: Choose one figure from each category and explain how the shaded shares show your choices.
Accept any explanation that names the deciding feature from the rule box for the chosen item.

PART 3 · MAKE YOUR OWN (SAMPLE ANSWERS)

- **SAME**: Two bars divided into 6 parts, with 3 parts shaded in each.
- **DIFFERENT**: Two bars divided into 6 parts, with 1 part shaded in one bar and 5 parts shaded in the other.

Challenge: One bar has 2 of 4 parts shaded, and the other has 4 of 8 parts shaded. Both show one-half shaded.

For Part 2, accept one SAME figure and one DIFFERENT figure with explanations that compare the shaded shares. For Part 3, check the shares, not just the numbers of shaded parts.