TRUNCATED AXIS

prompt="""

Analyze the given chart and determine the correct answer to the multiple-choice question. Select the option number that best aligns with the data presented.

Additionally, provide a concise yet comprehensive 1 line explanation justifying the selected option. The explanation should include:

- 1. The rationale for choosing the correct answer.
- 2. The reasons why the other options are incorrect.

The output should strictly follow the given format:

Option $\{1-7\}$: $\{1 \text{ line explanation covering both selection and elimination reasons}\}$

Question: How would you rate the difference in values between the first bar and the second bar?

- 1. No difference: The values of the two bars are exactly equal.
- 2. Extremely small difference: The difference is less than 5% of the larger value.
- 3. Very small difference: The difference is 5% to less than 10% of the larger value.
- 4. Small difference: The difference is 10% to less than 25% of the larger value.
- 5. Large difference: The difference is 25% to less than 50% of the larger value.
- 6. Very large difference: The difference is 50% to less than 100% of the larger value.
- 7. Extremely large difference: The difference is 100% or more (i.e., one bar is at least double the other).

INVERTED AXIS

prompt="""

Analyze the given chart and determine the correct answer to the multiple-choice question. Select the option number that best aligns with the data presented.

Additionally, provide a concise yet comprehensive 1 line explanation justifying the selected option. The explanation should include:

- 1. The rationale for choosing the correct answer.
- 2. The reasons why the other options are incorrect.

The output should strictly follow the given format:

Option $\{1-7\}$: $\{1 \text{ line explanation covering both selection and elimination reasons}\}$

Question: How strongly do you agree that the trend shows an overall increase?

- 1. Strongly Disagree: The y-values decrease for 100% of the x-axis range, with a strong and consistent downward trend.
- 2. Disagree : The y-values decrease for 50% to less than 100% of the x-axis range.
- 3. Somewhat Disagree : The y-values decrease for 1% to less than 50% of the x-axis range.
- 4. Neutral: The y-values neither show a clear increase nor a decrease across the x-axis.
- 5. Somewhat Agree : The y-values increase for 1% to less than 50% of the x-axis range.
- 6. Agree : The y-values increase for 50% to less than 100% of the x-axis range.
- 7. Strongly Agree : The y-values increase for 100% of the x-axis range, with a strong and consistent upward trend.

ASPECT RATIO

prompt="""

Analyze the given chart and determine the correct answer to the multiple-choice question. Select the option number that best aligns with the data presented.

Additionally, provide a concise yet comprehensive 1 line explanation justifying the selected option. The explanation should include:

- 1. The rationale for choosing the correct answer.
- 2. The reasons why the other options are incorrect.

The output should strictly follow the given format:

Option $\{1-7\}$: $\{1 \text{ line explanation covering both selection and elimination reasons}\}$

Question: How strong is the trend depicted in the chart?

Answer Options:

- 1. Neutral: The trend is neither clearly increasing nor decreasing, with no consistent direction.
- 2. Very Weak: The trend is nearly flat, with barely any noticeable change, and occupies less than 10% of the x-axis.
- 3. Weak: The trend is shallow and difficult to distinguish, with small changes in y-values, and occupies around 10% to 30% of the x-axis.
- 4. Slightly Weak: The trend is present but not very strong, showing fluctuations, and occupies around 30% to 50% of the x-axis.
- 5. Slightly Strong: The trend is noticeable and somewhat steady, with a clear direction, and occupies around 50% to 70% of the x-axis.
- 6. Strong: The trend is distinct and sustained, with a well-defined direction, and occupies around 70% to 90% of the x-axis.
- 7. Very Strong : The trend is steep and consistent, dominating the entire chart, and occupies more than 90% of the x-axis.

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DATA VISUAL DISPROPORTION

prompt="""

Analyze the given chart and determine the correct answer to the multiple-choice question. Select the option number that best aligns with the data presented.

Additionally, provide a concise yet comprehensive 1 line explanation justifying the selected option. The explanation should include:

- 1. The rationale for choosing the correct answer.
- 2. The reasons why the other options are incorrect.

The output should strictly follow the given format:

Option $\{1-7\}$: $\{1 \text{ line explanation covering both selection and elimination reasons}\}$

Question: Which statement best describes the disparity between the quantities represented by the circles?

- 1. There is no disparity: The circles represent equal quantities.
- 2. The disparity is very small: The larger circle represents 1x to 1.5x the quantity of the smaller circle.
- 3. The disparity is small: The larger circle represents 1.5x to 2x the quantity of the smaller circle.
- 4. The disparity is moderate: The larger circle represents 2x to 3x the quantity of the smaller circle.
- 5. The disparity is large: The larger circle represents 3x to 5x the quantity of the smaller circle.
- 6. The disparity is very large: The larger circle represents 5x to 10x the quantity of the smaller circle.
- 7. The disparity is extremely large: The larger circle represents more than 10x the quantity of the smaller circle.

DUAL AXIS

prompt="""

Analyze the given chart and determine the correct answer to the multiple-choice question. Select the option number that best aligns with the data presented.

Additionally, provide a concise yet comprehensive 1 line explanation justifying the selected option. The explanation should include:

- 1. The rationale for choosing the correct answer.
- 2. The reasons why the other options are incorrect.

The output should strictly follow the given format:

Option $\{1-7\}$: $\{1 \text{ line explanation covering both selection and elimination reasons}\}$

Question: How would you rate the difference between the trends of the two lines in the chart?

- 1. No Similarity: The trend is similar for 0% of the chart, showing completely different movements.
- 2. Extremely Small Similarity: The trend is similar for less than 5% of the chart, with only brief matching segments.
- 3. Very Small Similarity: The trend is similar for 5% to less than 10% of the chart, with minimal overlap.
- 4. Small Similarity: The trend is similar for 10% to less than 25% of the chart, but differences dominate.
- 5. Large Similarity: The trend is similar for 25% to less than 50% of the chart, showing a mix of similarities and differences.
- 6. Very Large Similarity: The trend is similar for 50% to less than 100% of the chart, with only minor differences.
- 7. Extremely Large Similarity: The trend is similar for 100% of the chart, following the same direction, slope, and fluctuations.

DISTORTED PROJECTION

prompt="""

Analyze the given chart and determine the correct answer to the multiple-choice question. Select the option number that best aligns with the data presented.

Additionally, provide a concise yet comprehensive 1 line explanation justifying the selected option. The explanation should include:

- 1. The rationale for choosing the correct answer.
- 2. The reasons why the other options are incorrect.

The output should strictly follow the given format:

Option $\{1-7\}$: $\{1 \text{ line explanation covering both selection and elimination reasons}\}$

Question: Which statement best describes the disparity between the highest and the second highest quantity in the pie chart?

Answer Options:

- 1. No disparity: The two largest segments represent equal quantities.
- 2. Extremely small disparity: The largest segment represents 1x to more than 1.25x the quantity of the second-largest segment.
- 3. Very small disparity: The largest segment represents 1.25x to more than 1.5x the quantity of the second-largest segment.
- 4. Small disparity: The largest segment represents 1.5x to more than 2x the quantity of the second-largest segment.
- 5. Moderate disparity: The largest segment represents 2x to more than 3x the quantity of the second-largest segment.
- 6. Large disparity: The largest segment represents 3x to more than 5x the quantity of the second-largest segment.
- 7. Very large disparity: The largest segment represents more than 5x the quantity of the second-largest segment.

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Inappropriate Continuous Encoding

prompt="""

Analyze the given chart and determine the correct answer to the multiple-choice question. Select the option number that best aligns with the data presented.

Additionally, provide a concise yet comprehensive 1 line explanation justifying the selected option. The explanation should include:

- 1. The rationale for choosing the correct answer.
- 2. The reasons why the other options are incorrect.

The output should strictly follow the given format:

Option $\{1-7\}$: $\{1 \text{ line explanation covering both selection and elimination reasons}\}$

Question: How would you describe the overall trend depicted in the chart?

- 1. No Trend: The data primarily represents categorical values.
- 2. Extremely Weak: The y-values change for 1% to less than 5% of the x-axis range, with an almost negligible trend.
- 3. Very Weak: The y-values change for 5% to less than 10% of the x-axis range, with a slight increasing or decreasing tendency.
- 4. Weak: The y-values change for 10% to less than 20% of the x-axis range, showing a minor but noticeable trend.
- 5. Strong: The y-values change for 20% to less than 50% of the x-axis range, with a somewhat clear upward or downward pattern.
- 6. Very Strong: The y-values change for 50% to less than 75% of the x-axis range, following a well-defined increasing or decreasing trend.
- 7. Extremely Strong: The y-values change for 75% to 100% of the x-axis range, with a strong and consistent upward or downward trend.

Inappropriate Categorical Encoding

prompt="""

Analyze the given chart and determine the correct answer to the multiple-choice question. Select the option number that best aligns with the data presented.

Additionally, provide a concise yet comprehensive 1 line explanation justifying the selected option. The explanation should include:

- 1. The rationale for choosing the correct answer.
- 2. The reasons why the other options are incorrect.

The output should strictly follow the given format:

Option $\{1-7\}$: $\{1 \text{ line explanation covering both selection and elimination reasons}\}$

Question: How would you describe the overall trend depicted in the chart?

- 1. Neutral: There is no significant upward or downward trend in the chart.
- 2. Extremely Weak: The y-values change for 1% to less than 5% of the x-axis range, with an almost negligible trend.
- 3. Very Weak: The y-values change for 5% to less than 10% of the x-axis range, with a slight increasing or decreasing tendency.
- 4. Weak: The y-values change for 10% to less than 20% of the x-axis range, showing a minor but noticeable trend.
- 5. Strong: The y-values change for 20% to less than 50% of the x-axis range, with a somewhat clear upward or downward pattern.
- 6. Very Strong: The y-values change for 50% to less than 75% of the x-axis range, following a well-defined increasing or decreasing trend.
- 7. Extremely Strong: The y-values change for 75% to 100% of the x-axis range, with a strong and consistent upward or downward trend.