## Extreme Container Design Project Worksheet

**Researcher Name(s): _____ _____ _____**

**Date: _____/_____/_____**

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### Activity 1: Material Research:

What specific questions are you trying to answer through your research?

- _____
- _____
- _____

2. **Hypothesis (if applicable):**
    - What do you predict the outcome of your research will be? _____

_____

_____

_____

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**Section 2: Research Methods**

1. **Sources of Information:**
    - List the types of sources you use (e.g., books, websites, interviews).
        i. _____
        ii. _____
        iii. _____
        iv. _____
        v. _____
2. **Search Strategies:**
    - Describe how you will search for information (e.g., keywords, databases).

_____

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3. **Data Collection Tools:**
    - Specify any tools or instruments you will use to collect data (e.g., surveys, observations).

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1. **Relevant Studies or Cases:**
    - List specific studies or cases that are relevant to your research.

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**Section 3: Data Collection and Analysis**

1. **Data Collected:**
    - Provide a summary or outline of the data you have gathered.

2. **Data Analysis:**
    - Record any significant findings or insights from your data analysis.

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**Section 4: Experimental Data**

### Experimental Setup:

- Describe the setup used for experiments.

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_____
_____
_____

2. **Data Table:**

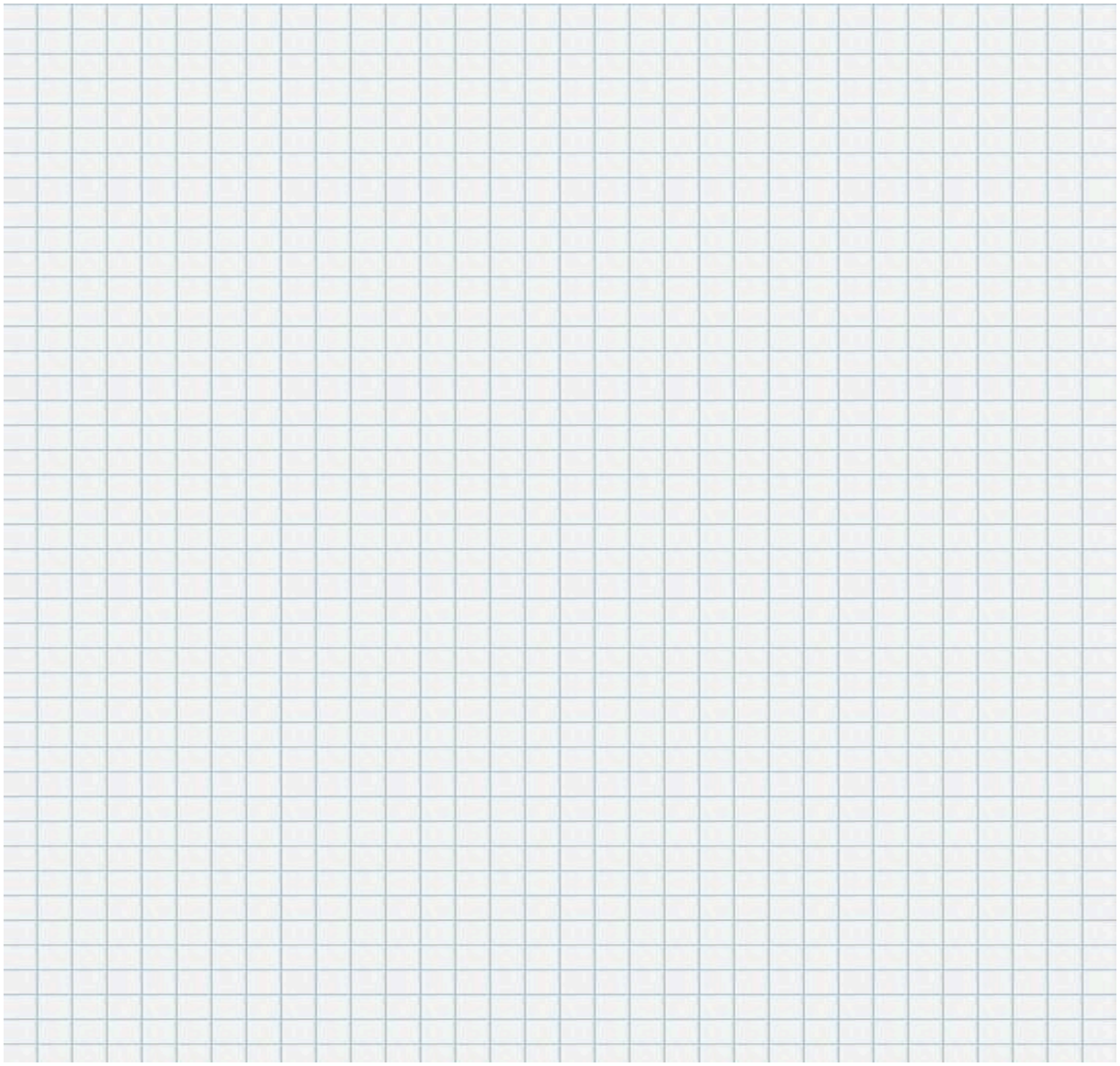
| Metal Name | Time (min) | Temperature Changes (°C) | Boiling Point (°C) | Melting Point (°C) |
|---|---|---|---|---|
| Gallium | | | | |
| Stainless Steel | | | | |
| Iron | | | | |
| Aluminum | | | | |

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**Section 5: Sketch of Container Design**

1. **Directions:**
    - Use the graph paper to sketch the design of your container. Include dimensions, materials, and any other relevant details.

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**Activity 2: Predicting Material Behavior**

**Conclusion and Recommendations**

What predictions can your team make about how your chosen material will change its state (solid, liquid, gas) in extreme conditions. Please justify your predictions based on your research.

1. **Conclusions/Predictions:**
    - Summarize the conclusions you have drawn from your research.

_____
_____
_____
_____
_____

2. **Recommendations:**
    - Suggest any actions or further research that should be considered based on your findings.

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**Section 7: References**

- **List of References:**
    - Include all the sources you have cited or consulted during your research.

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**Notes:**

- Use additional sheets if needed to provide more detailed information.
- Maintain a clear and organized format to facilitate easy reference and review.
- Ensure all group members contribute to the completion of this worksheet.