

Name _____

Understanding the Difference

Open-Ended Response Questions

1. Think about a bicycle and identify the simple machines that are part of its construction. Explain how these simple machines work together to make the bicycle function.
2. Consider a situation where you need to lift a heavy object. Explain how you could use a simple machine to make this task easier, and provide an example of the type of simple machine you would use.
3. Discuss the role of mechanical advantage in the design of tools and machines. Why is it important for engineers and designers to consider mechanical advantage when creating machines for various purposes?
4. Imagine a world without simple machines. How would our daily lives, technology, and industries be affected? Provide examples of everyday tasks that would be more challenging without the use of simple machines.

