🎬 Science in the Movies: WALL-E (2008)

Grade Level: 5–9
Topics: Environmental Science · Robotics · Earth Systems · Sustainability
Scene: WALL-E discovers a living plant on the abandoned Earth.
Approx. Timestamp: 00:27:00 – 00:30:00

🌱 Before You Watch

Think–Pair–Share:

1. What happens to the environment when humans stop taking care of it?
2. What are some ways technology can both harm and help Earth?
3. Why might scientists send robots instead of humans to explore dangerous places?

💭 **Prediction Time!**
What do you think WALL-E will find that could change everything?

🧪 A. Science Connections

1. What environmental problems do you notice on Earth in the movie?
2. How does WALL-E act like a scientist or engineer during his daily work?
3. What clues show that the planet's ecosystems are beginning to recover?
4. How does the discovery of the plant represent hope for renewal?

📊 B. Data & Analysis

1. If WALL-E can compact **500 kg of trash per day**, how much trash would he process in one week?
2. The spaceship Axiom travels **600 km above Earth**. If it orbits every **2 hours**, how many orbits does it complete in one day?
3. How could data collection by robots like WALL-E help scientists monitor environmental recovery?

🌍 C. Real-World Connection

1. What are some current technologies or robots designed to clean oceans or reduce waste?
2. How do renewable energy sources (solar, wind) relate to WALL-E's survival?
3. Why is it important for scientists and engineers to work together for sustainability?

💡 D. Reflection

- What message does *WALL-E* send about human responsibility toward Earth?
- How does empathy for the environment motivate innovation?
- Complete this sentence: ✨ *"Science helps our planet by..."*

🧮 Did You Know?

WALL-E's name stands for **Waste Allocation Load Lifter – Earth-Class.**
NASA engineers actually design similar **autonomous robots** to collect samples on Mars and monitor climate change on Earth.

💭 "Technology and compassion can work together to heal our planet."

🎯 Extension (Optional)

Design your own **Eco-Robot!**
Draw or describe a robot that solves one environmental problem.
Label its sensors, power source, and tools. Explain how it gathers and uses scientific data.
