

Virginia Connects Markets

Analyze how technology links Virginia businesses to wider economies.

CE.12.g “analyzing the role of Virginia in the United States and global economies, with an emphasis on the effect of technological innovations.”

NAME _____

DATE _____

1 READ AND MARK _____ Read it twice

YOUR JOB Underline each technology named in the passage. In the margin, number three sentences that show how technology affects jobs, costs, movement of goods, or access to markets.

Technology at Work in Virginia

- ① Virginia’s location and technology help connect local businesses to customers far away. At the Port of Virginia, giant cranes lift standardized shipping containers from ships to trucks and trains. Computer systems track each container and help workers plan where it should go. These tools speed the movement of furniture, clothing, machinery, and other goods. When imports arrive quickly, Virginia stores and factories can receive supplies. When exports leave efficiently, Virginia companies can sell products to buyers in other states and nations.
- ② Technology also supports a major service industry in Virginia: data centers. These buildings hold computers that store and process digital information for websites, businesses, and government agencies. Fast fiber-optic cables and reliable electricity allow data to move quickly between Virginia and users around the world. A company in another state may use a Virginia data center to run an online store. This connection creates jobs for construction workers, technicians, security staff, and engineers, while helping digital businesses serve national and global customers.
- ③ Virginia farms use another set of innovations. Some growers use GPS-guided equipment and soil sensors to place seed, water, or fertilizer where it is needed. Using fewer inputs can lower costs and reduce waste. Farmers can also use online market information to compare prices and find buyers beyond their local area. If a Virginia food producer sells packaged products through a digital ordering system, it can reach customers across the United States or overseas. Technology changes both how goods are made and how markets are reached.

2 ANSWER WITH EVIDENCE _____ Use the passage

1 How do cranes and computer systems at the Port of Virginia help Virginia businesses take part in trade?

2 Explain how fast fiber-optic cables and reliable electricity connect Virginia data centers to the national and global economy.

3 Which farm technologies can lower costs and reduce waste? Explain why.

4 Give one example from the passage of Virginia connecting to the United States economy and one example of Virginia connecting to the global economy.

3 YOUR TURN _____ Your own words

Choose a Virginia product or service not named in the passage. In three sentences, describe one technology it could use, explain how the technology would change its work, and explain how it could connect the business to customers or suppliers beyond Virginia.

PART 1 • READ AND MARK

Underline each technology named in the passage. In the margin, number three sentences that show how technology affects jobs, costs, movement of goods, or access to markets. Accept any marking that follows this job and points at the right text.

PART 2 • ANSWERS

#	QUESTION	ANSWER
1	How do cranes and computer systems at the Port of Virginia help Virginia businesses take part in trade?	They move and track shipping containers efficiently, helping businesses receive imported supplies and send exports to buyers in other states and nations.
2	Explain how fast fiber-optic cables and reliable electricity connect Virginia data centers to the national and global economy.	They allow digital information to move quickly between Virginia and users around the world. Companies elsewhere can use Virginia data centers, and digital businesses can serve national and global customers.
3	Which farm technologies can lower costs and reduce waste? Explain why.	GPS-guided equipment and soil sensors can place seed, water, or fertilizer only where needed. Using fewer inputs can lower costs and reduce waste.
4	Give one example from the passage of Virginia connecting to the United States economy and one example of Virginia connecting to the global economy.	United States example: a company in another state uses a Virginia data center, or a food producer reaches customers across the United States. Global example: Virginia exports goods to other nations, data centers serve users around the world, or food products reach overseas customers.

PART 3 • YOUR TURN (SAMPLE ANSWER)

A Virginia medical-device company could use automated testing machines and an online inventory system. The machines could check products quickly, while the inventory system could show workers which supplies to order. The company could sell devices to hospitals in other states and arrange orders for buyers in other countries.

Accept equivalent explanations that accurately connect a named technology to movement of goods or data, lower costs, jobs, or wider markets. For the open response, accept any plausible Virginia product or service and a clear, logical economic effect of technology.