Teacher Answer Key

Case Study

1. They filter massive amounts of water daily, cleaning and oxygenating reefs.

2. Bacteria provide nutrients and compounds; humans may use these chemicals for medicine.

Multiple Choice

1. B

2. D

3. A

Matching

1-E, 2-D, 3-A, 4-C, 5-B

Fill-in-the-Blank

1) Porifera, 2) Amoebocytes, 3) filtering

Short Answer (Sample Responses)

Q1: Sponges recycle nutrients by filtering organic matter and releasing nutrients that support corals.

Q2: Threats like disease, climate change, and overharvesting reduce sponge populations, harming reef health.

Q3: Sponge compounds may lead to new medicines, including antibiotics and antivirals.