Teacher Answer Key

Case Study

1. Glow sticks were first developed in the 1970s for military use as emergency lights. Their safety and portability made them popular for recreational use at concerts and holiday celebrations, including Halloween.

2. Breaking one open exposes you to the chemicals inside, which can irritate skin or cause other health problems. Sealed and used the way it's meant to be, the same stick is safe.

Multiple Choice

1. A

2. D

3. A

Matching

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

Fill-in-the-Blank

1) Chemiluminescence, 2) Military, 3) Shorter

Short Answer (Sample Responses)

Q1: They do not produce flames, heat, or sparks, making them child-friendly and safe indoors.

Q2: The reaction transfers chemical energy into light energy, visible as glowing colors.

Q3: It shows how scientific inventions can move from practical uses into cultural traditions.