SN EDUCATOR GUIDE November 6, 2021 **Marie Antoinette's Letters Are Uncensored by X-rays**

Student Comprehension Worksheet

Directions: Read the online *Science News* article "<u>Ink analysis reveals Marie Antoinette's letters' hidden</u> words and who censored them," which details how scientists used chemistry to unravel a mystery from the French Revolution, and answer the questions below. A version of the article, "Marie Antoinette's letters are uncensored by X-rays," appears in the November 6, 2021 issue of *Science News*.

1. Who was Marie Antoinette? Who did she write secret letters to while imprisoned during the French Revolution?

2. What mysteries surround the letters?

3. What technology helped scientists reveal the scribbled-out words? How does the technology work?

4. How did the technology reveal the scribbled-out words? What are the words?

5. Who crossed out the words, and how did scientists identify the person?

6. What is one mystery that remains unsolved?