1. What is the carbon cycle, and how does it control Earth’s climate? (See The Carbon Cycle)

2. How does carbon sequestration typically happen? What conditions might lead to greater levels of sequestration? (See How is carbon normally sequestered?)

3. What is the role of earthquakes and landslides in carbon sequestration? How does this differ from more typical sequestration processes? (See How do earthquakes provide a sequestration ‘shortcut’?)

4. What did Bob and his collaborators learn from the Wenchuan earthquake? What had to be in place to make these findings possible? (See What challenges has this research faced?)

5. What role do sediments play in Bob’s research? What tools are needed for them to be informative? (See How are sediments useful for Bob and his team?)

6. Bob’s team uses carbon isotopes to measure two types of sediment qualities. What are these qualities, and how do the techniques differ? (See How can researchers determine sediments’ origins? and How can sediments be dated?)

7. Do you think earthquakes play a significant role in mitigating climate change? What other forms of sequestration might be more effective? (See So could earthquakes help tackle the climate crisis?)

8. What are some examples of geochemistry being used in scientific research? (See What is geochemistry?)

9. Describe three career postgraduate career paths in geochemistry. (See What employment opportunities does geochemistry offer?)

More Resources:

• The Khan Academy provides a good introductory article to the carbon cycle. Find it here: https://www.khanacademy.org/science/biology/ecology/biogeochemical-cycles/a/the-carbon-cycle

• The European Space Agency has a fascinating video showing how the carbon cycle fluctuates over time, seasonally or over decades. Watch it here: https://www.esa.int/ESA_Multimedia/Videos/2018/02/Carbon_Cycle