

Section 22–2 Bryophytes (pages 556–559)



TEKS FOCUS: 13B Methods of reproduction, growth, and development;
TEKS SUPPORT: 8A Classify organisms

This section identifies the adaptations that enable bryophytes—mosses and their relatives—to live on land. It also identifies three groups of bryophytes and describes how bryophytes reproduce.

Introduction (page 556)

1. Mosses and their relatives are generally called _____.
2. Circle the letter of the substance that bryophyte life cycles are highly dependent on.
 - a. carbon dioxide
 - b. soil
 - c. oxygen
 - d. water
3. How does the lack of vascular tissue keep bryophytes small? _____

4. Why must bryophytes live in places where there is standing water for at least part of the year? _____

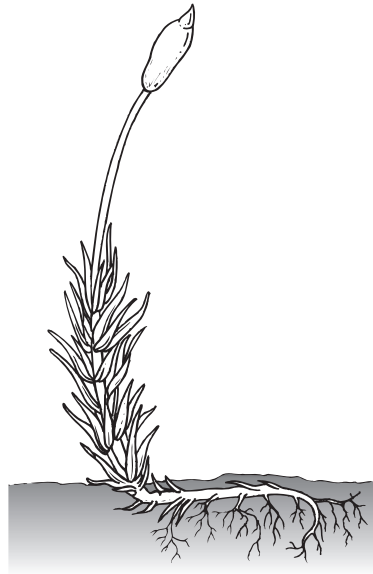
Groups of Bryophytes (pages 556–557)

5. What are the three groups of plants that bryophytes include?
 - a. _____
 - b. _____
 - c. _____
6. Where would you expect to find mosses growing? _____

7. Why are mosses the most abundant plants in polar regions? _____

8. Why is the thin, upright shoot of a moss plant not considered to be a true stem? _____

9. Complete the illustration by identifying which part of a typical moss plant is the gametophyte and which part is the sporophyte.



10. What do the mature gametophytes of liverworts look like? _____

11. What are gemmae? _____

12. How do liverworts reproduce asexually? _____

13. What does the hornwort sporophyte look like? _____

14. In what sort of soil would liverworts and hornworts be expected to be found?

Life Cycle of Bryophytes (pages 558–559)

15. In bryophytes, which stage of the life cycle carries out most of the plant’s photosynthesis? _____

16. What fact of reproduction limits the distribution of bryophytes to habitats near water?

17. When a moss spore germinates, what does it grow into? _____

18. Complete the table about bryophyte reproductive structures.

BRYOPHYTE REPRODUCTIVE STRUCTURES

Structure	Description	Structure Produces
	Male reproductive structure	
	Female reproductive structure	

19. What does the zygote depend on for water and nutrients? _____

Human Use of Mosses (page 559)

20. In certain environments, the dead remains of sphagnum accumulate to form thick deposits of _____.

21. Why do gardeners add peat moss to soil? _____
