Welcome to the South Carolina State Museum! We hope you have fun exploring and learning more about our wonderful state. Begin your journey on which ever floor best suits you and your students!

**Teachers:** This is the answer key for a corresponding Exploration Guide for your students. The questions are printed below with the answers in red. The students' guide is designed to be printed double sided and folded to make a booklet as indicated by the page numbers at the bottom of each page. If you would like for your students to use the Exploration Guide during their visit, please be sure to print enough copies for everyone before leaving for the museum and bring enough pencils for everyone. Some schools also provide their students with clipboards. Be sure to tell your chaperones to ask our docents for more information regarding the exhibits as they explore and learn.

**Chaperones:** Please make sure students write their names on the front page of their guides. As you explore the museum with your students, have them fill out the answers to the Exploration Guide. Because the guide is intended for your student’s benefit, try to lead them to discover the answers on their own. All questions can be answered from information on the text panels or by observing the exhibit. You may start on any floor you wish and go in any order. Your teacher should have printed out the guides before you arrive at the museum and also provide writing utensils for the students. At the end of your trip, have the students return the guides to their teacher.
**First Floor**

*Start at Fort Moultrie on the 4th Floor*

1. What was the date of the attack on Fort Moultrie? **June 29, 1776**

2. Who was William Jasper and what impact did he have during the Revolutionary War? Sergeant Jasper saved the South Carolina state flag that was flying above Fort Moultrie during the battle.

3. Name the three symbols of the SC flag and what they represent.
   - The color indigo was an SC cash crop,
   - the crescent was a symbol on the soldiers' hats,
   - and the palmetto represents the logs used to build Fort Moultrie.

*Walk behind the fort to the Native American exhibit*

4. Give a brief description of Native Americans during the Paleo, Archaic, Woodland, and Mississippian Periods.
   - **Paleo:** Stalked prey (mammoth and bison); Had stone tools like blades and projectile points; 14,000-10,500 years ago
   - **Archaic:** Developed the bow and pottery; Used pottery for cooking, storage and in burials; 10,500 - 3,000 years ago
   - **Woodland:** Had a semi-permanent society on the coast that produced large oyster rings around the camp; Development of tools like the spear thrower, stone ax and the nutting stone; 3,000 -1,200 years ago
   - **Mississippian:** Mound cultures with highly structured societies with chiefdoms; Developed new advanced farming techniques; 1,000-300 years ago

*Go to the Colonial Government exhibit*

5. The **Charter of 1663** gave the Lord’s Proprietors the right to govern and develop Carolina.

*Walk to the Antebellum South exhibit*

6. What percent of the population was enslaved before the invention of the cotton gin? What about 30 years after? **43% before, 52% after**

7. Lowcountry planters preferred to purchase kidnapped Africans from the Congo-Angola culture because _______. Those people knew how to grow rice.

8. Which languages were mixed to form Gullah? **English and West/Central African languages**

9. Describe what a slave cabin would have looked like on the inside.
   - It would be small with one room and no furniture.
   - Often the cabin would be built as cheaply as possible.

*Go to the H.L. Hunley replica*

10. Why was the **H.L. Hunley** moved from Mobile, Alabama to Charleston, SC?
    - It was moved so that it could be used to help break the Union blockade in Charleston.

*The Mortuary exhibit, Jenney’s Country Store and the Berry Schoolhouse are where the next answers can be found.*

11. What is the wreath that was used at a funeral made of? **The deceased’s hair**

12. Name three functions of a country store.
    - Answers could vary; could be news center, social center, post office, bank, pharmacy, grocery store, or hardware store.

13. How were schoolhouses like the Berry schoolhouse financed?
    - They were financed by taxes or families that offered to pay for them.

*Go to the Mill Life exhibit*

14. Why was the sense of community so strong in mill villages?
    - Adults worked for the same employers, the children all went to school together, and all the families went to church together. Their lives were centered around community.

*Third Floor*

*Head down the stairs to the train on the 3rd Floor*

15. What impact did steam locomotives like "The Best Friend of Charleston" have on South Carolina and the rest of the country?
    - South Carolina became the world leader in developing transportation and this led to railroads becoming the main carrier of cargo and passenger transportation in America.

*Go behind the stairs and glass elevator to the Textile exhibit*

16. What was the job title for mill workers who were 12 years old and younger? How much did they get paid?
    - They were called Doffers were paid 75 cents per day.

*The Oldsmobile and Model T can be found to the right of the Textile exhibit.*
17. What was America’s first low cost car and how much did it cost?
The Oldsmobile cost $650.

18. Why was the assembly line such a huge advancement for the Ford Company?
It allowed for cars to be produced much more quickly which made them less expensive and more affordable for middle-class families.

The answers to the following questions can be found in the Minerals, Aviation, Automotive, and Communications exhibits.

19. Why was the Doolittle Raid a turning point in WWII?
It was the first attack on Japanese homeland and served as retaliation to the Japanese attack on Pearl Harbor.

20. What was the job of a switchboard operator?
They connected callers by asking the dialer what number they were trying to reach and plugging in cords to the correct number on the switchboard.

21. Why was the invention of radio significant?
Radio allowed information to be shared instantaneously.

Go to the Apollo exhibit

22. What is the name of the famous SC astronaut that walked on the moon in the Apollo 16 mission?
Charles Duke

Go to the Laser exhibit

23. Explain what causes a laser to remain sharp and narrow.
The laser’s resonant cavity is narrow and the light waves are moving in the same direction as the cavity.

24. What is a laser used for in the NOVA?
It is used to trigger fusion and create nuclear energy.

25. What is the main difference between a maser and a laser?
A maser uses microwave amplification, while a laser uses light amplification.

26. Who won the Nobel Prize for Physiology and Medicine in 1985 for discovering how cholesterol enters a cell?
Joe Goldstein

Second Floor
Go down the stairs to Finn the Megalodon

27. What is the common name for Carcharodes Megalodon?
Mega-toothed Shark

28. Looking at the map of South Carolina, name three river basins in the state and where they are located.
Pee Dee (Myrtle Beach), Ashley-Combahee (Charleston), Edisto (Edisto), Santee (Georgetown), Savannah (Savannah)

Enter into the Dynamic Earth exhibit to the left of the map of South Carolina’s rivers.

29. What are three types of rocks and how are they formed?
1. Sedimentary: Erosion and weathering produce sediments that are then compacted over time.
2. Metamorphic: Existing rocks are physically and chemically changed by heat and pressure.
3. Igneous: Cooling and solidification of magma or lava.

Enter the Life in the Past exhibit on the left.

30. What was the period of time called when ocean levels were so high that most of our continent was covered by water?
Eocene Epoch

31. What is the name of the Ice Age’s largest ground sloth?
Rusconi’s Ground Sloth

After looking at the mastodon and giant beaver, turn to your right for the Plant and Life Cycle exhibits.

32. What is the chemical formula for glucose?
C₆H₁₂O₆

33. How is a primary consumer different from a secondary consumer?
A primary consumer eats plants (herbivore) whereas a secondary consumer eats only other animals (carnivore).

Next check out our Habitats and Dinosaur exhibits by walking to your right.

34. Which is not a life zone of the South Carolina coast?
a. Tidal zone

35. In which habitat can you find Columbia?
Sandhills

36. What was the diet of all “duck-billed” dinosaurs?
Herbivorous diet

37. List the names of three dinosaur fossils in the dinosaur exhibit.
Answers could be: Tyrannosaurus Rex, stegosaurus armatus, hadrosaurus, albertosaurus libratus, maiasaura peeblesorum
38. Who is known as “the dean of Charleston blacksmiths” and created the Palmetto Gate? **Philip Simmons**

39. Where would warpers, like the one by the front door, commonly be found? **Textile mills**

40. When was the tub wheel near the entrance to the Planetarium made? What was it used for?
**It was made around 1800 and was used to drive machinery for mills.**