

Name(s) _____ Block: _____ Date _____

Museum Ticket Price Calculator



Introduction: We will be making a webpage that can generate a museum entrance ticket based on some info:

- Base price is \$10
- Weekend price is \$15
- Mondays are discounted for anyone and everyone at \$5
- Anyone 5 y.o. Or younger or 65 y.o. Or older are discounted at \$5.
- There should be a coupon code that you can decide on for a discounted price of \$5.
- Price, day, and age should display on the webpage.

Step 1: Discuss with a Partner

- What variables would you need to program this app?
- Where does this app use conditionals (if-statements)?

Step 2 - Plan

Variables: Fill in the table below for each variable you'll need to create.

Variable Name	What the Variable Stores

Conditionals: Draw a flowchart that follows the rules from the introduction. There's more than one way to do it. Use the table to make sure that your flowchart works for different combinations of age, day, and discount code. (You can use Jamboard to draw or Google Drawings to create a diagram.)

Step 3 - Write Your Code

- Write the code for the app, using your plan above and the comments provided in Code Studio to help
- Step You Can Follow
 - Create all the variables from your table above.
 - Give your variables a starting value using the assignment operator (=)
 - Inside the event handler start writing code for your conditional using your flowchart
 - This can be a button with an onclick function.
 - Test your code as you go using the table below. At the end it should work for every combination of outputs in the table on the first page.
 - Use your debugging skills to identify unexpected behavior and fix your program
 - Comment your code as you go, explaining what each event handler does
- Check the Help & Tips tab for ideas about Programming Patterns you can use
- Extension Ideas
 - Create a coupon code that only works for certain days of the week
 - Create a new variable that allows the user to input how many people and offer a discount for groups of 10 or more
 - Allow the app to generate a ticket picture the user can show at the entrance desk

Step 4 - Submit

Before your submit check the rubric below to make sure your program

Category	Extensive Evidence (3)	Convincing Evidence (2)	Limited Evidence (1)	No Evidence (0)
Input	Event attribute present & generates tix cost	OnClick attempts to link variables and JS	There is an attempt at an event attribute	No event attributes
Storage: Variables	Variables are created and appropriately used for all pieces of information used in the app.	Most info is stored variables and updated through the app.	Some info is stored variables and updated throughout the app.	No variables which store the necessary information for the app to work correctly.
Processing: Conditional Logic	The code correctly determines the price for all combinations of inputs (age, price, discount code).	The code correctly determines the price for most but not all combinations of inputs (age, price, discount code).	The code correctly determines the price for some but not all combinations of inputs (age, price, discount code).	The code does not correctly determine the price for any combination of inputs (age, price, discount code).
Code: Output	The screen correctly displays the day, age, and price of the ticket.	The screen displays most but not all information correctly in the ticket.	The screen displays some but not all information correctly in the ticket.	The screen does not correctly display any information in the ticket.
Code runs without errors.	No errors are present in the required code.	One or two errors are present in the required code.	Three or four errors are present in the required code.	More than four errors are present in the required code.
Coding Comments	Comments are used to correctly explain the purpose and function of all onEvents and conditional logic.	Comments are used to explain the purpose and function of most onEvents and conditional logic.	Comments are used to explain the purpose and function of some onEvents and conditional logic.	Comments are not present.
Styling	Website is styled with at least 3 CSS elements and is visually appealing	Website is styled with at least 2 CSS elements, might be a bit awkward looking	Website is styled with at least 1 CSS elements, might be a bit awkward looking	No styling whatsoever, might be an eyesore