

9. Consider the following urls and do as directed:

<https://mtdcrrs.maharashtratourism.gov.in>

<https://www.flipkart.com/>

- a. Write the steps to perform security testing using SQL Injection
- b. Write the steps to perform Cross-site Scripting.
- c. Try to directly access bookmarked web page without login to the system.
- d. Verify that system should restrict you to download the file without sign in on the system.
- e. Verify that previous accessed pages should not be accessible after log out i.e. Sign out and then press the Back button to access the page accessed before.
- f. Check the valid and invalid passwords, password rules say cannot be less than 6 characters, user id and password cannot be the same etc.
- g. Verify that important i.e. sensitive information such as passwords, ID numbers, credit card numbers, etc. should not get displayed in the input box when typing. They should be encrypted and in asterix format.
- h. Check that bookmarking is disabled on secure pages? Bookmarking should be disabled on secure pages.
- i. Check that Right Click, View, Source is disabled? Source code should not be visible to user.
- j. Is there an alternative way to access secure pages for browsers under lower versions, where SSL is not compatible with those browsers?
- k. Check does your server lock out an individual who has tried to access the site multiple times with invalid login/password information?
- l. Verify the timeout condition, after timeout user should not be able to navigate through the site.
- m. Check that the application prevents the user from doing direct searches by editing content in the URL?
- n. Verify that relevant information should be written to the log files and that information should be traceable.
- o. In SSL verify that the encryption is done correctly and check the integrity of the information.
- p. Verify that restricted page should not be accessible by user after session time out.
- q. ID / password authentication, the same account on different machines cannot log on at the same time. So at a time only one user can login to the system with a user id.
- r. ID / password authentication methods entered the wrong password several times and check if the account gets locked.
- s. Add or modify important information (passwords, ID numbers, credit card number, etc.). Check if it gets reflected immediately or caching the old values.

Enhance your learning:

- ✓ Enlist any two security testing approaches other than XSS and SQL injection.
- ✓ What is Cookie Testing?
- ✓ Where are the Cookies stored? Can different browsers share same cookies?
- ✓ Can one domain access another's domains cookies?
- ✓ Which cookies can be tested and which are not?
- ✓ For applications where payments are involved, which payment field(s) is/are never stored in the cookie even not in the encrypted form?

Solution Must Contain: Steps with example and output. Screenshots of the page where such test is applied. The description must consist of result analysis.