

Hacker News Testing  
CS 1632 - DELIVERABLE 3: Web Testing With  
BDD

[https://github.com/blester125/CS\\_1632\\_deliverable3](https://github.com/blester125/CS_1632_deliverable3)

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# 1 Summary

For this project I decided to test Hacker News (<https://news.ycombinator.com/>). I choose this site for a few reasons. The first is that is very like Reddit which is the site my roommates tested for this deliverable last semester (it is also the site tested in sample Selenium code). This site has several features that make testing a natural fit. The features of the site itself make sense and are easy to test well. The site lets users create accounts, login, make posts, and post comments. These features are very self contained and easy to make a test plan for.

The site itself is also lends itself to testing. The site is very simple. There is little javascript or dynamic content. This means that finding elements on the page is fairly easy. The site also lacks captchas on user creation, link posting, and comments. This means that all the core functionality can be automated. The site also lacks checks for valid urls when posting a link which means that no test url is required for test purposes. The simplicity of the site really helps make automated test.

A user for test purposes was created with credentials username: "1632TestAccount" and password: "1632TestAccount"

# 2 Challenges

One concern for this test plan is that you are making tests that have no real content (according to the type of content that the site wants). This means that the test account is likely to be flagged as a bot or else get timed out for posting too much. This actually happened on a few runs of my tests. The test would create a comment on the top post at that time. When the test is run multiple times in a short amount of time the site stops the comment from being added and tells the user they are posting too much. This causes the test to fail because the test then looks for the new post which is obviously not there. If a lot of these tests are being run this could happen a lot.

The next step moving forward would be to test functions of the site as a moderator of the site (Which I assume the site has). A moderator would have the ability to filter, delete, move posts and the like. Unlike Reddit, Hacker News, doesn't allow for users to create small sections of the site (subreddits) that they are moderators of. This means that to be a moderator of Hacker News and test these functions I would need to be a moderator of the entire site. In a production environment these moderation functions must be tested.

Code for these tests can be found at  
[https://github.com/blester125/CS\\_1632\\_deliverable3](https://github.com/blester125/CS_1632_deliverable3)

### 3 User Stories

1. As a User  
I want to see the links  
So I can see the latest news
2. As a User  
I want to login  
So I can interact with the community
3. As a User  
I want to post links  
So I can share the latest news
4. As a User  
I want to make comments  
So I can tell people my opinion
5. As a User  
I want to vote  
So I can reward good content

## 4 Features

### 4.1 User Story 1

1. Scenario: Title test  
Given that I am on the main page  
When I look at the pages title  
Then I see the tile contains “Hacker News”
2. Scenario: Navigation test  
Given that I am on the main page and not logged in  
When I check the Nav bar  
Then I see “new” “comments” and “submit” links
3. Scenario: No welcome test  
Given that I am on the main page and not logged in  
When I check the Nav bar  
Then I should not see “welcome” link
4. Scenario: More link test  
Given that I am on the main page  
When I look at the bottom of the page  
Then I see a “More” link
5. Scenario: Login link  
Given that I am on the main page and not logged in  
When I look at the login link  
Then it should be there
6. Scenario: Content test  
Given that I am on the main page  
When I look at the links  
Then there should be some content

### 4.2 User Story 2

1. Scenario: Login text field  
Given that I am on the login page  
When I go to enter my password  
Then I see a username text field

2. Scenario: Password text field  
Given that I am on the login page  
When I go to enter my password  
Then I see a password text field
3. Scenario: Forgotten password link  
Given that I am on the login page  
When I have forgotten my password  
Then I see a forgotten password link
4. Scenario: Correct Login  
Given that I am on the login page and have correct credentials  
When I enter the credentials  
Then I should login
5. Scenario: Incorrect Login  
Given that I am on the login page and have correct credentials  
When I enter the credentials  
Then I should not login and see a Bad login error
6. Scenario: Welcome Link  
Given that I am on the login page and have correct credentials  
When I enter the credentials  
Then I should login and see a welcome link

### 4.3 User Story 3

1. Scenario: There is a submit Link  
Given that I am logged on  
When I look for for a submit link  
Then there is a submit link
2. Scenario: There is a title entry  
Given that you are logged in  
When I click the submit link  
Then there should be a title input field
3. Scenario: There is a url entry  
Given that I am logged in  
When I click the submit link  
Then there should be a url input field

4. Scenario: There is a text entry  
Given that I am logged in  
When I click the submit link  
Then there should be a text input field
5. Scenario: There is a bookmarklet link  
Given that I am logged in  
When I click the submit link  
Then there should be a bookmarklet submission link
6. Scenario: Posting a link  
Given that I am logged in  
When I click the submit button and enter a title and url and click submit  
Then the link shall be added to the content list

#### 4.4 User Story 4

1. Scenario: Finding the comment link  
Given that I am on the homepage  
When I look at the nav bar  
Then there should be a comments link
2. Scenario: Comment link for an article  
Given that I am on the homepage  
When I look at an article  
Then there should be a comment link for that item
3. Scenario: Comment input field  
Given that I am on the comment page  
When I want to enter a comment  
Then there should be a comment input field
4. Scenario: Submit a comment  
Given that I am on the comment page  
When I enter a comment and click submit  
Then the comment should be created
5. Scenario: Approach to comment link  
Given that I am on the comment page  
When I want to read the approach to comments  
Then there should be a approach to commenting link

6. Scenario: Site guidelines link  
Given that I am on the comment page  
When I want to read the guidelines for comments  
Then there should be a site guidelines link
7. Scenario: reply link on a comment  
Given that I am on a comment page  
When I want to comment on another comment  
Then there is a reply link
8. Scenario: Comment box after clicking reply  
Given that I am on a comment page  
When I click the reply link  
Then there is a comment entry box

## 5 Test Screenshots

