

Final Features

Website:

| Name | Features | Files Name | Notes |
|--------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------|
| Mohamed Sayed Hussien abdel-razek ID: 9181203 | - Edit password - Edit profile data -Authorization for protected routes | -BadAuth.js -EditProfile.js -Change password.js | - I have applied tested on both: Real-spotify (in real final folder) spotify-elghalaba. (in final spotify-elghalaba) |
| Abdallah Hussien Hassanin ID: 9180812 | -Add (and remove) songs to playlist. -Like and unlike albums. -Play Playlist sequentially. -Follow and unfollow artist. -like and unlike songs. | -AddRemoveSongFromPlaylist.js -LikeUnlikeAlbum.js -PlayPlaylistSequitentially.js -FollowUnfollowArtist.js -LikeUnlikeSong.js | -You may need to run the tests on firefox browser because of chrome doesn't work properly with real spotify. |
| Andrew Tawdros Hanna ID: 9180323 | -Search for songs -Search by Genres -Like a song and follow an artist -open.spotify is similar to the original website | -SearchSong.js -SearchGenres.js -LikeSongFollowArtist.js -OriginalSpotify.js | |

Mobile:

| Name | Features | Files Name | Notes |
|--------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------|
| Mohamed Sayed Hussien abdel-razek ID: 9181203 | -Create play list -Remove playlist. -Add song in playlist. -Remove song in playlist. -Rename playlist | -Createplaylist.java -deletePlaylist.java -addSongInplaylist.java -removeSongInplaylist.java -renameplaylist.java | -You have to be already login using google smart lock. (Spotify application prevent inspect login page). |
| Abdulla Hussien ID: 9180812 | -Audio player (play-pause-next-heart) -Change user name. -Like and unlike album. -follow and unfollow artist. -Like and unlike song. | -AudioPlayerHeartButton.java -AudioPlayerPlayPause.java -AudioPlayerNextPrevious.java -ChangeUserName.java -LikeUnlikeAlbum.java -FollowUnfollowArtist.java -LikeUnlikeSong.java | -You have to be already logged in Before running the test (after running the test it will wait until you login then starts). |
| Andrew Tawdros Hanna ID: 9180323 | -Hide your own Playlist (make secret) -Search for an artist and playlist -Search by genres -Search in my liked songs | -HidePlaylist.java -Search.java -SearchGenres.java -SearchMySongs.java | - You have to login using Google smart lock. - Generated reports for test cases |

Challenges the team faced

Web:

1. Google chrome can't access web player page of spotify (UncaughtError).

Solution: We found that firefox browser is the only browser that can access spotify from the browsers that cypress support (chrome , edge , firefox (BETA) , electron).

2. Spotify uses an encrypted media and **DRM** (Digital Rights Management) contents for security reasons which prevent cypress using firefox to access the media in spotify (Songs pages or the music player).

Solution: After searching we found that there is an important plugin that should be installed called (**Widevine Content Decryption Module provided by Google Inc**) which enables playing the encrypted media.

And Change some configurations in firefox (write “**about:config**” in search tab of firefox and search for “**media.gmp-widevinecdm.autoupdate**” make its value true.

The same for “**media.gmp-manager.updateEnabled**”.

3. Spotify removes the accounts we have created for testing after some days OR they prevent us to access the pages elements (SecurityError no permission denied), although the test was running correctly from few days, we found it fails and give the previous error.

Solution: We thought the reason is that we were using fake emails without confirmations so we created real emails but the same thing happened. So, when we tried to find the reason, we found that the only thing affects is only the email used. The only explanation is that spotify has a security team which detects and blocks testing accounts, that is why the account became expired after few days.

4. We don't have access on artist pages or notifications in real spotify which give us a small number of features to choose from them specially that we almost did everything in the first phase.

Solution: We searched for extra features and tested it OR modified and completed some uncompleted features.

Mobile:

1. The main problem was that real spotify prevent taking screenshots from login/signup page, which prevent us from inspecting this page element.

Solution: Google smart lock makes you always login so that when you run the test it goes to home page immediately and doesn't need to login.

For ensure that it is work at the beginning of each test we made the test to wait until the home page appears (login is done) then the test continue normally.

2. We don't have access on artist pages or notifications in real spotify which give us a small number of features to choose from them.

Solution: We searched for extra features and tested it and because of we didn't test the mobile app in project phase we found a lot of tests to do.

Links:

- [Repo](#)
- [5 - minute video](#)
- [Mohamed Video](#)
- [Abdullah Video](#)
- [Andrew Video](#) (2_min)