

Zip Code Lookup Test Application

For this application, you will be making a simple API integration with a couple of artisan console commands. The API service is located at <http://www.zippopotam.us/> and does not require any registration or API authentication.

The application is very simple, but will demonstrate the use of Laravel's *Controllers*, *Blade Templates*, *Eloquent/Query Builder*, *Validation*, *HTTP Client*, *Artisan Console* and *Testing*. A developer experienced with Laravel can expect this to take roughly two hours.

Create a new laravel application and satisfy the following requirements and then submit it to us for review.

A) User Experience

The only interface available to an unauthenticated user should be to register or login.

Once registered, a user should be required to verify their email address before they can use the application.

Once logged in, the user should have access to a web form with a single input field for a **United States** zip code to be entered. It should only allow the classic 5-digit format.

When a zip code is submitted, three things should happen:

- The zip code should be submitted to the zippopotam.us API service and the response captured.
- A record should be logged in a database table that includes:
 - the date and time of the search
 - the submitting user ID
 - the zip code that was searched
 - a boolean indication of whether the search returned a valid response
 - the JSON response received from the Zip Code API if any
- The results of the API lookup should be parsed and presented to the user in a human-consumable format (*). This results page should include the search form so that another search can be executed immediately.

B) Utilities

Provide two custom console commands:

Test Lookup

The first command should accept a 5-digit US zip code as the only argument and when run, it should **NOT** log the search but should instead perform the search and then list the results to the console (*).

Activity Report

A second command should require an email address argument and should accept an optional integer number of hours (default 24) and then deliver an email report to the provided email address which lists all of the zip code searches that were logged by the application within the past given number of hours (*).

C) Testing

Provide *at least* one passing unit test for some portion of the project that you created. This might be for the zip search form validation/functionality or the API integration class. It's up to you. It just needs to be sensible and work.

D) Delivery

Push the application to a public github repository and send us the link so we can pull it down and test/review it.

* All of the displays/outputs just need to be readable, not attractive

