*Christian Sauls, Travis Stewart*

**Deployment Plan**

SCOPE AND OBJECTIVES

* This plan describes how our software product (Fit or Fail) will be implemented
* Document organization
  1. Requirements
  2. Installation and deployment plan
  3. Product maintenance plan
  4. Training plan
  5. Product usage

REQUIREMENTS

* Computer
* Internet Connection
* MongoDB Database
  + *We recommend MongoDB Atlas for easy deployment and scalability*
  + Scale storage space according to needs
* Domain name
* Web Hosting Service
  + *We recommend Heroku for easy deployment*
  + Must support Node v12.16.1
    - Host should automatically install the required dependencies listed in “package.json”
* Associate your domain name with your web host’s server
* Web Browser
  + Any popular browser
    - IE >= 11
    - Chrome >= 29
    - Firefox >= 28
    - Edge >= 12
    - Safari >= 9
  + Mobile versions of these browsers are supported as well
* System Requirements
  + Operating System
    - Linux
    - macOS
    - Microsoft Windows 8.1 or Server 2012 and higher

CONFIGURATION AND DEPLOYMENT

* Obtain the above requirements
* Adjust application environment variables

1. Consult your web host’s documentation for how to set application environment variables
2. Add “DB\_URI” with a value equal to your MongoDB database connection string
3. Add “JWT\_SECRET” with a value equal to a secret and secure password of your choosing, as this is used to hash all passwords before storing them in your database
4. Add “BASE\_URL” with a value equal to the root directory of your domain
5. Add “STRIPE\_PUBLISHABLE\_KEY” with a value equal to your public Stripe API key
6. Add “STRIPE\_SECRET\_KEY” with a value equal to your private Strip API key

* Consult your web host’s documentation for how to upload the project’s files to their servers

POST-DEPLOYMENT

* Register a new user account that should be used as your project’s admin account
* Open your MongoDB database
  1. Open the “users” collection
  2. Find your newly-created user
  3. Change its “account\_type” to “admin”
* Schedule automatic backups of your database according to your organization’s needs
  + This process will vary depending on your database setup and host

ACCESSING THE PRODUCT

* Obtain a computer, an internet connection, and a web browser that meets the above requirements
* Launch your web browser and navigate to your project’s registered domain name
* Welcome to Fit or Fail!
* After hitting “Play!”:
  + If the user is not logged in, they must first log in or register an account if they do not already have one
  + The user is taken to the game selection page, where they can choose between “Solo” or “Online”

TRAINING PLAN

* Technical Training:
* Detailed documentation has been provided for Fit or Fail, covering the most prominent sections of code
* Instructions for database and hosting deployment have been included for use with our default recommended database and web host providers
* 6 months of general customer service and support
* 1-time IT employee training for up to 15 people (in-person or online)
* Custom Training:
  + Usage of Fit or Fail’s services are largely self-explanatory:
    - Large “Play!” button, automatic redirects, authenticated pages, error messages upon failure, etc.
  + Administrator or government users may contribute questions to the database, view user statistics, and review advertisement submissions through their “Admin Panel,” which is visible from their userpage
    - Any user can visit their userpage by clicking on their profile picture on the right side of the navbar that’s present on every page

RECOVERY PLAN

In any one of the below cases, you will want to notify your users that the website is currently under maintenance. Any data loss of user accounts or other user-specific information should also be disclosed.

* Server Failure (failures unrelated to Fit or Fail)
  + Consult your hosting provider on how to resolve any server-related failures
* Database Failure (failures unrelated to Fit or Fail)
  + Restore your database from a backup
    - This process will vary depending on your database setup and host
  + If you haven’t done so already, schedule automatic backups of your database to prevent future data loss
* Fit or Fail Code Failure
  + Visit the Fit or Fail GitHub repository and post an issue on our issue tracker
  + If your organization is under our direct support, contact our technical hotline to speed up your issue response time