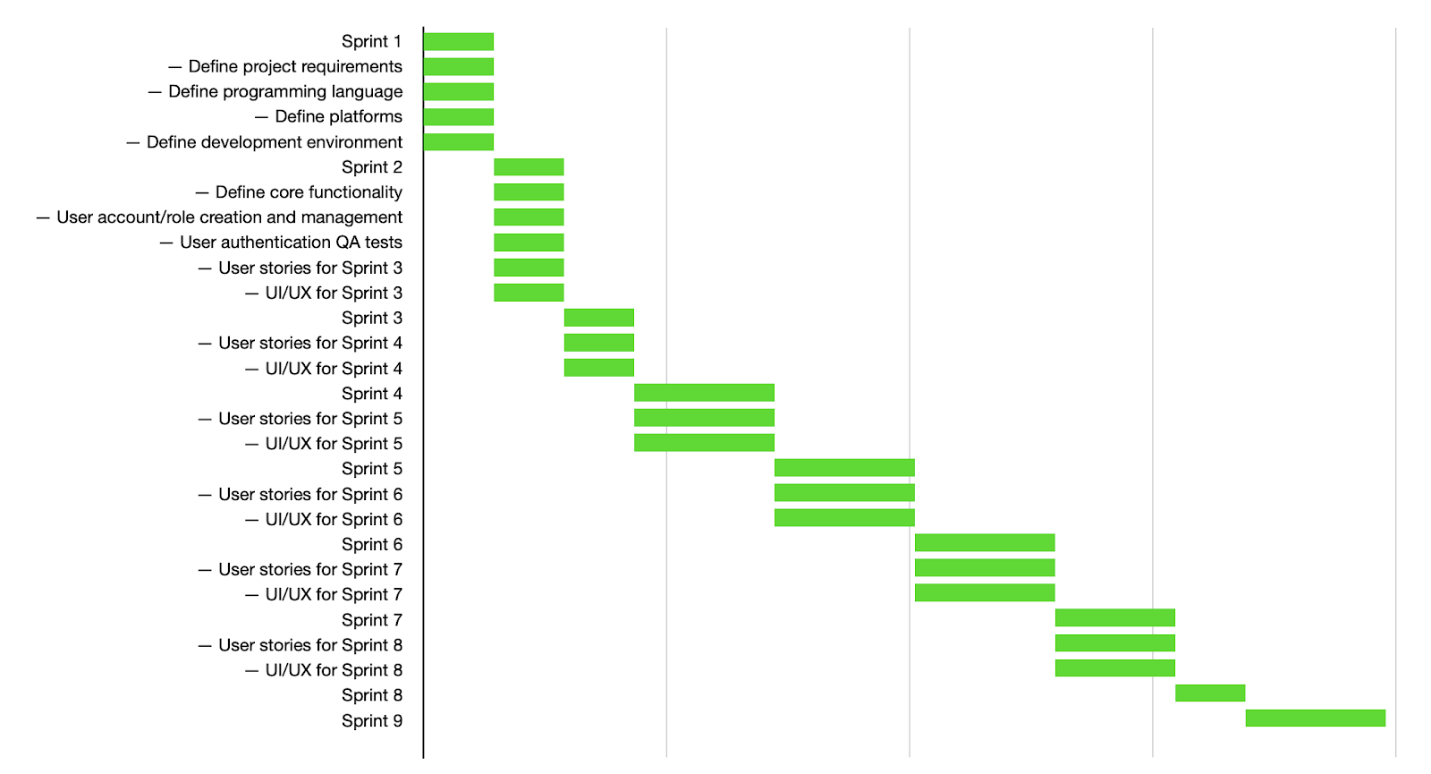
* Project Requirements (Jakob)
  + Functional:
    - Provide helpful hints about the course based on the location of the player.
    - System shall allow players to login and register their device
    - Players app displays progress on the course, playing time, Warnings about playing speed, and request to allow playthrough.
    - Players can view player history and dashboard
    - Players login and register at golf ranges
  + Non-functional:
    - Downloadable application from standard stores
    - Track players position on a virtual golf course utilizing an application on the players phones that transmits GPS location information; possibly using geo-fencing for more accurate location data.
    - The system shall track in real time
    - System shall monitor player behavior and provide a player dashboard.
    - Software should be portable
* Project Plan (Quentin)
  + 
* Tool Chain (Collin)
  + Native Mobile App (Android): Android Studio
  + Native Mobile App (iOS): Swift > XCode
  + Web App: IDE\*,
  + Server: IDE\* > GCP or AWS
* Language (Collin)
  + Frontend: HTML5, JS/TypeScript
  + Backend: Python, JS
  + Framework: JSON, jQuery, Bootstrap, Angular or React
* Config. Management (Travis) \*
  + Kubernetes, Puppet, Ansible, Terraform, Docker, etc.
* Server Setup (Dustin)
  + If creating a web application: LAMP stack(Could use a different database and language), Bitnami, etc.
    - Requires a host server that can be connected to remotely.
    - Virtual machines on public platforms (GCP, AWS, etc) mostly require money to use the services.
    - Could apply for a virtual machine from Oakland University which only requires VPN connection.
* Development environment, etc. (Luis)
  + IDE, Github, debugging tools, etc.

Web App:

* + - Visual Studio - Only available for windows, open source, comes with a debugging tool

References:

<https://visualstudio.microsoft.com/vs/features/web/languages/#:~:text=Visual%20Studio%20offers%20powerful%20HTML,and%20project%20types%20with%20ease.>

Supports - Python, HTML, CSS, Javascript, PHP, Sass. Node.js, Typescript etc.

* + - Atom- Open Source, allows for real time collaboration on code, easy to use with Github

References:

<https://ide.atom.io/>

Supports - HTML, Java, JavaScript, JSON, Python, PHP, SQL, CSS, Node.js etc.

* + - Eclipse: Open Source, cross platform, mostly centered around Java

Supports - Python, Javascript, PHP, Java, Node.js etc.

References:

<https://marketplace.eclipse.org/category/categories/programming-languages>

* + - Komodo - Comes with Debugging/Unit Testing, free, available cross platform.

Supports - HTML, CSS, Python, Node.js, Javascript, PHP, Sass

References:

<https://www.activestate.com/products/komodo-ide/features/>

Mobile App:

* Android Studio - Free, available for Android development
  + Supports - Java and Kotlin

References:

<https://developer.android.com/studio>

* Xcode - Free, available for iOS development
  + Supports - Java, Python, Swift, Objective-C and frameworks such as Cocoa

References:

<https://appleinsider.com/inside/xcode#:~:text=Xcode%20supports%20writing%20programs%20in,a%20number%20of%20other%20languages.>