Requirements

3.1 - Functional Requirements

| Req# | Requirement | Comments | Priority | Date  Rvwd | SME Reviewed / Approved |
| --- | --- | --- | --- | --- | --- |
| ENDUR\_01 | The robot will start on the upper left corner of the blue rectangle. The robot’s light will be set to green and say ‘Ready. Set. Go!’ The robot will travel forward to a rectangle corner and stop. It will rotate 90° to repeat this motion. Repeat until it reaches its original start location. The robot will change to a red light and say ‘I’m done, and I need water.’ | No other requirements will be started until this requirement is compNo other requirements will be started until this requirement is completed. | 1 | 10/26/22 | Aalia Arif |
| ENDUR\_02 | Setting a delay for 2 seconds will allow the robot to come to a complete stop. | This requirement improves the processing of the robot and prevents any sliding. | 2 | 10/26/22 | Aalia Arif |
| ENDUR\_03 | Before the robot rotates 90°, a yellow light will signal a shift in direction. | This requirement is added on and is not required. | 3 | 10/26/22 | Aalia Arif |

3.2 - Security

3.2.1 - Protection

* Windows Laptops
* Monmouth Accounts
* Sphero Accounts
* GitHub Accounts

3.2.2 - Authorization and Authentication

* All accounts have some sort of authentication that verifies who someone is.
* GitHub has authorization to decide what files the user has access to.

3.3 - Portability

* Sphero is easily portable among the team members. If a member wants to use the robot, they can connect their phone or computer to Sphero. Then they can control the robot via a program on their device.
* To share a Sphero program, hit the share icon on the top right and send it to a member.