# Azure DevOps

Azure DevOps will allow us to manage nearly everything for this development project:

* Host our Git repositories (just like GitHub)
* Manage code reviews (thru pull requests)
* Plan requirements and coordinate/track who’s working on what

The ‘Boards’ and ‘Repos’ tabs are the ones we’ll use most frequently. Below is a quick run-down of each:

## Boards

This is where work items, features, and other product-related planning tools reside. We create user stories, bugs, plan sprints, and many other tasks from here.

### Tabs and what they do

* **Boards:** This is a taskboard view of the backlogs tab. The same backlog items will show in both tabs.
* **Backlogs tab:** This is a list of all backlog items. It includes items assigned to sprints, as well. Same as the boards tab, just a different visualization.
* **Sprints tab:** Here you can see the backlog items in each sprint/iteration. You can change between backlog and board view modes using the “Taskboard” and “Backlog” tabs near the top. Change sprints using the dropdown at the top right of this screen. The current sprint is the default view.
* **Queries tab:** This allows you to query the entire database of backlog items. It’s useful for getting lists of all items assigned to you, everything with a specific tag, etc.

### Backlog Items

* **User Stories:** These are the main work items. Each one represents a feature we want our product to have. They explain what the feature is but not how to implement it (See “Tasks” for implementation details). They have the following parts:
  + Description: Explains from the standpoint of a specific user what that feature should accomplish and why
  + Acceptance Criteria: What’s needed for this feature to be “done”
* **Bugs:** These work items are for deviations between current functionality and desired functionality. They have the following parts:
  + Repro Steps: A list of steps required to reproduce/demonstrate the undesired functionality
  + System Information: Any info regarding the setup and configuration that relates to this bug. For example, if you’re in Internet Explorer when you find the bug, that info goes here!
* **Tasks:** These are typically child work items that are nested below a user story or bug. They are the implementation details on how to achieve desired functionality and meet the acceptance criteria.
* **Spikes:** These are research items

### Non-Work Backlog Items

These are items that help to plan out the product’s overarching vision, and its primary features. These items are from a much more high-level than user stories.

* **Features:** These are higher level “bins” that contain user stories. They represent a particular focus for a module of the product
* **Epic:** These are the highest level “bins” that contain features. They represent sort of the “grand vision” or main pillars the product should have

## Repos

This is where code management features reside. Each tab under repos is specific to the repo that’s selected on the very top of the page. The default repo is titled ‘Balto’. Clicking that reveals a dropdown, allowing you to select between different repos we may have during the course of this project. For now there’s just one.

#### Tabs and what they do

* **Files:** Allows the user to browse files in a particular branch
* **Commits:** Shows the commit history for a branch
* **Branches:** This shows all branches for the selected repo, and allows the user to select one. You can also select to pull request a branch into develop or master.
* **Pull requests:** This allows you to see all active, completed, and abandoned pull requests (PRs). You can also create new PR from here. (More about PR policies in the ‘Project Workflows’ document under ‘Development Work’ heading)