ERA InfoTech Ltd.

Standard Operating Procedure (SOP): Project Management in Azure Board

This document contains instructions on how to use Azure Board to manage internal and external projects.

Version: 1.0.5

Version History:

Sl No.	Document Version	Date	Author	Reviewed By	Approved By	Change Area
1	1.0.1	19-02-2024	Wajdan Mahbub	Business Process Team		Draft of steps
2	1.0.2	20-02-2024	Wajdan Mahbub	Business Process Team		Adding images
3	1.0.3	28-02-2024	Wajdan Mahbub	Business Process Team		Document Alignment
4	1.0.4	21-01-2025	Wajdan, Chandrika & Sehtab	Business Process Team		Activity List (Point 3) and Project Planning (Bulk Upload and Bulk Edit added)
5	1.0.5	9-2-2025	Chandrika & Sehtab	Business Process Team		5.3.6 Standard Project Backlog Structure added (For Both implementation and Maintenance Projects)

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1 Purpose

The purpose of this standard operating procedure (SOP) document is to provide clear and consistent guidelines for working on internal and external projects using Azure DevOps (ADO). This SOP seeks to ensure that all employees follow a standardized approach to project management, thereby maintaining quality, efficiency, and security while reducing the risk of errors, overlapping work and inconsistencies.

2 Scope

This SOP applies to all employees responsible for leading or working on internal or external projects at ERA Infotech. This SOP covers the following types of projects:

- New Software development Project
- Software Maintenance Projects

3 Activity List

1. Create a project in Azure DevOps

- **What**: Project-level information, including goals, timeline, deliverables, team members and set milestones in the Project Information work Item.
- **Who**: Project Manager (PM)
- **When**: At project initiation or when major updates to goals/timeline occur.
- **How**: Update the **Project Summary** section in Azure DevOps, set milestones in Boards, and share links with the team via Wiki.

2. Create work items (epics, features, user stories, tasks, bugs)

2.1 Epics:

- **What**: High-level initiative that breaks down into Features and User Stories. Represents a major business objective.
- **Who**: Project Manager.
- **When**: During roadmap planning or quarterly planning cycles.
- **How**: Create an Epic in Backlog View

2.2 Features:

- **What**: A major piece of functionality that contributes to an Epic.
- **Who**: Project Manager
- **When**: After an Epic is created and prioritized.

- **How**: Define a Feature under Epics in Backlog View. Assign ownership to a Software Architect for final approval before we close the feature.

2.3 User Stories:

- **What**: Smaller, user-centric deliverables that define what end-users want and why. User story is the outcome of an individual or group of tasks.
- **Who**: Business Analyst/ Project Manager
- **When**: During sprint planning or as soon as the Feature is approved.
- **How**: Create User Stories under the associated Feature in Backlog view. Add clear **Acceptance Criteria** and assign it to the development team. Move it to the **In Progress** state when work begins.

2.4 Tasks:

- **What**: Specific activities to complete a User Story.
- **Who**: Project Manager
- **When**: During sprint execution or as part of backlog grooming.
- **How**: Break down User Stories into Tasks in the Backlog view. Assign owners, estimate effort, and update status to track progress. (Add all development tasks here)

2.5 Bugs:

- **What**: Issues or defects that arise during Reviewing or Testing.
- **Who**: Testers or Reviewers identify and report; Developers fix.
- **When**: During Peer Review, testing cycles, UAT, VAPT or after production deployment.
- **How**: Log Bugs in under user stories in Backlog View with severity, priority, and Observation Type. Verify fixes during testing and mark as **Resolved**.

3. Create a delivery plan

- **What:** Pre-requisites are the work items (epics, features, user stories, tasks, bugs, and issues)
- **Who:** Project Manager
- **When:** The Epics, features, user stories, tasks, and estimations are completed
- **How:** Create the Delivery Plan and data will be automatically populated. You have options to view Delivery Plan on an EPIC, FEATURE, or USER STORY level.

4. Create dependencies among work items

- **What:** Linking items that range from epics, features, user stories, tasks, and Bugs
- **Who:** Project Manager
- **When:** When epics, features, user stories, and tasks are being actively worked on.
- **How:** Use the **Link added section** to mention specific epics, features, user stories, and tasks

5. Create and manage a sprint backlog

- **What:** Create a Sprint under Sprint section in Azure DevOps. Then assign individual developers working hours available for the sprint. Add/Remove work items and update their status with progress and assigned person.
- **Who:** Project Manager
- **When:** When the team is planning/actively working on different epics, features, user stories, and tasks during a sprint.

6. Manage a project backlog

- **What:** During the active sprint, in between the current sprint, add/remove work items and update their status with progress.
- **Who:** Project Manager
- **When:** When the team is actively working on different epics, features, user stories, and tasks.

7. Manage a project board – Fully dependent on Managing project Backlog (Point 6)

8. Run sprint retrospectives

- **What:** Reflect on sprint successes, challenges, and areas for improvement. Plan actionable steps for the next sprint.
- **Who:** All team members
- **When:** End of every sprint, after the Sprint Review.
- **How:** Use Azure DevOps Dashboards and Queries to review sprint metrics, completed work, and unresolved issues. Log improvement suggestions as Tasks, assign owners, and track them in the next sprint.

9. Create dashboards

- **What**: Real-time project tracking tools with widgets for progress, tasks, and metrics.
- **Who**: Project Manager sets up; All team members use.
- **When**: At project initiation and updated regularly.
- **How**: Use **Dashboards** in Azure DevOps to add widgets for tasks, Bugs, and velocity charts. Customize views for different roles.

10. Create Test Cases

- **What**: Detailed test steps and expected results for verifying functionality.

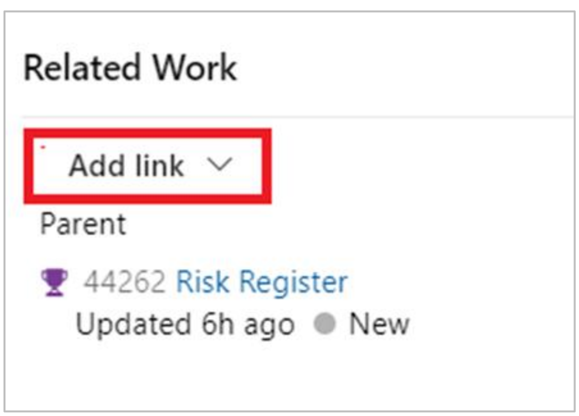
- **Who**: Testers.
- **When**: During or after User Story creation and before testing starts.
- **How**: Use **Azure Test Plans** to create Test Cases linked to User Stories. Execute Test Runs, log results, and link any Bugs found.

11. Create charts from query results and Generate Reports

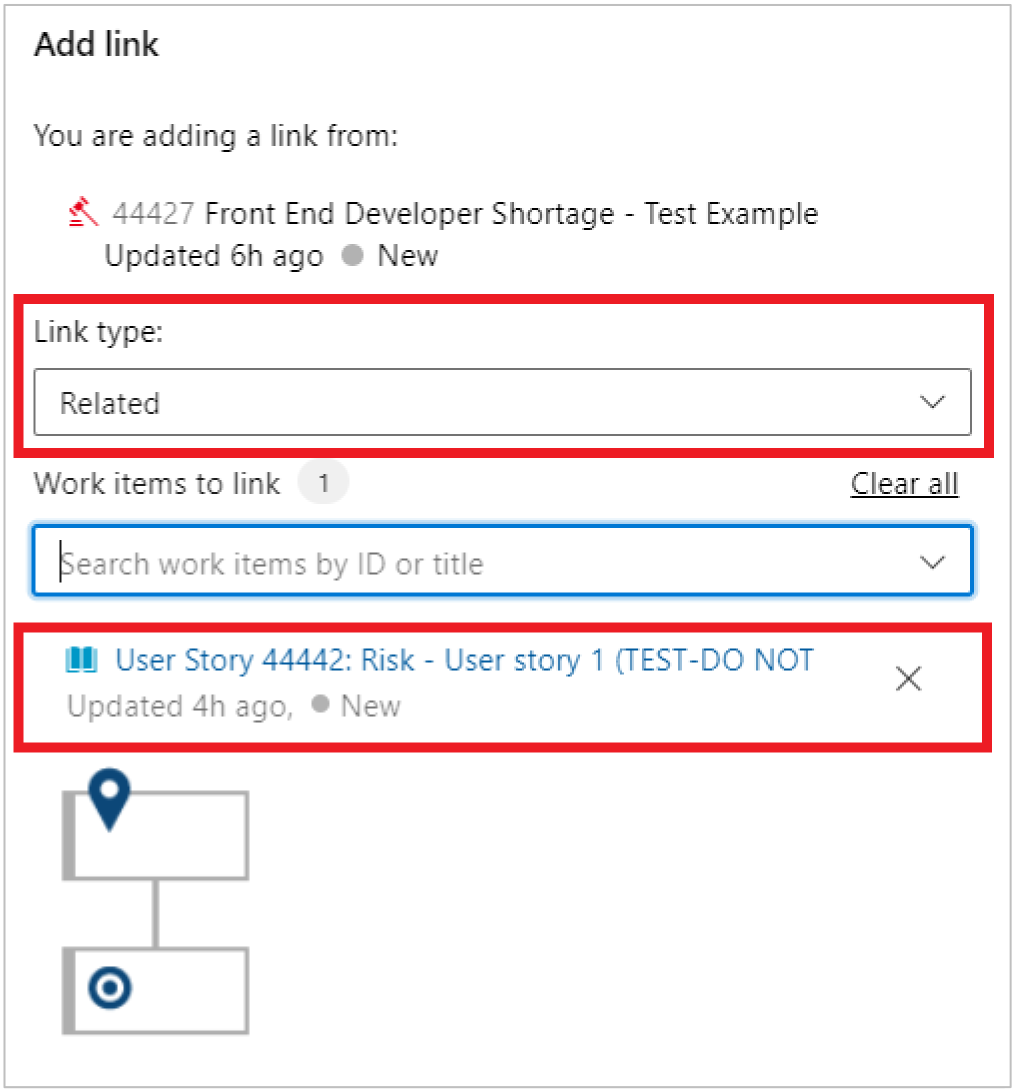
- **What**: Insights on team performance, progress, and workload. Setup Queries and those will automatically generate reports.
- **Who**: Project Managers
- **When**: Weekly for sprint reviews or as required by stakeholders.
- **How: Under Queries section, Go to Editor option to setup the required Query. Results will be shown under result section. Charts can be generated under charts section.**

12. Identify and mitigate high-risk work items

- **Who:** Project Manager
- **When:** Throughout the project lifecycle
- **How:** Create a work item (Type: Epic) called Project Management. Create another Work Item (Type: Feature) and name it as **Risk Register**. **The Risk Register work item will be linked to the Epic in a parent relationship with the Project Management EPIC being the Parent.** Then create risk work items, which will be named by the types of risk in the overall project. For example: (Type: Risk), name them as Functionality Gaps, Development Gaps, Ensuring Testing Coverage, Front-end developer shortage.



Within **each risk work item**, there is a section named **Related work (Right hand bottom side)**. In the related work section, click **Add Link** and select **existing item**.

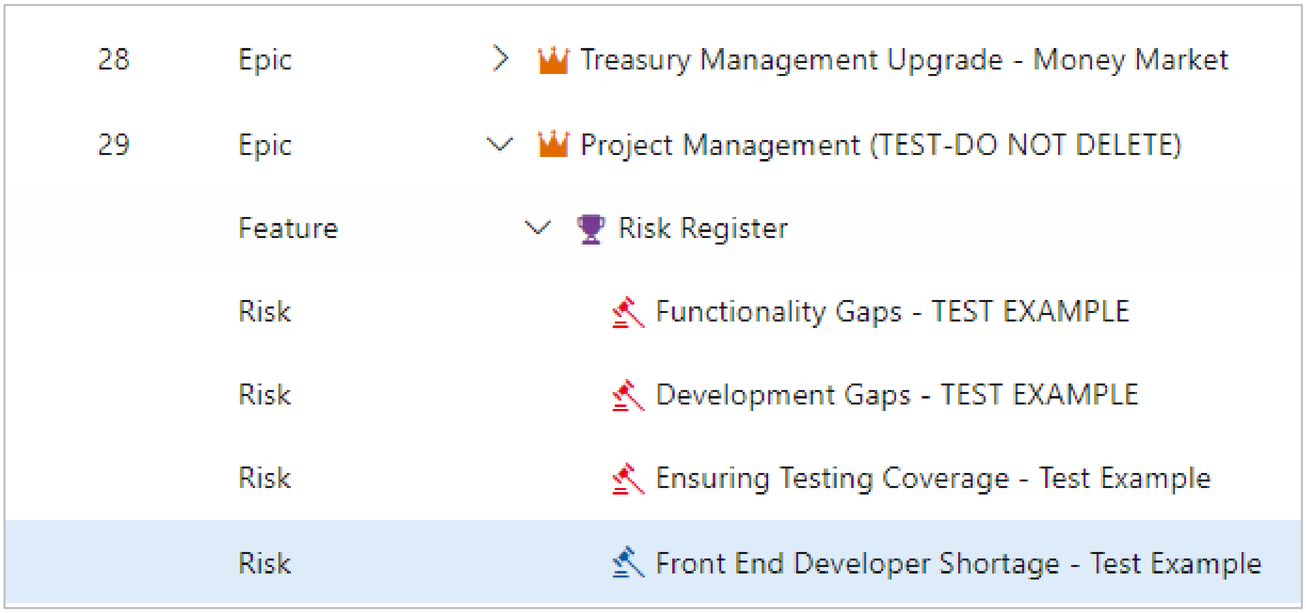


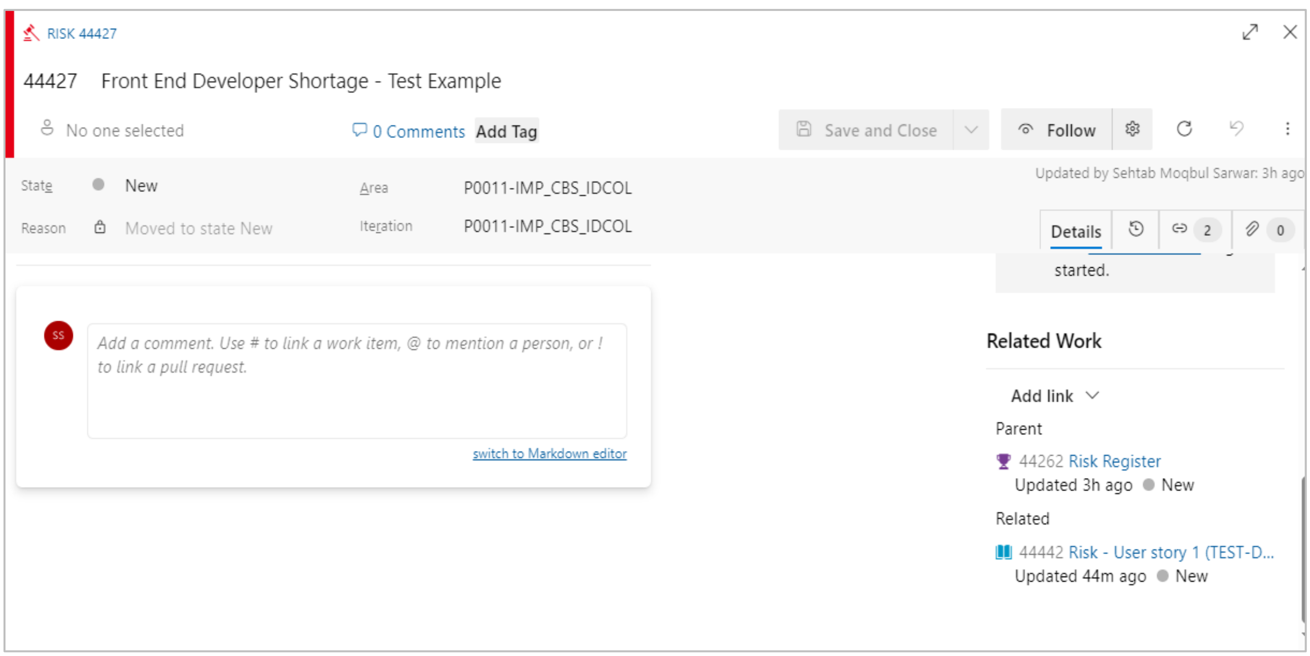
Then **click Link Type** and choose **parent** relationship, now **click "work items to link"** and choose existing **<u>Risk Register work Item</u>** and save. You have now created a **parent relationship** and can **view <u>risk work items</u>** under **<u>Risk Register work item</u> in your backlog.**

Similarly, within **each Risk work item**, there is a section named **Related work (Right hand bottom side)**. In the related work section, **click Add Link** and select **existing item**.

Then **click Link Type** and choose **Related** relationship, now **click "work items to link"** and choose existing **<u>User Story work Items</u>** which are related to this type of risk and save. You have now created a **related relationship** and can view **<u>user story work items</u>** under particular **<u>Risk work item</u>** in your backlog.

<u>*Check the Screenshots below, the final output should look like this in the backlog</u>





<u>*Final output view in Backlog (Check Above Screenshots)*</u>

13. Work Item States

13.1 EPIC

STATES: NEW – ACTIVE – RESOLVED – CLOSED – REMOVED

States	What	Who and When
NEW	**New** – When epic has not gone into development phase or sprint plan	Project Manager immediately before development starts
ACTIVE	**Active**- When Epic has gone into the Development phase	Project Manager immediately when EPIC is taken into the development sprint
RESOLVED	**Resolved -** When all tasks, user stories, and Features under an epic have been closed and passed UAT.	Project Manager After we have passed UAT
CLOSED	**Closed –** All the work/Rework on the EPIC has been completed as the project is handed over.	Project Manager after the project is completed and handed over to the Service Team
REMOVED	**Removed –** Not a Project Requirement anymore.	Project Manager, when any epic becomes irrelevant or not required anymore. Can happen during any stage of the project.

13.2 FEATURES

States: NEW – ACTIVE – RESOLVED – CLOSED – REMOVED

States	What	Who and When
NEW	**New –** Feature is in backlog but not assigned to a sprint plan or development phase	Project Manager when a feature has been assigned to the team/individual person
ACTIVE	**Active –** Feature is included to a sprint for development and work is started.	Project Manager when a feature has been assigned to the team/individual person
RESOLVED	**Resolved-** All user stories and tasks associated with the feature have been completed & closed.	Project Manager when all the user stories and tasks under the feature has been closed and ready for UAT.
CLOSED	**Closed-** The feature has undergone Testing and UAT and is ready to be deployed to the client environment.	Project Manager when Testing, UAT has been done and ready to be deployed on client end.

REMOVED	**Removed-** The Feature is no longer a project Requirement	Project Manager when any Feature becomes irrelevant or not required anymore. Can happen during any stage of the project.

13.3 <u>USER STORIES</u>

<u>States : NEW – ACTIVE – RESOLVED –UNDER DEVELOPMENT- DEVELOPMENT COMPLETED – UNDER TESTING- TESTING PASSED- TESTING FAILED – DEPLOYED FOR UAT – CLOSED – REMOVED</u>

States	What	Who and When
NEW	**New –** The user story is in the backlog under a particular EPIC but not included in a sprint/Development phase.	Business Analyst when the tasks under the Usery story are being assigned to users for the current sprint.
ACTIVE	**Active-** The user story has been assigned to the Business Analyst and is actively being worked on in the development phase	Business Analyst, when the assignee of the tasks under the user story starts working on it.
RESOLVED	**Resolved -** The user story has been fully developed, tested, and all issues have been resolved. It is now ready for further actions like UAT or deployment.	Business analyst, when the development and testing is completed, all bugs are fixed.
UNDER DEVELOPMENT	**UNDER DEVELOPMENT** -The user story has returned to the development phase due to bugs or issues identified during testing, requiring further work.	Business Analyst, when the initial development was done, bugs were identified and fixed, but issues come up during the second round of testing.
DEVELOPMENT COMPLETED	**DEVELOPMENT COMPLETED** - The development work for the user story has been completed, and it is ready to move to the testing phase.	Business Analyst when development work has been done.
UNDER TESTING	**UNDER TESTING** - The user story and all tasks under it is undergoing testing to ensure it meets the requirements and functions as expected.	Business Analyst when development has been done and is assigned to a tester.

TESTING PASSED	**TESTING PASSED** -The user story and related tasks have successfully passed testing and are ready for deployment or further approval.	Business Analyst, when the tester has successfully finished testing.
TESTING FAILED	**TESTING FAILED** - The user story and all related tasks did not pass testing, and the Business Analyst must coordinate with developers/testers to address the issues.	Business Analyst when full user story testing is unsuccessful.
DEPLOYED FOR UAT	**DEPLOYED FOR UAT** The user story has been deployed to the UAT environment for user acceptance testing by stakeholders or end-users.	Business Analyst, when all the tasks under the user story are finished, testing is successful, and ready to be deployed on the UAT Server (Can be our server or client server)
CLOSED	**CLOSED** - The user story has successfully gone live	Business Analyst when the Project has gone live successfully
REMOVED	**REMOVED** - The user story has been deemed irrelevant or unnecessary and removed from the project scope at any stage.	Project Manager or Business Analyst when any Feature becomes irrelevant or not required anymore. Can happen during any stage of the project.

13.4 TASKS

States: NEW – ACTIVE – ON HOLD – CLOSED

States	What	Who and When
NEW	**NEW** -The task has been created but not yet assigned to a developer or included in sprint. It is in the backlog or planning phase.	Each task assignee is assigned to single or multiple tasks under a user story.
ACTIVE	**ACTIVE-** The task has been assigned to a developer and is currently being worked on	
ON HOLD	**ON HOLD** - The task has been paused due to a dependency or blocker, such as waiting for	Task assignee when there is a dependency with other User stories

	another user story or task to be completed.	
CLOSED	**CLOSED** - The task has been completed, development work is finished, and it has been marked as closed on the Azure DevOps board.	Task assignee when the task is finished

13.5 BUGS

States: NEW – ACTIVE – ON HOLD - RESOLVED – UNDER TESTING- READY FOR DEPLOYMENT – TESTING FAILED – REOPENED – CLOSED

States	**What**	**WHO AND WHEN**
NEW	**New-** The bug has been identified and logged in the system but has not yet been assigned to a developer for resolution.	When the Testers assigns a developer to a bug and the developer starts working on it. Developer change the state to active when they start working on it.
ACTIVE	**Active-** The bug has been assigned to a developer, and they have started working on fixing it.	Developer when they started working.
ON HOLD	**On Hold-** The bug is temporarily paused due to a dependency on another user story or task that needs to be resolved first.	Developer when the bug has dependency with other user story stories.
RESOLVED	**RESOLVED** - The developer has fixed the bug and is ready to pass it to the tester for validation.	Developer when the bug has been fixed
UNDER TESTING	**UNDER TESTING** The bug fix is being validated by the tester to ensure the issue has been resolved and no further problems exist.	Developers when the fix has been made assigns it to the tester. Tester can check assigned history
READY FOR DEPLOYMENT	**READY FOR DEPLOYMENT** The tester has confirmed that the bug is fixed and no longer exists. The fix is now ready to be deployed to the appropriate environment.	Tester when the fix has been made, and the bug no longer exists.
TESTING FAILED	**TESTING FAILED**	Tester when the testing is failed.

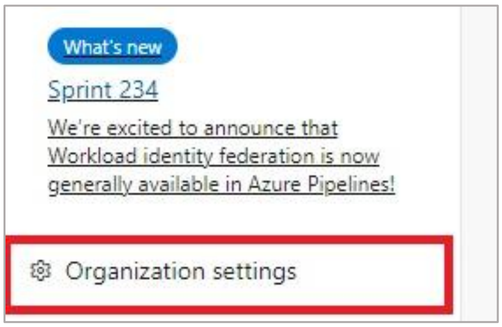
	The tester has found that the bug still exists after the developer's initial fix, and it needs to be reworked.	
REOPENED	**REOPENED-** The bug has resurfaced after being previously resolved or closed and requires further work. This can happen at any stage, including after the project handover.	Tester when they find the same bug when it has come back from the developer after the first fix
CLOSED	**Closed –** The bug does not exist anymore. BA, TESTER and Developer all agreed.	PROJECT MANAGER/BA when the bug has been tested, fixed and project is delivered.

4 Project Initiation

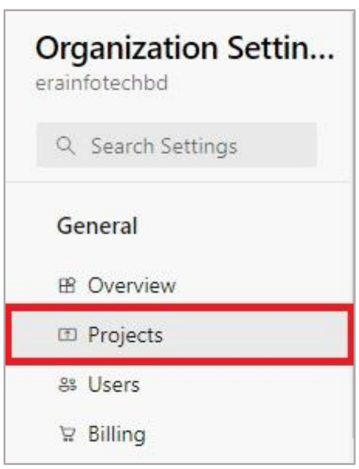
4.1 Create a New Project and Delivery Plan

Use these steps to create a new project and delivery plan in Azure DevOps:

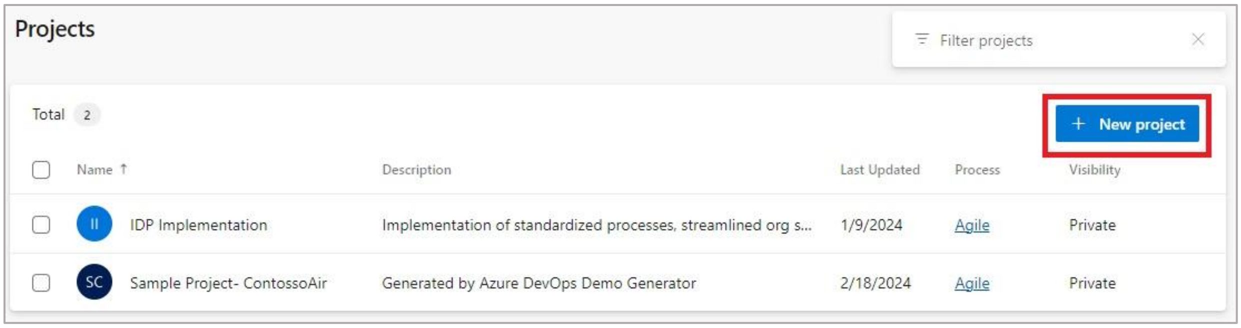
1. Login to Azure DevOps.
2. Click on ‘Organization Settings’, which is located on the bottom left-hand corner.



3. From the ‘General’ section of the menu, click on ‘Projects’.

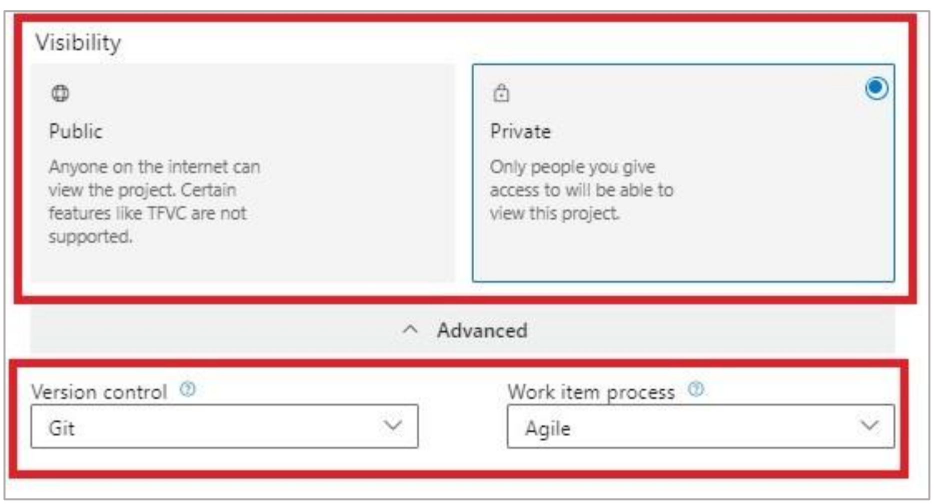


4. Select ‘New project’.



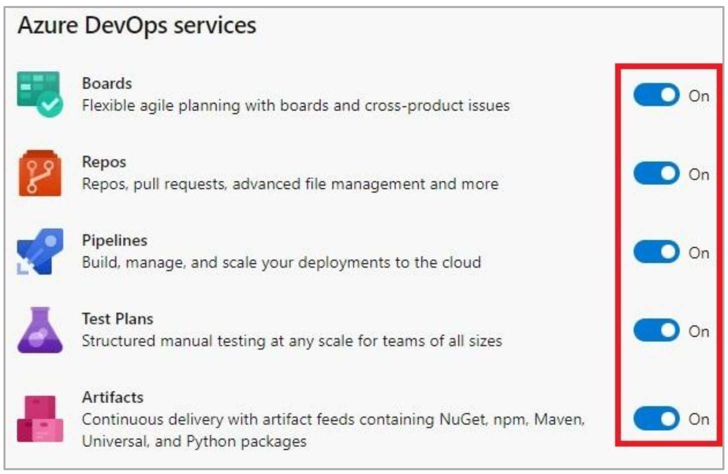
5. Provide an appropriate ‘Project name’ and ‘Description’.

6. Select ‘Private’ for project visibility, ‘Git’ for version control and ‘Agile’ for work item process.
    - You may choose another work item process if it is better suited for the project.

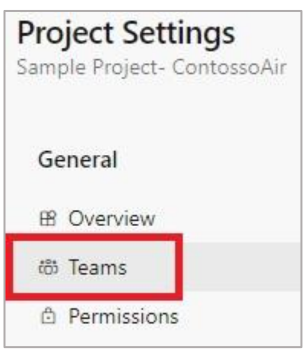


7. Click ‘Create’ to finish.
8. Once the project has been created, click on it to see ‘Project details’.
9. You can add additional project administrators by clicking ‘Add administrator’ and typing in the person’s name.

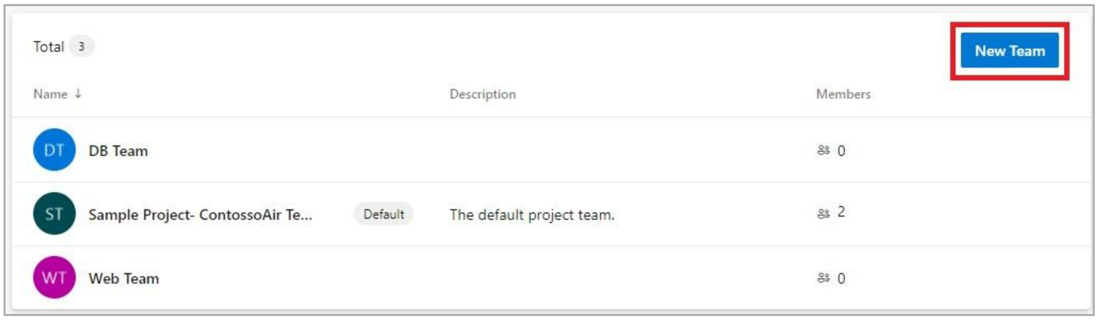
10. Once the person has been found, click ‘Add’.
11. Scroll down to ‘Azure DevOps services’ and make sure Boards, Repos, Pipelines, Test Plans and Artifacts are all turned on.



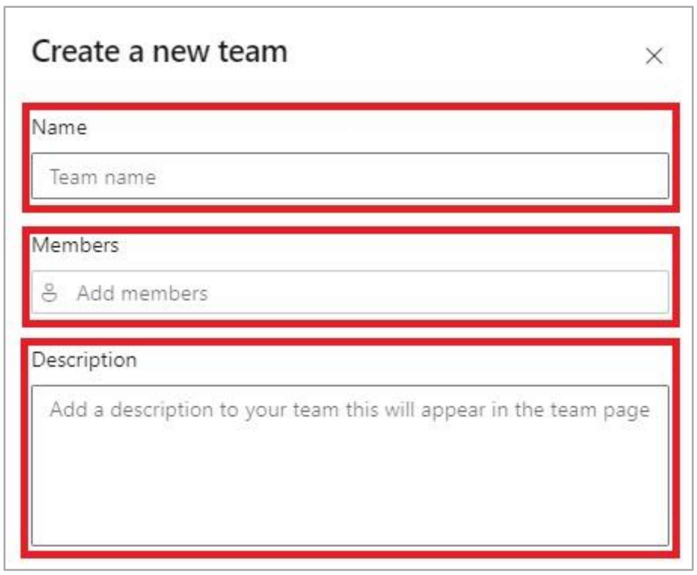
12. Go to ‘Teams’ in the General section



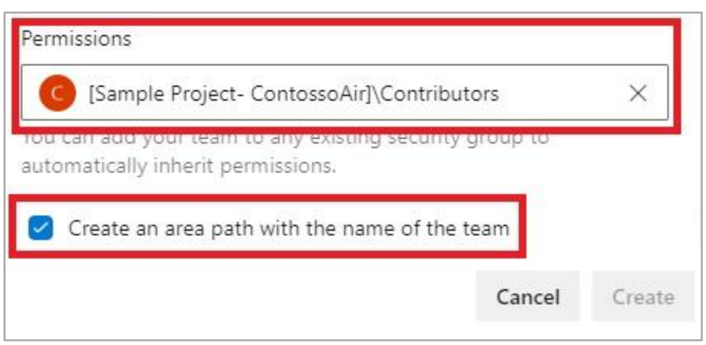
13. Click ‘New Team’ to create your project team.



14. Provide an appropriate ‘Name’ (team name), ‘Description’ (what the team will work on), and add members to the project team by typing in their names in the ‘Members’ box.

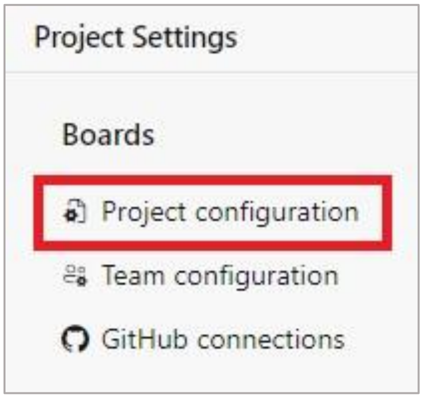


15. Set team members’ permission to ‘Contirbutors’ and check the box for ‘Create an area path with the name of the team’.



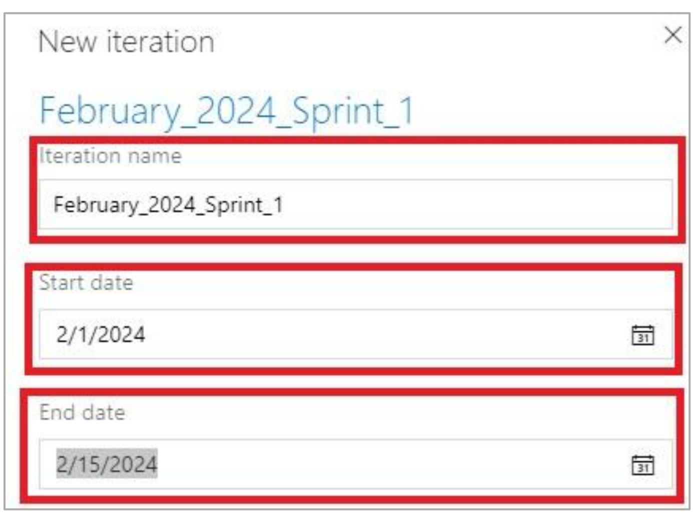
16. Click ‘Create’.

17. Navigate to 'Project configuration' in the Boards section.

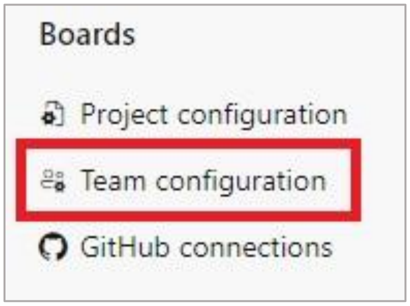


18. Right click on the project and select 'New child' to add sprint iterations.

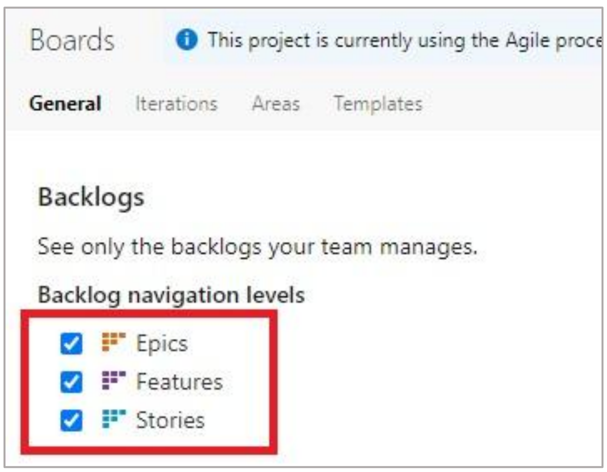
19. Fill out Iteration name, Start date and End date.
    - Add as many sprint iterations as needed to complete the project.
    - Choose an appropriate sprint iteration name, i.e. February_2024_Sprint_1
    - The length of a sprint can range from two weeks up to a month.



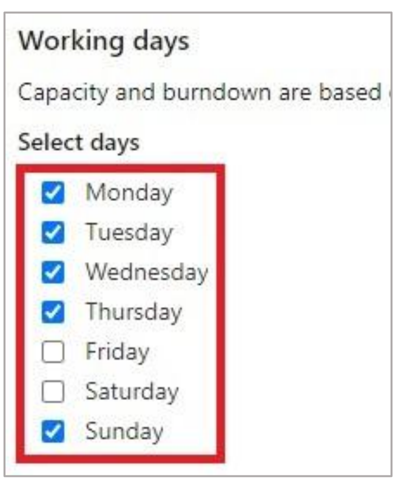
20. Click ‘Save and close’.
21. Navigate to ‘Team configuration’ in the Boards section.



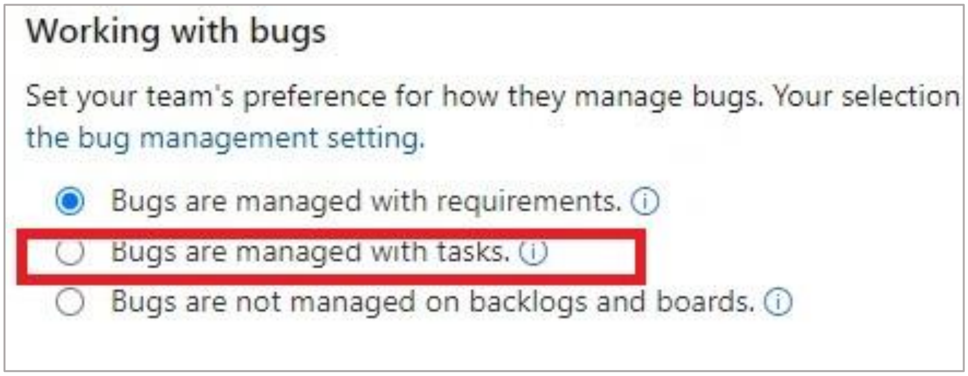
22. From the ‘General’ tab, go to ‘Backlogs’ and make sure Epics, Features and Stories are selected.



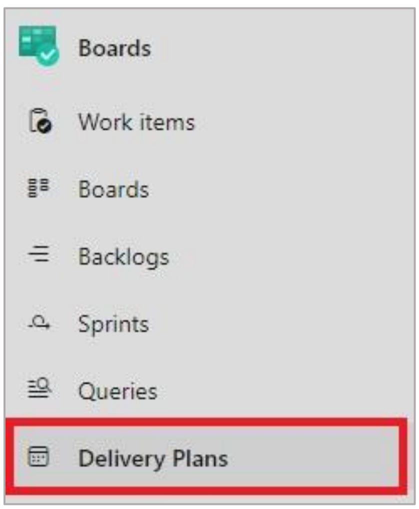
23. Under ‘Working Days’, make sure Friday and Saturday are unchecked.



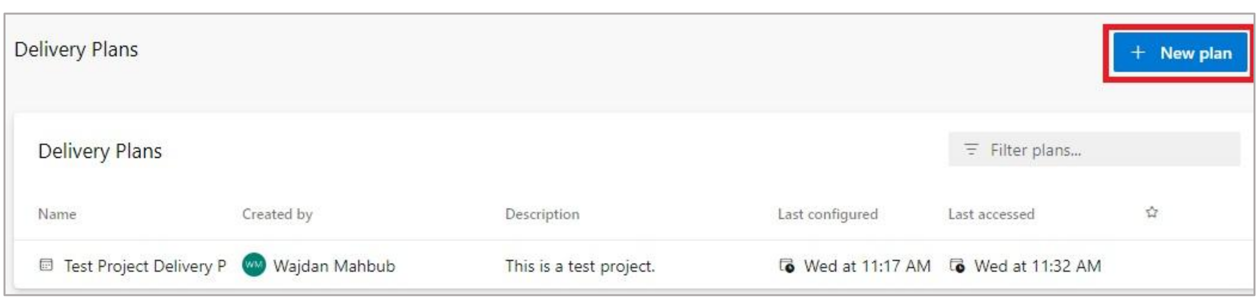
24. Under ‘Working with Bugs’, select ‘Bugs are managed with tasks.’



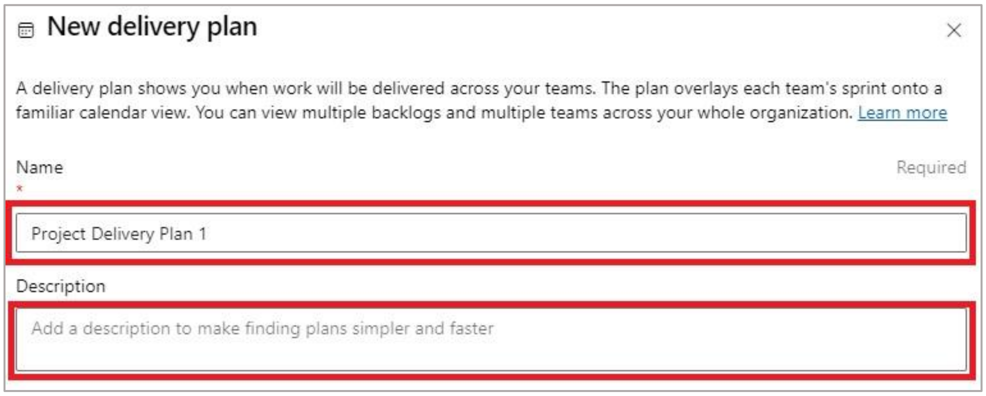
25. Navigate to ‘Delivery Plans’ from the ‘Boards’ menu.



26. Click on ‘New plan’ to add a delivery plan for your project.



27. Provide an appropriate name and description for the delivery plan.



28. Select your project under ‘Project’, the appropriate project team under ‘Team’ and choose ‘Features’ for backlog.
    - Select epics or stories if you want the delivery plan to show them instead of features.
    - You can add additional teams and projects to the delivery plan if you need to.

29. Click ‘Create’ to see your delivery plan.
    - Your delivery plan will be blank at this stage because you have not entered any ‘Work Items’.
30. Go to ‘Settings’.

31. From the settings menu, click on ‘Fields’.

32. Select ‘Show child rollup data’ from ‘Core fields’.

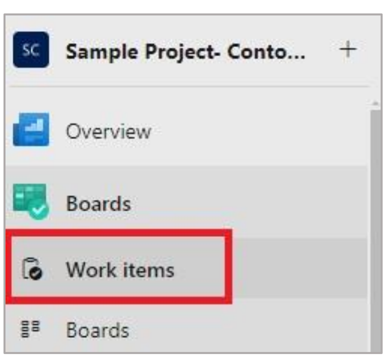
33. Click ‘Save’ to finish.

4.2 Save Project Initiation Documents

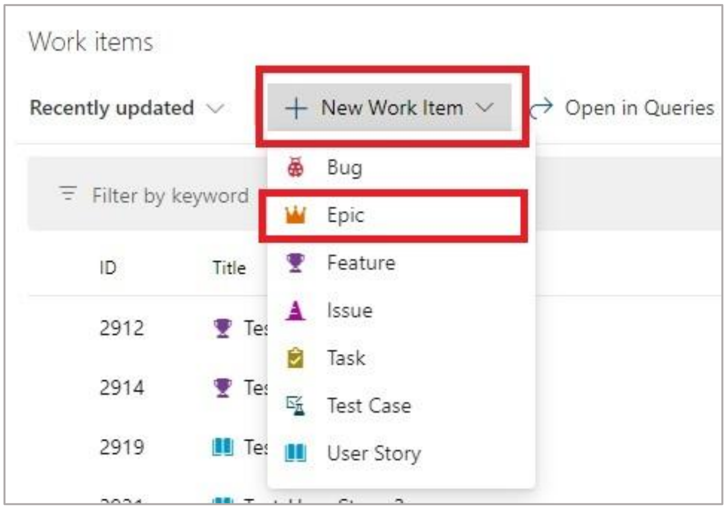
Use these steps to save project initiation documents in Azure DevOps:

1. Create an Epic called ‘Project Initiation Documents’:

    1.1) From the Boards menu, click on ‘Work Items’.



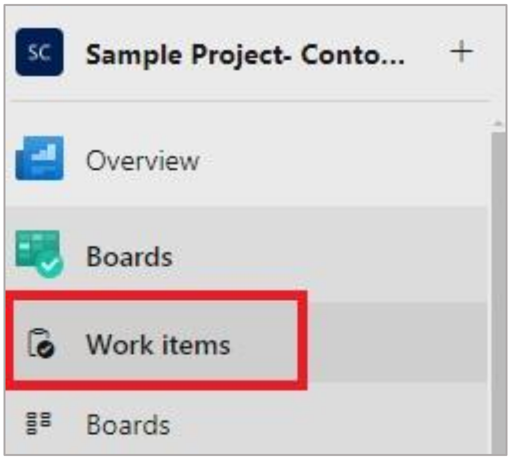
1.2) To create an Epic, click on ‘New Work Item’ and select ‘Epic’.



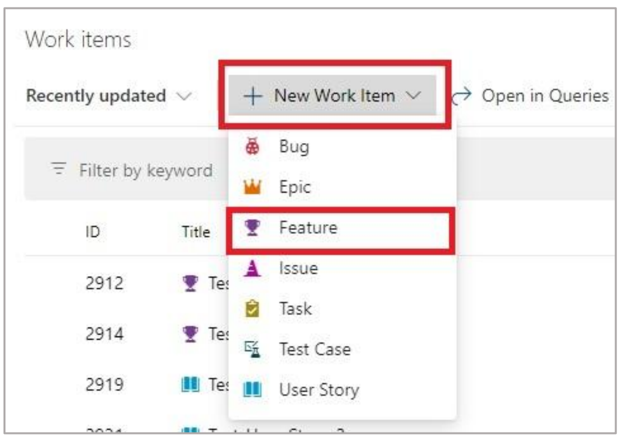
1.3) Enter ‘Project Initiation Documents’ as the epic’s title.
1.4) Assign someone from the project team to be responsible for the epic.
1.5) Enter an appropriate description for the epic.
1.6) Select the project in ‘Area’.
1.7) Assign the epic to the appropriate sprint in ‘Iteration’.
1.8) Enter the ‘Start Date’ and ‘Target Date’.
1.9) Select the appropriate ‘Risk’ value for the epic.
1.10) Enter an initial estimate for effort.
1.11) Click ‘Save’.
1.12) Set’s the Epic’s ‘State’ to Active and click ‘Save’.
1.13) When you are ready to begin working on the document, set the epic’s state to ‘Active’ and click ‘Save’.

2. Create a feature to act as a document container in Azure DevOps:

   2.1) From the Boards menu, click on ‘Work Items’.



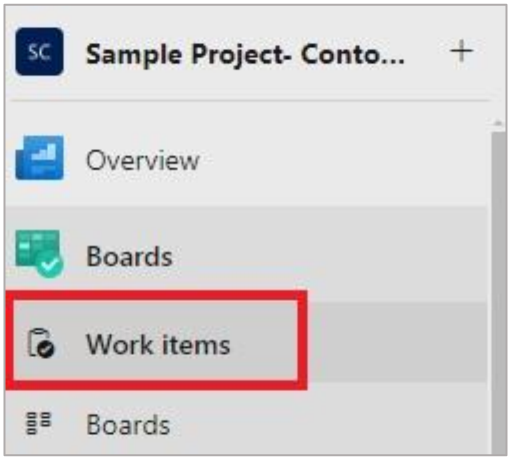
2.2) To create a feature, click on ‘New Work Item’ and select ‘Feature’.



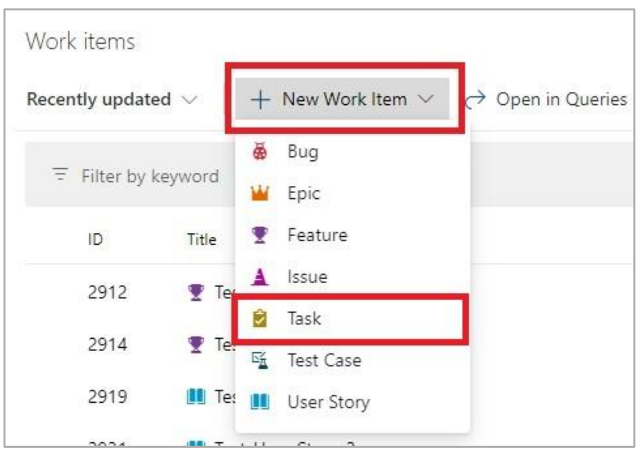
2.3) Enter the name of the document that will be stored in the container as the feature’s title.
2.4) Assign someone from the project team to be responsible for the feature.
2.5) Enter an appropriate description for the feature.
2.6) Select the project in ‘Area’.
2.7) Assign the feature to the appropriate sprint in ‘Iteration’.
2.8) Enter the ‘Start Date’ and ‘Target Date’.
2.9) Enter how much effort the document will take to complete.
2.10) Select the appropriate ‘Risk’ value for the feature.
2.11) From the ‘Related Work’ section, create a parent link from the feature to the project initiation documents epic.
2.12) Click ‘Save’.
2.13) Set the Feature's ‘State’ to Active and click ‘Save’.
2.14) When you are ready to begin working on the document, set the feature's state to ‘Active’ and click ‘Save’.

3. Create a task to store a document in Azure DevOps:

3.1) From the Boards menu, click on 'Work Items'.



3.2) To create a task, click on 'New Work Item' and select Task.



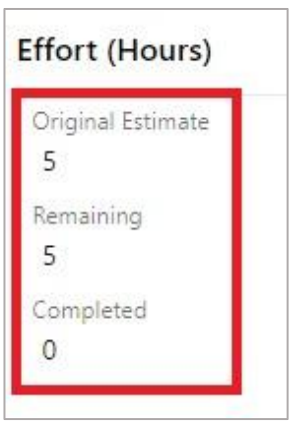
3.3. Enter the name of the document in the title.
3.4) Assign someone from the project team to be responsible for the task.
3.5) Enter an appropriate description for the task.
3.6) Select the project in 'Area'.
3.7) Assign the task to the appropriate sprint in 'Iteration'.
3.8) Select the appropriate 'Risk' value for the task.
3.9) Enter how much effort the task will take to complete in 'Original Estimate'.
3.10) From the 'Related Work' section, create a parent link from the task to its parent feature.
3.11) Click 'Save'.

3.12) When you are ready to begin working on the document, set the task's state to 'Active' and click 'Save'.

4. Repeat steps 2 and 3 to create features and tasks for all Project Initiation documents.
   - Each document must have its own Feature and Task, but will fall under the 'Project Initiation Documents' epic.
   - No two or more documents will go into a single task and feature.
5. One a document is ready, follow these steps to upload it:

5.1) Enter a document's Task.
5.2) Click on the 'Attachment' button on the right-hand side of the window.

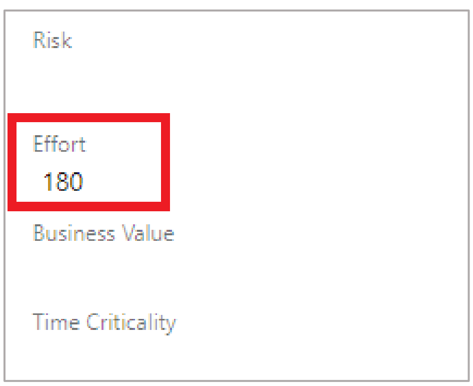
5.3) Select 'Add attachment'
5.4) Choose a file from your desktop or One Drive and click 'Open'.
5.5) Click 'Save'.
5.6) Update the effort values (Completed and Remaining).



5.7) Set the Task's 'State' to Closed and click 'Save'.
5.8) Update the parent feature's effort value.

5.9) Set the parent Feature's 'State' to Closed
5.10) Click 'Save'.

6. Repeat Step 5 to upload all Project Initiation documents.
7. Once all documents are uploaded, set the 'Project Initiation Documents' epic's state to 'Closed'.
8. Update the epic's effort value.

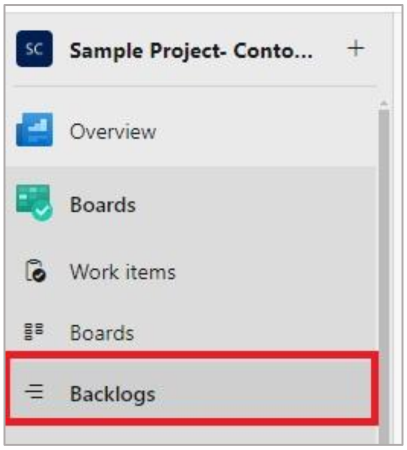


9. Click 'Save'.
10. All Project Initiation documents must be saved to SharePoint, in a folder called 'Project Initiation'.

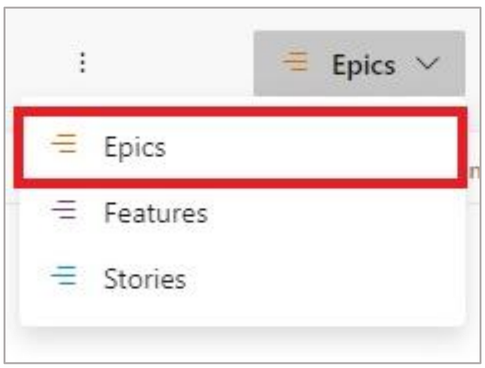
4.3 Create a High-Level Backlog in Azure DevOps

The project team and project manager will use these steps to create a high-level backlog using the RFP and project evaluation report.

1. From the Boards menu, select 'Backlogs'.

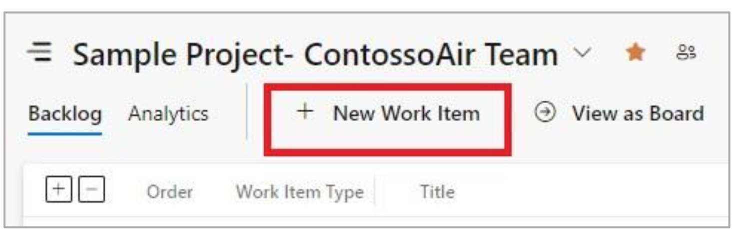


2. Set the backlog's view to 'Epics'.



3. Create an Epic in Azure DevOps called 'High-Level Backlog':

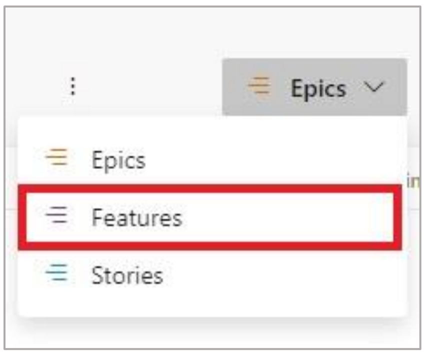
3.1) To create an Epic, click on 'New Work Item'.



3.2) Put 'High-Level Backlog' as the epic's title and then click 'Add to top'.

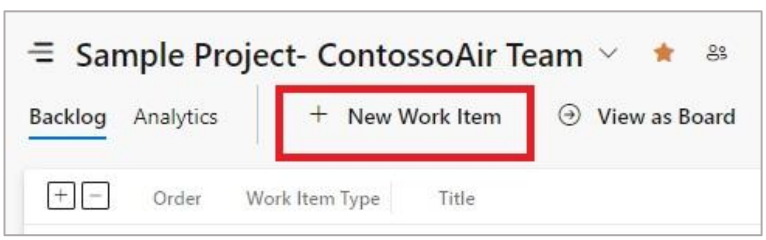
3.3) Click to enter the epic.
3.4) Assign someone from the project team to be responsible for the epic.
3.5) Enter an appropriate description for the epic.
3.6) Select your project in 'Area'.
3.7) Assign the epic to the appropriate sprint in 'Iteration'.
3.8) Enter the 'Start Date' and 'Target Date'.
3.9) Select the appropriate 'Risk' value for the epic.
3.10) Put in an initial estimate for effort.
3.11) Click 'Save' to finish.

4. Break the epic down into several manageable features.
    - The number of features will depend on the complexity of the project.
    - Limit the number of features for the high-level backlog to less than or equal to eight.
5. Set the backlog's view to Features.

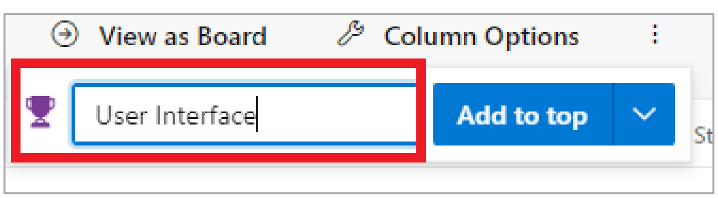


6. Create features in Azure DevOps:

    6.1) To create a Feature, click on 'New Work Item'.



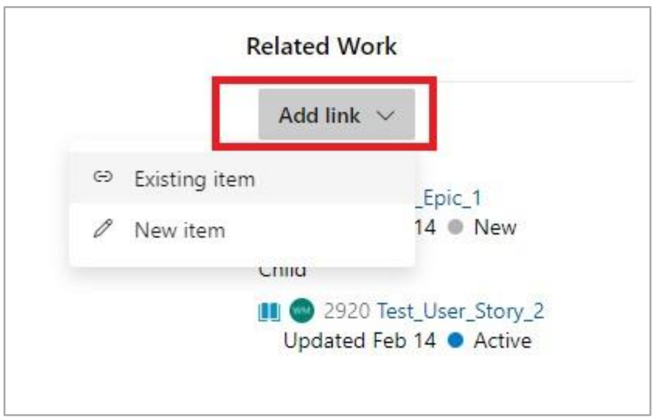
    6.2) Enter an appropriate name for the Feature and click 'Add to top'.



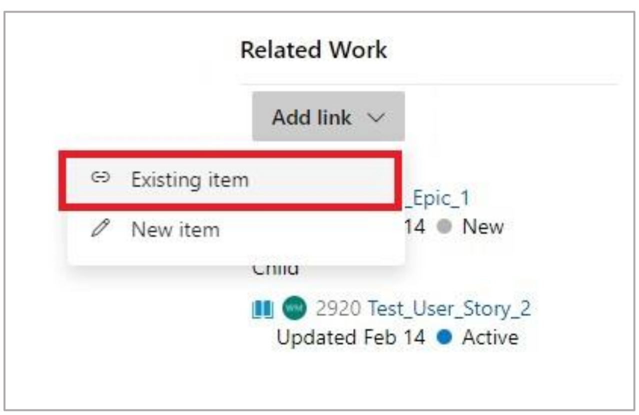
6.3) Click to enter the feature.
6.4) Assign someone from the project team to be responsible for the feature.
6.5) Enter an appropriate description for the feature.
6.6) Select your project in 'Area'.
6.7) Assign the feature to the appropriate sprint in 'Iteration'.
6.8) Enter the 'Start Date' and 'Target Date'.
6.9) Select the appropriate 'Risk' value for the task.
6.10) Enter an estimate for effort using the effort guideline.
6.11) Click 'Save' to finish.

7. Link all features of the high-level backlog back to the epic to create a dependency:

7.1) Click on a feature and scroll down to the 'Related Work' section.
7.2) Click on 'Add Link'.



7.3) Select 'Existing item'.



7.4) Select 'Parent' for 'Link type'.

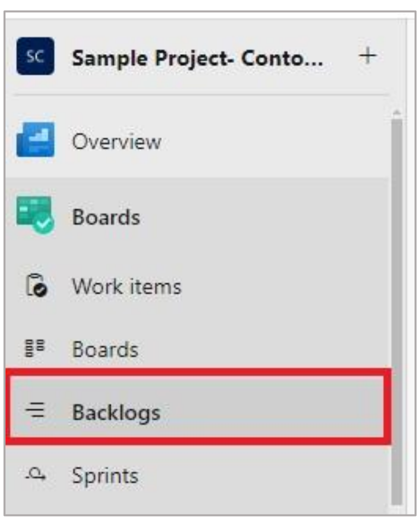
7.5) In ‘Work items to link’, type in the name of the epic (‘High-Level Backlog’).

7.6) Click ‘Add link’.
7.7) Click ‘Save’ to finish.

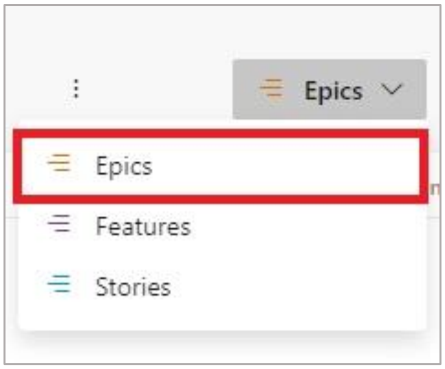
4.4 Enter Effort Estimation in Azure DevOps

The project manager or project team members will use these steps to enter effort estimates for work items in Azure DevOps. Estimates must be provided for high-level backlogs (epics and features) and detailed backlogs (epics, features, tasks and bugs).

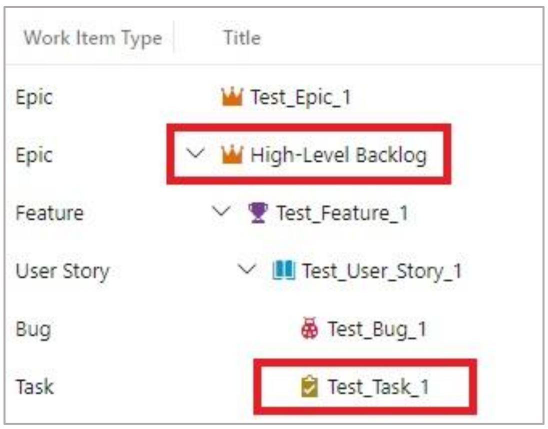
1. From the ‘Boards’ section, go to ‘Backlogs’.



2. Put the backlog's view to 'Epics'.



3. Click to enter a task for that epic.

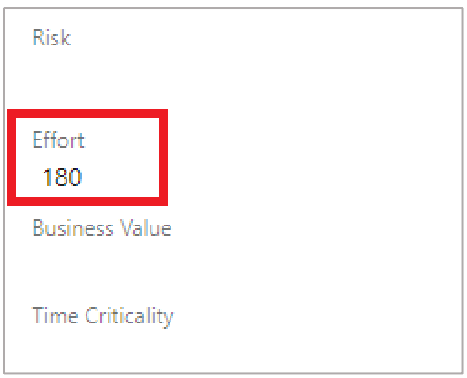


4. Generate a value for 'Effort' using the appropriate estimation method.
5. Put the effort value in the 'Original Estimate' and 'Remaining' bars.

6. Click 'Save' to finish.
7. Repeat steps 3 to 6 for all tasks under a user story.

8. Sum up the 'Original Estimate' effort values and enter the aggregate value into the parent feature's 'Effort' bar.

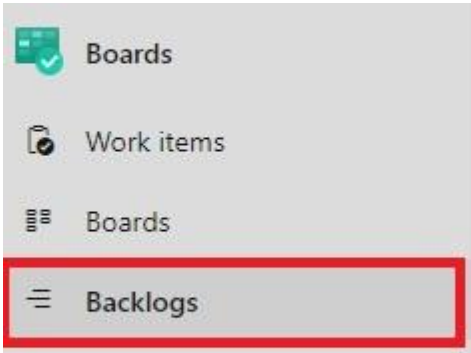
9. Click 'Save' to finish.
10. Sum up 'Effort' values for all child features and enter the aggregate value into the parent epic's 'Effort' bar.



11. Click 'Save' to finish.
12. One you start working on the tasks for each user story, update the 'Remaining' and 'Completed' bars each day to keep the backlog up to date.

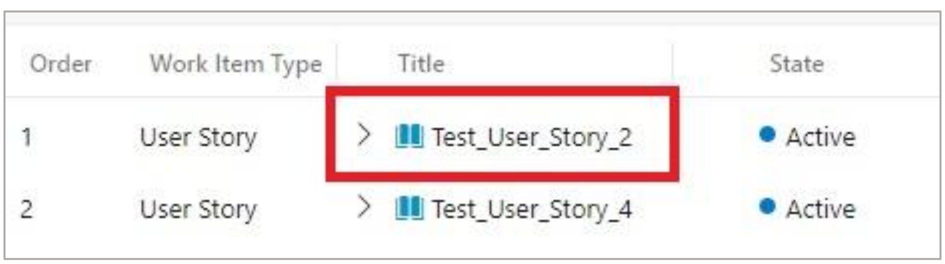
4.5 Enter Story Points for User Stories

1. Go to Backlogs from the Boards menu.



2. Select ‘Stories’ for the backlog view.

3. Click to enter a User Story.



4. Enter a story point value for the user story.
    - We will use a modified Fibonacci sequence to assign story point values.
    - Business analysts will assign a story point value after discussing the user story’s complexity with the development team.
    - A user story can be assigned 1, 2, 3, 5 or 8 for the story point.
    - If a user story has a story point greater than 8, you need to break that user story down into smaller stories and enter them into the backlog.

5. Click ‘Save’ to finish.
6. Repeat steps 3 to 4 to enter story point values for all user stories.

5 Project Planning

5.1 Create Project Planning Documents

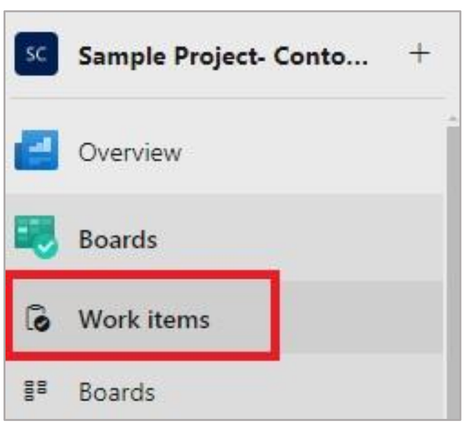
1. The project manager must create a Project Plan with input from the project team.
    - The Project Plan must include these documents:
        A. Risk Management Plan
        B. Communication Management Plan
        C. Configuration Management Plan
        D. Quality Management Plan
        E. Training Plan
        F. Data Management Plan
        G. Product Integration Plan
        H. Verification and Validation Plan
        I. Acceptance Plan

5.2 Save Project Planning Documents

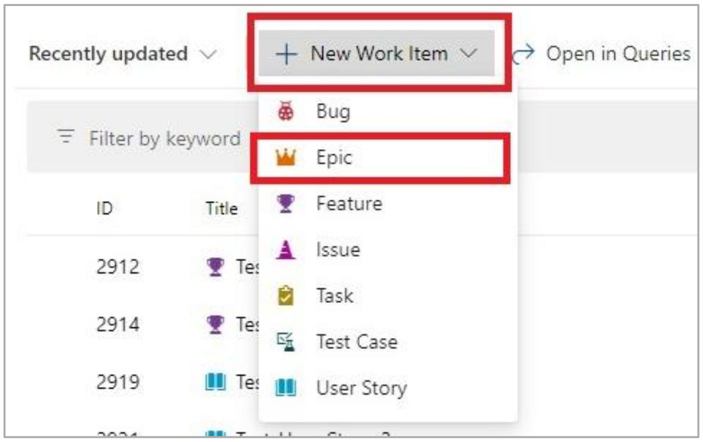
Use these steps to save project planning documents in Azure DevOps:

1. Create an Epic called 'Project Management':

    1.1) From the Boards menu, click on 'Work Items'.



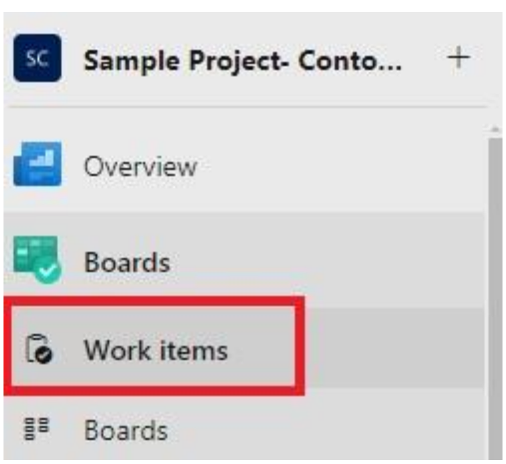
1.2) To create an Epic, click on 'New Work Item' and select 'Epic'.



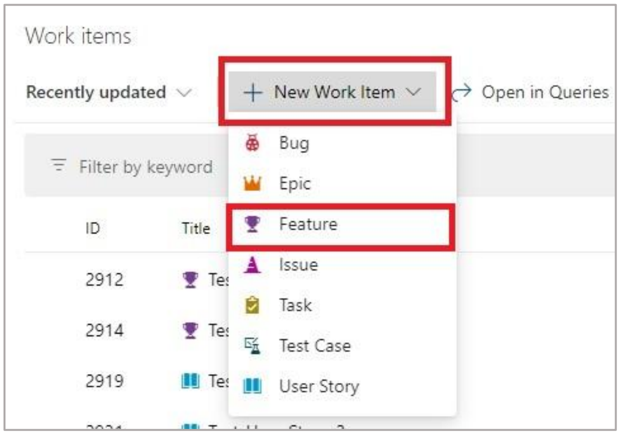
1.3) Enter 'Project Management' as the epic's title.
1.4) Assign someone from the project team to be responsible for the epic.
1.5) Enter an appropriate description for the epic.
1.6) Select the project in 'Area'.
1.7) Assign the epic to the appropriate sprint in 'Iteration'.
1.8) Enter the 'Start Date' and 'Target Date'.
1.9) Select the appropriate 'Risk' value for the epic.
1.10) Enter an initial estimate for effort.
1.11) Click 'Save'.
1.12) Once you are ready to work on the epic, set's the epic's state to 'Active' and click 'Save'.

2. Create a feature to act as a document container in Azure DevOps:

2.1) From the Boards menu, click on 'Work Items'.



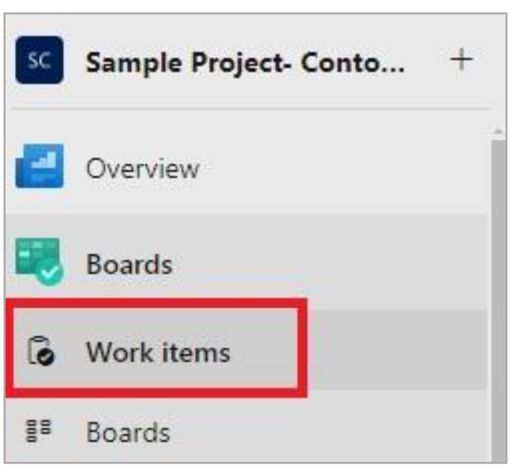
2.2) To create a feature, click on ‘New Work Item’ and select ‘Feature’.



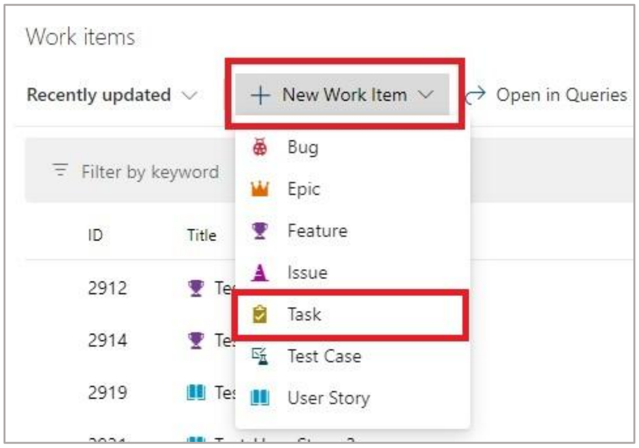
2.3) Enter the name of the document that will be stored in the container as the feature’s title.
2.4) Assign someone from the project team to be responsible for the feature.
2.5) Enter an appropriate description for the feature.
2.6) Select the project in ‘Area’.
2.7) Assign the feature to the appropriate sprint in ‘Iteration’.
2.8) Enter the ‘Start Date’ and ‘Target Date’.
2.9) Enter how much effort the feature will take to complete in the ‘Effort’ bar.
2.10) Select the appropriate ‘Risk’ value for the task.
2.11) From the ‘Related Work’ section, create a parent link from the feature to the project planning documents epic.
2.12) Click ‘Save’.
2.13) Once you are ready to work on the document, set the feature's ‘State’ to Active and click ‘Save’.

3. Create a task to store a document in Azure DevOps:

3.1) From the Boards menu, click on ‘Work Items’.



3.2) To create a task, click on ‘New Work Item’ and select Task.



3.3) Enter the name of the document as the title.
3.4) Assign someone from the project team to be responsible for the task.
3.5) Enter an appropriate description for the task.
3.6) Select the project in ‘Area’.
3.7) Assign the feature to the appropriate sprint in ‘Iteration’.
3.8) Select the appropriate ‘Risk’ value for the task.
3.9) Enter how much effort the task will take to complete in ‘Original Estimate’.
3.10) From the ‘Related Work’ section, create a parent link from the task to the document feature.
3.11) Click ‘Save’.
3.12) Once you are ready to work on the document, set the task’s state to ‘Active’ and click ‘Save’.

4. Repeat Step 2 and 3 to create features and tasks for all Project Planning documents.
    - Each document must have its own Feature and Task.
    - No two or more documents will go into a single task or feature.

5. One a document is ready, follow these steps to upload it:

5.1) Enter a document’s Task.
5.2) Click on the ‘Attachment’ button on the right-hand side of the window.

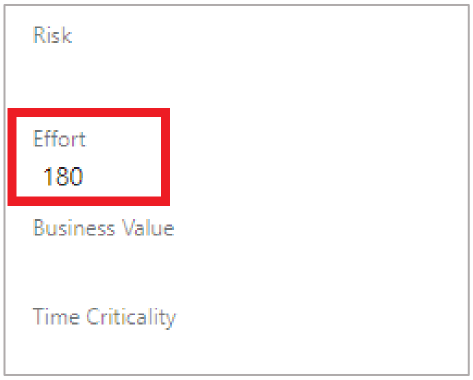
5.3) Select ‘Add attachment’
5.4) Choose a file from your desktop or One Drive and click ‘Open’.
5.5) Click ‘Save’.

5.6) Update the task's effort values (Remaining and Completed).

5.7) Set the Task's 'State' to Closed and click 'Save'.
5.8) Update the parent feature's effort value.

5.9) Set the parent Feature's 'State' to Closed
5.10) Click 'Save'.

6. Repeat Step 5 to upload all Project Initiation documents.
7. Once all documents are uploaded, set the 'Project Initiation Documents' epic's 'State' to Closed.
8. Update the epic's effort value.



9. Click ‘Save’.
10. All Project Planning documents must be saved to SharePoint in a folder called ‘Project Planning’.

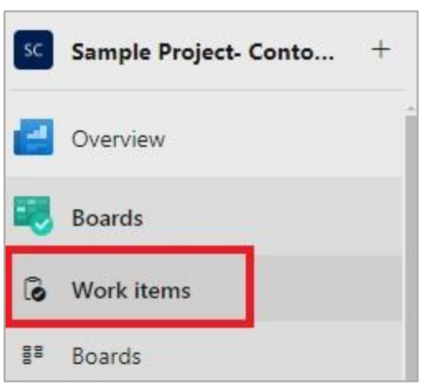
5.3 Create a Detailed Backlog

After the Project Plan has been created, all development work needs to be entered as Work Items in Azure DevOps. The project team will create the epics, features, user stories, and tasks under the guidance of the project manager in Azure DevOps.

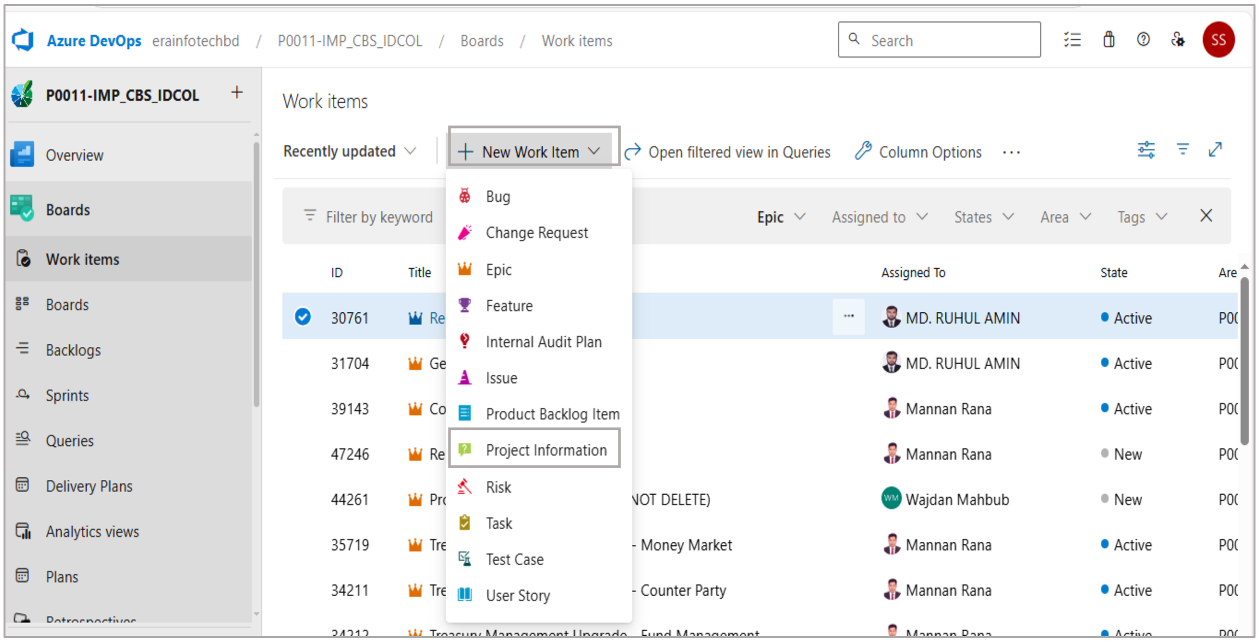
5.3.1 Project Information

1. Create Project Information Section for the Project

1.1) Go to ‘Work Items’ from the ‘Boards’ menu.

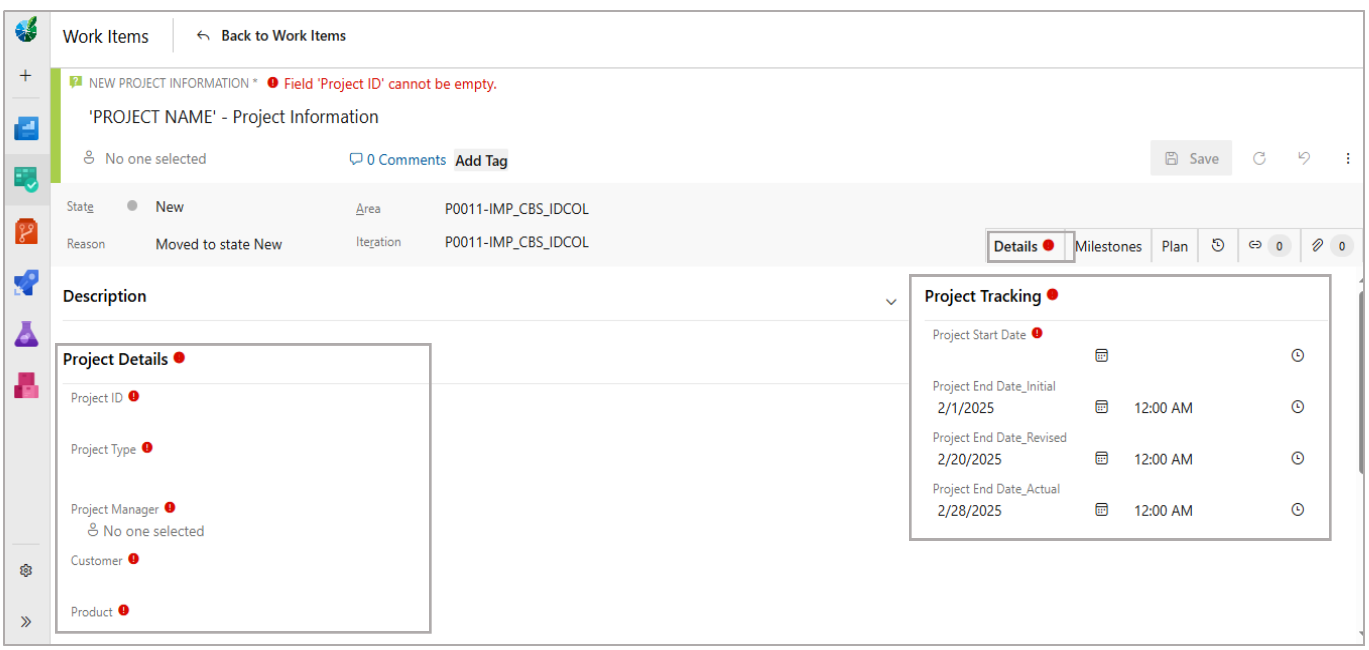


1.2) To create a ‘Project Information’ work item, click on ‘New Work Item’ and select ‘Project Information’.

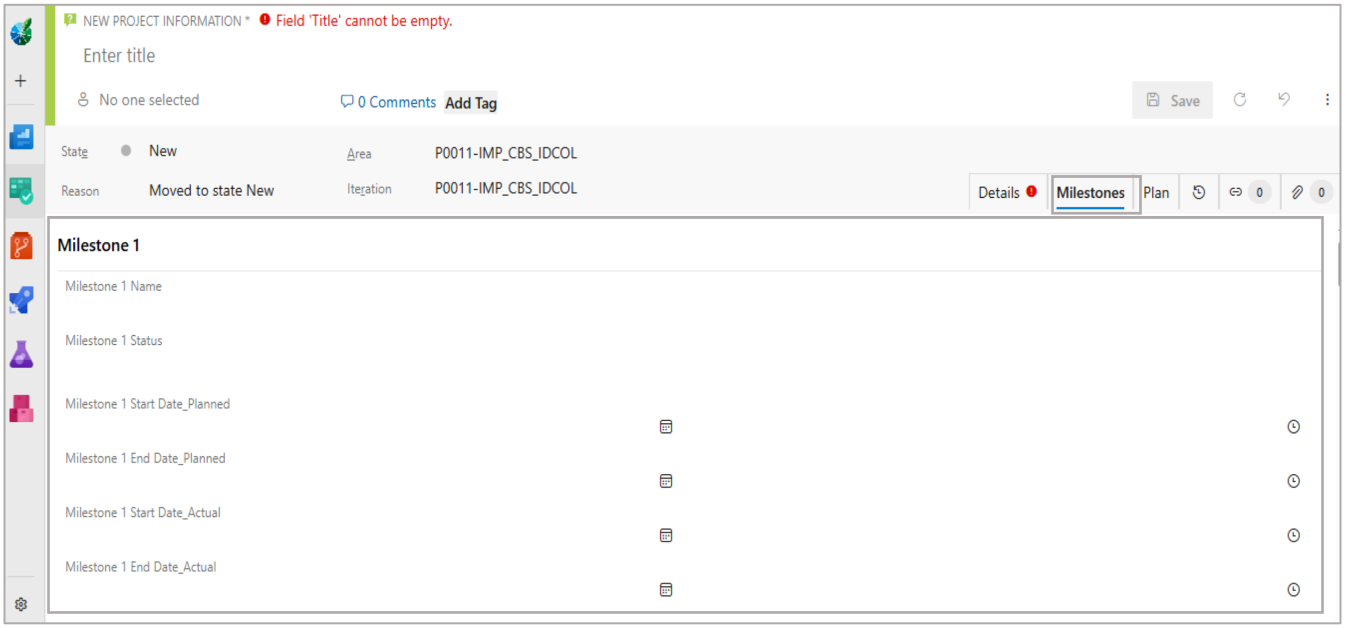


1.3 View Details Section

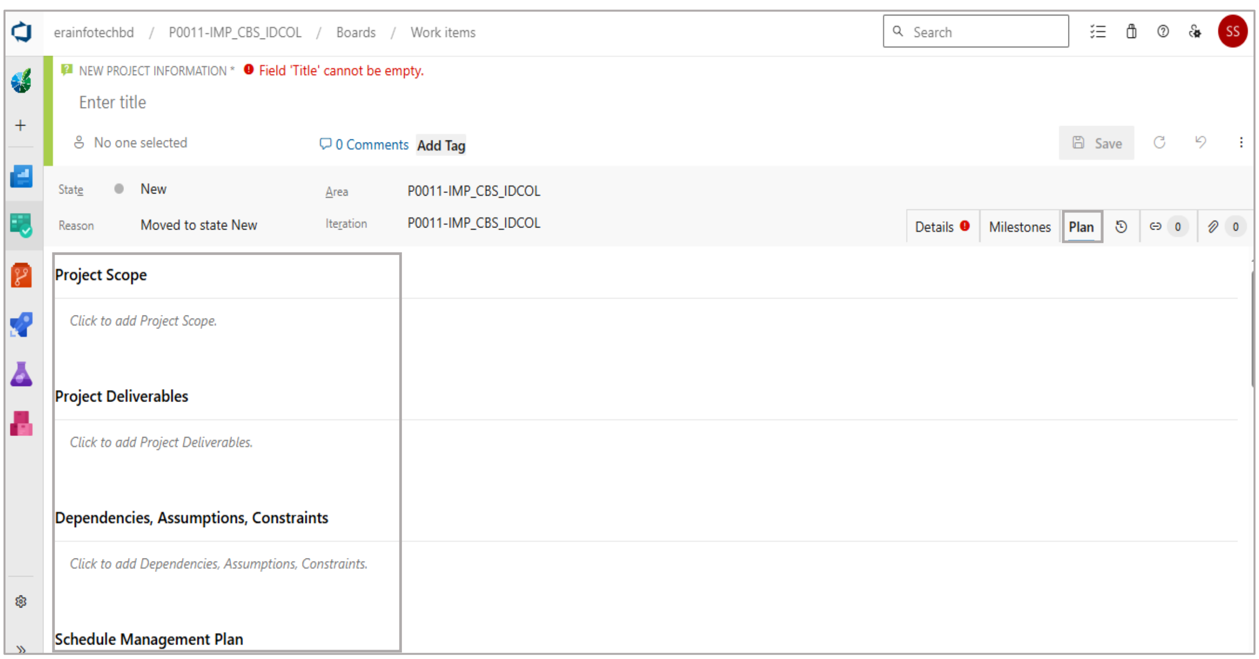
Under the Project Details Section, You can enter information for Project ID, Project Type, Assign Project Manager, Customer information and Product Information
Under the Project Tracking Section, you can enter Project Start Date, Project End Date Initial (According to initial estimation), Project end date revised (For later estimations), Project end date actual (For the actualy project ending date). You can include exact clock time with all of these fields.



Under the Milestone window, you can add upto 10 milestones.



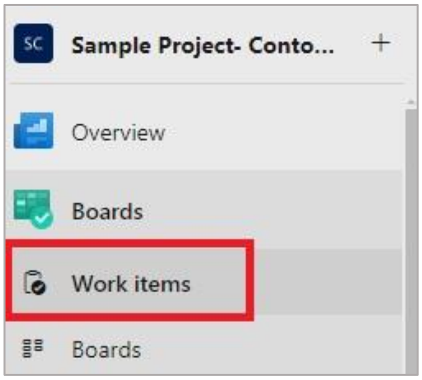
Under the Plan Window, you can find the Project Scope, Project Deliverables, Dependencies assumptions constraints, Schedule management plans, resource management plans, Risk Management plans, Quality Management plan, Stakeholder management plan, Change management plan, Communication management plan, Configuration management plan.



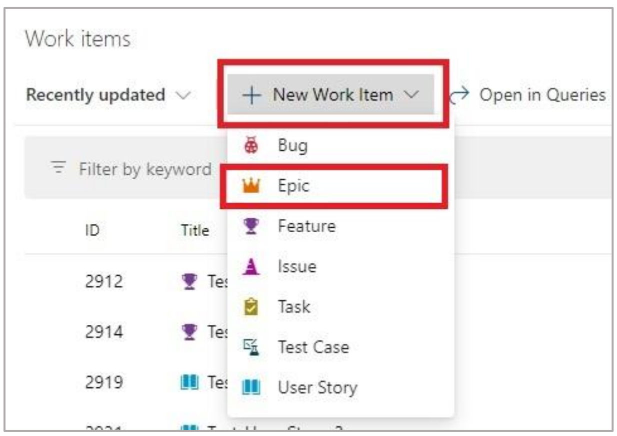
5.3.2 Creating Work Items

1. Create epics for the project.

1.1) Go to ‘Work Items’ from the ‘Boards’ menu.



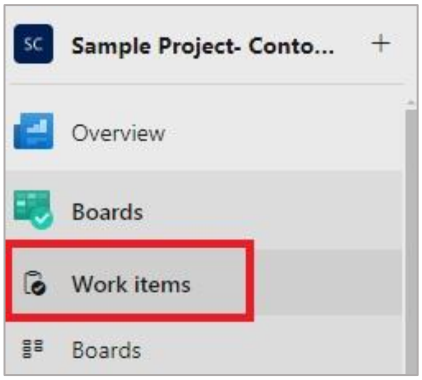
1.2) To create an epic, click on ‘New Work Item’ and select ‘Epic’.



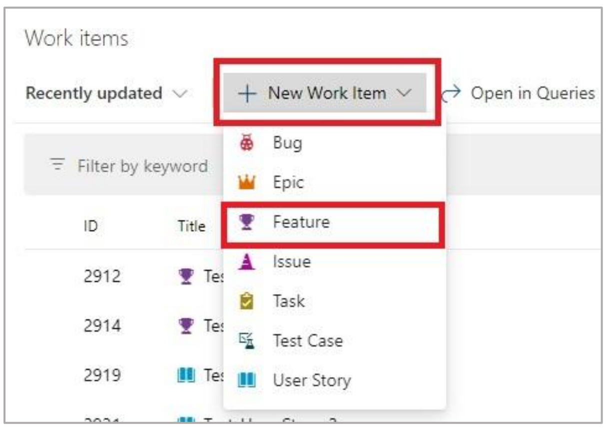
1.3) Enter an appropriate title for the epic.
1.4) Assign someone from the project team to be responsible for the epic.
1.5) Enter an appropriate description for the epic from the business requirements document or software requirements specification document.
1.6) Select your project in ‘Area’.
1.7) Assign the epic to the appropriate sprint in ‘Iteration’.
1.8) If applicable, enter the ‘Start Date’ and ‘Target Date’.
1.9) Select the appropriate ‘Risk’ value for the epic.
1.10) If applicable, enter an estimated effort value.
1.11) Click ‘Save’ to finish.

2. Create features under each epic.
   2.1. The number of features under each epic will be determined by the software requirements specification document.

2.1) Go to ‘Work Items’ from the ‘Boards’ menu.



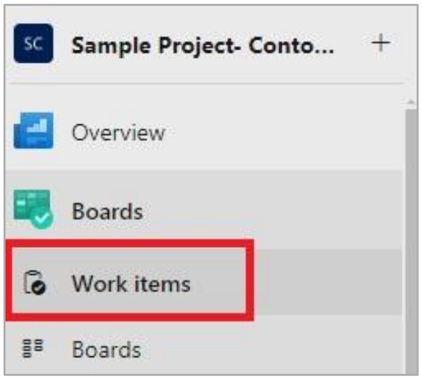
2. 2) To create a Feature, click on ‘New Work Item’ and select Feature.



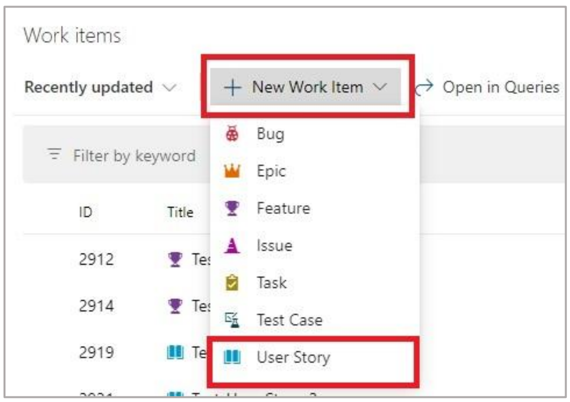
2.3) Enter an appropriate name for the Feature.
2.4) Assign someone from the project team to be responsible for the Feature.
2.5) Enter an appropriate description for the feature from the software requirements specification document.
2.6) Select the project in ‘Area’.
2.7) Assign the feature to the appropriate sprint in ‘Iteration’.
2.8) If applicable, enter the ‘Start Date’ and ‘Target Date’.
2.9) Select the appropriate ‘Risk’ value for the feature.
2.10) If applicable, enter an estimated effort value.
2.11) Link the feature to its parent epic.
2.12) Click ‘Save’ to finish.

3. Create user stories for each feature.
   3.1. A feature may have one or more user stories.
   3.2. Use the software requirements speciation to write user stories.

3.1) Go to ‘Work Items’ from the ‘Boards’ menu.



3.2) To create a User Story, click on ‘New Work Item’ and select 'User Story’.



3.3) The title for the work item will be the user story, written in this format:

- User story format: **AS** <role> **I WANT** <objective> **FOR/TO/SO THAT** <motivation>.
- User story example: AS a registered user I WANT to see my billing history SO THAT I know what services I am being charged for each month.

3.4) Assign someone from the project team to be responsible for the User Story.
3.5) In the Description box, enter some context or additional description for the user story.
3.6) In the Acceptance Criteria box, enter the acceptance criteria using this format:

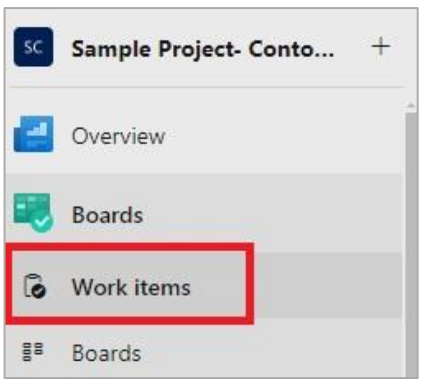
- <u>Acceptance criteria format:</u>
  SCENARIO <the name for the behavior that will be described>
  GIVEN <how things begin>
  WHEN <action taken by user>
  AND < optional; additional action taken by user>
  THEN <outcome of taking action>
  AND < optional; additional outcome of taking action>
- <u>Acceptance criteria example:</u>
  SCENARIO Forgot Password
  GIVEN the user navigates to the login page
  WHEN the user selects the ‘forgot password’ option

AND enters a valid email address to receive a link for password recovery
THEN the system sends the link to the entered email address

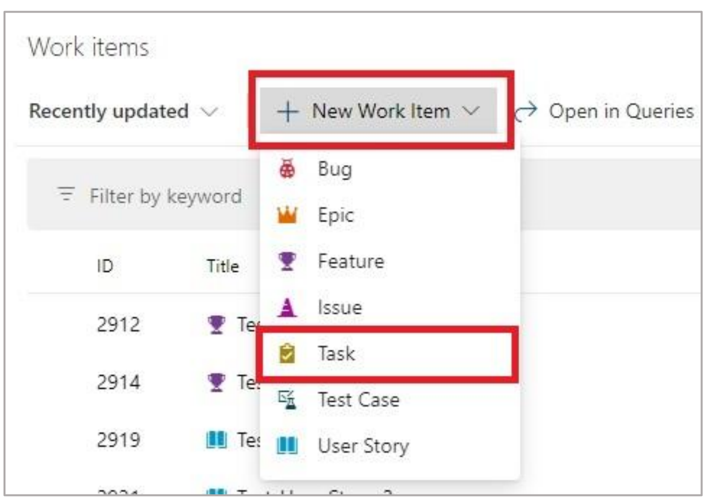
3.7) Select the appropriate project in 'Area'.
3.8) Assign the feature to the appropriate sprint in 'Iteration'.
3.9) Select the appropriate 'Risk' value for the feature.
3.10) Enter an estimate for story point (select values from 1, 2, 3, 5, 8)
3.11) Link the user story to its parent feature if applicable.
3.12) Click 'Save' to finish.

4. Create tasks under each user story.

4.1) Go to 'Work Items' from the 'Boards' menu.



4.2) To create a task, click on 'New Work Item' and select 'Task'.

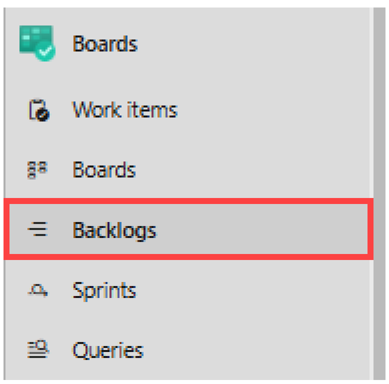


4.3) Enter an appropriate name for the Task.
4.4) Assign someone from the project team to be responsible for the Task.
4.5) Enter an appropriate description for the task.
4.6) Select your project in 'Area'.

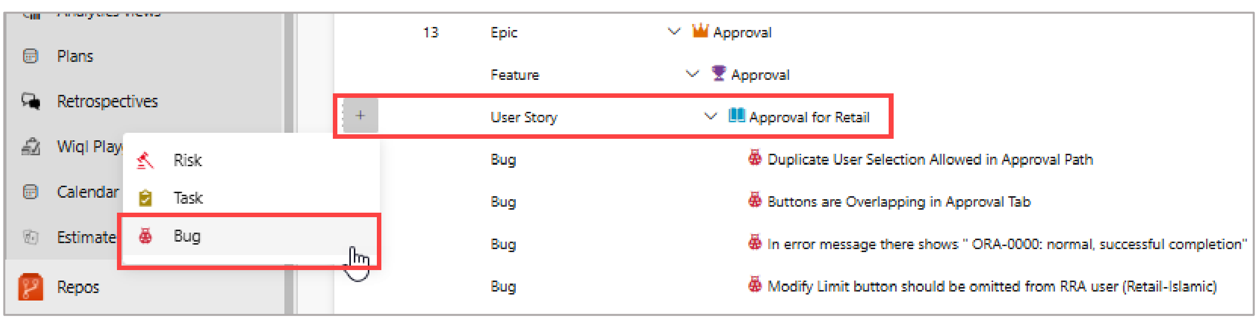
4.7) Assign the task to the appropriate sprint in 'Iteration'.
4.8) Enter an appropriate Activity from the dropdown menu if applicable.
4.9) Provide an estimate for the number of hours the task will take in 'Original Estimate'.
4.10) Select the appropriate 'Risk' value for the feature.
4.11) Link the task to its parent user story if applicable.
4.12) Click 'Save' to finish.
4.13) Follow steps 4.2 to 4.12 to create tasks for each user story. Depending on the user story, select tasks from section 5.3.7.

5. During development, if a bug comes up, then create a 'Bug':

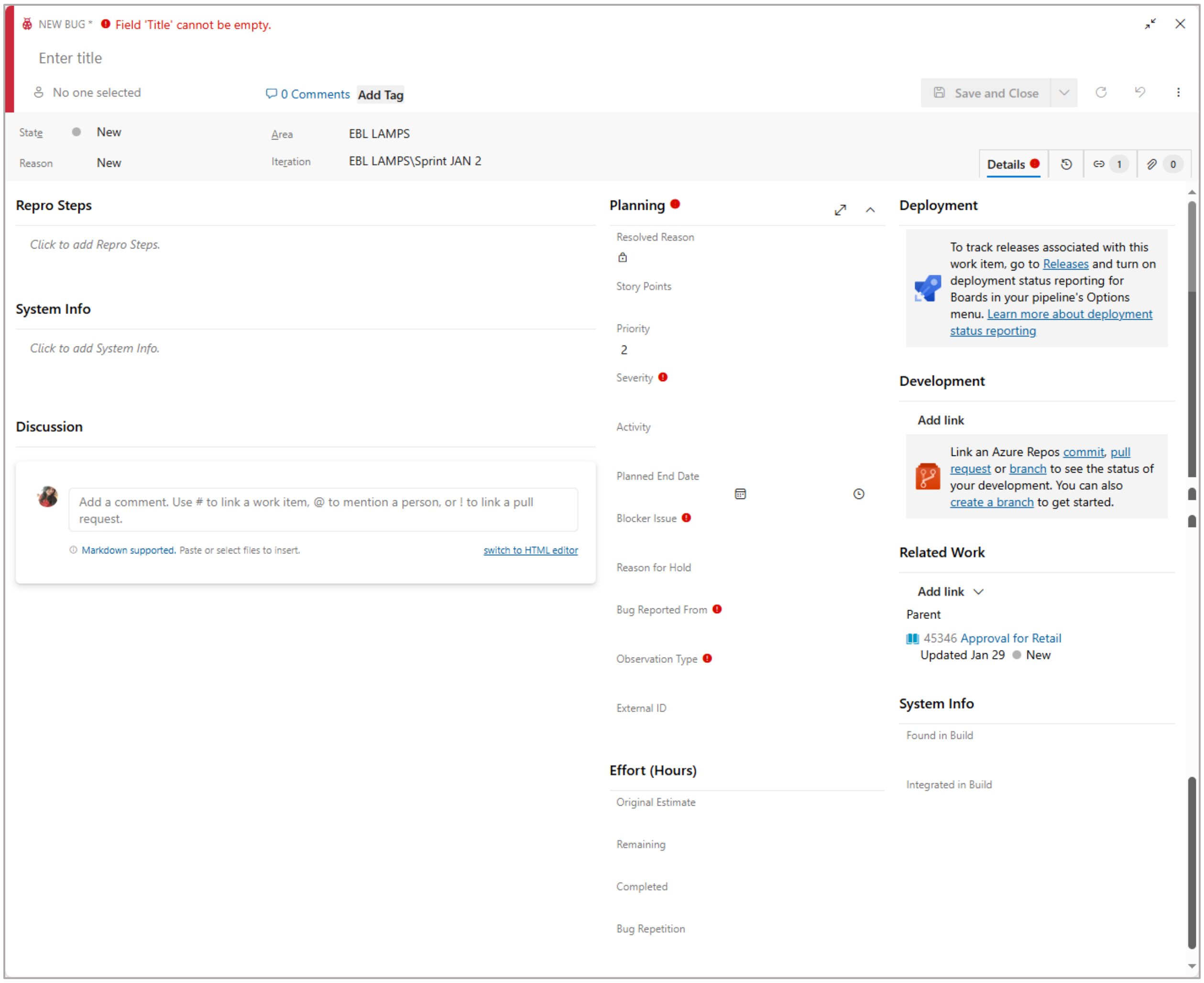
5.1. Go to 'Backlog' from the 'Boards' menu.



5.2. To create a Bug for a User Story, expand the backlog, click the plus (+) sign located to the left side of the user story and select 'Bug'



5.3. Enter an appropriate name for the Bug.



5.4. Assign someone from the project team to be responsible for the Bug.
5.5. In the Repro Steps box, enter the appropriate steps to reproduce the bug.
5.6. In the System Info box, enter the appropriate details.
5.7. Select the project in ‘Area’.
5.8. Assign the bug to the appropriate sprint in ‘Iteration’.
5.9. Assign a ‘Priority’ level to the bug
5.10. Assign a ‘Severity’ level to the bug. Please follow the below guideline to assign severity to the bug:
  5.10.1. **Critical** - without solving the issue full-system will become non-operational: Example - System logs-out while performing a mandatory activity, system keeps buffering while performing a mandatory activity, unable to submit to next user group, data missing from application queue, data not saving in a mandatory tab like applicant info, financial value gets changed etc.
  5.10.2. **High** - without solving the issue a particular functionality CANNOT be performed but the system will be operational: Example – An output document is not generating, data missing in an output document, API not fetching data, data not saving in a non-mandatory tab like seller/developer, Query forward option is not working etc.

5.10.3. **Medium** - without solving the issue a particular functionality CAN be performed but it will not meet some necessary requirements: Example – Comma Separator in number field not working, re-naming a field, a report is breaking/ overlapping etc.
5.10.4. **Low** - without solving the issue a particular functionality CAN be performed, and it will not meet some nice to have requirements: Example – Field/ button/ report alignment issues, mandatory mark is missing, multiple date format in same window, system re-directs to the wrong screen etc.

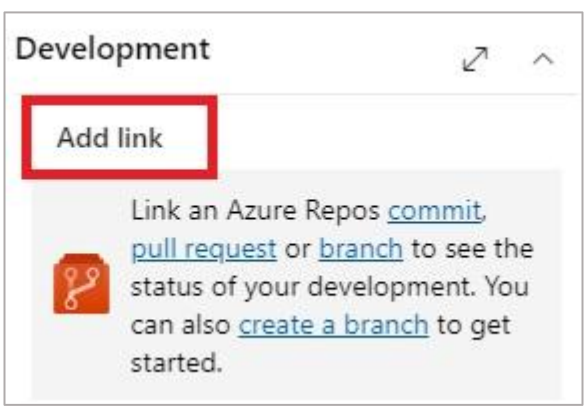
5.11. Select an 'Activity' from the dropdown menu.
5.12. Select a 'Planned End Date' from the calendar.
5.13. Specify if the bug is a 'Blocker Issue' from Yes/No options. A blocker issue is something without solving it further test cannot be performed.
5.14. Select an option to specify 'Bug Reported From' from the dropdown menu
5.15. Select an 'Observation Type' from the dropdown menu.
5.15.1. **Bug** – System Error due to development issues
5.15.2. **Setup / Config Issue** – System Error due to incomplete/ Wrong Setup
5.15.3. **Incomplete Development** – System is partially development in terms of the documented requirements
5.15.4. **Wrong Development** - System is developed in contrary of the documented requirements
5.15.5. **UI/ UX Improvement** – Development is done as per the requirement how even fixing the observation will lead to improved usability of the system
5.15.6. **Requirement Change** (usually during UAT) - Client changed the requirement initially provided
5.15.7. **New Requirement**s (usually during UAT) - Client provided a completely new requirement.

5.16. Enter an estimate for effort in 'Original Estimate' if applicable.
5.17. Link the bug to a parent task.
5.18. Click 'Save' to finish.

5.3.3 Work Item Options

- Link to Azure Repos:

1. Click on 'Add link' from the 'Development' section.



2. For 'Link type', select an option from either Build or Code.

- If you selected an option from Build, enter a value for Build number.
- If you selected an option from Code, select the correct repository name and add in additional information as needed.

3) Add in a comment.
4) Click on 'Add link'.
5) Click 'Save' to finish creating the link.

- <u>View History:</u>

1) Click on the 'History' button on the right-hand side of the window.

2) The Work Item's history will appear in the center.
3) To go back to the Work Item's original view, click on 'Details'.

- <u>Add Attachment:</u>

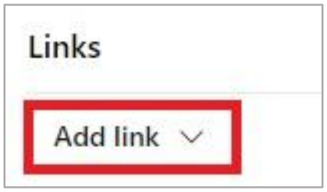
1) Click on the 'Attachment' button.

2) Select 'Add attachment'
3) Choose a file from your desktop or One Drive.
4) Click 'Save'.
5) To go back to the Work Item's original view, click on 'Details'.

- <u>Create Dependencies (linking work items):</u>

1) Click on the 'Links' button.

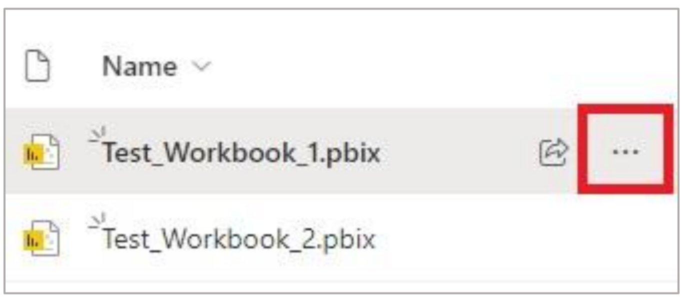
2) Click on 'Add Link'.



3) Select 'Existing item'.
4) For 'Link type', select 'Parent' or 'Child'.
5) In 'Work items to link', type in the name of the work item you want to link to.
6) Click on 'Add link'.
7) Click 'Save' to finish creating the link.

- <u>Adding SharePoint Link to Work Item:</u>

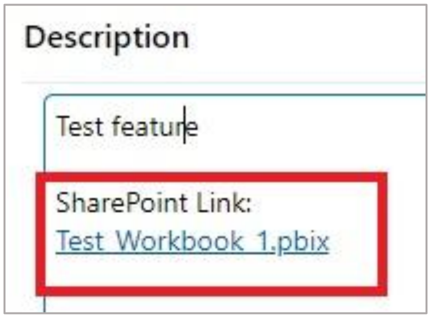
1) In SharePoint, click on the three dots next to the file name.



2) From the menu, select 'Copy Link'.

3) Click to enter a work item in Azure DevOps.

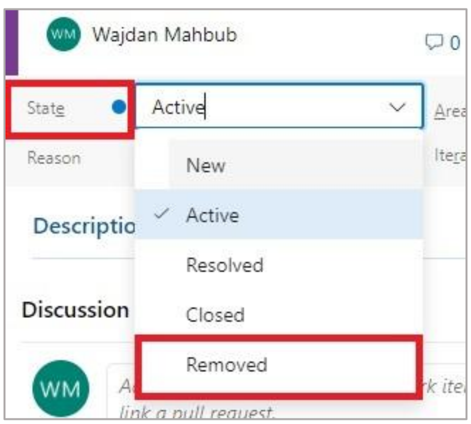
4) In the Description or Discussion box, right-click and paste the link.
5) The link should appear as a hyperlink.



6) Click 'Save' to finish.

- Removing Work Items:

1) Click to enter a work item.
2) Change the work item's state to 'Removed'.

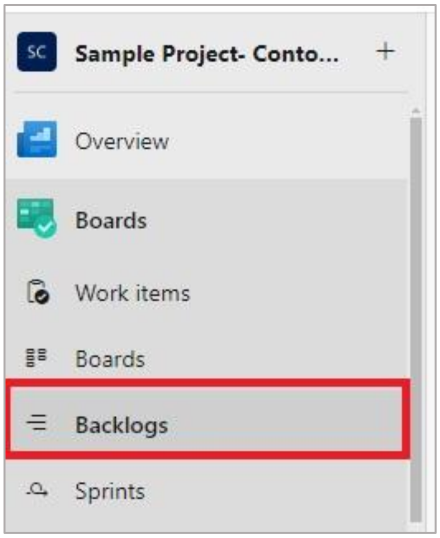


3) Click 'Save' to finish.

5.3.4 High-Risk Work Items

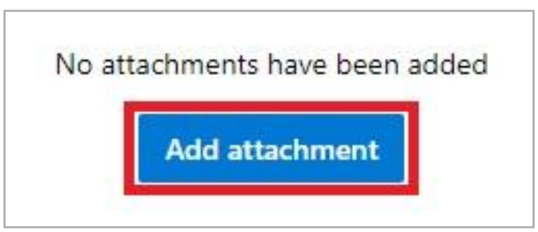
For high-risk work items (Risk designation of '1'), the work item needs to have a risk assessment and risk mitigation plan attached.

1. From the Boards menu, click on 'Backlogs'.



2. Click to enter a work item (epic, feature, user story or task) that has a '1 - High' designation for Risk.
3. Click on 'Attachments' button.

4. Select 'Add attachment'



5. From your desktop or OneDrive, select the risk assessment and mitigation plan.
6. Click 'Open'.

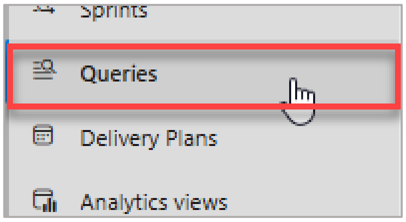
7. Click 'Save and Close' on the work item.

5.3.5 Bulk Upload of Work Items

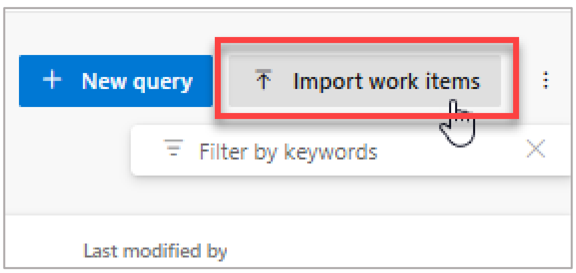
- **What**: Adding multiple work items at once.

- **Who**: Project Managers or Administrators.
- **When**: During initial backlog creation or after major planning sessions.
- **How**: Use **Excel** with the Azure DevOps plugin or import CSV files into **Boards → Queries**. Map fields accurately before importing.

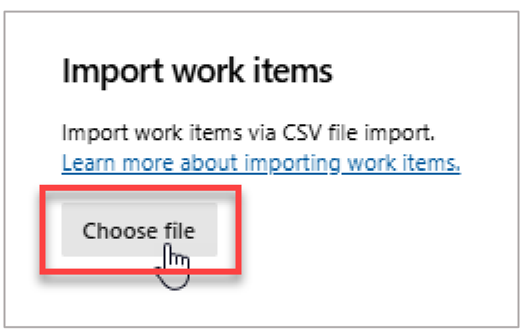
Step 1- Select Queries under Boards Section



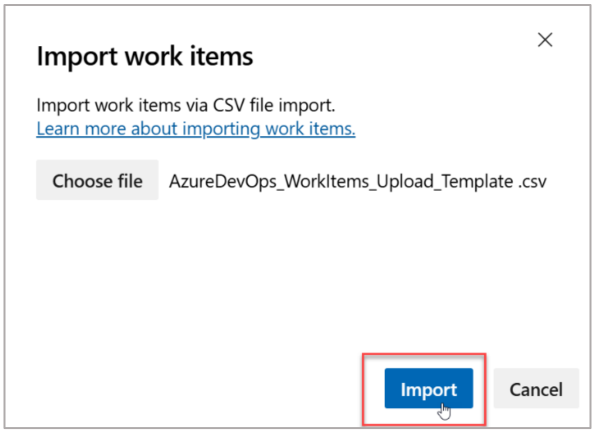
Step 2 – Select import work items



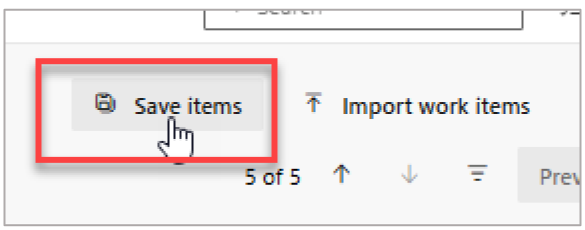
Step 3- Import Work Items



Step 4- Upload the CSV File



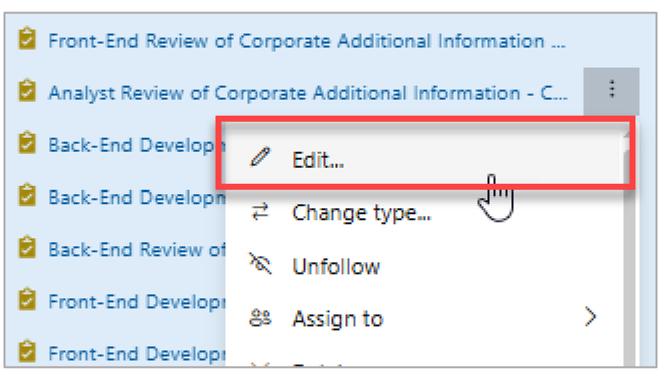
Step 5- Save the uploaded Work Items



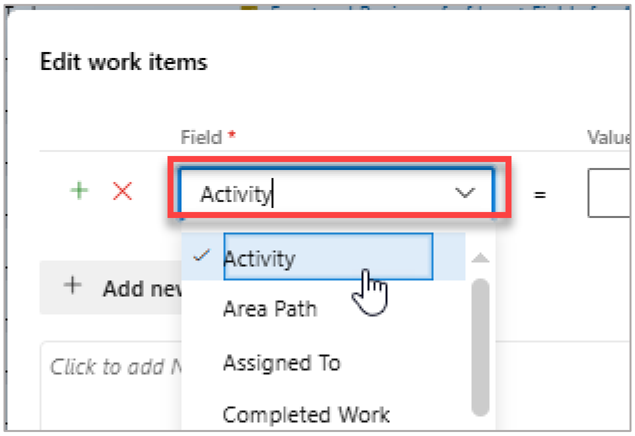
5.3.6 Bulk Edit

a) Bulk Edit of Work Items (From Queries)

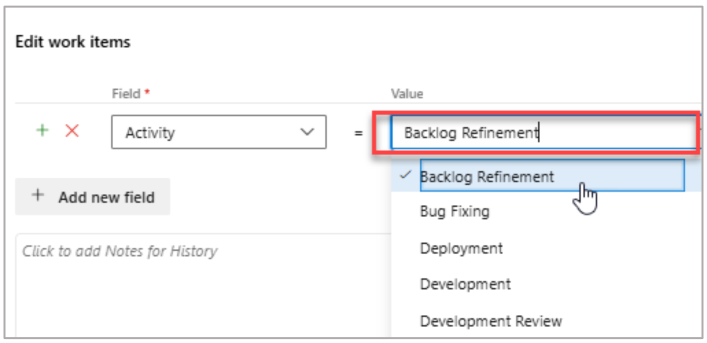
Step 1 – Select all work items from Queries (Ctrl+A), right click and select Edit.



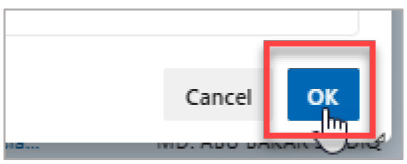
Step 2- Select the field being edited



Step 3 – Put the Value for selected field

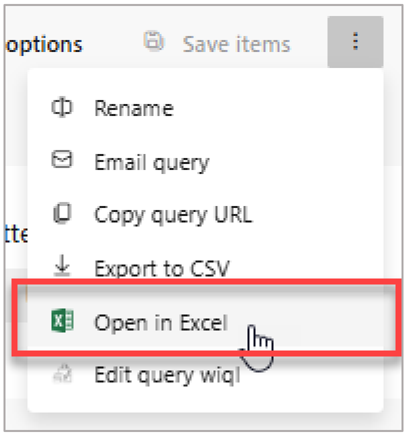


Step 4 – Click okay and finally save the items



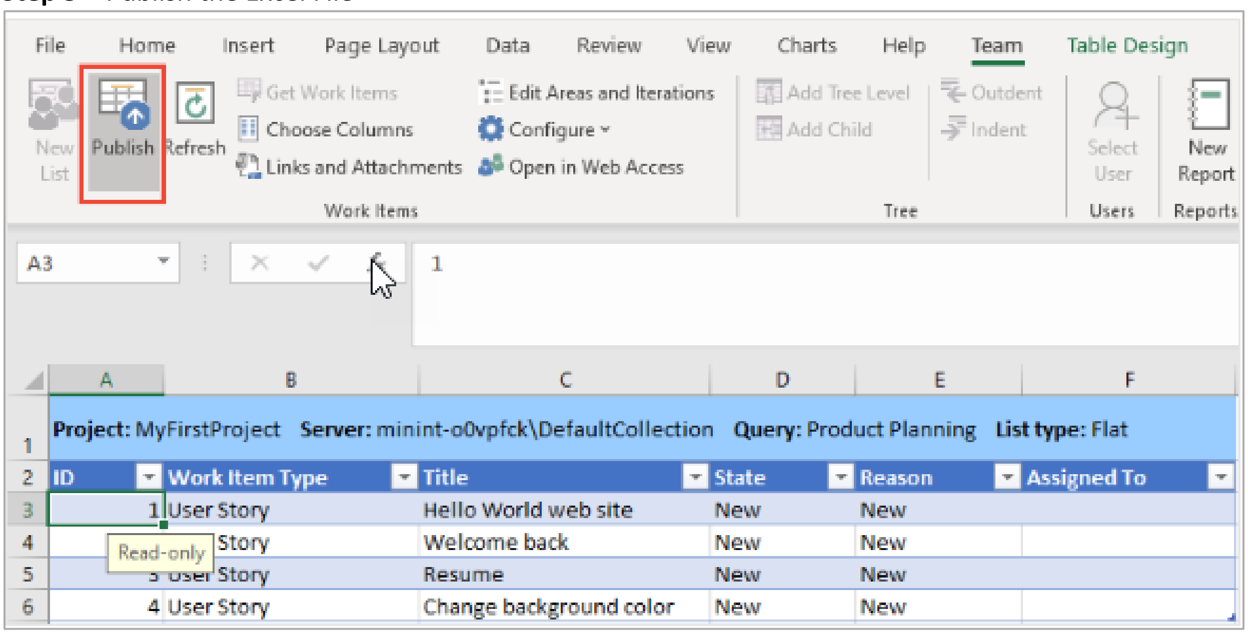
b) Bulk Edit of Work Items (From Excel)

Step 1 – Open work item list in Excel



Step 2 – Required Edits/changes in excel file

Step 3 – Publish the Excel File



5.3.7 Standard Project Backlog Structure

<u>5.3.7.1 Implementation Project Backlog Structure</u>

Project Information 1 - ABC Bank CBS Project (Sample Project)			
Epic 1 - Project Management			
	Feature 1 - Initiation		

		User Story 1 - Project Team Formation	
			Task 1 - Re-estimation
			Task 2 – Relevant Task
		User Story 2 - Kick-off Meeting	
			Task 1 - Relevant Task
			Task 2 - Relevant Task
		User Story 3 - Agreement	
			Task 1 - Relevant Task
			Task 2 - Relevant Task
		User Story 4 - BRD Sign-off	
			Task 1 - Relevant Task
			Task 2 - Relevant Task
		User Story 5 - SRS Sign-off	
			Task 1 - Relevant Task
			Task 2 - Relevant Task
	Feature 2 - Monitoring & Execution		
		User Story 1 - Project Plan Preparation	
			Task 1 - Relevant Task
			Task 2 - Relevant Task
		User Story 2 - User Manual Preparation	
			Task 1 - Relevant Task
			Task 2 - Relevant Task
	Feature 3 - Closing		
		User Story 1 - Go-Live	

			Task 1 - Relevant Task
			Task 2 - Relevant Task
		User Story 2 - Project Sign-off	
			Task 1 - Relevant Task
			Task 2 - Relevant Task
Epic 2 - Deposit Module (Development Related Epic)			
	Feature 1 - Deposit Product Creation		
		User Story 1 - Set Product Parameters	
			Task 1 - Requirement Clarification
			Task 2 - Front-End Development
			Task 3 - Back-End Development
			Task 4 - Code Review
			Task 5 - Test Case Creation
			Task 6 - Unit Testing
			Task 7 - System Testing
			Task 8 - API Development
			Task 9 - API Testing
		User Story 2 - Set Accounting Rules	
			Task 1 - Requirement Clarification
			Task 2 - Front-End Development
			Task 3 - Back-End Development

			Task 4 - Code Review
			Task 5 - Test Case Creation
			Task 6 - Unit Testing
			Task 7 - System Testing
			Task 8 - API Development
			Task 9 - API Testing
Epic 3 - Implementation			
	Feature 1 - Deployment	Deployment	
		User Story 1 - Deployment Environment Preparation	
		User Story 1 - System Configuration	
	Feature 2 - Data Migration		
		User Story 1 - Data Preparation	
		User Story 2 - Run Data Migration	
		User Story 3 - Validate Data Migration	
	Feature 3 - ToT		
		User Story 1 - Prepare ToT Material	
		User Story 2 - Schedule ToT Session	
		User Story 3 - Conduct ToT Session	
	Feature 4 - UAT		
		User Story 1 - Develop UAT Test Cases	
		User Story 2 - Share UAT Test Cases	

		User Story 3 - Collect UAT Feedback	

5.3.7.2 Maintenance Project Backlog Structure

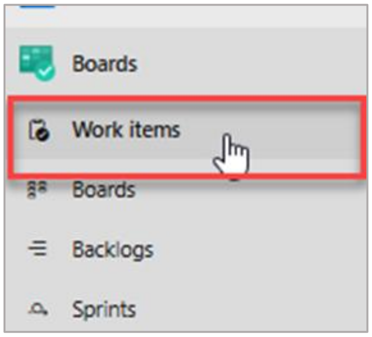
AML Maintenance Project			
Project Information 1 - ABC Bank AML (Client wise different Backlog)			
Epic 1 - ABC Bank AML			
	Feature 1 - Support		
		User Story 1 - Data Correction	
			Task 1 - Issue Identification
			Task 2 - Data Preparation
			Task 3 - Data Upload
			Task 4 - Client Confirmation
		User Story 2 - Report Modification	
			Task 1 - Requirement Gathering
			Task 2 - Design the Report
			Task 3 - Client Confirmation on the Design
			Task 4 - Deploy the report
		User Story 3 - Generic Support Issues	
			Task 1 - Issue Identification
			Task 2 - Determine the Solution
			Task 3 - Provide the Solution
			Task 4 - Client Confirmation
	Feature 2 - Bug Fixes		
		User Story 1 - Unable to Process Deposit Transaction	
			Task 1 - Issue Identification
			Task 2 - Determine the Solution
			Task 3 - Develop the Solution
			Task 4 - Test the Solution
			Task 5 - Provide the Solution

			Task 6 - Client Confirmation
	Feature 3 - Change Request		
		User Story 1 - Enhancements to Existing Module	
			Task 1 - Requirement Gathering
			Task 2 - Requirement Finalization
			Task 3 - GAP Analysis
			Task 4 - Front-End Design/ Architecture
			Task 5 - Back-End Design/ Architecture
			Task 6 - Database Design/ Architecture
			Task 7 - System Design/ Architecture
			Task 8 - System Architectural Document
			Task 9 - Requirement Clarification
			Task 10 - Front-End Development
			Task 11 - Back-End Development
			Task 12 - Code Review
			Task 13 - Test Case Creation
			Task 14 - Unit Testing
			Task 15 - System Testing
	Feature 4 - Review Meetings		
		User Story 1 - Monthly Support Review Meeting - May -2024	
			Task 1 - Attend the Meeting
			Task 2 - Prepare and Share the MoM
			Task 3 - Follow-up on meeting action points

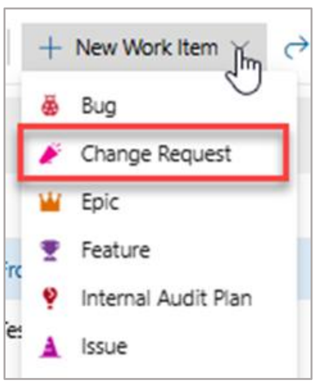
5.4 Manage Change Requests

Create a change request:

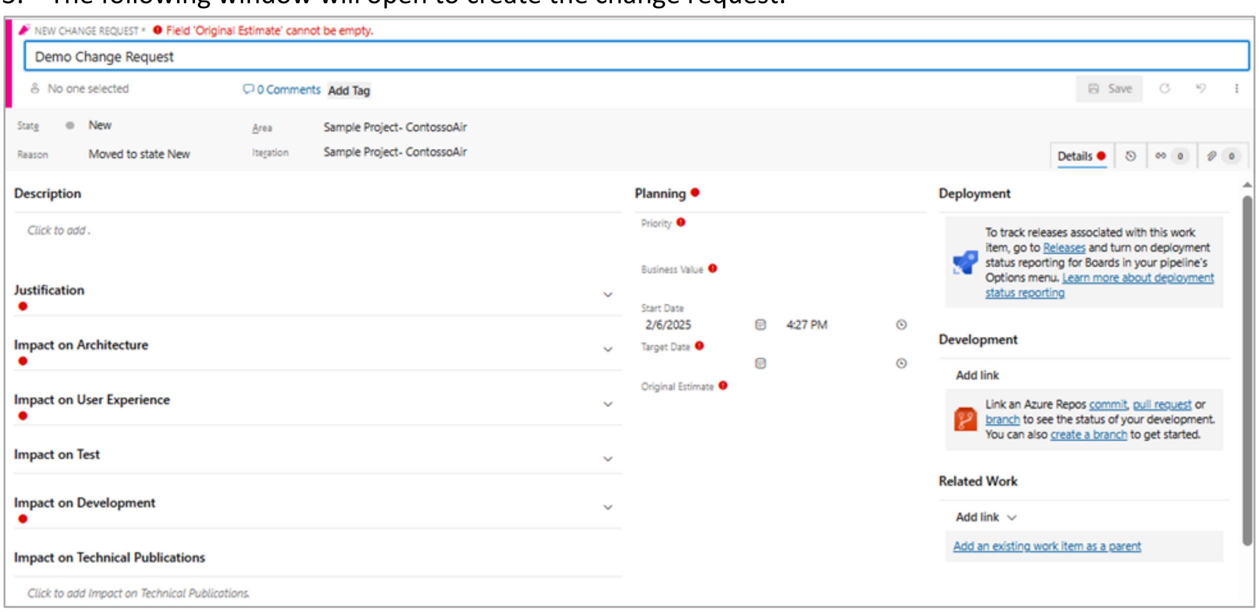
1. Go to ‘Work Items’ from the ‘Boards’ menu.



2. To create a change request, click on ‘New Work Item’ and select ‘Change Request’.



3. The following window will open to create the change request.



4. Enter an appropriate title for the change request.
5. Assign someone from the project team to be responsible for the change request.
6. Enter an appropriate description for the change request from the Change request document or software requirements specification document.
7. Select your project in ‘Area’.
8. Assign the change request to the appropriate sprint in ‘Iteration’.
9. Define the effects of the change to the following areas:
    - Justification
    - Empact on Architecture
    - Empact on User experience
    - Empact on Test
    - Empact on development
    - Empact on Technical publications
10. Enter the ‘Start Date’ and ‘Target Date’.
11. Select the appropriate ‘Priority’ value for the Change request.
12. Enter an estimated effort value.
13. Click ‘Save’ to finish.

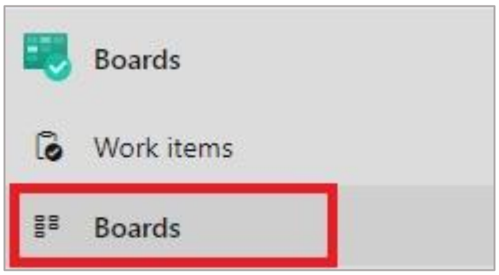
6 Project Execution

6.1 6.1) Configure Boards

Before working from the boards, you must configure the board to meet the needs of your project and project team.

6.1.1 Add Columns to Board

1. Go to ‘Boards’ from the Boards menu.



2. Click on the ‘Configure board settings’ button.

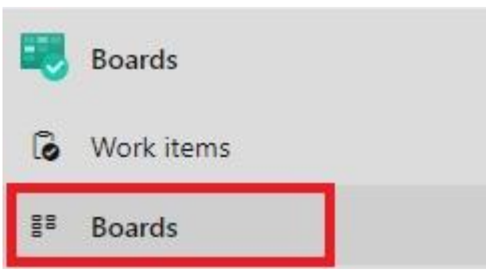
3. Scroll down to the ‘Boards’ section and click on ‘Columns’.

4. To add a new column, click on ‘+ Add column’.

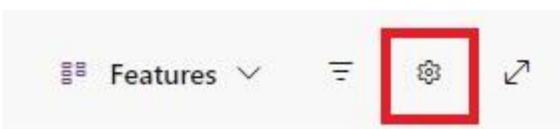
5. Give the column an appropriate name.
6. Set the 'Work in progress limit' to a value that the project team or team member can handle.
7. If you want to split the column into 'Doing' and 'Done', check the 'Split column into Doing and Done' checkbox. Otherwise, skip this step.
8. Select the appropriate state map from the drop-down menu.
   - New: Work item has been newly created.
   - Active: Work item is being worked on.
   - Resolved: Work item has its bug or issue resolved.
9. Enter a short and appropriate definition of done.
10. Click 'Save' to finish.

6.1.2 Remove Columns from Board

1. Go to 'Boards' from the Boards menu.



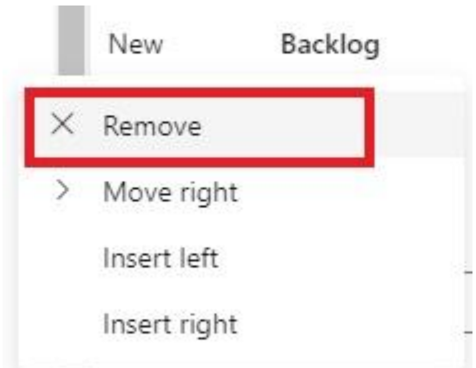
2. Click on the 'Configure board settings' button.



3. Scroll down to the 'Boards' section and click on 'Columns.

4. Click on the three dots next to a column name.

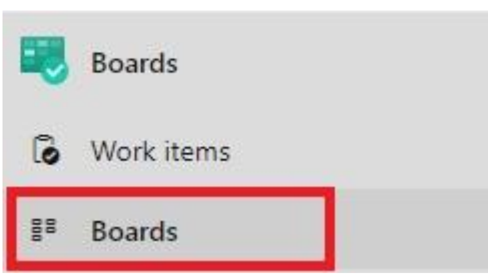
5. Select 'Remove'.



6. Click 'Save' to finish.

6.1.3 Add Swimlanes

1. Go to 'Boards' from the Boards menu.

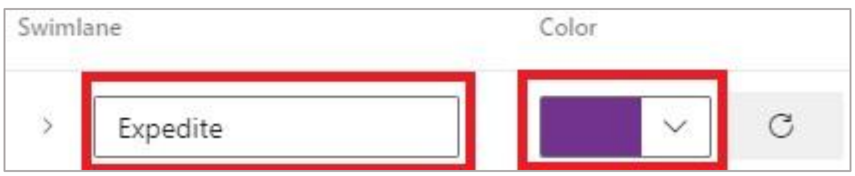


2. Click on the 'Configure board settings' button.

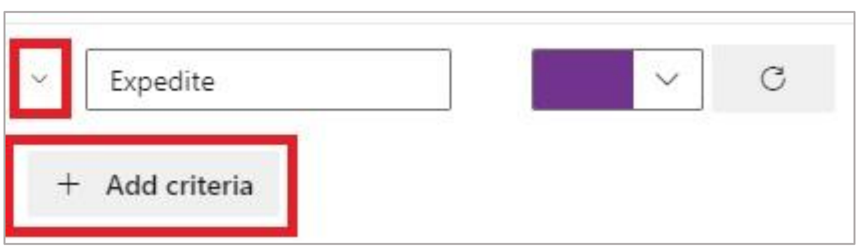
3. Scroll down to the Boards section and select Swimlanes.

4. Click on ‘Add swimlane’.

5. Give an appropriate name and color to the swimlane.



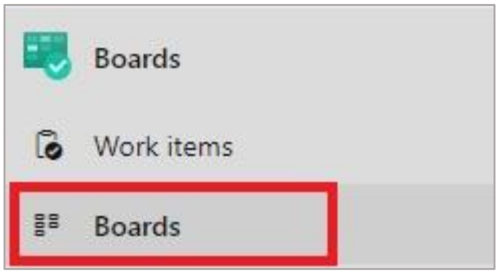
6. Click on the arrow before the swimlane name and select ‘+ Add criteria’ to customize the swimlane. If no criteria is added, you can skip this step.



7. Click ‘Save’ to finish.

6.1.4 Deleting Swimlanes

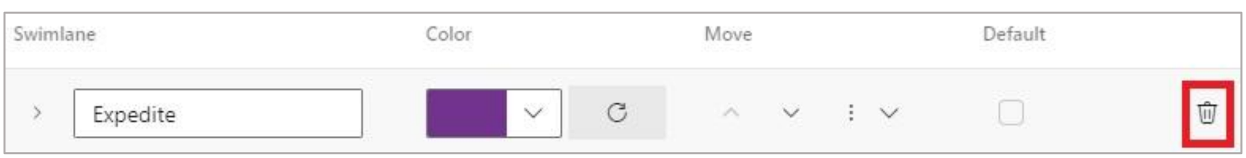
1. Go to ‘Boards’ from the Boards menu.



2. Click on the 'Configure board settings' button.

3. Scroll down to the Boards section and select Swimlanes.

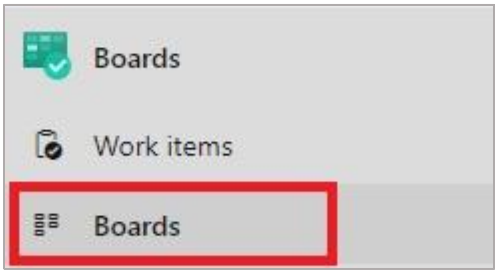
4. Hover over a swimlane until a trashcan appears on the far right.



5. Click on the trashcan to delete a swimlane.
6. Click 'Save' to finish.

6.1.5 Add Additional Fields to Cards

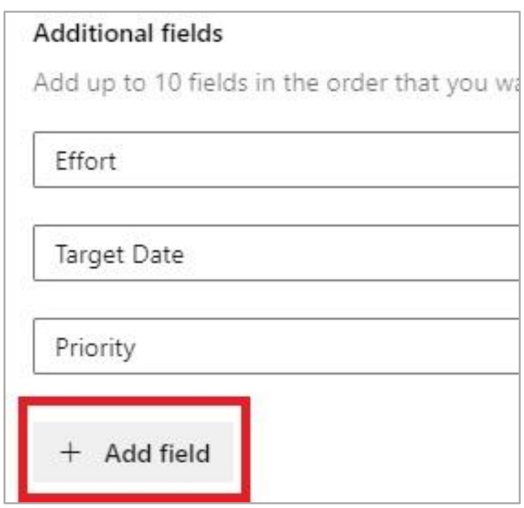
1. Go to 'Boards' from the Boards menu.



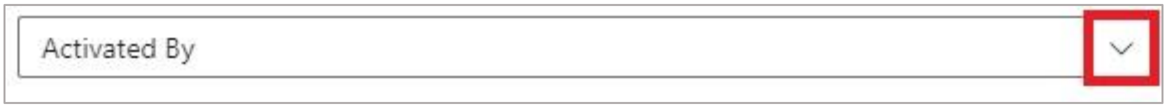
2. Click on the 'Configure board settings' button.

3. From the Cards section, select Fields.

4. Under 'Additional fields', click 'Add field'



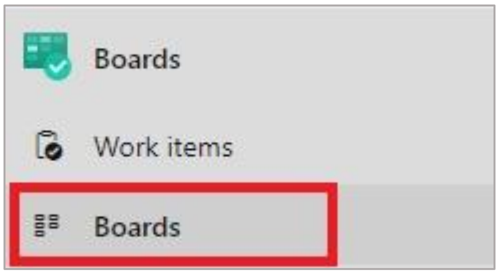
5. From the dropdown menu, select up to ten additional fields to add to each card.



6. Once the fields have been added, click 'Save'.

6.1.6 Styling Cards

1. Go to 'Boards' from the Boards menu.

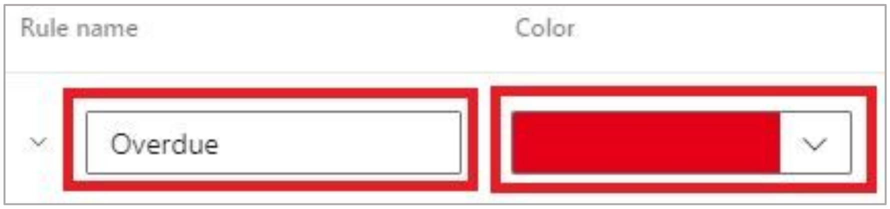


2. Click on the 'Configure board settings' button.

3. From the Cards section, select Style.

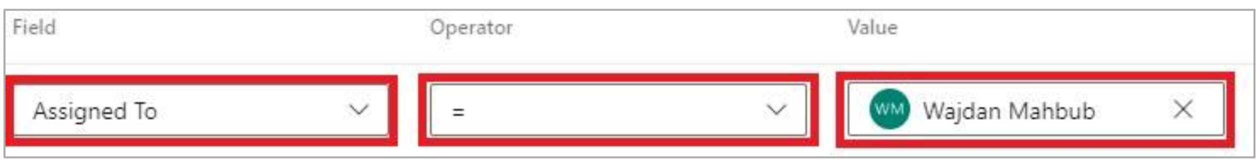
4. Click on '+ Add styling rule'.

5. Enter an appropriate rule name and color you want the card to display if the rule is triggered.



6. Make sure the 'Enabled' checkbox is checked.
    - To disable a rule, uncheck the checkbox and click 'Save'.

7. Enter appropriate values for Field, Operator and Value.

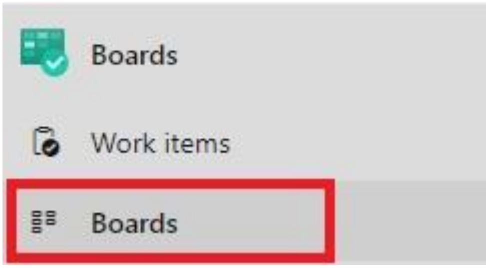


8. Click on '+ Add criteria' to add additional criteria fields, otherwise skip this step.

9. Click 'Save' to finish.

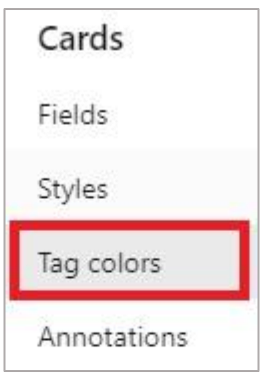
6.1.7 Color Code Tags

1. Go to 'Boards' from the Boards menu.

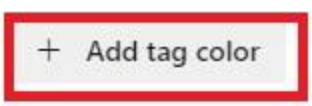


2. Click on the ‘Configure board settings’ button.

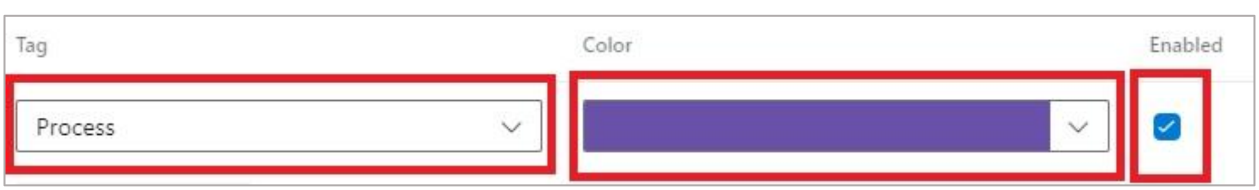
3. From the Cards section, select ‘Tag colors’.



4. Click on ‘+ Add tag color’.



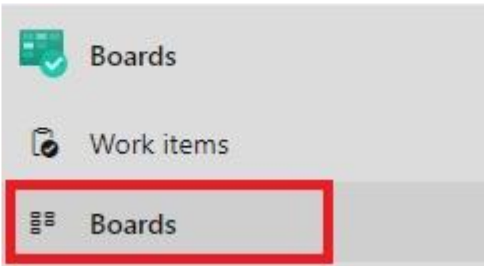
5. Put in a tag name and color from the dropdown menus. Make sure the ‘Enabled’ box is also checked.
   - Uncheck the box if don’t want tags to be color coded.
   - If a tag does not exist, you can put it in.



6. Click ‘Save’ to finish.

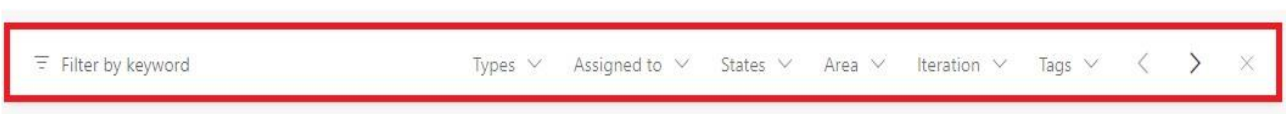
6.1.8 Toggle Filter

1. Go to 'Boards' from the Boards menu.

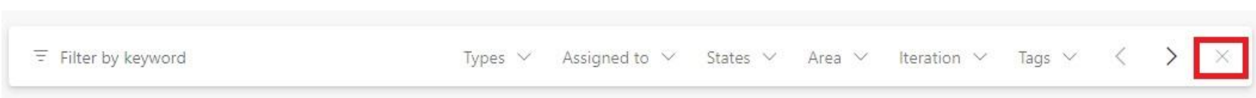


2. Click on the 'Toggle filter' button to display the filter bar.

3. You can filter work items by keywords, work item type, person assigned, work item state, project area, sprint iteration, tags and parent work item.
   - Select a sprint's 'Iteration' to filter the backlog to see what the team or each member is working on in the sprint.



4. Clear filters by clicking on the cross, located on the far right of the filter bar.



6.2 Work from Boards

After the project kickoff meeting has occurred, the project team will start working from the board in Azure DevOps:

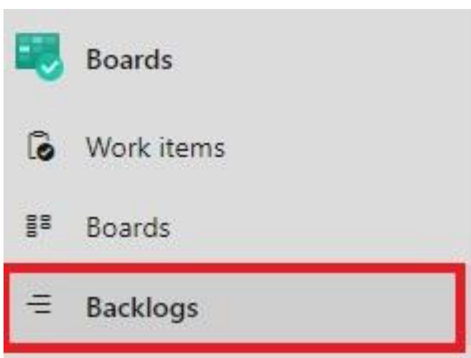
1. The project manager or a senior member of the project team will move an epic to be worked on from 'New' to 'Active'.
2. For that epic, individual developers will then move their assigned features, user stories and tasks from 'New' to 'Active', and begin working on them.
3. If developers runs into an obstacle while working on a feature, user story or task, then they can create a 'Bug' or 'Issue', and assign them to the relevant project team member to resolve.
4. The project manager will track the completion of epics and features using the Delivery Plan.
5. Every week, the project manager will hold a meeting with the project team to discuss progress, issues and any item that requires extra attention.

   a. The frequency of this meeting will depend on the project team's preferences and project complexity.
   b. All project stakeholders must be informed of the project's progress with regular updates.
6. If any work deviates from the delivery plan, the project manager will take steps to manage this accordingly with the project team.
7. Once a feature's user stories and tasks are complete in a sprint, project team members will set those work item's state to 'Closed'.
8. At the end of each sprint, the project team will hold a sprint retrospective to review the sprint performance, and sprint review to present completed work items.
9. Once all features are complete under an epic, the project manager will set the epic's state to 'Closed'.
10. Repeat steps 1 to 9 until all epics are complete.
11. All Project Execution documents must be saved to SharePoint in a folder called 'Project Execution'.

6.3 Configure Backlog

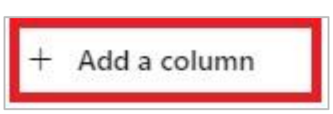
6.3.1 Add/Remove Columns

1. From the Boards menu, click on Backlogs.



2. Click on 'Column Options'.

3. Click on '+ Add a column'.



4. Select an appropriate column to add from the dropdown menu.
   - If needed, you can select 'Add a rollup column' to display aggregate values for work items. Select rollup column from the quick list or configure a custom rollup column.

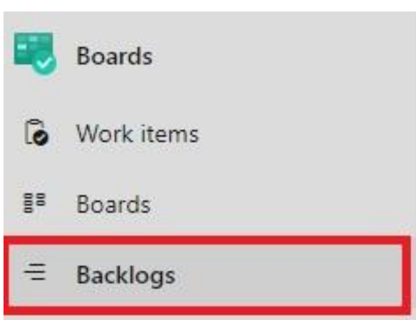
5. Click on the dots next to the column name to rearrange the column order.

6. Select the red cross next to the column name to remove a column.

7. Click 'OK' to finish.

6.3.2 Automation Rules

1. From the Boards menu, click on Backlogs.



2. Click on the 'Configure team settings' button.

3. Select 'Rules' from the 'Automation' menu.

4. For the ‘Active’ rule, check the box to enable a parent work item to become active when at least one child item becomes active.

5. For the ‘Completed or Resolved’ rule, check the second box.

6. Click ‘Save’ to finish.

6.4 Work from Backlog

After the project kickoff meeting has occurred, the project team will start working from the product backlog in Azure DevOps:

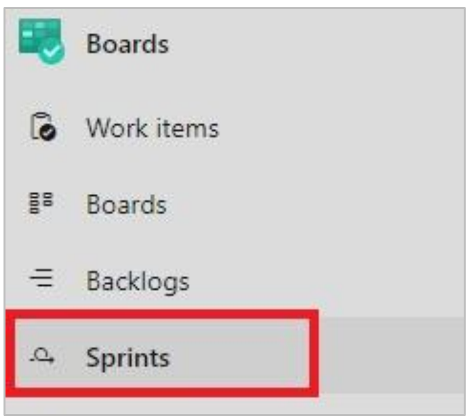
1. The project manager or a senior member of the project team will move an epic to be worked on from ‘New’ to ‘Active’.
2. For that epic, individual developers will then move their assigned features, user stories and tasks from ‘New’ to ‘Active’, and begin working on them.
3. If developers runs into an obstacle while working on a feature, user story or task, then they can create a ‘Bug’ or ‘Issue’, and assign them to the relevant project team member to resolve.
4. The project manager will track the completion of epics and features using the Delivery Plan.
5. Every week, the project manager will hold a meeting with the project team to discuss progress, issues and any item that requires extra attention.
    a. The frequency of this meeting will depend on the project team's preferences and project complexity.
    b. All project stakeholders must be informed of the project’s progress with regular updates.
6. If any work deviates from the delivery plan, the project manager will take steps to manage this accordingly with the project team.

7. Once a feature's user stories and tasks are complete in a sprint, project team members will set those work item's state to 'Closed'.
8. At the end of each sprint, the project team will hold a sprint retrospective to review the sprint performance, and sprint review to present completed work items.
9. Once all features are complete under an epic, the project manager will set the epic's state to 'Closed'.
10. Repeat steps 1 to 9 until all epics are complete.
11. All Project Execution documents must be saved to SharePoint in a folder called 'Project Execution'.

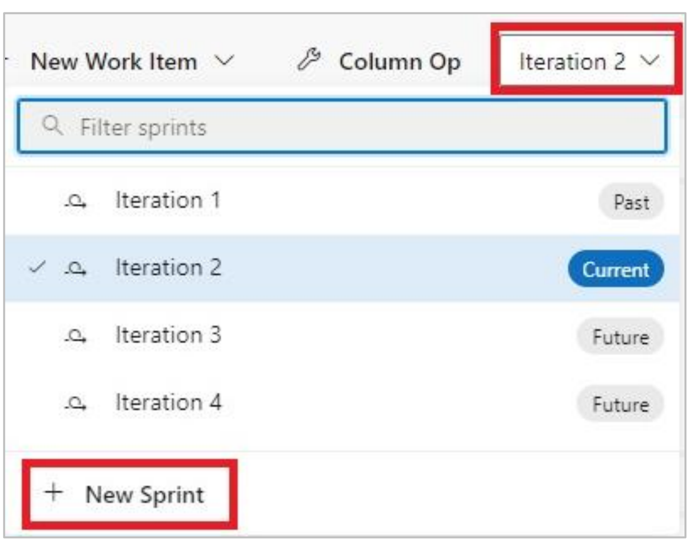
6.5 Sprints

6.5.1 Create Sprints

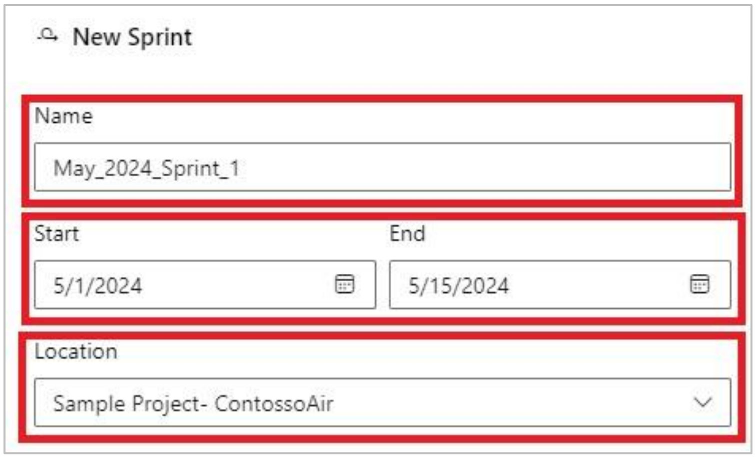
1. Click on 'Sprints' from the 'Boards' menu.



2. From the sprint iteration dropdown menu, click on 'New sprint'.



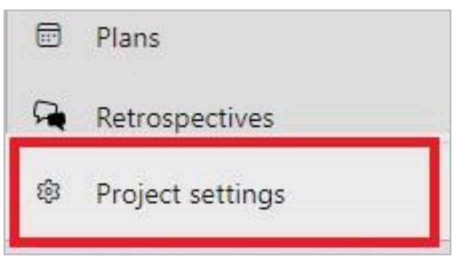
3. In the 'New Sprint' window, provide an appropriate sprint name, start date and end date, and make sure the 'Location' is set to the current project.
    - o The length of sprints can range from 2 weeks to 1 month.



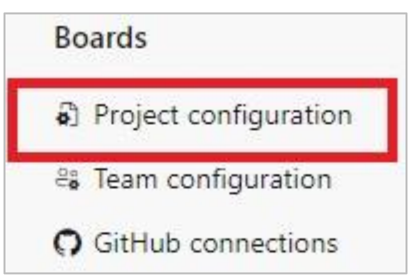
4. Click 'Create' to finish.

6.5.2 Edit Sprints

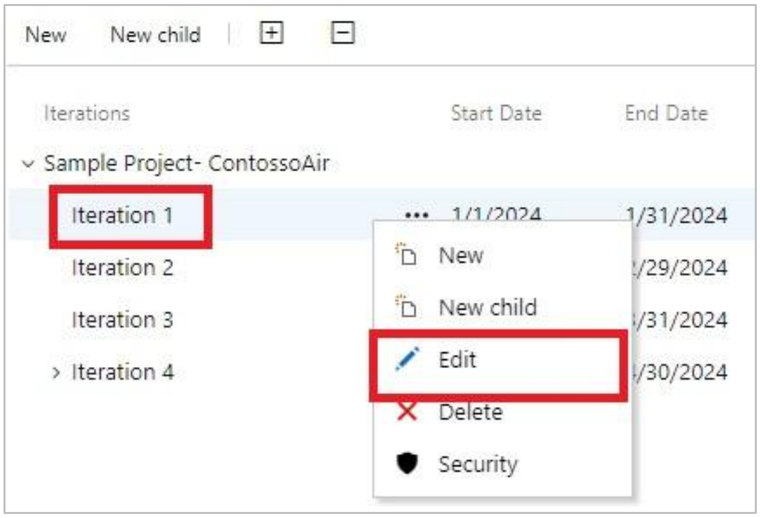
1. Click on Project Settings.



2. From the 'Boards' menu, select 'Project Configuration'.



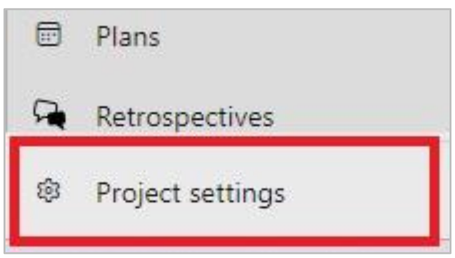
3. To edit a sprint, right click on the sprint and select Edit.



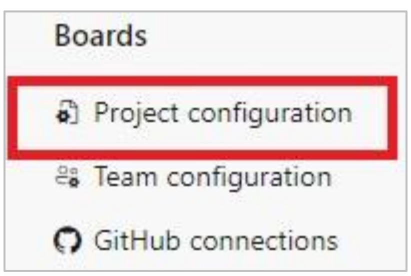
4. In the new window, modify the iteration name, start date and end date as needed.

6.5.3 Delete Sprints

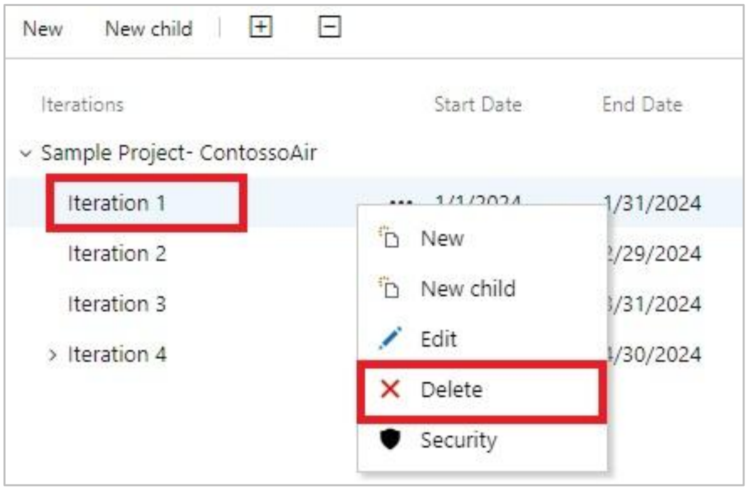
1. Click on Project Settings.



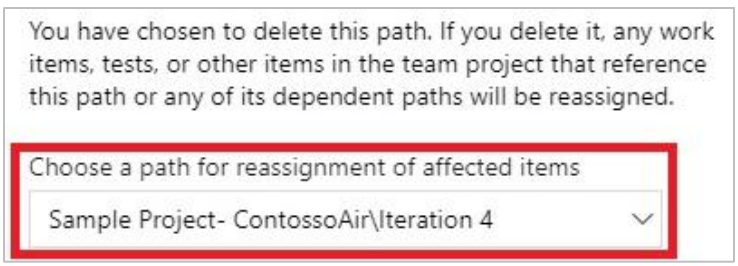
2. From ‘Boards’, select ‘Project Configuration’.



3. To delete a sprint, right click on the sprint and select ‘Delete.



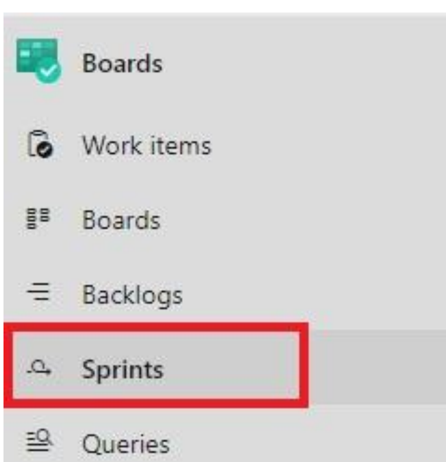
4. Choose a path for work items under the sprint to be reassigned to.



5. Click on 'Delete path'.

6.5.4 Add Team Member, Activity Type and Capacity

1. Click on 'Sprints' from the 'Boards' menu.



2. Select the 'Iteration' you want to add capacity too.

3. Click on 'Capacity'.

4. Click on '+ Add user'.

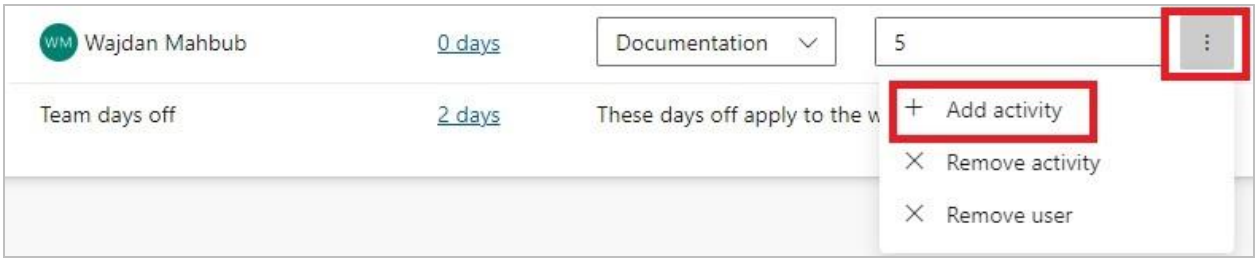
5. Type in the name of a project team member and click 'Ok'.
6. Choose an activity type from the dropdown menu.

7. Enter a per day capacity value.

8. Click 'Save' to finish.

6.5.5 Add New Activity and Capacity

1. Click on the three dots at the end of the row and select '+ Add activity'.

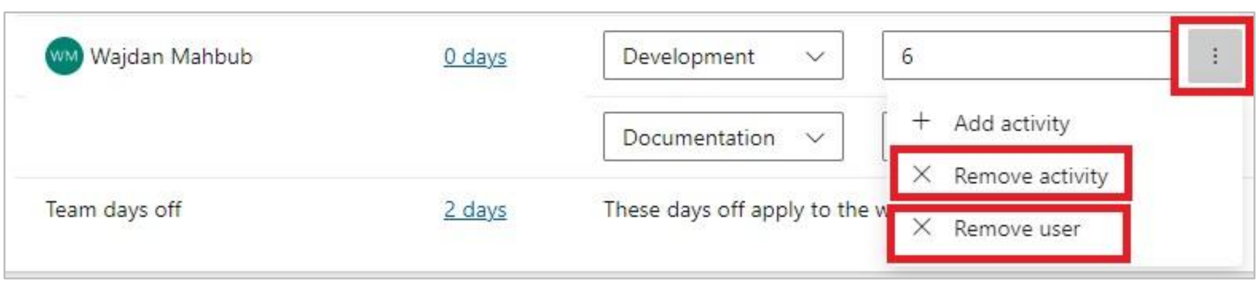


2. Select an activity type from the dropdown menu and set the activity's capacity.

3. Click 'Save' to finish.

6.5.6 Remove Activity or User

1. Click on the three dots at the end of the row, and select 'Remove activity' to delete one activity, or select 'Remove user' to delete a user and all their activities.

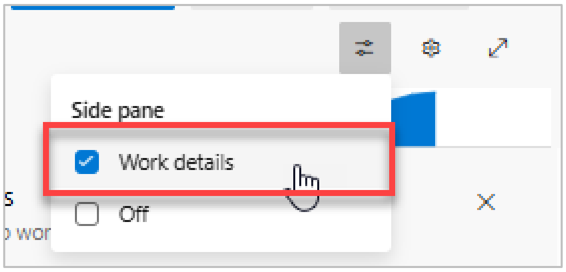


2. Click 'Save' to finish.

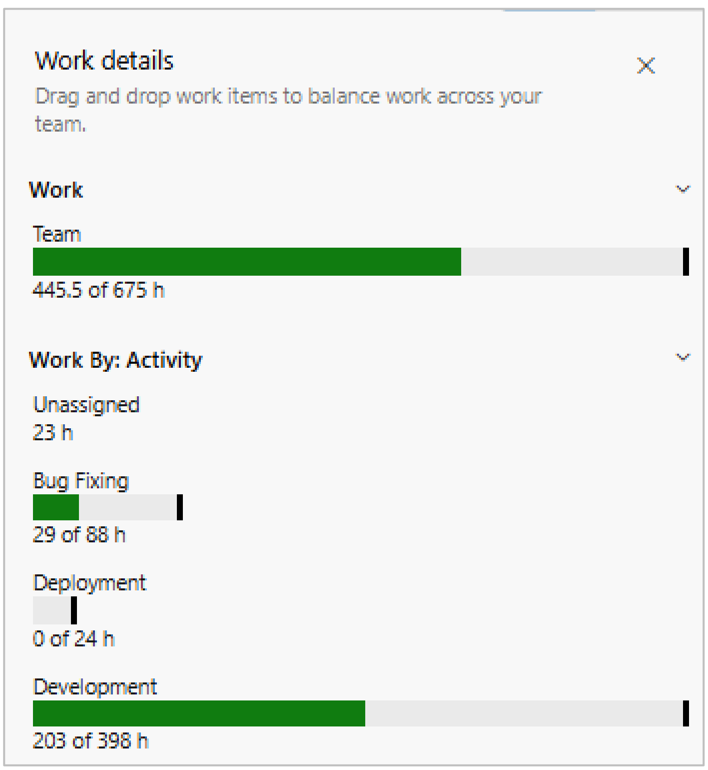
6.5.7 Work Details

View work details based on remaining work for each assignee.

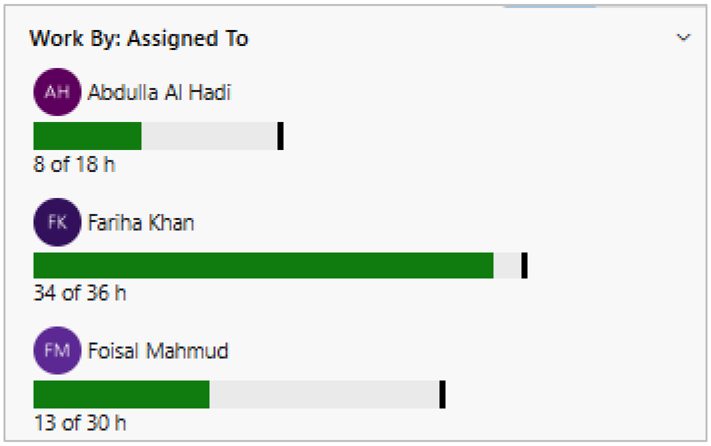
1. Go to “View Options” and select “Work Details”



2. View work details by Activity



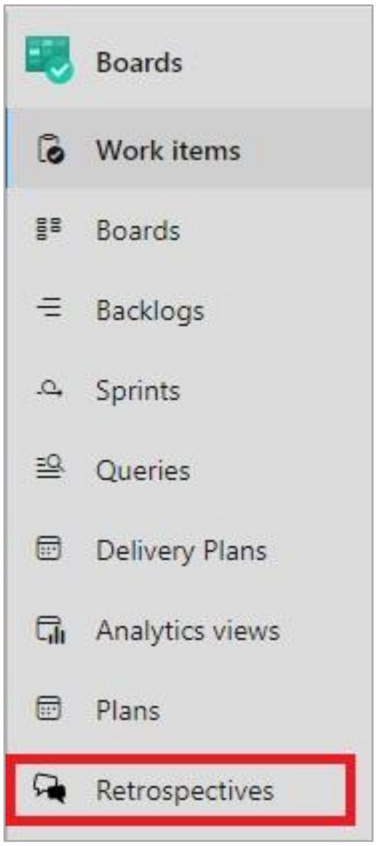
3. View work by Assign to


Work By: Assigned To
AH
Abdulla Al Hadi
8 of 18 h
FK
Fariha Khan
34 of 36 h
FM
Foisal Mahmud
13 of 30 h

7 Project Monitoring

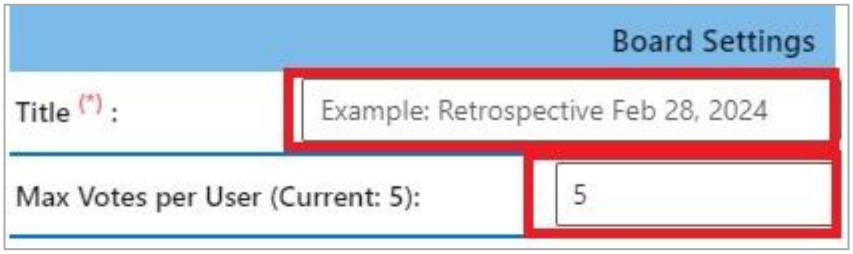
7.1 Retrospective

1. From the Boards menu, click on ‘Retrospectives’.

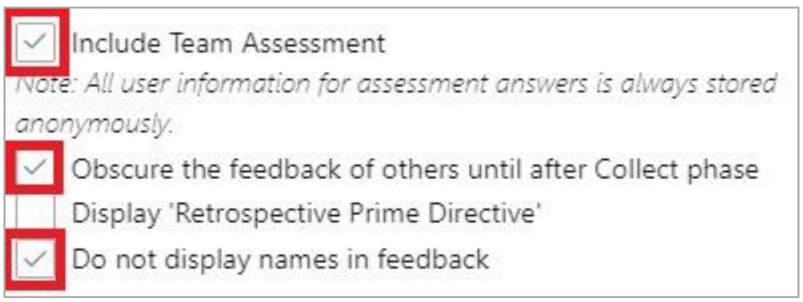


2. Click on the three dots on the top and select ‘Create new retrospective’ from the dropdown menu.

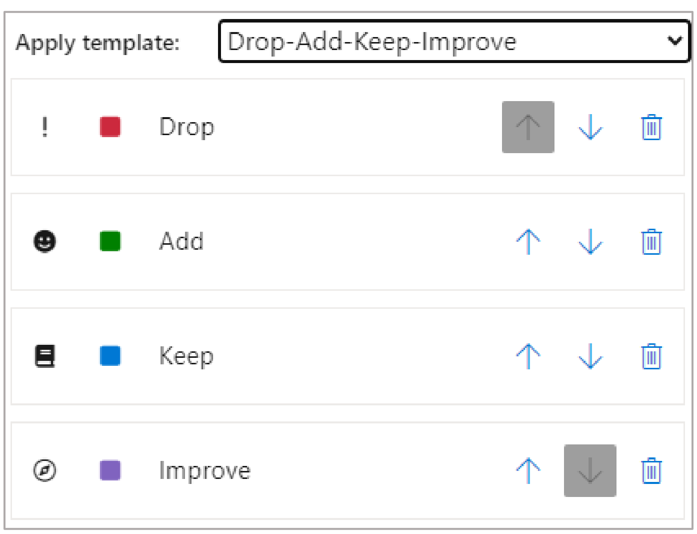
3. Enter an appropriate title for the retrospective and set the maximum number of votes per project team member.



4. Check the boxes for 'Include Team Assessment', 'Do not display names in feedback' and 'Obscure the feedback of others until after Collect phase'.

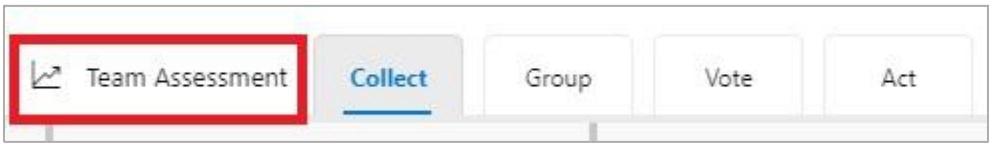


5. Select a template to use for running the retrospective.
    - A good template to use is Drop-Add-Keep-Improve.

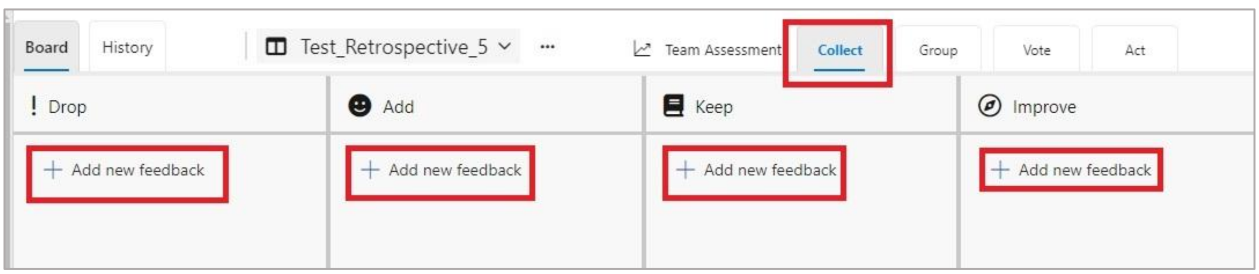


6. Click on ‘Permissions’.

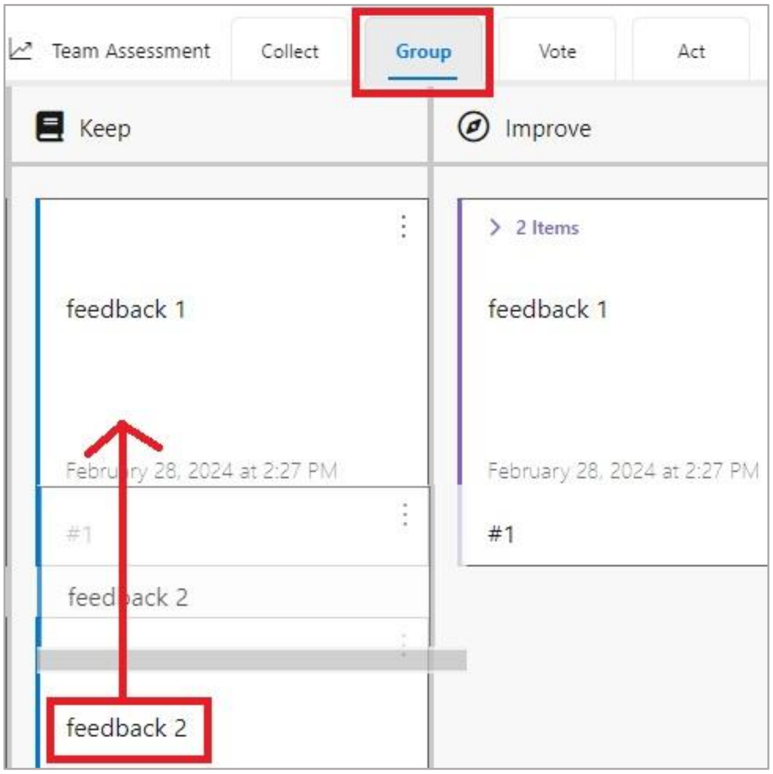
7. Make sure your team has permission to enter their feedback.
8. Click ‘Save’ to finish creating the retrospective.
9. Fill out the ‘Team Assessment’ first.



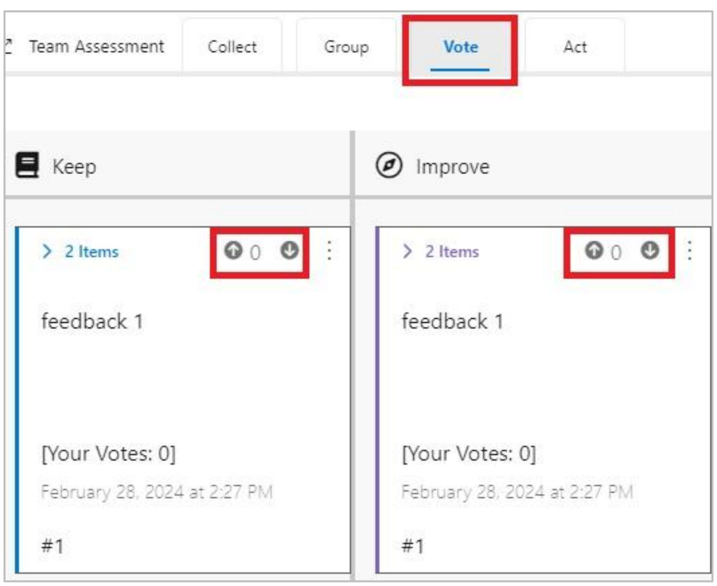
10. Click ‘Submit’ once the Team Assessment is finished.
11. For ‘Collect’, each member of the project team must enter their feedback by clicking ‘Add new feedback’ for all the columns.



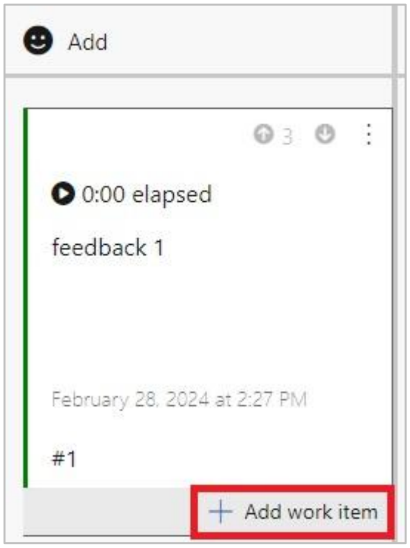
12. For ‘Group’, the project team’s leader or senior member can group the feedback cards together if they are similar or mention the same thing.



13. For ‘Vote’, project team members can vote on the importance of the feedback.
    - o Members have a set number of votes that they cannot go over.



14. For ‘Act’, the team leader should create an appropriate work item to incorporate the feedback into the project backlog, and make other necessary updates to the backlog to keep the project on track.



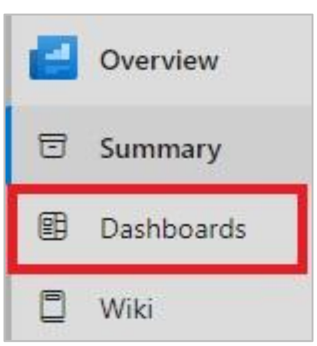
15. Team members will work on the assigned work items from step 14 in a new sprint.
16. The project manager will update the management committee on the project’s progress and retrospective.
17. If the management committee has feedback, the project manager will create work items to incorporate their feedback into the project backlog and communicate the updates with the project team.
18. All Project Monitoring documents must be saved to SharePoint in a folder called ‘Project Monitoring’.

7.2 Dashboards

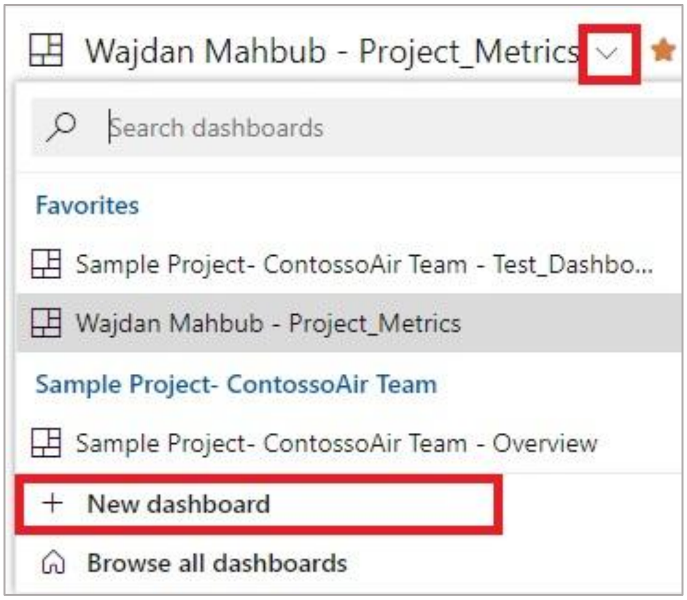
The project manager can use dashboards and the delivery plan in Azure DevOps to monitor the project.

7.2.1 Create Dashboards

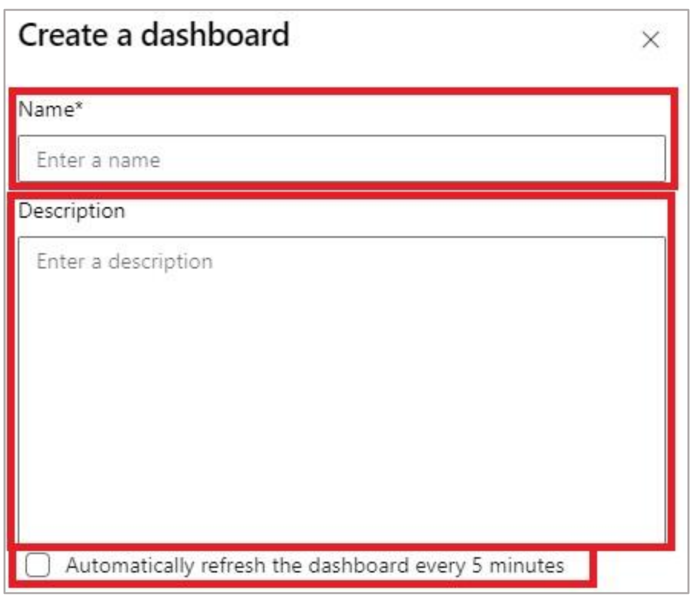
1. From the ‘Overview’ menu, click on ‘Dashboards’.



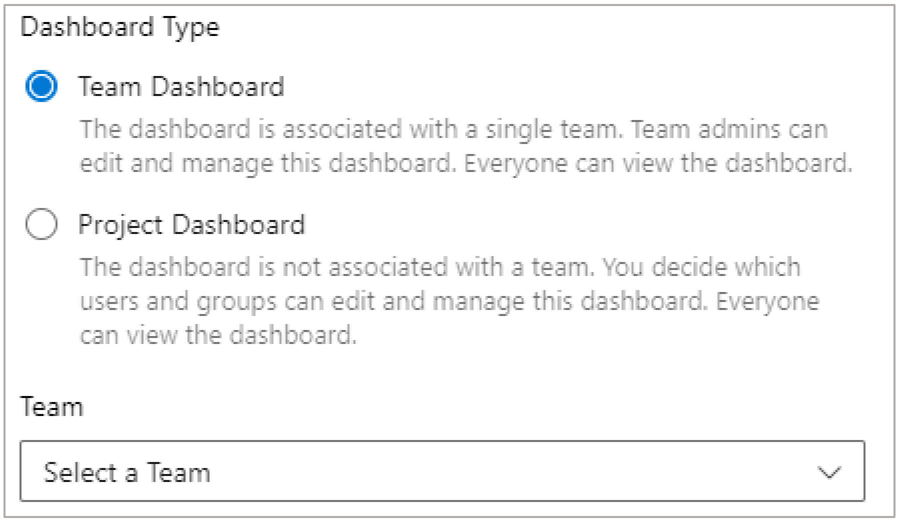
2. From the dropdown menu, click on + ‘New Dashboard’.



3. Enter an appropriate name and description for the dashboard, and select the box that enables dashboards to be refreshed every five minutes.



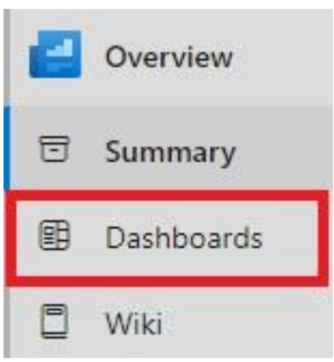
4. Choose if the dashboard is a ‘Team Dashboard’ or ‘Project Dashboard’.
    - Choose the appropriate team from the dropdown menu if you selected ‘Team Dashboard’, otherwise skip this step.



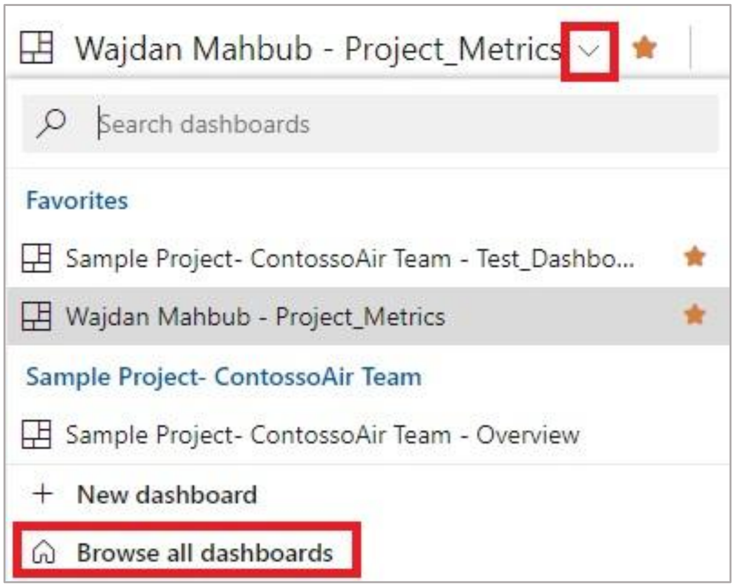
5. Click ‘Create’ to finish.

7.2.2 Delete Dashboards

1. From the ‘Overview’ menu, click on ‘Dashboards’.

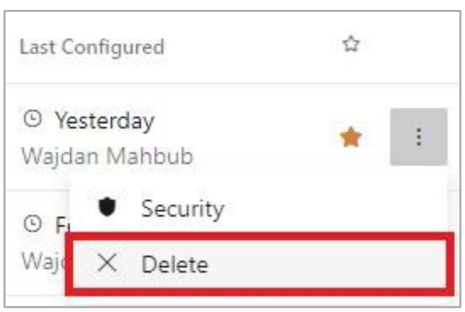


2. From the dropdown menu, click on 'Browse all dashboards’.

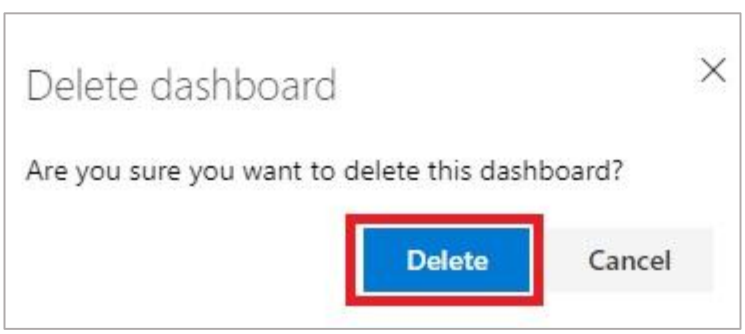


3. Find a dashboard and click on the three dots located on the far right.

4. Select 'Delete'.



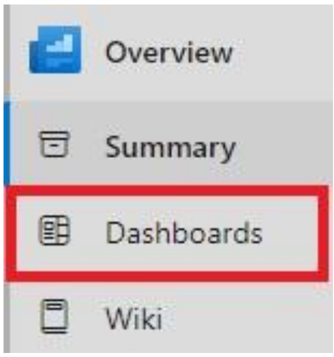
5. Select 'Delete' from the pop-up window.



7.3 Widgets

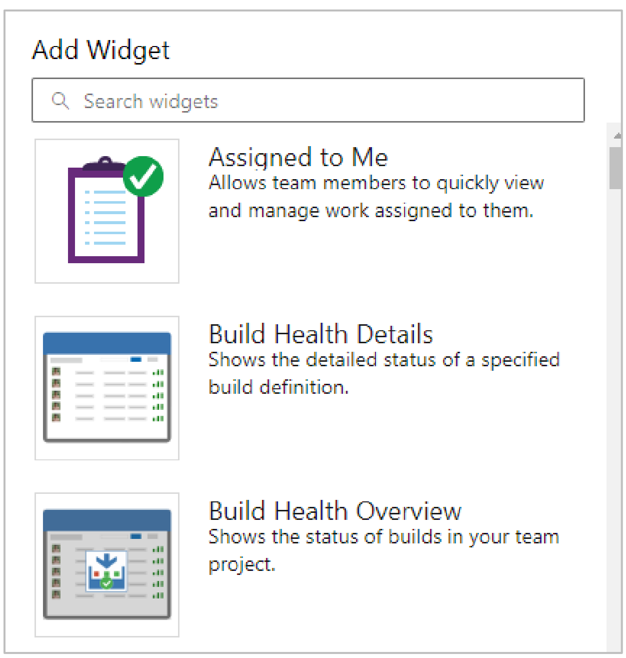
7.3.1 Add Widgets

1. From the 'Overview' menu, click on 'Dashboards'.

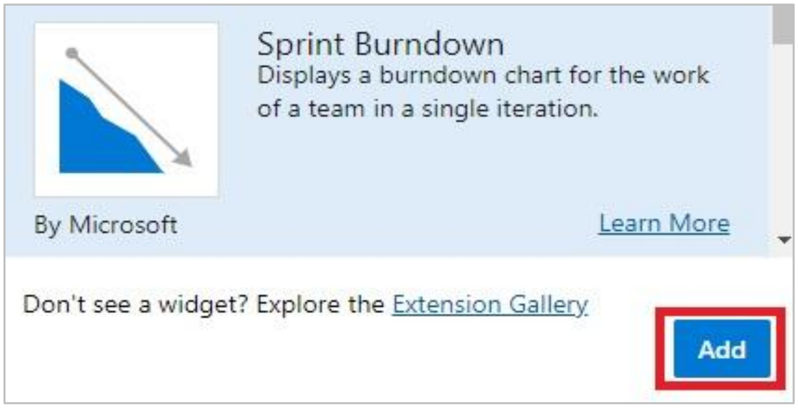


2. Click on your team's or project's dashboard.
3. Select 'Add a widget' if no widgets exist, or 'Edit' to add additional widgets.

4. Choose an appropriate widget from the menu, located on the right-hand side.



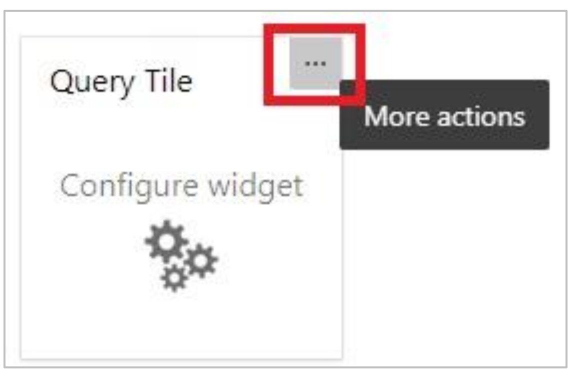
5. Double click on the widget or click 'Add' at the bottom.



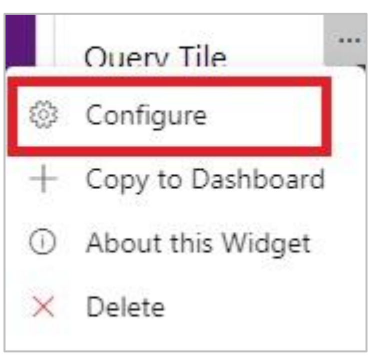
6. Click on 'Done Editing' to finish.

7.3.2 Configure Widgets

1. Hover over the right-hand corner of a widget and click on the three dots.



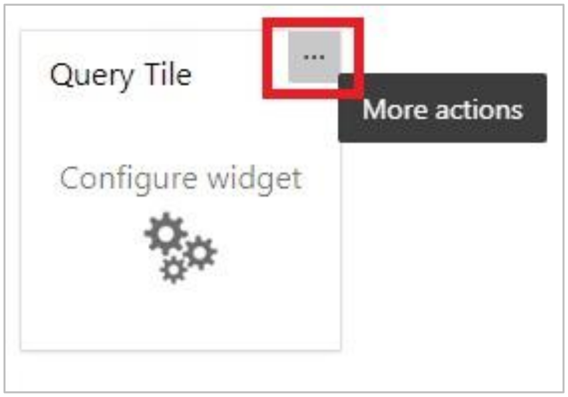
2. Select 'Configure' from the dropdown menu.



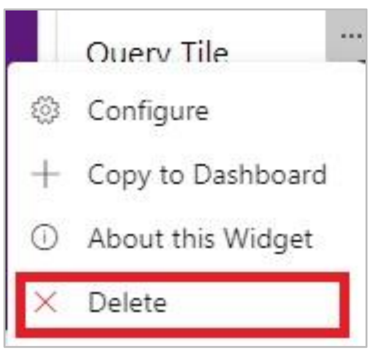
3. Configure the widget to suit your needs.
    - o Each widget has its own configuration options.
4. Click ‘Save’ to finish.

7.3.3 Delete Widgets

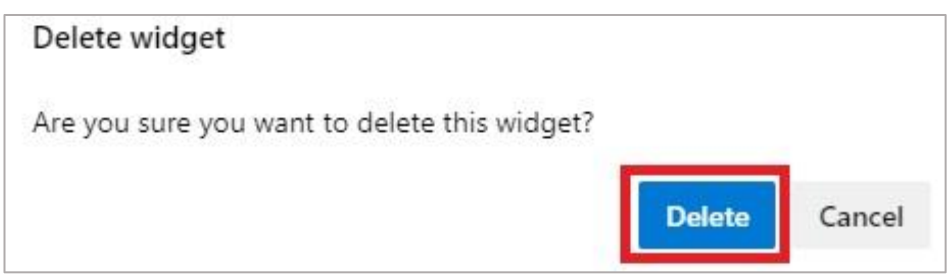
1. Hover over the right-hand corner of a widget and click on the three dots.



2. Select ‘Delete’.



3. Select ‘Delete’ in the pop-up window.

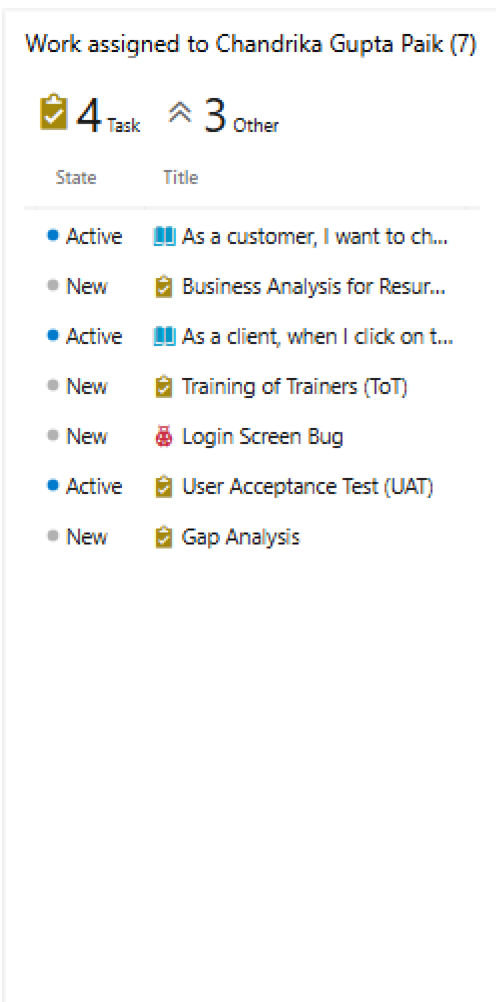


7.4 Widget Examples

7.4.1 Assigned to Me Widget

Displays the list of active work items assigned to the currently logged in user. The list ignores closed, removed, cut, or deleted work items. In addition, the list discards work items which are not aligned to any backlogs.

1. Select ‘Add a widget’ if no widgets exist in the dashboard, or ‘Edit’ to add additional widgets.
2. From the right-hand side, select ‘Assigned to Me’.
3. Double click on the widget, or click ‘Add’ at the bottom.
4. Click on ‘Done Editing’.
5. Click on the three dots on the top right-hand corner to configure the widget.
6. Make the widget’s width 4 and height 2.
7. Click ‘Save’.

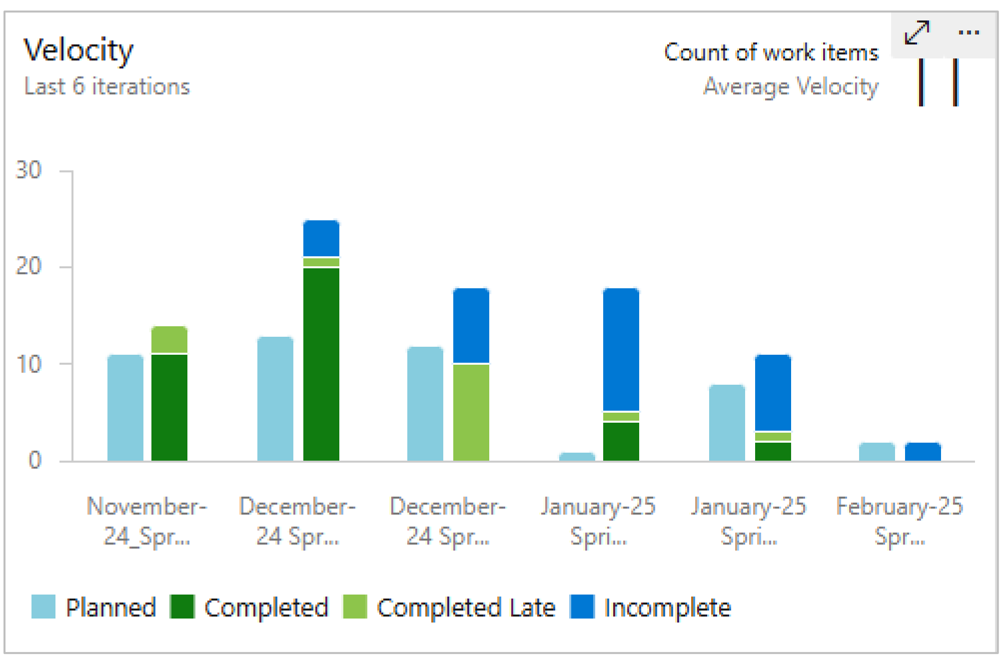


8. See the number of features assigned to you by clicking on ‘Feature’.
9. See the number of user stories assigned to you by clicking on ‘User Story’.
10. See the number of tasks assigned to you by clicking on ‘Task’.
11. See the number of epics assigned to you by clicking on ‘Epic’.
12. Click on any of the four work items to undo the filter.

7.4.2 Velocity Widget

The chart shows what the project team delivered (features, user stories, tests, etc.) as compared to the delivery plan.

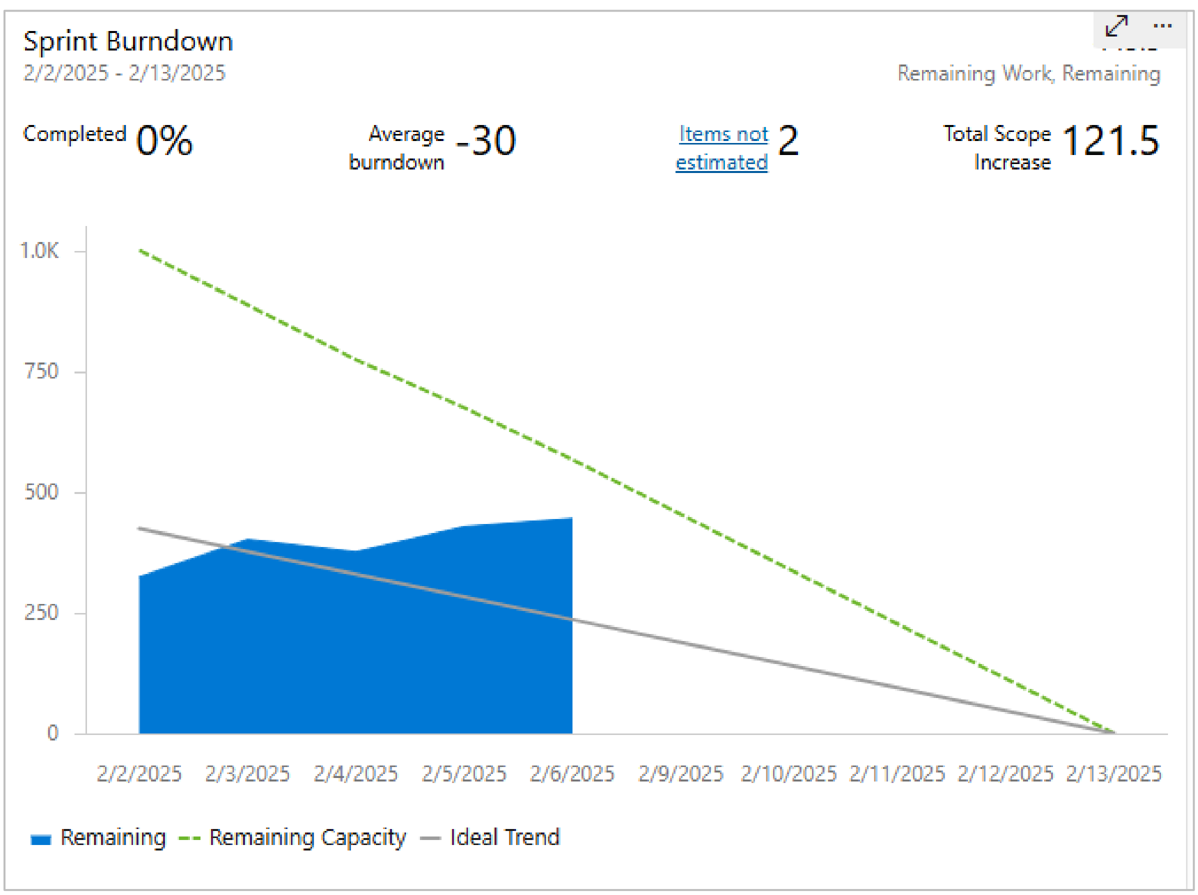
1. Select ‘Add a widget’ if no widgets exist in the dashboard, or ‘Edit’ to add additional widgets.
2. From the right-hand side, select ‘Velocity’.
3. Double click on the widget, or click ‘Add’ at the bottom.
4. Click on ‘Done Editing’.
5. Click on the three dots on the top right-hand corner to configure the widget.
6. Give the widget an appropriate title.
7. For team, select the appropriate project team you want to show velocity for.
8. For work items, you can select Backlog (features and stories) or Work Item Type (bug, issue, feature, etc.)
9. For velocity, you can either show the count of work items, or sum of a measure (story points, priority, remaining work, etc.)
10. For the number of iterations, pick a number between 2 and 6.
11. Modify the options in ‘Advanced Features’ if needed.
12. Click ‘Save’ to finish.



7.4.3 Burndown Widget

Displays the amount of work remaining for a project across multiple teams or a single team.

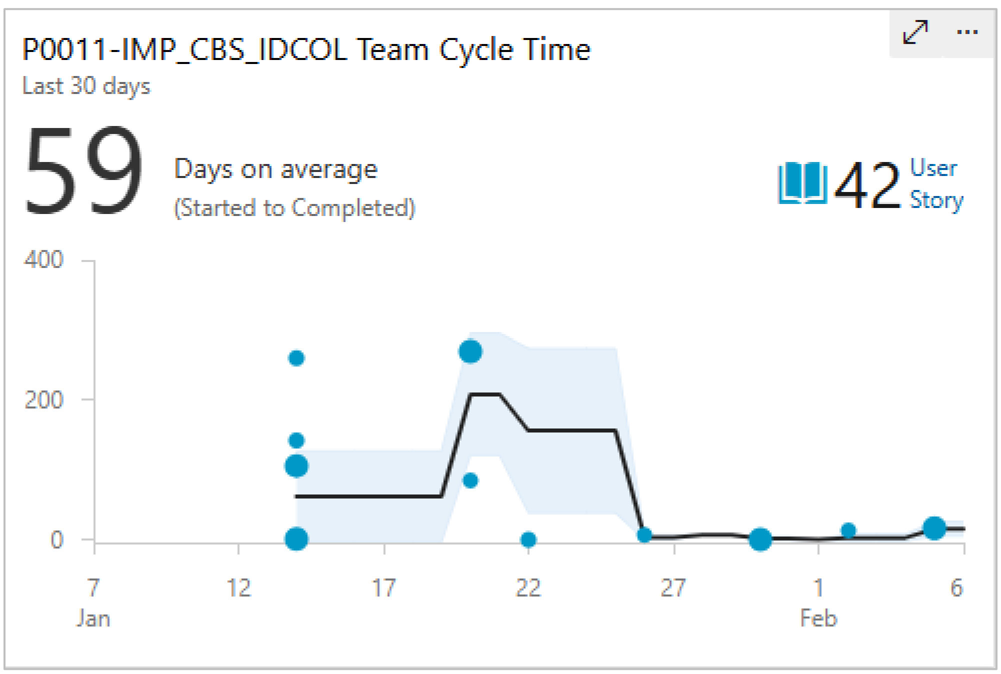
1. Select ‘Add a widget’ if no widgets exist in the dashboard, or ‘Edit’ to add additional widgets.
2. From the right-hand side, select 'Burndown’.
3. Double click on the widget, or click ‘Add’ at the bottom.
4. Click on ‘Done Editing’.
5. Click on the three dots on the top right-hand corner to configure the widget.
6. Give the widget an appropriate title.
7. Select the project team and the name of the project the team is working on.
8. For Work Items, you can select Backlog (Epic, Stories or Features), or Work Item Type (Bug, User Story, Task, etc.).
9. To add filters to the chart, add them under ‘Field Criteria’.
10. For the ‘Burndown on’ field, select ‘Count’ of ‘Work Items’.
11. For ‘Time period’, select an appropriate ‘Start date’ and ‘End date’.
12. For ‘Plot burndown by’, choose ‘Date’.
13. Your ‘Plot interval’ can be ‘Days’ or ‘Weeks’.
14. Select ‘Thursday’ for ‘Last day of the week’.
15. Under ‘Advanced features’, select ‘Show burndown’, ‘Show total scope’ and ‘Show completed work’.
16. Click ‘Save’ to finish.



7.4.4 Cycle Time Widget

Measures the time it takes to move work through a single process or workflow state. Calculation is from the start of one process to the start of the next process (i.e. the time from New to Active). Cycle time widgets can be used to track the time taken to move user stories or features from New to Active.

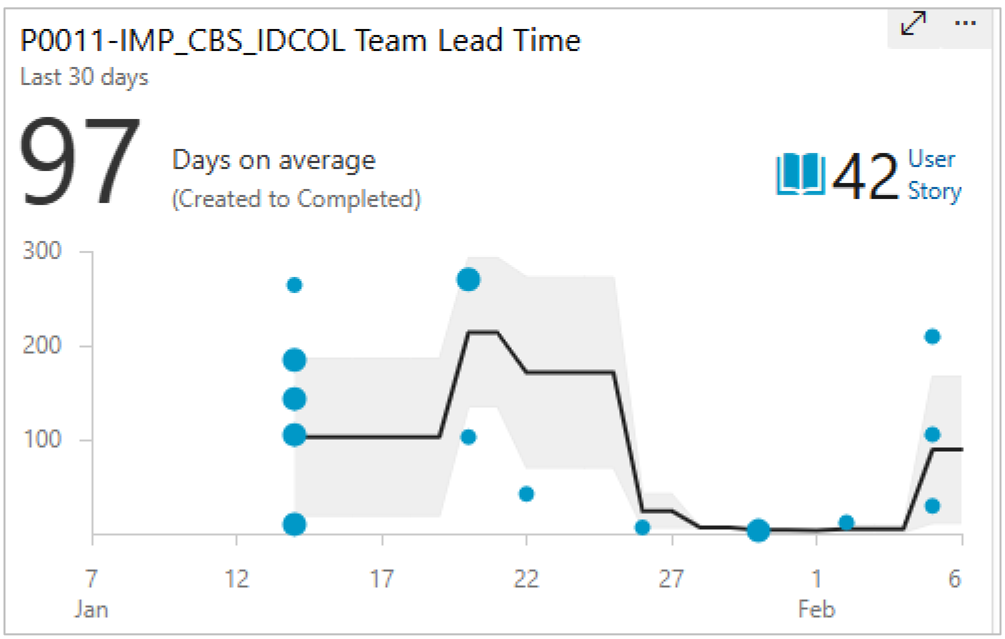
1. Select ‘Add a widget’ if no widgets exist in the dashboard, or ‘Edit’ to add additional widgets.
2. From the right-hand side, select ‘Cycle Time’.
3. Double click on the widget, or click ‘Add’ at the bottom.
4. Click on ‘Done Editing’.
5. Click on the three dots on the top right-hand corner to configure the widget.
6. Give the widget an appropriate title.
7. Under Team, select the appropriate project team.
8. For Work Items, choose either ‘Backlog’ (Stories or Features) or ‘Work Item Type’ (Feature, Task, Issue, etc.).
9. For ‘Swimlane’, choose either ‘All’ or the appropriate swimlane you want to show cycle time for.
10. To add filters to the chart, add them under ‘Field Criteria’.
11. For Time Period, choose either ‘Rolling period’ or pick a ‘Start date’.
    - Start date can be the start of the execution phase of the project.
12. Click ’Save’ to finish.



7.4.5 Lead Time Widget

Measures the time from when work on a request begins until the work is completed (i.e. the time from Active to Closed). Cycle time widgets can be used to track the completion time for features and epics.

1. Select ‘Add a widget’ if no widgets exist in the dashboard, or ‘Edit’ to add additional widgets.
2. From the right-hand side, select ‘Lead Time’.
3. Double click on the widget, or click ‘Add’ at the bottom.
4. Click on ‘Done Editing’.
5. Click on the three dots on the top right-hand corner to configure the widget.
6. Select the appropriate project team for ‘Team’.
7. Under Team, select the appropriate project team.
8. For Work Items, choose either ‘Backlog’ (Features) or ‘Work Item Type’ (Feature, Task, Issue, etc.).
9. For ‘Swimlane’, choose either ‘All’ or the appropriate swimlane you want to show lead time for.
10. To add filters to the chart, add them under ‘Field Criteria’.
11. For Time Period, choose either ‘Rolling period’ or pick a ‘Start date’.
    - Start date can be the start of the execution phase of the project.
12. Click ’Save’ to finish.

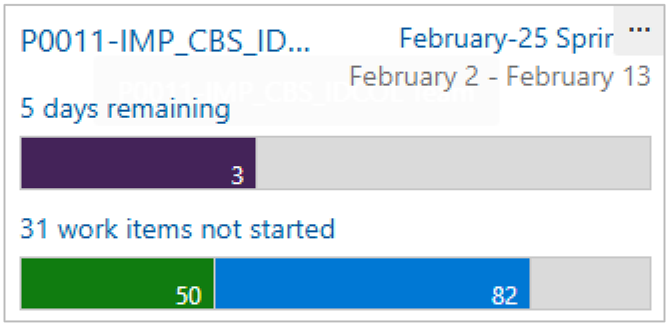


7.4.6 Sprint Overview Widget

The chart provides a visual overview of the current sprint’s progress.

1. Select ‘Add a widget’ if no widgets exist in the dashboard, or ‘Edit’ to add additional widgets.
2. From the right-hand side, select 'Sprint Overview’.
3. Double click on the widget, or click ‘Add’ at the bottom.
4. Click on ‘Done Editing’.
5. Click on the three dots on the top right-hand corner to configure the widget.
6. Select the appropriate project team for ‘Team’.
7. For ‘Values’, you can select either ‘Count of Work Items’ or ‘Story Points’.

8. Click 'Save' to finish.



7.4.7 Cumulative Flow Diagram Widget

The chart visualizes the flow of work and identifies bottlenecks in the work process.

1. Select 'Add a widget' if no widgets exist in the dashboard, or 'Edit' to add additional widgets.
2. From the right-hand side, select 'Cumulative Flow Diagram'.
3. Double click on the widget, or click 'Add' at the bottom.
4. Click on 'Done Editing'.
5. Click on the three dots on the top right-hand corner to configure the widget.
6. Give the widget an appropriate title.
7. Under Team, select the appropriate project team.
8. For Backlog, select either 'Stories' or 'Features'.
9. For Swimlane, select either 'All' or a specific swimlane.
10. For Column, select only Active, Resolved and Closed.
11. For Time period, select either 'Rolling period' or 'Start date'.
    - Start date can be the start of the execution phase of the project.
12. For Color, select an appropriate color.
13. Click 'Save' to finish.

7.4.8 Release Health Overview Widget

The widget shows the status of releases for the project.

1. Select 'Add a widget' if no widgets exist in the dashboard, or 'Edit' to add additional widgets.
2. From the right-hand side, select 'Release Health Overview'.
3. Double click on the widget, or click 'Add' at the bottom.
4. Click on 'Done Editing'.
5. Click on the three dots on the top right-hand corner to configure the widget.
6. Give the widget an appropriate title.
7. Adjust the height and width dimensions if needed.
8. Select the appropriate release definition from the dropdown menu.
9. Put a checkmark in the box for 'Show rejected releases as failed'.

10. Click ‘Save’ to finish.

7.4.9 Release Pipeline Overview Widget

The widget shows the status of stages in a release pipeline.

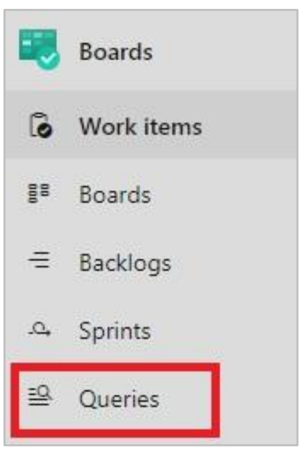
1. Select ‘Add a widget’ if no widgets exist in the dashboard, or ‘Edit’ to add additional widgets.
2. From the right-hand side, select 'Release Pipeline Overview'.
3. Double click on the widget, or click ‘Add’ at the bottom.
4. Click on ‘Done Editing’.
5. Click on the three dots on the top right-hand corner to configure the widget.
6. Give the widget an appropriate title.
7. Select an appropriate size for the widget.
8. Under ‘Release pipeline’, select the right release plan.
9. Click ‘Save’ to finish.

7.5 Queries

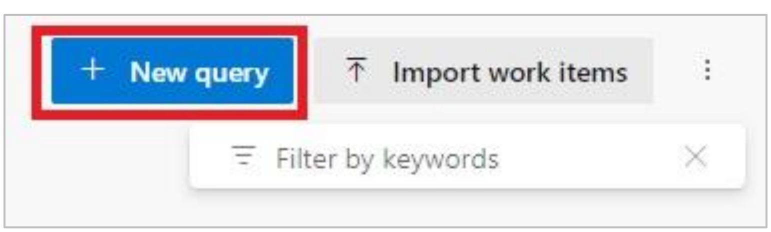
You can use Queries to generate a list of work items, which you can add to dashboards or export to Excel.

7.5.1 Query Editor

1. From the ‘Boards’ menu, click on ‘Queries’.

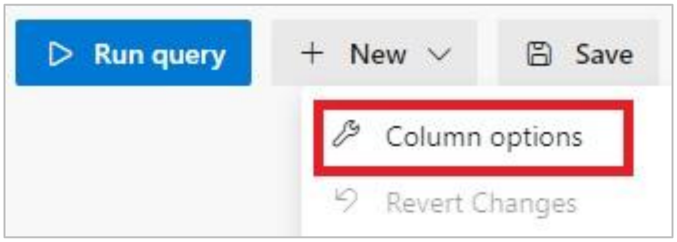


2. Click on ‘+ New Query’.

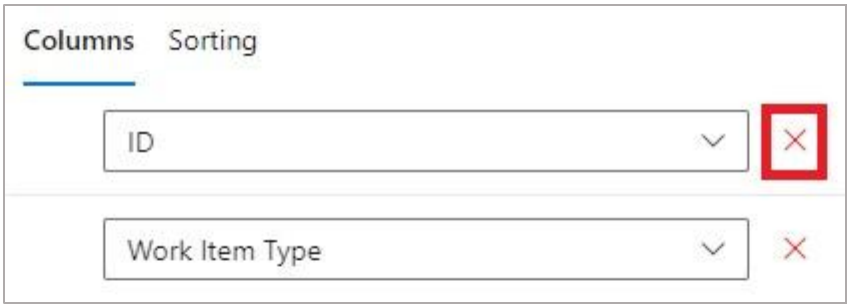


3. Click on the three dots next to 'Save'.

4. Select 'Column options'.

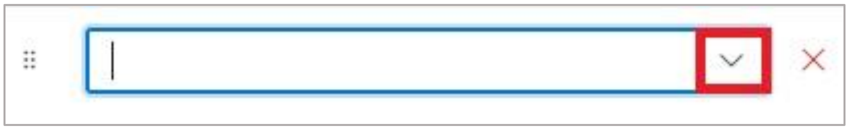


5. In the 'Columns' menu, remove columns you don't need by clicking on the red cross located next to a column's name.



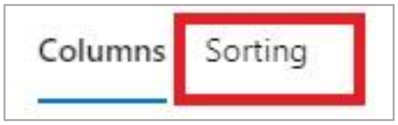
6. Click on '+ Add a column' to add new columns.

7. Select a column from the dropdown menu.



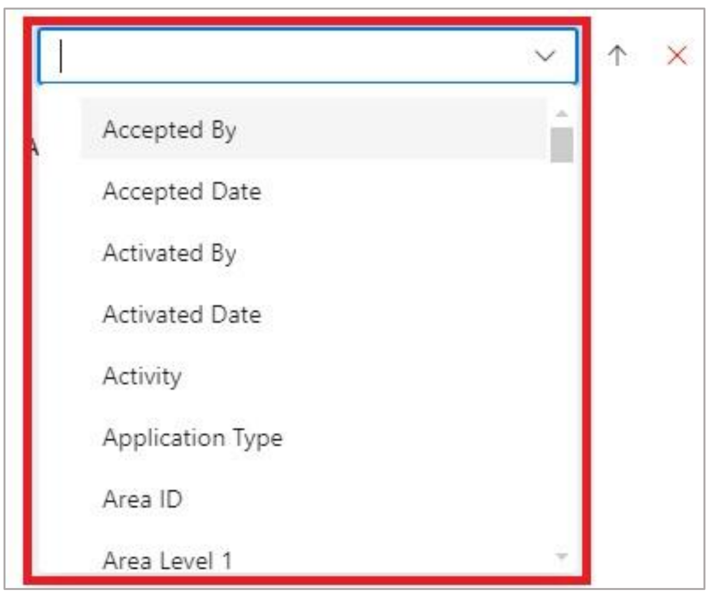
8. Click on the dots (located before a column's name) and drag columns up and down to change the column order.

9. Click on the ‘Sorting’ menu.



10. Add columns by clicking on ‘+ Add a column’.

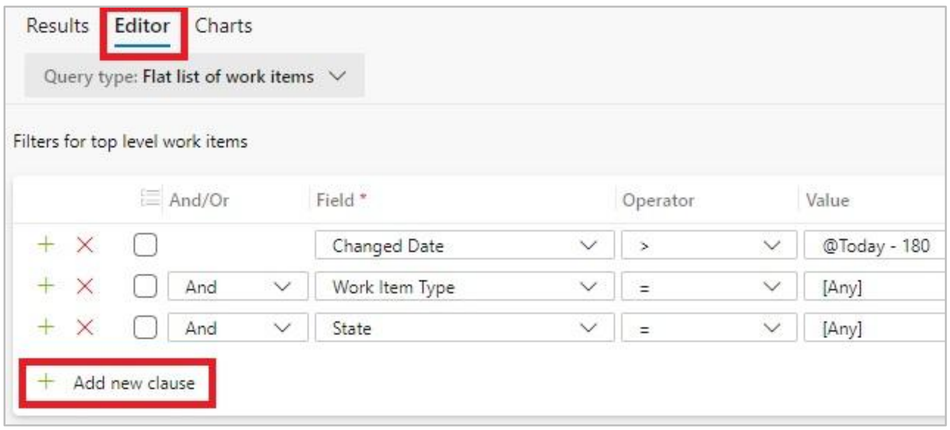
11. Choose a column from the dropdown menu.



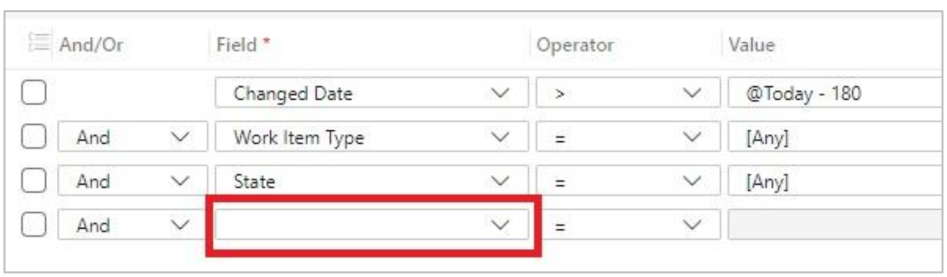
12. On the right-hand side of each column name, click on the arrow to determine if the column will sort the rows in an ascending (up arrow) or descending (down arrow) order.

13. Click ‘Ok’.

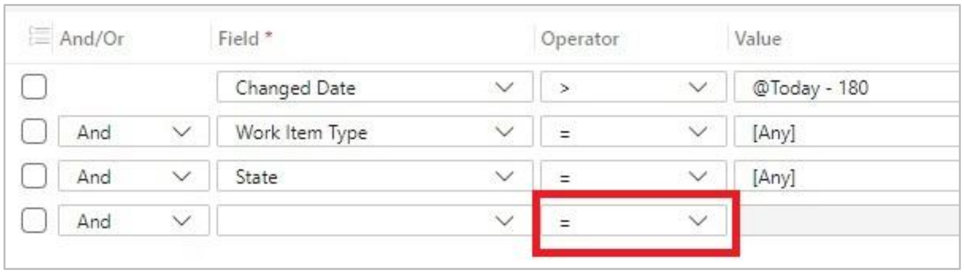
14. On the ‘Editor’ page, click on ‘+ Add new clause’ to add columns to act as filters.
    - Click on ’X’ to remove columns from the list.



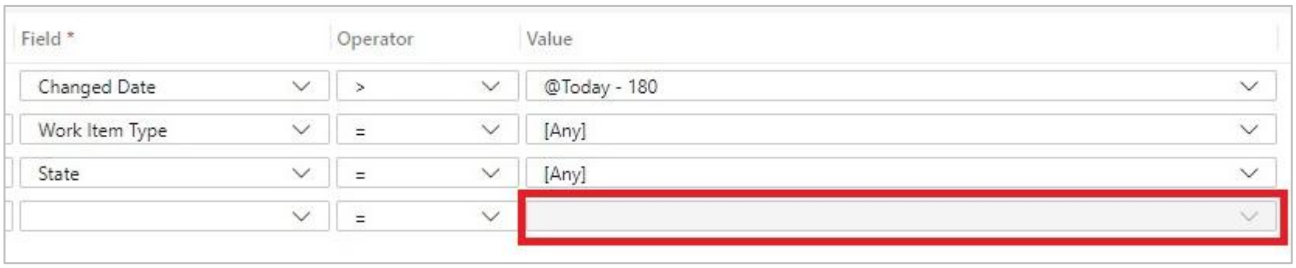
15. Select a column name from the menu.



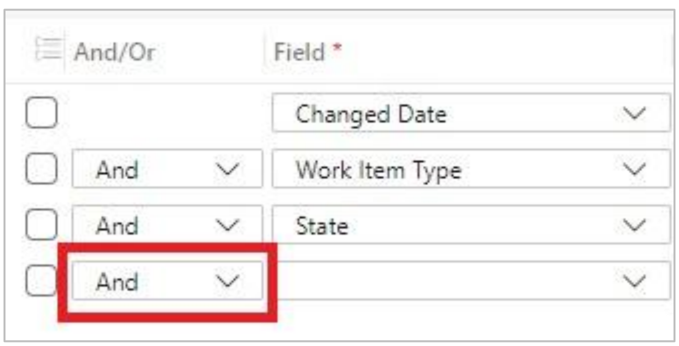
16. Select the appropriate operator.



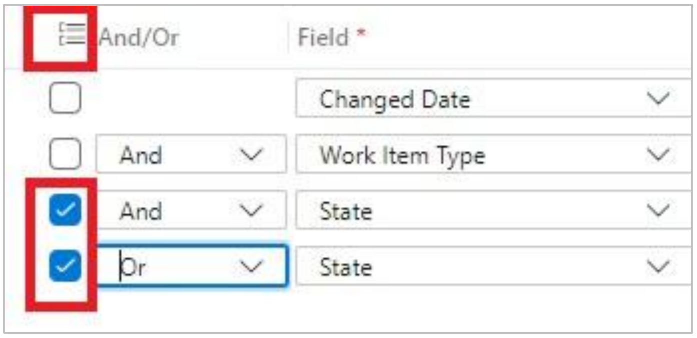
17. Enter an appropriate value.



18. Choose ‘And’ or ‘Or’ from the dropdown menu.
    - And: The 'And’ operator displays a record if all the conditions separated by 'And’ are true.
    - Or: The 'Or' operator displays a record if any of the conditions separated by 'Or’ are true.

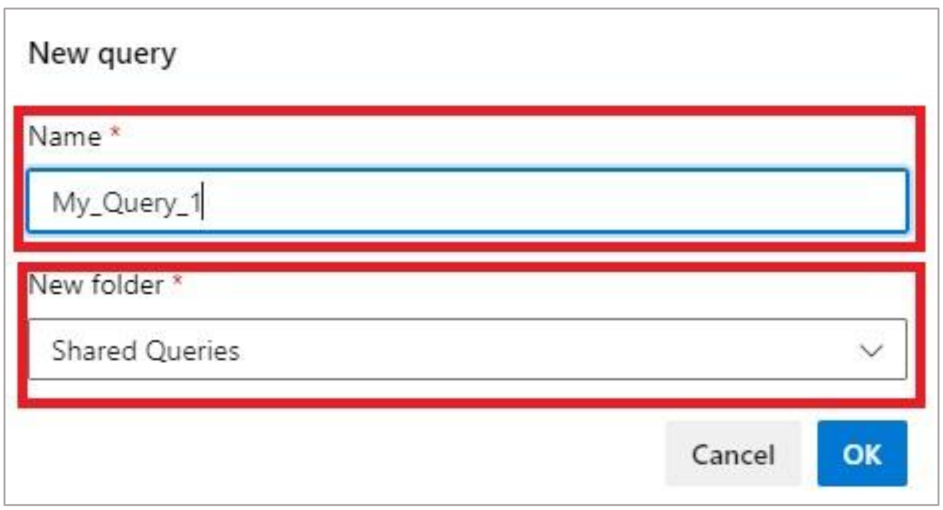


19. If you need to group two or more columns, select the columns and click on the ‘Group selected clauses’ button, which is located above the checkboxes.
    - In a group, one column must have the ‘Or’ operator.



20. Click on ‘Save’.

21. Put in an appropriate name for the query and choose ‘Shared Queries’ from the 'New folder’ menu.



22. Click on ‘Ok’ to finish.

7.5.2 Query Results

1. Click on the ‘Results’ tab.

2. Click on 'Run query' to view results.

3. If you need to make changes to the query, click on the 'Editor' tab.

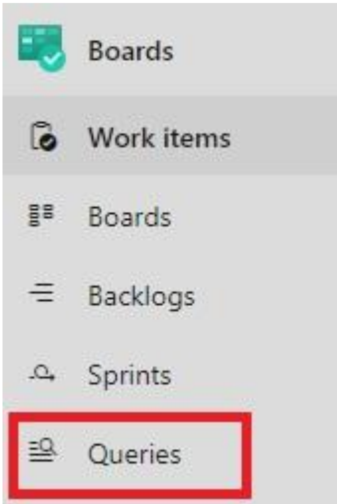
4. Make the necessary changes to the columns, clauses, operators, values, etc.
5. Click on 'Save'.

6. Go back to the 'Results page'.

7. Click on 'Run Query' to view the new results.

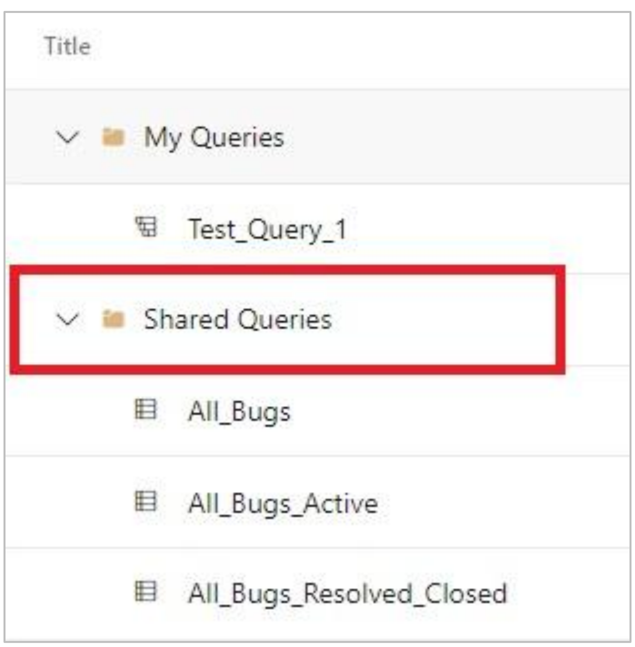
7.5.3 Export Queries to Dashboard

1. From the Boards menu, click on Queries.



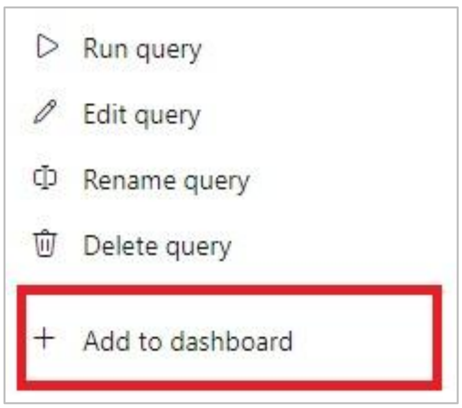
2. Click on ‘All’.

3. Navigate to the ‘Shared Queries’ folder.

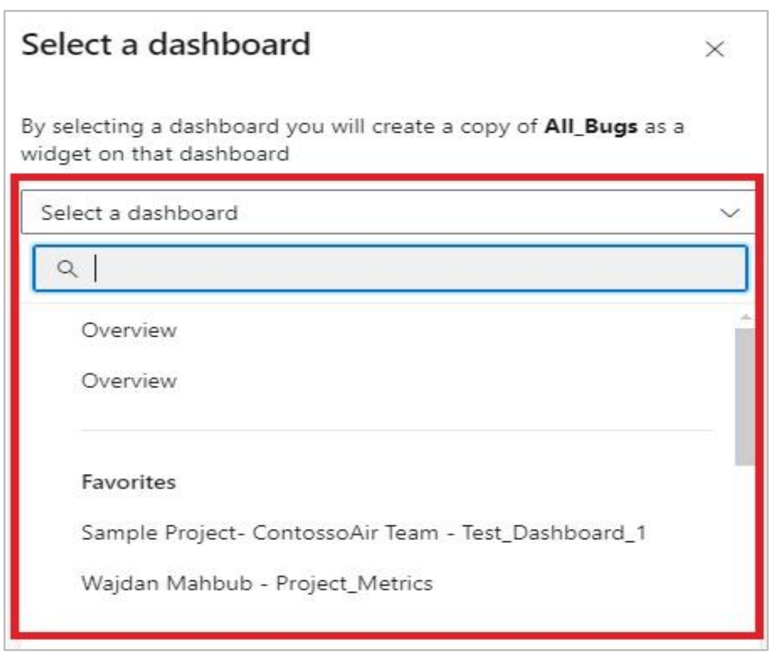


4. Click on the three dots located on the right-hand side of a query's name.

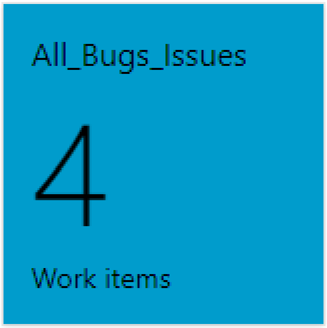
5. Click on '+ Add to dashboard'.



6. From the dropdown menu, select a dashboard you want the query's results exported to.

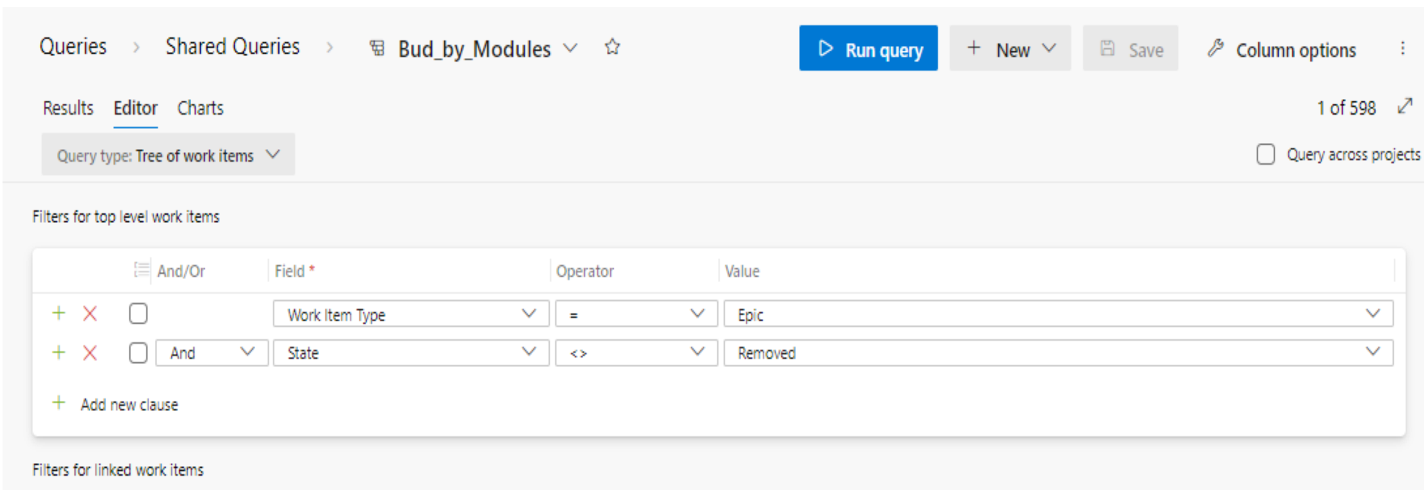


7. Click 'OK' to finish.
8. Your query will be exported to the dashboard as a query tile.



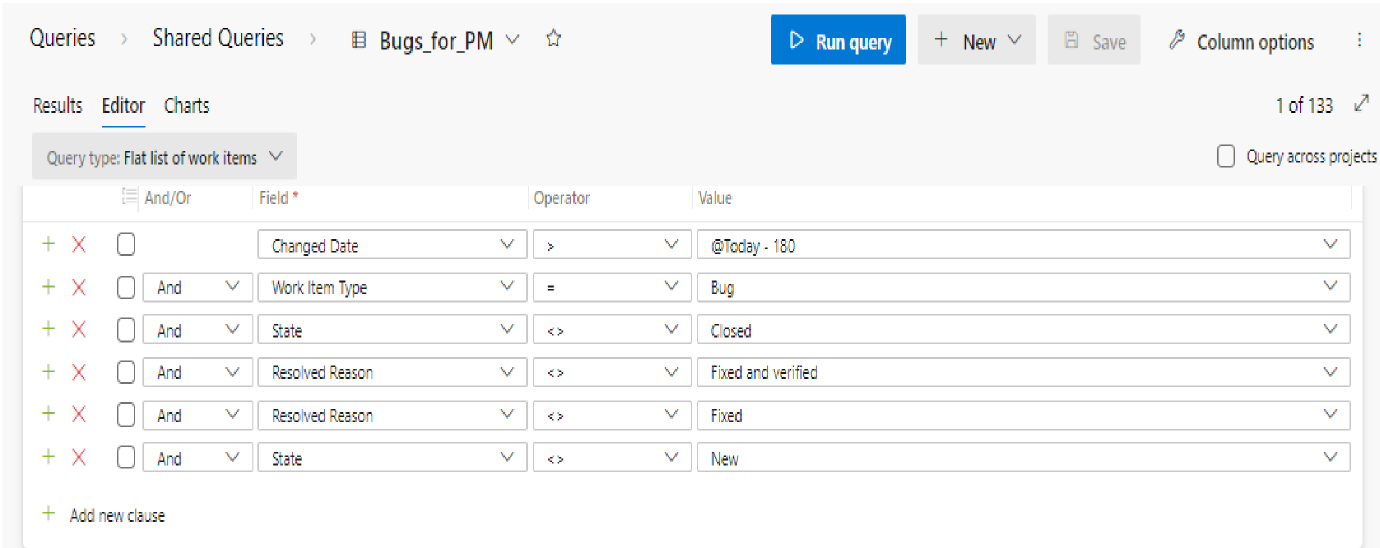
9. Shared Queries (All Queries from Previous Projects are Added below for future reference)

Bug By Modules



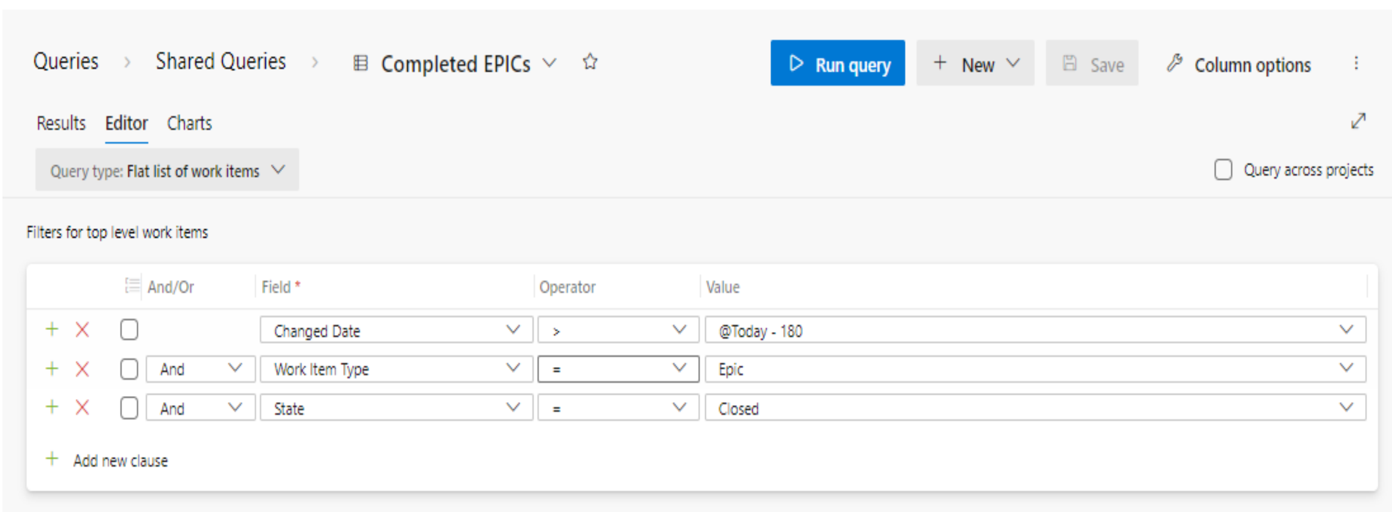
Explanation for Queries: These are all the bugs within each modules (Epics) that are in any state other than Removed.

Bugs for PM



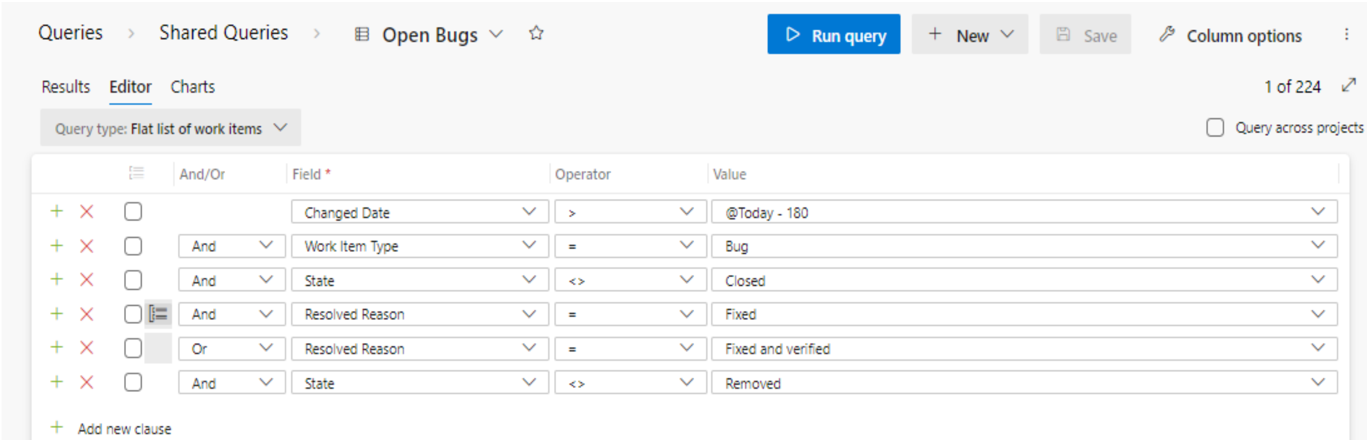
Explanation for Queries: These are all the bugs that are active, and PM will have to check what to do with these bugs.

Completed Epics



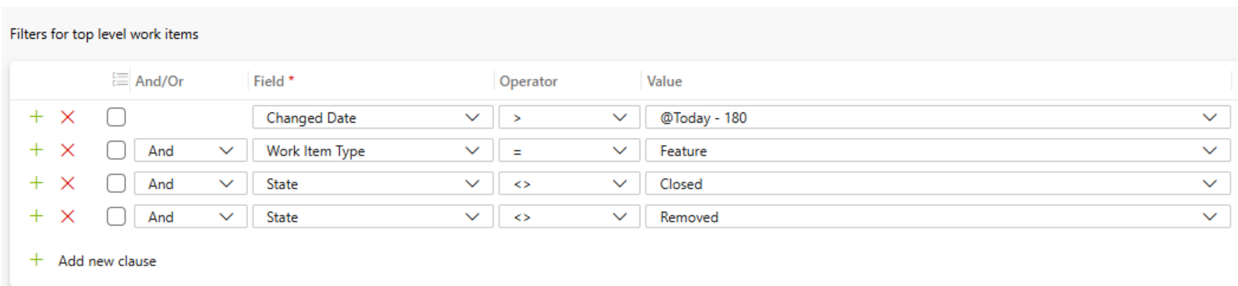
Explanation for Queries: These are all the epics that are closed

Open Bugs



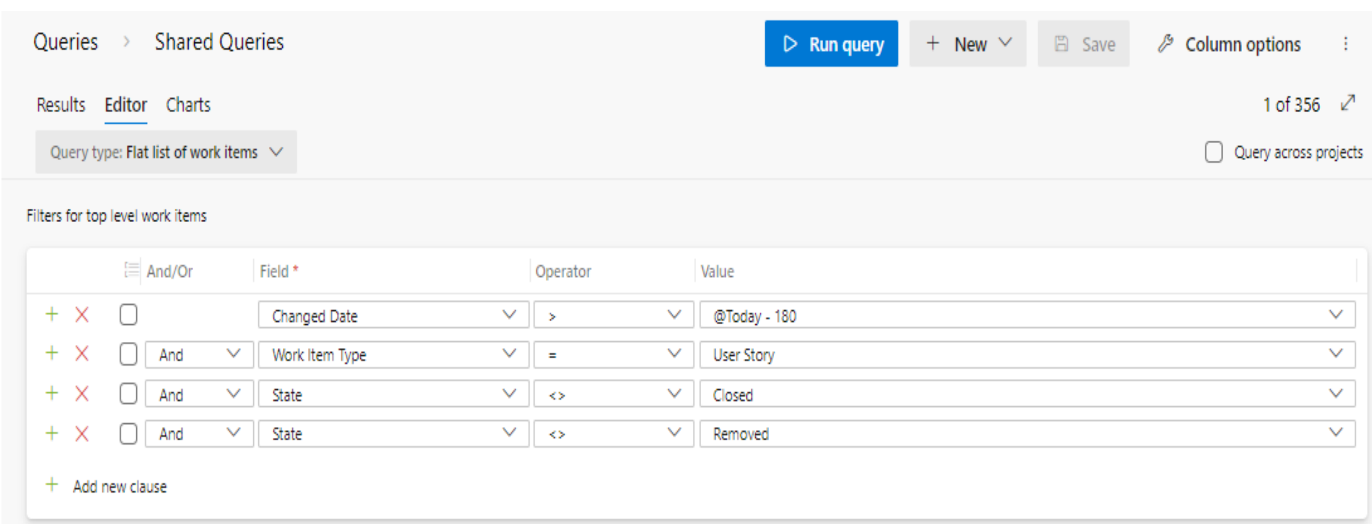
Explanation for Queries: These will show all the bugs that are in Resolved State

Pending Features



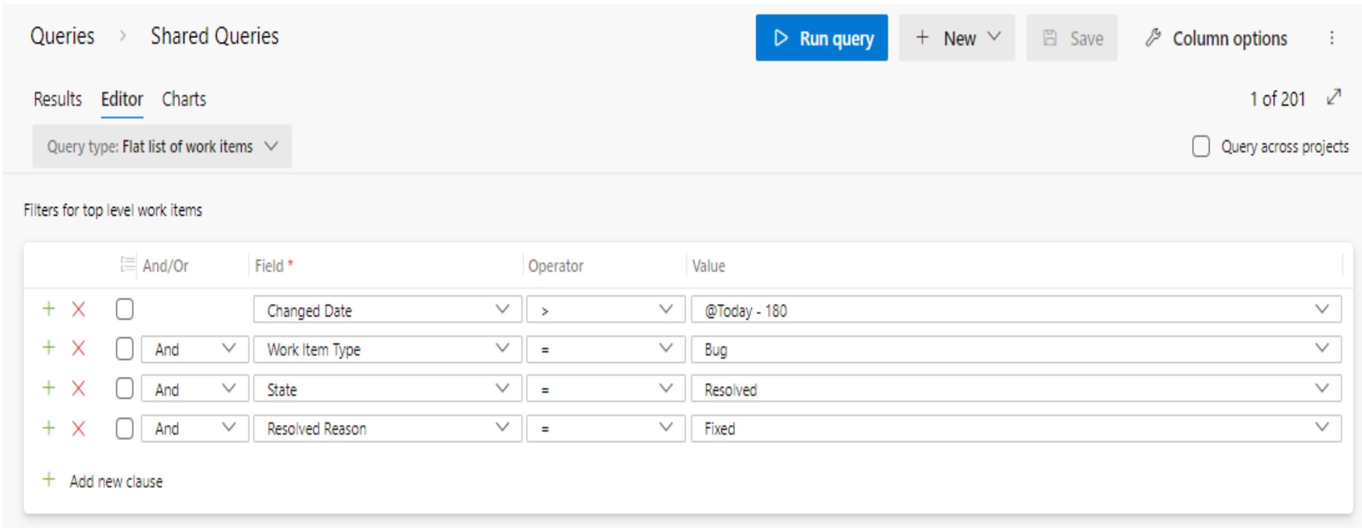
Explanation for Queries: These will show all the features that are not closed and removed.

Pending Stories



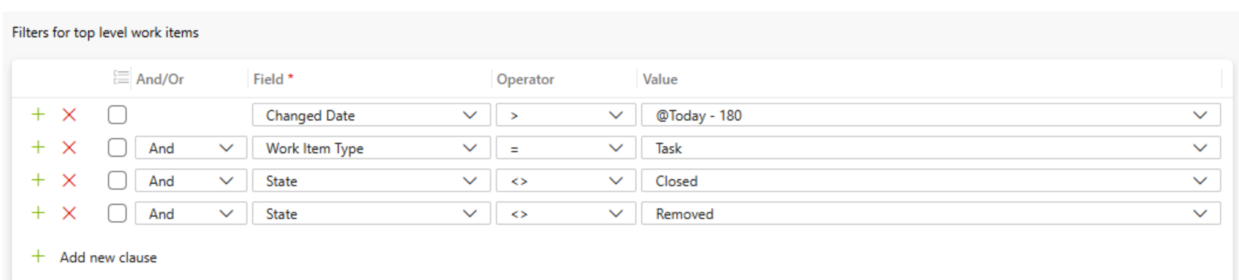
Explanation for Queries: These will show all the Pending User stories that are not in “closed’’ or Removed State.

Resolved but need to Re-Test



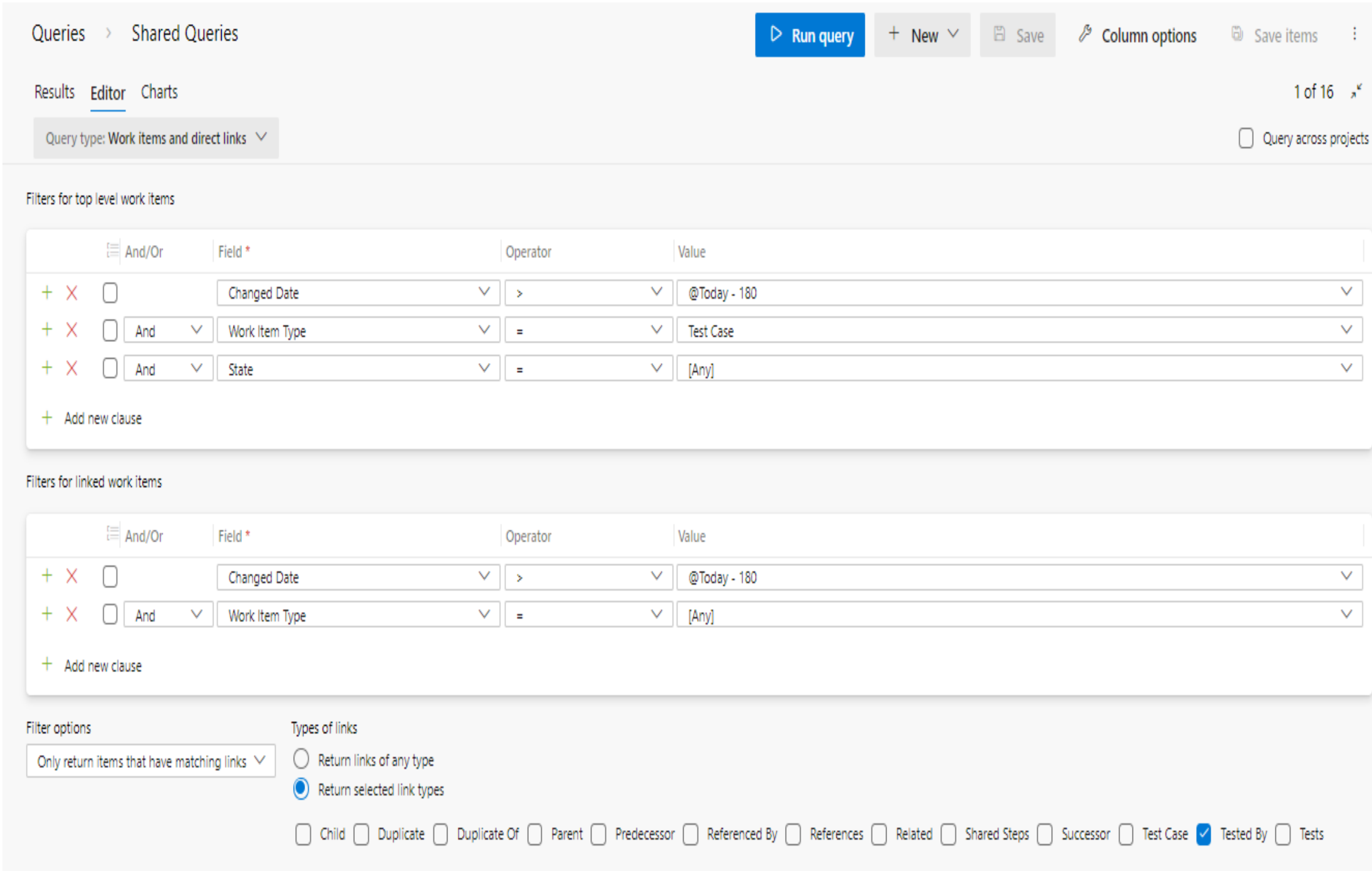
Explanation for Queries: These are all the BUGS that are in RESOLVED state and need to be Re-tested by the tester.

Running Tasks



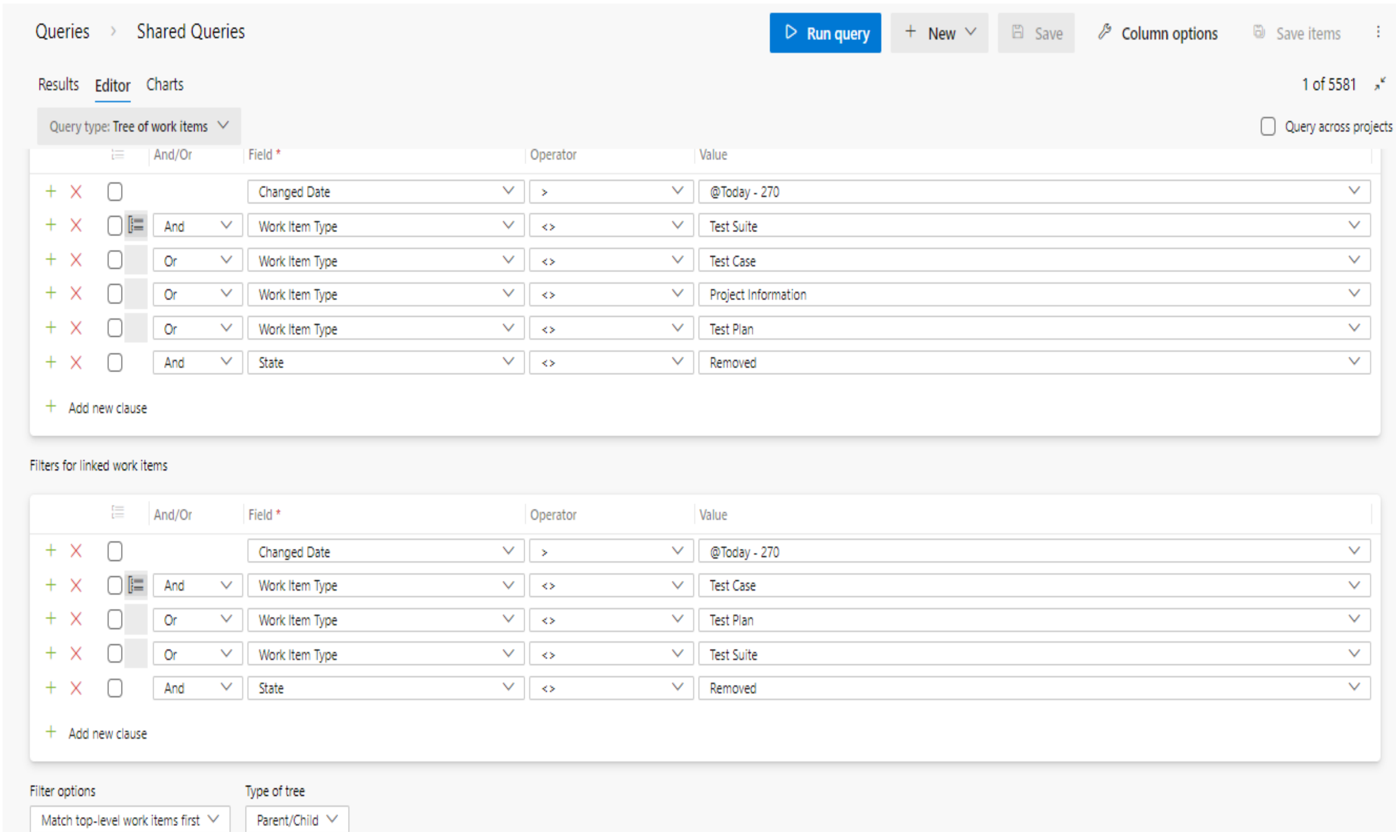
Explanation for Queries: These are all the tasks that are not in ‘Closed’ or ‘Removed’ State.

Test Case Wise Bugs



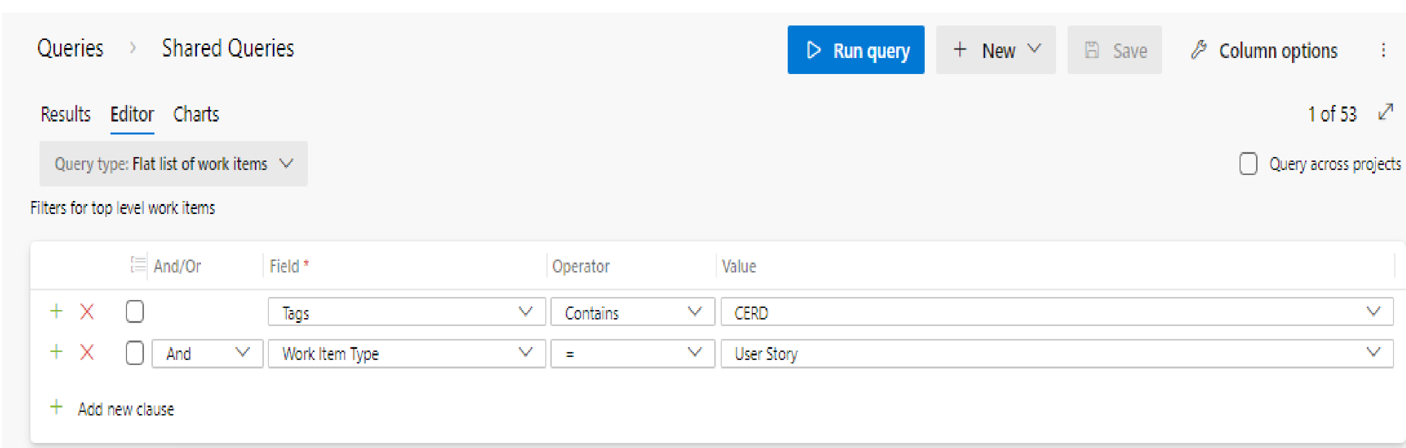
Explanation for Queries: These are all the bugs associated with all test cases. There are bugs in DevOps that do not have test cases linked with them.

<u>Tree View Work Items</u>



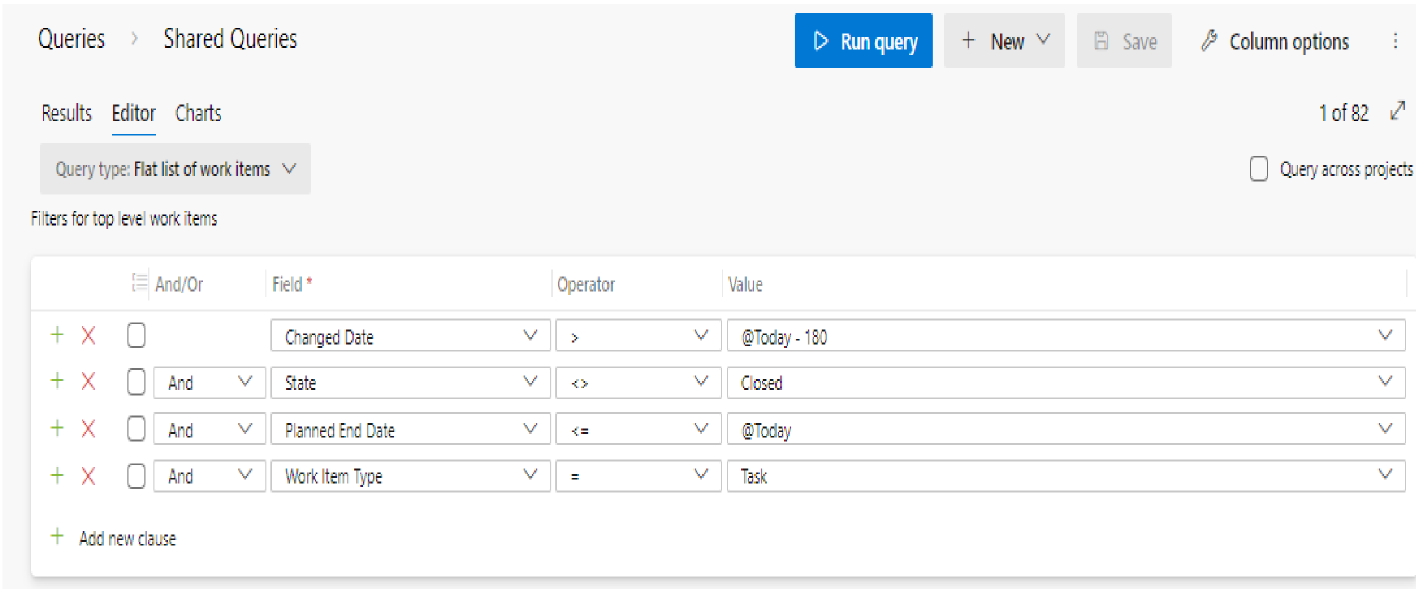
Explanation for Queries: Query is under Construction

All CERD Completion Status



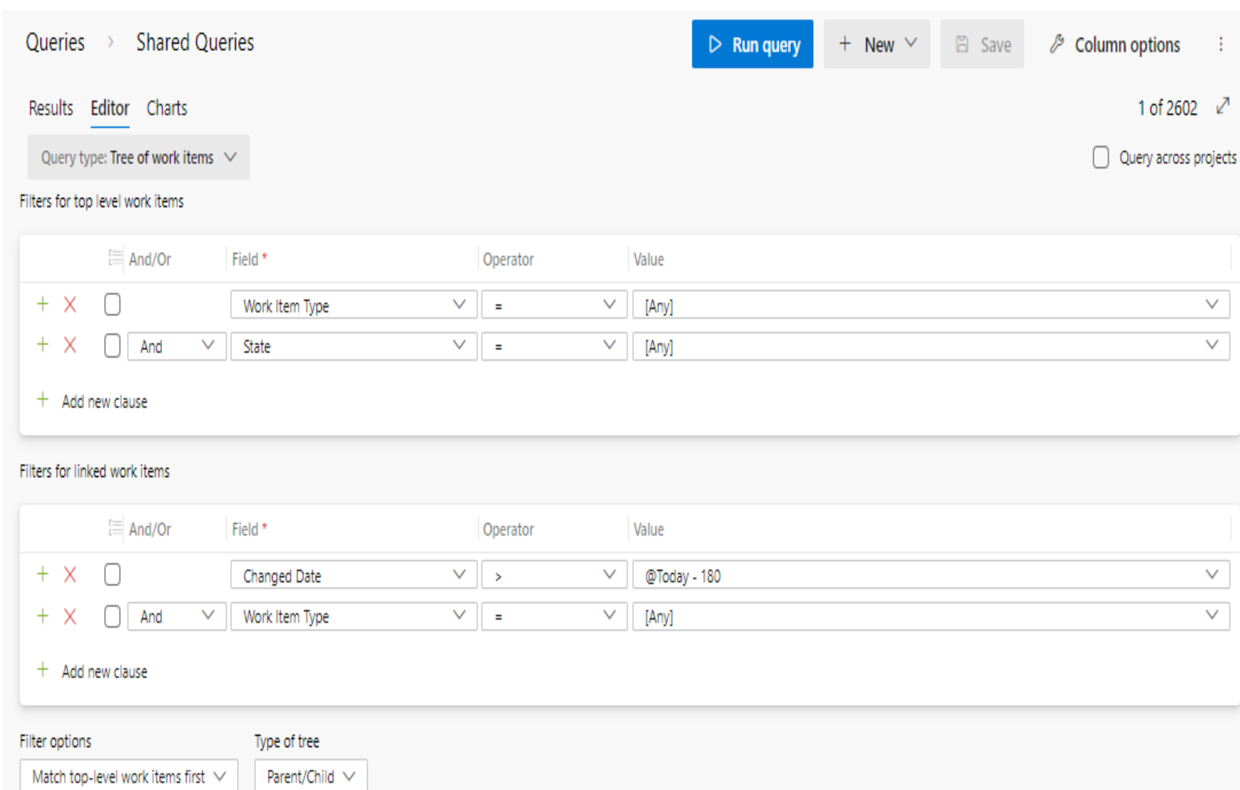
Explanation for Query: CERD represents A combination of BRD and SRS for **EBL's 53 Business Requirements**. CERD completion status query represents/shows the states of the user stories.

DAILY TASK LIST



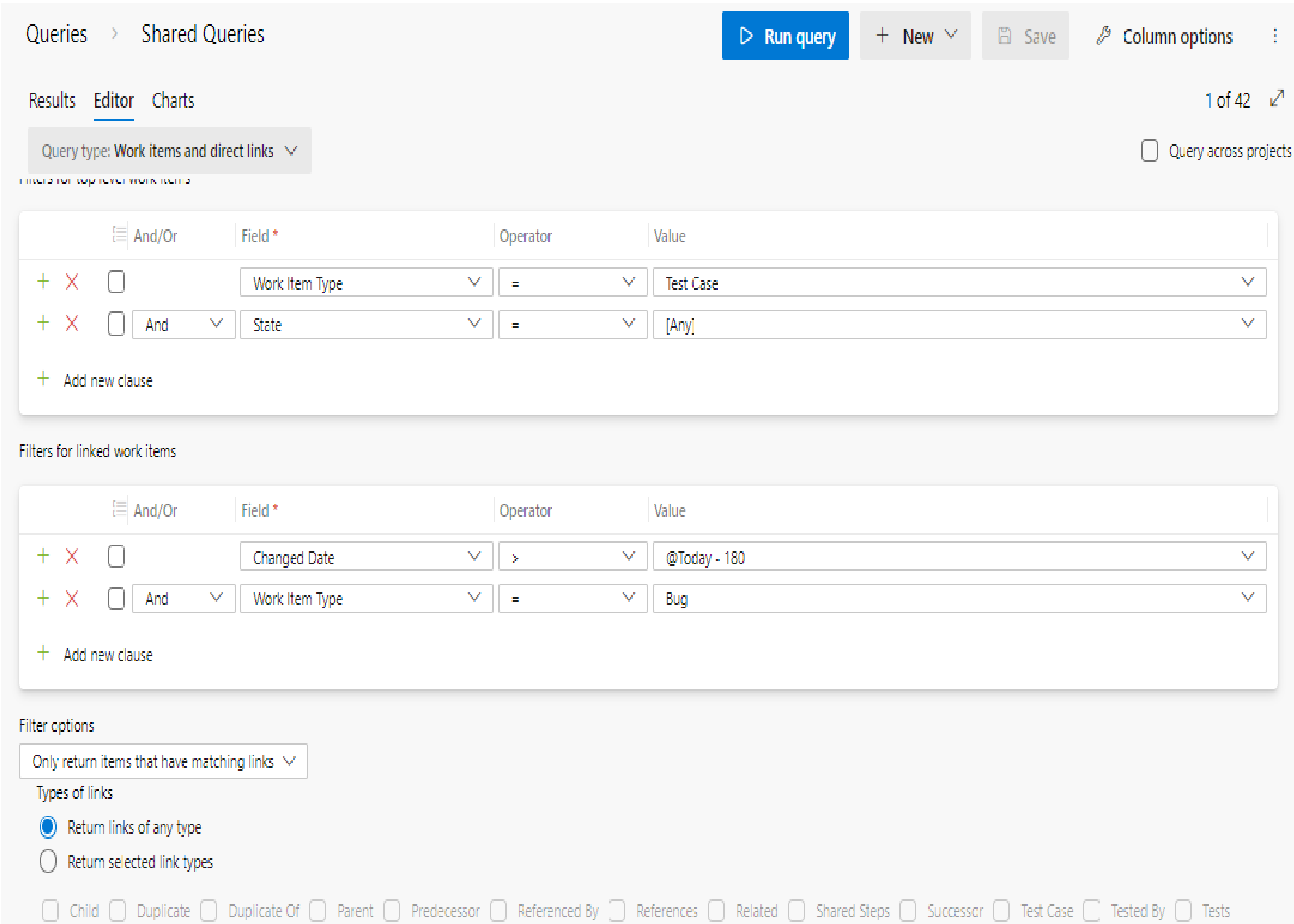
Explanation for Query: Daily Task list represents the tasks assigned to the developers until today, all tasks will be in other states except closed.

EBL LAMPS DETAILED REPORT



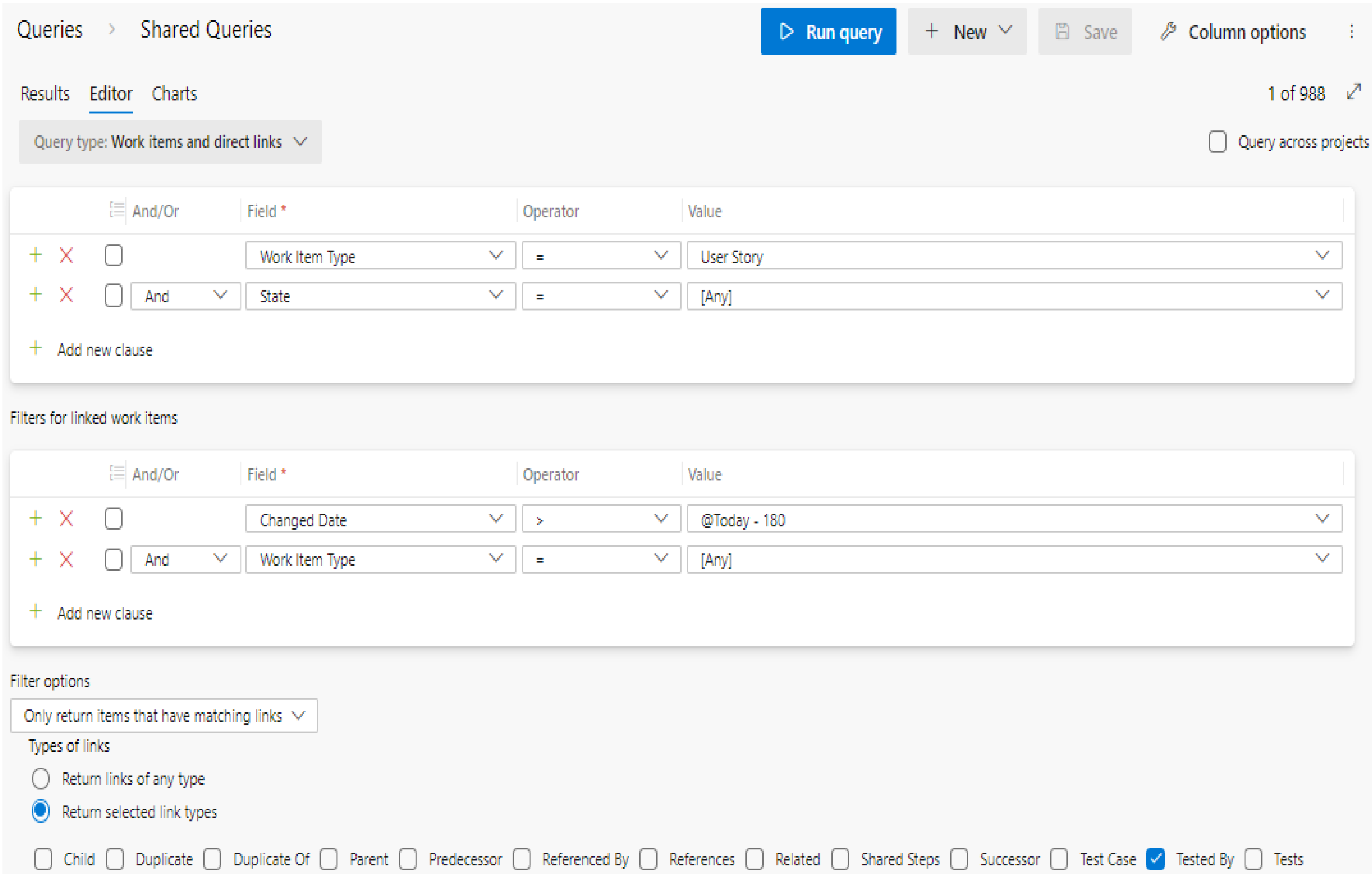
Explanation for Query: These are all the work items in every possible state.

LIST OF BUGS BY TEST CASES



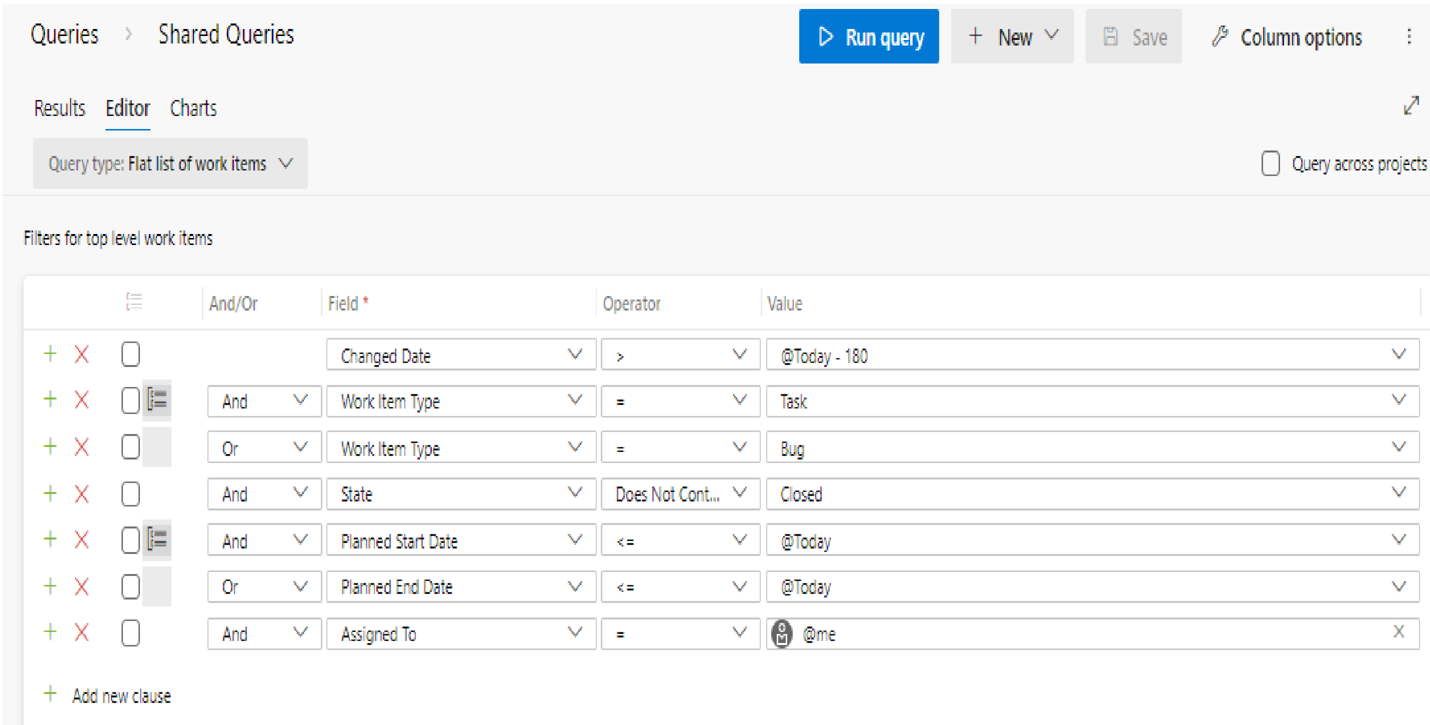
Explanation for Query: These results will show the list of bugs under each test case; the bugs can be in any state.

LIST OF TEST CASES BY USER STORIES



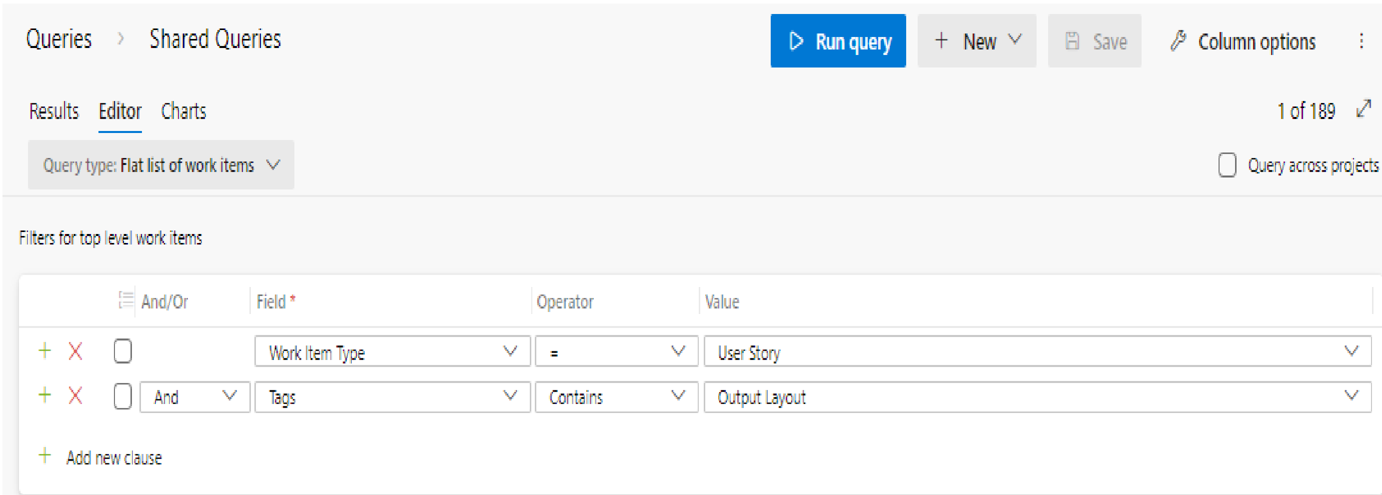
Explanation for Query: These results will show the list of Test Cases under each user story.

MY TASK LIST



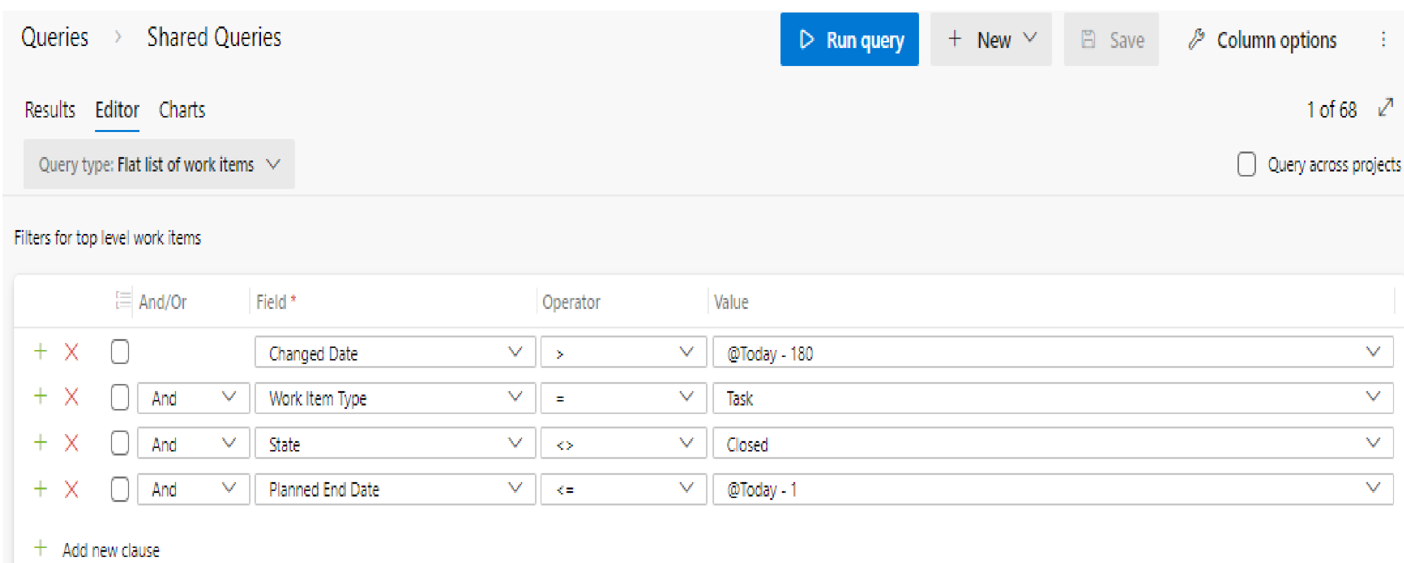
Explanation for Query: These results will show all the tasks assigned to the particular user up to date (Except closed tasks).

OUTPUT LAYOUT COMPLETION STATUS



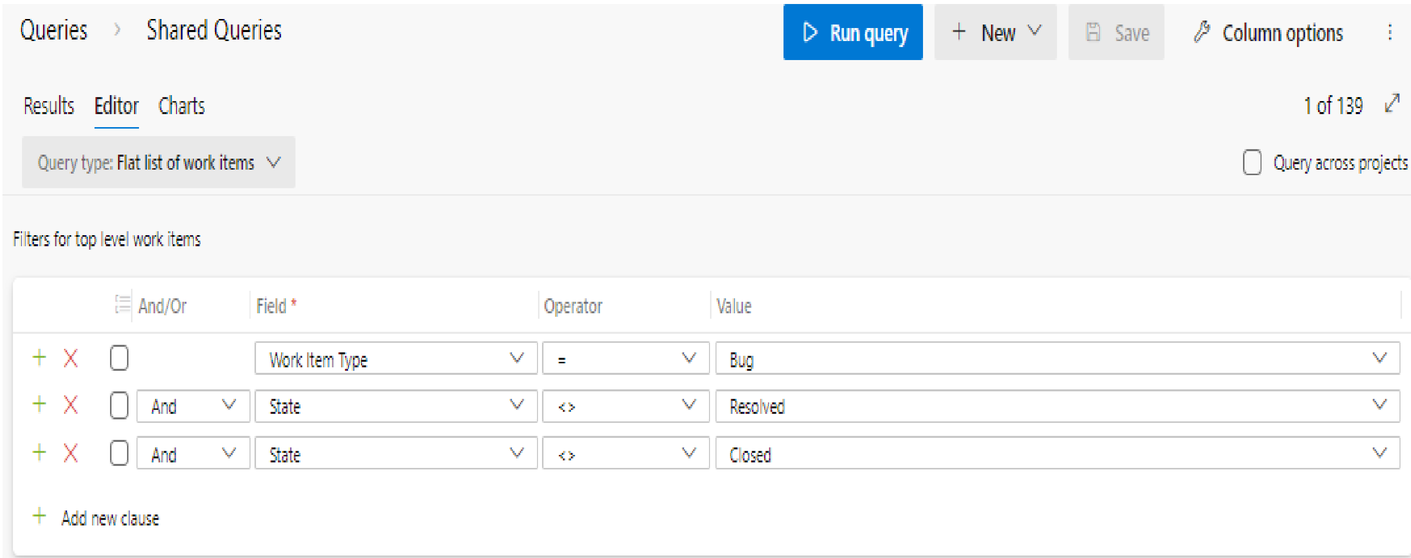
Explanation for Query: All the reports generated for EBL are tagged with output layout. This query will show all the user stories tagged with output layout.

OVERDUE TASKS LIST



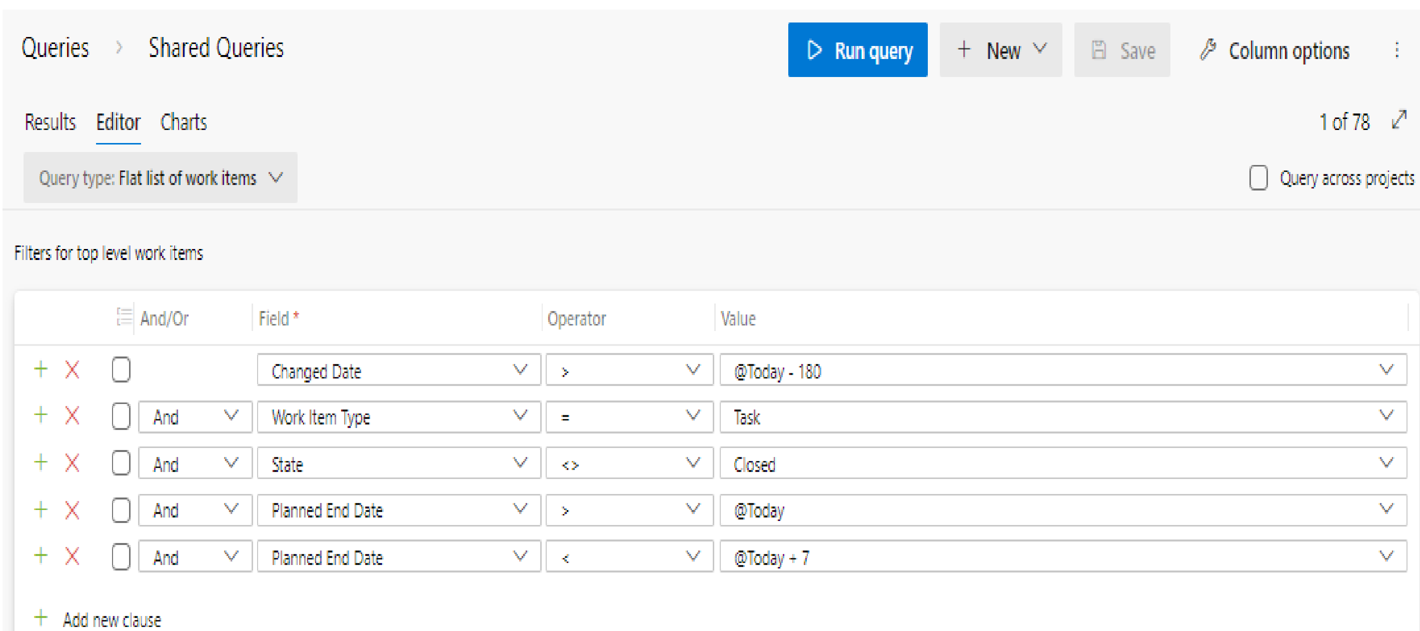
Explanation for Query: This query will show all the tasks that are overdue for completion today. All these tasks had an estimation of finishing earlier. These tasks are currently in any state other than closed.

PENDING BUGS LIST



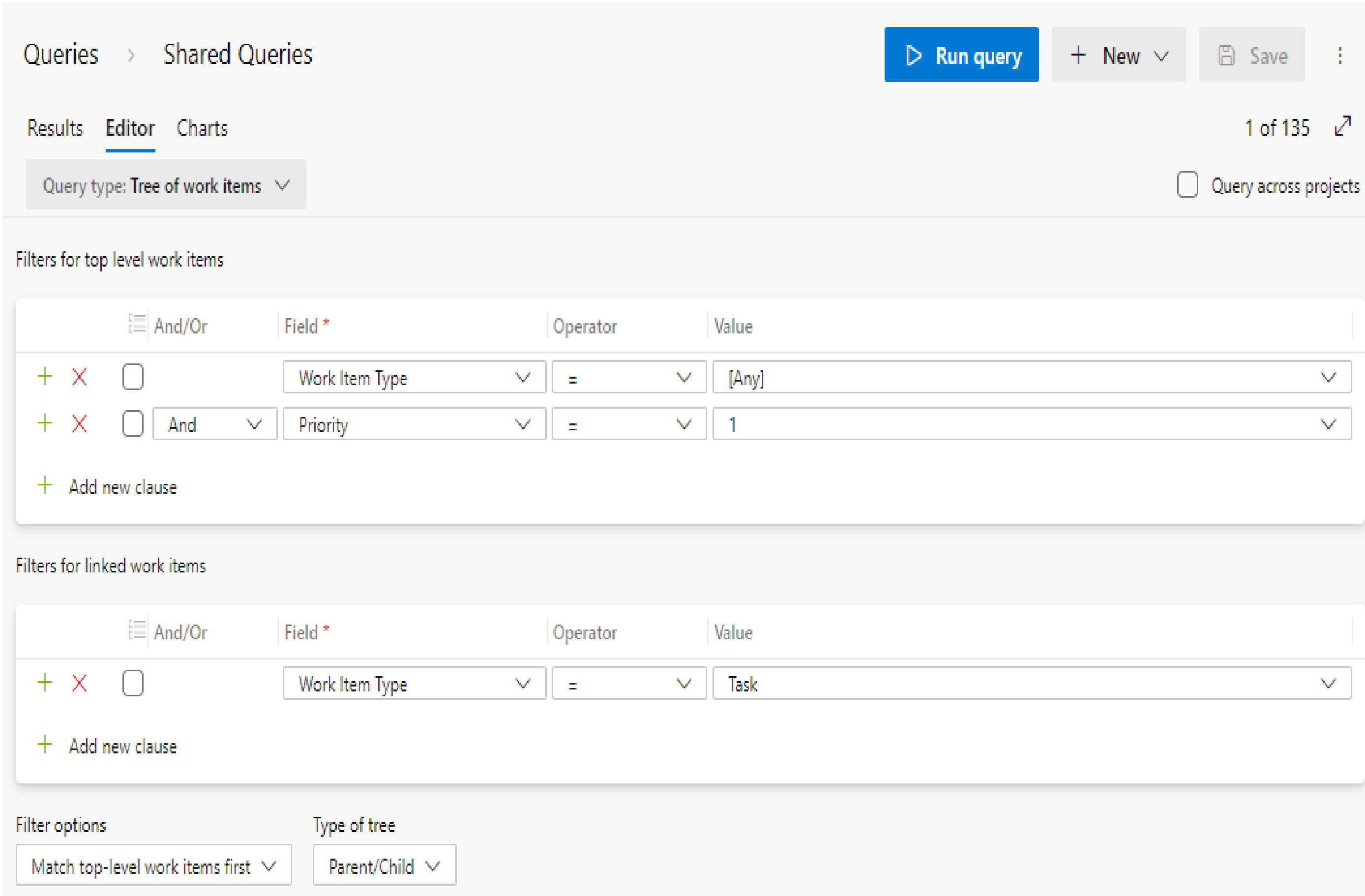
Explanation for Query: This Query will show all the bugs that are still existing and need to be fixed.

PENDING TASK FOR NEXT 7 DAYS



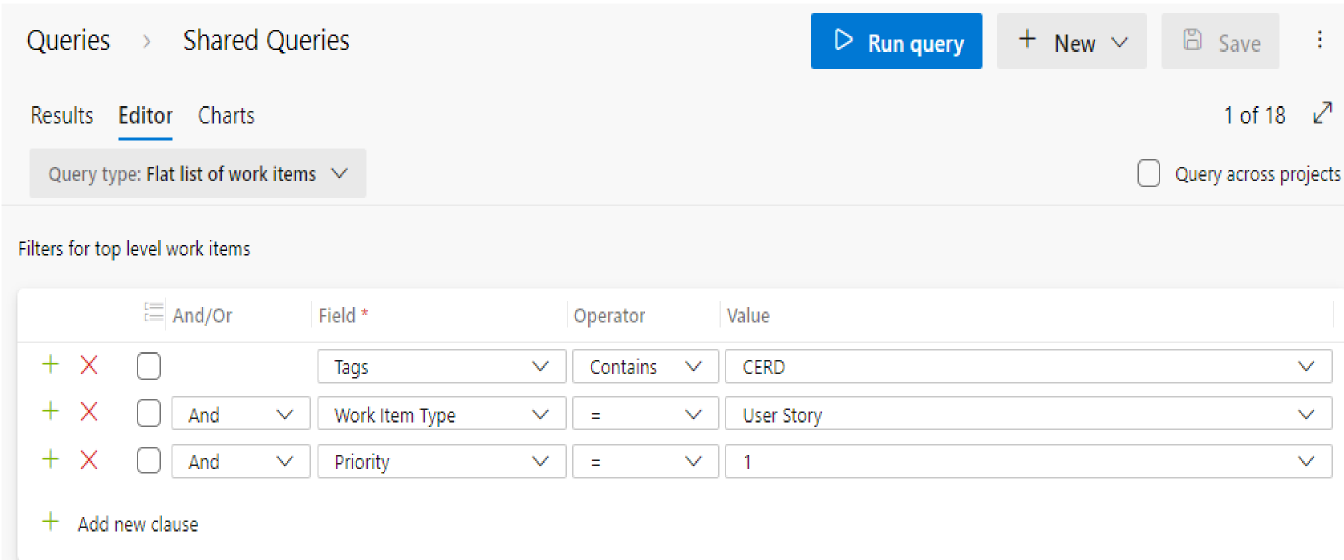
Explanation for Query: This Query will show all the bugs for the next 7 days that are still existing and need to be fixed.

PRIORITY TASKS UPDATE



Explanation for Query: This Query will show all the user stories that have the highest priority (With Priority score 1).

PRIORITY CERD COMPLETION STATUS

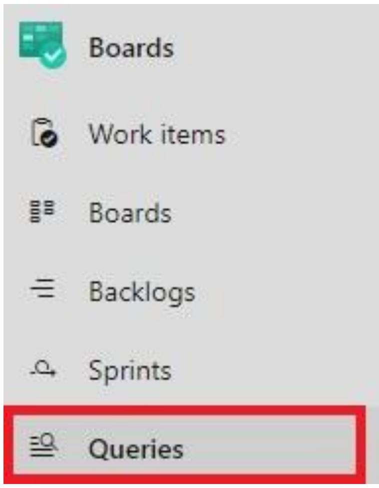


Explanation for Query: This Query will show all the user stories tagged with CERD that have the highest priority (With Priority score 1).

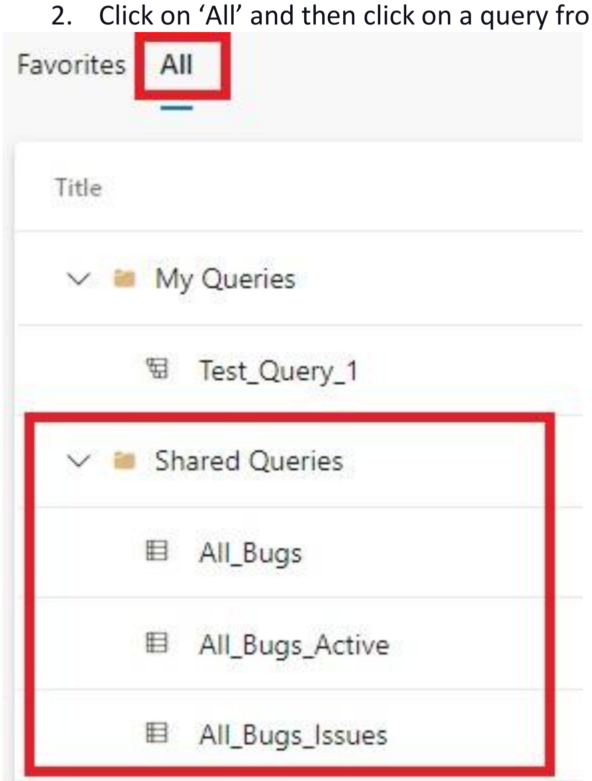
7.6 Charts

7.6.1 Create Charts

1. Go to ‘Queries’ from the ‘Boards’ menu.

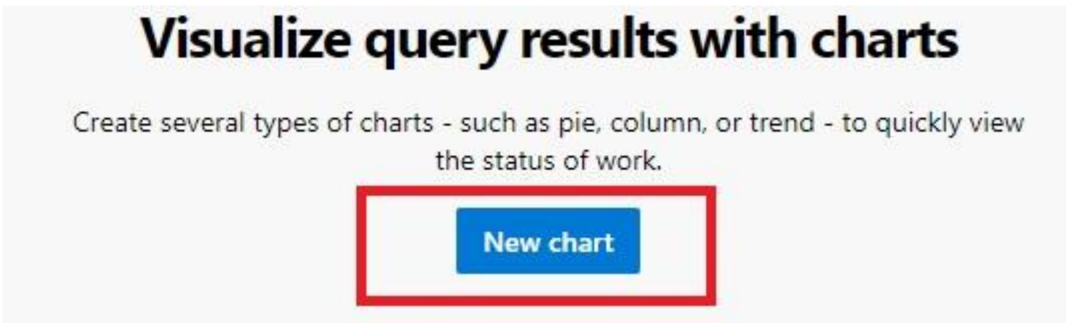


2. Click on ‘All’ and then click on a query from the ‘Shared Queries’ folder.

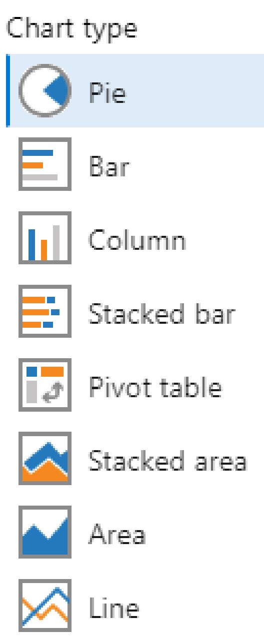


3. Go to the ‘Charts’ tab.

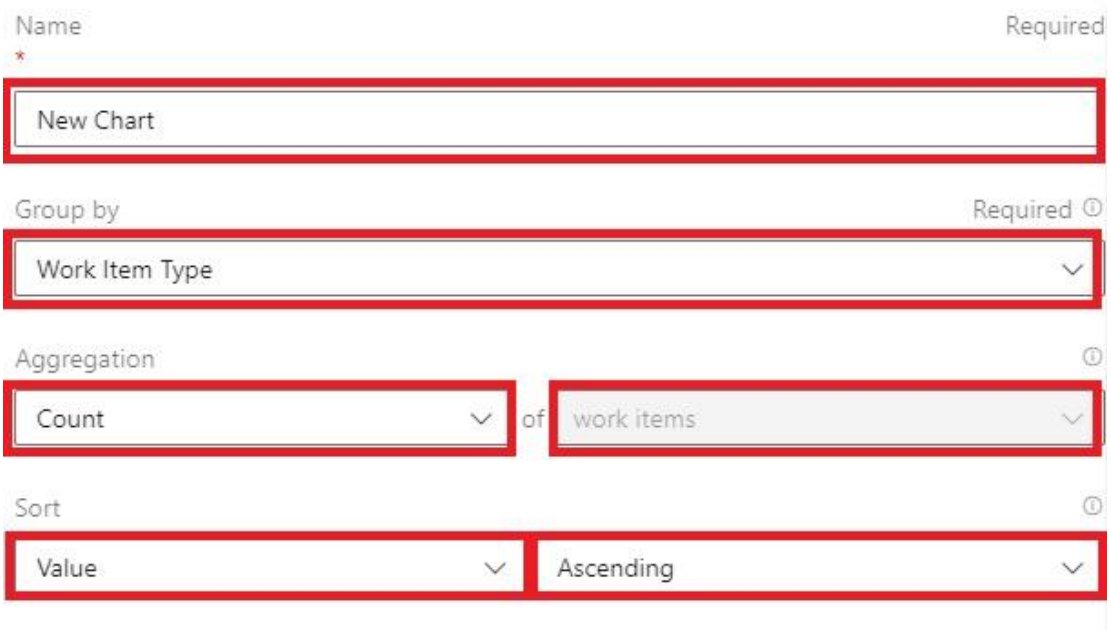
4. Click on ‘New Chart’.



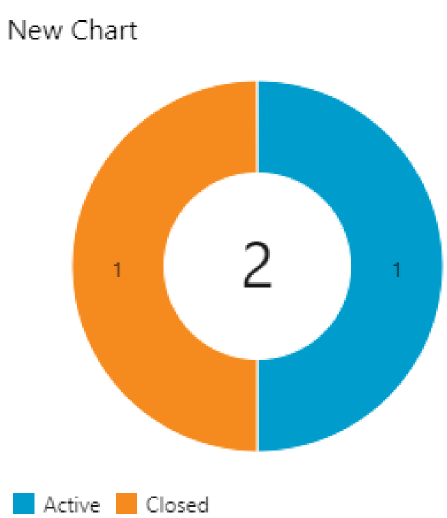
5. Select a chart type, i.e. pie, bar, column, line, etc.



6. Put in the appropriate details for the chart, i.e. title, aggregation type, sort order, etc.



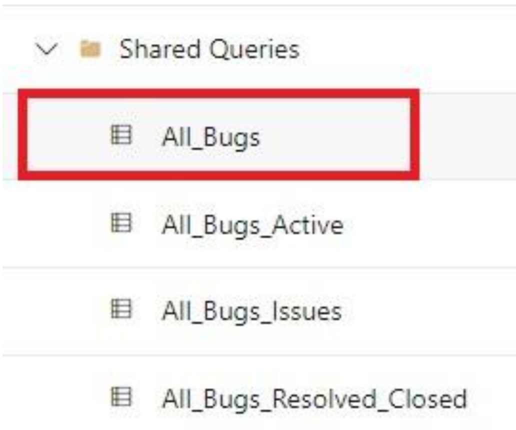
7. Review the chart preview at the bottom to make sure everything looks good.



8. Click ‘Save chart’ to finish.

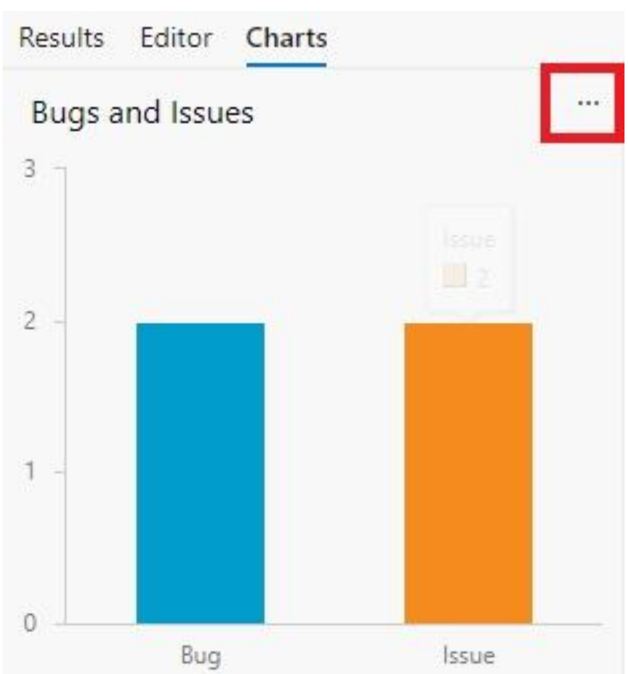
7.6.2 Edit Charts

1. Click on a query from the 'Shared Queries' folder.

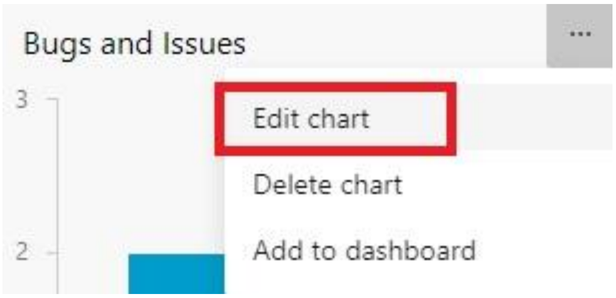


2. Go to the 'Charts' page.

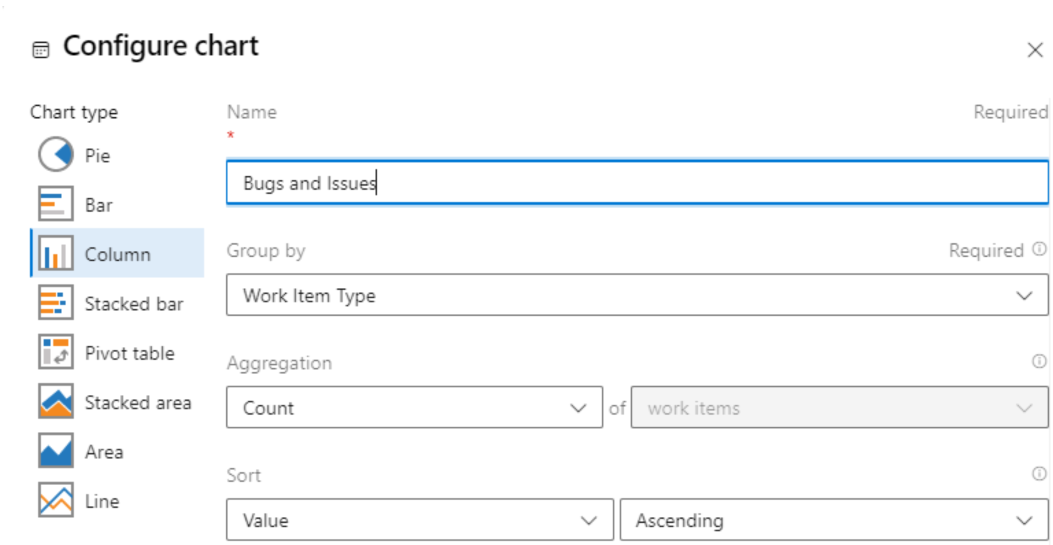
3. Click on the three dots on the top right-hand corner.



4. Select ‘Edit chart’.



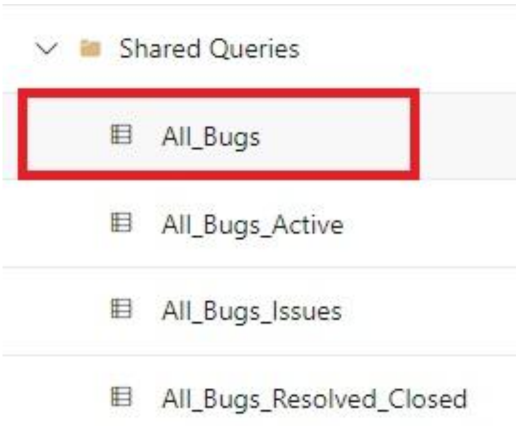
5. Modify the chart using the ‘Configure chart’ popup window.



6. Once the changes have been made, click on ‘Save chart’.

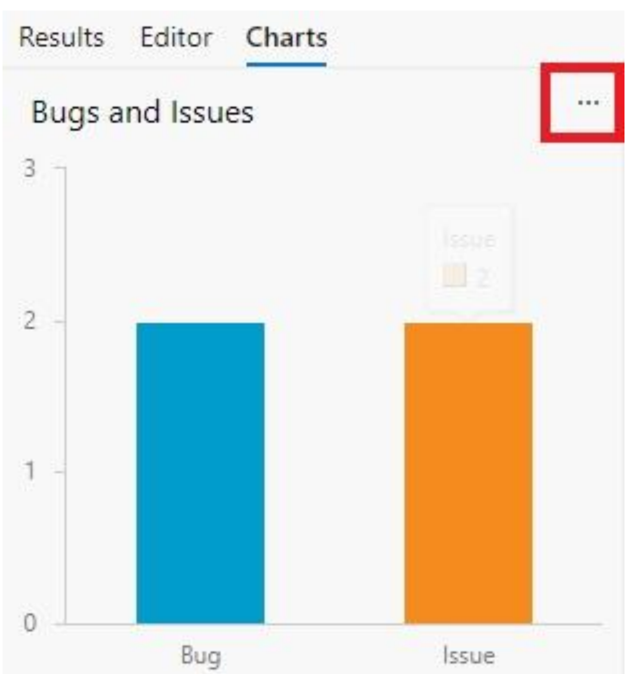
7.6.3 Delete Charts

1. Click on a query from the ‘Shared Queries’ folder.

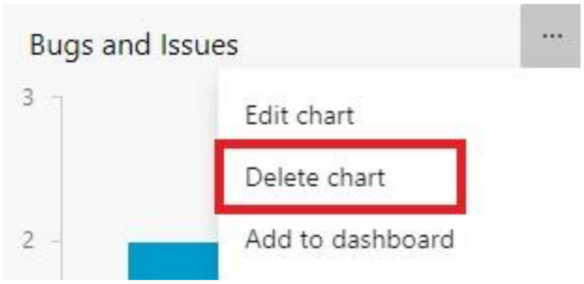


2. Go to the ‘Charts’ page.

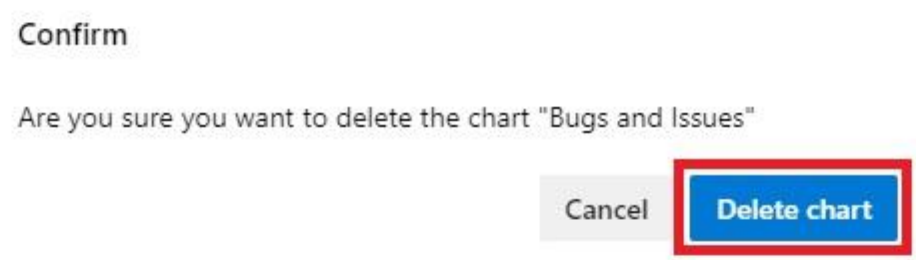
3. Click on the three dots on the top right-hand corner.



4. Select ‘Delete chart’.

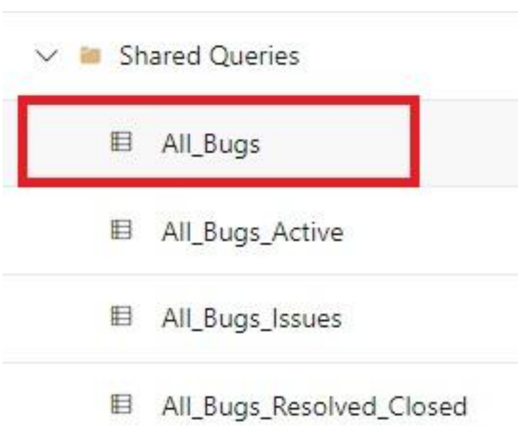


5. Select 'Delete chart' again.



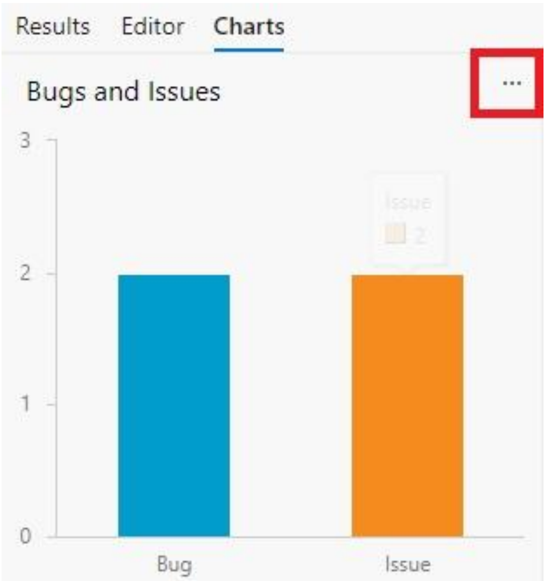
7.6.4 Export Charts to Dashboard

1. Click on a query from the 'Shared Queries' folder.

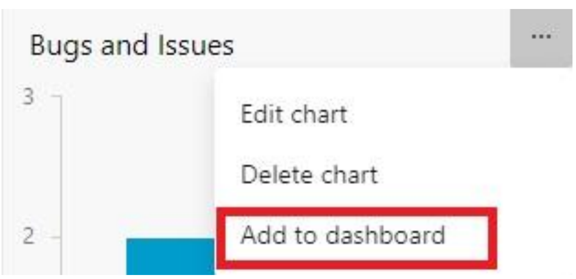


2. Go to the 'Charts' page.

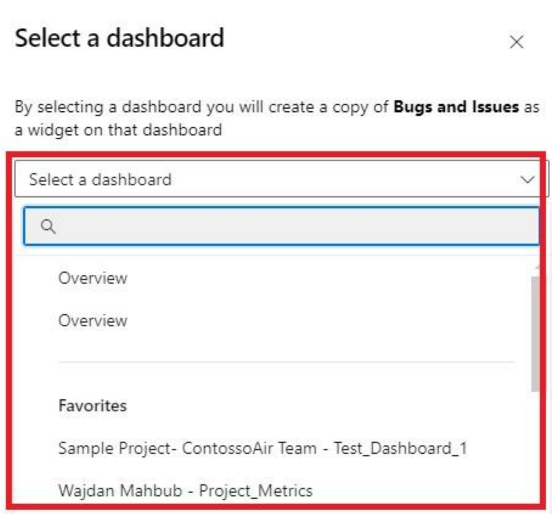
3. Click on the three dots on the top right-hand corner.



4. Select 'Add to dashboard'.



5. From the dropdown menu, select a dashboard to export the chart to.



6. Click 'Ok' to finish.

7.7 Chart Examples

7.7.1 Pie Chart

1. Click on ‘New Chart’.
2. Select ‘Pie’ from the Chart Type menu.
3. Put in an appropriate name for the chart.
4. Select a ‘Group by’ field from the dropdown menu.
5. Select an ‘Aggregation’ type, i.e. count or sum.
6. Provide a column reference for the aggregate function to act on.
7. Select ‘Value’ or ‘Label’ from the Sort menu.
8. Choose ‘Ascending’ or ‘Descending’ for the sort order.
9. Pick appropriate colors for the data in Series.
10. Review the chart preview at the bottom to make sure everything looks good.
11. Click ‘Save chart’ to finish.

7.7.2 Column Chart

1. Click on ‘New Chart’.
2. Select ‘Column’ from the Chart Type menu.
3. Put in an appropriate name for the chart.
4. Select a ‘Group by’ field from the dropdown menu.
5. Select an ‘Aggregation’ type, i.e. count or sum.
6. Provide a column reference for the aggregate function to act on.
7. Select ‘Value’ or ‘Label’ from the Sort dropdown menu.
8. Choose ‘Ascending’ or ‘Descending’ for the sort order.
9. Pick appropriate colors for the data in Series.
10. Review the chart preview at the bottom to make sure everything looks good.
11. Click ‘Save chart’ to finish.

7.7.3 Line Graph

1. Click on ‘New Chart’.
2. Select 'Line’ from the Chart Type menu.
3. Put in the appropriate name for the chart.
4. Select a ‘Group by’ field from the dropdown menu.
5. Select an ‘Aggregation’ type, i.e. count or sum.
6. Provide a column reference for the aggregate function to act on.
7. Provide an appropriate time horizon from the ‘Rolling period’ dropdown menu.
8. Select ‘Value’ or ‘Label’ from the Sort dropdown menu.
9. Choose ‘Ascending’ or ‘Descending’ for the sort order.
10. Pick appropriate colors for the data in Series.
11. Review the chart preview at the bottom to make sure everything looks good.
12. Click ‘Save chart’ to finish.

7.7.4 Pivot Table

1. Click on ‘New Chart’.
2. Select ‘Pivot table’ from the Chart Type menu.
3. Put in an appropriate name for the chart.
4. Select a row field from the ’Rows’ dropdown menu.
5. Select a column field from the ‘Columns’ dropdown menu.
6. Select an ‘Aggregation’ type, i.e. count or sum.
7. Provide a column reference for the aggregate function to act on.
8. Select ‘Value’ or ‘Label’ from the Sort dropdown menu.
9. Choose ‘Ascending’ or ‘Descending’ for the sort order.
10. Pick appropriate colors for the data in Series.
11. Review the chart preview at the bottom to make sure everything looks good.
12. Click ‘Save chart’ to finish.

8 Project Closure

1. The project manager and team leaders will make sure that all project related epics, features, user stories, tasks, issues and bugs are closed (state is closed) in Azure DevOps.
2. The project steering committee will hold a project review meeting to evaluate the final product using the agreement document and project status report, and produce a meeting minutes document.
3. The project manager will submit the meeting minutes to the project management office, who will decide if the project is complete or not.
4. If the project management office decides the project has been completed, they will email respective stakeholders to notify them.
    - If the project management office has decided that the project is not complete, they will prepare a list of action points for closure.
5. The project manager will work with the project team to collect and review relevant artifacts and deliverables.
6. The project manager will hand over all relevant deliverables and artifacts to the client.
7. All Project Closure documents must be saved to SharePoint in a folder called ‘Project Closure’.

9 Resources and Additional Reference for help in Azure DevOps

- "Azure DevOps Documentation." Microsoft Learn, October 1, 2024. https://learn.microsoft.com/en-us/azure/devops/?view=azure-devops.
- Azure DevOps - GETTING STARTED with managing PROJECT REQUIREMENTS - Tutorial for beginners
- Azure DevOps - EPICS vs FEATURES vs USER STORIES vs Tasks vs Bugs

10 Glossary

- Project Evaluation: A project evaluation is the process of checking a project's feasibility with relevant stakeholders.

- Project Sponsor: The project sponsor is a person or a group of people at the senior management level. They are responsible for the success of a project and provide necessary guidance and resources to the project team and manager.

- Relevant Stakeholders: Relevant stakeholders are the teams or individuals who will be working to create, test and deliver the product.

- Project Plan: The Project Plan is a blueprint of the goals, objectives, and tasks the project team needs to accomplish for the specific project. The project plan should include information about the project schedule, scope, due dates, and deliverables for all phases of the project lifecycle.

- Epics: Epics are modules or macro-level work items that can be further divided into features.

- Features: Features are higher-level functionalities that encompass multiple user stories.

- User Stories: A user story is the smallest unit of work in an agile framework

- Tasks: A task is a single unit of work broken down from a user story.