



Teejay Madlangbayan

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User Accounts

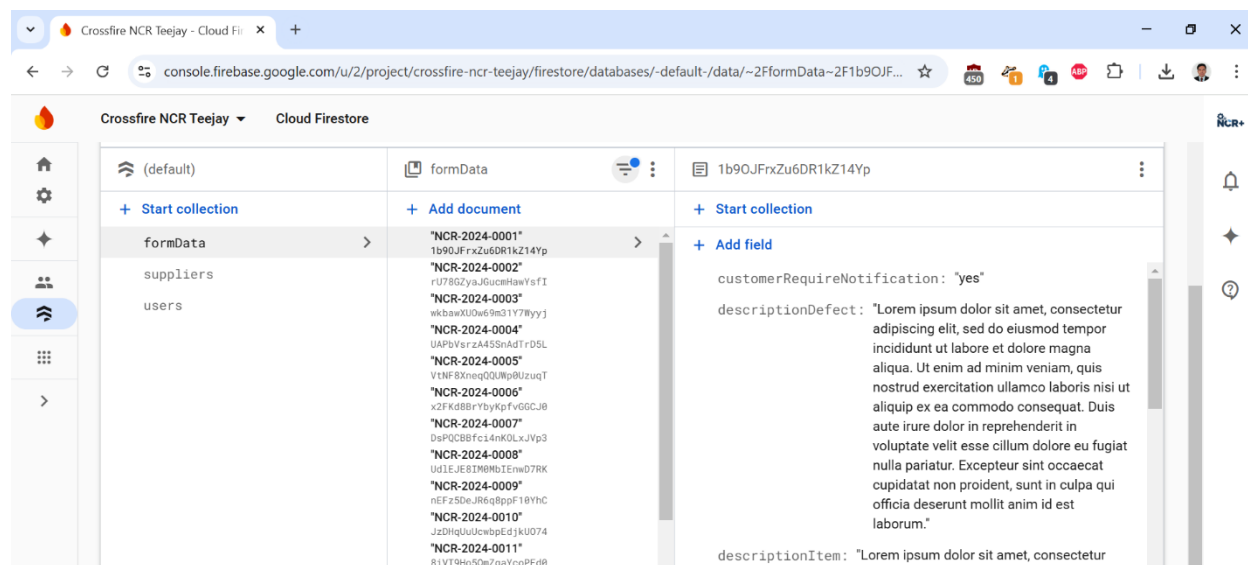
Login

[Reset password?](#)

Remarks	Username or Email	Password
Admin user for the NCR+ website. Email used by Admin to manage Firebase . 1. Log in to Gmail first, then go to https://firebase.google.com/ 2. Then, on the upper right, click Go to Console . 3. Crossfire NCR Teejay > Firestore Database	crossfire.ncr.teejay@gmail.com admin.teejay	q1w2e3R4
Q-Rep user for the NCR+ website.	crossfire.ncr.peterparker@gmail.com qrep.peterparker	q1w2e3R4
Engr user for the NCR+ website.	crossfire.ncr.brucewayne@gmail.com engr.brucewayne	q1w2e3R4

Firestore Database

Firestore is a scalable, cloud-hosted NoSQL database by Google, designed for real-time data synchronization and efficient querying. It supports hierarchical data storage, offline access, and seamless integration with Firebase and Google Cloud services.



Load Firebase JavaScript SDK libraries from the CDN (content delivery network).

```
<script type="module">
  // Import the functions you need from the SDKs you need
  import { initializeApp } from
  "https://www.gstatic.com/firebasejs/11.0.1/firebase-app.js";
  // TODO: Add SDKs for Firebase products that you want to use
  // https://firebase.google.com/docs/web/setup#available-libraries

  // Your web app's Firebase configuration
  const firebaseConfig = {
    apiKey: "AIzaSyB_e6IyAr8Yvc9A9X2dbkBsU-PKEu3xPuo",
    authDomain: "crossfire-ncr-teejay.firebaseio.com",
    projectId: "crossfire-ncr-teejay",
    storageBucket: "crossfire-ncr-teejay.firebaseio.com",
    messagingSenderId: "101348247074",
    appId: "1:101348247074:web:f2793869fba529612aac7b"
  };

  // Initialize Firebase
  const app = initializeApp(firebaseConfig);
</script>
```

NCR+ Status

1. Q-Rep Stage:

The initial stage of the process where a Quality Representative (Q-Rep) assesses a Non-Conformance Report (NCR). The NCR is being reviewed or created at this point.

2. Pending Engr Review:

After the Q-Rep stage, the NCR is waiting for review by the Engineering team.

3. Engr Stage:

This could involve assessing the defect or issue from an engineering perspective.

This stage represents active involvement from the engineering team, where they may be taking actions, designing solutions, or determining next steps for addressing the NCR.

4. Pending Purchasing Review:

This indicates that the NCR is awaiting a review from the Purchasing department.

5. Purchasing Stage:

Involves reviewing parts, procurement processes, or costs related to resolving the issue

This stage likely represents active involvement from the Purchasing department, where they are taking actions to resolve the issue by acquiring necessary resources, parts, or materials.

6. Closed:

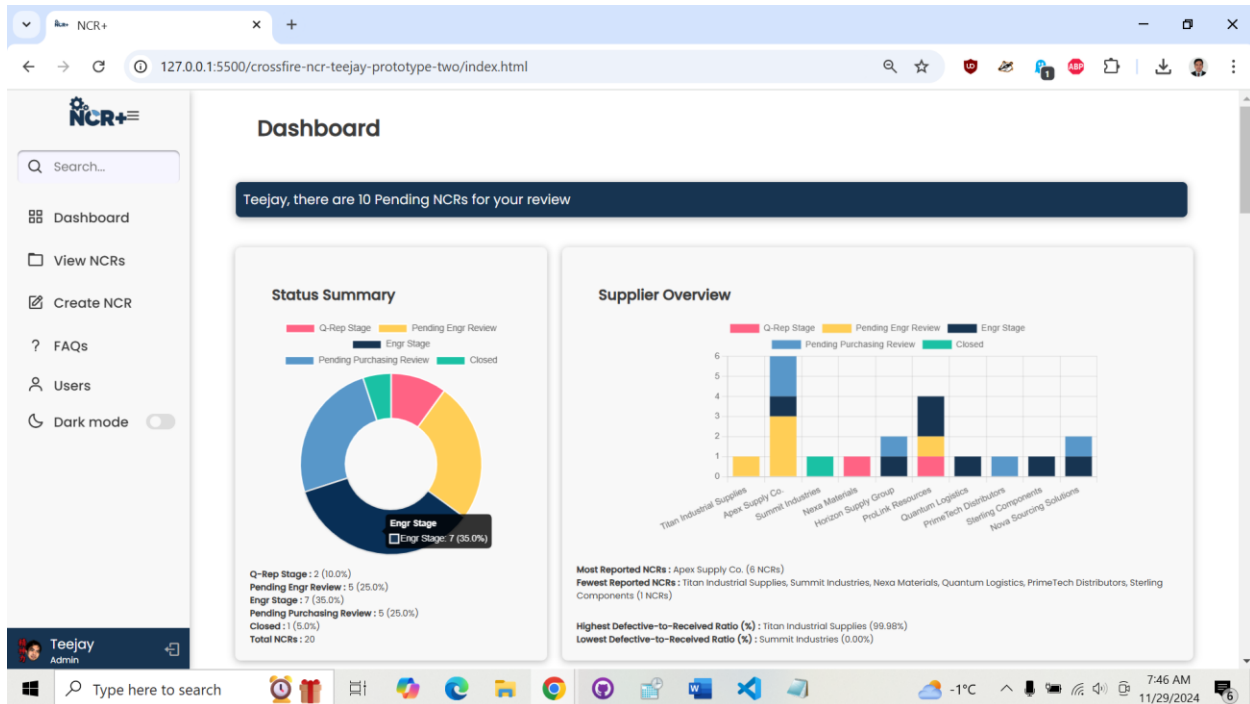
The process is completed, and the NCR has been resolved or closed.

Workflow Summary:

The NCR moves from the Q-Rep team to the Engineering team for review, then it passes to Purchasing for review and action. Once all departments have reviewed and completed their tasks, the NCR is closed.

Dashboard

In the dashboard, the widgets serve as interactive components to display visual summaries of Non-Conformance Reports (NCRs) in an intuitive and dynamic way.



1. Status Summary Pie Chart (left)

- **Purpose:** Visualizes the distribution of NCRs across their statuses.
- **Features:**
 - Displays NCR counts for statuses like "Q-Rep Stage," "Pending Engr Review," etc.
 - Provides tooltips showing percentages and absolute counts for each category.
 - Updates dynamically when data changes.
- **Insights:** Helps identify bottlenecks, such as stages with the highest NCR accumulation.

2. Supplier Overview Bar Chart (right)

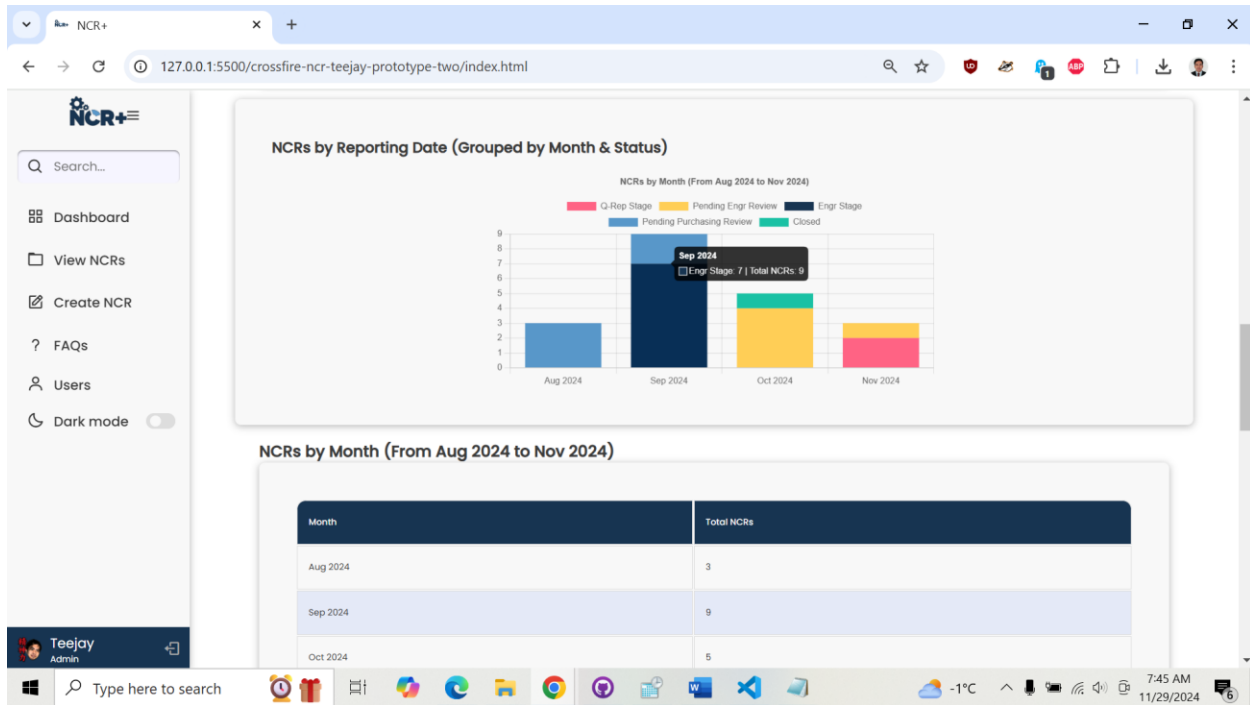
- **Purpose:** Analyzes NCR counts per supplier, broken down by status.
- **Features:**
 - Stacked bar chart for visualizing statuses per supplier.
 - Tooltips include defective-to-received ratios, percentages, and total NCRs.
 - Interactive sorting by key metrics like total NCRs or defect percentages.
- **Insights:** Highlights suppliers contributing most to defects or delays, enabling targeted action.

Supplier Table

Supplier Name ▲ ▼	Qty Received ▲ ▼	Qty Defective ▲ ▼	Defective-to-Received Ratio (%) ▲ ▼	Total NCRs ▲ ▼
Apex Supply Co.	4130	1881	45.54%	6
Horizon Supply Group	1700	496	29.18%	2
Nexo Materials	428	88	20.56%	1
Nova Sourcing Solutions	246	90	36.59%	2
PrimeTech Distributors	1000	1	0.10%	1
ProLink Resources	3268	774	23.68%	4
Quantum Logistics	10000	1374	13.74%	1
Sterling Components	1666	1000	60.02%	1
Summit Industries	1000000	1	0.00%	1
Titan Industrial Supplies	4488755	4488000	99.98%	1

3. Supplier Table

- **Purpose:** A detailed, sortable table showcasing supplier performance metrics.
- **Features:**
 - Displays metrics like Qty Received, Qty Defective, defect ratios, and Total NCRs.
 - Sorting functionality on any column (ascending/descending).
 - Summary sections for suppliers with the highest and lowest defect rates or NCR counts.
- **Insights:** Provides granular visibility into supplier trends and encourages data-driven discussions.

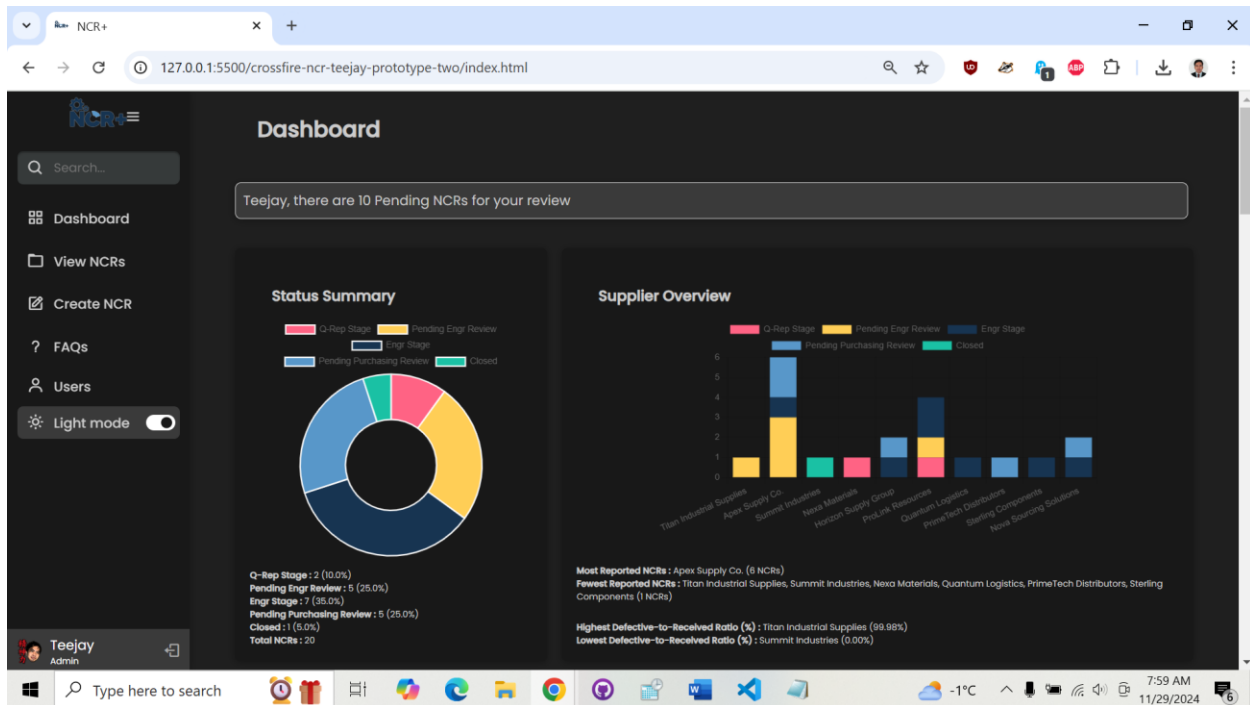


4. NCRs by Reporting Date (Grouped by Month & Status) Chart

- **Purpose:** Shows NCR trends over recent months.
- **Features:**
 - Focuses on the last six months to ensure relevance.
 - Provides totals per month and stage-wise breakdown.
 - Can generate a corresponding table (NCRs by Month Table) to summarize the data.
- **Insights:** Reveals cyclical patterns or recent spikes in NCRs, which can be cross-referenced with operational changes.

Light/Dark Mode

Includes a **Light/Dark Mode** feature, allowing users to switch between a light background with dark text and a dark background with light text for better visibility and comfort.



Quality Representative

Identify Process Applicable *

☒ Supplier or Rec-Insp ☐ WIP (Production Order)

NCR No.

Supplier Name *

PO or Prod. No. *

Description of Item (including SAP No.) *

Sales Order No. *

Item marked Nonconforming *

☒ Yes ☐ No

Quantity Received *

Quantity Defective *

Description of Defect: (in as much detail as possible, use page 2 if necessary) *

Upload Photos or Videos (optional)

Total files selected: 0

Search Bar in the Sidebar

Search by NCR Number, Supplier, or Status:

Enter an NCR number, supplier name, or status (like "Pending" or "Closed") to get results instantly.

Real-Time Suggestions:

Suggestions pop up as you type, showing matching NCRs.

The screenshot shows a web application interface for NCR+ (Non-Conformance Report). The sidebar on the left contains a search bar with the text "Apex" entered. Below the search bar are navigation links: "Dashboard", "View", "Create NCR", "FAQs", "Users", and a "Dark mode" toggle. The main content area is titled "Dashboard" and displays a notification: "Teejay, there are 10 Pending NCRs for your review". Below this notification is a table with 7 columns: "NCR No", "Supplier Name", "Qty Received", "Qty Defective", "Reporting Date", "Status", and "Actions". The table contains 6 rows of data, all for "Apex Supply Co.".

NCR No	Supplier Name	Qty Received	Qty Defective	Reporting Date	Status	Actions
NCR-2024-0020	Apex Supply Co.	1374	17	2024-11-26	Pending Engr Review	View Edit
NCR-2024-0017	Apex Supply Co.	300	3	2024-10-28	Pending Engr Review	View Edit
NCR-2024-0015	Apex Supply Co.	956	817	2024-10-10	Pending Engr Review	View Edit
NCR-2024-0009	Apex Supply Co.	500	500	2024-09-27	Engr Stage	View Edit
NCR-2024-0005	Apex Supply Co.	500	499	2024-09-11	Pending Purchasing Review	View Edit
NCR-2024-0001	Apex Supply Co.	500	45	2024-08-04	Pending Purchasing Review	View Edit

Filters and Sorting

The screenshot shows the 'View NCRs' page in the NCR+ application. The interface includes a sidebar with navigation options and a main content area with filters and a table of NCRs.

Filters:

- Filter by Supplier:** Apex Supply Co.
- Filter by Status:** Pending Engr Review
- From:** 10/01/2024
- To:** 11/29/2024
- Search NCR:** Search...
- Clear Filters** button

NCR Table:

NCR No	Supplier Name	Qty Received	Qty Defective	Reporting Date	Status	Actions
NCR-2024-0020	Apex Supply Co.	1374	17	2024-11-26	Pending Engr Review	View Edit
NCR-2024-0017	Apex Supply Co.	300	3	2024-10-28	Pending Engr Review	View Edit
NCR-2024-0015	Apex Supply Co.	956	817	2024-10-10	Pending Engr Review	View Edit

Filters:

1. Supplier Filter:

- Allows the user to filter NCRs based on the supplier name. The options are populated dynamically from the available suppliers in the dataset.
- If a supplier is selected, only NCRs from that supplier are shown.

2. Status Filter:

- Filters NCRs based on their current status (e.g., "Q-Rep Stage", "Pending Engr Review").
- The available status options are populated from the dataset, and the table will only show NCRs with the selected status.

3. Start Date Filter:

- Filters NCRs based on their Reporting Date. Only NCRs with a reporting date on or after the selected start date will be shown.

4. End Date Filter:

- Filters NCRs based on their Reporting Date. Only NCRs with a reporting date on or before the selected end date will be shown.

5. Search Filter:

- Allows the user to search for specific NCRs by searching across multiple fields, including the NCR number, supplier name, and status. This search is case-insensitive and highlights NCRs that match the search term.

Sorting:**1. Supplier Name Sorting:**

- Sorts the NCRs by the supplier's name, either in ascending or descending order.

2. Quantity Received Sorting:

- Sorts NCRs by the quantity received, either in ascending or descending order.

3. Quantity Defective Sorting:

- Sorts NCRs by the quantity defective, either in ascending or descending order.

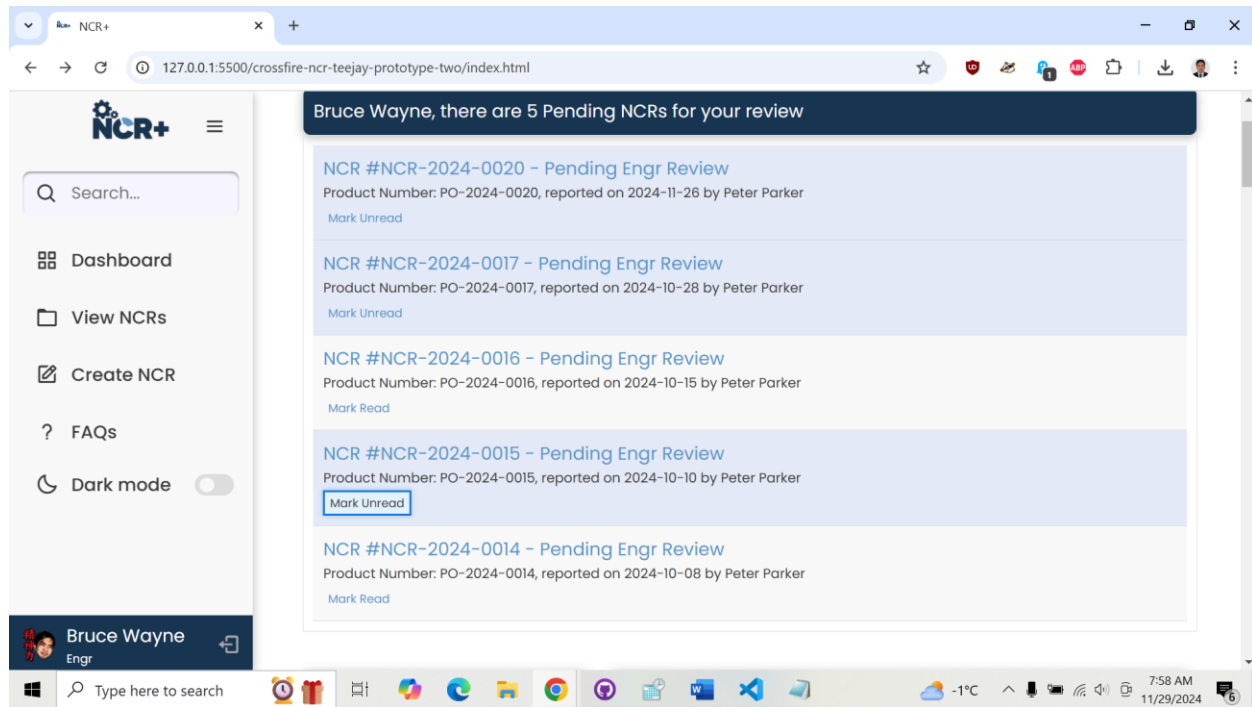
4. Quality Rep Reporting Date Sorting:

- Sorts NCRs by the reporting date, either in ascending or descending order.

5. Status Sorting:

- Sorts NCRs by their status, either in ascending or descending order.

NCR notification system



The **NCR notification system** has been enhanced with role-specific and user-friendly features:

- **Collapsible notification bar** displays counts and lists of NCRs by status.
- **Role-based notifications** show relevant statuses based on the user's role (e.g., Engineers/Admin see "Pending Engr Review," Admin sees "Pending Purchasing Review").
- **Sorting** NCRs by ncrNo and qualityRepReportingDate in descending order ensures the most recent items are at the top.
- **Clickable NCR numbers** open the edit form directly.
- **Read/Unread functionality** allows users to toggle notifications, with states saved in localStorage for persistence across sessions.

View NCR with Print PDF

NCR+

Search...

Dashboard

View NCRs

Create NCR

FAQs

Dark mode

Bruce Wayne
Engr

Quality Representative

Identify Process Applicable *
WIP (Production Order)

Supplier Name *
Apex Supply Co.

Description of Item (including SAP No.) *
Lorem ipsum dolor sit amet, consectetur adipiscing elit, sed do eiusmod tempor incididunt ut labore et dolore magna aliqua. Ut enim ad minim veniam, quis nostrud exercitation ullamco laboris nisi ut aliquip ex ea commodo consequat.

Item marked Nonconforming *
yes

NCR No.
NCR-2024-0020

PO or Prod. No. *
PO-2024-0020

Sales Order No. *
SO-2024-0020

Quantity Received *
1374

Quantity Defective *
17

Description of Defect: (in as much detail as possible, use page 2 if necessary) *
Lorem ipsum dolor sit amet, consectetur adipiscing elit, sed do eiusmod tempor incididunt ut labore et dolore magna aliqua. Ut enim ad minim veniam, quis nostrud exercitation ullamco laboris nisi ut aliquip ex ea commodo consequat. Duis aute irure dolor in reprehenderit in voluptate velit esse cillum dolore eu fugiat nulla pariatur.

NCR+

Search...

Dashboard

View NCRs

Create NCR

FAQs

Dark mode

Bruce Wayne
Engr

yes

Engineer Reporting

Engineer Name *
Bruce Wayne

Edit NCR

Print PDF

Exit

Recent download history

crossfire_ncr (1).pdf
10.4 MB • Done

crossfire_ncr.pdf
10.4 MB • Done

127.0.0.1_5500_crossfire-ncr-teejay-prototype-two_index.html.png
1,602 KB • 1 hour ago

Crossfire
NCR_2024-11-29_11-39-56.png
508 KB • 1 hour ago

Crossfire
NCR_2024-11-29_11-30-45.png
3.2 MB • 1 hour ago

Crossfire
NCR_2024-11-29_11-29-44.pdf
61.1 KB • 1 hour ago

crossfire.ncr.undefined.pdf
16.7 MB • 13 hours ago

crossfire_ncr.pdf
16.7 MB • 13 hours ago

Full download history

Flying Menu

The screenshot displays the NCR+ web application interface. On the left is a sidebar with navigation links: Dashboard, View NCRs, Create NCR, FAQs, Users, and Dark mode. The main content area is titled "Engineering" and contains several form fields:

- Review by CF Engineering: *** (indicate disposition by "checking" one of the following)
 - ☐ Use As Is
 - ☐ Repair
 - ☐ Rework
 - ☐ Scrap
- Disposition: *** (Sequence of work steps required when "repair" or "rework" indicated)
 - e.g., Replace faulty parts, retest, etc.
- Does the drawing require updating (optional)**
 - ☐ Yes
 - ☐ No
- Does Customer require notification (optional)** (If "Yes" then raise message to customer about the issues)
 - ☐ Yes
 - ☐ No
- Original Rev. Number:**
 - e.g., A, B, 1.0
- Updated Rev. Number:**
 - e.g., B, 1.1
- Revision Date:**
 - mm/dd/yyyy
- Close NCR:** ☐

A "Flying Menu" is visible on the right side of the form, triggered by a three-dot menu icon. It contains the following options:

- Back to Top
- Quality Rep
- Engineering** (highlighted)
- Action Buttons

The bottom of the screen shows a Windows taskbar with various application icons and system information: -1°C, 7:49 AM, 11/29/2024.

The NCR forms have a **Flying Menu** that stays visible as users scroll. This menu makes it easy to quickly access important actions like **viewing, editing, or submitting** the NCR form without having to scroll back up. It helps users navigate the form more efficiently, keeping key tools always within reach.

Validations

The screenshot shows the 'Quality Representative' form in the NCR+ application. The form is divided into two main sections. The left section contains fields for 'Identify Process Applicable' (radio buttons for 'Supplier or Rec-Insp' and 'WIP (Production Order)'), 'Supplier Name' (a dropdown menu), 'Description of Item (including SAP No.)' (a text area with an example), and 'Item marked Nonconforming' (radio buttons for 'Yes' and 'No'). The right section contains fields for 'NCR No.' (auto-generated), 'PO or Prod. No.' (a text field with '123'), 'Sales Order No.' (a text field with '456'), 'Quantity Received' (a text field with '500'), and 'Quantity Defective' (a text field with '45'). Each field has a validation message. The bottom of the form has a 'Description of Defect' field. The application is running on a browser with the URL '127.0.0.1:5500/crossfire-ncr-teejay-prototype-two/index.html#engineeringSection'. The user is logged in as 'Teejay Admin'.

Here are the key **Validations** for the NCR forms:

- **Quantity Defective and Quantity Received** fields must:
 - Not be empty.
 - Contain valid positive numbers.
 - Ensure **Quantity Defective** is less than or equal to **Quantity Received**.
 - Be greater than zero.
- If any validation fails:
 - An error message is shown for the respective field.
 - The field is highlighted for correction.

Accepted prodNo Formats:

PO-2024-0123
 po-2024-0123
 PO20240123
 po20240123
 20240123

Accepted salesOrderNo Formats:

SO-2024-0123
 so-2024-0123
 SO20240123
 so20240123
 20240123

Save NCR

The screenshot displays the NCR+ web application interface. The browser's address bar shows the URL: 127.0.0.1:5500/crossfire-ncr-teejay-prototype-two/index.html#engineeringSection. The application has a sidebar on the left with the NCR+ logo, a search bar, and navigation links for Dashboard, View NCRs, Create NCR, FAQs, and Dark mode (which is currently disabled). The main content area is titled 'Engineer Reporting' and contains a form with two fields: 'Engineer Name' (filled with 'Bruce Wayne') and 'Reporting Date' (filled with '11/29/2024'). Below the form is an 'Import Excel' section with a 'Choose File' button and the text 'No file chosen'. At the bottom of the form are three buttons: 'Submit NCR', 'Save NCR' (which is highlighted with a blue border), and 'Clear'. The bottom of the screen shows a Windows taskbar with various application icons, a search bar, and system information including the temperature (-1°C), time (7:50 AM), and date (11/29/2024).

The **Save NCR function** allows users to save their current progress on the form without submitting it. This feature is useful for cases where the user needs to save incomplete data and continue working on it later.

Role-Based Edit Permissions

NCR No	Supplier Name	Qty Received	Qty Defective	Reporting Date	Status	Actions
NCR-2024-0020	Apex Supply Co.	1374	17	2024-11-26	Pending Engr Review	View
NCR-2024-0019	Nexa Materials	428	88	2024-11-26	Q-Rep Stage	View Edit
NCR-2024-0018	ProLink Resources	700	666	2024-11-26	Q-Rep Stage	View Edit
NCR-2024-0017	Apex Supply Co.	300	3	2024-10-28	Pending Engr Review	View
NCR-2024-0016	ProLink Resources	1234	4	2024-10-15	Pending Engr Review	View
NCR-2024-0015	Apex Supply Co.	956	817	2024-10-10	Pending Engr Review	View

Q-Rep's NCR Table

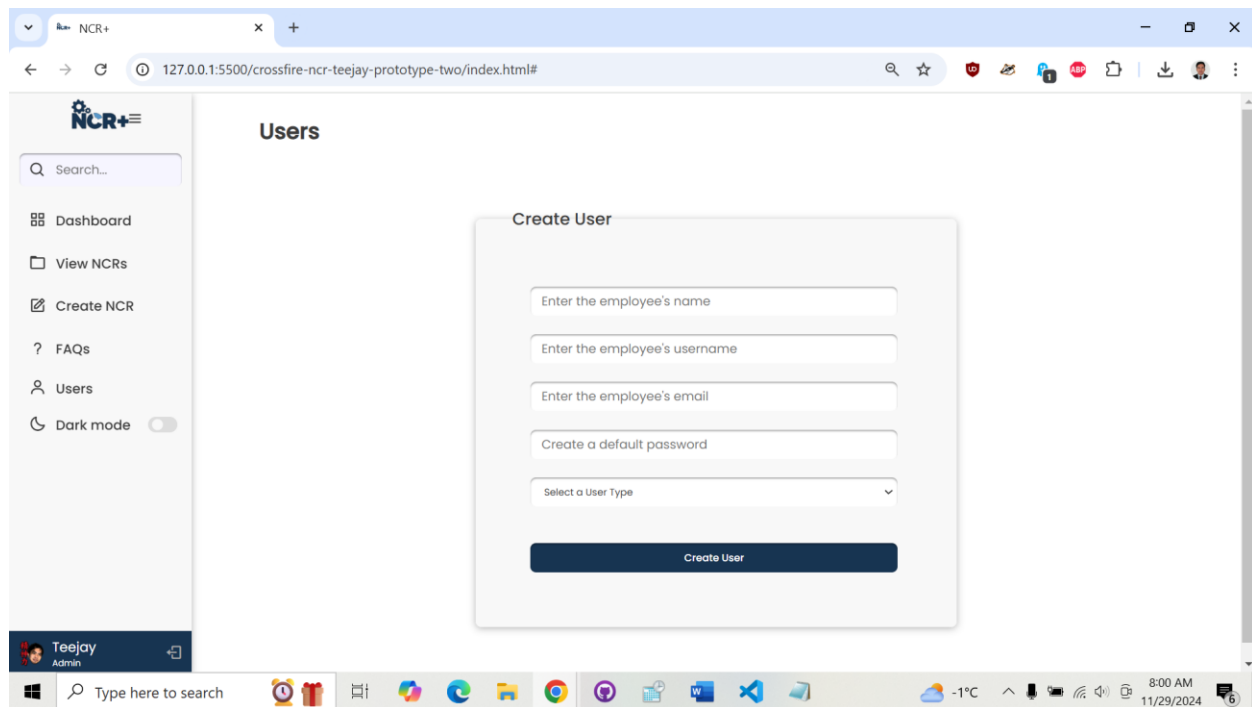
NCR No	Supplier Name	Qty Received	Qty Defective	Reporting Date	Status	Actions
NCR-2024-0020	Apex Supply Co.	1374	17	2024-11-26	Pending Engr Review	View Edit
NCR-2024-0019	Nexa Materials	428	88	2024-11-26	Q-Rep Stage	View
NCR-2024-0018	ProLink Resources	700	666	2024-11-26	Q-Rep Stage	View
NCR-2024-0017	Apex Supply Co.	300	3	2024-10-28	Pending Engr Review	View Edit
NCR-2024-0016	ProLink Resources	1234	4	2024-10-15	Pending Engr Review	View Edit
NCR-2024-0015	Apex Supply Co.	956	817	2024-10-10	Pending Engr Review	View Edit

Engr's NCR Table

The **Role-Based Edit Permissions** feature ensures that users can only edit NCRs based on their role and the current status of the NCR. This provides better control and ensures that users only have access to relevant data.

- **Q-Rep**: Can only edit NCRs that are in the "Q-Rep Stage" status.
- **Engr**: Can edit NCRs that have the status "Pending Engr Review" or "Engr Stage."
- **Admin**: Has full access to edit NCRs across all statuses, providing unrestricted control over the NCRs.

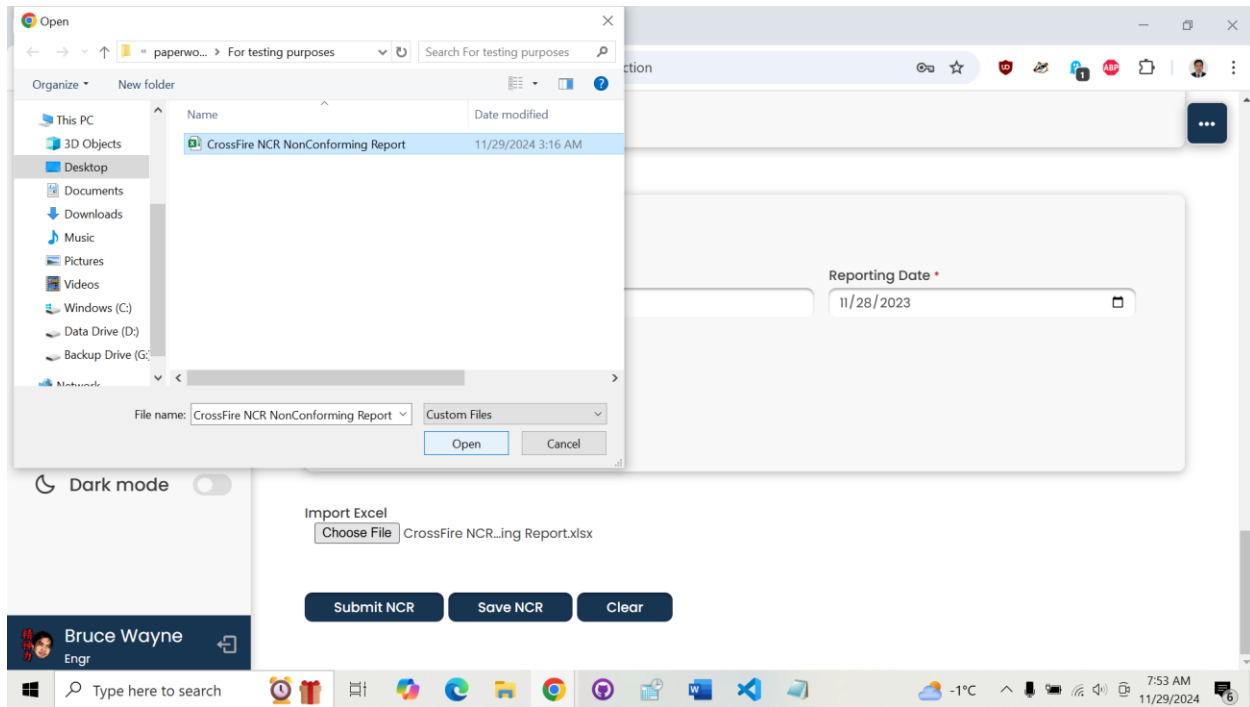
This role-based access is reflected in the **Edit button** displayed in the NCR table. The button is shown conditionally based on the user's role and the NCR's status, ensuring appropriate access and actions.



User Creation Page Access Restricted to Admin

- The user creation page is now only accessible by users with the "Admin" role.
- This ensures that only authorized personnel can create new users, enhancing security and role management within the system.

Excel Import for NCRs



Excel Import for NCRs

- Crossfire employees can easily upload old NCRs to the database by importing an Excel file.
- The system automatically maps the data from the Excel file to the form fields, making it quick to add historical NCRs without manual entry.

References:

- [1] "Non-Conformance Report: Everything You Need to Know," *ECLIPSE Suite*, Mar. 1, 2024. [Online]. Available: <https://www.eclipsesuite.com/non-conformance-report/>. Accessed: Nov. 10, 2024.

- [2] "Understanding nonconformance report software - features and uses," *ComplianceQuest*, Oct. 21, 2024. [Online]. Available: <https://www.compliancequest.com/nonconformance-report-software/>. Accessed: Nov. 10, 2024.

- [3] J. March, "What are the 5 best options for nonconformance management software in 2024?," *Qualio*, #1 Cloud-based Quality Management Software for MedDevice & Pharma, 2024. [Online]. Available: <https://www.qualio.com/blog/5-of-the-best-options-for-nonconformance-management-software>. Accessed: Sept. 20, 2024.

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- [5] Intellex Technologies ULC, "EHS management software to minimize risk and ensure compliance," *Intellex*, 2024. [Online]. Available: <https://www.intellex.com/landing/ehs-management-software/>. Accessed: Sept. 21, 2024.

- [6] IQVIA, "SmartSolve eQMS," *IQVIA*, [Online]. Available: <https://www.iqvia.com/solutions/safety-regulatory-compliance/quality-compliance/smartsolve-eqms>. Accessed: Sept. 21, 2024.

- [7] IQVIA Technologies, "Enhance Quality and Reduce Risk with SmartSolve, A Next Generation QMS," *YouTube*, 2021. [Online]. Available: <https://www.youtube.com/watch?v=c3frKutd8cU>. Accessed: Sept. 22, 2024.

- [8] AJ&Smart, "How to PRIORITIZE IDEAS in Meetings Fast (The Impact Effort Matrix)," *YouTube*, May 2, 2024. [Online]. Available: <https://www.youtube.com/watch?v=lojADA6zRKo>. Accessed: Nov. 6, 2024.

[] BA-EXPERTS, "How to Define User Story Roles: User Role Modeling, Persona Development, Stakeholder Identification," *YouTube*, Jul. 6, 2021. [Online]. Available: <https://www.youtube.com/watch?v=lqPdLYB5-KI>. Accessed: Nov. 10, 2024.

[] Jelvix | TECH IN 5 MINUTES, "WHAT IS FIREBASE | FULL REVIEW," *YouTube*, Dec. 29, 2020. [Online]. Available: <https://www.youtube.com/watch?v=P7FwFANxW4s>. Accessed: Nov. 2, 2024.

Crossfire NCR Impact/Effort Matrix & Product Backlog

<https://app.mural.co/t/crossfirencr8468/m/crossfirencr8468/1730944488570/456c8bf3809dcea4e2084ab1c89088b107a7a296>

Useful Links:

HTML Style Guide

https://www.w3schools.com/html/html5_syntax.asp

JavaScript Best Practices

https://www.w3schools.com/js/js_best_practices.asp

HTML Validator

<https://validator.w3.org/>

WCAG Quick Reference 2.2

<https://www.w3.org/WAI/WCAG22/quickref/>

WCAG Color Contrast Checker

<https://accessibleweb.com/color-contrast-checker/>

<https://webaim.org/resources/contrastchecker/>

LinkedIn List of Top 10 Interface Design Concepts

<https://www.linkedin.com/pulse/top-10-user-interface-design-principles-2024-uidesignz-mbsyf/>