

Streamlining Ticket Assignment for Efficient Support Operations

Project Documentation format

1. Introduction

Project Title: *Streamlining Ticket Assignment for Efficient Support Operations*

Team ID: LTVIP2026TMIDS74504

Team Size: 5

- **Team Leader:** G Sravani – Project Coordination, Users & Groups Configuration
- **Team Member:** G Chandana – Roles & Custom Table Creation
- **Team Member:** J Meghana – Assigning Roles to Users & Groups
- **Team Member:** M Sanjana – Table-Level Role Assignment & ACL Configuration
- **Team Member:** S Swathi – Flow Designer Automation

2. Project Overview

2.1. Purpose

The purpose of this project is to automate and optimize the ticket assignment process in ServiceNow to ensure faster resolution, improved accuracy, and better support efficiency.

2.2. Features

- Custom table: Operations Related
- Automated ticket routing using Flow Designer
- Dynamic assignment to support groups (Platform / Certificates)
- Role-based access control (ACLs)
- Status tracking and updates

- SLA tracking
- Feedback and reporting
- Performance monitoring dashboard

3. Architecture

3.1. Application Architecture

This project is built using the ServiceNow Platform (Global Application Scope).

3.2. Components Used

- Custom Table (u_operations_related)
- Dictionary Fields
- Access Controls (ACL)
- Roles
- User Groups
- Flow Designer (Automation)
- Notifications
- SLA Tracking
- Reports & Dashboards

3.3. Database Design

Custom table fields include:

- Name
- Issue (Choice field)
- Priority
- Assigned to User
- Assigned to Group
- Service Request Number
- Ticket Raised Date
- Status
- Comments
- Work Notes

4. Setup Instructions

4.1. Prerequisites

- ServiceNow Developer Instance
- Admin Access
- Basic knowledge of Flow Designer and ACL

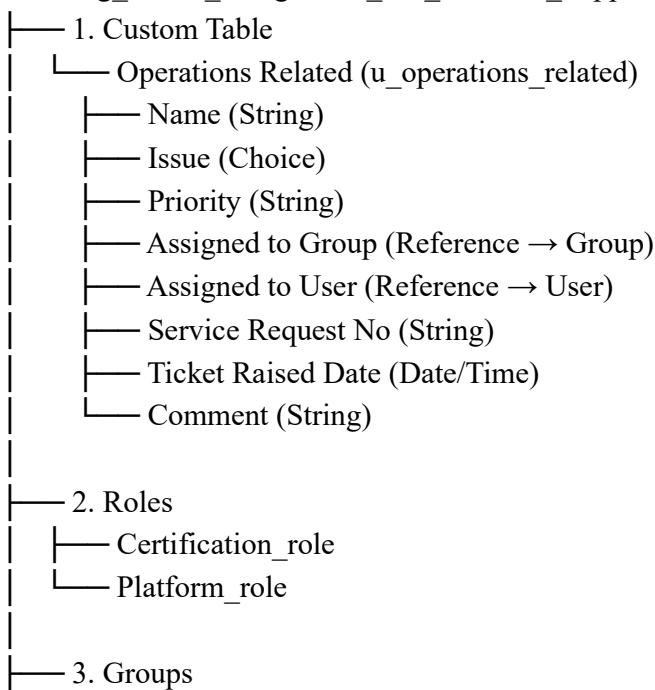
4.2. Installation / Configuration Steps

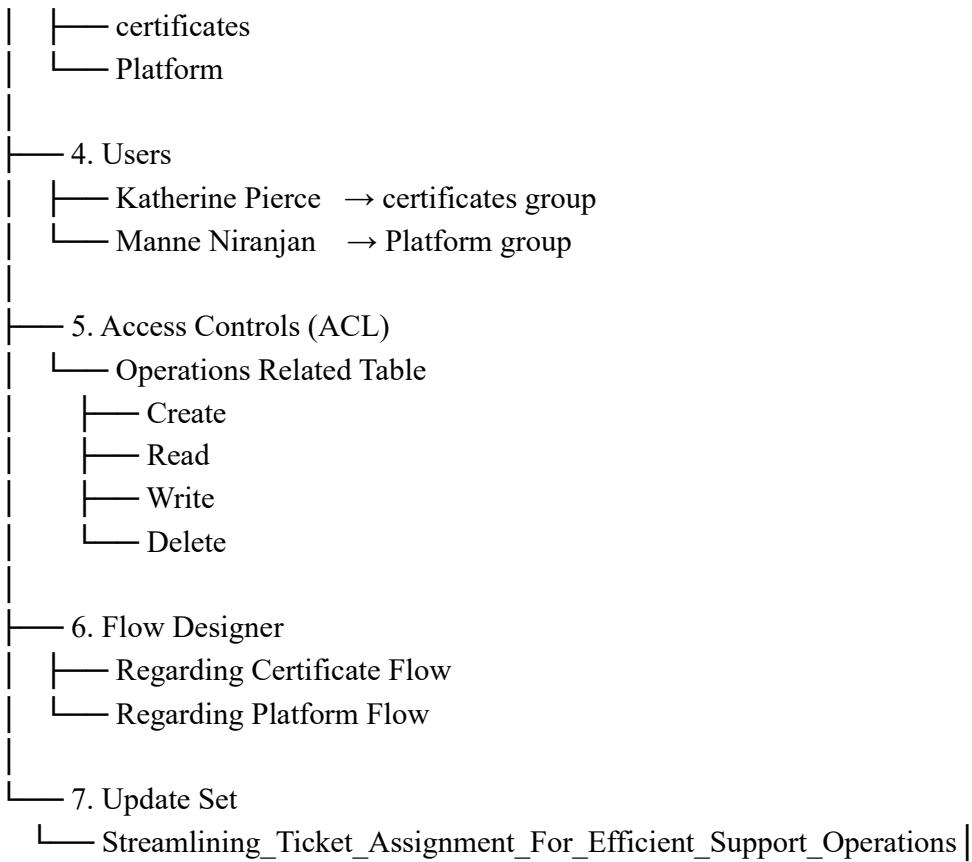
1. Created custom table: **Operations Related**
2. Added required fields and choice values
3. Created user groups (Platform, Certificates)
4. Created roles and assigned to users
5. Configured ACLs for read, write, create, delete
6. Built flows for automatic ticket assignment
7. Tested automation scenarios

5. Folder Structure

5.1. Client (Flask Frontend)

Streamlining_Ticket_Assignment_For_Efficient_Support_Operations





- The project is built as a custom ServiceNow application.
- The core component is the custom table **u_operations_related**.
- Automation is handled through Flow Designer.
- Security is managed using Roles and ACLs.
- Performance monitoring is implemented using Reports and Dashboards.

6. Running the Application

1. User logs into ServiceNow portal
2. Creates a ticket in **Operations Related table**
3. System automatically:
 - Triggers flow
 - Assigns ticket to appropriate group
 - Sends notification
4. Support agent updates status
5. Ticket gets resolved and closed

7. API Documentation

ServiceNow Table API can be used:

Example:

- GET /api/now/table/u_operations_related
- POST /api/now/table/u_operations_related Used for integration or external system access.

8. Authentication

Authentication is handled by ServiceNow platform:

- Role-based access control (RBAC)
- ACL rules configured for:
 - Create
 - Read
 - Write
 - Delete
- User roles:
 - Admin
 - Operations Related User

9. User Interface

The user interface includes:

- Service Portal for ticket creation
- Backend form view for agents
- Status updates
- Work notes section
- SLA tracking panel
- Reports & dashboards

10. Testing

Test Scenarios

1. Create ticket with Issue = "Regarding Certificate" → Assigned to Certificates group
2. Create ticket with Issue = "Platform Login Issue"
→ Assigned to Platform group

3. Verify ACL restrictions
4. Verify notification triggers
5. Verify status updates
6. Verify SLA tracking

All test cases passed successfully.

11. Screenshots or Demo

The screenshot shows the ServiceNow 'Table - Operations related' configuration page. At the top, there are fields for 'Label' (Operations related) and 'Name' (u_operations_related). Below this, the 'Dictionary Entries' section displays a list of columns with their properties:

Column label	Type	Reference	Max length	Default value	Display
Priority	String	(empty)	40	false	false
Assigned to user	Reference	User	32	false	false
Updated	Date/Time	(empty)	40	false	false
Service request No	String	(empty)	40	false	false
Created by	String	(empty)	40	false	false
Name	String	(empty)	40	false	false
Issue	Choice	(empty)	40	false	false
Created	Date/Time	(empty)	40	false	false
Assigned to group	Reference	Group	32	false	false
Ticket raised Date	Date/Time	(empty)	40	false	false
Comment	String	(empty)	32	false	false
Sys ID	Sys ID (GUID)	(empty)	40	false	false
Updated by	String	(empty)	40	false	false
Updates	Integer	(empty)	40	false	false

Figure 11.1: Operations Related – Custom Table Creation

The screenshot shows the 'Operations related' new record form. It includes fields for 'Name' (servicenow), 'Assigned to group' (certificates), 'Priority' (404 error), 'Assigned to user' (servicenow user), 'Service request No' (empty), 'Issue' (404 error), 'Ticket raised Date' (empty), and 'Comment' (Not Working properly). There are 'Submit' buttons at the bottom left and top right.

Figure 11.2: Operations Related – New Record Form

The screenshot shows the 'Operations related' list view. It displays four records with the following details:

Name	Assigned to group	Assigned to user	Comment	Issue	Priority	Service request No	Ticket raised Date
servicenow user	certificates	(empty)	Not Working properly	regarding certificates	(empty)	(empty)	(empty)
Chand	Platform	(empty)	Something user expired is getting	regarding user expired	(empty)	(empty)	(empty)
admin user	Platform	(empty)	unable to login to platform	404 error	(empty)	(empty)	(empty)
sample user	Platform	(empty)	Getting this error repeatedly	(empty)	(empty)	(empty)	(empty)

Figure 11.3: Assigned Group automatically triggered

The screenshot shows the ServiceNow interface for configuring a custom table named "Operations related". The top navigation bar includes "All", "Favorites", "History", "Workspaces", and "Admin". The title bar says "Table - Operations related". The main area displays a table of columns with the following data:

Column label	Type	Reference	Max length	Default value	Display
Priority	String	(empty)	40		false
Assigned to user	Reference	User	32		false
Updated	Date/Time	(empty)	40		false
Service request No	String	(empty)	40		false
Created by	String	(empty)	40		false
Name	String	(empty)	40		false
Issue	Choice	(empty)	40		false
Created	Date/Time	(empty)	40		false
Assigned to group	Reference	Group	32		false
Ticket raised Date	Date/Time	(empty)	40		false
Comment	String	(empty)	40		false
Sys ID	Sys ID (GUID)	(empty)	32		false
Updated by	String	(empty)	40		false
Updates	Integer	(empty)	40		false
Insert a new row...					

Figure 11.4: Custom Table Columns Configuration (Operations Related Table)

The screenshot shows the ServiceNow interface for configuring a custom role named "Certification_role". The top navigation bar includes "All", "Favorites", "History", "Workspaces", and "Admin". The title bar says "Role - Certification_role". The main area displays a table with the following data:

Name	Certification_role	Applications	Global
Description	Can deal with certification issues	Elevated privilege	
Update Delete			
Contains Roles Applications with Role Modules with Role Custom Tables			

Below the table, there is a section titled "Role - Certification_role" with a "Contains" button and a placeholder icon.

Figure 11.5: Custom Role – Certification_role Configuration

The screenshot shows the ServiceNow interface for configuring a custom role named "Platform_role". The top navigation bar includes "All", "Favorites", "History", "Workspaces", and "Admin". The title bar says "Role - Platform_role". The main area displays a table with the following data:

Name	Platform role	Applications	Global
Description	Can deal with platform related issues	Elevated privilege	
Update Delete			
Contains Roles Applications with Role Modules with Role Custom Tables			

Below the table, there is a section titled "Role - Platform_role" with a "Contains" button and a placeholder icon.

Figure 11.6: Custom Role – Platform_role Configuration

The left screenshot shows the 'Group - certificates' configuration screen. It includes fields for Name (certificates), Manager (Sathya Peric), Group email, Parent, and Description. Below this is a table of group members.

Role	Created	Role	Granted by	Inherits
GroupMember	2026-02-17 01:02:28	Certification_role	(empty)	true

The right screenshot shows the 'Group - Platform' configuration screen, similar to the left one but with a different name and manager.

Figure 11.7: Support Group –Certificates Configuration & Platform Configuration

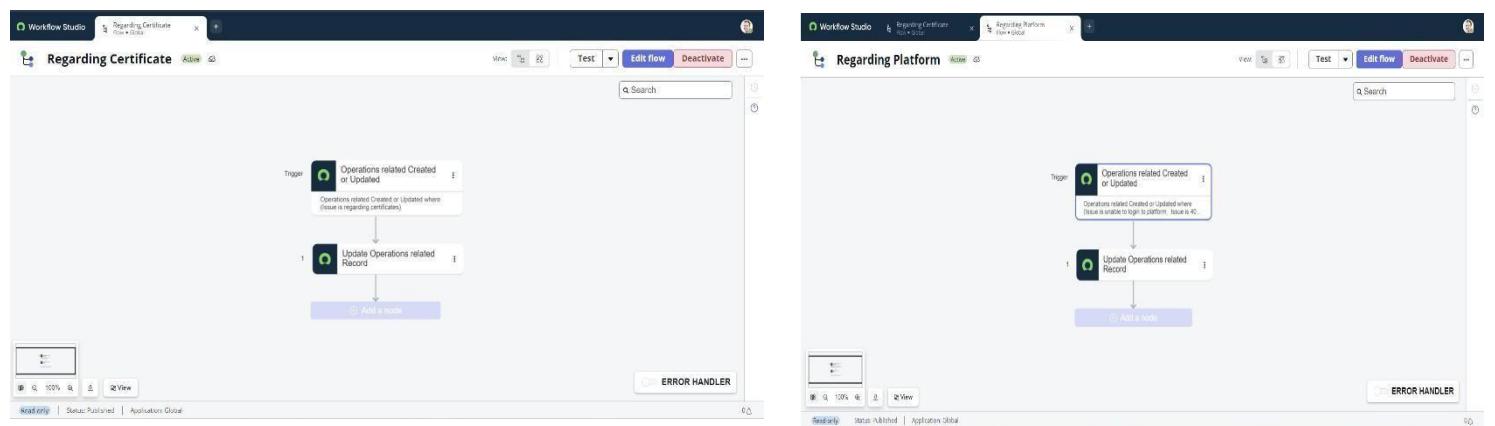


Figure 11.8: Flow Designer – Regarding Certificate Automation Flow & Platform Automation Flow

This screenshot shows the 'Update Set - Streamlining_Ticket_Assignment_For_Efficient_Support_Operations' configuration screen. It includes fields for Name (Streamlining_Ticket_Assignment_For_Efficient), State (Complete), Parent, Release date, Install date, Installed from, and Description. To the right, details about the update set are listed:

- Application: Global
- Created: 2026-02-17 00:14:09
- Created by: admin
- Merged to: (empty)

Below the main form are sections for Related Links (Export to XML, Merge With Another Update Set, Scan Update Set), and tabs for Customer Updates (54), Update Set Logs, Child Update Sets, and Install History.

Figure 11.9: Update Set – Streamlining Ticket Assignment Configuration

Demo Link:

<https://drive.google.com/file/d/17oMzpHHAosefjQNUXeFl3L9oXB2NTOdI/view?usp=sharing>

12. Known Issues

- Manual ticket reassignment required in rare edge cases
- SLA depends on correct configuration
- Requires proper role assignment for access

13. Future Enhancements

- AI-based ticket categorization
- Predictive assignment
- Advanced SLA analytics
- Email integration
- Escalation workflow automation
- Performance tracking dashboard with KPIs