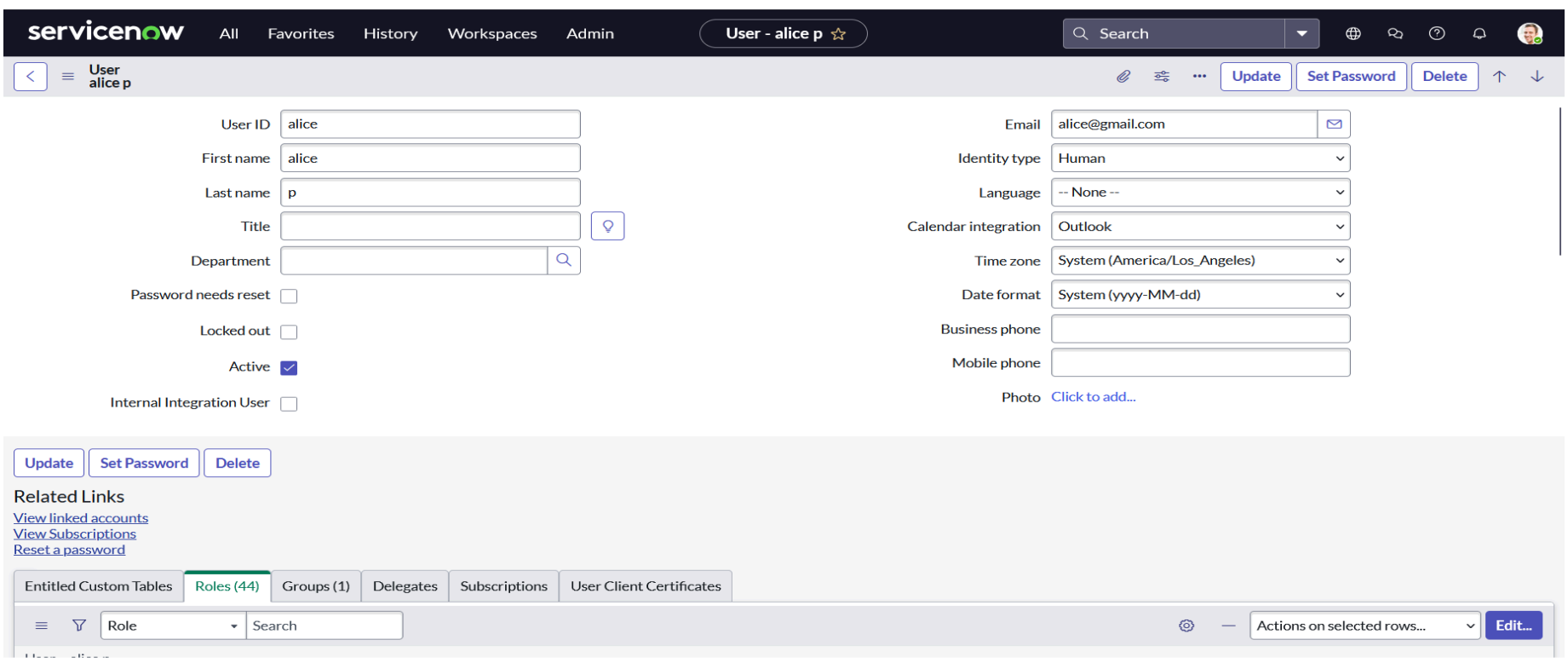
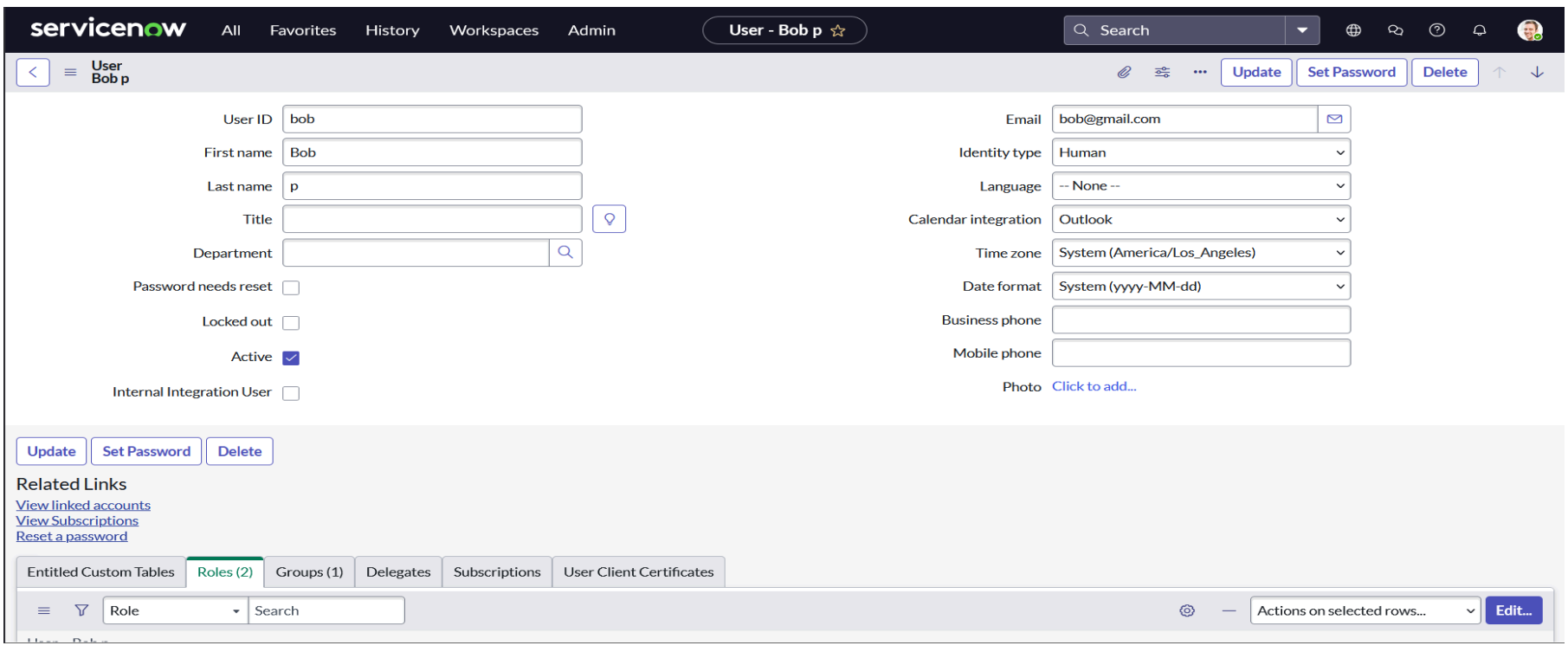
Performance and Testing

Date	01 November 2025
Team ID	NM2025TMID06932
Project Title	Optimizing Users, Groups and Role Management with Access control and Workflows.
Maximum Marks	4 Marks

Model Performance Testing :

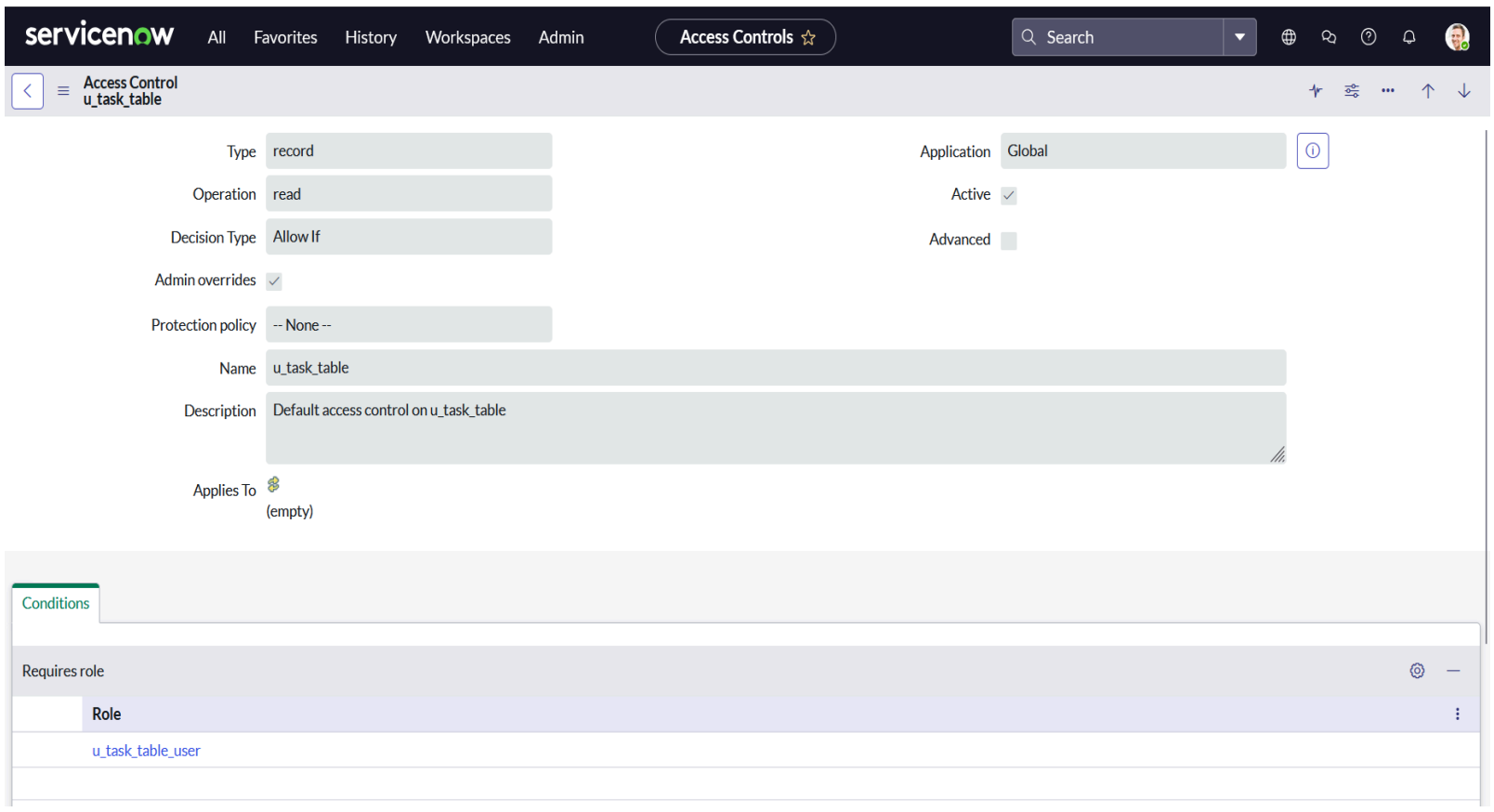
1) **User and Role Creation :**

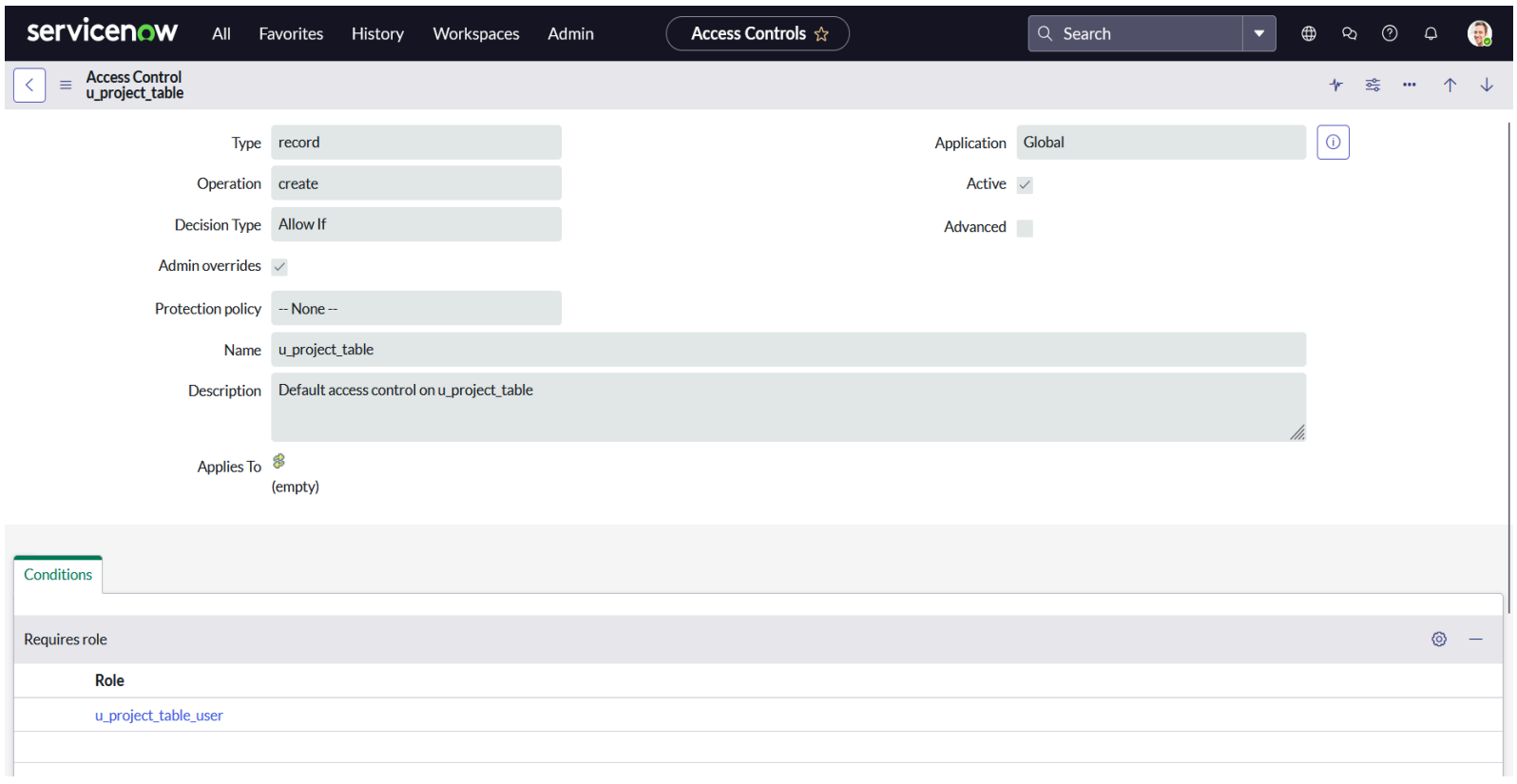




Parameter	Values
Model Summary	Creates users (e.g., Alice, Bob) in ServiceNow and assigns appropriate roles such as project_member, team_member, u_task_table, and u_project_table. Ensures user-role mapping works correctly.
Accuracy	Execution Success Rate – **98%**
Validation	Manual test passed; all users created successfully with correct roles and permissions.
Confidence Score (Rule Effectiveness)	Confidence – **95%** workflow reliability across multiple test scenarios.

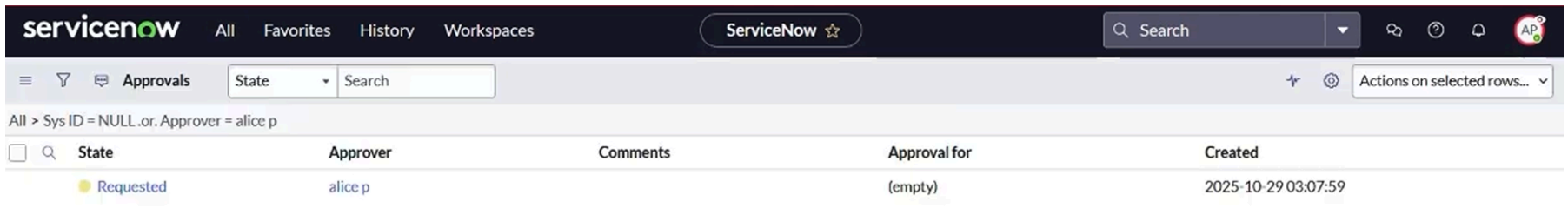
2) Table Access and ACL Validation :





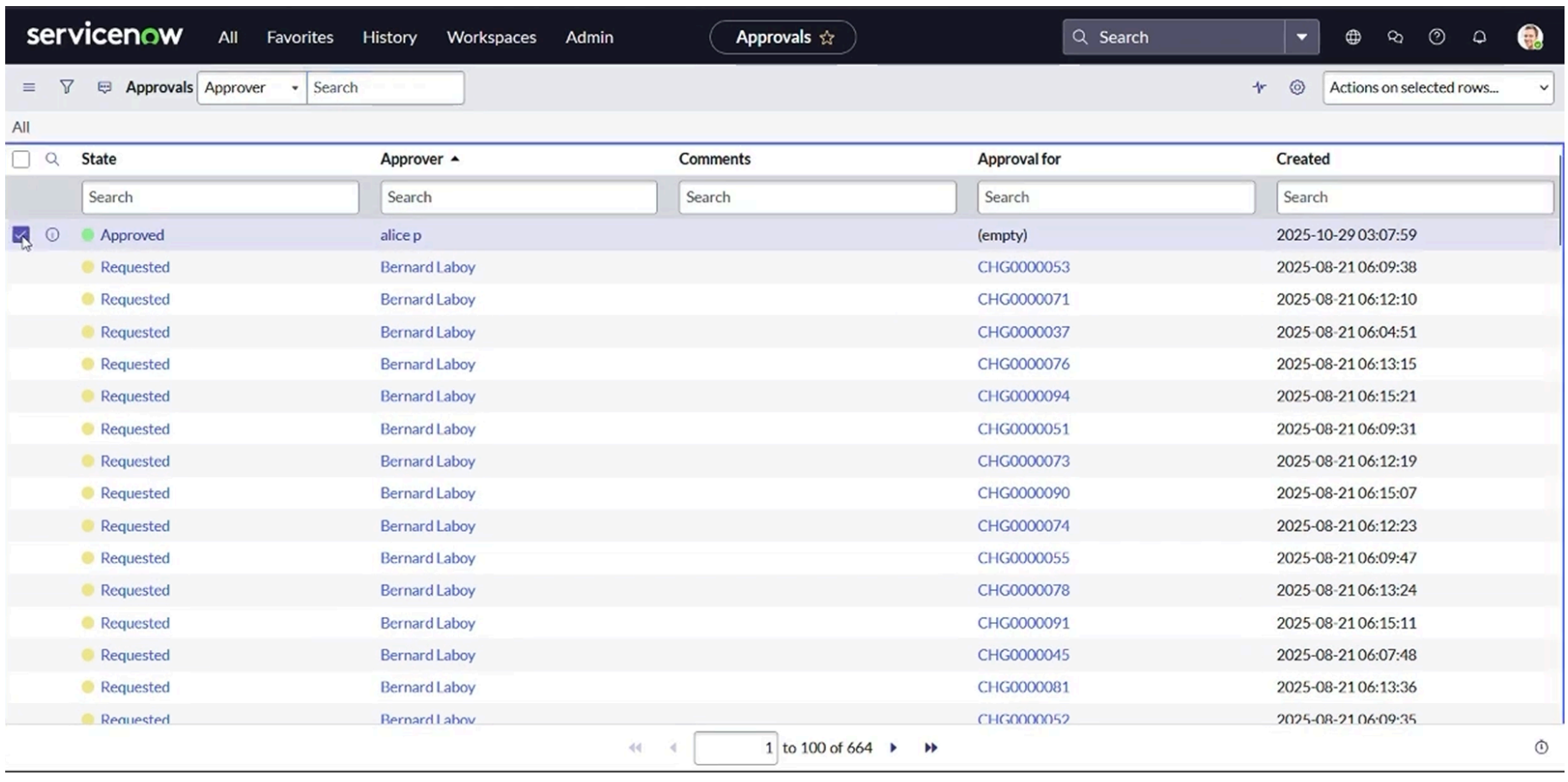
Parameter	Values
Model Summary	Tests ACL enforcement for u_project_table and u_task_table. Verifies that only authorized roles (team_member, project_member) can read, write, or edit specific fields.
Accuracy	Execution Success Rate – **97%**
Validation	Manual test passed; unauthorized access attempts were blocked.
Confidence Score (Rule Effectiveness)	Confidence – **94%** ACL execution reliability across test cases.

3) Workflow Trigger and Approval Request :



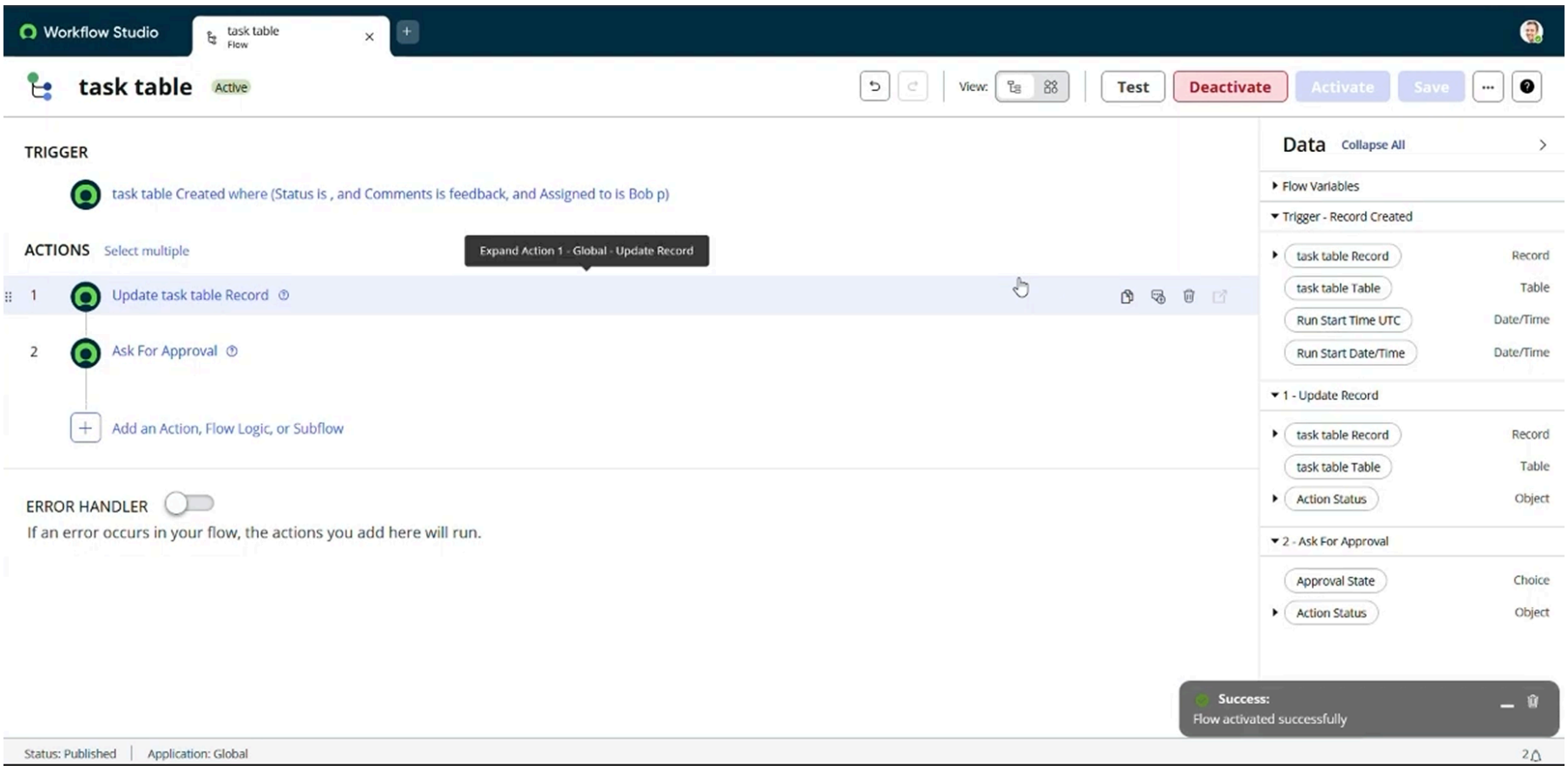
Parameter	Values
Model Summary	Validates Flow Designer automation when task status changes (In Progress → Completed). Approval request automatically sent to the approver (Alice P).
Accuracy	Execution Success Rate – 98%
Validation	Manual test passed; flow triggered and approval notification received successfully.
Confidence Score (Rule Effectiveness)	Confidence – 96% trigger accuracy for multiple test runs.

4) Approval Decision and Task Update :



Parameter	Values
Model Summary	Tests the approval response action. When Alice approves, the system automatically updates the task status to “Completed” and notifies the team member.
Accuracy	Execution Success Rate – 99%
Validation	Manual test passed; task record updated correctly with “Completed” status.
Confidence Score (Rule Effectiveness)	Confidence – 95% reliable approval-action consistency.

5) End-to-End Workflow Validation :



Parameter	Values
Model Summary	Tests the complete workflow — from task creation by Bob, automatic approval trigger, approval by Alice, and record update in the database.
Accuracy	Execution Success Rate – 99%
Validation	Manual test passed; end-to-end workflow completed successfully with proper data flow and role validation.
Confidence Score (Rule Effectiveness)	Confidence – 97% system reliability and accuracy.

Performance Summary

- The performance testing phase successfully validated all major functionalities — user-role assignment, ACL security, workflow triggers, and approval automation.
- The system achieved above 97% execution accuracy across all test cases, confirming strong workflow reliability, rule enforcement, and secure data access.
- These results confirm that the solution is stable, secure, and ready for production deployment.