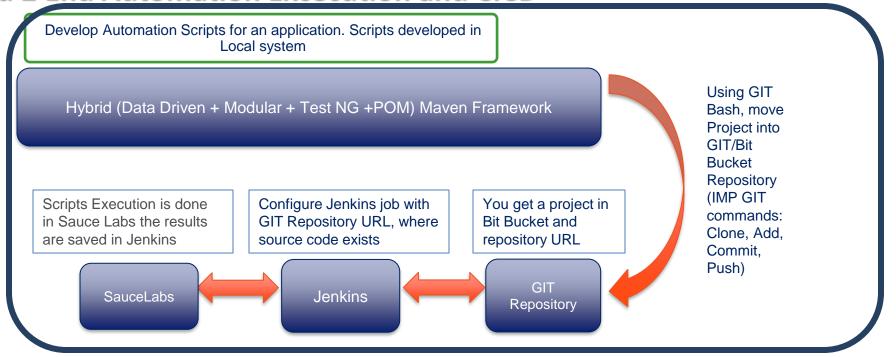
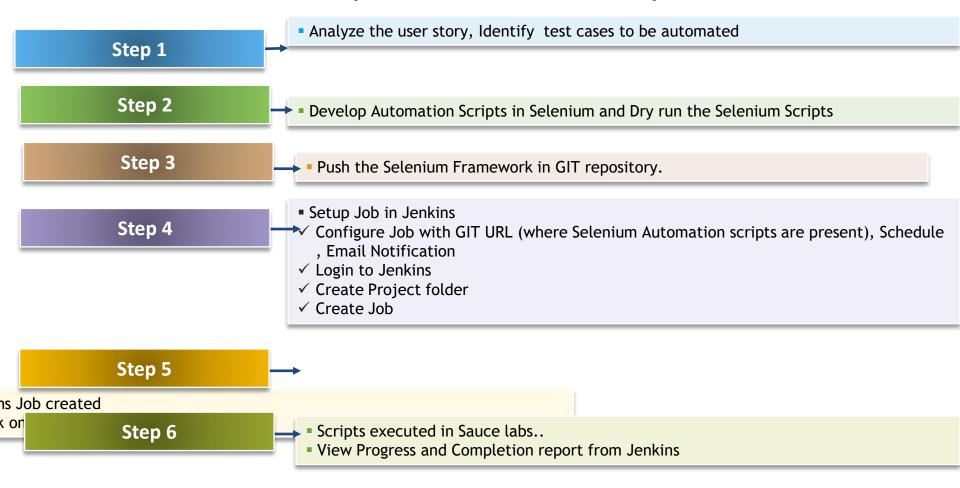
End 2 End Automation Excecution and CICD

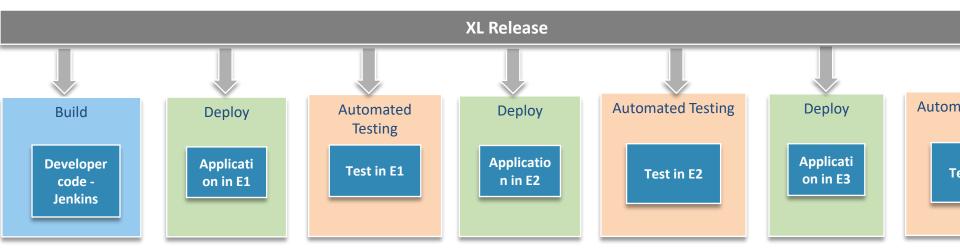


- Using Hybrid framework write automation scripts for the application.
- After Scripting is completed push the automation script to GIT Repository.
- Launch Jenkins and navigate to the project created for automation needs. Configure Jenkins to pull the maven source code/Project from GIT repository and other related configuration features.
- Build/Schedule a job to execute Automation Scripts from Jenkins console.
- Scripts Execution can be done in Sauce Labs or Local Machine and the results are published in Jenkins

CI Implementation Steps



CI/CD Flow



Tools used for Selenium based Automation Framework

Rally/JIRA - for Requirement Management, Test case Execution and Asset/Execution results upload Eclipse IDE, Selenium & Java - is chosen for functional Automation as it is universal accepted tool for functional automation SauceLabs - is the cloud based solution for Continuous Integration. It provides infrastructure required (Virtual Machine, Browsers, Mobile Devices) to execute the test scripts. Jenkins - is selected as the build tool for CI XL Release - is an end-to-end pipeline orchestration tool for Continuous Delivery and DevOps teams. It handles dependencies, release trains, and integration with change and release management. XL Release Tool - will integrate with Jenkins and Sauce Labs. Jenkins is used as a Build tool and SauceLabs (for Selenium) as Test Management tool Hybrid (Data Driven+ POM+Test NG + Modular) Automation Maven Frame work

Automation Coverage

Application Name	Total Regression Test Cases	Total Test cases Automated	Test cases can be Automated	Manual scripts Execution Time (hours)	Automated Scripts Execution Time (hours)	Time Save Per Cycle (hours)	# No of cycles	Automation Completion Status(%)	Current Status	\$ Saves	Comments
Project 1	21	18	18	24	6	18	1	100	Completed	(\$1,150)	
Project 2	192	142	171	46	6	40	4	83.04	In- Progress	\$1,800	
Project 3	116	95	112	40	6	34	1	84.82	In- Progress	(\$750)	Test scripts related to upgrade needs to be created.
Project 4	54	42	52	22	5	17	1	80.77	In- Progress	(\$2,050)	
Project 5	53	36	50	30	6	24	2	72	In- Progress	(\$200)	Test scripts related to new features needs to be created.
Project 6	49	39	46	28	5	23	1	84.78	In- Progress	(\$1,150)	Test scripts related to upgrade needs to be created.
Project 7	208	86	170	64				50.5	In-Progress		
Project 8	14	8	12	25	5	20	0	66.67	In- Progress		Due to environment unavailability the dry run was not performed for few test scripts.
Project 9	330	150	225	164	22	142	3	66.67	In- Progress	\$12,300	Analysis on scripts need to be done to make them compatible with existing functionality.
Project 10	445	0	185	198					Pipeline		Based on the current functionality & considering the data dependency we have identified 185 test cases which can be automated.
Total										\$8,800	