

In my project, I built a **DevSecOps pipeline** for a Tic-Tac-Toe app built with **TypeScript, React, and Vite**. I automated testing, security scanning, and deployment using GitHub Actions and Argo CD.

1. **Code Stage** – A developer writes and pushes code to GitHub.

2. **CI (Continuous Integration) Stage**

- GitHub Actions runs automated tests to check if the code is working.
- Linting is done to catch code smells, like unused variables or outdated functions.

3. **Security Checks**

- A tool called **Trivy** scans the code and Docker images for vulnerabilities.

4. **Build & Deployment**

- If everything is fine, the pipeline builds a Docker image and pushes it to GitHub Container Registry (GHCR).
- A Kubernetes deployment file is updated with the new image.
- Argo CD detects the change and deploys the latest version of the app automatically.

Would you like me to dive deeper into any stage?