



GitLab

GitLab Basics for Developers

# A Complete DevOps Platform Delivered as a Single Application



Manage



Plan



Create



Verify



Package



Secure



Release



Configure



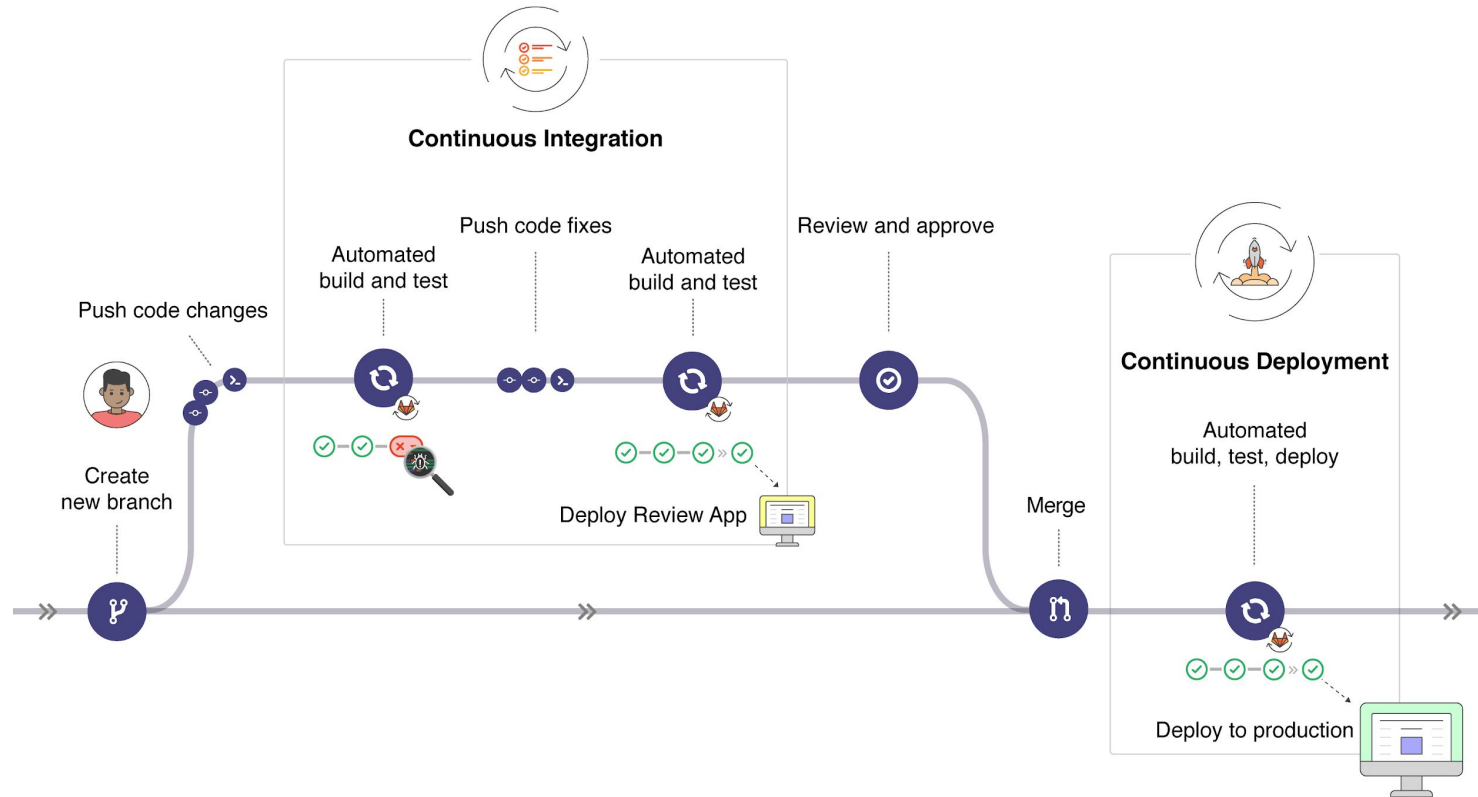
Monitor



Defend

Single Conversation  
Single Data Store  
Single Permission Model  
Single Interface  
Governance & Security  
Team Collaboration  
Lifecycle Analytics

# DevOps Best Practices Built In



# Where do I start? - Issue Board



GitLab.org > Issue Boards

13.1 Fulfillment by... Label = ~group::fulfillment x Show labels Edit board

Open 1 5 +

For Seatlink / # of Seats that are in use for a Subscription, can we stamp that back to the Zuora Subscription.

CSA1-Priority 1 EntApp Ecosystem P1

devops growth group fulfillment

portal integration zuora

gitlab-org/customers-gitlab-com#1147 5

backend 9 27 +

Aggregate user usage data in the instance and provide a manual export option

Accepting merge requests Deliverable P1

devops growth feature group fulfillment

gitlab-org/gitlab#213615

Implementation: Self-Service Upgrades for Self-Managed

GitLab.com Growth-deliverable OKR FY20 Q2 UX

auto updated devops growth feature frontend

group fulfillment vintage

workflow validation backlog

gitlab-org/customers-gitlab-com#107 5

GitLab.com users should be able to purchase additional users without adding members

CSA1-Priority 2 EntApp Ecosystem

Growth-deliverable OKR FY20 Q2 P2

devops growth feature group fulfillment

portal integration

gitlab-org/customers-gitlab-com#1098 3

API call to pull user/seat data from GitLab.com

Growth-deliverable P2 customer

devops growth gitlab.com group fulfillment

link parent issue missed:12.8 retention

gitlab-org/gitlab#35454 3

Create Dynamic "Seats Currently in Use Members List" for GitLab.com

Accepting merge requests Growth-deliverable P2

customer devops growth feature frontend

gitlab.com group fulfillment internal customer

link parent issue workflow design

gitlab-org/gitlab#27074 8

frontend 5 22 +

Change linked group button should not be available for CI Minute Subscriptions

P1 UX bug devops growth

group fulfillment

gitlab-org/customers-gitlab-com#1229 1

Implementation: Self-Service Upgrades for Self-Managed

GitLab.com Growth-deliverable OKR FY20 Q2 UX

auto updated backend devops growth feature

group fulfillment vintage

workflow validation backlog

gitlab-org/customers-gitlab-com#107 5

Create Dynamic "Seats Currently in Use Members List" for GitLab.com

Accepting merge requests Growth-deliverable P2

backend customer devops growth feature

gitlab.com group fulfillment internal customer

link parent issue workflow design

gitlab-org/gitlab#27074 8

Wrong text color for .alert-info

P2 S4 bug devops growth

group fulfillment regression

gitlab-org/customers-gitlab-com#946 3

Pajamas Update: Portal "Manage Purchases/Upgrade Subscription" Page

Customers Portal Pajamas Update For Scheduling P1

devops growth group fulfillment

gitlab-org/customers-gitlab-com#958 5

UX 2 6 +

Change linked group button should not be available for CI Minute Subscriptions

P1 bug devops growth frontend

group fulfillment

gitlab-org/customers-gitlab-com#1229 1

Implementation: Self-Service Upgrades for Self-Managed

GitLab.com Growth-deliverable OKR FY20 Q2

auto updated backend devops growth feature

frontend group fulfillment vintage

workflow validation backlog

gitlab-org/customers-gitlab-com#107 5



GitLab.org > customers-gitlab-com > Issues > #946

Open Opened 3 months ago by Ammar Alakkad

Close issue

New issue

## Wrong text color for .alert-info



### Summary

Wrong text color for `.alert-info`, it's showing white text instead of `#0c5460`. I believe it's related to scss imports orders.

### Steps to reproduce

1. Login to the customers portal with an account that doesn't have any invoice.
2. Go to the invoices page.
3. Notice the alert that says "You do not currently have any invoices."

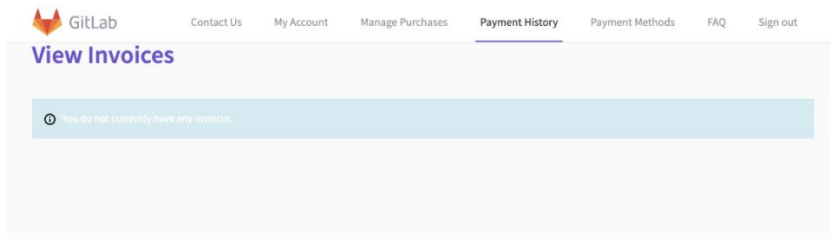
### What is the current *bug* behavior?

White text on a light background, barely readable.

### What is the expected *correct* behavior?

Dark text ( `#0c5460` ) on a light background.

### Relevant logs and/or screenshots



Linked issues 0 +



Oldest first

Show all activity

Create merge request

Discussion 2 Designs 0

# See Progress using Merge Requests



Open Opened just now by Josh Swann Edit Close merge request

## WIP: Resolve "Put links back to the homepage from the greetings page"

Overview 0 Commits 0 Changes

Closes #18

Request to merge 18-put-links-back-to-... into master

Open in Web IDE Check out branch Download

Merge requests are a place to propose changes you have made to a project and discuss those changes with others.

Interested parties can even contribute by pushing commits if they want to.

Currently there are no changes in this merge request's source branch. Please push new commits or use a different branch.

Create file

Show all activity

Josh Swann @joshswann changed milestone to %Version 2.0 just now

Josh Swann @joshswann added To Do label just now

Write Preview

Write a comment or drag your files here...

Markdown and quick actions are supported Attach a file

Comment Close merge request

- Merge Request to Issue Traceability
- Web IDE or Check Out locally
- Branch Creation
- Record of changes and their impact to the branch

# Built-in IDE - Code Changes



tanuki-two  
swann-demo/tanuki-two

32-investiga... 130

Edit

.gitlab  
src  
main  
java  
hello  
Application.java  
Greeting.java  
GreetingController.java  
HelloController.java  
Taints.java  
resources  
.codeclimate.yml  
.example.ci.file.yml.not\_in\_use  
.gitignore  
.gitlab-ci.yml  
Dockerfile  
README.md  
app.json  
ci\_settings.xml  
pom.xml

Commit...

0 changed files

tanuki-two  
swann-demo/tanuki-two

GreetingController.java

```
1 package hello;
2
3 import org.springframework.stereotype.Controller;
4 import org.springframework.ui.Model;
5 import org.springframework.web.bind.annotation.GetMapping;
6 import org.springframework.web.bind.annotation.ModelAttribute;
7 import org.springframework.web.bind.annotation.PostMapping;
8
9 @Controller
10 public class GreetingController {
11
12     @GetMapping("/greeting")
13     public String greetingForm(Model model) {
14         model.addAttribute("greeting", new Greeting());
15         return "greeting";
16     }
17
18     @PostMapping("/greeting")
19     public String greetingSubmit(@ModelAttribute Greeting greeting) {
20         return "result";
21     }
22
23 }
```

✓ Pipeline #131563038 passed for 414431ca by Josh Swann 1 week ago Merge request 130

## Check out, review, and merge locally

**Step 1.** Fetch and check out the branch for this merge request

```
git fetch origin
git checkout -b "32-investigate-vulnerability-hardcoded-constant-database-password" "origin"
```

**Step 2.** Review the changes locally

**Step 3.** Merge the branch and fix any conflicts that come up

```
git fetch origin
git checkout "origin/master"
git merge --no-ff "32-investigate-vulnerability-hardcoded-constant-database-password"
```

**Step 4.** Push the result of the merge to GitLab

```
git push origin "master"
```

**Tip:** You can also checkout merge requests locally by [following these guidelines](#).



## WIP: Resolve "Investigate vulnerability: Hardcoded constant database password"

Overview 0 Commits 1 Pipelines 1 Changes 2

Closes #32

Request to merge 32-investigate-vuln... into master

Open in Web IDE Check out branch

Pipeline #131563038 passed for 414431ca on 32-investigate-vuln...

Deployed to review/32-investigate-vuln... 1 week ago View app Review

Approve Requires approval.

> View eligible approvers

Code quality improved on 52 points Expand

Security scanning detected 43 fixed vulnerabilities  
Security report is out of date. Run a [new pipeline](#) for the target branch (master) View full report Expand

License Compliance detected no new licenses Manage licenses View full report

Merge This is a Work in Progress Resolve WIP status

Closes #32

[Assign yourself to this issue](#)

You can merge this merge request manually using the [command line](#)

- CI/CD Pipeline Activity
- Approval Processes
- Scan Results
  - Code Quality
  - Security Scanning
  - Compliance
- Code Reviews
- And more!
  - Commit History
  - Comments
  - Reactions



# Code Review



swann-demo > tanuki-two > Merge Requests > 130

**Open** Opened 3 weeks ago by **Josh Swann** [Edit](#) [Close merge request](#)

## Resolve "Investigate vulnerability: Hardcoded constant database password"

Overview 0 Commits 1 Pipelines 1 **Changes 2**

Compare latest version and master 2 files +0 -284

src/main/java/hello/CodeSmells.java deleted +0 -74

```
1 - package hello;
2 -
3 - import java.lang.Integer;
4 -
5 - public class CodeSmells{
6 -
7 - //TODO: Need to flesh out these functions more.
8 - //password: IamputtingAPasswordH3R3
9 -
10 -
11 - public Greeting drive;
12 -
13 - public void tearDown(){
```

**Write** Preview

**B I**  **”** **</>** **🔗** **☰** **☷** **☰** **☷** **☰** **☷** **☰** **☷**

Why? Really? Why?

Markdown is supported [Attach a file](#)

[Start a review](#) [Add comment now](#) [Cancel](#)

# Code Review



**Overview** 1 Commits 1 Pipelines 1 Changes 2

0/1 thread resolved

**Josh Swann** @joshswann restored source branch `32-investigate-vulnerability-hardcoded-constant-database-password` 3 weeks ago

**Josh Swann** @joshswann added 1 commit 3 weeks ago

- 414431ca - Deleted `src/main/java/hello/CodeSmells.java`, `src/main/java/hello/ConstantPasswords.java` files

[Compare with previous version](#)

**Josh Swann** @joshswann unmarked as a **Work In Progress** 2 weeks ago

**Josh Swann** @joshswann approved this merge request 2 weeks ago

**Josh Swann** @joshswann started a thread on the diff 26 seconds ago Toggle thread

`src/main/java/hello/CodeSmells.java` deleted

```
1  - package hello;
2  -
3  - import java.lang.Integer;
4  -
5  - public class CodeSmells{
6  -
7  -     //TODO: Need to flesh out these functions more.
8  -     //password: IamputtingAPasswordH3R3
9  -
10 -
11 -     public Greeting drive;
12 -
13 -     public void tearDown(){
```


**Josh Swann** @joshswann · 26 seconds ago Owner

Why? Really? Why?

Resolve thread

# Easy Merging



 [Merge](#) ☐ Delete source branch

> 1 commit and 1 merge commit will be added to master. [Modify merge commit](#)

Closes #32

[Assign yourself to this issue](#)

You can merge this merge request manually using the [command line](#)

 Merged by  [Josh Swann](#) just now [Revert](#) [Cherry-pick](#)

The changes were merged into [master](#) with [952e47ea](#) 

The source branch has been deleted

Closed #32

[Assign yourself to this issue](#)

# CI/CD Pipelines



All 150 Pending 0 Running 1 Finished 149 Branches Tags					Run Pipeline	Clear Runner Caches	CI Lint
Status	Pipeline	Triggerer	Commit	Stages			
running	#135457891 latest		master -> b07350bb Merge branch '30-i-wanna-go-f...				
canceled	#134517448 latest		18-put-link... -> b07350bb Merge branch '30-i-wanna-go-f...		00:04:59 4 days ago		
passed	#131563038 latest		32-investig... -> 414431ca Deleted src/main/java/hello/Cod...		00:16:35 1 week ago		
failed	#131562920		32-investig... -> b07350bb Merge branch '30-i-wanna-go-f...		00:13:57 1 week ago		
passed	#131444617 latest		31-add-unit... -> 33bc6e24 Deleted .example.ci.file.yml.not_i...		00:15:24 1 week ago		
passed	#131432572 latest		29-is-this-... -> 8c0e37bb Deleted .example.ci.file.yml.not_i...		00:14:43 1 week ago		
passed	#131431688 latest		31-investig... -> b18f1034 Deleted src/main/java/hello/Cons...		00:16:22 1 week ago		
failed	#131431015		31-investig... -> b07350bb Merge branch '30-i-wanna-go-f...		00:14:17 1 week ago		

# Resolved MR, Closed Issue



swann-demo > tanuki-two > Merge Requests > 130

Merged Opened 3 weeks ago by Josh Swann

Edit

## Resolve "Investigate vulnerability: Hardcoded constant database password"

Overview 1 Commits 1 Pipelines 1 Changes 2

0/1 thread resolved

Closes #32 (closed)

Edited 2 weeks ago by Josh Swann

Request to merge 32-investigate-vulnerability-hardcoded-constant-database-password into master

Pipeline #131563038 passed for 414431ca on 32-investigate-vulnerability-hardcoded-constant-database-password

Merge request approved. Approved by

View eligible approvers

Code quality improved on 52 points

Expand

Security scanning detected 13 new, and 65 fixed vulnerabilities

View full report

Expand

License Compliance detected no new licenses

Manage licenses

View full report

Merged by Josh Swann 2 minutes ago

Revert

Cherry-pick

The changes were merged into master with 952e47ea

The source branch has been deleted

Closed #32 (closed)

Assign yourself to this issue

Pipeline #140454208 running for 952e47ea on master

Will deploy to production

View latest app

Review



swann-demo > tanuki-two > Issue Boards

Development

Search or filter results...

Show labels



Edit board

Add list

Add issue

Open

19 0

Click here if you forgot your password

Priority 2

#9

Add an in-memory database

Priority 2

#12

Investigate vulnerability: Password in URL

Priority 2

#17

Check to see if the Template still works

Priority 1

#22

Investigate vulnerability: Found Spring endpoint

#19

Super Awesome new Feature implementation

#27

Reset the password field in the project

Priority 1

#11

Create a .gitlab/gitlab-webservice.yml file to enable web terminal feature

Priority 1

#15

Investigate vulnerability: Hard coded key

To Do

2 0

Change the Pom.xml file

Priority 1

#8

Put links back to the homepage from the greetings page

Priority 1

#18

Doing

0 0

Closed

19 0

Investigate vulnerability: Hardcoded constant database password

#32

I Wanna go Fast!

#30

Update maven repo url

#26

Update new base Docker image for JDK

#25

Add some code quality issues in the code

#24

something new

#23

Create an issue template for User Stories

Priority 1

#21

Reface the login page

Priority 1

#20

Move the Login block to the center of the page

Doing

Priority 2

#7

Add new code for the toolbar script

#14



# GitLab

---

Lab



## Create Stage

### Gitlab Basics - Lab 2

## Lab Assignment

**Scenario:** Based off an issue, make changes to the code base and commit

### *Key Tasks to Complete*

1. Review Issue, Create if it doesn't exist
2. Create a MR
3. Select **Open in Web IDE**
4. Modify **README.md** file
5. Commit
  - a. Add Commit Message
  - b. Click **Commit**
6. Return to Merge Request
7. Click **Resolve WIP Status**
8. Click **Merge**
9. View Master branch, verify Changes
10. Verify Issue is **Closed**



# GitLab

Everyone can contribute



S spring-app-secure-1

pmm-demo > spring-app-secure-1 > Issue Boards

- Project
- Repository
- Issues 2
  - List
  - Boards
  - Labels
  - Milestones
- Merge Requests 1
- CI / CD
- Operations
- Registry
- Packages
- Wiki
- Snippets
- Settings
- << Collapse sidebar

Development Search or filter results... Edit board Add list Add issues

Open 1 0 +

Investigate vulnerability: Predictable pseudorandom number generator

#2

Doing 1 0 +

Add GitLab style to main page

Doing

#1

Review 0 0 0 +

Open the issue to take a look at details.

Unlocked

S spring-app-secure-1

Project

Repository

Issues 2

List

Boards

Labels

Milestones

Merge Requests 1

CI / CD

Operations

Registry

Packages

Wiki

Snippets

Settings

Collapse sidebar

# Hello from Spring Boot!

It should instead reflect the personality of GitLab.

- ☐ GitLab purple background
- ☐ Proper main message
- ☐ GitLab logo

Edited 1 week ago by Dan

Related issues 0

Related merge requests 1

WIP: Resolve "Add GitLab style to main page" pmm-demo/spring-app-... !1

When this merge request is accepted, this issue will be closed automatically.



Show comments only

Create merge request

... but this one's already been created so let's take a look at it.

You normally create a Merge Request to start working on the solution.

Todo Add todo

Assignee Dan @Gordon Edit

Epic None

Milestone None Edit

Time tracking No estimate or time spent

Due date No due date Edit

Labels Doing Edit

Weight None Edit

Confidentiality Not confidential Edit

Lock issue Unlocked Edit

S spring-app-secure-1

- Project
- Repository
- Issues 2
- Merge Requests 1
- CI / CD
- Operations
- Registry
- Packages
- Wiki
- Snippets
- Settings

pmm-demo > spring-app-secure-1 > Merge Requests > !1

Open Opened 1 week ago by Dan Edit Close merge request

## WIP: Resolve "Add GitLab style to main page"

Closes #1

Request to merge 1-add-gitlab-style-... into master Open in Web IDE Check out branch

Pipeline #2791 passed with warnings for e6ea897e on 1-add-gitlab-style-... View app

Deployed to review/1-add-gitlab-styl... 1 week ago

No Approval required

Code quality improved on 1 point Expand

Security scanning (errors when loading results) detected 59 new vulnerabilities View full report Expand

License management detected no new licenses Manage licenses View full report

Todo Add todo

Assignee No assignee - assign yourself Edit

Milestone None Edit

Time tracking No estimate or time spent

Labels Doing Edit

Lock merge request Edit Unlocked

1 participant

Notifications

Reference: pmm-demo/spring-...

All the details about the changes come to this Merge Request.



Projects

Groups

Activity

Milestones

Snippets

Search or jump to...

10

1

S

spring-app-secure-1

Project

Repository

Issues2

Merge Requests1

CI / CD

Operations

Registry

Packages

Wiki

Snippets

Settings

License management detected no new licenses

Manage licenses

View full report

Merge

This is a Work in Progress

Resolve WIP status

Closes #1

You can merge this merge request manually using the [command line](#)

0

0

Discussion0

Commits3

Pipelines3

Changes1

Show comments only

WritePreview

B

I

Write a comment or drag your files here...

Markdown and quick actions are supported

Comment

Close merge request

Todo

Add todo

Assignee

Edit

No assignee - assign yourself

Milestone

Edit

None

Time tracking

No estimate or time spent

Labels

Edit

Doing

Lock merge request

Edit

Unlocked

1 participant

Notifications

Reference: pmm-demo/spring-...

You can see a diff of the changes.

spring-app-secure-1

Discussion 0 Commits 3 Pipelines 3 Changes

Changes between latest version and master

1 File +3 -3

Filter files

src/main/java/hello  
HelloController.java +3 -3

You can verify what changes were made.

```
src/main/java/hello/HelloController.java  
@@ -9,11 +9,11 @@ public class  
HelloController {  
9   @RequestMapping("/")  
10  public String index() {  
11      String style = "<style type='t  
ext/css' media='screen'>";  
12  -   style += "body { background-co  
lor: #6DB23E; position: fixed; top: 5  
0%; left: 50%; transform: translate(-5  
0%, -50%); color: white; font-size: 25  
0%; }";  
13      style += "</style>";  
14  
15  -   // TODO - Personalize this mes  
sage!  
16  -   String message = "Hello from S  
pring Boot!";  
17  
18      String body = "<body>" + messa  
ge + "</body>";  
19  
...  
@@ -9,11 +9,11 @@ public class  
HelloController {  
9   @RequestMapping("/")  
10  public String index() {  
11      String style = "<style type='t  
ext/css' media='screen'>";  
12  +   style += "body { background-co  
lor: #6b4fbb; position: fixed; top: 5  
0%; left: 50%; transform: translate(-5  
0%, -50%); color: white; font-size: 25  
0%; }";  
13      style += "</style>";  
14  
15  +   String message = "Hello from G  
itLab!!!";  
16  +   message += "<p><center><img sr  
c='https://gitlab.com/gitlab-com/gitla  
b-artwork/raw/master/logo/logo.png' al  
t='Tanuki' width='250'></center>";  
17  
18      String body = "<body>" + messa  
ge + "</body>";  
19  
...
```

- spring-app-secure-1
- Project
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- Merge Requests 1
- CI / CD
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- Settings

pmm-demo > spring-app-secure-1 > Merge Requests > !1

Open Opened 1 week ago by Dan Edit Close merge request

# WIP: Resolve "Add GitLab style to main page"

Closes #1

Request to merge 1-add-gitlab-style-... into master Open in Web IDE Check out branch

Pipeline #2791 passed with warnings for e6ea897e on 1-add-gitlab-style-... View app

Deployed to review/1-add-gitlab-styl... 1 week ago View app

No Approval required

Code quality improved on 1 point Expand

Security scanning (errors when loading results) detected 59 new vulnerabilities View full report Expand

License management detected no new licenses Manage licenses View full report

Take a look at the pipeline in graph layout