



zenika  
<animés par la passion>

# CG WM Developer Guide

Version 1.18-SNAPSHOT

2018-08-23

# Table of Contents

1. Introduction .....	3
2. Touring the interfaces .....	5
2.1. FusionForge .....	5
2.2. AsciiDocFX .....	6
2.3. Eclipse .....	7
2.4. Gerrit .....	8
2.5. Jenkins .....	9
2.6. SonarQube .....	10
2.7. Nexus .....	11
2.8. Integration Server .....	12
2.9. Elastic Stack .....	13
2.10. Jaeger tracing .....	14
2.11. Maven .....	15
3. Appendix .....	18
3.1. Revision marks .....	18

*Table 1. History*

Date	Author	Detail
2018-08-23	bcouetil	Initial commit

Table 2. References

Réf.	Ver.	Date	Document	Description
[01]	1.18-SNA PSH OT	2018-08-23	ci-pf-configuration.pdf	Configuration guide for the whole CI/CD platform
[02]	1.18-SNA PSH OT	2018-08-23	cgutils-utility-methods.pdf	CgUtils utility methods
[04]	1.18-SNA PSH OT	2018-08-23	cgutils-ano-handling.pdf	CgUtils ano handling
[05]	1.18-SNA PSH OT	2018-08-23	cgmsgtracker-user-manual.pdf	CgMsgTracker, UM/Broker documents tracker
[06]	1.18-SNA PSH OT	2018-08-23	cgelastic-user-manual	CgElastic, Elastic Stack custom webMethods module

# 1. Introduction



The purpose of this document is to guide you in the setup of the development environment for CG webMethods (CG-WM) project.

CG-WM gather is mainly composed of 3 projects :

- **cg-utils** (java 8)
  - utility java methods for any webMethods project (see [02])
  - includes asynchronous ano handling (see [03])
- **cg-msg-tracker** (java 8)
  - Swing application for monitoring Broker / Universal Messaging publish/subscribe documents
- **cg-elastic** (java 8)
  - Elastic Stack custom webMethods module for continuous monitoring

Developements on this project are heavily relying on the production line <https://cric.pl.s2-eu.nvx.com/> to implement Continuous Integration / Continuous Deployment / Continuous Performance Testing / Continuous Monitoring.

These projects are maintained in an Open Source mode within nvx. This can be voluntary to increase personnel knowledge, overall projects quality, or this can be part of a future or actual client need.

## How you think Open Source apps are maintained



## How Open Source apps are really maintained



CommitStrip.com

## 2. Touring the interfaces

### 2.1. FusionForge

[https://cric.pl.s2-eu.nvx.com/fusionforge/tracker/?atid=101&func=browse&group\\_id=6](https://cric.pl.s2-eu.nvx.com/fusionforge/tracker/?atid=101&func=browse&group_id=6)

Everything starts in FusionForge where tasks and tickets are put in decreasing order of need. But anyone can work on anything.

Home

My Page

Projects

Site Admin

Reporting

CG WM Tools

Summary

Admin

Activity

Tracker

Docs

News

Files

### TASKS

View Trackers

TASKS

Export CSV

Submit New

Reporting

Monitor

Administration

Add widgets

Customize Layout

Displaying results 1-52 out of 52 total. Displaying  results. [Change](#)

Advanced queries

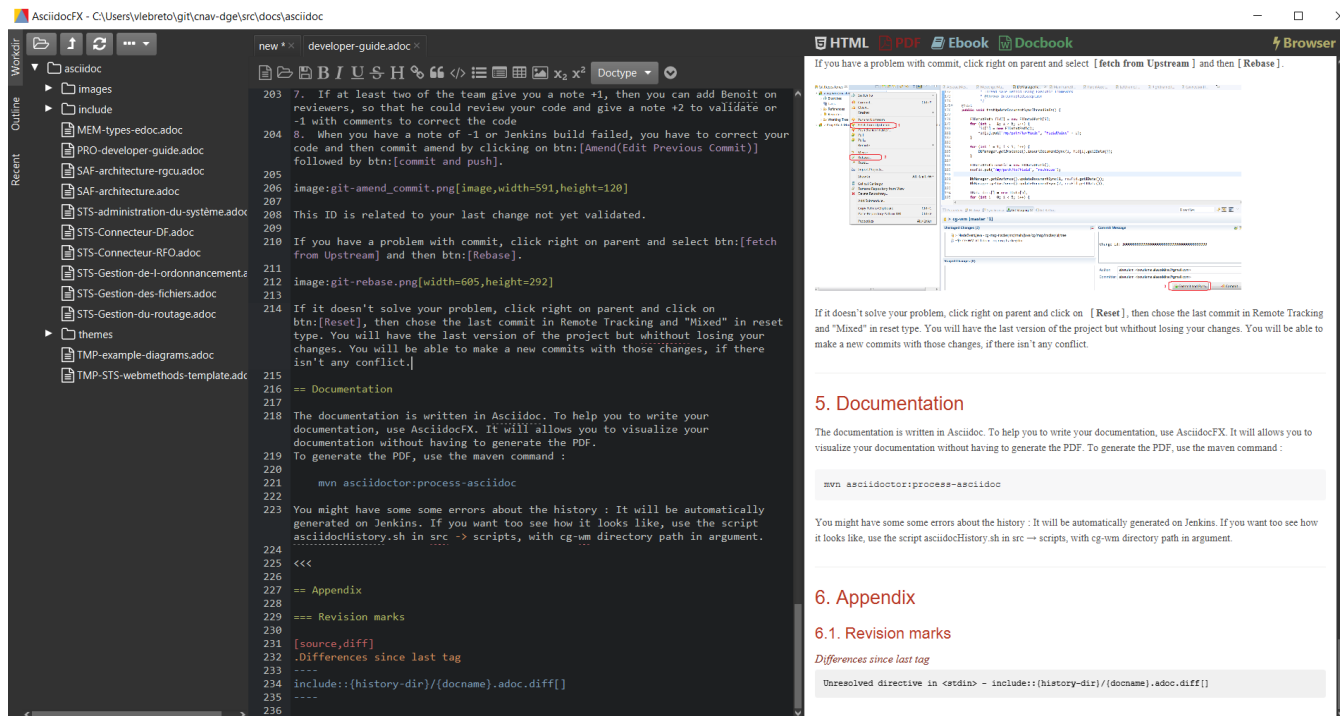
Simple Filtering and Sorting

Build Query

Id	Module	Summary	Assigned to	Submitted by	Priority
<input type="checkbox"/> 147	cg-msg-tracker	Bug to fix - search without name - republish on search - saving configuration	Nobody	Thomas BONNIN	5
<input type="checkbox"/> 149	cg-utils	CgUtils anomaly STATUSDATE null	Nobody	Benoit COUETIL	5
<input type="checkbox"/> 135	cg-msg-tracker	Export mensuel de ce backlog	Nobody	Benoit COUETIL	5
<input type="checkbox"/> 143	cg-msg-tracker	Save directory used when imported/exported connection and document	Nobody	Thomas BONNIN	5
<input type="checkbox"/> 142	cg-elastic	Install Mediator and plug it to Elasticsearch	Nobody	Benoit COUETIL	5
<input type="checkbox"/> 84	cg-msg-tracker	Popup on startup error	Nobody	Benoit COUETIL	5
<input type="checkbox"/> 141	cg-msg-tracker	Update developer guide for german colleagues	Benoit COUETIL	Benoit COUETIL	5
<input type="checkbox"/> 96	cg-elastic	Kibana on CgElastic homepage	Nobody	Benoit COUETIL	4
<input type="checkbox"/> 140	all	Change Capgemini logo in documentations	Nobody	Benoit COUETIL	4
<input type="checkbox"/> 153	cg-elastic	Nb of files + Nb of DB entries	Nobody	Benoit COUETIL	4
<input type="checkbox"/> 132	cg-msg-tracker	BUG1 import xml code non développé	Nobody	Benoit COUETIL	4

## 2.2. AsciiDocFX

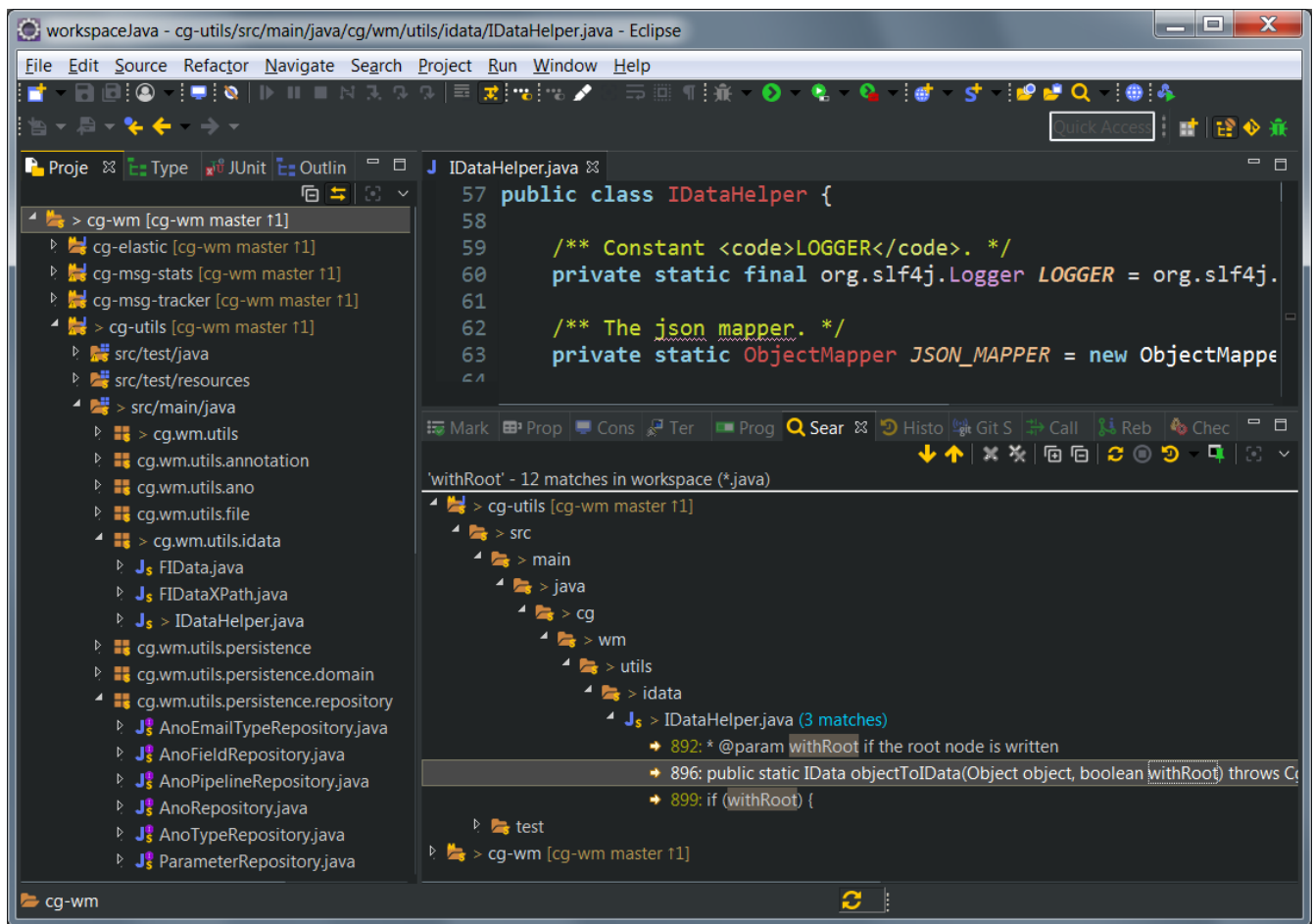
All documentations on the project, including this one, are written as part of DevOps principle Documentation-As-Code using AsciiDocFX and compiled with Asciidoctor under maven to produce PDF.





## 2.3. Eclipse

Eclipse is the preferred tool for development.



## 2.4. Gerrit

<https://cric.pl.s2-eu.nvx.com/gerrit/#/q/status:open>

ALLMYPROJECTSPEOPLEPLUGINSDOCUMENTATION

OpenMergedAbandoned

Change 578 - Needs Code-Review Label

Changement du nom des méthodes receiveAbtEntreeTR et receiveAbtEntreebatch

+ implémentation receiveAbtEntreeTRcrud

Change-Id: Ic532c9e0165e5d4873b7fcca7d69621ef5fedef1

Author: viebreto <vivien.le-breton@capgemini.com> Nov 16, 2017 11:28 AM

Committer: viebreto <vivien.le-breton@capgemini.com> Nov 20, 2017 5:09 PM

Commit: 08e85a49e069b698638278d9591c110dba53557f1 (gitweb)

Parent(s): 5c5d89be4bcd6f713e3271f7c19f1e7da4bc07a (gitweb)

Change-Id: Ic532c9e0165e5d4873b7fcca7d69621ef5fedef1

Conflicts With (1)

Minor changes

Owner: Vivien LE BRETON

Reviewers: Arnaud GIFFARD x Cedric LELION x Jenkins BPM-FACTORY x Marine BOUDARD x Othmane EL AJAJE x Rachid ABALINE x

Project: cnav-dge

Branch: master

Topic:

Strategy: Rebase if Necessary

Updated: 17 minutes ago

Cherry PickRebaseAbandon

Code-Review: -1 Marine BOUDARD x

Verified: +1 Jenkins BPM-FACTORY x

Files

File PathCommentsSize

Commit Message

dge-b2b-abt/src/main/java/cnav/isic/dge/b2b/abt/Constants.java11

dge-b2b-abt/src/main/java/cnav/isic/dge/b2b/abt/Controller.java45

dge-b2b-abt/src/main/java/cnav/isic/dge/b2b/abt/Generator.java15

dge-b2b-abt/src/main/java/cnav/isic/dge/b2b/abt/Receiver.java371

dge-b2b-abt/src/test/java/cnav/isic/dge/b2b/abt/ControllerTest.java20

dge-b2b-abt/src/test/java/cnav/isic/dge/b2b/abt/ReceiverTest.java49

dge-b2b-abt/src/test/resources/File/ABT\_ENTREE\_OK.xml46

dge-b2b-abt/src/test/resources/File/ABT\_ENTREE\_OK\_2.xml43

dge-b2b-abt/src/test/resources/File/ABT\_ENTREE\_echange\_empty\_all.xml44

dge-b2b-abt/src/test/resources/File/ABT\_ENTREE\_echange\_nbdocs\_not\_same.xml44

dge-b2b-abt/src/test/resources/File/ABT\_ENTREE\_echange\_null\_all.xml44

src/docs/asciidoc/STS-connecteur-abo.adoc10

src/test/shared-resources/config/packages/DgeCommons/errorLabel.properties4

src/test/shared-resources/create-schema.sql3

+407, -342

History

Expand All

Vivien LE BRETON Uploaded patch set 1. Nov 16 11:28 AM

Jenkins BPM-FACTORY Patch Set 1: Verified-1 Build Failed (jd\_d) https://bpmfactory.s2-eu.capgemini.com/jenkins/job/CNAV-DGE\_P1\_Review/1168/: ABORTED Nov 16 11:31 AM

Vivien LE BRETON Uploaded patch set 2: Patch Set 1 was rebased. Nov 16 11:34 AM

Jenkins BPM-FACTORY Patch Set 2: Verified-1 Build Failed (jd\_d) https://bpmfactory.s2-eu.capgemini.com/jenkins/job/CNAV-DGE\_P1\_Review/1169/: FAILURE Nov 16 11:46 AM

Vivien LE BRETON Uploaded patch set 3. Nov 17 2:27 PM

Vivien LE BRETON Uploaded patch set 4. Nov 17 2:32 PM

Jenkins BPM-FACTORY Patch Set 3: Verified-1 Build Failed (jd\_d) https://bpmfactory.s2-eu.capgemini.com/jenkins/job/CNAV-DGE\_P1\_Review/1175/: ABORTED Nov 17 2:33 PM

Collaborative Code Review is applied on the project inspired from open sources projects for better scalability, quality and developer localizations tackling.



## 2.5. Jenkins

<https://cric.pl.s2-eu.nvx.com/jenkins/>

Jenkins is used for both review and merge modes to automate build and deployment. As part of DevOps principle, Pipeline-As-Code are used. The Jenkins Blue sexy interface is deployed.

✓ DGE\_P2\_DeployToDev  
396

Pipeline

Modifications

Tests

Artefacts

↺

⚙️

📄

Déconnexion

✕

Branche: —

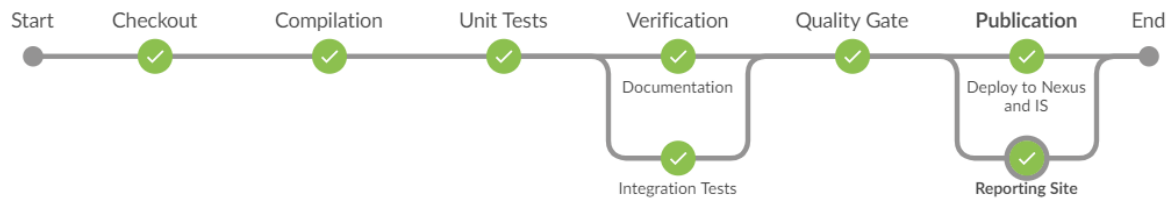
🕒 20m 22s

Modifications par benoit.couetil

Commit: —

🕒 3 hours ago

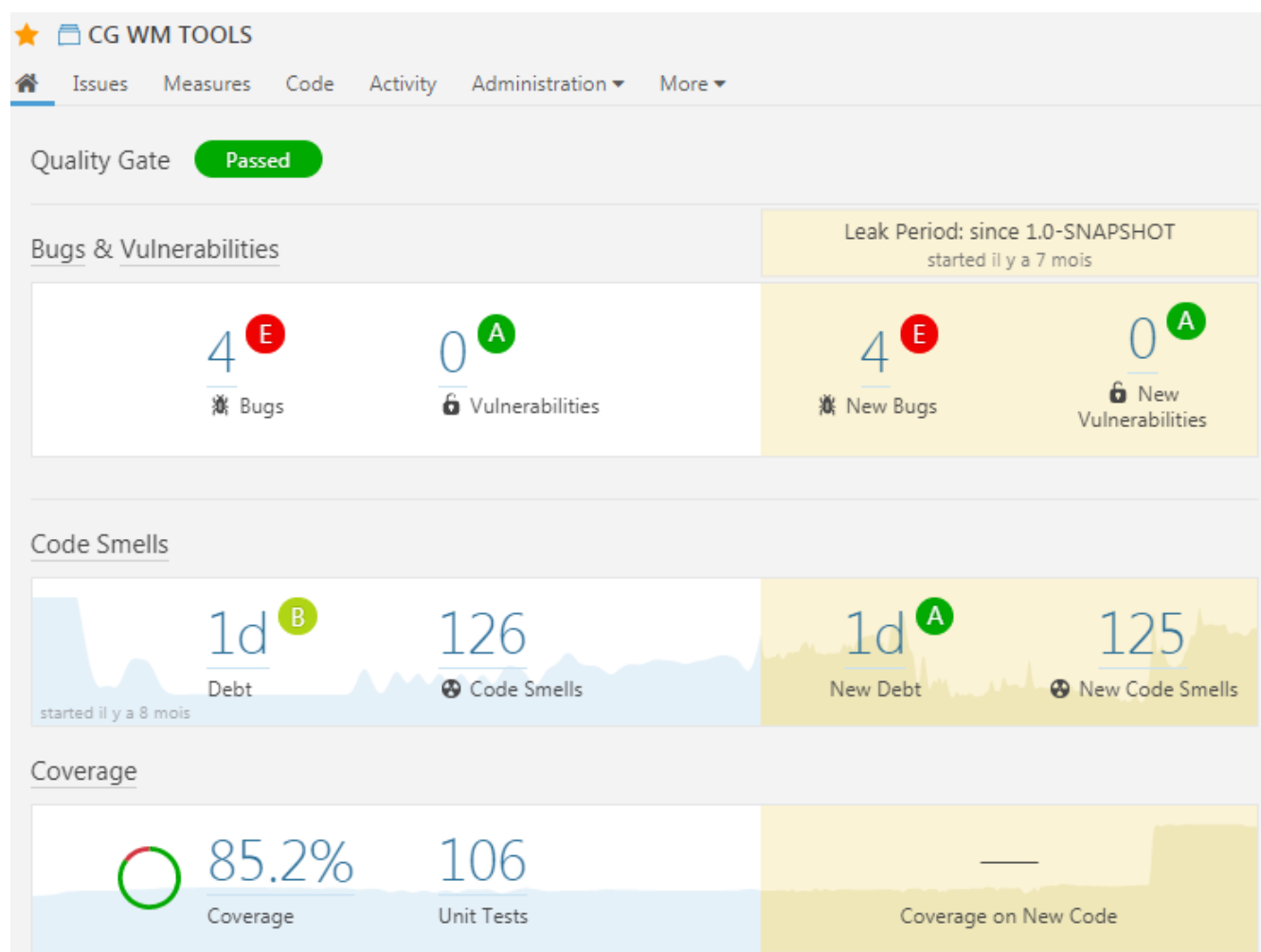
Lancé par un changement dans la base de code



## 2.6. SonarQube

<https://cric.pl.s2-eu.nvx.com/sonarqube/>

SonarQube helps maintain a continuous high quality with gateways used on each Jenkins pipeline.



## 2.7. Nexus

<https://cric.pl.s2-eu.nvx.com/nexus/>

Nexus stores binary produced on the project, SNAPSHOTs and RELEASES.

The screenshot displays the Nexus Repository Manager OSS web interface. The left sidebar contains navigation links for Sonatype™, Artifact Search, Views/Repositories, Security, Administration, and Help. The main content area is titled 'Repositories' and features a table of repository configurations. Below the table, there is a 'Snapshots' section with tabs for 'Browse Index', 'Browse Storage', 'Configuration', 'Routing', and 'Summary'. The 'Browse Storage' tab is active, showing a tree view of the snapshot hierarchy.

Repository	Type	Health Check	Format	Policy	Repository Status
Central	proxy	<b>ANALYZE</b>	maven2	Release	In Service
Central M1 shadow	virtual	<b>ANALYZE</b>	maven1	Release	In Service
Releases	hosted	<b>ANALYZE</b>	maven2	Release	In Service
Sites	hosted	<b>ANALYZE</b>	maven2	Release	In Service
Snapshots	hosted	<b>ANALYZE</b>	maven2	Snapshot	In Service
Sonatype Snapshots	proxy	<b>ANALYZE</b>	maven2	Snapshot	In Service
Wakaleo	proxy	0 0	maven2	Release	In Service

**Snapshots**

Browse Index | **Browse Storage** | Configuration | Routing | Summary

Refresh Path Lookup: [ ]

- Snapshots
  - cg
    - wm
      - cg-elastic
      - cg-msg-stats
      - cg-msg-tracker
      - cg-utils
      - cg-wm

## 2.8. Integration Server

<http://frpardge.corp.nvx.com:5555/>

A basic webMethods 9.12 ecosystem, including Integration Server, Oracle XE Database, CentraSite, Mediator, Universal Messaging, is accessible for development and tests. Assets are automatically deployed on merges by Jenkins.

**WEBMETHODS** Integration Server default :: frpardge.corp.capgemini.com :: Administrator

▼ **Server**

Scheduler

Service Usage

**Statistics**

► **Logs**

► **Packages**

► **Solutions**

► **Adapters**

► **webMethods Cloud**

► **Security**

► **Settings**

Server > Statistics

**Usage**

	Current	Peak	Limit
Total Sessions	<a href="#">84</a>	287	-
Licensed Sessions	0	1	2147483647
Stateful Sessions	0	1	2147483647
Service Instances	0	37	-
Service Threads	0	29	-
System Threads	<a href="#">478</a>	483	-
Uptime	10h:31m:25s		

**Memory**

Maximum	932352 KB		
Committed	792064 KB		
Used	507128 KB	65% (memory)	<div></div>
Free	284936 KB	35%	<div></div>

Memory Usage (average per hour)

## 2.9. Elastic Stack

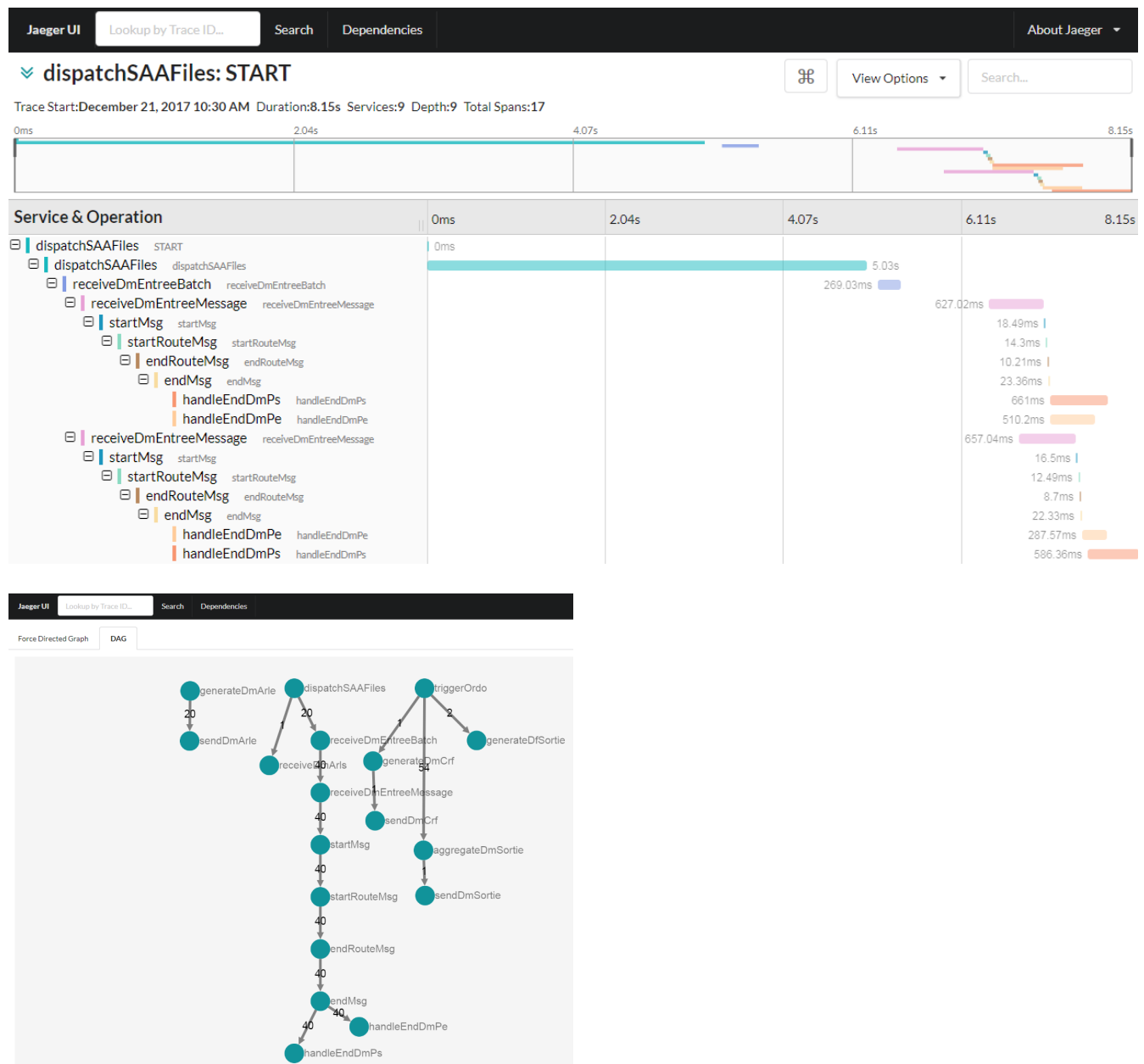
<http://frpardge:5601/app/kibana#/dashboard/44bbf690-ab4d-11e7-80b8-ef10d01e4f2a>

The Elastic Stack is used for Continuous Monitoring.



## 2.10. Jaeger tracing

<http://frpardge.corp.nvx.com:16686/>



CgUtils implements open-tracing, and send them to a Jaeger server. This allows a fine grained follow up on the business process level, a field where the Elastic Stack cannot go for now.



## 2.11. Maven

- Change the conf/setting.xml of the installed maven, by adding the below tags

```
<server>
  <id>nexus-local</id>
  <username>svc-fr-cric</username>
  <password>ESBpwd2018</password>
</server>
```

```
<mirrors>
  <mirror>
    <id>nexus-local</id>
    <mirrorOf>*</mirrorOf>
    <url>https://cric.pl.s2-eu.nvx.com/nexus3/repository/maven-public</url>
  </mirror>
</mirrors>
```

```
<profiles>
  <profile>
    <id>nexus-local</id>
    <repositories>
      <repository>
        <id>central</id>
        <url>http://central</url>
        <releases>
          <enabled>true</enabled>
        </releases>
        <snapshots>
          <enabled>true</enabled>
        </snapshots>
      </repository>
    </repositories>

    <pluginRepositories>
      <pluginRepository>
        <id>central</id>
        <url>http://central</url>
        <releases>
          <enabled>true</enabled>
        </releases>
        <snapshots>
          <enabled>true</enabled>
        </snapshots>
      </pluginRepository>
    </pluginRepositories>

    <properties>
      <snapshotUrl>https://cric.pl.s2-eu.nvx.com/nexus3/repository/maven-snapshots</snapshotUrl>
      <releaseUrl>https://cric.pl.s2-eu.nvx.com/nexus3/repository/maven-releases</releaseUrl>
    </properties>

  </profile>
</profiles>
```

```
<activeProfiles>
  <activeProfile>nexus-local</activeProfile>
</activeProfiles>
```

- Change the conf/setting.xml of the installed maven, by adding the below tags

```

<server>
  <id>nexus-local</id>
  <username>svc-fr-cric</username>
  <password>ESBpwd2018</password>
</server>

```

```

<mirrors>
  <mirror>
    <id>nexus-local</id>
    <mirrorOf>*</mirrorOf>
    <url>https://cric.pl.s2-eu.nvx.com/nexus3/repository/maven-public/</url>
  </mirror>
</mirrors>

```

```

<profiles>
  <profile>
    <id>nexus-local</id>
    <repositories>
      <repository>
        <id>central</id>
        <url>http://central</url>
        <releases>
          <enabled>>true</enabled>
        </releases>
        <snapshots>
          <enabled>>true</enabled>
        </snapshots>
      </repository>
    </repositories>

    <pluginRepositories>
      <pluginRepository>
        <id>central</id>
        <url>http://central</url>
        <releases>
          <enabled>>true</enabled>
        </releases>
        <snapshots>
          <enabled>>true</enabled>
        </snapshots>
      </pluginRepository>
    </pluginRepositories>

    <properties>
      <snapshotUrl>https://cric.pl.s2-eu.nvx.com/nexus3/repository/maven-snapshots/</snapshotUrl>
      <releaseUrl>https://cric.pl.s2-eu.nvx.com/nexus3/repository/maven-releases/</releaseUrl>
    </properties>
  </profile>
</profiles>

```

```

<activeProfiles>
  <activeProfile>nexus-local</activeProfile>
</activeProfiles>

```

- Change the conf/setting.xml of the installed maven, by adding the below tags

```

<server>
  <id>nexus-local</id>
  <username>svc-fr-cric</username>
  <password>ESBpwd2018</password>
</server>

```

```

<mirrors>
  <mirror>
    <id>nexus-local</id>
    <mirrorOf>*</mirrorOf>
    <url>https://cric.pl.s2-eu.nvx.com/nexus3/repository/maven-public/</url>
  </mirror>
</mirrors>

```

```

<profiles>
  <profile>
    <id>nexus-local</id>
    <repositories>
      <repository>
        <id>central</id>
        <url>http://central</url>
        <releases>
          <enabled>true</enabled>
        </releases>
        <snapshots>
          <enabled>true</enabled>
        </snapshots>
      </repository>
    </repositories>

    <pluginRepositories>
      <pluginRepository>
        <id>central</id>
        <url>http://central</url>
        <releases>
          <enabled>true</enabled>
        </releases>
        <snapshots>
          <enabled>true</enabled>
        </snapshots>
      </pluginRepository>
    </pluginRepositories>

    <properties>
      <snapshotUrl>https://cric.pl.s2-eu.nvx.com/nexus3/repository/maven-snapshots/</snapshotUrl>
      <releaseUrl>https://cric.pl.s2-eu.nvx.com/nexus3/repository/maven-releases/</releaseUrl>
    </properties>

  </profile>
</profiles>

```

```

<activeProfiles>
  <activeProfile>nexus-local</activeProfile>
</activeProfiles>

```

## 3. Appendix

### 3.1. Revision marks

*Differences since last tag*

