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| **Title** |
| SD-10-2100-2 S1PRO User Manual UM 1.0-DRAFT |

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| CMMI-SVC | CM |  |  |

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| SUMMARY |

The aim of this document is to provide information for operator's needs in the frame of Sentinel-1 Processing (S1PRO) subsystem of **Sentinel-1 Payload Data Ground Segment (S1 PDGS**) project in the cloud environment.

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| --- |
| CHANGE LOG |

|  |  |  |  |
| --- | --- | --- | --- |
| **Issue/Revision** | **Date** | **Change Requests** | **Observations** |
| 01 | 01 Jul 2019 |  |  |
| 01 | 09 Mar 2021 | S1PRO-2206 (MyOcean Cleaner) | Added Information regarding MyOcean Cleaner |
| 01 | 09 Mar 2021 | L1 Production | Added link to routing.xml for L1 Production Trigger |
| 01 | 09 Mar 2021 | Dissemination | Added configuration links for new Dissemination Pods |
| 01 | 09 Mar 2021 | Ingestion | Added configuration links for new QCSS Ingestion pod and EDIP pods |
| 01 | 09 Mar 2021 | QCSS Mocks | Removed configuration for QCSS mock pods |
| 01 | 12 May 2021 | Landmask File Update | Added pocedure for Landmask file update |
| 01 | 20 May 2021 | Ingestion, Dissemination | Updated QCSS pod configuration references |
| 01 | 08 Jun 2021 | EDIP Mocks | Added EDIP mock configuration |

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# Document properties

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| Approved by | **Nils Junike** *S1PRO Co-Product Owner* |
| Released by | **Faisal RAFI**  *S1PRO Project Manager* |
| Doc type | UM |
| No WBS | 2100 |
| CMMI Process | CM |

Document Summary

|  |  |
| --- | --- |
| Summary | The aim of this document is to provide information for operator's needs in the frame of Sentinel-1 Processing (S1PRO) subsystem of **Sentinel-1 Payload Data Ground Segment (S1 PDGS**) project in the cloud environment. |

# Document Change log

|  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
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| Change log | |  |  |  |  | | --- | --- | --- | --- | | **Issue/Revision** | **Date** | **Change Requests** | **Observations** | | 01 | 01 Jul 2019 |  |  | | 01 | 09 Mar 2021 | S1PRO-2206 (MyOcean Cleaner) | Added Information regarding MyOcean Cleaner | | 01 | 09 Mar 2021 | L1 Production | Added link to routing.xml for L1 Production Trigger | | 01 | 09 Mar 2021 | Dissemination | Added configuration links for new Dissemination Pods | | 01 | 09 Mar 2021 | Ingestion | Added configuration links for new QCSS Ingestion pod and EDIP pods | | 01 | 09 Mar 2021 | QCSS Mocks | Removed configuration for QCSS mock pods | | 01 | 12 May 2021 | Landmask File Update | Added pocedure for Landmask file update | | 01 | 20 May 2021 | Ingestion, Dissemination | Updated QCSS pod configuration references | | 01 | 08 Jun 2021 | EDIP Mocks | Added EDIP mock configuration | |

# Introduction

## SCOPE OF THE DOCUMENT

This document aims to provide the documentation of Sentinel-1 Processing Service in the cloud for the operator's needs.

## PRESENTATION OF THE DOCUMENT STRUCTURE AND CONTENTS

This document is structured as follow Chapter number Title Objectives and contents

|  |  |  |
| --- | --- | --- |
| **Chapter number** | **Title** | **Objectives and contents** |
| 1 | INTRODUCTION | This chapter presents the scope of the document and introduces its contents, in order to provide the reader with a road map into the document |
| 2 | APPLICABLE AND REFERENCE DOCUMENTS, ACRONYMS | This chapter contains references to the project documents and used acronyms. |
| 3 | OVERVIEW OF S1PRO SUBSYSTEM | This chapter introduces the system context and software design. |
| 4 | S1PRO CONFIGURATION | This chapter contains references to the S1PRO Configuration |
| 5 | S1PRO OPERATIONAL PROCEDURES | This chapter describes the operational procedures that Operator may need to perform i.e Landmask file ingestion, Kafka lag configuration, S3 upload multipart configurations etc. |
| 6 | S1PRO HOWTO's | This chapter describes scenarios for troubleshooting |
| Annex 1 |  |  |

Table 1 Document Structure

# Applicable and reference documents, acronyms

## APPLICABLE AND REFERENCE DOCUMENTS

### Applicable documents

Applicable documents are the documents that have been necessary formal inputs to the writing of this document.

|  |  |
| --- | --- |
| **Document ID** | **Document Title** |
| ECSS-M‐ST‐40C | Configuration and information management |
| S1PD-CR-ADST- 1000530589 | S1PD-CR-ADST-1000530589 |

Table 2 Applicable Documents

### Reference documents

|  |  |
| --- | --- |
| **Document Reference** | **Document Title** |
| SD-10-2100-1 | S1PRO Installation Manual |
| SD-133-2100 | S1 Core PDGS Glossary |

Table 3 Reference Documents

## ACRONYMS

The specific terminology and acronyms in this document are defined in SD-133-2100 S1PRO Glossary.

# 3 UM S1PRO High Level Architecture

## S1PRO Components

The S1PRO system is composed structurally by software modules which are split in three different type of components (or microservices):

* Trigger
* translate Event in Job based on rules
* could have REST interface to e.g. create on-demand Job
* Scaling-needs: low
* Worker
* execute Job à result in new Event or second-step-job
* Scaling-needs: high
* Jobs have status (running, failed, restart, …) but Events not
* Frontend components
* Provide REST interfaces for access to persistence (e.g. queries)
* Scaling-needs: low

The figure below depicts the components of S1PRO ( Please note that, as of now V3 , LTA-AIP is not implemented yet)

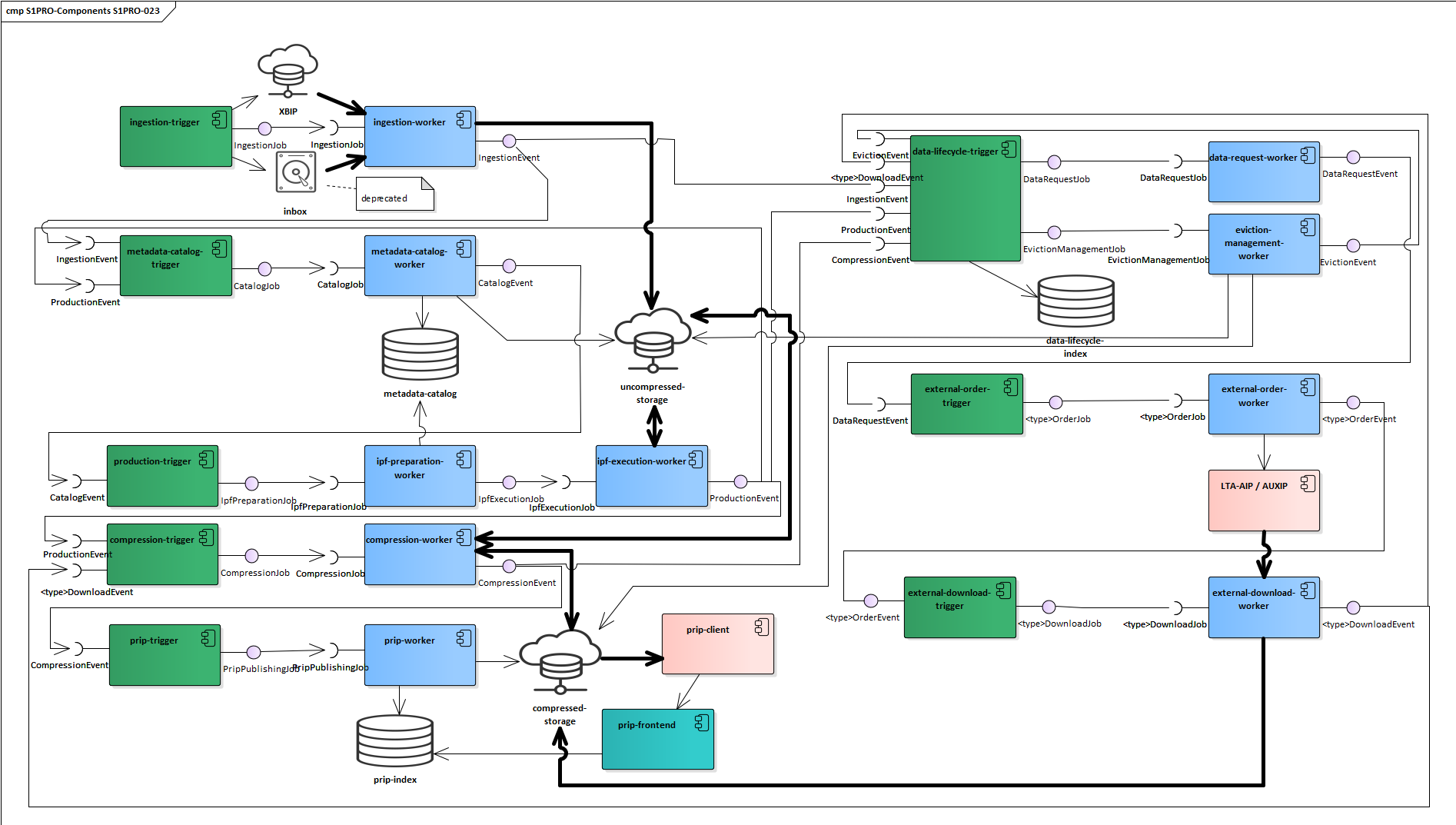


Figure 1 Component diagram

## S1PRO General Workflows

The S1PRO is responsible for processing chain from AIO, L0,L1, and L2 for S1 PDGS. The aim is to execute the processing chain in a Cloud environment by containerizing and orchestrating all the steps of the chain.

S1pro Ingestion-Trigger component polls XBIP interface (WebDAV) of the ground station and detects new files (CADU & DSIB). Once a new file is detected, an ingestion job is created and send to ingestion-workers.nAll the files of downloaded sessions are stored into object storage, and the description of all the files (metadata) is indexed in an Elasticsearch catalog. When a download of session is complete, an L0 AIO IPF Preparation Worker describes a job environment for execution of the AIO process. This job is sent through a message on a Kafka queue.

The L0 AIO IPF Execution Worker reads the message on the queue and creates the environment for execution of the Level AI0 process and launches it. When the Level AIO process finishes, the IPF Execution Worker analyses the results, copies the segment products into an object storage facility, indexes the product description and sends messages through Kafka queue to inform other components of the products availability.

Once the segments have been stored in the OBS (Object Storage) and in the metadata-catalog. Then a job is triggered for L0 Assembly & Slicing Processor (L0ASP). The workload for the Level 0 segment is constant. 2 instances of L0 segment processors are enough to handle the incoming workloads of Sentinel-1 satellites (S1A and S1B)

For the execution of the Level 1 and L2 process, the system is similar to the Level 0 one with:

* an IPF Preparation Worker which describes a job environment in a message queue
* an IPF Execution Worker of the Level 1/2 process which executes this process and publishes the output products.

For Level-2 there is an exception i.e the job is not generated only for the products that are located over the sea. The Production triggers before triggering a perform a check that if a product is located over the sea or not. This is performed by performing an intersection query in Elastic search again Landmask file.

Once the L0, L1, and L2 products are produced these are triggered to be compressed and made available via PRIP.

# 4 UM S1PRO Configuration

## 1 Base Configuration

|  |  |
| --- | --- |
| **Type** | **URL** |
| Base | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/00_s1pdgs_base/templates/00_config_base.yaml> |
| Products | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/00_s1pdgs_base/templates/01_config_products.yaml> |
| Environment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/00_s1pdgs_base/templates/02_config_environment.yaml> |
| Logging | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/00_s1pdgs_base/templates/03_config_logging.yaml> |
| XBIP | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/00_s1pdgs_base/templates/10_config_xbip.yaml> |
| AUXIP | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/00_s1pdgs_base/templates/13_config_auxip.yaml> |
| EDIP | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/00_s1pdgs_base/templates/15_config_edip.yaml> |
| Data Lifecycle | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/00_s1pdgs_base/templates/20_config_datalifecycle_retention.yaml> |
| S1PRO API | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/00_s1pdgs_base/templates/30_service_s1pro_api.yaml> |
| S1PRO ODIP | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/00_s1pdgs_base/templates/31_service_s1pro_odip.yaml> |

## 2 Ingestion

### Ingestion

#### Ingestion

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/63_ingestion/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/63_ingestion/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/63_ingestion/config/ingestion_trigger/application.yml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/63_ingestion/config/ingestion_worker/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/63_ingestion/config/mqi/application.yml> |

### QCSS Online Ingestion

#### QCSS Online Ingestion Trigger

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/96_qcss_online_ingestion_trigger/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/96_qcss_online_ingestion_trigger/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/96_qcss_online_ingestion_trigger/config/app/application.yml> |

#### QCSS Online Ingestion Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/96_qcss_online_ingestion_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/96_qcss_online_ingestion_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/96_qcss_online_ingestion_worker/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/96_qcss_online_ingestion_worker/config/mqi/application.yml> |

#### Contingency Ingestion

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/62_contingency_ingestion/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/62_contingency_ingestion/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/62_contingency_ingestion/config/ingestion_trigger/application.yml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/62_contingency_ingestion/config/ingestion_worker/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/62_contingency_ingestion/config/mqi/application.yml> |

### XBIP Ingestion

When configuring a new XBIP Ingestion Trigger for eg. CGS#4 or CGS#5 ensure that following configuration elements and parameters are set properly:

Set the desired values for the ingestion pickup in /s1pro-configuration/helm/00\_s1pdgs\_base/templates/10\_config\_xbip.yaml

After changing this file, the pod "s1pro-s1pdgs-base" needs to be re-deployed.

|  |
| --- |
| #CGS4  cgs4.host: "eg37235.psmanaged.com"  cgs4.path: "/"  cgs4.disableValiditation: "true"  cgs4.connectTimeoutSec: "60"  cgs4.programmaticRecursion: "false"  cgs4.enablePreemptiveAuthentication: "false"    #CGS5  cgs5.host: "cgs5.host.to.connect"  cgs5.path: "cgs5.path"  cgs5.disableValiditation: "true"  cgs5.connectTimeoutSec: "60"  cgs5.programmaticRecursion: "false"  cgs5.enablePreemptiveAuthentication: "false" |

The XBIP Ingestion Trigger Service configuration is preconfigured for CGS#4 and CGS#5 and is delivered. No need to change them (eg. /s1pro-configuration/helm/64\_ingestion\_xbip\_cgs[04/05]\_trigger/config/app/application.yml )

Ensure to set the secrets in /s1pro-configuration/templates/environment-specific.sh

|  |
| --- |
| export XBIP\_04\_SECRET\_NAME="xbip-cgs04";  export XBIP\_05\_SECRET\_NAME="xbip-cgs05";    export XBIP\_04\_USER="XXXX";  export XBIP\_04\_PASS="XXXX";  export XBIP\_05\_USER="XXXX";  export XBIP\_05\_PASS="XXXX"; |

Or if you do not use /s1pro-configuration/modules/secrets.sh script in order to load the secrets, ensure to add the secrets manually with the "kubectl create secret" command:

|  |
| --- |
| kubectl -n "${NAMESPACE\_PROCESSING}" create secret generic "xbip-cgs04" --from-literal=USER="${XBIP\_04\_USER}" --from-literal=PASS="${XBIP\_04\_PASS}";  kubectl -n "${NAMESPACE\_PROCESSING}" create secret generic "xbip-cgs05" --from-literal=USER="${XBIP\_05\_USER}" --from-literal=PASS="${XBIP\_05\_PASS}"; |

The secrets with the names "xbip-cgs04" and "xbip-cgs05" are referenced in the deployment.yaml of the XBIP Ingestion Trigger Services and are delivered (/s1pro-configuration/helm/64\_ingestion\_xbip\_cgs[04/05]\_trigger/templates/deployment.yaml. No need to change them.

Also they need to be set in the XBIP Ingestion Worker Service (/s1pro-configuration/helm/65\_ingestion\_xbip\_worker/templates/deployment.yaml). Also preconfigured and delivered:

|  |
| --- |
| containers:  - name: {{ .Release.Name }}  env:  - name: cgs4.user  valueFrom:  secretKeyRef:  name: xbip-cgs04  key: USER  - name: cgs4.pass  valueFrom:  secretKeyRef:  name: xbip-cgs04  key: PASS  - name: cgs5.user  valueFrom:  secretKeyRef:  name: xbip-cgs05  key: USER  - name: cgs5.pass  valueFrom:  secretKeyRef:  name: xbip-cgs05  key: PASS |

Set the dates to ignore files before a specific date and the station retention time in days (the minimum the ingestion trigger will keep data about pickup files persisted) in  /s1pro-configuration/helm/values.yaml

|  |
| --- |
| xbip:  bufferInputs: **false**  ignoreFilesBeforeDate:  cgs04: "2020-11-24T08:00:00.000Z"  cgs05: "2020-11-24T08:00:00.000Z"  stationRetentionTime:  cgs04: 7  cgs05: 7 |

Configure the AIO IPF Preparation Worker settings for the new stations: /s1pro-configuration/helm/42\_l0\_aio\_ipf\_preparation\_worker/config/app/application.yml (it is also preconfigured and delivered)

|  |
| --- |
| aiop:  # Configuration **for** Processing Station Name  station-codes:  cgs4: NSG\_  cgs5: INS\_  # Configuration **for** Dynamic Parameter PT\_Assembly  pt-assembly:  cgs4: "yes"  cgs5: "yes"  # Configuration **for** Dynamic Parameter Processing\_Mode  processing-mode:  cgs4: FAST24  cgs5: FAST24  # Configuration **for** Dynamic Parameter Reprocessing\_Mode  reprocessing-mode:  cgs4: FAST24  cgs5: FAST24  # Configuration **for** Dynamic Parameter TimeoutSec  timeout-sec:  cgs4: {{ .Values.preparator.aio.timeoutSec.cgs4 }}  cgs5: {{ .Values.preparator.aio.timeoutSec.cgs5 }}  # Configuration **for** Job Order Parameter Descramble  descramble:  cgs4: "yes"  cgs5: "yes"  # Configuration **for** Job Order Parameter RSEncode  rs-encode:  cgs4: "yes"  cgs5: "yes" |

In order to deploy new XBIP Ingestion Trigger Services add them in the deploy.sh script as follows to the HELM\_LIST\_TMP variable (/s1pro-configuration/templates/deploy.sh):

|  |
| --- |
| HELM\_LIST\_TMP="  64 YES s1pro-ingestion-xbip-cgs04-trigger ${HELM\_CHART\_VERSION} helm/64\_ingestion\_xbip\_cgs04\_trigger/values.yaml  64 YES s1pro-ingestion-xbip-cgs05-trigger ${HELM\_CHART\_VERSION} helm/64\_ingestion\_xbip\_cgs05\_trigger/values.yaml  " |

For CGS#4 this is already done and the corresponding XBIP Trigger Service will be deployed.

The XBIP Client configuration needs also an update when adding a new XBIP Ingestion Trigger for a new station. This is embedded in the java package and can't be changed after compilation but it is preconfigured also for CGS#4 and CGS#5 (/s1pro-core-xbip-client/src/main/resources/xbip.properties):

|  |
| --- |
| xbip.host\_configs[3].serverName = ${cgs4.host}  xbip.host\_configs[3].user = ${cgs4.user}  xbip.host\_configs[3].pass = ${cgs4.pass}  xbip.host\_configs[3].trustSelfSignedCertificate = ${cgs4.disableValiditation:**false**}  xbip.host\_configs[3].connect-timeout-sec = ${cgs4.connectTimeoutSec:10}  xbip.host\_configs[3].programmaticRecursion = ${cgs4.programmaticRecursion:**false**}  xbip.host\_configs[3].enablePreemptiveAuthentication = ${cgs4.enablePreemptiveAuthentication:**false**}    xbip.host\_configs[4].serverName = ${cgs5.host}  xbip.host\_configs[4].user = ${cgs5.user}  xbip.host\_configs[4].pass = ${cgs5.pass}  xbip.host\_configs[4].trustSelfSignedCertificate = ${cgs5.disableValiditation:**false**}  xbip.host\_configs[4].connect-timeout-sec = ${cgs5.connectTimeoutSec:10}  xbip.host\_configs[4].programmaticRecursion = ${cgs5.programmaticRecursion:**false**}  xbip.host\_configs[4].enablePreemptiveAuthentication = ${cgs5.enablePreemptiveAuthentication:**false**} |

#### XBIP CGS01 Trigger

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/64_ingestion_xbip_cgs01_trigger/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/64_ingestion_xbip_cgs01_trigger/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/64_ingestion_xbip_cgs01_trigger/config/app/application.yml> |

#### XBIP CGS02 Trigger

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/64_ingestion_xbip_cgs02_trigger/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/64_ingestion_xbip_cgs02_trigger/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/64_ingestion_xbip_cgs02_trigger/config/app/application.yml> |

#### XBIP CGS03 Trigger

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/64_ingestion_xbip_cgs03_trigger/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/64_ingestion_xbip_cgs03_trigger/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/64_ingestion_xbip_cgs03_trigger/config/app/application.yml> |

#### XBIP CGS04 Trigger

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/64_ingestion_xbip_cgs04_trigger/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/64_ingestion_xbip_cgs04_trigger/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/64_ingestion_xbip_cgs04_trigger/config/app/application.yml> |

#### XBIP CGS10 Trigger

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/64_ingestion_xbip_cgs10_trigger/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/64_ingestion_xbip_cgs10_trigger/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/64_ingestion_xbip_cgs10_trigger/config/app/application.yml> |

#### XBIP Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/65_ingestion_xbip_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/65_ingestion_xbip_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/65_ingestion_xbip_worker/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/65_ingestion_xbip_worker/config/mqi/application.yml> |

### AUXIP Ingestion

#### AUXIP Trigger

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/66_ingestion_auxip_trigger/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/66_ingestion_auxip_trigger/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/66_ingestion_auxip_trigger/config/app/application.yml> |

#### AUXIP Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/67_ingestion_auxip_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/67_ingestion_auxip_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/67_ingestion_auxip_worker/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/67_ingestion_auxip_worker/config/mqi/application.yml> |

#### Plan And Report Ingestion

##### Plan And Report Ingestion

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/68_plan_and_report_ingestion/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/68_plan_and_report_ingestion/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/68_plan_and_report_ingestion/config/ingestion_trigger/application.yml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/68_plan_and_report_ingestion/config/ingestion_worker/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/68_plan_and_report_ingestion/config/mqi/application.yml> |

#### EDIP Ingestion

Set the date to ignore files before a specific date and the station retention time in days (the minimum the ingestion trigger will keep data about pickup files persisted) in  /s1pro-configuration/helm/values.yaml

|  |
| --- |
| edip:  ignoreFilesBeforeDate: "2020-11-02T20:00:00.000Z"  stationRetentionTime: 7 |

##### EDIP BEDC Trigger

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/84_ingestion_edip_bedc_trigger/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/84_ingestion_edip_bedc_trigger/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/84_ingestion_edip_bedc_trigger/config/app/application.yml> |

##### EDIP BEDC Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/85_ingestion_edip_bedc_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/85_ingestion_edip_bedc_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/85_ingestion_edip_bedc_worker/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/85_ingestion_edip_bedc_worker/config/mqi/application.yml> |

##### EDIP PEDC Trigger

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/84_ingestion_edip_pedc_trigger/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/84_ingestion_edip_pedc_trigger/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/84_ingestion_edip_pedc_trigger/config/app/application.yml> |

##### EDIP PEDC Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/85_ingestion_edip_pedc_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/85_ingestion_edip_pedc_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/85_ingestion_edip_pedc_worker/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/85_ingestion_edip_pedc_worker/config/mqi/application.yml> |

## Applicative Catalog

### Applicative Catalog

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/30_app_catalog/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/30_app_catalog/templates/deployment.yaml> |
| Application | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/30_app_catalog/config/app/application.yml> |

## Metadata Catalog

### Metadata Catalog Trigger

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/31_metadata_catalog_trigger/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/31_metadata_catalog_trigger/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/31_metadata_catalog_trigger/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/31_metadata_catalog_trigger/config/mqi/application.yml> |

### Metadata Catalog Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/32_metadata_catalog_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/32_metadata_catalog_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/32_metadata_catalog_worker/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/32_metadata_catalog_worker/config/mqi/application.yml> |

## 5 L0 Production

### L0 AIO Production

#### L0 AIO Production Trigger

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/41_l0_aio_production_trigger/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/41_l0_aio_production_trigger/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/41_l0_aio_production_trigger/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/41_l0_aio_production_trigger/config/mqi/application.yml> |

#### L0 AIO Preparation Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/42_l0_aio_ipf_preparation_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/42_l0_aio_ipf_preparation_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/42_l0_aio_ipf_preparation_worker/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/42_l0_aio_ipf_preparation_worker/config/mqi/application.yml> |

#### L0 AIO Execution Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/52_l0_aio_ipf_execution_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/52_l0_aio_ipf_execution_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/52_l0_aio_ipf_execution_worker/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/52_l0_aio_ipf_execution_worker/config/mqi/application.yml> |

### L0 ASP Production

#### L0 ASP Production Trigger

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/43_l0_asp_production_trigger/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/43_l0_asp_production_trigger/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/43_l0_asp_production_trigger/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/43_l0_asp_production_trigger/config/mqi/application.yml> |

#### L0 ASP Preparation Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/44_l0_asp_ipf_preparation_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/44_l0_asp_ipf_preparation_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/44_l0_asp_ipf_preparation_worker/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/44_l0_asp_ipf_preparation_worker/config/mqi/application.yml> |

#### L0 ASP Execution Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/54_l0_asp_ipf_execution_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/54_l0_asp_ipf_execution_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/54_l0_asp_ipf_execution_worker/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/54_l0_asp_ipf_execution_worker/config/mqi/application.yml> |

## L1 Production

### L1 Production Trigger

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/45_l1_production_trigger/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/45_l1_production_trigger/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/45_l1_production_trigger/config/app/application.yml> |
| Routing | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/45_l1_production_trigger/config/app/routing.xml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/45_l1_production_trigger/config/mqi/application.yml> |

### L1 Preparation Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/46_l1_ipf_preparation_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/46_l1_ipf_preparation_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/46_l1_ipf_preparation_worker/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/46_l1_ipf_preparation_worker/config/mqi/application.yml> |

### L1 Execution Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/56_l1_ipf_execution_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/56_l1_ipf_execution_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/56_l1_ipf_execution_worker/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/56_l1_ipf_execution_worker/config/mqi/application.yml> |

## L2 Production

### L2 Production Trigger

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/47_l2_production_trigger/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/47_l2_production_trigger/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/47_l2_production_trigger/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/47_l2_production_trigger/config/mqi/application.yml> |

### L2 Preparation Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/48_l2_ipf_preparation_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/48_l2_ipf_preparation_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/48_l2_ipf_preparation_worker/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/48_l2_ipf_preparation_worker/config/mqi/application.yml> |

### L2 Execution Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/58_l2_ipf_execution_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/58_l2_ipf_execution_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/58_l2_ipf_execution_worker/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/58_l2_ipf_execution_worker/config/mqi/application.yml> |

## OBS Production

### OBS Production Trigger

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/59_obs_production_trigger/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/59_obs_production_trigger/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/59_obs_production_trigger/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/59_obs_production_trigger/config/mqi/application.yml> |

### OBS Preparation Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/60_obs_ipf_preparation_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/60_obs_ipf_preparation_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/60_obs_ipf_preparation_worker/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/60_obs_ipf_preparation_worker/config/mqi/application.yml> |

### OBS Execution Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/61_obs_ipf_execution_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/61_obs_ipf_execution_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/61_obs_ipf_execution_worker/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/61_obs_ipf_execution_worker/config/mqi/application.yml> |

## MBU Production

### MBU Production Trigger

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/87_mbu_production_trigger/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/87_mbu_production_trigger/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/87_mbu_production_trigger/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/87_mbu_production_trigger/config/mqi/application.yml> |

### MBU Preparation Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/88_mbu_ipf_preparation_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/88_mbu_ipf_preparation_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/88_mbu_ipf_preparation_worker/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/88_mbu_ipf_preparation_worker/config/mqi/application.yml> |

### MBU Execution Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/89_mbu_ipf_execution_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/89_mbu_ipf_execution_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/89_mbu_ipf_execution_worker/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/89_mbu_ipf_execution_worker/config/mqi/application.yml> |

## Compression

### Compression Trigger

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/74_compression_trigger/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/74_compression_trigger/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/74_compression_trigger/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/74_compression_trigger/config/mqi/application.yml> |

### Compression Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/75_compression_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/75_compression_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/75_compression_worker/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/75_compression_worker/config/mqi/application.yml> |

## PRIP Interface

### PRIP Frontend

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/78_prip_frontend/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/78_prip_frontend/templates/deployment.yaml> |
| Application | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/78_prip_frontend/config/app/application.yml> |

### PRIP Trigger

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/76_prip_trigger/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/76_prip_trigger/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/76_prip_trigger/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/76_prip_trigger/config/mqi/application.yml> |

### PRIP Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/77_prip_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/77_prip_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/77_prip_worker/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/77_prip_worker/config/mqi/application.yml> |

## Dissemination

### Disseminator FOS

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/33_disseminator_fos/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/33_disseminator_fos/templates/deployment.yaml> |
| Disseminator | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/33_disseminator_fos/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/33_disseminator_fos/config/mqi/application.yml> |

### Disseminator POD

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/33_disseminator_pod/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/33_disseminator_pod/templates/deployment.yaml> |
| Disseminator | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/33_disseminator_pod/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/33_disseminator_pod/config/mqi/application.yml> |

### Disseminator MP

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/34_disseminator_mp/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/34_disseminator_mp/templates/deployment.yaml> |
| Disseminator | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/34_disseminator_mp/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/34_disseminator_mp/config/mqi/application.yml> |

### Disseminator UNAV

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/34_disseminator_unav/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/34_disseminator_unav/templates/deployment.yaml> |
| Disseminator | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/34_disseminator_unav/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/34_disseminator_unav/config/mqi/application.yml> |

### QCSS Online Disseminator

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/96_qcss_online_disseminator/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/96_qcss_online_disseminator/templates/deployment.yaml> |
| Disseminator | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/96_qcss_online_disseminator/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/96_qcss_online_disseminator/config/mqi/application.yml> |

### QCSS Online Disseminator Geo (for L1 Slices)

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/96_qcss_online_disseminator_geo/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/96_qcss_online_disseminator_geo/templates/deployment.yaml> |
| Disseminator | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/96_qcss_online_disseminator_geo/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/96_qcss_online_disseminator_geo/config/mqi/application.yml> |

### QCSS Webserver Disseminator

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/96_qcss_webserver_disseminator/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/96_qcss_webserver_disseminator/templates/deployment.yaml> |
| Disseminator | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/96_qcss_webserver_disseminator/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/96_qcss_webserver_disseminator/config/mqi/application.yml> |

### Disseminator ERRMAT

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/36_disseminator_errmat/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/36_disseminator_errmat/templates/deployment.yaml> |
| Disseminator | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/36_disseminator_errmat/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/36_disseminator_errmat/config/mqi/application.yml> |

### MBU Dissemination Trigger

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/94_mbu_dissemination_trigger/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/94_mbu_dissemination_trigger/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/94_mbu_dissemination_trigger/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/94_mbu_dissemination_trigger/config/mqi/application.yml> |

### MBU Dissemination Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/95_mbu_dissemination_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/95_mbu_dissemination_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/95_mbu_dissemination_worker/config/app/application.yml> <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/templates/environment-specific.sh> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/95_mbu_dissemination_worker/config/mqi/application.yml> |

## MyOcean Service

### MyOcean Trigger

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/80_myocean_trigger/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/80_myocean_trigger/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/80_myocean_trigger/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/80_myocean_trigger/config/mqi/application.yml> |

### MyOcean Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/81_myocean_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/81_myocean_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/81_myocean_worker/config/app/application.yml> <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/templates/environment-specific.sh> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/81_myocean_worker/config/mqi/application.yml> |

### MyOcean Cleaner (K8s cronjob)

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/82_myocean_cleaner/values.yaml> <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/82_myocean_cleaner/templates/cronjob.yaml> |
| Cleaner | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/82_myocean_cleaner/config/app/application.yml> |

## Request Repository

### Request Repository

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/91_request_repository/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/91_request_repository/templates/deployment.yaml> |
| Application | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/91_request_repository/config/app/application.yml> |

## Queue Watcher

### Queue Watcher

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/92_queue_watcher/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/92_queue_watcher/templates/deployment.yaml> |
| Application | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/92_queue_watcher/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/92_queue_watcher/config/mqi/application.yml> |

## Data Lifecycle

### Data Lifecycle Trigger

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/70_datalifecycle_trigger/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/70_datalifecycle_trigger/templates/deployment.yaml> |
| Trigger | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/70_datalifecycle_trigger/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/70_datalifecycle_trigger/config/mqi/application.yml> |

Configure the offset (shortended eviction date = now + offset) for the update of the retention time of uncompressed L1 products after compression in the global values.yaml:

|  |
| --- |
| dataLifecycle:   retentionTimeUpdate:     offsetInHoursL1: 6 |

To configure the nominal retention times for all product families see [1 Base Configuration](#scroll-bookmark-20).

### Data Request Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/70_data_request_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/70_data_request_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/70_data_request_worker/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/70_data_request_worker/config/mqi/application.yml> |

### Eviction Management Worker

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/70_eviction_management_worker/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/70_eviction_management_worker/templates/deployment.yaml> |
| Worker | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/70_eviction_management_worker/config/app/application.yml> |
| MQI | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/70_eviction_management_worker/config/mqi/application.yml> |

## Validation

### Validation

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/93_validation/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/93_validation/templates/deployment.yaml> |
| Application | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/93_validation/config/app/application.yml> |

## On Demand Interface

### On Demand Interface Provider

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/90_on_demand_interface_provider/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/90_on_demand_interface_provider/templates/deployment.yaml> |
| Application | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/90_on_demand_interface_provider/config/app/application.yml> |

## Report

### Report

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/83_report/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/83_report/templates/deployment.yaml> |
| Application | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/83_report/config/app/application.yml> |

## 20 Mocks

### Webdav CGS01 Mock

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/98_mock_webdav_cgs01/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/98_mock_webdav_cgs01/templates/deployment.yaml> |

### Webdav CGS02 Mock

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/98_mock_webdav_cgs02/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/98_mock_webdav_cgs02/templates/deployment.yaml> |

### Webdav CGS03 Mock

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/98_mock_webdav_cgs03/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/98_mock_webdav_cgs03/templates/deployment.yaml> |

### Webdav CGS10 Mock

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/98_mock_webdav_cgs10/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/98_mock_webdav_cgs10/templates/deployment.yaml> |

### Dissemination Mock

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/99_mock_dissemination/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/99_mock_dissemination/templates/deployment.yaml> |

### Mock EDIP BEDC

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/99_mock_edip_bedc/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/99_mock_edip_bedc/templates/deployment.yaml> |

### Mock EDIP PEDC

|  |  |
| --- | --- |
| **Type** | **URL** |
| Values | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/99_mock_edip_pedc/values.yaml> |
| Deployment | <https://gitlab.s1pdgs.eu/werum/processing/s1pro-configuration/blob/master/helm/99_mock_edip_pedc/templates/deployment.yaml> |

# 5 UM S1PRO Operational Procedures

## Kafka Lag Based Partitioner

### Configuration

The configuration of the new balancing mechanism can be done within the producer part of the mqi config:

For Example (compression-trigger):

|  |
| --- |
| kafka:  [...]  producer:  lag-based-partitioner:  delay-seconds: 180  consumer-group: compression-worker  topics-with-priority:  t-pdgs-compression-jobs-nrt: 10  t-pdgs-compression-jobs-fast: 5  t-pdgs-compression-jobs-pt: 20 |

Only when this config is present, the lag based partitioner will be activated.  
It will look then onto the given topics and the offsets of the given consumer group and calculate the lags.  
The given priorities will be used for the lag calculation as discussed above.

When activated, the LagBasedPartitioner will start the PartitionLagFetcher which will periodically fetch the lags.

### How it works

When activated, the LagBasedPartitioner will start the PartitionLagFetcher which will periodically fetch the lags.  
When debug logging is activated, it will log the lags for given partitions as follows (excerpt):

|  |
| --- |
| {t-pdgs-compression-jobs-nrt=[  ConsumerLag{clientId='s1pro-compression-worker-1', topic='t-pdgs-compression-jobs-nrt', partition=2, committedOffset=11, latestOffset=11, lag=0},  ConsumerLag{clientId='s1pro-compression-worker-1', topic='t-pdgs-compression-jobs-nrt', partition=0, committedOffset=1, latestOffset=1, lag=0},  ConsumerLag{clientId='s1pro-compression-worker-0', topic='t-pdgs-compression-jobs-nrt', partition=3, committedOffset=5, latestOffset=5, lag=0},  ConsumerLag{clientId='s1pro-compression-worker-0', topic='t-pdgs-compression-jobs-nrt', partition=1, committedOffset=2, latestOffset=2, lag=0}],    t-pdgs-compression-jobs-fast=[  ConsumerLag{clientId='s1pro-compression-worker-1', topic='t-pdgs-compression-jobs-fast', partition=1, committedOffset=24, latestOffset=25, lag=1},  ConsumerLag{clientId='s1pro-compression-worker-1', topic='t-pdgs-compression-jobs-fast', partition=3, committedOffset=19, latestOffset=19, lag=0},  ConsumerLag{clientId='s1pro-compression-worker-0', topic='t-pdgs-compression-jobs-fast', partition=0, committedOffset=17, latestOffset=19, lag=2},  ConsumerLag{clientId='s1pro-compression-worker-0', topic='t-pdgs-compression-jobs-fast', partition=2, committedOffset=14, latestOffset=15, lag=1}],    t-pdgs-compression-jobs-pt=[  ConsumerLag{clientId='s1pro-compression-worker-0', topic='t-pdgs-compression-jobs-pt', partition=3, committedOffset=3, latestOffset=3, lag=0},  ConsumerLag{clientId='s1pro-compression-worker-0', topic='t-pdgs-compression-jobs-pt', partition=1, committedOffset=1, latestOffset=1, lag=0},  ConsumerLag{clientId='s1pro-compression-worker-1', topic='t-pdgs-compression-jobs-pt', partition=2, committedOffset=8, latestOffset=8, lag=0},  ConsumerLag{clientId='s1pro-compression-worker-1', topic='t-pdgs-compression-jobs-pt', partition=0, committedOffset=4, latestOffset=4, lag=0}]} |

The LagBasedPartitioner then calculates the partition-based upon this data (including intermediate commits during fetches).

Example log:

|  |
| --- |
| 2020-10-29T08:08:27.224 | DEBUG | e.s.c.m.k.LagBasedPartitioner [qtp1226020905-519]: calculated partition 3 **for** new message on topic t-pdgs-compression-jobs-fast  2020-10-29T08:08:28.739 | DEBUG | e.s.c.m.k.LagBasedPartitioner [qtp1226020905-493]: calculated partition 1 **for** new message on topic t-pdgs-compression-jobs-fast |

If no data is available it will fall back to the default partitioner

## Landmask File Update

This is a procedure for updating the Landmask file.

1. Disable L2 production with setting replicas=0 for the L2 production trigger

|  |
| --- |
| kubectl -n processing scale sts s1pro-l2-production-trigger --replicas=0 |

After the command, the pod 's1pro-l2-production-trigger' should not be running.

1. Delete Landmask metadata with the following two commands. Both elasticsearch indices need to be cleaned: 'landmask' and 'msk\_\_land\_'

|  |
| --- |
| curl -H 'Content-Type: application/json' -XPOST 'http://elasticsearch-trace-elasticsearch-coordinating-only.monitoring.svc.cluster.local:9200/landmask/\_delete\_by\_query' -d '{"query":{"match\_all":{}}}'  curl -H 'Content-Type: application/json' -XPOST 'http://elasticsearch-trace-elasticsearch-coordinating-only.monitoring.svc.cluster.local:9200/msk\_\_land\_/\_delete\_by\_query' -d '{"query":{"match\_all":{}}}' |

1. Delete Landmask file from OBS. If the Landmask filet to ingest is the same file that was ingested before, the file needs also be deleted from the Objectstore. If the new file has a different filename, it can remain in the OBS ( but we propose to delete for the sake of consistency).

|  |
| --- |
| s3cmd rm s3://werum4-auxiliary-files/S1\_\_OPER\_MSK\_\_LAND\_\_V20140403T210200\_G20200914T080808.EOF  s3cmd rm s3://werum4-auxiliary-files/S1\_\_OPER\_MSK\_\_LAND\_\_V20140403T210200\_G20200914T080808.EOF.md5sum |

1. Ingest new Landmask file. Put the Landmask file into the /data/inbox/AUX directory on the Ingestion Trigger of the pod 's1pro-contingency-ingestion-0'

|  |
| --- |
| kubectl exec -ti s1pro-contingency-ingestion-0 -c ingestion-trigger -- bash  bash-4.4# cd /data/inbox/  bash-4.4# cp -l S1\_\_OPER\_MSK\_\_LAND\_\_V20140403T210200\_G20200914T080808.EOF AUX |

1. Check kafka topic 't-pdgs-other-catalog-events' for the catalog event that contains the name of the Landmask file in the 'productName'-attribute. If not available yet, wait for it at least 2 minutes.

|  |
| --- |
| kafka t-pdgs-other-catalog-events nofollow |grep S1\_\_OPER\_MSK\_\_LAND\_\_V20140403T210200\_G20200914T080808.EOF |

1. Verify Landmask metadata.

|  |
| --- |
| curl -H 'Content-Type: application/json' -XGET 'http://elasticsearch-trace-elasticsearch-coordinating-only.monitoring.svc.cluster.local:9200/msk\_\_land\_/\_search'  curl -H 'Content-Type: application/json' -XGET 'http://elasticsearch-trace-elasticsearch-coordinating-only.monitoring.svc.cluster.local:9200/landmask/\_search' |

1. Enable L2 production with setting replicas=1 for the L2 production trigger

|  |
| --- |
| kubectl -n processing scale sts s1pro-l2-production-trigger --replicas=1 |

## Ingestion Trigger Configuration (FTP)

For Ingestion Triggers using the FTP Interface for ingestion (**type: edip**). A new parameter was introduced: **ftp-directory-listing**

It ensures that for directory products like Plan & Report QC files that only one job is generated for the Ingestion Worker. Default value is false and it is only used at the moment for ingestion of Plan & Report QC files in the QCSS context and is set to **true**. For "non"-directory files or session files in the context of EDIP it is not necessary to set this parameter.

|  |
| --- |
| # Ingestion Trigger config  ingestion-trigger:  polling:  - directory: {{ .Values.qcss.ingestion.directory }}  # Filename regex **for** matching files  matchRegex: ^S1[AB\_]\_OPER\_REP\_QC.{4}\_MPC\_\_.\*$  # Enables only listing of directories via FTP (**default** = **false**)  ftp-directory-listing: **true**  # Filename regex **for** ignoring files  ignoreRegex: (^\..\*|.\*\.tmp$|db.\*|^lost\+found$)  # Kafka topic to put the ingestion jobs **for** the worker  topic: t-pdgs-qcss-ingestion-jobs  # Product family accociated with the file to be ingested  family: PLAN\_AND\_REPORT  # Ingestion type to select (possible values "edip", "prip")  type: edip |

## Invalid File Handling of Ingestion Pod

In case non expected file is put in inbox, ingestion trigger reports "File x is ignored by filter" and added to persistence so that is not handled any more in next polling. The file is not handled any further (no ingestion to bucket "invalid") and is removed from persistence when it is removed manually form the inbox.

## S3 OBS Upload Configuration

Since version 3.32.0 of the S1PRO processing software the S3 upload implementation has changed to support parallel multi-part upload to S3 OBS storage.

In order to work this way, each data to be uploaded has to be present on disk as file first. This means that for example the ingestion workers have to download ingestion packages before they can be uploaded to the S3 OBS storage. For full performance the cache directory for this purpose is mounted as tmpfs file system which is actually a ram disk which shares the allocated memory with the containers on the same pod.

Sharing the overall memoray allocated by kubernetes to the pod with the running container (ingestion-worker, execution-worker, etc.) means that the memory requests and limits for that container has to be well chosen.

|  |
| --- |
| **Note**  The ram disk is mounted as emptyDir volume into the pod: See <https://kubernetes.io/docs/concepts/storage/volumes/#emptydir> for more information. |

### Example:

The ingestion-xbip-worker is responsible for ingesting  / uploading session files into the S3 OBS storage. It is expected that session files are at most about the size of 1 GB. The size of the upload cache volume has to be big enough to temporarily store one session. If for example the size of the volume is set to 1.5GB this means that 1.5GB of memory is not available for the ingestion-worker itself. So the requested memory for this container should be high enough to fulfill the needs of the upload cache volume as well as the minimal requested memory for the ingestion worker. So the the memory request value should be volume size + minmal requested container memory usage.

Default configuration for the ingestion-xbip-worker (values.yaml):

ingestion\_xbip\_worker:  
 cpu:  
 request: "300m"  
 limit: "1300m"  
 ram:  
 request: "3500Mi"  
 limit: "4000Mi"  
 javaOpts:  
 #xms: "256m"  
 xmx: "2048m"  
 uploadCache:  
 location: "/opt/s3/uploadCache"  
 medium: "Memory"  
 size: "1500Mi"

The software is delivered with a well chosen configuration. However the configuration can be adjusted if necessary. The following section shows all imported parameters to configure the OBS upload.

The configuration parameter have following meaning:

|  |  |
| --- | --- |
| **Parameter** | **Meaning** |
| ram.request | Sets the absolute minimum of memory this container requires to be scheduled on a specific node |
| ram.limit | Sets the absolute maximum of memory this container will use. If this value exceed, the container will be restarted |
| javaOpts.xms | Set the memory allocation used by the java application on start time |
| javaOpts.xmx | Sets the maxmum memory to be used by the java application. |
| uploadCache.size | Sets the size of memory to be allocated for the ramdisk |

|  |
| --- |
| **Note**  If ram.limit is set it has to be ensured that this is not exceeded by the running application. Ensure that this value is at least the size of uploadCache.size + javaOpts.xmx. |

### Configure the upload

The parallel upload can be configured using the following parameter in the s1pdgs-config configmap.

# Transfer manager configuration  
# Default size threshold for when to use multipart uploads: default 16 \* MB (1024 \* 1024)  
transfer-manager\_multipart-upload-threshold-mb: "100"  
# Default minimum part size for upload parts: default 5 \* MB (1024 \* 1024)  
transfer-manager\_minimum-upload-part-size-mb: "50"

See [1 Base Configuration](#scroll-bookmark-20) for more details.

### Disable Parallel Multi Part Upload

The parallel multi part upload can be disabled by setting the transfer-manager\_multipart-upload-threshold-mb to a high value.

## Configuration of Priorities

Related configuration file: s1pro-configuration/helm/32\_metadata\_catalog\_worker/config/app/application.yml

Timeliness information is initially computed by the Mission Planning subsystem which uses the information available in the OBMEMC (On Board Memory Configuration) to elaborate the Packet Store (PS) number in which the telemetry is stored on board. A copy of this information is stored statically in the metadata catalog configuration file.

|  |
| --- |
| mdextractor:  packet-store-types:  S1A-0: Emergency  S1A-1: Emergency  S1A-2: RFC  S1A-49: GPS  [...]  S1A-50: Filler  S1B-0: Emergency  S1B-1: Emergency  S1B-2: RFC  [...]  S1B-50: Filler |

Mapping from PacketStoreType to Timeliness:

|  |
| --- |
| mdextractor:  packetstore-type-timelinesses:  Emergency: PT  HKTM: NRT  NRT: NRT  GPS: NRT  PassThrough: PT  Standard: FAST24  RFC: FAST24  WV: FAST24  Filler: FAST24  Spare: FAST24 |

Ordering of the timeliness priority

|  |
| --- |
| mdextractor:  timeliness-priority-from-high-to-low:  - PT  - NRT  - FAST24 |

# 6 UM S1PRO HOWTOs

|  |
| --- |
| DISTRIBUTION LIST |

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
|  | Corporate use | Project Limited |  | Configured |
| Internal Classification |  |  |  | X |

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| ESA | Info. | Action |  | AIRBUS D&S | Info. | Action |
| DESBOUILLONS Franck |  | X |  | ALACEVICH Roberto |  | X |
| GRIMONT Patrick | X |  |  | BUTHEAU Grégory | X |  |
| ROSICH Betlem | X |  |  | GUEYTRON Aline (ASTEK) |  | X |
|  |  |  |  | CUQ Pierre |  | X |
|  |  |  |  | GAVA Virginie |  | X |
|  |  |  |  | LEBRET Emmanuel |  | X |
|  |  |  |  | LECONTE Nicolas |  | X |
|  |  |  |  | MAURY Roland |  | X |
|  |  |  |  | MOILLARD Emmanuelle |  | X |
|  |  |  |  | MUNIER Bernard | X |  |
|  |  |  |  | PARMENTIER Mylène |  | X |
|  |  |  |  | THOMAS Kévin |  | X |
|  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
| C-S | Info. | Action |  | WERUM | Info. | Action |
| BOUISSON Cyrille |  | X |  | BERNHARDT Knut |  |  |
| BALDUCCI Adrien |  | X |  | COLAK Birol |  |  |
| DEVIGNOT Olivier | X |  |  | EDELMANN Jan-Marco |  |  |
| RECULEAU Serge | X |  |  | KAISER Fritz |  | X |
|  |  |  |  | KESSLER Torben |  | X |
|  |  |  |  | RAFI Faisal |  | X |
|  |  |  |  | STIEGE Lutz |  | X |
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