# Software Heritage HMIN201 - M1 TER

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Introduction

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## Description de Software Heritage

summarize Description de Software Heritage du rapport

## Contexte du TER

summarize Description de Software Heritage du rapport

### Le diaspora du code source Problématique

summarize diaspora du code source du rapport

### La fragilité du code source Problématique

summarize La fragilité du code source du rapport

# Software Heritage en tant que solution Problématique

summarize Software Heritage en tant que solution du rapport

# Notre contribution Problématique

summarize Notre contribution du rapport

## Analyse

# Fonctionnement de Software Heritage Analyse

## Modèle des données Fonctionnement de Software Heritage

- summarize Plateformes d'hébergement de code source
- summarize artefacts logiciels
- summarize informations de provenance
- summarize structure de données
- summarize Identifieurs intrinsèques

### Architecture et flot de données

#### Fonctionnement de Software Heritage

- use the conceptual architecture figure to explain the data flow
- summarize listing
- summarize loading
- summarize their implementation
- summarize scheduler
  - 1. summarize role of scheduling
  - 2. summarize components of scheduling (runner and listener)
  - 3. summarize strategies of scheduling
- sequence diagrams

## L'archive de Software Heritage

Fonctionnement de Software Heritage

- summarize archive
- concrete architecture to explain other components

### Méthodologie Analyse

- display lister class hierarchy and explain classes and their relations
- list candidates (Open Hub, Assembla, ...)
- summarize acceptation constraints of target plateform through table
- summarize Launchpad and launchpadlib and use the figure

### Conception

summarize conception using the figure

### Implémentation et tests

- using launchpadlib
- jupyter notebook (not sure if we actually need that)
- show example of JSON responses for entries and collections
- summarize launchpad model with respect to the model class hierarchy of SWH (make a figure of models hierarchy)
- summarize mapping using the figure
- discuss the created classes (show listers class hierarchy with launchpad integrated again)
- summarize lister implementation details (PATH TEMPLATE)
- summarize the tasks created
- summarize unittest, mocks, tox, and pytest tools
- summarize the testing architecture of swh (make a figure of tests hierarchy)
- summarize LaunchpadListerTester and the unit tests
- summarize the test of the local instance of SWH (Docker,

#### Résultats

either create a table to summarize tests (or snapshot of the unit tests results using pytest)

## Pull Requests

## Test d'intégration

### Conclusion

## Difficultés rencontées Conclusion

- summarize SourceForge API problems
- summarize First model attempt
- summarize instability and documentation of SWH

## Perspectives Conclusion

summarize Perspectives in report