

# RA Development

## The project structure

RA component is located in **frms-platform** GIT repository. To checkout from Arbonaut GIT server:

```
http://vserver3:9009/scm/git/frms-platform
```

```
build
datamodel
frms-context
frms-report-app
  features
    org.formis.nfis.desktop.feature
    org.formis.nfis.desktop.product
  plugins
    org.formis.nfis.desktop
frms-syncclient
frms-test
```

Components are managed as Maven modules.

FRMS Reporting Application is an Eclipse e4 application built in the top of Eclipse Platform.

Current Eclipse SDK: **Eclipse Neon 3**

**org.formis.nfis.desktop** is a single plugin with business tailored logic.

**org.formis.nfis.desktop.feature** as a feature describing all OSGI bundles - dependencies.

**org.formis.nfis.desktop.product** is a location where RMS Report product configuration is and also place where Maven Tycho builds FRMS RA product as a ready application.

## Configuration

There is a single configuration file where credentials to connect to local (and optionally to online) databases located in **org.formis.nfis.desktop** plugin:

```
/org.formis.nfis.desktop/config/frms.properties
```

If configuration in built RA component should be changed then this file can be found at:

```
Reports\plugins\org.formis.nfis.desktop_2.0.0.201709121200\config\frms.properties
```



Version of a plugin may have a different value: `_2.0.0.201709121200`

## Prepare Eclipse IDE development Environment

Configure Eclipse SDK in Eclipse IDE

```
Window -> Preferences -> Plug-In Development -> Target Platform -> Add..
```

Specify path to SDK resources extracted from ZIP file.



Eclipse Neon 3 SDK is located at FTP server:

```
FTP> Eclipse SDK\Eclipse-Neon3-SDK-win32.zip
```

## Configure and build projects

Load the following projects into Eclipse from frms-platform repository:

**/frms-platform** (parent Maven project)

**/frms-platform/frms-report-app/plugins/org.formis.nfis.desktop** (main FRMS RA plugin)

**/frms-platform/frms-report-app/features/org.formis.nfis.desktop.feature** (feature FRMS RA product is composed from)

Execute Maven goals to prepare development of RA in Eclipse IDE:

```
frms-platform> mvn --projects frms-context,frms-test --also-make clean install

frms-platform> mvn -f frms-report-app\plugins\org.formis.nfis.desktop\pom-lib.xml clean validate
```

At this stage Maven using commands above builds and installs locally artifact **frms-context** and also loads from Internet (from public Maven repositories) dependencies into directory

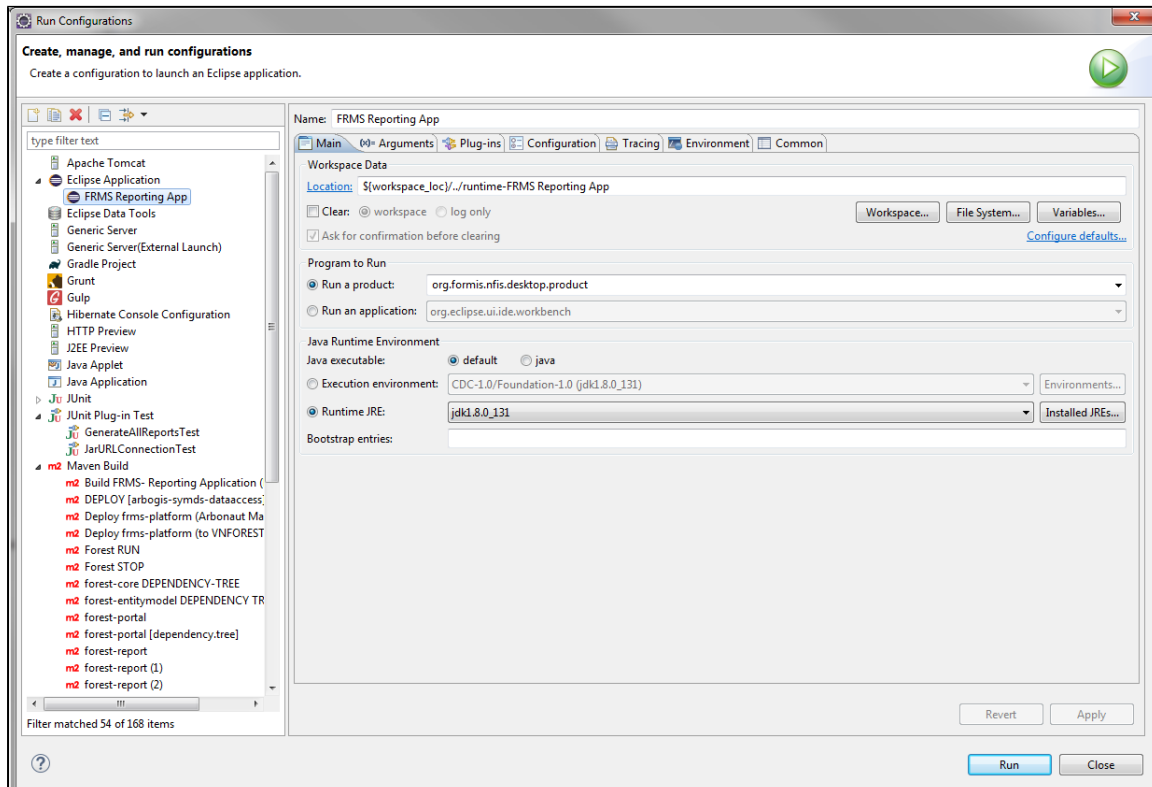
```
/frms-platform/frms-report-app/plugins/org.formis.nfis.desktop/libs
```

Now plugin **org.formis.nfis.desktop** can be built in Eclipse IDE.

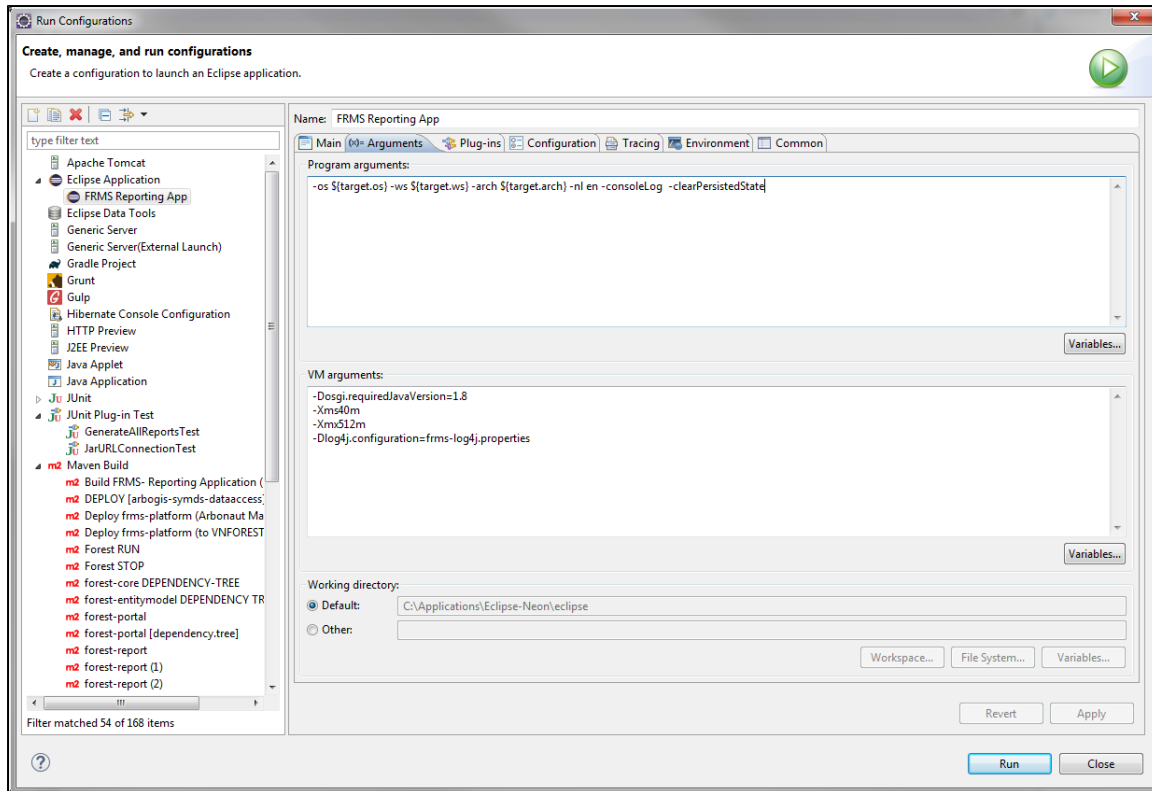
## Launch configuration

Create launch configuration as follows:

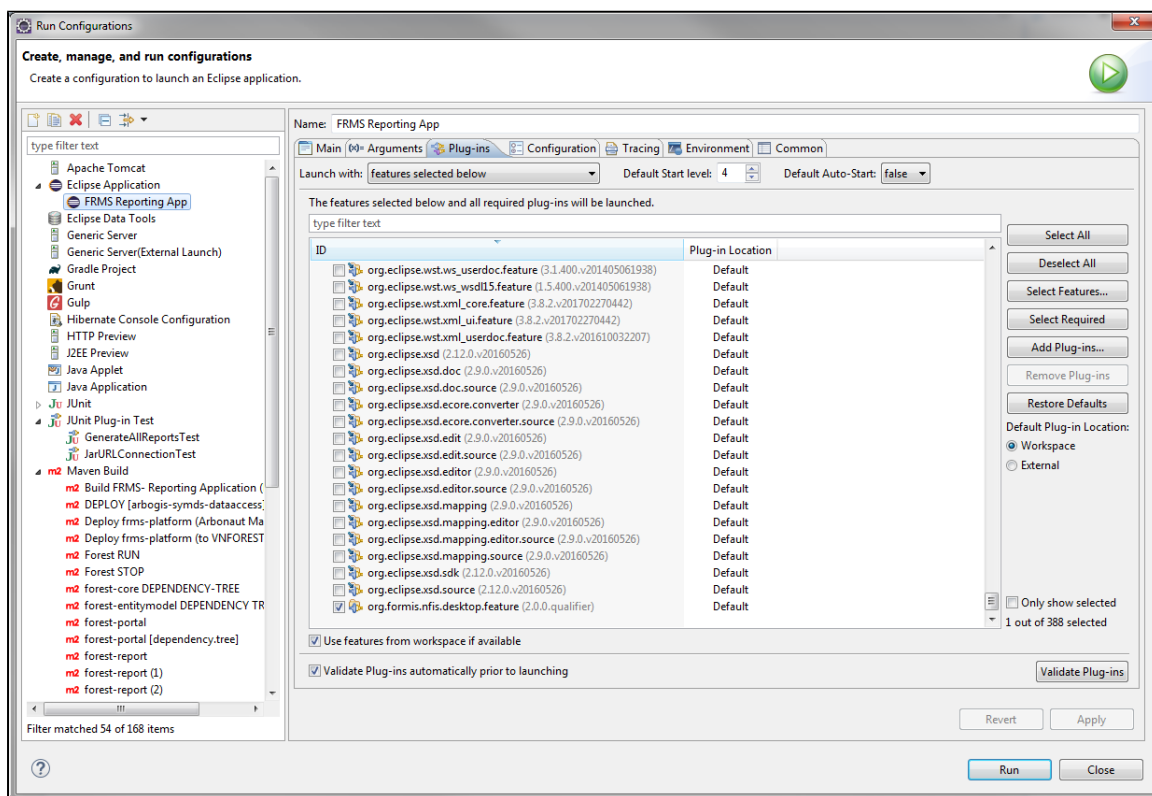
### Main



### Arguments



## Plug-Ins



Run product. Of course, local database must be running :)

## Build by Maven Tycho

In order to build the RA component (FRMS Reporting Application) run several Maven commands within a working copy of **frms-platform** repository.



Build frms-context and other modules which are dependencies for RA:

```
frms-platform> mvn --projects frms-context,frms-test --also-make clean install
```

★ Download and place JAR dependencies to `org.formis.nfis.desktop\libs` directory:

```
frms-platform> mvn -f frms-report-app\plugins\org.formis.nfis.desktop\pom-libs.xml clean validate
```

★ Build RA product by Maven Tycho plugin:

```
frms-platform> mvn -f frms-report-app\pom.xml clean install
```

As a result you get ready FRMS RA component at location:

```
/frms-platform/frms-report-app/features/org.formis.nfis.desktop.product/target/products/org.formis.nf
```

## CI at Jenkins

Also FRMS RA component is configured at Jenkins CI server to be fully built and deployed to `\\dell-test\Powerline2\FRMS Vietnam\FRMS-2.0\ClientPackage-Components\RA`:

```
http://vserver3:8090/jenkins/job/FRMS-RA/
```

Nightly building process is configured.