THALES

EGF Exercices – EMF – UC2
EGF 0.2.5

Benoît Langlois – Thales/EPM

Understanding basic EMF generation with EGF

Correction of the exercices

▶ Download the org.eclipse.egf.usecase.emf.uc2-egf0.2.5.zip file on the EGF wiki

▶ Use the libray model and project in the org.eclipse.emf.examples.library.zip file

Prerequisite

▶ Installation of Eclipse 3.5.2 or Eclipse 3.6 and egf 0.2.5

▶ Read the EGF Tutorial

▶ Read the « reuse and customization » EGF tutorial

▶ Read the « EMF Generation Patterns » EGF tutorial

▶ Understand the « EMF-UC1 » use case

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Problem Statement

▶ Writing a factory component which applies an EMF generation with patterns for a given genmodel file

▶ Indications:

    ▶ Start from the UC EMF UC1 / Exercice #2

    ▶ Create the « Viewpoint container » and « Domain viewpoint » if they don't exist, and create a Domain URI element which refers a genmodel

    ▶ Invoke the « EMF [Model | Edit | Editor] Pattern » factory component with the domain URI element as parameter

Learning

▶ Understanding a simple EMF generation with patterns

Difficulty

▶ 2/5

Correction

▶ EMF_Library_UC2_1.fcore

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Problem Statement

▶ The set and get feature methods must be created for Writer. On the other hand, it would be useful to know the books of a library and the stock of a library.

▶ Indications:

  ▶ Create four patterns: 1) for Writer and Library, 2) for generating the get and set methods. The get/set patterns inherit from the « Class.getGenFeature.TODO.override » and « Class.setGenFeature.TODO.override » patterns.

  ▶ In the preCondition, write the precondition to apply the pattern

  ▶ In a doGenerate method, write the get/set generation code

  ▶ Invoke « EMF [Model | Edit | Editor] Pattern » factory component. For the Model, add a pattern substitution. This is a list of three substitution [super-pattern EMF pattern] / [pattern created for overriding]

Learning

▶ Understanding a customization of the EMF generation with patterns

Difficulty

▶ 3/5

Correction

▶ EMF_Library_UC2_2.fcore

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