Model-Driven Engineering, VT2018

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General remarks

The course Model-Driven Engineering uses a common theme for most assignments and for all groups. Consequently, the assignments build on each other and also the delivered reports will be extended by each assignment.

Remarks for all assignment deliverables

- *State the authors of the deliverable (the group members)*
- *Correct language use, no grammar or spelling errors*
- *Reference and describe all figures/tables in the text*
- *Figures and graphs should be readable from a quality perspective*
- *Reference literature in your text where appropriate*
- *Define non-obvious acronyms*
- *The deliverable should be easily readable, understandable and complete*
- *Give arguments for your decisions (also using references)*
- *Show critical thinking*
- *Be prepared to get frustrated if something does not work as you think it should.*

Note

This assignment is intended to get you started. **Do not take it too easy**, as we will expect that you understand the tooling and can use it in the following weeks. This is a course on the Master's level and we expect you to be able to read up on anything you need for yourself.

Assignment 1 – Intro:

A. Getting to know the software tools

Deadline for hand-in via PingPong: 26th Jan 2017, 23:55 (CET)

The goal of this first, simple assignment is to install and get the tools running which you will use throughout the course. Download and install the Eclipse Oxygen 2 Modeling Tools (Make sure you don't take the normal Eclipse version): http://www.eclipse.org/downloads/packages/eclipse-modeling-tools/oxygen2

Install XText, EcoreTools, and OCLTools in your Eclipse installation, do this via Help -> Install Modeling Components.

Checkout the code repository from http://mdsebook.org. When starting Eclipse, set the workspace directory to the checked out directory. In Eclipse, import the project mdsebook.mindmap into the workspace (File -> Import -> Existing Projects into Workspace). Only import mdsebook.mindmap; you could also import more, but since many of the other projects require Scala, you might get many build errors.

Your task is to generate the so-called tree editor and use this tree editor to create a simple model (instance) of the MindMap language defined in the project mdsebook.mindmap. The tree editor is the simplest editor (and easiest to generate) for any language created in the Eclipse Modeling Framework (EMF). We will later create nicer editors.

Generate the editor by opening the file model/mindmap.genmodel. On the root node, choose Generate All from the context menu. This will, among others, create a project called mdsebook.mindmap.editor.

Launch the editor by choose Run-As -> Eclipse Application from the context menu of this editor project. This will launch an Eclipse instance that has quite many plugins (you could remove some not needed plugins in the launch configuration), but especially the generated editor plugins.

In the launched Eclipse instance, create a new project (choose just Project as the project type). In the project, create a new mindmap model by choosing, from the project's context menu, New -> Other, and there select MindMapLanguage Model. In the following wizard, when asked about the Model Object, choose Model.

In the editor, create an example Mindmap that has at least 7 topics, some of which should be nested. Use the Properties view (on any node, choose Show Properties View from the context menu) to set properties of each node.

Deliverable

- The file containing your mindmap model.