

Summary

Project Name

Patterns

Project Repository

<https://github.com/Lukeekul/wahlzeit>

Project CI

<https://travis-ci.org/Lukeekul/wahlzeit>

Current Tag

adap-hw11 on master

Diff to last tag

<https://github.com/Lukeekul/wahlzeit/compare/adap-hw10...Lukeekul:adap-hw11>

Overview

- Adding new Classes *Pattern*, *PatternType* and *PatternManager* in package *org.wahlzeit.model*
- Adding new member *m_type* to Class *PatternPhoto*
- Amending Creation of *PatternPhoto* with *Typename*
- Adding small Test Case for *PatternPhoto* and *PatternType*

Details

Implementation of Pattern Class

- Members of this Class are protected *PatternType* and *ID*, which can only be set by the Constructor
- Getter Methods for *Id* (*getId*) and *PatternType* (*getType*) are implemented

Implementation of PatternType Class

- The private Member *m_name* represents the name of the Type and has its own getter method (*getTypeAsString*)
- The protected Member *m_superType* represents the SuperType of the Type, its default is null. It has its own getter (*getSuperType*) and setter (*setSuperType*) methods

- For Subtypes a protected HashSet `m_subTypes` is implemented into which every new subtype of the instance has to entered in. This can be done with the methode `addSubType`. The methode `isSubtype` checks wheter `m_superType` is null, therefore the instance is not a subType. By given a Pattern instance, the methode `hasInstance` checks wheter this given instance of Pattern has set a `PatternType`. The methode `getSubTypeIterator` returns an iterator to the member `subTypes` and the methode `createInstance` returns a new Pattern instance.

Implementation of PatternManager Class

- The PatternManager takes care of the creation of new Pattern, by putting them into its private HasMap by assuring that the Id of the Pattern instances are consecutive.

Test

- A simple Test Case (`testPatternType`) in `ValueTests` asserts that the set Types at object creation are the same as attached to the objects.