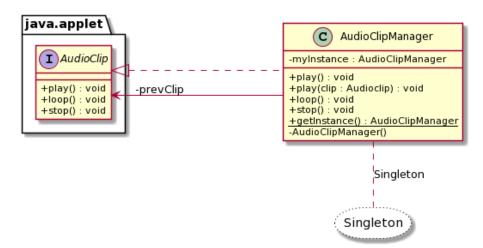
# Softwaretechnologie, Übung 7

#### HENRY HAUSTEIN

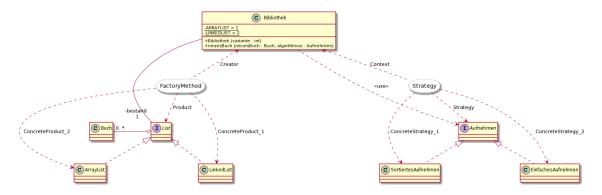
### Aufgabe 1

- (a) kein gleichzeitiges Abspielen, nur eine Instanz des des AudioClipManagers (realisiert durch privaten Constructor)
- (b) Singleton
- (c) UML-Diagramm



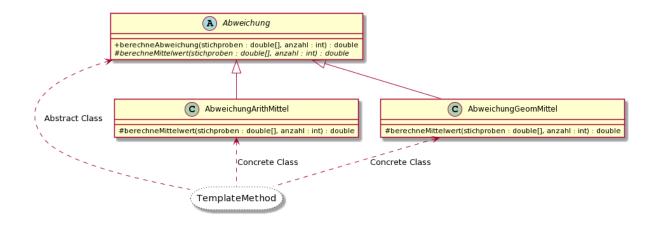
### Aufgabe 2

- (a) FactoryMethod, Strategy
- (b) UML-Diagramm



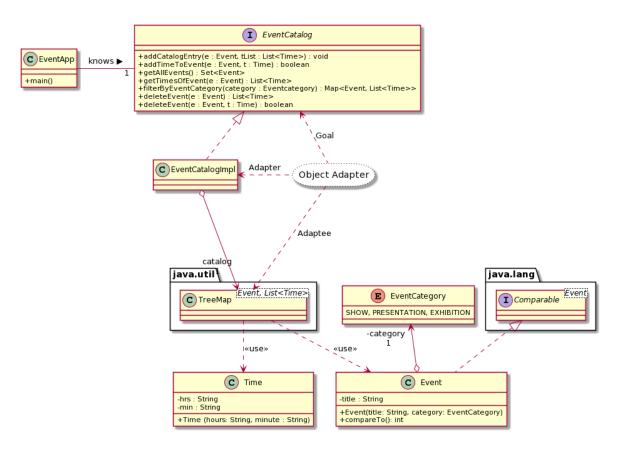
### Aufgabe 3

- (a) TemplateMethod
- (b) UML-Diagramm



## Aufgabe 4

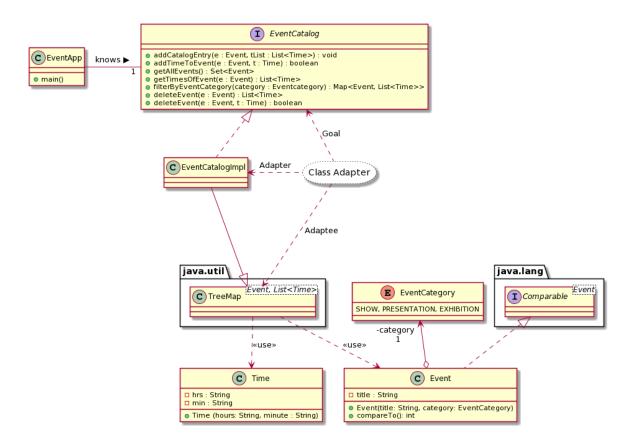
(a) UML-Diagramm für den ObjectAdapter



#### Implementierung

```
class EventApp {
     public static void main(String args[]) {
 3
        EventCatalog eventCatalog = new EventCatalogImpl();
       Set < Event > allEvents = eventCatalog.getAllEvents();
 4
     }
5
6
   }
   interface EventCatalog {
     public Set < Event > getAllEvents();
9
10
11
   class EventCatalogImpl implements EventCatalog {
12
     Map < Event , List < Time >> catalog = new TreeMap <> ();
13
14
     public Set < Event > getAllEvents() {
15
       return catalog.keySet();
16
17
18 }
```

#### (b) UML-Diagramm für den Klassenadapter



Implementierung

```
1 class EventApp {
public static void main(String args[]) {
       EventCatalog eventCatalog = new EventCatalogImpl();
4
       Set < Event > all Events = eventCatalog.getAll Events();
5 }
6 }
7
8 interface EventCatalog {
9 public Set < Event > getAllEvents();
10 }
11
12 class EventCatalogImpl implements EventCatalog extends TreeMap
       <Event, List<Time>> {
public Set<Event> getAllEvents() {
14    return keySet();
15 }
16 }
```