```
2 package acme.features.manager.assignment;
 4import java.util.Collection;
 5 import java.util.HashSet;
 6 import java.util.Set;
 7import java.util.stream.Collectors;
9 import org.springframework.beans.factory.annotation.Autowired;
10 import org.springframework.stereotype.Service;
11
12 import acme.client.data.models.Dataset;
13 import acme.client.services.AbstractService;
14 import acme.entities.project.Assignment;
15 import acme.features.manager.project.ManagerProjectRepository;
16 import acme.roles.Manager;
17
18@Service
19 public class ManagerAssignmentListService extends AbstractService<Manager,
  Assignment> {
20
21
      // Internal state
22
23
      @Autowired
24
      private ManagerProjectRepository repository;
25
26
   // AbstractService interface
27
28
29
      @Override
30
    public void authorise() {
31
          boolean status;
32
          int masterId;
33
          masterId = super.getRequest().getData("masterId", int.class);
34
          Manager manager = this.repository.findManagerByProjectId(masterId);
35
          status = super.getRequest().getPrincipal().getActiveRoleId() ==
36
  manager.getId();
37
38
          super.getResponse().setAuthorised(status);
39
      }
40
41
      @Override
42
      public void load() {
          int id = super.getRequest().getData("masterId", int.class);
43
44
          Collection<Assignment> objects =
  this.repository.findAllAssignmentsOfAProjectById(id).stream().distinct
  ().collect(Collectors.toList());
```

```
objects = this.deleteDuplicated(objects);
45
46
47
          super.getResponse().addGlobal("masterId", id);
          super.getBuffer().addData(objects);
48
      }
49
50
51
      @Override
      public void unbind(final Assignment assignment) {
52
53
54
          assert assignment != null;
55
56
          Dataset dataset;
57
          dataset = super.unbind(assignment, "project", "userStory");
58
59
60
          dataset.put("projectTitle", assignment.getProject().getTitle());
          dataset.put("userStoryTitle", assignment.getUserStory().getTitle());
61
62
63
          int masterId = super.getRequest().getData("masterId", int.class);
64
          super.getResponse().addGlobal("masterId", masterId);
65
          super.getResponse().addData(dataset);
66
67
68
      }
69
      private Collection<Assignment> deleteDuplicated(final
70
  Collection<Assignment> objects) {
          Set<String> uniquePairs = new HashSet<>();
71
          return objects.stream().filter(assignment -> {
72
73
              String pair = assignment.getProject() + "-" +
  assignment.getUserStory();
              if (uniquePairs.contains(pair))
74
                  return false;
75
76
              else {
                  uniquePairs.add(pair);
77
78
                  return true;
79
          }).collect(Collectors.toList());
80
      }
81
82
83 }
84
```