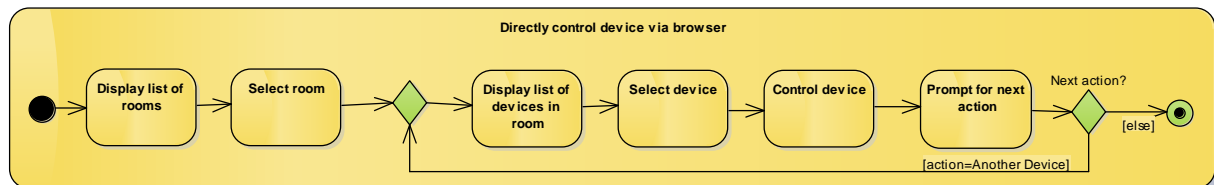


Learning UML

O'Reilly

Exercises – Decisions in Activity Diagrams

If you have followed along, you should have an activity diagram *Directly control device via browser*.



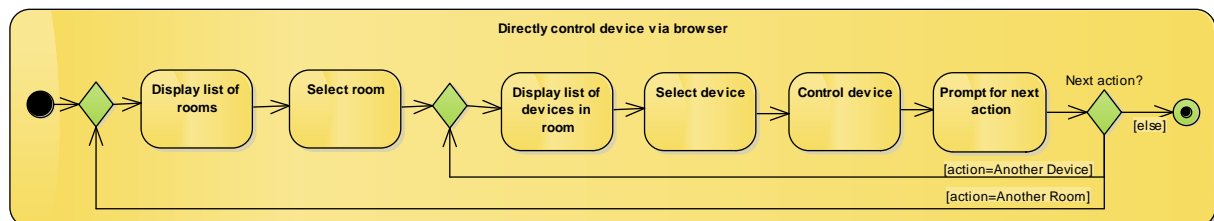
Now you are going to extend this activity diagram.

Add a new merge point before the activity *Display list of rooms*.

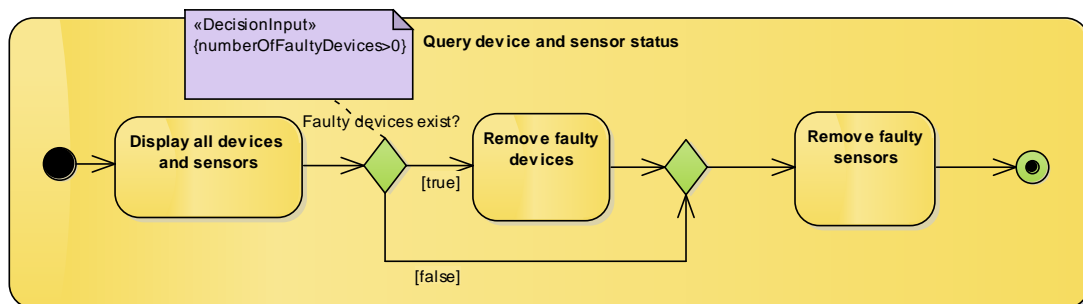
Add a new control flow from the decision point *Next Action?* to this merge point. (Remember that in EA you can add bend points to a connector by pressing and releasing the shift key while holding the cursor at the point where you want the bend.)

Add a guard to the control flow with the condition *action=Another Room*.

Your diagram should look something like this.



You should also have an activity diagram called *Query device and sensor status*.



You are going to add a decision and merge node around *Remove faulty sensors* in the same way as the ones around *Remove faulty devices*.

Add a new decision node after the existing merge node, call it *Faulty sensors exist?*, reconnect the control flow and add a new one.

Add a constraint attached to it with the type *DecisionInput* and the constraint *numberOfFaultySensors>0*.

Add a merge node after the activity *Remove faulty sensors*, reconnect the control flow and add a new one.

Add a control flow directly from the decision node to the merge node.

Add guards to the two flows out of the decision node, labelled *true* and *false*.

Your diagram should look something like this.

