



## Architectural Thinking for Intelligent Systems, WS 2019

### Assignment 9

#### Task Description for Lecture A10: Architectural Styles

We select an architectural style as foundation for the desired system architecture and discuss potential alternatives and refinements. Views are created to document the architecture at several levels of abstraction.

- 1) Select an architectural style and apply it to your system.
- 2) What makes this style particularly appropriate for your purpose? List and discuss relevant constraints and forces that motivated your decision for this style.
- 3) Create a package or component diagram to visualize the top-level architectural style of the system.
- 4) Refine and modularize the architecture by defining additional system structures and relationships at a second level of detail. Document how functional and non-functional requirements relate to the individual structures.
- 5) Create two views to illustrate how the system architecture implements one specific functional and one non-functional requirement.
- 6) Is there another architectural style for your system that would constitute a viable alternative? What makes this style inferior to the one you prefer?
- 7) Review the principle of traceability. Have you implemented it in your architecture? How is it visible in the documents and views that you created so far?

#### Submission

Instructions can be found in slide deck A1-BasicConcepts and on the course website.