

Course code: **WICKET**

Course title: **Wicket**

Days: 2

Description:

Course intended for:

The training is intended for Java programmers wishing to find out how to develop Web applications on the basis of the component-based user interface model, implemented by the Wicket framework.

Course objective:

The training objective is get familiar with the principles of Web application building using the component-based user interface model.

In particular, the participants are to:

- Receive information on the modes of development of Web application interfaces
- Learn to build a user interface using Wicket
- Learn to take advantage of the specific characteristics of the UI object model
- learn to use the ready Wicket library components and to develop their own
- learn how to make the user interface more comfortable using AJAX
- get familiar with the issues associated with security and reliability of Web applications
- learn to launch the applications, developed in accordance with the above specification, on a Jetty server

Requirements:

The training participants are required to have some Java programming skills (to be learned at the course J/JP), basics of relational databases and SQL, basic knowledge of HTML. The participants should also be able to develop Web applications in Servlet/JSP technologies (to be learned at the course J/WEB1).

Course parameters:

2*8 hours (2*7 net hours) of lectures and workshops (with a visible emphasis on workshops). During the workshops, apart from simple exercises, a simple complex application is designed and implemented.

Group size: no more than 8-10 participants.

Course curriculum:

1. Web layer – Wicket

I. Basic architecture of the application

- i. Configuration
- ii. Request processing
- iii. The Java code role
- iv. The HTML role

II. The data model concept

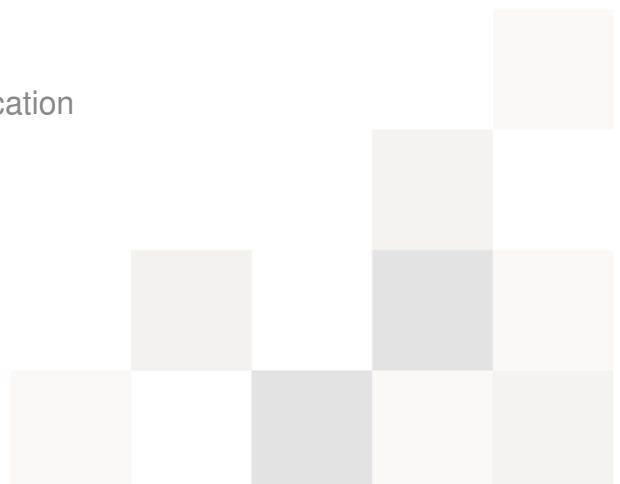
- i. The standard model
- ii. Control of resources – a detachable model
- iii. Model embedding

III. Basic UI components

- i. Text display
- ii. Link management
- iii. Repeaters
- iv. Component attributes modification

IV. Form management

- i. Form structure



- ii. Form components
- iii. Submit handling
- iv. Data validation
- v. Feedback

V. Component grouping

- i. Template inheritance
- ii. Panel
- iii. Border
- iv. Fragment

2. Ajax in Wicket

I. Handling of Ajax in Wicket

- i. Components with in-built Ajax management
- ii. Adding Ajax management to own components
- iii. Handling of forms using Ajax

3. Development of own components

I. Advantages of development of own components

- i. Working with resources (css, scripts)
- ii. Extending of component capabilities
- iii. Internal form components
- iv. Component distribution

4. Other

I. Session management

II. Application security



