

# Virtual Developer Day Oracle WebLogic Server 12c

Modern, Lightweight Development  
with Java EE 6 and Oracle Coherence



## Start times:

**AMERICAS PACIFIC – Tuesday Jan 24, 2012 - 9:30 a.m. Pacific / 12:30 p.m. Eastern**  
**EUROPE/RUSSIA - Tuesday Feb 7, 2012 - 9:30 a.m. UK Time (GMT) / 10:30 a.m. CET**

9.30 - 9.45	Conference Introduction and Orientation			
9.45 – 11:00	Oracle WebLogic Server 12c: Developing Modern, Lightweight Java EE6 Applications			
	<b>Technology Track</b>	<b>Server Track</b>	<b>Hands On Track</b>	<b>Data Grid Track</b>
11:00 - 12:00	Exploring Java EE 6 and WebLogic	Advanced Web Service Development in Oracle WebLogic Server	Total Oracle WebLogic Server Development with Eclipse, Maven, and Hudson	An engineer's introduction to in-memory data grid development
12:00 – 1:00	Exploring EE6 in WebLogic w/Eclipse & NetBeans	Using Maven with Oracle WebLogic Server	Building an end-to-end application using Java EE 6, WebLogic and NetBeans	Supercharging your WebLogic Applications with Coherence
1:00 – 1:30	Survey, Event Checkout			

## Keynote

### Oracle WebLogic Server 12c: Developing Modern, Lightweight Java EE6 Applications

Modern Java development looks very different from even a few years ago. Technology innovation, the ecosystem of tools and their integration with Java standards are changing how development is done.

Cloud Computing is causing developers to re-evaluate their development platforms and deployment options. Business users are demanding faster time to market, but without sacrificing application

performance and reliability. Find out in this session how Oracle WebLogic Server 12c enables rapid development of modern, lightweight Java EE 6 applications. Learn how you can leverage the latest development technologies, tools and standards when deploying to Oracle WebLogic Server across both conventional and Cloud environments.

## **Server Track**

### **Session 1:** Advanced Web Service Development in WebLogic Server

The Oracle WebLogic Web service stack offers comprehensive support not only for advanced Web service standards such as WS-RM, WS-MC, WS-AT, WS-Trust, and SAML, but also for lightweight web services such as Jersey, the JAX-RS implementation for Java EE6. Attendees will get hands-on development experience with creating annotated servlets that implement REST services on WebLogic Server.

### **Session 2:** Using Maven with WebLogic Server

Maven has become a very popular, proven open source developer tool in recent years, as a compliment to defacto Apache ANT build tool. Using maven, developers can manage libraries and dependencies inside projects, and apply a large variety of Maven Plug-ins to various phases of your code's lifecycle from build to testing. This session will introduce Maven in detail, and then focus on how WebLogic 12c supports development with Maven from the simple to more complex scenarios.

## **Technology Track**

### **Session 1:** Exploring Java EE 6

The Java EE 6 platform contains a wealth of APIs: some were just introduced (JAX-RS and Bean Validation); others have been around for a long time with little or no change (JMS); and still others have a long history, but have also seen leaps in usability (EJBs). When writing an application, we often fall back on old habits. As a result, we overlook some new, often simpler, features that would let us solve the problem much faster. In this session, we'll look at the Java EE 6 programming model as a whole, then dive into the different layers of a typical Java EE Web application and show how to implement them using the latest Java EE features.

### **Session 2:** Exploring EE6 in WebLogic w/Eclipse & NetBeans

Join us for a developer tool session that demonstrates the simplicity of Java EE 6. We'll examine the EE6 support and experience on two popular Java IDEs – Eclipse (with the Oracle Enterprise Pack for Eclipse) and NetBeans. Java EE 6 introduces a number of features that significantly ease the development of web applications. We'll also look at how each of these tools support Application Servers like WebLogic. Learn how they can be used to build web applications, deploy and debug to Java EE servers, and develop REST services.

## **Hands On Track**

### **Hands On Lab 1:** Total Oracle WebLogic Server Development with Eclipse, Maven, and Hudson

In this hands-on lab for professional Eclipse Java developers, Oracle product experts discuss the rich set of plug-ins and tooling available in the latest version of Oracle Enterprise Pack for Eclipse to simplify and speed up enterprise Java development with Oracle WebLogic Suite 11g. The lab shows you how to configure and use powerful Eclipse plug-ins from Oracle to develop, build, and deploy with Maven and Hudson for continuous build integration and also how to use tools such as the Oracle WebLogic class loader analysis tool, Oracle JRockit Mission Control, and Oracle WebLogic Server's diagnostic framework feature for total visibility into and control of your applications' runtime performance.

## **Hands On Lab 2:** Building an end-to-end application using Java EE 6, WebLogic and NetBeans

This hands-on lab builds a typical 3-tier Java EE 6 Web application that retrieves customer information from a database and displays it in a Web page. The application also allows new customers to be added to the database as well. The string-based and type-safe queries are used to query and add rows to the database. Each row in the database table is published as a RESTful resource and is then accessed programmatically. Typical design patterns required by a Web application like validation, caching, observer, partial page rendering, and cross-cutting concerns like logging are explained and implemented using different Java EE 6 technologies.

### **Data Grid Track**

#### **Session 1:** An engineer's introduction to in-memory data grid development

Building scalable, highly-available applications that perform well is not an easy task. These features cannot be simply "bolted" onto an existing application – they have to be architected into it. Unfortunately, the things we need to do to achieve them are often in conflict with each other, and finding the right balance is crucial. In this session we will discuss why scaling web applications is difficult and will look at some of solutions we have come up with in the past to deal with the issues involved. We will then look at how in-memory data grids can make our jobs easier by providing a solid architectural foundation to build our applications on top of. If you are new to in-memory data grids, you are guaranteed to leave the presentation eager to learn more. However, even if you are already using one you will likely walk out with a few ideas on how to improve performance and scalability of your applications.

#### **Session 2:** Supercharging your WebLogic Applications with Coherence

In this talk we will cover the integration of Coherence and Oracle WebLogic Server, and touch on the native capabilities of WebLogic server for HTTP session state management as well. The integration makes it simpler to access Coherence named caches through resource injection. It also provides an optimized integration of Coherence\*Web for HTTP session state management. From a management perspective, it offers Coherence cluster configuration support through the WLS administration domain as well as Runtime monitoring support through the WebLogic console.