

# Spoken Tutorial

## Developing Web Applications on Netbeans

**Talk to a Teacher**

**<http://spoken-tutorial.org>**

**National Mission on Education through ICT**

**<http://www.sakshat.ac.in>**

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# Introduction

- ▶ Introduction to Netbeans at <http://spoken-tutorial.org>



# Introduction

- ▶ Introduction to Netbeans at <http://spoken-tutorial.org>
- ▶ Installation and Interface



# Introduction

- ▶ Introduction to Netbeans at <http://spoken-tutorial.org>
- ▶ Installation and Interface
- ▶ Creating a New Project



# System Setup

## ► Ubuntu 11.04



# System Setup

- ▶ **Ubuntu 11.04**
- ▶ **Netbeans v7.0.1**



# Lesson Outline

In this tutorial, we will see

- ▶ **Setting up a Web Application Project**



# Lesson Outline

In this tutorial, we will see

- ▶ Setting up a Web Application Project
- ▶ Creating and Editing Web Applications Source Files





# Lesson Outline

In this tutorial, we will see

- ▶ Setting up a Web Application Project
- ▶ Creating and Editing Web Applications Source Files
  - ▶ Creating a Java Package and a Java Source File



# Lesson Outline

In this tutorial, we will see

- ▶ **Setting up a Web Application Project**
- ▶ **Creating and Editing Web Applications Source Files**
  - ▶ **Creating a Java Package and a Java Source File**
  - ▶ **Generating Getter and Setter Methods**



# Lesson Outline

In this tutorial, we will see

- ▶ **Editing the Default JavaServer Pages File**



# Lesson Outline

In this tutorial, we will see

- ▶ Editing the Default JavaServer Pages File
- ▶ **Creating a JavaServer Pages File**



# Lesson Outline

In this tutorial, we will see

- ▶ Editing the Default JavaServer Pages File
- ▶ Creating a JavaServer Pages File
- ▶ Running a Web Application Project



# Requirements

## ► Netbeans IDE



# Requirements

- ▶ **Netbeans IDE**
- ▶ **Java Development Kit (JDK)  
version 6**



# Requirements

- ▶ Netbeans IDE
- ▶ Java Development Kit (JDK) version 6
- ▶ GlassFish Server Open Source Edition





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- ▶ Netbeans IDE
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<http://www.oracle.com/technetwork/java/javase/downloads/jdk-netbeans-jsp-142931.html>



# Lesson- Creating a Simple Web Application

## ► Deploy it to a Server



# Lesson- Creating a Simple Web Application

- ▶ **Deploy it to a Server**
- ▶ **View it's Presentation in a Browser**



# Lesson- Creating a Simple Web Application

- ▶ **Deploy it to a Server**
- ▶ **View it's Presentation in a Browser**
- ▶ **Employes JSP Page to Input your Name**



# Lesson- Creating a Simple Web Application (cont'd)

## ► JavaBeans Component During HTTP Session



# Lesson- Creating a Simple Web Application (cont'd)

- ▶ **JavaBeans Component During HTTP Session**
- ▶ **Retrieves the output on a Second JSP Page**



# Refactoring

- ## ► Improving the Structure of the Existing Code



# Refactoring

- ▶ Improving the Structure of the Existing Code
- ▶ Without Changing the Observable Behaviour





# Refactoring

- ▶ **Change the Structure of the Code Without Changing the Behaviour**



# Refactoring

- ▶ **Change the Structure of the Code Without Changing the Behaviour**
- ▶ **You can Easily Move Fields, Methods or Classes Around, Without Breaking Things**



# JavaBeans

## ► Reusable Software Components for Java



# JavaBeans

- ▶ Reusable Software Components for Java
- ▶ Encapsulate Many Objects into a Single Object



# JavaBeans

- ▶ Reusable Software Components for Java
- ▶ Encapsulate Many Objects into a Single Object
- ▶ Passed Around as a Single Bean Object



# Assignment!

## ► Three Input Text Fields



# Assignment!

- ▶ **Three Input Text Fields**
- ▶ **Use JavaBeans Component**



# Assignment!

- ▶ Three Input Text Fields
- ▶ Use JavaBeans Component
- ▶ View it's Presentation in the Browser





# Assignment!

- ▶ Three Input Text Fields
- ▶ Use JavaBeans Component
- ▶ View it's Presentation in the Browser
- ▶ Retrieve the Output on a Second JSP Page



# Acknowledgement

- Spoken Tutorial Project is a part of Talk to a Teacher Project



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- ▶ Spoken Tutorial Project is a part of Talk to a Teacher Project
- ▶ Supported by the National Mission on Education through ICT, MHRD, Government of India



# Acknowledgement

- More information: <http://spoken-tutorial.org/NMEICT-Intro>



# About the Spoken Tutorial Project

- ▶ Video on [http://spoken-tutorial.org/What\\_is\\_a\\_Spoken\\_Tutorial](http://spoken-tutorial.org/What_is_a_Spoken_Tutorial) summarizes the Spoken Tutorial Project



# About the Spoken Tutorial Project

- ▶ **Video on**  
[http://spoken-tutorial.org/What\\_is\\_a\\_Spoken\\_Tutorial](http://spoken-tutorial.org/What_is_a_Spoken_Tutorial)  
summarizes the Spoken Tutorial Project
- ▶ **If you do not have good bandwidth, you can download and watch it**



# About the Spoken Tutorial Project

- ▶ We also give certificates for those who pass an online test



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# Thank You

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