#### **CLASSIC BOOK HOUSE V1 86%**

#### **Error Detection/Resolve:**

1.

Just replace "showpage" by "showPage" in addbook method page 3

\*page 2

### 2.

Failure at addbook in bookservice

#### **Full Code:**

### Book.java

```
package com.model;
import javax.validation.constraints.NotBlank;
import javax.validation.constraints.NotEmpty;
import javax.validation.constraints.PositiveOrZero;
import org.springframework.stereotype.Component;
//use appropriate annotation to make this class as a component class
@Component
public class Book {
//fill the code
@NotEmpty(message = "{error.isbn}")
private String isbn;
//fill the code
@NotBlank(message = "{error.bookName}")
private String bookName;
//fill the code
@PositiveOrZero(message = "{error.quantity}")
private int quantity;
private String category;
//fill the code
@PositiveOrZero(message = "{error.price}")
```

```
private int price;
public String getCategory() {
return category;
public void setCategory(String category) {
this.category = category;
}
public String getBookName() {
return bookName;
}
public void setBookName(String bookName) {
this.bookName = bookName;
}
public int getPrice() {
return price;
public void setPrice(int price) {
this.price = price;
}
public int getQuantity() {
return quantity;
public void setQuantity(int quantity) {
this.quantity = quantity;
public String getIsbn() {
return isbn;
public void setIsbn(String isbn) {
this.isbn = isbn;
public Book() {}
```

### BookController.java

package com.controller;

```
import java.util.ArrayList;
import java.util.List;
import org.springframework.beans.factory.annotation.Autowired;
import org.springframework.stereotype.Controller;
import org.springframework.ui.ModelMap:
import org.springframework.validation.BindingResult;
import org.springframework.web.bind.annotation.ExceptionHandler;
import org.springframework.web.bind.annotation.ModelAttribute;
import org.springframework.web.bind.annotation.RequestMapping;
import org.springframework.web.bind.annotation.RequestMethod;
import org.springframework.web.servlet.ModelAndView;
import com.exception.InvalidBookException;
import com.model.Book;
import com.service.BookService;
//use appropriate annotation to configure BookController as Controller
@Controller
public class BookController {
// use appropriate annotation
@Autowired
private BookService bookService;
@RequestMapping(value = "/index", method = RequestMethod.GET)
public String showIndex() {
return "index";
}
@RequestMapping(value = "/showPage", method = RequestMethod.GET)
public String showPage(@ModelAttribute("book") Book book) {
return "showPage";
}
// invoke the service class - addBook method.
@RequestMapping(value = "/addBook", method = RequestMethod.GET)
public String addBook(@ModelAttribute("book") Book book, BindingResult result, ModelMap
model) throws InvalidBookException {
String res = "";
if (result.hasErrors()) {
res = "showpage";
} else {
boolean bool = bookService.addBook(book);
model.addAttribute("message", "Book added successfully");
res = "showpage";
return res;
}
// fill the code
@RequestMapping(value = "/viewList", method = RequestMethod.GET)
public String viewAllBooks(ModelMap model) {
// fill the code
List<Book> list = bookService.viewAllBooks();
model.addAttribute("bookList",list);
```

```
return "viewList";
}
// Use appropriate annotation
@ExceptionHandler(value = InvalidBookException.class)
public ModelAndView exceptionHandler(Exception e) {
ModelAndView modelAndView = new ModelAndView("exceptionPage");
modelAndView.addObject("err",e.getMessage());
// fill the code
return modelAndView;
}
@ModelAttribute("bookCategory")
public List<String> populateBookCategory() {
List<String> list = new ArrayList<>();
list.add("Science");
list.add("Humor");
list.add("Novel");
list.add("Health");
list.add("Travel");
list.add("Motivational");
list.add("Art");
list.add("Encyclopedia");
list.add("Biography");
list.add("Cooking");
return list;
}
}
```

# BookService.java

```
package com.service;
import java.util.ArrayList;
import org.springframework.stereotype.Service;
import com.exception.InvalidBookException;
import com.model.Book;
//use appropriate annotation to configure ElectricityService as a Service
@Service
```

```
public class BookService {
private static ArrayList<Book> bookList=new ArrayList<Book>();
// Validate ISBN number and add book object into the book list
public boolean addBook(Book book) throws InvalidBookException {
for(Book checkBook:bookList) {
if(checkBook.getIsbn().equalsIgnoreCase(book.getIsbn())) {
throw new InvalidBookException("Book with "+book.getIsbn()+" already
exists!");
}
bookList.add(book);
return true;
}
public ArrayList<Book> viewAllBooks(){
//fill the code
return this.bookList;
public ArrayList<Book> getBookList() {
return this.bookList;
public void setBookList(ArrayList<Book> list) {
this.bookList = list:
}
```

# ClassicBookHouseApplication.java

```
package com.example.demo;
import org.springframework.boot.SpringApplication;
import org.springframework.boot.autoconfigure.SpringBootApplication;
import org.springframework.context.annotation.ComponentScan;
@SpringBootApplication
@ComponentScan({"com.controller","com.model","com.service"})
public class ClassicBookHouseApplication {
public static void main(String[] args) {
```

```
SpringApplication.run(ClassicBookHouseApplication.class, args);
}
```

## InternationalizationConfig.java

```
package com.controller;
import java.util.Locale;
import org.springframework.context.annotation.Bean;
import org.springframework.context.annotation.Configuration;
import org.springframework.context.support.ResourceBundleMessageSource;
import org.springframework.validation.beanvalidation.LocalValidatorFactoryBean;
import org.springframework.web.servlet.LocaleResolver;
import org.springframework.web.servlet.config.annotation.InterceptorRegistry;
import org.springframework.web.servlet.config.annotation.WebMvcConfigurer;
import org.springframework.web.servlet.i18n.LocaleChangeInterceptor;
import org.springframework.web.servlet.i18n.SessionLocaleResolver;
@Configuration
public class InternationalizationConfig implements WebMvcConfigurer {
// Create a SessionLocaleResolver object and set the default locale to
// English return the SessionLocaleResolver object
@Bean
public LocaleResolver localeResolver() {
SessionLocaleResolver resolver = new SessionLocaleResolver();
resolver.setDefaultLocale(new Locale("en"));
return resolver:
}
// Create LocaleChangeInterceptor object and set the parameter name as
// language and return the localeChangeInterceptor
@Bean
public LocaleChangeInterceptor localeChangeInterceptor() {
LocaleChangeInterceptor interceptor = new LocaleChangeInterceptor();
 interceptor.setParamName("language");
 return interceptor;
}
// register the LocaleChangeInterceptor
```

```
@Override
public void addInterceptors(InterceptorRegistry registry) {
registry.addInterceptor(localeChangeInterceptor());
}
@Bean
public ResourceBundleMessageSource messageSource() {
ResourceBundleMessageSource bundleMessageSource = new
ResourceBundleMessageSource();
bundleMessageSource.setBasenames("messages","messages_fr","messages_de");
return bundleMessageSource;
}
@Bean
public LocalValidatorFactoryBean getValidator() {
LocalValidatorFactoryBean bean = new LocalValidatorFactoryBean();
bean.setValidationMessageSource(messageSource());
return bean;
}
}
```

## InvalidException.java

```
package com.exception;
public class InvalidBookException extends Exception{
private static final long serialVersionUID = 1L;
public InvalidBookException(String msg) {
  super(msg);
//fill the code
}
}
```

# **ExceptionPage.jsp**

### Index.jsp

```
<%@ taglib prefix="spring" uri="http://www.springframework.org/tags" %>
<%@ taglib prefix="sf" uri="http://www.springframework.org/tags/form" %>
<%@ taglib uri="http://www.springframework.org/tags/form" prefix="form"%>
<%@ taglib uri="http://www.springframework.org/tags/form" prefix="form"%>
<%@ page language="java" contentType="text/html; charset=ISO-8859-1"
    pageEncoding="ISO-8859-1" isELIgnored="false"%>
<!DOCTYPE html PUBLIC "-//W3C//DTD HTML 4.01 Transitional//EN"
    "http://www.w3.org/TR/html4/loose.dtd">
<html>
<body>
<html>
<html>
<html>
<html>
<html>
<center>Classic Book House</center></h1>
```

```
<center>
<a href="showPage">Add Book</a><br>><a href="viewList" >View all Book</a>
</center>
</body>
</html>
```

## Showpage.jsp

```
< @ taglib prefix="spring" uri="http://www.springframework.org/tags"%>
<%@ taglib prefix="sf" uri="http://www.springframework.org/tags/form"%>
<%@ taglib uri="http://www.springframework.org/tags/form" prefix="form"%>
<@ page language="java" contentType="text/html; charset=ISO-8859-1"
pageEncoding="ISO-8859-1" isELIgnored="false"%>
<!DOCTYPE html PUBLIC "-//W3C//DTD HTML 4.01 Transitional//EN"
"http://www.w3.org/TR/html4/loose.dtd">
<html>
<head>
<style>
* {
box-sizing: border-box;
.row {
margin-left: -5px;
margin-right: -5px;
}
.column {
float: left;
width: 60%;
padding: 3px;
}
.column1 {
float: left;
width: 25%;
padding: 3px;
/* Clearfix (clear floats) */
.row::after {
```

```
content: "";
clear: both;
display: table;
table {
border-collapse: collapse;
border-spacing: 0;
width: 100%;
th, td {
text-align: left;
padding: 5px;
}
#message {
color: red;
}
</style>
</head>
<body style="background-color: lavender">
<!-- Do not change the below line -->
<a href="/showPage?language=en">English</a>|
<a href="/showPage?language=de">German</a>|
<a href="/showPage?language=fr">French</a>
</align>
<!-- Design the page as per the requirements-->
<h1>
<center>Classic Book House</center>
</h1>
<form:form method="GET" action="/addBook" modelAttribute="book">
<div class="row">
<div class="column1">
<a href="index">Home</a><br>
<a href="viewList">View All Books</a>
</div>
<div class="column">
style="margin: 0px auto; margin-left: auto; margin-right: auto">
<spring:message code="label.isbn" />
<form:input path="isbn" id="isbn" />
<form:errors path="isbn" />
```

```
<spring:message code="label.bookName" />
<form:input path="bookName" id="bookName"
/>
<form:errors path="bookName" />
<spring:message code="label.quantity" />
<form:input path="quantity" id="quantity" />
<form:errors path="quantity" />
<spring:message code="label.category" />
<form:select path="category" id="category"
items="${bookCategory}"></form:select>
<spring:message code="label.price" />
<form:input path="price" id="price" />
<form:errors path="price" />
<input type="submit" value="Submit"
id="submit"/>
</div>
</div>
<div id="message">${message}</div>
</center>
</form:form>
</body>
</html>
```

## Viewlist.jsp

```
<%@page isELIgnored="false" %>
<%@ taglib prefix="c" uri="http://java.sun.com/jsp/jstl/core" %>
<%@ taglib uri="http://java.sun.com/jsp/jstl/functions" prefix="fn" %>
<html>
<body bgcolor="lavender">
```

```
<h1><center>Classic Book House</center></h1>
<center>
ISBN
Book Name
Book Category
Quantity
Price
<c:forEach var="book" items="${bookList }">
${book.getIsbn()}
${book.getBookName()}
${book.getCategory()}
${book.getQuantity()}
${book.getPrice()}
</c:forEach>
</center>
<a href="index">Back to Home</a>
</body>
```

</html>