

# Domino Designer 7 Application Development: Fundamentals

Course Code: **SBSLN710**

The course provides the information that developers need to know to successfully create and modify database applications in IBM Lotus Domino Designer 7. It provides an overview of the Lotus Domino 7 and Domino Designer 7 environments, introduces the elements and skills that are used in creating single-database Domino applications, describes how the formula language can be used to enhance the functionality of a Domino application, and explains how Domino applications can be secured.

## Topics You Will Cover

### Exploring Applications in Lotus Domino 7

- Identifying Application Types and Data Sources
- Examining the Lotus Domino Architecture
- Examining Lotus Domino Application Components
- Investigating Replication and Application Design Considerations
- Extending Lotus Domino Collaboration Capabilities

### Exploring the Lotus Domino 7 Design Environment

- Exploring the Lotus Domino Designer User Interface
- Accessing Design Elements

### Creating Databases

- Creating a New, Blank Database in Lotus Domino Designer
- Creating a Copy of an Existing Database
- Creating a Database from a Template
- Organizing the Lotus Domino Designer Environment

### Creating Pages

- Exploring Page Content, Layout, and Navigation Basics
- Creating Pages
- Adding Text to Pages
- Using Tables to Lay Out Pages
- Adding Images to Pages

### Creating Forms

- Creating Forms
- Adding Fields to Forms

- Hiding Form Elements

### **Creating Views**

- Creating Views
- Adding View Columns
- Organizing Documents
- Formatting Views

### **Introducing Formulas**

- Identifying Programming Languages Supported by Lotus Domino
- Identifying Formula Components
- Identifying Event Triggers
- Working with @Functions
- Computing and Compare Values
- Exploring Formatting and Comments

### **Using Formulas in Forms**

- Creating Window Titles
- Working with Computed Values
- Working with Field Values
- Working with Lists
- Prompting Users
- Creating Reusable Code
- Implementing Error Checking

### **Using Formulas in Views**

- Creating Selection Formulas
- Concatenating Values in a View Column
- Displaying Icons In A View

### **Enhancing Forms**

- Working with Layers
- Working with Subforms
- Creating Shared Fields
- Enabling Inheritance in Forms and Documents
- Creating Related Forms
- Enabling AutoSave
- Implementing Lotus Sametime Instant Messaging in Forms

### **Enhancing Views**

- Defining Hierarchical Views
- Displaying Response Data in Views

- Implementing Shared Columns
- Enabling Lotus Sametime Instant Messaging in Views
- Creating Views for the Web

### **Working with Actions**

- Creating Actions
- Creating Shared Actions
- Controlling the Display of Actions
- Creating Action Hotspots

### **Working with Agents**

- Investigating Agents
- Creating Agents

### **Securing Applications**

- Exploring Database Access
- Implementing Roles
- Using Readers and Authors Fields
- Controlling Access for Anonymous Users
- Deploying Applications

# Domino Designer 7 Application Development: Intermediate Skills

Course Code: **SBSLN711**

## Overview

This course builds on the skills of Lotus Education's Developing IBM Lotus Domino 7 Applications: Foundation Skills (N7D510) course. Through instructor lecture and student-centered activities and exercises, students learn to use IBM Lotus Domino Designer 7 to develop multi-database applications.

The course explores advanced formula techniques including looping, and user interaction with the application. The course explains different methods for accessing data sources outside the current Domino database including other Domino databases and relational databases. Other topics include adding workflow functionality to route documents and notify users that a document requires their attention, and security issues such as encrypting data. This course also examines navigation elements such as links, outlines, and framesets that bind the components of the application together and allow users to locate information quickly and easily.

## Who Will The Course Benefit?

The target audience for this course is application developers who have experience creating or modifying single database applications with IBM Lotus Domino Designer 6 or Domino Designer 7.

## What Prerequisites Are Required?

The prerequisites for this course include

- Experience using the IBM Lotus Notes client to access applications
- Completion of the Developing IBM Lotus Domino 7 Applications: Foundation Skills or Developing IBM Lotus Domino 6/6.5 Applications: Foundation Skills course or equivalent knowledge, skills, and experience.
- Three or more months experience developing Lotus Domino 6 or Lotus Domino 7 applications.

## Topics You Will Cover

This course covers the following topics:

### Creating and using links

- list of resources you can link to
- types of hotspots you can create
- where/ and when to use which type of hotspot

### **Working with outlines**

- building an outline
- embedding an outline

### **Building framesets**

- setting target frames for design elements
- creating a collapsible frame
- adding a caption to a frame

### **Advanced view design**

- hiding view columns
- using colors and images in views
- using embedded views
- using view navigation commands
- creating calendar views

### **Advanced formula techniques**

- error checking formulas
- looping formulas
- user interface formulas
- string and list manipulation formulas
- nesting assignment statements

### **Advanced data access mechanisms**

- accessing other Domino databases
- accessing non-Domino databases with Open Database Connectivity (ODBC)
- creating and using Data Connection Record (DCR) to access non-Domino databases
- using Domino Enterprise Connection Services (DECS) to access non-Domino databases

### **Routing documents and notifying users**

- using functions to send documents
- creating a mail-in database
- tracking documents through the workflow process

### **Using profile documents**

- comparison of profile documents and environment variables
- creating profile documents
- accessing data in profile documents

### **Securing a Domino 6 application**

- encrypting data
- signing databases
- agent security issues

### **Using the design synopsis to evaluate and document an application**

- description of information available in a design synopsis
- creating a design synopsis
  
- locating information in a design synopsis

# Domino Designer 7 Application Development: Building Applications for the Web

Course Code: **SBSLN712**

This course extends participants' Domino application development skills by teaching them how to use the Domino tools to design and develop dynamic Web applications. Participants learn how to efficiently use Domino fields and page lay out design elements in the Web pages. They learn how to use JavaScript in their Domino application. Participants do not need to know how to program in this language to acquire an understanding of how and where to apply the programming capabilities to the best advantage. Finally, this course covers security topics specific to the Domino Web environment.

## Who Will The Course Benefit?

The target audience for this course is IBM Lotus Domino application developers who need to build Web-enabled Lotus Domino applications using Domino Designer 7.

## What Prerequisites Are Required?

The prerequisites for this course include skills in developing Domino 6/6.5 or Domino 7 applications. These skills are taught in: ND510GB - Developing IBM Lotus Domino 6

## Topics You Will Cover

### **Building IBM® Lotus® Domino® Forms for the Web**

- Exploring Lotus Domino Forms Rendered to a Browser
- Creating Links
- Customizing Input Tags for Lotus Domino Fields
- Working with Lotus Domino Fields for the Web

### **Enhancing the Appearance of Web Pages**

- Using Cascading Style Sheets
- Enhancing Views for the Web
- Controlling View Display
- Working with Target Frames

### **Using JavaScript in Forms**

- Exploring JavaScript in Lotus Domino
- Validating and Translate Input Data Using JavaScript
- Reusing Code

### **Customizing Web Site Functionality**

- Using Agents to Customize Web Site Functionality
- Personalizing the User Experience
- Using Java in Your Web Site

### **Securing a Domino Web Application**

- Examining Lotus Domino Web Site Access
- Controlling Access to Domino Web Applications

# Domino Designer 7 Application Development: Using LotusScript

Course Code: **SBSLN713**

## Overview

Students will learn the techniques of programming in LotusScript while they learn to access and work with objects in the Domino Object Model. This workshop starts by introducing students to the LotusScript language, having them retrieve properties of a database, using methods of NotesDatabase, and traversing down the Document Object Model to ACL classes. The skill of navigating the Document Object Model is continuously reinforced throughout the course as students learn to work with front-end and back-end classes. Students are introduced to error checking the LotusScript Debugger early on so that they use it throughout the course.

## Who Will The Course Benefit?

The target audience for this course is application developers who will be using LotusScript in their Domino applications. application developers who will be using LotusScript in their Domino applications.

## What Prerequisites Are Required?

The prerequisites for this course include

- Fundamentals of IBM Lotus Domino 7 Application Development or the equivalent skills

## Topics You Will Cover

- Introducing LotusScript: where and when to use it
- Using programming skills such as:
  - declaring variables
  - assigning values
  - using looping statements
  - using conditional statements
  - converting data types
- Instantiating objects
- Retrieving database information
- Using the LotusScript Debugger
- Trapping errors in code
- Working with the front-end classes to manipulate objects in the user interface
- Working with back-end classes to retrieve and add data to documents
- Creating and sending report documents
- Prompting users for data and processing the data

- Using Script Libraries
  - Introducing LotusScript: where and when to use it
- Using programming skills such as:
  - declaring variables
  - assigning values
  - using looping statements
  - using conditional statements
  - converting data types
- Instantiating objects
- Retrieving database information
- Using the LotusScript Debugger
- Trapping errors in code
- Working with the front-end classes to manipulate objects in the user interface
- Working with back-end classes to retrieve and add data to documents
- Creating and sending report documents
- Prompting users for data and processing the data
- Using Script Libraries