Practical 6

Develop application to download image/video from server or upload image/video to server using MTOM techniques

**Software Tools Required**

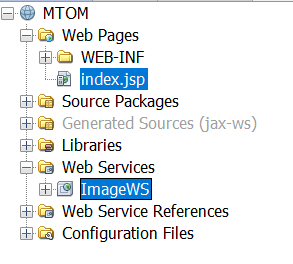
* **IDE or Code Editor:** Netbeans version 8
* **JDK:** java jdk version 8

**Downloads Required:**

* Netbeans 8:
* Java JDK 8:

**Project Name:** MTOM

**Project Architecture:**

****

**Filename:** index.jsp

<%--

Document : index

Created on : Feb 3, 2025, 1:25:10 PM

Author : User

--%>

<%@page import="java.io.BufferedOutputStream"%>

<%@page import="java.io.FileOutputStream"%>

<%@page import="java.io.FileInputStream"%>

<%@page import="java.io.BufferedInputStream"%>

<%@page import="java.io.File"%>

<%@page import="javax.xml.ws.soap.MTOMFeature"%>

<%@page contentType="text/html" pageEncoding="UTF-8"%>

<!DOCTYPE html>

<html>

<head>

<meta http-equiv="Content-Type" content="text/html; charset=UTF-8">

<title>JSP Page</title>

</head>

<body>

<%-- start web service invocation --%><hr/>

<%

try {

pkg.ImageWS\_Service service = new pkg.ImageWS\_Service();

pkg.ImageWS port = service.getImageWSPort(new MTOMFeature(60000));

// TODO initialize WS operation arguments here

String filePath="C:/Picture/abcd2.jpg"; // Assuming this is the correct file path

File file=new File(filePath);

FileInputStream fis=new FileInputStream(file);

BufferedInputStream bis=new BufferedInputStream(fis);

String filename = file.getName();

byte[]imageBytes=new byte[(int)file.length()];

bis.read(imageBytes);

port.upload(filename, imageBytes);

bis.close();

out.println("File uploaded :" + filePath);

} catch (Exception ex) {

// TODO handle custom exceptions here

ex.printStackTrace();

}

%>

<%-- end web service invocation --%><hr/>

<%-- start web service invocation --%><hr/>

<%

try {

pkg.ImageWS\_Service service = new pkg.ImageWS\_Service();

pkg.ImageWS port = service.getImageWSPort();

// TODO initialize WS operation arguments here

String filename = "abcd2.jpg"; // Assuming this is the correct file name

// Initialize filePath

String filePath = "C:/Picture/download/" + filename; // Assuming this is the correct download path

// Invoke the download method and get the file bytes

byte[] fileBytes = port.download(filename);

// Write the downloaded bytes to a file

FileOutputStream fos = new FileOutputStream(filePath);

BufferedOutputStream bos = new BufferedOutputStream(fos);

bos.write(fileBytes);

bos.close();

out.println("File downloaded: " + filePath);

} catch (Exception ex) {

// TODO handle custom exceptions here

ex.printStackTrace();

}

%>

<%-- end web service invocation --%><hr/>

</body>

</html>

**Filename:** ImageWS.java

/\*

\* To change this license header, choose License Headers in Project Properties.

\* To change this template file, choose Tools | Templates

\* and open the template in the editor.

\*/

package mypkg;

import java.io.\*;

import javax.jws.Oneway;

import javax.jws.WebService;

import javax.jws.WebMethod;

import javax.jws.WebParam;

import javax.xml.ws.soap.MTOM;

@MTOM(enabled = true, threshold = 60000)

@WebService(serviceName = "ImageWS")

public class ImageWS {

@WebMethod(operationName = "upload")

@Oneway

public void upload(@WebParam(name = "Filename") String Filename, @WebParam(name = "ImageBytes") byte[] ImageBytes) {

String filePath = "C:/Picture/upload/" + Filename;

try {

FileOutputStream fos = new FileOutputStream(filePath);

BufferedOutputStream bos = new BufferedOutputStream(fos);

bos.write(ImageBytes);

bos.close();

System.out.println("Received file: " + filePath);

} catch (Exception ex) {

ex.printStackTrace();

}

}

@WebMethod(operationName = "download")

public byte[] download(@WebParam(name = "Filename") String Filename) {

String filePath = "C:/Picture/upload/" + Filename;

System.out.println("Sending file: " + filePath);

try {

File file = new File(filePath);

FileInputStream fis = new FileInputStream(file);

BufferedInputStream bis = new BufferedInputStream(fis);

byte[] fileBytes = new byte[(int) file.length()];

bis.read(fileBytes);

bis.close();

return fileBytes;

} catch (Exception ex) {

ex.printStackTrace();

return null;

}

}

}