```
14986
          package ui;
          import java.awt.GridLayout;
14987
14988
          import java.awt.event.ActionEvent;
14989
          import java.awt.event.MouseAdapter;
14990
          import java.awt.event.MouseEvent;
14991
          import java.util.Map;
14992
          import javax.swing.AbstractAction;
          import javax.swing.BorderFactory;
14993
14994
          import javax.swing.ComboBoxModel;
14995
          import javax.swing.DefaultComboBoxModel;
          import javax.swing.JButton;
14996
14997
          import javax.swing.JComboBox;
14998
          import javax.swing.JLabel;
14999
          import javax.swing.JList;
          import javax.swing.JPanel;
15000
15001
          import javax.swing.JScrollPane;
15002
          import javax.swing.JTable;
15003
          import javax.swing.JTextArea;
15004
          import javax.swing.ListModel;
15005
          import javax.swing.ListSelectionModel;
15006
          import javax.swing.SwingUtilities;
15007
          import javax.swing.WindowConstants;
15008
          import javax.swing.border.BevelBorder;
15009
          import javax.swing.border.LineBorder;
15010
          import javax.swing.event.ListSelectionEvent;
15011
          import javax.swing.event.ListSelectionListener;
15012
          import javax.swing.table.DefaultTableModel;
15013
          import javax.swing.table.TableModel;
15014
          import cn.edu.ustb.webservicetester.model.OperationInfo;
          import cn.edu.ustb.webservicetester.model.ParameterInfo;
15015
15016
          public class PreferenceFrame extends javax.swing.JFrame {
              private JPanel jPanel1;
15017
              private JScrollPane jScrollPane1;
15018
15019
              private JScrollPane jScrollPane2;
15020
              private AbstractAction nextAction;
15021
              private JButton jButtonPre;
15022
              private JButton jButtonNext;
              private JComboBox testStrategyJComboBox:
15023
              private JLabel testStrategyJLabel;
15024
              private DefaultTableModel paraInfoTableModel;
15025
15026
              private JTable paraInfoJTable;
15027
              private JTextArea paraResJTextArea;
15028
              private JLabel paraResJLabel;
15029
              private JLabel paraInfoJLabel;
15030
              private AbstractAction operationSelectionAction;
15031
              private JComboBox operationComboBox;
15032
              private JLabel opSelectionJLabel;
15033
              private java.util.List<OperationInfo> opInfoList;
15034
              private OperationInfo selectedOperationInfo;
15035
              private java.util.List<ParameterInfo> paraInfoList;
```

```
15036
              private java.util.Map<String, String> setting = null;
15037
               public static void main(String[] args) {
15038
                   SwingUtilities.invokeLater(new Runnable() {
15039
                        public void run() {
15040
                             PreferenceFrame inst = new PreferenceFrame();
                             inst.setLocationRelativeTo(null);
15041
                             inst.setVisible(true);
15042
15043
                        }
15044
                   });
15045
               public PreferenceFrame() {
15046
15047
                   super();
15048
                   initGUI();
15049
15050
               public PreferenceFrame(Map<String, String> setting, java.util.List list) {
15051
                   super();
15052
                   this.setting = setting;
15053
                   initGUI(list);
15054
               }
               private void initGUI() {
15055
15056
                   initGUI(null);
15057
               }
15058
               private void initGUI(java.util.List<OperationInfo> oil) {
                   this.opInfoList = oil;
15059
15060
                   try {
15061
                        setTitle("操作选择");
15062
                        setResizable(false);
15063
                        GridLayout thisLayout = new GridLayout(1, 1);
15064
                        getContentPane().setLayout(thisLayout);
                        setDefaultCloseOperation(WindowConstants.DISPOSE_ON_CLOSE);
15065
15066
                        {
15067
                             jPanel1 = new JPanel();
15068
                             getContentPane().add(jPanel1);
15069
                             ¡Panel1.setLayout(null);
15070
                             jPanel1.setBackground(new java.awt.Color(228,236,243));
15071
                             jPanel1.setPreferredSize(new java.awt.Dimension(506, 349));
15072
15073
                                  opSelectionJLabel = new JLabel();
15074
                                  ¡Panel1.add(opSelectionJLabel);
15075
              op Selection JLabel. set Text("\u8bf7\u9009\u62e9\u5f85\u6d4b\u8bd5\u7684\u64cd\u4f5c");
15076
                                  opSelectionJLabel.setBounds(12, 36, 128, 17);
15077
                             }
15078
                             {
15079
                                  ComboBoxModel operationSelectionComboBoxModel;
15080
                                  if (opInfoList == null)
15081
                                      operationSelectionComboBoxModel =
15082
                                           new DefaultComboBoxModel(
                                                     new String[] { "Item One", "Item Two" });
15083
                                  else {
15084
15085
                                      String[] opNames = new String[opInfoList.size()];
```

```
15086
                                      for (int i = 0; i < opNames.length; ++i) {
15087
                                          opNames[i] = opInfoList.get(i).getOpName();
15088
15089
                                      operationSelectionComboBoxModel
                                                                                                  new
15090
          DefaultComboBoxModel(opNames);
15091
15092
                                 operationComboBox = new JComboBox();
15093
                                 ¡Panel1.add(operationComboBox);
                                 operationComboBox.setModel(operationSelectionComboBoxModel);
15094
15095
                                 operationComboBox.setBounds(140, 32, 162, 24);
                                 operationComboBox.setAction(getOperationSelectionAction());
15096
15097
                            }
15098
                                 jScrollPane1 = new JScrollPane();
15099
                                 ¡Panel1.add(¡ScrollPane1);
15100
                                 jScrollPane1.setBounds(24, 101, 183, 132);
15101
                                 jScrollPane1.setViewportView(getParaInfoJTable());
15102
15103
                            }
15104
                                 jScrollPane2 = new JScrollPane();
15105
15106
                                 jPanel1.add(jScrollPane2);
15107
                                 iPanel1.add(getJLabelParameterInformation());
                                 ¡Panel1.add(getParaResJLabel());
15108
                                 jPanel1.add(getTestStrategyJLabel());
15109
                                 jPanel1.add(getTestStrategyJComboBox());
15110
                                 ¡Panel1.add(getJButtonNext());
15111
15112
                                 jPanel1.add(getJButtonPre());
15113
                                 jScrollPane2.setBounds(290, 101, 183, 132);
15114
                                 jScrollPane2.setViewportView(getParaResJTextArea());
15115
                            }
15116
                        }
                        pack();
15117
15118
                        this.setSize(500, 444);
                   } catch (Exception e) {
15119
15120
                        e.printStackTrace();
15121
                   }
15122
              }
15123
              private AbstractAction getOperationSelectionAction() {
                   if(operationSelectionAction == null) {
15124
15125
                        operationSelectionAction = new AbstractAction("", null) {
15126
                            public void actionPerformed(ActionEvent evt) {
15127
                                 int opIndexSelected = operationComboBox.getSelectedIndex();
15128
                                 selectedOperationInfo = opInfoList.get(opIndexSelected);
15129
                                 paraInfoList = selectedOperationInfo.getParaList();
15130
                                 int oldPInfoCount = paraInfoTableModel.getRowCount();
15131
                                 while (oldPInfoCount-- > 0) {
15132
                                      paraInfoTableModel.removeRow(0);
15133
                                 }
                                 for (ParameterInfo pi : paraInfoList) {
15134
                                     paraInfoTableModel.addRow(new
15135
                                                                           String[]
                                                                                        {pi.getName(),
```

```
15136
          pi.getClassInfo()});
15137
                                 }
15138
15139
                        };
15140
15141
                   return operationSelectionAction;
15142
15143
              private JLabel getJLabelParameterInformation() {
                   if(paraInfoJLabel == null) {
15144
15145
                        paraInfoJLabel = new JLabel();
                        paraInfoJLabel.setText("\u8f93\u5165\u53c2\u6570");
15146
15147
                        paraInfoJLabel.setBounds(24, 73, 61, 17);
15148
15149
                   return paraInfoJLabel;
15150
              private JLabel getParaResJLabel() {
15151
                   if(paraResJLabel == null) {
15152
                        paraResJLabel = new JLabel();
15153
15154
                        paraResJLabel.setText("\u53c2\u6570\u8bf4\u660e");
                        paraResJLabel.setBounds(274, 73, 64, 17);
15155
15156
15157
                   return paraResJLabel;
15158
15159
              private JTextArea getParaResJTextArea() {
15160
                   if(paraResJTextArea == null) {
                        paraResJTextArea = new JTextArea();
15161
15162
                        paraResJTextArea.setEditable(false);
15163
                   return paraResJTextArea;
15164
15165
15166
              private JTable getParaInfoJTable() {
                   if (paraInfoJTable == null) {
15167
15168
                        String[] name = new String[] {"参数名", "数据类型"};
                        int opIndexSelected = operationComboBox.getSelectedIndex();
15169
                        OperationInfo opInfo = opInfoList.get(opIndexSelected);
15170
15171
                        paraInfoList = opInfo.getParaList();
15172
                        paraInfoTableModel = new DefaultTableModel(null, name);
15173
                        for (ParameterInfo pi : paraInfoList) {
                            paraInfoTableModel.addRow(new String[] {pi.getName(), pi.getClassInfo()});
15174
15175
                        }
15176
                        paraInfoJTable = new JTable(paraInfoTableModel) {
                            public boolean isCellEditable(int row, int column) {
15177
15178
                                 return false:
15179
                            }
15180
                        };
15181
                        paraInfoJTable.setSelectionMode(ListSelectionModel.SINGLE_SELECTION);
15182
                        paraInfoJTable.addMouseListener(new MouseAdapter() {
                            public void mouseClicked(MouseEvent evt) {
15183
                                 int selectedRow = paraInfoJTable.getSelectedRow();
15184
                                 if (paraResJTextArea != null && paraInfoList != null &&
15185
```

```
selectedRow >= 0
15186
              paraResJTextArea.setText(paraInfoList.get(selectedRow).getRestriction());
15187
15188
15189
                        });
15190
                   return paraInfoJTable;
15191
15192
15193
              private JLabel getTestStrategyJLabel() {
                   if(testStrategyJLabel == null) {
15194
15195
                        testStrategyJLabel = new JLabel();
                        testStrategyJLabel.setText("\u6d4b\u8bd5\u7b56\u7565");
15196
15197
                        testStrategyJLabel.setBounds(12, 266, 53, 17);
15198
15199
                   return testStrategyJLabel;
15200
              }
15201
              private JComboBox getTestStrategyJComboBox() {
                   if(testStrategyJComboBox == null) {
15202
15203
                        ComboBoxModel testStrategyJComboBoxModel =
15204
                                 new DefaultComboBoxModel(
                                                             "Random Testing", "Dynamic Random
15205
                                                String[] {
15206
          Testing" });
15207
                        testStrategyJComboBox = new JComboBox();
15208
                        testStrategyJComboBox.setModel(testStrategyJComboBoxModel);
                        testStrategyJComboBox.setBounds(24, 295, 116, 24);
15209
15210
                        testStrategyJComboBox.setFont(new java.awt.Font("Times New Roman", 0, 12));
15211
15212
                   return testStrategyJComboBox;
15213
15214
              private JButton getJButtonNext() {
15215
                   if(iButtonNext == null) {
15216
                       ¡ButtonNext = new JButton();
                       jButtonNext.setText("\u4e0b\u4e00\u6b65");
15217
15218
                       jButtonNext.setBounds(392, 367, 80, 30);
15219
                       ¡ButtonNext.setAction(getNextAction());
15220
15221
                   return jButtonNext;
15222
15223
              private JButton getJButtonPre() {
                   if(jButtonPre == null) {
15224
15225
                       ¡ButtonPre = new JButton();
15226
                       jButtonPre.setText("\u4e0a\u4e00\u6b65");
15227
                       ¡ButtonPre.setBounds(238, 367, 80, 30);
15228
15229
                   return jButtonPre;
15230
              }
15231
              private AbstractAction getNextAction() {
15232
                   if(nextAction == null) {
                        nextAction = new AbstractAction("\u4e0b\u4e00\u6b65", null) {
15233
                            public void actionPerformed(ActionEvent evt) {
15234
15235
                                 setting.put("Operation", (String)operationComboBox.getSelectedItem());
```

```
setting.put("Test
15236
                                                                                             Strategy",
15237
          (String)testStrategyJComboBox.getSelectedItem());
15238
                                 SwingUtilities.invokeLater(new Runnable() {
15239
                                      public void run() {
15240
                                           TestSettingFrame
                                                             inst
                                                                              TestSettingFrame(setting,
          selectedOperationInfo);
15241
                                           inst.setLocationRelativeTo(null);
15242
                                           inst.setVisible(true);
15243
                                      }
15244
15245
                                 });
15246
                             }
15247
                        };
15248
                   return nextAction;
15249
15250
              }
15251
15252
          package ui;
15253
          import java.awt.Component;
15254
          import java.awt.GridLayout;
15255
          import java.awt.event.ActionEvent;
15256
          import java.awt.event.KeyAdapter;
15257
          import java.awt.event.KeyEvent;
15258
          import java.awt.event.MouseAdapter;
15259
          import java.awt.event.MouseEvent;
15260
          import java.io.File;
15261
          import javax.swing.AbstractAction;
15262
          import javax.swing.ButtonGroup;
15263
          import javax.swing.ComboBoxModel;
15264
          import javax.swing.DefaultComboBoxModel;
15265
          import javax.swing.JButton;
15266
          import javax.swing.JComboBox;
          import javax.swing.JFileChooser;
15267
15268
          import javax.swing.JLabel;
15269
          import javax.swing.JPanel;
15270
          import javax.swing.JRadioButton;
15271
          import javax.swing.JScrollPane;
15272
          import javax.swing.JTable;
15273
          import javax.swing.JTextField;
15274
          import javax.swing.WindowConstants;
          import javax.swing.event.ChangeEvent;
15275
15276
          import javax.swing.event.ChangeListener;
15277
          import javax.swing.SwingUtilities;
15278
          import javax.swing.table.DefaultTableModel;
          import javax.swing.table.TableColumn;
15279
15280
          import cn.edu.ustb.webservicetester.model.OperationInfo;
15281
          import cn.edu.ustb.webservicetester.model.ParameterInfo;
          import cn.edu.ustb.webservicetester.model.TestCase;
15282
15283
          import cn.edu.ustb.webservicetester.model.TestSet;
15284
          import cn.edu.ustb.webservicetester.util.TestSetFileParser;
15285
          import test.TestJFileChooseer.MyFileFilter;
```

```
15286
          public class TestSettingFrame extends javax.swing.JFrame {
               private JPanel jPanel1;
15287
15288
               private JButton nextPageJButton;
15289
               private JRadioButton addTestCaseAutoRadioButton;
15290
               private AbstractAction importTestCaseAction;
               private JButton addTestCaseAutoAdvancedSettingJButton;
15291
               private JButton addTestCaseAutoBeginJButton;
15292
15293
               private JLabel addTestCaseAutoLabel2;
              private JTextField addTestCaseAutoTextField;
15294
15295
               private JLabel addTestCaseAutoLabel1;
               private JButton importTestCaseAddButton;
15296
15297
               private JButton importTestCaseScanButton;
               private JTextField importTestCaseTextField;
15298
15299
               private ButtonGroup buttonGroup1;
               private JRadioButton addTestCaseImportJRadioButton;
15300
15301
              private JLabel jLabel1;
               private JButton prePageButton;
15302
15303
              private JComboBox selectPageComboBox;
15304
               private JScrollPane testSetDemoJScrollPane;
               private JTable testSetDemoJTable;
15305
15306
               private DefaultTableModel testSetDemoTableModel;
15307
               private java.util.List<ParameterInfo> paraInfoList = null;
15308
               private AbstractAction abstractAction1;
               private TestSet testSet = null;
15309
15310
               private OperationInfo operationInfo;
               private java.util.Map<String, String> testSetting = null;
15311
15312
               public static void main(String[] args) {
15313
                   SwingUtilities.invokeLater(new Runnable() {
15314
                        public void run() {
                             TestSettingFrame inst = new TestSettingFrame();
15315
15316
                             inst.setLocationRelativeTo(null);
                             inst.setVisible(true);
15317
15318
                        }
                   });
15319
15320
               }
               public TestSettingFrame() {
15321
15322
                   super();
15323
                   initGUI():
15324
15325
                       TestSettingFrame(java.util.Map<String,
                                                               String>
                                                                         testSettingMap,
                                                                                           OperationInfo
15326
          operInfo) {
15327
                   super();
15328
                   testSetting = testSettingMap;
                   initGUI(operInfo);
15329
15330
               }
15331
               private void initGUI() {
15332
                   initGUI(null);
15333
               private void initGUI(OperationInfo oi) {
15334
15335
                   operationInfo = oi;
```

```
15336
                   paraInfoList = operationInfo.getParaList();
15337
                   try {
                        setTitle("测试配置");
15338
15339
                        setResizable(false);
15340
                        GridLayout thisLayout = new GridLayout(1, 1);
                        getContentPane().setLayout(thisLayout);
15341
15342
                        {
15343
                            ¡Panel1 = new JPanel();
                            getContentPane().add(jPanel1);
15344
15345
                            jPanel1.setLayout(null);
15346
                            jPanel1.setBackground(new java.awt.Color(228,236,243));
15347
15348
                                 testSetDemoJScrollPane = new JScrollPane();
                                 jPanel1.add(testSetDemoJScrollPane);
15349
                                 ¡Panel1.add(getNextPageJButton());
15350
                                 jPanel1.add(getSelectPageComboBox());
15351
                                 jPanel1.add(getPrePageButton());
15352
                                 ¡Panel1.add(getJLabel1());
15353
15354
                                 ¡Panel1.add(getAddTestCaseImportJRadioButton());
                                 jPanel1.add(getAddTestCaseAutoRadioButton());
15355
15356
                                 jPanel1.add(getImpotyTestCaseTextField());
15357
                                 iPanel1.add(getImportTestCaseScanButton());
                                 ¡Panel1.add(getImportTestCaseAddButton());
15358
                                 jPanel1.add(getAddTestCaseAutoLabel1());
15359
15360
                                 ¡Panel1.add(getAddTestCaseAutoTextField());
                                 ¡Panel1.add(getAddTestCaseAutoLabel2());
15361
15362
                                 jPanel1.add(getAddTestCaseAutoBeginJButton());
15363
                                 jPanel1.add(getAddTestCaseAutoAdvancedSettingJButton());
15364
                                 getButtonGroup1();
                                 addTestCaseImportJRadioButton.setSelected(true);
15365
15366
                                 testSetDemoJScrollPane.setBounds(12, 12, 470, 183);
                                 testSetDemoJScrollPane.setViewportView(getTestSetDemoJTable());
15367
                            }
15368
15369
                        setDefaultCloseOperation(WindowConstants.DISPOSE_ON_CLOSE);
15370
15371
                        pack();
15372
                        setSize(500, 444);
15373
                   } catch (Exception e) {
                        e.printStackTrace();
15374
15375
                   }
15376
              private JTable getTestSetDemoJTable() {
15377
                   if (testSetDemoJTable == null) {
15378
15379
                       java.util.List<String> nl = new java.util.LinkedList<String>();
15380
                        nl.add("id");
15381
                        for (ParameterInfo pi : paraInfoList) {
15382
                            nl.add(pi.getName());
15383
                        nl.add("expected result");
15384
                        String[] name = new String[nl.size()];
15385
```

```
15386
                       nl.toArray(name);
15387
                        String[] a = {""};
15388
                       String[][] data = \{a\};
15389
                        testSetDemoTableModel = new DefaultTableModel(data, name);
15390
                        testSetDemoJTable = new JTable(testSetDemoTableModel) {
                            public boolean isCellEditable(int row, int column) {
15391
15392
                                 return false;
15393
                            }
                        };
15394
15395
                       int w = testSetDemoJTable.getTableHeader().getWidth();
15396
                        testSetDemoJTable.getTableHeader().setSize(w, 17);
15397
                        testSetDemoJTable.setRowHeight(17);
15398
15399
                   return testSetDemoJTable;
15400
              }
              private JButton getNextPageJButton() {
15401
                   if(nextPageJButton == null) {
15402
15403
                       nextPageJButton = new JButton();
15404
                       nextPageJButton.setText("\u4e0b\u4e00\u9875");
                       nextPageJButton.setBounds(393, 211, 90, 24);
15405
15406
                        nextPageJButton.setAction(getAbstractAction1());
15407
                   }
15408
                   return nextPageJButton;
15409
              }
15410
              private JComboBox getSelectPageComboBox() {
                   if(selectPageComboBox == null) {
15411
15412
                       ComboBoxModel selectPageComboBoxModel =
15413
                                 new DefaultComboBoxModel(
15414
                                          new String[] { "第 1 页", "第 2 页" });
15415
                        selectPageComboBox = new JComboBox();
15416
                        selectPageComboBox.setModel(selectPageComboBoxModel);
15417
                       selectPageComboBox.setBounds(279, 211, 88, 24);
15418
                       selectPageComboBox.setEditable(true);
15419
15420
                   return selectPageComboBox;
15421
              }
15422
              private JButton getPrePageButton() {
15423
                   if(prePageButton == null) {
15424
                        prePageButton = new JButton();
15425
                       prePageButton.setText("\u4e0a\u4e00\u9875");
15426
                       prePageButton.setBounds(164, 211, 90, 24);
15427
15428
                   return prePageButton;
15429
              }
15430
              private JLabel getJLabel1() {
15431
                   if(jLabel1 == null) {
15432
                       ¡Label1 = new JLabel();
15433
                       jLabel1.setText("\u5171 0 \u6761\u6d4b\u8bd5\u7528\u4f8b");
                       jLabel1.setBounds(12, 205, 134, 21);
15434
                       jLabel1.setForeground(new java.awt.Color(255,0,0));
15435
```

```
15436
                                     }
15437
                                     return jLabel1;
15438
15439
                           private JRadioButton getAddTestCaseImportJRadioButton() {
15440
                                     if(addTestCaseImportJRadioButton == null) {
                                              addTestCaseImportJRadioButton = new JRadioButton();
15441
                                              addTestCaseImportJRadioButton.setText("\u5bfc\u5165\u6587\u4ef6");
15442
15443
                                              addTestCaseImportJRadioButton.setBounds(12, 275, 80, 21);
                                              add Test Case ImportJ Radio Button. set Background (new Australia Structure Background) and the set of the s
15444
15445
                  java.awt.Color(252,252,203));
15446
                                              addTestCaseImportJRadioButton.addChangeListener(new ChangeListener() {
15447
                                                       public void stateChanged(ChangeEvent evt) {
15448
                                                                addTestCaseImportJRadioButtonStateChanged(evt);
15449
                                              });
15450
15451
15452
                                     return addTestCaseImportJRadioButton;
15453
                            }
15454
                            private JRadioButton getAddTestCaseAutoRadioButton() {
                                     if(addTestCaseAutoRadioButton == null) {
15455
15456
                                              addTestCaseAutoRadioButton = new JRadioButton();
15457
                                              addTestCaseAutoRadioButton.setText("\u81ea\u52a8\u6dfb\u52a0");
                                              addTestCaseAutoRadioButton.setBounds(12, 345, 80, 21);
15458
15459
                                              addTestCaseAutoRadioButton.setBackground(new java.awt.Color(252,252,203));
15460
                                     return addTestCaseAutoRadioButton;
15461
15462
                            }
15463
                            private ButtonGroup getButtonGroup1() {
15464
                                     if(buttonGroup1 == null) {
15465
                                              buttonGroup1 = new ButtonGroup();
15466
                                     buttonGroup1.add(addTestCaseImportJRadioButton);
15467
15468
                                     buttonGroup1.add(addTestCaseAutoRadioButton);
15469
                                     return buttonGroup1;
15470
                            }
15471
                            private JTextField getImpotyTestCaseTextField() {
15472
                                     if(importTestCaseTextField == null) {
15473
                                              importTestCaseTextField = new JTextField();
                                              importTestCaseTextField.setBounds(97, 274, 206, 24);
15474
15475
                                     }
15476
                                     return importTestCaseTextField;
15477
                            }
15478
                            private JButton getImportTestCaseScanButton() {
15479
                                     if(importTestCaseScanButton == null) {
15480
                                              importTestCaseScanButton = new JButton();
15481
                                              importTestCaseScanButton.setText("\u6d4f\u89c8");
15482
                                              importTestCaseScanButton.setBounds(303, 274, 54, 24);
                                              importTestCaseScanButton.setFont(new java.awt.Font("微软雅黑",0,10));
15483
                                              final javax.swing.JFrame parentFrame = this;
15484
15485
                                              importTestCaseScanButton.addMouseListener(new MouseAdapter() {
```

```
15486
                                                      public void mouseClicked(MouseEvent evt) {
                                                              JFileChooser jf = new JFileChooser();
15487
15488
                                                              if.setApproveButtonText("导入");
15489
                                                              if.setCurrentDirectory(new File("."));
15490
                                                              if.setMultiSelectionEnabled(false);
                                                              jf.setFileFilter(new MyFileFilter("xml"));
15491
                                                              if.setDialogTitle("请选择要导入的测试集文件");
15492
15493
                                                              jf.showOpenDialog(parentFrame);
                                                              File f = jf.getSelectedFile();
15494
15495
                                                              if (f != null) {
                                                                       importTestCaseTextField.setText(f.getPath());
15496
15497
                                                              }
15498
                                                      }
                                             });
15499
15500
                                    return importTestCaseScanButton;
15501
15502
                           }
                           private JButton getImportTestCaseAddButton() {
15503
15504
                                    if(importTestCaseAddButton == null) {
                                             importTestCaseAddButton = new JButton();
15505
15506
                                             importTestCaseAddButton.setText("\u5bfc\u5165");
15507
                                             importTestCaseAddButton.setBounds(360, 274, 54, 24);
                                             importTestCaseAddButton.setFont(new java.awt.Font("微软雅黑",0,10));
15508
                                             importTestCaseAddButton.setAction(getImportTestCaseAction());
15509
15510
                                    return importTestCaseAddButton;
15511
15512
                           }
15513
                           private JLabel getAddTestCaseAutoLabel1() {
15514
                                    if(addTestCaseAutoLabel1 == null) {
15515
                                             addTestCaseAutoLabel1 = new JLabel();
15516
                                             addTestCaseAutoLabel1.setText("\u6dfb\u52a0");
                                             addTestCaseAutoLabel1.setBounds(97, 347, 30, 17);
15517
15518
                                    return addTestCaseAutoLabel1;
15519
15520
                           }
15521
                           private JTextField getAddTestCaseAutoTextField() {
15522
                                    if(addTestCaseAutoTextField == null) {
15523
                                             addTestCaseAutoTextField = new JTextField():
                                             addTestCaseAutoTextField.setBounds(133, 344, 56, 24);
15524
15525
                           addTestCaseAutoTextField.setToolTipText("\u81ea\u52a8\u751f\u6210\u6d4b\u8bd5\u7528\u7528\u751f\u6210\u6d4b\u8bd5\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u7528\u752
15526
                  u4f8b\u7684\u6570\u91cf");
15527
                                            addTestCaseAutoTextField.setHorizontalAlignment(JTextField.RIGHT);
15528
                                             addTestCaseAutoTextField.addKeyListener(new KeyAdapter() {
15529
                                                      public void keyTyped(KeyEvent evt) {
15530
                                                              char kc = evt.getKeyChar();
15531
                                                              if (addTestCaseAutoTextField.getText().length() == 0 && kc >=
15532
                   KeyEvent.VK_1 \&\& kc <= KeyEvent.VK_9) {
15533
                                                               } else if (addTestCaseAutoTextField.getText().length() > 0 &&
15534
                  addTestCaseAutoTextField.getText().length() < 6 && kc >= KeyEvent.VK_0 && kc <=
15535
```

```
15536
          KeyEvent.VK_9) {
15537
                                 } else {
                                      evt.consume();
15538
15539
                                 }
15540
15541
                        });
                        addTestCaseAutoTextField.setEnabled(false);
15542
15543
15544
                   return addTestCaseAutoTextField;
15545
              }
15546
              private JLabel getAddTestCaseAutoLabel2() {
15547
                   if(addTestCaseAutoLabel2 == null) {
15548
                        addTestCaseAutoLabel2 = new JLabel();
                        addTestCaseAutoLabel2.setText("\u6761\u6d4b\u8bd5\u7528\u4f8b");
15549
                        addTestCaseAutoLabel2.setBounds(197, 347, 70, 17);
15550
15551
                   return addTestCaseAutoLabel2;
15552
              }
15553
15554
              private JButton getAddTestCaseAutoBeginJButton() {
                   if(addTestCaseAutoBeginJButton == null) {
15555
15556
                        addTestCaseAutoBeginJButton = new JButton();
15557
                        addTestCaseAutoBeginJButton.setText("\u5f00\u59cb");
                        addTestCaseAutoBeginJButton.setBounds(290, 345, 90, 24);
15558
                        addTestCaseAutoBeginJButton.setEnabled(false);
15559
15560
15561
                   return addTestCaseAutoBeginJButton;
15562
              }
15563
              private JButton getAddTestCaseAutoAdvancedSettingJButton() {
15564
                   if(addTestCaseAutoAdvancedSettingJButton == null) {
15565
                        addTestCaseAutoAdvancedSettingJButton = new JButton();
15566
                        addTestCaseAutoAdvancedSettingJButton.setText("\u9ad8\u7ea7\u8bbe\u7f6e");
                        addTestCaseAutoAdvancedSettingJButton.setBounds(393, 345, 90, 24);
15567
15568
                        addTestCaseAutoAdvancedSettingJButton.setFont(new java.awt.Font(" 微软雅黑
          ",0,10));
15569
                        addTestCaseAutoAdvancedSettingJButton.setEnabled(false);
15570
15571
                   }
15572
                   return addTestCaseAutoAdvancedSettingJButton;
15573
              private AbstractAction getImportTestCaseAction() {
15574
15575
                   if(importTestCaseAction == null) {
15576
                        importTestCaseAction = new AbstractAction("\u5bfc\u5165", null) {
                            public void actionPerformed(ActionEvent evt) {
15577
                                 File f = new File(importTestCaseTextField.getText());
15578
15579
                                 TestSetFileParser tsfp = new TestSetFileParser();
15580
                                 tsfp.setParaInfoList(paraInfoList);
15581
                                 testSet = tsfp.parseFile(importTestCaseTextField.getText());
15582
                                 for (int i = 0; i < testSet.numOfTestCases(); ++i) {
                                      TestCase tc = testSet.get(i);
15583
                                     java.util.List<String>
                                                                    pValueList
15584
                                                                                                  new
15585
         java.util.ArrayList<String>(paraInfoList.size() + 2);
```

```
15586
                                       pValueList.add(new Integer(tc.getId()).toString());
15587
                                       for (ParameterInfo pi : paraInfoList) {
15588
                                            pValueList.add(tc.getValueOfParameter(pi));
15589
                                       }
15590
                                       pValueList.add(tc.getExpectedResult());
                                       String[] pValueArray = new String[pValueList.size()];
15591
15592
                                       pValueList.toArray(pValueArray);
15593
                                       for (String pv : pValueArray) {
                                            System.out.println(pv);
15594
15595
                                       testSetDemoTableModel.addRow(pValueArray);
15596
15597
                                  }
15598
                             }
                        };
15599
15600
15601
                   return importTestCaseAction;
15602
               }
15603
               private AbstractAction getAbstractAction1() {
15604
                   if(abstractAction1 == null) {
                        abstractAction1 = new AbstractAction("\u4e0b\u4e00\u9875", null) {
15605
15606
                             public void actionPerformed(ActionEvent evt) {
15607
                                  if (testSet != null) {
15608
                                       String testStrategy = testSetting.get("Test Strategy");
                                       testSetting.put("Test Set", importTestCaseTextField.getText());
15609
15610
                                       System.out.println(testStrategy);
                                       if ("Random Testing".equals(testStrategy)) {
15611
15612
                                            ExecutionFrame ef = new ExecutionFrame(testSetting,
15613
          operationInfo, testSet);
15614
                                            ef.setLocationRelativeTo(null);
                                            ef.setVisible(true);
15615
15616
                                       } else if ("Dynamic Random Testing".equals(testStrategy)){
                                            System.out.println("??");
15617
15618
                                            PartitionSettingFrame2
                                                                            psf
                                                                                                     new
15619
          PartitionSettingFrame2(testSetting, operationInfo, testSet);
15620
                                            psf.setLocationRelativeTo(null);
15621
                                            psf.setVisible(true);
15622
                                       } else {
15623
                                            System.out.println("?");
15624
15625
                                  } else {
15626
                                  }
15627
                             }
15628
                        };
15629
15630
                   return abstractAction1;
15631
15632
               private void addTestCaseImportJRadioButtonStateChanged(ChangeEvent evt) {
                   System.out.println("addTestCaseImportJRadioButton.stateChanged, event="+evt);
15633
                   if (addTestCaseImportJRadioButton.isSelected()) {
15634
15635
                        importTestCaseTextField.setEnabled(true);
```

```
15636
                        importTestCaseScanButton.setEnabled(true);
                        importTestCaseAddButton.setEnabled(true);
15637
15638
                        addTestCaseAutoTextField.setEnabled(false);
15639
                        addTestCaseAutoBeginJButton.setEnabled(false);
15640
                        addTestCaseAutoAdvancedSettingJButton.setEnabled(false);
15641
                    } else {
15642
                        importTestCaseTextField.setEnabled(false);
15643
                        importTestCaseScanButton.setEnabled(false);
                        importTestCaseAddButton.setEnabled(false);
15644
15645
                        addTestCaseAutoTextField.setEnabled(true);
                        addTestCaseAutoBeginJButton.setEnabled(true);
15646
15647
                        addTestCaseAutoAdvancedSettingJButton.setEnabled(true);
15648
                   }
               }
15649
15650
          package test;
15651
15652
          import java.io.File;
15653
          import javax.swing.JFileChooser;
15654
          import javax.swing.filechooser.FileFilter;
          public class TestJFileChooseer {
15655
15656
               public static void main(String[] args) {
15657
                   JFileChooser if = new JFileChooser();
                   if.setApproveButtonText("导入");
15658
                   jf.setCurrentDirectory(new File("."));
15659
15660
                   jf.setMultiSelectionEnabled(false);
                   if.setFileFilter(new MyFileFilter("xml"));
15661
                   jf.setDialogTitle("请选择要导入的测试集文件");
15662
15663
                   jf.showOpenDialog(null);
15664
                   File f = if.getSelectedFile();
                   if (f!= null)
15665
15666
                        System.out.println(f.getPath());
               }
15667
               public static class MyFileFilter extends FileFilter {
15668
                   private String ext;
15669
                   public MyFileFilter(String extString) {
15670
15671
                        ext = extString;
15672
15673
                   public boolean accept(File f) {
                        if (f.isDirectory()) {
15674
15675
                             return true;
15676
15677
                        String extension = getExtension(f);
                        if (extension.toLowerCase().equals(this.ext.toLowerCase()))
15678
15679
                        {
15680
                             return true;
15681
15682
                        return false;
15683
                    }
                     public String getDescription() {
15684
                         return this.ext.toUpperCase();
15685
```

```
15686
                     }
                   private String getExtension(File f) {
15687
15688
                        String name = f.getName();
15689
                        int index = name.lastIndexOf('.');
15690
                        if (index == -1)
15691
                             return "";
15692
15693
                        }
                        else
15694
15695
15696
                             return name.substring(index + 1).toLowerCase();
15697
15698
                    }
               }
15699
15700
15701
          package test;
          import java.awt.BorderLayout;
15702
15703
          import javax.swing.DefaultCellEditor;
          import javax.swing.JPanel;
15704
15705
          import javax.swing.JScrollPane;
15706
          import javax.swing.JTable;
15707
          import javax.swing.JTextField;
15708
          import javax.swing.WindowConstants;
          import javax.swing.SwingUtilities;
15709
15710
          public class TestJTableFrame extends javax.swing.JFrame {
15711
               private JPanel jPanel1;
15712
              private JScrollPane jScrollPane1;
15713
              private JTable jTable1;
15714
               public static void main(String[] args) {
15715
                   SwingUtilities.invokeLater(new Runnable() {
15716
                        public void run() {
                             TestJTableFrame inst = new TestJTableFrame();
15717
15718
                             inst.setLocationRelativeTo(null);
15719
                             inst.setVisible(true);
15720
                        }
15721
                   });
15722
               }
15723
               public TestJTableFrame() {
15724
                   super();
15725
                   initGUI();
15726
15727
               private void initGUI() {
15728
                   try {
                        setDefaultCloseOperation(WindowConstants.DISPOSE_ON_CLOSE);
15729
15730
15731
                             ¡Panel1 = new JPanel();
15732
                             ¡Panel1.setLayout(null);
                             getContentPane().add(jPanel1, BorderLayout.CENTER);
15733
15734
15735
                                  jScrollPane1 = new JScrollPane();
```

```
15736
                                 jPanel1.add(jScrollPane1);
                                 jScrollPane1.setBounds(29, 36, 195, 136);
15737
15738
                                 iScrollPane1.setViewportView(getJTable1());
15739
                            }
15740
                        }
                       pack();
15741
                       setSize(400, 300);
15742
15743
                       jTable1.editCellAt(0, 0);
                       jTable1.getEditorComponent().requestFocusInWindow();
15744
15745
                   } catch (Exception e) {
                       e.printStackTrace();
15746
15747
                   }
15748
              }
              private JTable getJTable1() {
15749
                   if (jTable1 == null) {
15750
                        String[] s1 = new String[] {"小王", "0001"};
15751
                        String[] s2 = new String[] {"小芳", "0002"};
15752
                       String[][] data = new String[][] \{s1, s2\};
15753
15754
                       String[] name = new String[] {"姓名", "工号"};
                       jTable1 = new JTable(data, name);
15755
15756
15757
                   return jTable1;
              }
15758
15759
          }
15760
         package test;
         import java.io.File;
15761
15762
         import org.dom4j.Document;
15763
         import org.dom4j.DocumentException;
15764
         import org.dom4j.Element;
         public class XmlTest {
15765
15766
              public static void main(String[] args) {
                   File f = new File("E:\\研究生\\毕业设计\\DRT 算法改进\\实验\\停车计费\\测试用例
15767
15768
          集\\随机 1000 规模\\testcaseset4RT.xml");
15769
                   org.dom4j.io.SAXReader saxReader = new org.dom4j.io.SAXReader();
15770
                   Document document = null;
15771
                   Element rootElement = null;
15772
                   try {
15773
                        document = saxReader.read(f);
                       rootElement = document.getRootElement();
15774
15775
                       java.util.List<Element> testCaseList = rootElement.selectNodes("testCase");
15776
                       System.out.println(testCaseList.size());
15777
                   } catch (DocumentException e) {
15778
                       e.printStackTrace();
15779
                   }
15780
              }
15781
          }
         package test;
15782
         import cn.edu.ustb.mt4ws.tcg.WsdlOperationFormat;
15783
         import cn.edu.ustb.mt4ws.wsdl.parser.WsdlReader11;
15784
15785
         import javax.wsdl.*;
```

```
15786
          import javax.wsdl.extensions.*;
          import javax.wsdl.factory.*;
15787
15788
          import javax.wsdl.xml.*;
15789
          import javax.xml.namespace.QName;
15790
          import java.io.*;
          import java.util.*;
15791
          import org.dom4j.DocumentException;
15792
15793
          import org.dom4j.io.SAXReader;
          import org.w3c.dom.*;
15794
15795
          public class ZzqTest {
15796
              public static void main(String[] args) {
15797
                   String wsUrl = "http://localhost:8080/axis2/services/ATMService?wsdl";
15798
                   File f = new File("temp.xml");
                   if (!f.exists()) {
15799
15800
                   try {
                        WSDLFactory factory = WSDLFactory.newInstance();
15801
                        WSDLReader reader = factory.newWSDLReader();
15802
15803
                        reader.setFeature("javax.wsdl.verbose", true);
15804
                        reader.setFeature("javax.wsdl.importDocuments", true);
                        Definition def = reader.readWSDL(wsUrl);
15805
15806
                        Writer
                               xmlWriter =
                                                 new
                                                        BufferedWriter(new
                                                                              OutputStreamWriter(new
          FileOutputStream("temp.xml")));
15807
                        WSDLWriter wsdlWriter = factory.newWSDLWriter();
15808
                        wsdlWriter.writeWSDL(def, xmlWriter);
15809
15810
                   } catch (FileNotFoundException e) {
                        e.printStackTrace();
15811
15812
                   } catch (WSDLException e) {
15813
                        e.printStackTrace();
15814
                   }
15815
                   }
15816
                   SAXReader dReader = new SAXReader();
15817
                   org.dom4j.Document document;
15818
                   try {
                        document = dReader.read(new File("temp.xml"));
15819
15820
                        org.dom4j.Element root = document.getRootElement();
15821
                        org.dom4j.Element typesElement = root.element("types");
15822
                        org.dom4j.Element schemaElement = typesElement.element("schema");
15823
                        @SuppressWarnings("unchecked")
                                                                        elist
15824
                        List<org.dom4j.Element>
15825
          (List<org.dom4j.Element>)schemaElement.elements();
15826
                        for (org.dom4j.Element e : elist) {
15827
                            if (e.attribute("name").getValue().equals("accountNumber")) {
15828
                                 org.dom4j.Element rElement = e.element("restriction");
15829
                                 String nativeType = rElement.attribute("base").getValue();
15830
                                 System.out.println(nativeType);
15831
                             }
15832
                        }
                   } catch (DocumentException e) {
15833
                        e.printStackTrace();
15834
15835
```

```
15836
               }
15837
          }
15838
          package test.thread;
15839
          import java.util.*;
15840
          import java.util.concurrent.TimeUnit;
          public class ThreadTestMain {
15841
               static class WriteString implements Runnable {
15842
15843
                    private List<String> sl;
                    public WriteString(List<String> ssl) {
15844
15845
                         sl = ssl;
15846
                    }
15847
                    public void run() {
                         int i = 0;
15848
                         String s;
15849
                         while (i++ < 20) {
15850
                              s = new Integer(i).toString();
15851
15852
                              sl.add(s);
15853
                              try {
15854
                                   TimeUnit.MILLISECONDS.sleep(new Random().nextInt(1500));
                              } catch (InterruptedException e) {
15855
15856
                                   e.printStackTrace();
15857
                                   System.out.println("size:" + sl.size());
15858
                                   System.out.print(i + ": ");
                                   System.out.println(sl.get(i));
15859
15860
15861
                              }
15862
                         }
15863
                    }
15864
               }
15865
               static class ReadString implements Runnable {
15866
                    List<String> sl;
                    public ReadString(List<String> ssl) {
15867
15868
                         sl = ssl;
15869
15870
                    public void run() {
15871
                         int i = 0;
15872
                         while (i < 20) {
15873
                              if (i < sl.size()) {
                                   System.out.println("size:" + sl.size());
15874
15875
                                   System.out.print(i + ": ");
15876
                                   System.out.println(sl.get(i));
15877
                                   ++i;
15878
                              } else {
15879
                                   try {
15880
                                        TimeUnit.MILLISECONDS.sleep(2000);
15881
                                   } catch (InterruptedException e) {
15882
                                        e.printStackTrace();
15883
                              }
15884
15885
                         }
```

```
15886
                    }
15887
               }
               public static void main(String[] args) {
15888
15889
                    List<String> sl = new ArrayList<String>();
15890
                    Thread th1 = new Thread(new WriteString(sl));
                    Thread th2 = new Thread(new ReadString(sl));
15891
15892
                    th1.start();
15893
                    th2.start();
               }
15894
15895
15896
          package cn.edu.ustb.webservicetester.controllor;
15897
          import javax.swing.SwingUtilities;
15898
          import ui. Operation Select Frame;
15899
          import ui.OperationSelectionFrame2;
          import ui.PreferenceFrame;
15900
15901
          import cn.edu.ustb.webservicetester.util.WsdlParser;
          public class ParseWsdlControllor {
15902
15903
               public void parseWsdlControl(String wsdlUrl) {
15904
                    WsdlParser parser = new WsdlParser();
15905
                    final java.util.List opInfoList = parser.parseWsdl(wsdlUrl);
15906
                    final java.util.Map<String, String> setting = new java.util.HashMap<String, String>();
15907
                    setting.put("Web Service", wsdlUrl.substring(0, wsdlUrl.lastIndexOf("?wsdl")));
15908
                    SwingUtilities.invokeLater(new Runnable() {
                        public void run() {
15909
15910
                             PreferenceFrame inst = new PreferenceFrame(setting, opInfoList);
                             inst.setLocationRelativeTo(null);
15911
15912
                             inst.setVisible(true):
15913
                         }
15914
                    });
               }
15915
15916
15917
          package cn.edu.ustb.webservicetester.model;
15918
          public class ParameterIntervalScenario {
15919
               private String range;// 区间范围
15920
               private int weight;// 权重
15921
               public String getRange() {
15922
                    return range;
15923
               }
               public void setRange(String range) {
15924
15925
                    this.range = range;
15926
15927
               public int getWeight() {
15928
                    return weight;
15929
15930
               public void setWeight(int weight) {
15931
                    this.weight = weight;
15932
               }
15933
15934
          package cn.edu.ustb.webservicetester.model;
15935
          public class ParameterPartitionScenario {
```

```
private ParameterInfo paraInfo;// 参数信息
15936
               private java.util.List<ParameterIntervalScenario> partitionScenario;// 分区方案
15937
15938
               public ParameterPartitionScenario() {
15939
                    partitionScenario = new java.util.LinkedList<ParameterIntervalScenario>();
15940
               public ParameterInfo getParaInfo() {
15941
                    return paraInfo;
15942
15943
               public void setParaInfo(ParameterInfo paraInfo) {
15944
15945
                    this.paraInfo = paraInfo;
15946
               }
15947
               public ParameterIntervalScenario get(int index) {
15948
                    return partitionScenario.get(index);
15949
15950
               public void add(ParameterIntervalScenario paraInter) {
                    partitionScenario.add(paraInter);
15951
               }
15952
15953
               public int numOfIntervals() {
15954
                    return partitionScenario.size();
15955
               }
15956
15957
          package cn.edu.ustb.webservicetester.model;
15958
          import java.util.Map.Entry;
          public class Partition extends TestSet {
15959
15960
               private java.util.Map<ParameterInfo, String> rules;
15961
               public Partition() {
15962
                    super();
15963
                    rules = new java.util.HashMap<ParameterInfo, String>();
15964
15965
               public Partition(java.util.Map<ParameterInfo, String> rs) {
15966
                    super();
                    rules = rs;
15967
15968
               public void addRule(ParameterInfo pi, String rStr) {
15969
15970
                    rules.put(pi, rStr);
15971
               }
15972
               public String getRule(ParameterInfo pi) {
15973
                    if (!rules.containsKey(pi))
                         return null;
15974
15975
                    return rules.get(pi);
15976
15977
               public boolean couldAdd(TestCase tc) {
15978
                    java.util.List<ParameterInfo> paraInfoList = tc.getParameters();
15979
                    boolean ca = true;
15980
                    for (int i = 0; i < paraInfoList.size() && ca; ++i) {
15981
                         ParameterInfo pi = paraInfoList.get(i);
15982
                         if (pi.getType() == ParameterInfo.WHATEVER) {
                             continue;
15983
15984
15985
                         if (!rules.containsKey(pi)) {
```

```
15986
                              ca = false;
                              continue;
15987
15988
15989
                         String ci = pi.getClassInfo();
15990
                         if (pi.getType() == ParameterInfo.SCATTERED) {
                              ca = tc.getValueOfParameter(pi).equals(rules.get(pi));
15991
15992
                          } else{
                              String rule = rules.get(pi);
15993
                              String ss[] = rule.split(",");
15994
15995
                              String s1 = ss[0].substring(1).trim();
                              String s2 = ss[1].substring(0, ss[1].length() - 1).trim();
15996
15997
                              String s = tc.getValueOfParameter(pi);
15998
                              if ("byte".equals(ci)
15999
                                        || "short".equals(ci)
16000
                                        | "int".equals(ci)
16001
                                        | "long".equals(ci)) {
16002
                                   long 11 = new Long(s1);
16003
                                   long 12 = new Long(s2);
16004
                                   long l = new Long(s);
16005
                                   if (1 < 12 \&\& 1 > 11) {
16006
                                        ca = true;
16007
                                   } else if (rule.startsWith("[") && l == 11) {
16008
                                        ca = true;
                                   } else if (rule.endsWith("]") && 1 == 12) {
16009
16010
                                        ca = true;
                                   } else {
16011
16012
                                        ca = false;
16013
                               } else if ("float".equals(ci) || "double".equals(ci)) {
16014
                                   double d1 = new Double(s1);
16015
16016
                                   double d2 = new Double(s2);
16017
                                   System.out.println(pi.getName());
16018
                                   System.out.println(s);
16019
                                   System.out.println(tc.containsParameter(pi));
16020
                                   System.out.println(i);
16021
                                   rsb.append(ent.getKey());
                                   rsb.append(": ");
16022
16023
                                   rsb.append(ent.getValue());
16024
                                   rsb.append("\n");
16025
                                   double d = new Double(s);
16026
                                   if (d < d2 \&\& d > d1) {
16027
                                        ca = true;
16028
                                   } else if (rule.startsWith("[") && Math.abs(d - d1) < 1e-5) {
16029
16030
                                   } else if (rule.endsWith("]") && Math.abs(d2 - d) < 1e-5) {
16031
                                        ca = true:
16032
                                   } else {
16033
                                        ca = false;
16034
16035
                               } else if ("char".equals(ci)
```

```
16036
                                      && s1.length() == 1
16037
                                      && s2.length() == 1
16038
                                      && s.length() == 1) {
16039
                                 char c1 = s1.charAt(0);
16040
                                 char c2 = s2.charAt(0);
16041
                                 char c = s.charAt(0);
                                 if (c < c2 \&\& c > c1) {
16042
16043
                                      ca = true;
16044
                                 } else if (rule.startsWith("[") && c == c1) {
16045
                                      ca = true;
16046
                                 16047
                                      ca = true;
16048
                                 } else {
                                      ca = false;
16049
16050
                                 }
16051
                             } else {
16052
16053
                        }
16054
                   }
                   return ca;
16055
16056
              public String toString() {
16057
                   StringBuffer rsb = new StringBuffer();
16058
                   for (Entry<ParameterInfo, String> ent : rules.entrySet()) {
16059
16060
                        rsb.append(ent.getKey());
16061
                        rsb.append(": ");
16062
                        rsb.append(ent.getValue());
16063
                        rsb.append("\n");
16064
                   }
16065
                   rsb.append("[\n");
16066
                   java.util.Iterator<TestCase> tcIter = testCases.iterator();
16067
                   while (tcIter.hasNext()) {
16068
                        TestCase tc = tcIter.next();
16069
                        rsb.append(tc);
16070
                        rsb.append("\n");
16071
                        sb.append(p.getName());
16072
                        sb.append(":");
16073
                        sb.append(paraValues.get(p));
16074
16075
                   rsb.append("]");
16076
                   return rsb.toString();
16077
              }
16078
16079
          package cn.edu.ustb.webservicetester.model;
16080
          public class TestCase {
16081
              private int id = -1;
16082
              private java.util.Map<ParameterInfo, String> paraValues;
              private String expectedResult = null;
16083
16084
              public TestCase() {
16085
                   paraValues = new java.util.HashMap<ParameterInfo, String>();
```

```
16086
               }
16087
               public boolean containsParameter(ParameterInfo pi) {
16088
                    return paraValues.containsKey(pi);
16089
               }
16090
               public int getId() {
                    return id;
16091
16092
               }
               public void setId(int id) {
16093
                    this.id = id;
16094
16095
               }
               public void setValueOfParameter(ParameterInfo pi, String value) {
16096
16097
                    paraValues.put(pi, value);
16098
               public String getValueOfParameter(ParameterInfo pi) {
16099
                    return paraValues.get(pi);
16100
16101
               public String getExpectedResult() {
16102
16103
                    return expectedResult;
16104
               }
               public void setExpectedResult(String expectedResult) {
16105
16106
                    this.expectedResult = expectedResult;
16107
               }
16108
               public java.util.List<ParameterInfo> getParameters() {
                    java.util.List<ParameterInfo>
                                                              paraInfoList
16109
                                                                                                       new
16110
          java.util.LinkedList<ParameterInfo>();
16111
                    java.util.Iterator<ParameterInfo> pii = paraValues.keySet().iterator();
16112
                    while (pii.hasNext()) {
16113
                         paraInfoList.add(pii.next());
16114
                         sb.append(p.getName());
16115
                         sb.append(":");
16116
                         sb.append(paraValues.get(p));
16117
                         sb.append(p.getName());
16118
                         sb.append(":");
16119
                         sb.append(paraValues.get(p));
16120
                         sb.append(", ");
16121
16122
                    }
16123
                    return paraInfoList;
16124
16125
               public boolean equals(Object o) {
16126
                    if (!(o instanceof TestCase)) {
16127
                         return false;
16128
                    }
16129
                    TestCase\ tc = (TestCase)o;
16130
                    if (!((tc.getParameters()).equals(getParameters()))) {
16131
                         return false:
16132
                    java.util.Iterator<ParameterInfo> paraInfoIter = paraValues.keySet().iterator();
16133
                    boolean findDifference = false;
16134
                    while (paraInfoIter.hasNext() && !findDifference) {
16135
```

```
16136
                         ParameterInfo pi = paraInfoIter.next();
                         findDifference = !(paraValues.get(pi).equals(tc.getValueOfParameter(pi)));
16137
16138
                         sb.append(p.getName());
16139
                         sb.append(":");
16140
                         sb.append(paraValues.get(p));
                         sb.append(", ");
16141
16142
                    return !findDifference;
16143
               }
16144
16145
               public int hashCode() {
                    int result = 17;
16146
16147
                    result = result * 37 + paraValues.hashCode();
16148
                    if (expectedResult != null)
                         result = result * 37 + expectedResult.hashCode();
16149
                    return result;
16150
16151
               public String toString() {
16152
16153
                    StringBuffer sb = new StringBuffer();
                    for (ParameterInfo p : getParameters()) {
16154
                         sb.append(p.getName());
16155
16156
                         sb.append(":");
16157
                         sb.append(paraValues.get(p));
                         sb.append(", ");
16158
16159
16160
                    if (expectedResult != null) {
                         sb.append("expected result : ");
16161
16162
                         sb.append(expectedResult);
16163
                    } else {
16164
                         sb.delete(sb.length() - 2, sb.length());
16165
                    }
16166
                    return sb.toString();
               }
16167
16168
16169
          package cn.edu.ustb.webservicetester.model;
16170
          public class TestSet {
               protected java.util.List<TestCase> testCases;
16171
               public TestSet() {
16172
16173
                    testCases = new java.util.LinkedList<TestCase>();
16174
16175
               public void add(TestCase tc) {
16176
                    testCases.add(tc);
16177
16178
               public TestCase get(int i) {
16179
                    return testCases.get(i);
16180
               }
16181
               public boolean contains(TestCase tc) {
16182
                    boolean result = false;
                    java.util.Iterator<TestCase> tsIter = testCases.iterator();
16183
                    while (tsIter.hasNext() && !result) {
16184
16185
                         result = tc.equals(tsIter.next());
```

```
16186
                    }
16187
                    return false;
16188
16189
               public int numOfTestCases() {
16190
                    return testCases.size();
               }
16191
16192
16193
          package cn.edu.ustb.webservicetester.model;
          public class TestSetWithPartition {
16194
16195
               private Partition[] partitions;
               private double[] profile;
16196
16197
               public TestSetWithPartition() {
16198
                    partitions = null;
16199
                    profile = null;
16200
               }
16201
               public TestSetWithPartition(int numOfPartitions) {
                    partitions = new Partition[numOfPartitions];
16202
16203
                    setProfileEvenly();
16204
               }
               public TestSetWithPartition(Partition[] ps) {
16205
16206
                    setPartitions(ps);
16207
                    setProfileEvenly();
16208
               public TestSetWithPartition(Partition[] ps, double[] prf) {
16209
16210
                    setPartitions(ps);
                    setProfile(prf);
16211
16212
               }
16213
               public void setPartitions(Partition[] ps) {
16214
                    if (ps != \text{null \&\& ps.length} > 0) {
                         int i = 0;
16215
16216
                          for (Partition p : ps) {
                               if (p.numOfTestCases() > 0) {
16217
16218
                                    ++i;
16219
                               }
16220
                          }
16221
                         partitions = new Partition[i];
16222
16223
                         for (int j = 0; j < ps.length; ++j) {
                              if (ps[j].numOfTestCases() > 0) {
16224
                                   partitions[i] = ps[j];
16225
16226
                                    ++i;
16227
                               }
16228
                          }
16229
                    }
16230
               }
16231
               public void setProfile(double[] prf) {
16232
                    if (prf != null && prf.length > 0) {
                         profile = new double[prf.length];
16233
                         for (int i = 0; i < prf.length; ++i) {
16234
16235
                              profile[i] = prf[i];
```

```
16236
                         }
                    }
16237
16238
16239
               public void setProfileEvenly() {
16240
                    if (partitions != null && partitions.length > 0) {
                         profile = new double[partitions.length];
16241
                         for (int i = 0; i < profile.length; ++i) {
16242
16243
                              profile[i] = 1.0 / profile.length;
16244
16245
                    }
16246
               }
16247
               public int numOfPartitions() {
16248
                    if (partitions == null)
                         return 0;
16249
16250
                    return partitions.length;
16251
               public int numOfTestCases() {
16252
16253
                    int n = 0;
16254
                    if (partitions != null && partitions.length > 0) {
                         for (Partition p : partitions) {
16255
16256
                              n += p.numOfTestCases();
16257
                         }
16258
16259
                    return n;
16260
               public Partition[] getPartitions() {
16261
16262
                    return partitions;
16263
16264
               public Partition getPartition(int i) {
16265
                    return partitions[i];
16266
16267
               public TestCase getTestCase(int pIndex, int tcIndex) {
16268
                    Partition p = partitions[pIndex];
16269
                    return p.get(tcIndex);
16270
               }
16271
               public double[] getProfile() {
16272
                    return profile;
16273
               }
16274
16275
          package cn.edu.ustb.webservicetester.model;
16276
          public class Interval {
16277
               private java.util.Map<ParameterInfo, ParameterIntervalScenario> range;
16278
               private int weight;
16279
               private java.util.List<TestCase> testCases;
16280
               public Interval(java.util.Map<ParameterInfo, ParameterIntervalScenario> r, int w) {
16281
                    this.range = r;
16282
                    testCases = new java.util.LinkedList<TestCase>();
16283
               public int getWeight() {
16284
16285
                    return weight;
```

```
16286
               }
               public int numOfTestCases() {
16287
16288
                   return testCases.size();
16289
               }
16290
               public void addTestCase(TestCase tc) {
                   testCases.add(tc);
16291
16292
               }
16293
               public TestCase getTestCase(int i) {
                   return testCases.get(i);
16294
16295
               }
               public boolean includes(TestCase tc) {
16296
16297
                   for (ParameterInfo pi : tc.getParameters()) {
16298
                        if (pi.getType() == ParameterInfo.SCATTERED) {
                             if (excludeScatteredValue(tc, pi))
16299
16300
                                  return false;
16301
                        } else if (pi.getType() == ParameterInfo.CONTINUOUS){
                             if (excludesContinuousValue(tc, pi))
16302
                                  return false;
16303
16304
                        }
16305
                   }
16306
                   return true;
16307
               }
16308
               private boolean excludesContinuousValue(TestCase tc, ParameterInfo pi) {
16309
                   String rangeOfParaInterval = range.get(pi).getRange();
16310
                   String valueOfTestCase = tc.getValueOfParameter(pi);
                   double upperBound;
16311
16312
                   double lowerBound;
16313
                   String[] ss = rangeOfParaInterval.split(", ");
16314
                   lowerBound = Double.valueOf(ss[0].substring(1));
16315
                   upperBound = Double.valueOf(ss[1].substring(0, ss[1].length() - 1));
16316
                   double votc = Double.valueOf(valueOfTestCase);
16317
                   if (rangeOfParaInterval.startsWith("[") && votc < lowerBound)
16318
                        return true;
                   if (rangeOfParaInterval.startsWith("(") && votc <= lowerBound)
16319
16320
                        return true:
16321
                   if (rangeOfParaInterval.endsWith("]") && votc > upperBound)
16322
                        return true;
16323
                   if (rangeOfParaInterval.endsWith(")") && votc >= upperBound)
16324
                        return true:
16325
                   return false;
16326
16327
               private boolean excludeScatteredValue(TestCase tc, ParameterInfo pi) {
16328
                   return !tc.getValueOfParameter(pi).equals(range.get(pi.getName()).getRange());
16329
               }
16330
          }
16331
          package cn.edu.ustb.webservicetester.model;
16332
          import java.util.List;
          public class OperationInfo {
16333
               private String opName;
16334
16335
               private List<ParameterInfo> paraList;
```

```
public OperationInfo() {
16336
16337
16338
               public String getOpName() {
16339
                   return opName;
16340
               public void setOpName(String opName) {
16341
                   this.opName = opName;
16342
16343
               public List<ParameterInfo> getParaList() {
16344
16345
                   return paraList;
16346
               }
16347
               public void setParaList(List<ParameterInfo> paraList) {
16348
                   this.paraList = paraList;
               }
16349
16350
16351
          package cn.edu.ustb.webservicetester.model;
          public class ParameterInfo {
16352
16353
               public static final int WHATEVER = 0;
16354
               public static final int CONTINUOUS = 1;
               public static final int SCATTERED = 2;
16355
16356
               private String name;
16357
               private String classInfo;
16358
               private int type;
               private String restriction;
16359
16360
               public ParameterInfo() {
                   type = WHATEVER;
16361
16362
16363
               public String getName() {
16364
                   return name;
16365
16366
               public void setName(String id) {
                   this.name = id;
16367
16368
               public String getClassInfo() {
16369
                   return classInfo;
16370
16371
16372
               public void setClassInfo(String classInfo) {
16373
                   this.classInfo = classInfo;
16374
16375
               public int getType() {
16376
                   return type;
16377
16378
               public void setType(int type) {
16379
                   this.type = type;
16380
               }
16381
16382
          package cn.edu.ustb.mt4ws.configuration;
          import java.util.Map;
16383
16384
          import cn.edu.ustb.mt4ws.tcg.TestSuite;
16385
          public class Project {
```

```
16386
               private Workspace workspace;
16387
               private String projectName;
16388
               private String wsdlUrl;
16389
               protected Map<String, TestSuite> testSuites;
16390
               public String getProjectName() {
                   return projectName;
16391
16392
               }
16393
               public String getWsdlUrl() {
                   return wsdlUrl;
16394
16395
               }
               public void setWorkspace(Workspace workspace) {
16396
16397
                   if (workspace == null){
16398
                        this.workspace = workspace;
16399
                   }else{
16400
                   this.workspace = workspace;
16401
16402
               }
16403
               public Workspace getWorkspace() {
16404
                   return workspace;
16405
               }
16406
               public Map<String, TestSuite> getTestSuiteMap() {
16407
                   return testSuites;
16408
16409
               public void setProjectName(String projectName) {
16410
                   this.projectName = projectName;
16411
16412
               public void setWSDLUri(String wsdlUri) {
16413
                   this.wsdlUrl = wsdlUri:
16414
               }
               public void setTestSuites(Map<String, TestSuite> testsuites) {
16415
16416
                   this.testSuites = testsuites;
16417
16418
               public void print() {
                   System.out.println("Project:" + projectName);
16419
16420
                   System.out.println("WSDL URL=" + wsdlUrl);
16421
                   System.out.println("workspace=" + workspace.getPath());
16422
               }
16423
16424
          package cn.edu.ustb.mt4ws.configuration;
16425
          import java.util.List;
16426
          public class Configuration {
16427
               private String operationName;
16428
               private List<Integer> mrIds;
16429
               private List<List<Integer>> testCases;
16430
               public Configuration(){
16431
16432
               public Configuration(String operationName, List<Integer> mrlds,
16433
                        List<List<Integer>> testCases) {
16434
                   this.operationName = operationName;
                   this.mrIds = mrIds:
16435
```

```
16436
                   this.testCases = testCases;
16437
               }
16438
              public void setOperationName(String operationName) {
16439
                   this.operationName = operationName;
16440
              public String getOperationName() {
16441
                   return operationName;
16442
16443
              public void setMrIds(List<Integer> mrIds) {
16444
16445
                   this.mrIds = mrIds;
16446
               }
16447
              public List<Integer> getMrIds() {
16448
                   return mrIds;
16449
              public void setTestCases(List<List<Integer>> testCases) {
16450
                   this.testCases = testCases;
16451
16452
               }
16453
              public List<List<Integer>> getTestCases() {
16454
                   return testCases;
              }
16455
16456
16457
          package cn.edu.ustb.mt4ws.file;
16458
          import java.io.File;
16459
          import java.io.IOException;
16460
          import javax.xml.transform.Source;
16461
          import javax.xml.transform.stream.StreamSource;
16462
          import javax.xml.validation.Schema;
16463
          import javax.xml.validation.SchemaFactory;
16464
          import javax.xml.validation.Validator;
16465
          import org.xml.sax.SAXException;
16466
          public class ValidatorXML {
              public ValidatorXML(){
16467
16468
16469
              public boolean validateXml(String xsdpath, String xmlpath)
16470
                        throws SAXException, IOException {
16471
                   SchemaFactory schemaFactory = SchemaFactory
16472
                             .newInstance("http://www.w3.org/2001/XMLSchema");
16473
                   File schemaFile = new File(xsdpath);
                   Schema schema = schemaFactory.newSchema(schemaFile);
16474
16475
                   Validator validator = schema.newValidator();
16476
                   Source source = new StreamSource(xmlpath);
16477
16478
                        validator.validate(source);
16479
                   } catch (Exception ex) {
16480
                        ex.printStackTrace();
16481
                        return false:
16482
                   }
16483
                   return true;
16484
              }
          }
16485
```