Fundamentals: Having Fun with Tables and Reports

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Tables

Layer and Field Properties
Table toolbar and menu commands
Associating Tables
Working with Excel spreadsheets
What’s New in ArcGIS 10.1 – Tables

- Rename a field
- Table can honor Time in the map
- Maximize the Table window
- Go to Page command (for data-driven pages)
- Sort coded-value domains (by code or description)
  - GP tool

- Quality Improvements
  - Editing attributes
  - Working with joined data
  - Table elements on the layout
Dockable Table window

- Table window is a container for all open tables
- View multiple tables at once within Table window
  - Table Options > Arrange tables
  - Side by side horizontally
  - Stacked vertically
Working with Field Properties

- New Fields tab
- Properties are honored
  - Identify
  - Attributes window
  - Table window
  - After creating join
- New Properties
  - Highlight
  - Read-only
Field Types

• Choose the right field type for the right value

  Short Integer ParcelID: 1001
  Text CountyName: Hamilton
  Double Area: 12,242.5
  Date SurveyDate: 08/13/97
  BLOB SurveyImage:
Using the Field Calculator

- Update multiple records in the table
- Choose between VBScript or Python
  - List of functions for working with numbers, text, date
- VBA is deprecated in ArcGIS 10
Working with Excel Spreadsheets

• XLS or XLSX files
  - Act as a container
  - Add worksheets, named ranges

• Field naming guidelines
  - Refer to ArcGIS Desktop Help

• Export to Excel
  - Geoprocessing tool and script gallery
Associating Tables

**Relates**
- Tables remain independent
- Stored in map document
- All cardinality

**Relationship Classes**
- Tables remain independent
- Permanent in Geodatabase
- All cardinality

**Joins**
- Append records
- Stored in map document
- Field properties honored
- 1:1, Many:1 cardinality
- Label, symbol, query
Reports

Report Wizard
Report Viewer
Report Designer
Create, Load, and Run Reports
What’s New?
## Reports - Examples

### Parcel Information

<table>
<thead>
<tr>
<th>Name</th>
<th>ParcelID</th>
<th>Address</th>
</tr>
</thead>
<tbody>
<tr>
<td>Anceen Crosby</td>
<td>10033</td>
<td>12828 Charing Cross Rd</td>
</tr>
<tr>
<td></td>
<td>10034</td>
<td>4013 Lockside Ct</td>
</tr>
<tr>
<td></td>
<td>10035</td>
<td>12852 Charing Cross Rd</td>
</tr>
<tr>
<td></td>
<td>10036</td>
<td>12739 Charing Cross Rd</td>
</tr>
<tr>
<td></td>
<td>10037</td>
<td>1140, 92</td>
</tr>
<tr>
<td></td>
<td>10038</td>
<td>1167, 85</td>
</tr>
<tr>
<td></td>
<td>10039</td>
<td>12930 Wembley Blvd</td>
</tr>
<tr>
<td></td>
<td>10040</td>
<td>4015 Lockside Ct</td>
</tr>
</tbody>
</table>

### Population Analysis of Mexico

#### POP90_SQMI 10 - 20

<table>
<thead>
<tr>
<th>Area</th>
<th>Name</th>
<th>Population</th>
<th>Urban</th>
<th>English</th>
<th>Employed</th>
<th>Housing</th>
</tr>
</thead>
<tbody>
<tr>
<td>Baja California Sur</td>
<td>317764</td>
<td>78.3%</td>
<td>1</td>
<td>18.8</td>
<td>67304</td>
<td></td>
</tr>
</tbody>
</table>

Count: 1
Sum: 317764

#### POP90_SQMI 30 - 40

<table>
<thead>
<tr>
<th>Area</th>
<th>Name</th>
<th>Population</th>
<th>Urban</th>
<th>English</th>
<th>Employed</th>
<th>Housing</th>
</tr>
</thead>
<tbody>
<tr>
<td>Quintana Roo</td>
<td>492277</td>
<td>73.9%</td>
<td>32.2</td>
<td>15.5</td>
<td>102859</td>
<td></td>
</tr>
<tr>
<td>Chihuahua</td>
<td>2441873</td>
<td>77.4%</td>
<td>2.9</td>
<td>35.9</td>
<td>529759</td>
<td></td>
</tr>
<tr>
<td>Sonora</td>
<td>1825066</td>
<td>79.1%</td>
<td>3</td>
<td>25.4</td>
<td>376587</td>
<td></td>
</tr>
<tr>
<td>Campeche</td>
<td>535185</td>
<td>70.0%</td>
<td>1.9</td>
<td>19.4</td>
<td>107894</td>
<td></td>
</tr>
<tr>
<td>Durango</td>
<td>1849238</td>
<td>57.4%</td>
<td>1.6</td>
<td>26.6</td>
<td>262164</td>
<td></td>
</tr>
<tr>
<td>Coahuila De Zaragoza</td>
<td>1592580</td>
<td>86.1%</td>
<td>0.2</td>
<td>37.7</td>
<td>404651</td>
<td></td>
</tr>
</tbody>
</table>

Count: 5
Sum: 8615659
What’s New in ArcGIS 10.1 – Reports

- Automation using arcpy.mapping or ArcObjects
- Support for related data using RelatedReports
- Support for data-driven imagery
  - Attachments
  - Field-based filepaths
  - URL filepaths
- Support for unbound calculated fields
- New data source option: Visible features
Running Reports - Workflows

Editor → Data → Analysis

Analysis → .RLF (template) → Report

Report → Editor
Road Ahead – 10.1 SP1

- **Ability to update Field Properties**
  - For empty tables and feature classes:
    - modify the field length, both increase and decrease
    - change the Allow Nulls property to either YES or NO
    - change the field type
  - For populated tables and feature classes
    - increase the field length
    - change the Allow Nulls property from NO to YES
Steps to evaluate UC sessions

• My UC Homepage > “Evaluate Sessions”

• Choose session from planner
  OR

• Search for session

www.esri.com/ucsurveysessions
• Thank you for attending
• Open for Questions

• Please fill out the evaluation:
  www.esri.com/ucsessionsurveys

  Offering ID: 904

• We (Matt and Kent) read every comment and incorporate constructive feedback into our workshops