Working with Tables

GIS II: Data Management

CEHI
Children's Environmental Health Initiative
Learning Objectives

- Learn how to add and populate new attribute fields
- Explore the Field Calculator
- Work in an edit session
Click on the table options button to get...
Arranging Tables

Horizontal Tab Group

Vertical Tab Group
Leaving these options as 0 will not create any restrictions – this is the default
• Authentic Microsoft Text file Driver

• Help to specify field type in CSV files

• Can work across software

• Can serve as Metadata

• Change type without re-populate field
Field Options

Right click on a column name to get...

- Sort Ascending
- Sort Descending
- Advanced Sorting...
- Summarize...
- Statistics...
- Field Calculator...
- Calculate Geometry...
- Turn Field Off
- Freeze/Unfreeze Column
- Delete Field
- Properties...
• Area (polygon)
• Perimeter (polygon)
• X/Y Coordinate of Centroid (polygon/point)
• Length (line)
• X/Y Coordinate of line start/end (line)
Use the Field Calculator to add data to fields and perform text or numerical operations.
Numbers and characters are different in computer.
e.g. 0 ≠ ‘0’, 5 ≠ ‘5’

- Concatenate Text: ‘Python’ + ‘ ’ + ‘Cheat’ = ‘Python Cheat’
- Convert Types: str(50) = ‘50’, str(11.5) = ‘11.5’
- Split Text: “Python_Cheat”.split(“_”)[0] = “Python”
- Convert Case: “Python”.lower() = “python”
The Editor Toolbar allows for manipulation of data fields and shapefile geometry
Editor Toolbar 2

- In an edit session you can...
  - Manually manipulate data cells (type, delete, etc)
  - Create new features (polygons, points, lines) in existing shapefiles
  - Modify the geometry of existing features in a shapefile
  - Use the Replace function of Find/Replace

- In an edit session, you cannot create a new field

- Don’t mess with geometries unless it is absolutely necessary!!!