Introduction to GIS for History
WORKSHOP OBJECTIVES

1- Understand the main uses of GIS technologies and software in historical and archaeological studies, what GIS is, how works and the standard GIS work model

2- Become familiar with GIS software

3- Learn about the conventions of map-making, map literacy, and what makes a ‘good’ map

4- Learn to access, organize, and display data in QGIS, as well as some useful sources of data

5- Learn how to create a map in QGIS, from importing the data to exporting a final map as an an image or PDF document
GIS allows you to process, analyze and visualize information about the Earth’s surface. GIS is utilized to know “what is where, when” and is used in many different fields like environmental science, economics, history, archaeology, urban studies, biology, sustainable development, geology, etc. It’s a flexible tool that allows you to study spatial relationships, PAST AND PRESENT.

“Everything is related to everything else, but near things are more related than distant things.”
(First rule of geography)
Data is organized in layers, that can be overlayed, compared, and used to represent thematic, quantitative, qualitative, narrative or conceptual information about the world.

These layers can be generated from historical maps, document and satellite images, as well as field notes, surveys, etc.
SPATIAL DATA

specifies where (location) and what kind of feature (shape)

STORED AS GEOGRAPHIC DATA
EITHER IN VECTOR OR RASTER FORMAT

ATTRIBUTE DATA

specifies characteristics for that location information, like how much, when, what, etc.

STORED AS TABULAR DATA
SPATIAL DATA

VECTOR

RASTER
PROJECTIONS & COORDINATES SYSTEMS

Three Map Projections Centered at 39 N and 96 W

Mercator
Lambert Conformal Conic

Un-Projected Latitude and Longitude

Peter H. Dunn 6/23/97
FROM THE AIR: Surrounding the Broad Street Pump

57% locations of cholera deaths were nearer to the Broad Street Pump by straight-line distance than any other pump. These locations account for 62% of the recorded cholera deaths.

The Broad Street Pump is the only water pump within the first standard distribution of cholera deaths and is 25 meters (across the street) from their mean center.
MAP ELEMENTS

TITLE - DESCRIPTIVE
DATA SOURCE
CLEAR LEGEND - WITH EXPLANATION
SCALE BAR - IN UNITS THAT MAKE SENSE
NORTH ARROW - AT AN APPROPRIATE SIZE
PROPERLY PROJECTED MAP
ANY NECESSARY LABELS
NOW, LET'S MAKE A MAP!