



# **GIS Professional Certification and GISCI**

**Presented By: Sheila Wilson, PhD, GISP**

**Date: September 21, 2010**

# GIS Certification Institute

GISCI's structure & history

GISP certification

Current activities

# Member Organizations



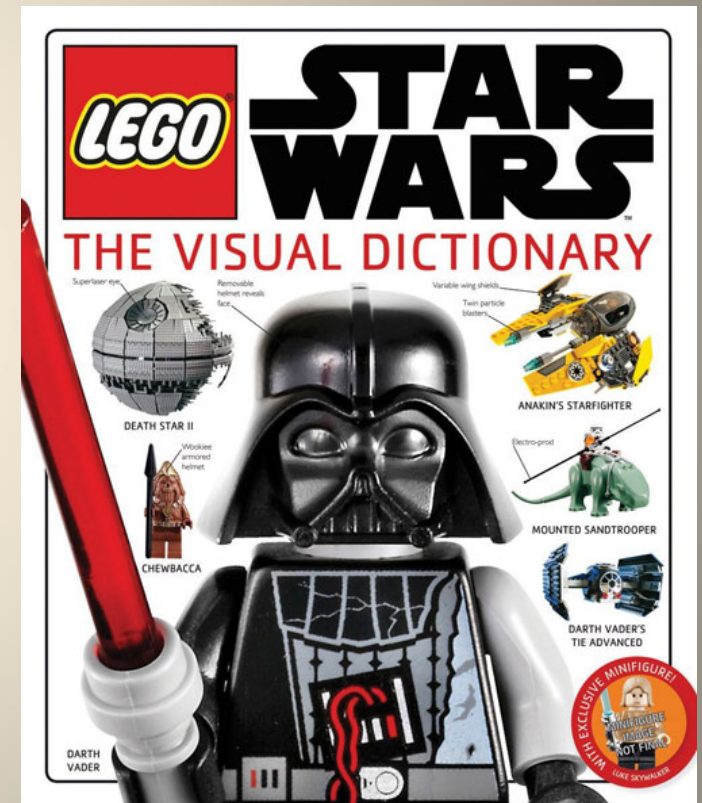
# Committees

- Certification Committee
- Review Committee
- Outreach Committee
- Ethics Committee



# Terminology

- **Certification:** A voluntary process by which individuals who have demonstrated a level of expertise in the profession are identified to the public and other stakeholders by a third party. **Recognizes expertise.**
- **Certificate:** An award given to an individual recognizing completion of an academic or training program.
- **Licensure:** The granting of a license to practice a profession. Often regulated by states and indoctrinated in legislation. **Guards against incompetence.**
- **Accreditation:** The process of evaluating the academic qualifications or standards of an institution or program of study in accordance with pre-established criteria.



# Why Certify?

- Although GIS has many uses, GISCI certifies the GIS profession.
- GIS *professionals* understand and apply the *full range* of GIS capabilities, most commonly as their primary professional role.

# Who Qualifies?

- Other professionals (surveyors, cartographers, landscape ecologists, planners, etc.) are typically not GIS professionals but they can be.
- GISCI does not look to restrict the use of GIS.
- GISCI looks to identify GIS professionals and separate them from casual users of the technology.



# Self-regulation

- Unlicensed professions regulate themselves.
- Voluntary certification programs are the most popular form of self-regulation.
- Certification protects the profession from those erroneously claiming to have expertise in the profession.



# Practitioner vs. Professional

- GISCI refers to non-certified GIS users as *practitioners*.



Julie Smith – Took an Introduction to GIS course at a local community college and can make a map exhibit with GIS software.

# Practitioner vs. Professional

- GISCI refers to certified GIS users as certified geographic information systems *professionals* or **GISPs**.



Julie Smith, **GISP...**

Julie Smith, **GISP** has met the minimum standards for educational achievement, professional experience, and manner in which she contributes back to the profession.

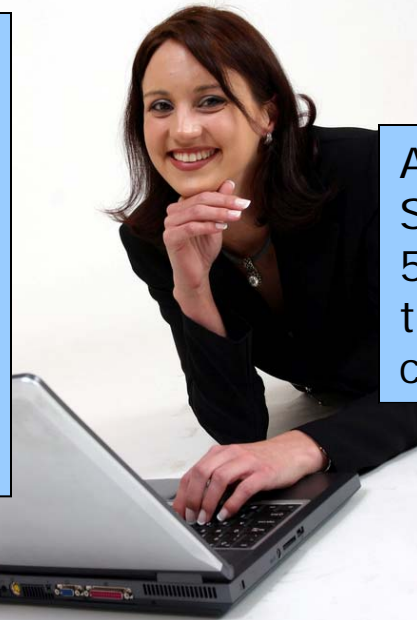
Julie Smith, **GISP** continues to educate and reeducate herself while preparing for renewal of certification.

Julie Smith, **GISP** has had her professional background scrutinized and reviewed by an independent third party organization. An Institute comprised of leading non-profit associations (AAG, GITA, NSGIC, UCGIS, and URISA) focused on the application of GIS and geospatial sciences.

A person like Julie Smith, **GISP** lives in all 50 States and more than 30 foreign countries.

Julie Smith, **GISP** is more than a practitioner of GIS technology. Julie Smith, **GISP** is a professional.

Julie Smith, **GISP** must abide by higher guidelines for ethical behavior.



# What can Certification Provide?

- 1) Professional recognition program for established GIS professionals.
- 2) Means of identification that can be used by colleagues, employers, the public, and other licensed or certified professionals.
- 3) Implementation of a professional code of ethics that identifies bad practices and upholds good practices
- 4) Professional development yardstick through initial and renewal of certification requirements.



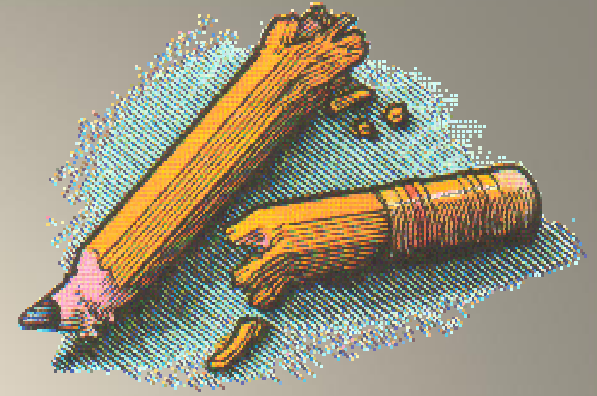
# That's Great, but What Can Certification Provide for Me?

From the 2006 "State of the GISP" Survey

- 7% received a salary increase
- 20% received a one time monetary bonus
- 20% received a title change or promotion
- An additional 30% feel it improved how they are perceived in their organization.
- Almost 60% of the respondents to the 2006-07 URISA Salary Survey plan on applying in the next 3 years.
- 85% of employers were supportive of the effort
- **The Salary found a \$12,000 differential between the salaries of GISPs and non-GISPs for comparable positions.**
- Upon certification, GISCI sends a letter to your employer that highlights the achievement and explains how they can help with the renewal of certification of certification effort.

# No Formal Test!

(at this time)



- **Point-based** and **self-documented**
- Based on **achievement in three categories**:
  - **Educational** attainment
  - Professional **experience**
  - **Contributions** to the profession

# A Point-based System

- GISCI Professional Certification created a system that adds objectivity (points) to the subjective (one's career)
- The URISA Certification Committee spent 4 years developing the points system
- The result of their effort is the GISCI Certification Program

# Benchmark

- **EDUCATION** – Bachelor's degree with some GIS courses (or equivalent)
- **EXPERIENCE** – Four years in GIS application development (or equivalent)
- **CONTRIBUTIONS** – Annual member participation in a GIS professional association





# Minimum Category Points

Educational Achievement	30 points
Professional Experience	60 points
Contributions to the Profession	8 points
Additional (Flex) Points in any of the three Categories:	52 points
<b>Total =</b>	<b>150 points</b>

Flex points allows one to make up for a lack in one category with an excess in another

# The Educational Achievement Section

There are 3 components to the Educational Achievement Section:

1. Credential Points (degrees in any field)
2. Course Points (geospatial technology courses)
3. Conference Attendance Points (days spent at relevant meetings and conferences)



# Credential Points

Master's Degree or Higher	25 pts
Bachelor's	20 pts
Associate's	10 pts
GIS Certificate*	5 pts

\*400 or more student activity hours

Select the highest earned



# Professional Experience

Job experience is the most important factor in GIS qualifications because:

- Performing in a job provides learning experiences that allow **growth and expansion of skill sets**
- Work environment with other professionals allows **transfer of knowledge**



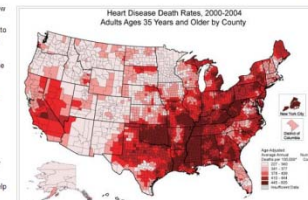
# Three Tiers of Professional Experience

- **Tier I: Analyst, System Design, Programming:** Typical tasks include database design or management, documentation or analysis of functional requirements, application design and evaluation, impl. management, and system administration. = **25 Points Per Year**
- **Tier II: Data Compilation, Data Maintenance, Teaching:** Typical tasks include editing data, map composition, report generation, database maintenance, data validation, instructional training, and teaching. = **15 Points Per Year**
- **Tier III: GIS User:** Typical tasks include utilization of applications involving geospatial technologies. Candidates may be involved in managing or coordinating GIS, but not involved in the technical implementation of GIS. = **10 Points Per Year**

# 4-year Minimum

- Applicants must have a combination of at least 4 years (48 months) of professional GIS experience to apply for GIS Certification.
- If the applicant has met the minimum requirement with less than 4 years of experience then the applicant must wait until 4 years of professional GIS experience is accrued.

Documents and activities that add to the professional body of knowledge for the **benefit of the profession** as a whole – not just the employer and client.





# **The 8 Categories of Contribution Points**

- GIS Publications
- GIS Professional Association Involvement
- GIS Conference Participation
- GIS Workshop Instruction
- GIS Conference Presentation
- GIS Awards Received
- GIS Volunteer Efforts
- Other GIS Contributions



# Additional Requirements

- **Code of Ethics & Rules of Conduct**
- **Renewal of Certification**
  - Every five years
  - Minimum points in two categories



# Renewal of Certification

- Applicants must earn the following points in the five years following initial certification:

Educational Achievement	10 points
Professional Experience (No minimum)	0 points
Contributions to the Profession	10 points
Flex Points	20 points
<b>Total =</b>	<b>40 points</b>

# Recognizing a GISP

- Julie Smith, GISP



**Julie  
Smith**

*has met the minimum standards of knowledge and professional practice as established by the  
GIS Certification Institute for recognition as a*

**Certified GIS Professional (GISP)**

*and is therefore entitled to all the rights and privileges thereunder.*

*This grant of certification shall expire or be deemed inactive on 01/29/2009  
unless, by that date, the individual shall have successfully completed recertification.*

*Certification Number 00027102 Date Certified 01/29/2004*

*Martha M. Lombard*

*GISCI President*

*William E. Hayball*

*William Hayball  
GISCI Certification Chair*

*Scott Green  
GISCI Certification Manager*

# Current Activities

- Certification Committee
- Review Committee
- Outreach Committee
- Ethics Committee



# State Endorsements

## Endorsements

- California
- Montana
- New Jersey
- North Carolina
- Ohio
- **Oklahoma**
- Oregon

## Commitments

- Indiana
- Kentucky
- New York
- Texas
- Virginia
- West Virginia
- Wisconsin

For more information:

[www.gisci.org](http://www.gisci.org)

Email: [swilson@gisci.org](mailto:swilson@gisci.org)

Phone 918-246-0328

# Websites

- [www.shipwreckcentral.com](http://www.shipwreckcentral.com)
- <http://www.localmouth.com/limerickmap>
- <http://www.paintmap.com/>
- <http://rockhoundingar.com/locations/collectsites.html>

# Websites

- <http://www.sasi.group.shef.ac.uk/worldmapper/index.html>
- <http://www.ghosttowns.com/>
- <http://strangemaps.wordpress.com/>
- <http://astrogeology.usgs.gov/Projects/PlanetaryMapping/>



