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Distant Neighbors- Law and Science or If We Know So Much, Why Do We Make Such Crummy Decisions?

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Davis, Mark, "Distant Neighbors- Law and Science or If We Know So Much, Why Do We Make Such Crummy Decisions?" (2018). *May 11, 2018: Adaptation Policy. 2.*

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Distant Neighbors-Law and Science or If We Know So Much, Why Do We Make Such Crummy Decisions?

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May 11, 2018

The Study of Water—Science Version

hydrology

[hahy-drol-uh-jee] noun 1.

the science dealing with the occurrence, circulation, distribution, and properties of the waters of the earth and its atmosphere.

Dictionary.com

Study of Water—Law Version

- Water Law: The body of law governing the ownership, use, and control of water (usually freshwater)
- CAVEAT: Water Law is Not Grounded in Hydrology, Ecology, or Social Utility

Coastal Change—Science Version

"From a local perspective based on the GIS analysis, 31.33% of the coastal land loss is caused by natural processes and 68.67% is caused by human processes."

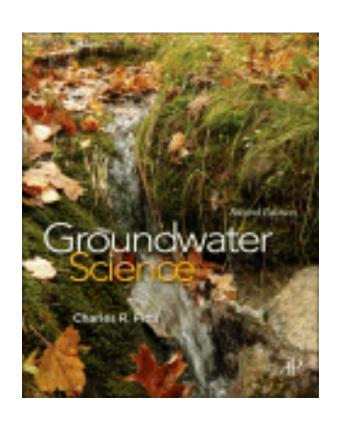
Penland et al., Gulf Coast Association of Geological Societies Transactions Vol. 52 (2002), Pages 799-807

Coastal Change—Law Version

HR 1330 (103rd Congress, 1993-94)

- (a) Findings. -- The Congress finds that-
 - (4) most of the loss of wetlands in coastal Louisiana is not attributable to human activity

Ground Water—Science VersionEnough for a Prize-winning Text



Ground Water –Law Version (Traditionally)

...the movement of ground water is "so secret, occult, and concealed that an attempt to administer any set of legal rules would be involved in hopeless uncertainty...".

Sipriano v Great Spring Waters of America (Tex. 1999)

East v Houston and Texas Central Railway (Tex. 1903)

Frazier v Brown, (Ohio, 1861)

Acton v Blondell (Ex Ch, 1843 (English))

Water Science--Sources

Observation
Hypothesis
Testing
Research Grants
More Testing
Failure/Validation

Water Law—The Sources

State Law
Federal Law
Tribal Law
Constitutions
Treaties
Common Law
Statutes
Jurisprudence
Custom

BUT NOT SCIENCE

Preliminary Conclusions

- Science is a process of learning. Challenging the "known" and unknown are central
- Law is a structure for defining rights and responsibilities and resolving conflicts—Order and predictability are central
- Water Management is driven by law, policy and belief, not by hydrology, ecology or any science
- New knowledge and ideas fuel science
- New knowledge and ideas don't, by themselves, do anything to law

Beyond the Preliminary

- Interdisciplinary Pressures are Pushing for Interdisciplinary Responses—Like It or Not
- Law, Policy, Science and Engineering are Stuck with Each Other—Like It or Not
- Conflict is Inevitable—Make it Mean
 Something (Hey Law, We are Looking at You Here)

Being Stuck with Each Other Does NOT Mean We Have to Work Together



Talking about Collaboration Ain't Collaboration—Find Something to Do



Collaboration is a Work of Will

Collaboration? I got a collaboration for you!



Conclusion

• NATURE AND HISTORY BAT LAST

Act like it