

# Using Insurance Markets to Improve Efficiency at Utilities

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ERE Seminar

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# Overview

**Problem** TVA coal pond spill. Too little maintenance.

**Penalize Execs?** No – Too MUCH maintenance (gold plating)

**Root Cause** Monopoly has weak pressure to perform

**Solution?** Markets! Prices!

**Complication** What to measure?

**Solution** Insurance

**Complications** Need baseline “correct” price.

**Extensions** Other monopolies? Local government?

# The Principal-Agent Dilemma

- ▶ You need someone to act for you (water manager)
- ▶ Adverse selection [No] and/or moral hazard [Yes]
- ▶ Free-rider problem with monitoring (cost vs. benefits)
- ▶ Need to coordinate/consolidate monitoring. Insurance company!

## How Would It Work?

1. Each utility must buy insurance against interruption (rationing) and disaster (spills, etc.)
2. Insurers compete for business. (Rebid every 5 yrs?)
3. Premium rates are public information and can be compared.
4. Complication: Is rate monotonic indicator of operating efficiency? (Yes, if holding risk and operating scale/scope constant.)
5. Relative moves in premia may be more useful.
6. Smoother rate changes (pay premia now, avoid jumps later)
7. Add prediction markets! (more eyeballs with profit motive)

Questions, comments, etc.?

Now – or via email to [dzetland@gmail.com](mailto:dzetland@gmail.com).