Addressing Science and Technology Trends: Using Strategic Management to Maintain Agency Relevance

Prepared for:
Strategic Decision-Making: Tools and Techniques for Effective Partnerships, Part 1

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Science & Technology Change: A “Wicked Problem”

- Defies traditional linear problem-solving approaches
- Problem definition evolves as new possible solutions are considered
- Complexity of issues overwhelms most current institutional approaches
What is Strategic Management?

Strategic Planning

Agency & Process Management

Strategic Management
How Can Strategic Management Help?

- Helps link day-to-day work to overall goals and vision
- Both process and outcome oriented - “Are we doing the right things right?”
- Helps us identify needed strategic changes on a regular basis - “course corrections”
- Monitors and anticipates external factors affecting ability to meet goals
But Technology Changes Very Fast

The Number of Transistors Per Chip Double Every 18 Months

Source: Intel Corporation
Institutional Change vs. Technology Change

• Be nimble enough to stay ahead (or keep up)?

• Be proactive and learn to be more flexible and adaptive?
Proactive Dimensions of Strategic Management

- Scenario Planning
- Learning & Adapting
- Performance Data as Barometer
- Stress Testing Processes

Use of Strategic Management Tools Facilitates Long-term Agency Relevance
Issues and Obstacles

- Preparing today for distant future in today’s environment of fiscal constraint & heightened accountability (PMs, etc.)
- Educating/convincing decision-makers and public of what the “right things” are to be doing when infrastructure is crumbling, congestion is growing, etc.
- Optimizing and rationalizing our investments to adjust to emerging future technologies
Opportunities & Benefits

- Moving beyond simple measures of output to information that supports strategic decision-making and smarter investments
- Optimizing and rationalizing our transportation investments for resiliency and longevity
- “Forcing” more integration across disciplines and institutions
Strategic management is adaptive and keeps an organization relevant. In these dynamic times, it is more likely to succeed than the traditional approach of “if it ain’t broke, don’t fix it.”