

ABAG-PLAN 2016



TELLING IMPORTANT THINGS TO MADMEN

HOW RISK MAKES A GREAT CIP

This presentation is an argument for a best management practice (BMP) to prioritize scarce resources: Use risk assessment to put your money and effort where it will do the most good.

Projects become part of a capital investment program (CIP) and get built for a range of reasons:

- Regulatory compliance
- Aged-out infrastructure/condition problems
- O&M analysis indicates that replacement is cheaper and wiser than maintaining an asset.
- An important person thinks it should happen.
- Someone -- anyone -- is noisy and persistent about it.
- It balances funding between council districts.
- It will help make folks a lot of money.

But how do you ensure the important ones get built first? And how to keep “important” consistent and defined? Lastly, how will you talk with the stressed-out Board or Council about the important projects to get them funded?

We will discuss effective risk model and CIP development, using the City of Tulare’s experience for illustration.

Successful implementation requires several factors:

- Preparation: Agree on priority, risk rating system in the department (and up the chain of command).



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- Policy: The CIP is an implementation of agency policy, so make sure the risk model prioritization is in line with policy or policy is altered to match.
- Buy-in: Check for support from the top. If it's not there, start talking or get someone to talk



A successful CIP risk assessment tool will include (at least)

- Comprehensive project understanding/estimation
- Project-level risk model
- CIP-level analysis for year-by-year impacts
- Graphical results presentation

That **project-level risk model** will integrate risk factors into a single numerical value and should be flexible, dependable, correlated, and communicable. If it's well-designed, you may hand it and a project list to several people and get very similar risk ratings from every one of them.

Risk factors are the hinge on which the model moves. Draft them with care. Integrate this effort with asset management efforts and correlate them with your priorities to make decision-makers' jobs easier.

When it's all together, a CIP risk assessment tool will enumerate the cause and effect of what you're

spending and the effect it is having and will have. Visual output as graphs and charts are accessible to laymen and give us some way of accessing that information quickly, regardless of background.

The risk modeling tool used by the City of Tulare, **RD-CIP**, can be used simplistically to evaluate back-of-the-napkin projects with little available information and can integrate detailed project information. And it treats three interrelated factors dynamically: project cost, time of construction, and risk to the agency.

The City of Tulare used RD-CIP to organize its approach for funding some very long project lists. And when its results were demonstrated for its Board of Public Utilities, its output became the basis for a rate study and a successful rate increase in 2016.

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