Report sections (Index)

Executive Summary:  2 pages for legislature, longer version for report body

1. Origin of the Commission:  brief summary with appendix describing activities
2. Responsibilities of the Commission:  Statutory mandate
3. Substantive Topics
   A. Current state of Oregon’s infrastructure
      • Engineering perspective
      • State Agency perspective (DAS, DEQ, HECC, ODOT, IFA)
B. Current financing and funding tools available

- Infrastructure Finance Authority (IFA state and federal programs)
- DEQ (State Clean Water Revolving Fund and others)
- ODOT (state and federal programs)
- Municipal financing (bond debt issued by local governments or state)

C. Innovative Methods

- *Fund-level* financing improvements
  - Credit Enhancement
  - Fund recapitalization
Report Sections Cont’d
(3. Substantive Topics)

(C. Innovative Methods)

*Project-level* financing and procurement alternatives

- Publicly-owned infrastructure
  - Various forms of P3
- Privately-owned infrastructure
  - Lease-leaseback
  - 63-20,
  - other tax-exempt financed methods
- Innovative methods compared to traditional procurement
(3. Substantive Topics)

D. Legal impediments to innovative methods
E. Project Screening report(s)

4. Analysis

5. Recommendations
Executive summary

To be drafted

• Two versions are required:
  • a two-page summary to be sent to all legislators when report is filed;
  • And a more thorough summary of the information in the report to serve as the report’s introductory section
1. Origin of the Commission

Proposed to be a brief background of the legislative actions and work of the executive branch to examine opportunities and challenges for improving Oregon’s development of infrastructure.

Appendix to provide chronology of activities to-date.
2. Commission Responsibilities

• Identify Oregon’s public infrastructure funding needs;
• Review and examine the tools now available to meet those needs;
• Research and evaluate a variety of innovative financing and procurement methods for public infrastructure projects;
• Identify legal impediments to innovative financing and procurement;
• In furtherance of its duties, receive determinations from the Treasurer’s office; and
• Report to the Legislature.
3. Substantive Topics

A. Current condition of Oregon’s infrastructure, need for investment

Engineering Perspective
Discussion by Greg DiLoreto, ASCE

• Oregon’s grade is a C-. Over the next 20 years, examples of Oregon’s infrastructure needs are an estimated $2.8 billion for drinking water and $3.8 billion for wastewater infrastructure. Other infrastructure types have similar needs.

• Innovation should be considered when it can result in reduced life-cycle costs.

• Acceleration of delivery is also important because of increasing costs over time for new construction, and the cost impacts of deferred maintenance on existing infrastructure.

• American Society of Civil Engineers supports P3 when it results in higher value for money and takes into account life-cycle costs.
A. Current condition of Oregon’s infrastructure, need for investment (cont’d.)

State Perspective - DAS
Discussion by Alice Wiewel, State Architect and Facilities Director

• Developing facilities strategic plan, includes condition inventory and analysis

• Pilot with three agencies, shows impact of deferred maintenance resulting in approximately 4 times cost of regularly scheduled maintenance

• DAS building inventory in good condition because of continuing investment

• Oregon Youth Authority and Oregon Liquor Control Commission have significant deferred maintenance liabilities, OYA consolidated facilities to avoid cost and improve efficiency

• Without significant investment, 10-year projection is high number of facilities in substandard condition

• Appendices include detail about analysis
A. Current condition of Oregon’s infrastructure, need for investment (cont’d.)

State Perspective - DEQ
Discussion by Anita Yap, Manager, Clean Water State Revolving Fund (“SRF”)

• Many small communities have antiquated and/or inadequate wastewater treatment systems.

• This means economic growth is not possible for some because the communities may not grant new building permits.

• The most significant obstacles are community capacity to manage and fund projects. Many communities do not have the staff capacity to develop appropriate projects, and many project proposals are not within the communities’ capacity to pay.

• Technical assistance to find affordable project solutions and to manage project design, procurement, construction, and operations are all critical issues.

• Other obstacles include the relative weakness and size of the rate base (projected project revenues) compared to the debt service necessary for the proposed project solutions. Local communities believe they are trying to find the balance between rates and lost jobs.
A. Current condition of Oregon’s infrastructure, need for investment (cont’d.)

State Perspective – Higher Education
Materials from Brian Fox, CFO for Higher Education Coordinating Commission (“HECC”)

• The Universities’ facilities needs are to address modernization, deferred maintenance, and capacity. The state higher education policy known as 40-20-20, along with population growth and the size of upcoming potential classes combine to result in a gap in physical space for students.

• In addition, there is a deferred maintenance backlog of some $600 million. While the University System has been addressing this in the last two biennia, age of the campus assets is requiring higher investment than is possible, if the Universities are to continue to reduce it.
A. Current condition of Oregon’s infrastructure, need for investment (cont’d.)

State Perspective – ODOT
Discussion by Tom Lauer, Chief Engineer, and Travis Brouwer

• ODOT manages OTIA program and others. OTIA III, resulted in 365 bridges being replaced or repaired, with 83 done in an accelerated approach in the earliest stages of the program.

• Acceleration was important in the recession because of the jobs created by ODOT projects, particularly in many of Oregon’s rural communities.

• The current impact is that ODOT’s funds are predominantly used for debt service for bonds that paid for these projects, limiting the capacity of ODOT to do new projects. ODOT’s activities will be focused on routine maintenance with relatively little new capital construction.

• The Oregon Transportation Forum, a stakeholder group, recommended a new funding package of approximately $296 million to address new construction transportation needs on state highways, and in county and city projects including multi-modal work. Multi-modal includes transit, bicycle, pedestrian, and related improvements.
B. Current tools for financing infrastructure

Description of programs available from:

- Infrastructure Finance Authority (IFA state and federal programs)
- DEQ (State Clean Water Revolving Fund and others)
- ODOT (state and federal programs)
- Municipal financing (bond debt issued by local governments or state)
C. Innovative Methods

Opportunities for innovation are in financing tools, procurement methods, and combinations of the two

- *Fund-level* financing improvements
- *Project-level* financing alternatives
  - *Project-level* financing alternatives fall into tools for publicly-owned infrastructure, and privatization methods
  - Most project-level financing alternatives are embedded in the procurement method
Innovative methods (cont’d): Fund-level

- Discussion by Patrick Mitchell, Guggenheim Fund and past CalSTRS CIO

Private participation at the fund level has the effect of either:
- making more money available for projects by capitalizing or recapitalizing a public loan program, or
- improving the terms and cost of capital by providing some kind of repayment guarantee to lenders, or both.
- Guarantees can come in several different forms, but as a group are referred to as credit enhancement products.
Innovative methods (cont’d): Fund-level

• Banks have lending limits within markets driven by banking regulations, and intended to diversify the banks’ risk and enforce sound portfolio management practices.
  • Lending limits are measured by total risk.
  • A credit enhancement product allows banks to increase the amount of cash available within the market, to the extent the credit enhancement provider accepts the risk of loss on a bank loan.

• There are key characteristics that are important to fund-level investors:
  • creditworthiness,
  • liquidity,
  • size of the investment, and the
  • yield or return.

• Credit enhancement improves availability and reduces cost of capital because it improves creditworthiness and liquidity.
Innovative methods (cont’d): Fund-level, Credit Enhancement

• Traditional credit enhancement providers failed in the recession, resulting in a gap in the financial services market

• Oregon is considering methods to fill this gap, which would improve availability and reduce cost of capital, particularly for smaller jurisdictions

• Key elements of a successful program are:
  • Standardization of terms, conditions, and underwriting
  • Collaboration / participation with private lenders
  • Careful structuring
  • Scale (multi-state collaboration)
Innovative methods (cont’d): Fund-level, Loan pool capitalization

• Additional Fund-level approach is to use private investment to re-capitalize loan funds
  • Group small loans into “pools” suitable for investors
  • Proceeds from investment allows public lender to have new capital from which to make more loans

• Key elements:
  • Standardization of terms and conditions, documentation
  • Strong deal flow so that new funds are fully utilized and cost of capital is offset by savings from infrastructure acceleration
Innovative methods (cont’d): Fund-level

“The key issue in greater access to capital—and therefore higher competition and lower cost of capital—is to broaden the investor interest in public finance investments, including among investors who are not necessarily tax-motivated, because increasing the supply of cash will increase competitiveness among investors and reduce the cost of capital for municipalities.”

• There are methodologies to meet investor goals of mitigated or controlled risk, adequate yield, efficient size of investment transactions, and liquidity.

• This will drive down the cost of financing, improve the availability of capital, and diversify the types of investors in order to improve the supply / demand mechanics and drive down rates.

• Standardization around best practices, cooperation with the private sector, and private financing in projects or in the fund or both, being side-by-side with public participation are all important.
Innovative methods: Project Level, publicly owned

*Ken Rust, Eric Petersen presentation*

Opportunities for innovation fall into three areas:

- Construction activity including design,
- Financing, and
- Life-cycle cost management.
Innovative methods: Project Level, publicly owned

• Bringing private capital into public infrastructure is a “public-private partnership.”
• P3s can be done in a variety of patterns, depending on the parties’ goals.
• Each pattern has characteristics of transferring risks among the participants:

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Innovative methods: Project Level, publicly owned

- *Performance-based contracting* (DBFM or DBFOM) provides performance assurances because late delivery means the P3 team doesn’t get paid, and failure to meet performance standards during operations results in deductions from payments.

- The private capital takes the risk that the team will perform.

- The private team competes on the design, the team’s qualifications, and the overall life-cycle cost to the owner.

- The procurement is a competitive proposal process that gets the best design / operating cost solution.

- Equity and debt providers in DBFM or DBFOM add to the process by marshalling the bidding team participants for the best blend of high skills.
Innovative methods: Project Level, publicly owned

P3 cont’d:

- While life-cycle quality and cost can be made a criteria in other procurement methods, only DBF(O)M enforces the private team’s commitments through a life-cycle of capital replacements (typically occurring between years 20 and 27).

- By aligning the incentives, the owner has a true risk transfer to the private sector, effectively a warranty that extends through capital replacement.

- There are important differences in infrastructure types, and differing levels of risk to be managed by the owner.

- P3 only suitable for large-scale, complex projects (typically less than 20% of infrastructure within a state).
Innovative methods: Project Level, publicly owned

Risk transfer for long-term cost of occupancy / capital maintenance can represent significant savings opportunity for owner

Note 1: From July 2010 Healthcare BIM Consortium, An Organization consisting of Department of Defense Military Health System (DoD MHS), Department of Veterans Affairs (DVA), Kaiser Permanente (KP), and Sutter Health, representing $26B of Healthcare construction.
Innovative methods: Project Level, publicly owned
• Spectrum of methods and risk transfer, traditional - innovative:
Innovative methods: Project Level, publicly owned

Comparison to traditional (design-bid-build) procurement:

• Many public owners have moved away from the most traditional, Design-Bid-Build (or “DBB”) method for complex projects, because it represents the highest risk to the owner.

• DBB method continues to be suitable for many smaller projects, including many ODOT projects
  • projects are of a relatively low scale and complexity, and
  • ODOT is a well-experienced owner with high expertise.

• This method allows the highest owner control.
  • OTIA III goals were highway projects and to generate economic benefits and employment around the state.
  • Breaking projects into relatively small components, managing the design phase, and bidding the construction, ODOT directly controlled the contracting and subcontracting activity to assure that both the project and employment goals were met.
Innovative methods: Project level, publicly owned
Innovative methods – Project level, publicly owned

Turnkey-Design-Build (TDB) Structure

LEGAL

AGENCY/INSTITUTION

END USERS

FINANCE

O & M (FACILITY MANAGER)

RISK TRANSFERENCE WITH SINGLE POINT OF ACCOUNTABILITY

TURNKEY DESIGN-BUILDER

Real Estate Activities
Owner-Rep Delivery
End-User Coordination
Site Entitlement
Permits
Utilities
Inspections
Quality Control
FF&E
Risk Management
Community Relations
Leasing
Accounting
Design-Build Activities

Builder
Designer
Engineers
Lump Sum Fixed Price
Code Compliance
Tenant Work
Guaranteed Schedule
LEED Requirements
Insurance
Geotech/Environmental
Move-in Coordination
Commissioning

Agency Risk
Risk Transferred to Private Sector
Innovative methods – Project level, publicly owned
Innovative Methods – Project level

States with P3 legislation:
Innovative Methods – Project level

Key considerations for P3 choice:

• Effective value for money analysis
  • Includes life-cycle evaluation
  • Compares most likely traditional method to most likely P3 method

Value for Money (VfM)

A VfM analysis will be used to help the public sector identify what delivery option provides value as on both a quantitative and qualitative basis. The results of VfM analysis assists the public sector on how it may proceed down a particular procurement route.

Public Sector Comparator (PSC)

- Hypothetical, risk adjusted, whole-life cost of a project assuming traditional procurement
- Provides detail and benchmark when considering alternative delivery methods
- Design-Bid-Build approach taken by the public sector
- Operated and maintained by the public sector
- Provides benchmark to compare P3 option in Value for Money analysis

P3 Delivery Option

- Private sector raised finance
- Design, Build, Financing, Operations and Maintenance responsibilities performed by private sector
- Aspects of project financing, risk transfer, innovations and efficiencies from perspective of Private sector
- Provides information benchmark when considering alternative delivery methods
- Public sector in an oversight role
Innovative methods – Project Level

Key considerations for P3 choice cont’d:

Maintenance and deferred maintenance cost

Asset condition gradually declines until major capital works become essential, at which point they are authorized and carried out.

These peaks of major capital expenditure can be costly and disruptive to implement.

The cost of reactive maintenance increases over time as unexpected failures occur more often.
Innovative methods – Project Level

Key considerations, Maintenance and Deferred Maintenance (cont’d)

Constant asset condition - with P3 the asset will meet the agreed specification at all times.

Regular planned preventative maintenance minimizes the need for major interventions.

Major capital maintenance is staged over several years with allowance for ‘early failure’ replacements. This smooths the lifecycle expenditure curve and makes the ‘peaks’ of expenditure lower, which is more efficient and less disruptive to the asset.
Innovative methods – Project Level

Best Practices for implementation of P3 methods

• Authorizing legislation
• Organized delivery structure, government expertise
• Standardization of terms, conditions, bid process to follow best practices, across infrastructure types
• Disciplined planning
Innovative methods – Project level, privatization

• Another form of public-private partnership
• privatize infrastructure, placing it in private ownership and management,
• public occupant leases the project from the private owner.
• Lease-leaseback arrangement may include
  • publicly owned land that is ground leased to a private development entity
  • Private partner builds improvements to be occupied by the public owner of the land.
  • Public entity leases the improvements, typically for 20 – 30 years, in a lease that is structured to pay off the debt associated with development and construction, and to provide a return to the developer.
  • The development is managed by a Special Purpose Vehicle or Single Purpose Entity, a limited liability company created solely for the purpose of the project.
Innovative methods – Project level, privatization

Lease-leaseback (cont’d)

• Key differentiators:
  • The difference in cost of capital between tax-exempt and taxable financing is a key differentiator because Lease-leaseback usually allows the private owner to use tax-exempt financing.
  • Public entity’s challenge to assure the condition of the project during the lease and at its termination, when the project is handed back to the public entity.
Innovative methods – Project level, privatization

Lease-Leaseback (cont’d)

• Lease-Leaseback with Tax-Exempt Financing:
  • 100% tax-exempt financing produces lowest cost of capital (other than GO Bond) and a correspondingly low lease rate in a well-negotiated transaction.
  • Blended cost of capital is also reduced, because 100% debt financing eliminates need for more costly private equity.
  • Lease to a public entity is likely to result in property tax exemption, making the tax component of occupancy costs comparable to public ownership.
  • Ultimate ownership of site and improvements will go to the public entity, but are not publicly owned during construction or during the term of the lease.
  • Typical contract structure has been used for decades and is familiar to investors.

• Private owner has greater flexibility as to bidding and contracting processes in the construction process than a public owner would in a traditionally-procured project.

• Public occupant may have less control over policy attributes of the project, depending on the negotiation between the parties.

• Public entity will retain certain risks which would be transferred to private partner under a DBFM procurement, including the risk of deferred maintenance.
Innovative methods – Project level, privatization

• Other approaches include various types of Public-private partnerships:
  • lease-leaseback, financed with Certificates of Participation, and
  • tax-exempt financing including through a method referred to as “63-20.”
    • allows a public entity to access tax-exempt financing by designating a private team that creates a nonprofit to manage a project.
  • Project manager is limited in some aspects of long term management by the requirements of Qualified Management Agreements.
  • QMA requirements are structured to prevent private entities from receiving excess profits for a project financed with tax-exempt bonds. QMA requirements generally include a limitation that payments made must be comparable to the cost of services generally available in the project marketplace, actual regulatory requirements are nuanced and complex.
Differentiators: Innovative methods compared to traditional procurements

- Existing public partner capital need not be tied up with the project
- Fixed occupancy payments remove uncertainty and facilitate public partner’s long-term planning
- Possible assistance in maintaining public entity’s credit rating
- Possible optimization of public entity’s debt capacity
- Voter approval typically not required
- Sole-source delivery reduces contractual risk for public partner
- Responsibilities allocated to private partner reduce public partner administrative burden and risk
- Private partner bring large, complex project experience and capabilities
- Best qualifications or best-value team selection allowed
- CM/GC and design-build allowed vs. just DBB
- Construction may begin on facility prior to obtaining funding
- Earlier construction start = reduced construction cost and interest rate risk
- Higher-quality facilities and better budget and schedule results
- Community receives a new and much-needed facility much sooner
D. Legal impediments

Karen’s note:

We had some discussion from Art James about the ODOT partnership statutes that authorized P3 approaches. In addition, the co-chairs authorized research by the AG’s office to identify obstacles or statutory changes that might have to be addressed for P3 procurements and for the kind of fund-level capital tools discussed by Patrick Mitchell. That research is underway.
E. Project evaluations (screening report)

• Multnomah county courthouse
4. Analysis

Karen’s note:

Our April meeting will focus on discussing the information that has been provided to the Commission, and refining this report as well as recommendations to be made to the Legislature.
5. Recommendations