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Risk Allocation Panel Discussion

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Background

Projects are Risky

Cost, Schedule & Operability are NOT Very Predictable

Restated: Project Risks Can be Sizeable
(Read: “Expensive”)

Practices Which Minimize Risk are Good...

However, a Zero Risk Project is Not Feasible



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Introduction

Yesterday:

- Lots of Suppliers & Contractors
- All Chasing Limited Work
- Over-Supplied Marketplace
- Some Accepting Significant Risks to Get Work
- **Result:** Market Rationalization

Today:

- Lots of Market Demand
- Limited Base of Suppliers & Contractors
- Over-Subscribed Marketplace
- **Result:** Market Expansion
- **Result:** Even More Project Risks
- **Result:** The Price of Risk is Higher

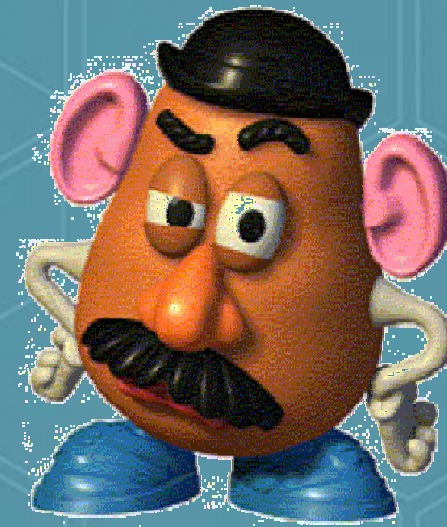


Risk Allocation

Traditional Allocations May No Longer Work
Current Price of Risk - Canceling Some Projects
New Allocation Methods May Be Needed
Who Will Get the HOT POTATO?

Three Perspectives:

- The Owner
- The Contractor
- The Lender



Three Perspectives

Owner



Joseph Brewer
Dow Chemical
Program Director

Contractor



Tuhr Barnes
Fluor
Director

Lender



Kevin Watson
Cohen Seglias Pallas
Greenhall & Furman PC
Attorney



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Panel Format

What Does Each Party Want?

What Does Each Party Do?

What Might Each Consider Doing Different?



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Risk Allocation – The Owner’s Perspective

Breakout Panel



Joseph C. Brewer, Jr.

Program Director
Dow Chemical

Olefins II - Kuwait



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Topics

What Owners Want to Achieve
What Owners Implement
What Owners Might Consider



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What Owners Want

High Quality – Meets Operability Needs

Low Price

Fast Schedule

No Project Risk to the Business Opportunity

Minimal Equity Injection – Use of Loaned \$s

Off Balance Sheet (for Most Joint Ventures)



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What Owners Implement

Review Qualifications

Select Bidders

Bid & Award Contracts & Purchase Orders

What the Market Will Bear

Maximize Risk Transfer to Price Tolerance

Maximize Use of Borrowed Funds (JVs?)

Minimize Use of Minority Investors



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What Owners Might Consider

Search for Other Parties to Share Risk

- **Minority Equity Investors**
- **Lenders**
- **Insurers**
- **Licensors**

Greater Equity Levels

Limited Recourse Warrantees

**It All Depends on the Price of Risk from Each Source
Versus Owner's Internal Cost/Tolerance of Risk**



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Risk Allocation – The Contractor's Perspective

Breakout Panel



Tuhr Barnes

Executive Director
Fluor

Infrastructure business development,
Public-private partnerships



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Topics

What Contractors Want to Achieve
What Contractors Implement
What Contractors Might Consider



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What Contractors Want

Appropriate Levels of Risk

Improved Profit Margins

Balanced Resources – Relationships Count

Good Payment Terms – Not Contractor
Financed

Balance Sheet Protection

Healthy Clients



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What Contractors Implement

Risk vs Return – Control matters

Market Based Margins

Resource Leveling – Balance work across organization

Strong Client's Preferred – Leverage?

Rapid Payments – Cash is King

Contractor not Insurer – Limited Warranties



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What Contractors Might Consider

Partners for major projects

Fixed prices

Guaranteed schedules

Client SPV's

Operating and Maintenance roles

Risk and reward balanced across all business segments, contractor's are being more selective



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Risk Allocation – The Lender’s Perspective

Breakout Panel



Kevin B. Watson

Attorney

Cohen Seglias Pallas Greenhall
& Furman PC

Professional Liability
Construction/Commercial/Operating
Risks



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Topics

What Lenders Want to Achieve

What Lenders Implement

What Lenders Might Consider



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What Lenders Want

Preserve Capital Invested

Maximize Return on Investment

Minimize Scope Creep

Create Long Term Relationships



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What Lenders Implement

Project and Participant Checks
Disbursement Controls
Insurance/Bonding Covenants
Guaranty's



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What Lenders Might Consider

Increased Loan Monitoring

- Steering Committee Membership

Loan Syndication

Stricter Covenants

Collateralization Options

Portfolios v. Stand Alone Projects

Joint Venture v. Single Entities



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Questions?
Comments?
Suggestions?
Alternatives?



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Thank You



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