



Topic: **Reservoir Committee Agenda Item 5-1** **2018 May 21**

Subject: **Joint Authority/Reservoir Committee Workshop**

Requested Action:

No action requested. Informational item.

Detailed Description/Background:

Staff to provide a report on the Joint Authority/Reservoir Committee Workshop held on May 7, 2018 in conjunction with the ACWA Spring Conference held in Sacramento on May 8-10, 2018, and report on staff activities during the conference.

Prior Authority Board Action:

None.

Fiscal Impact/Funding Source:

None.

Staff Contact:

Jim Watson

Attachments:

Attachment A: Joint Authority/Reservoir Committee Workshop Presentation

Sites Reservoir Committee Workshop

Project Update:

2.1 Water Storage Investment Program

ACWA Conference, May 8, 2018



BENEFITS PROVIDED BY SITES

The Sites Reservoir
Delivers water to
California's water
system for...



Drinking Water



Irrigation



Climate Change Resiliency



Enhanced Water Quality



New Recreational
Opportunities



Flood Management



Ecosystem Improvements



Renewable Energy

Stabilize Sacramento River
fall flows for salmon



Conserve coldwater pools
in existing reservoirs later
into the summer months to
improve conditions for salmon
spawning and rearing



Provide nutrient rich water
to the Yolo Bypass to
benefit smelt



Increase water supplies for refuges
and managed wetlands north and
south of the Delta



Net improvements in ecosystem and water quality conditions in the Sacramento River system
and Sacramento-San Joaquin Delta

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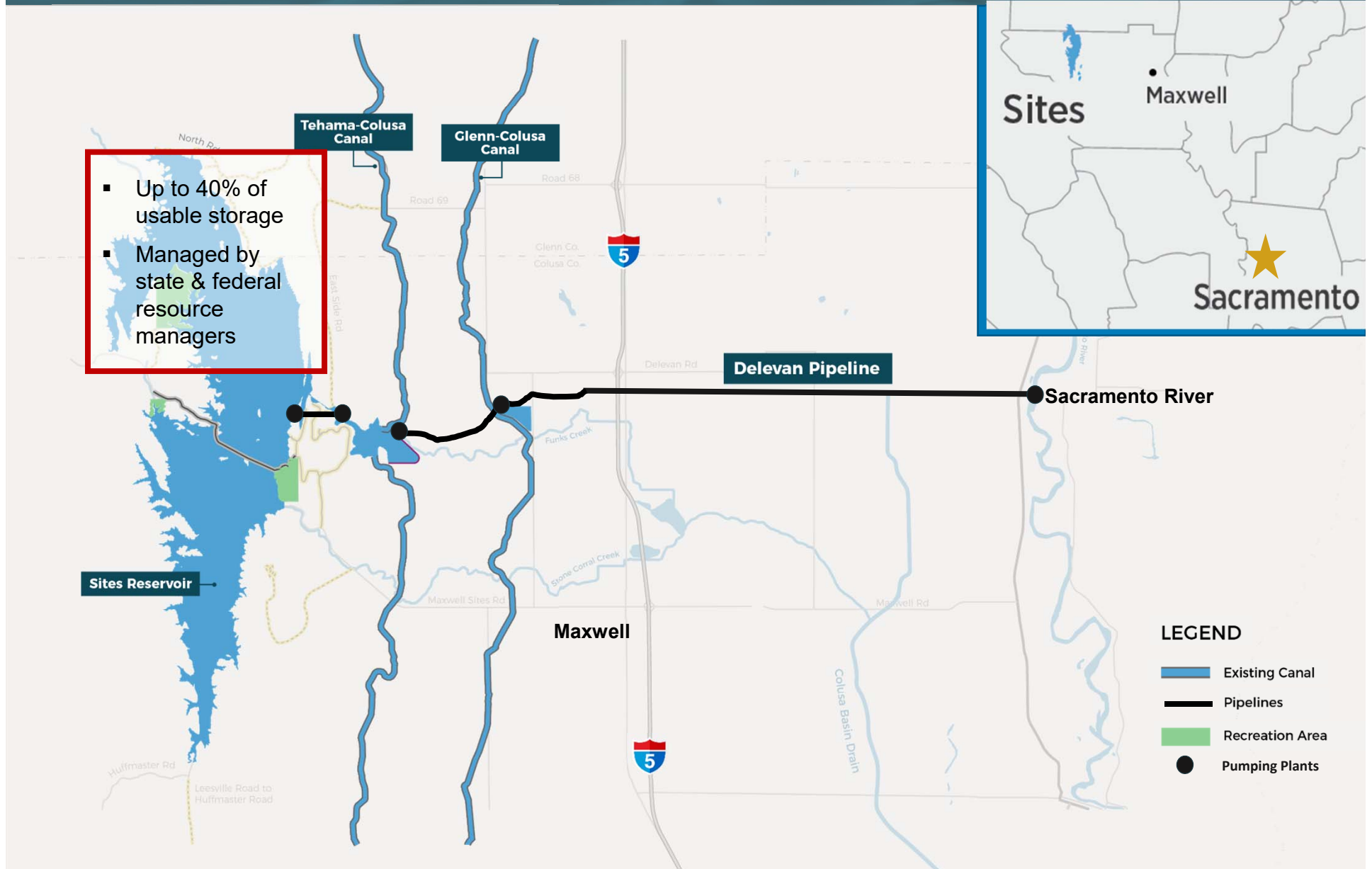


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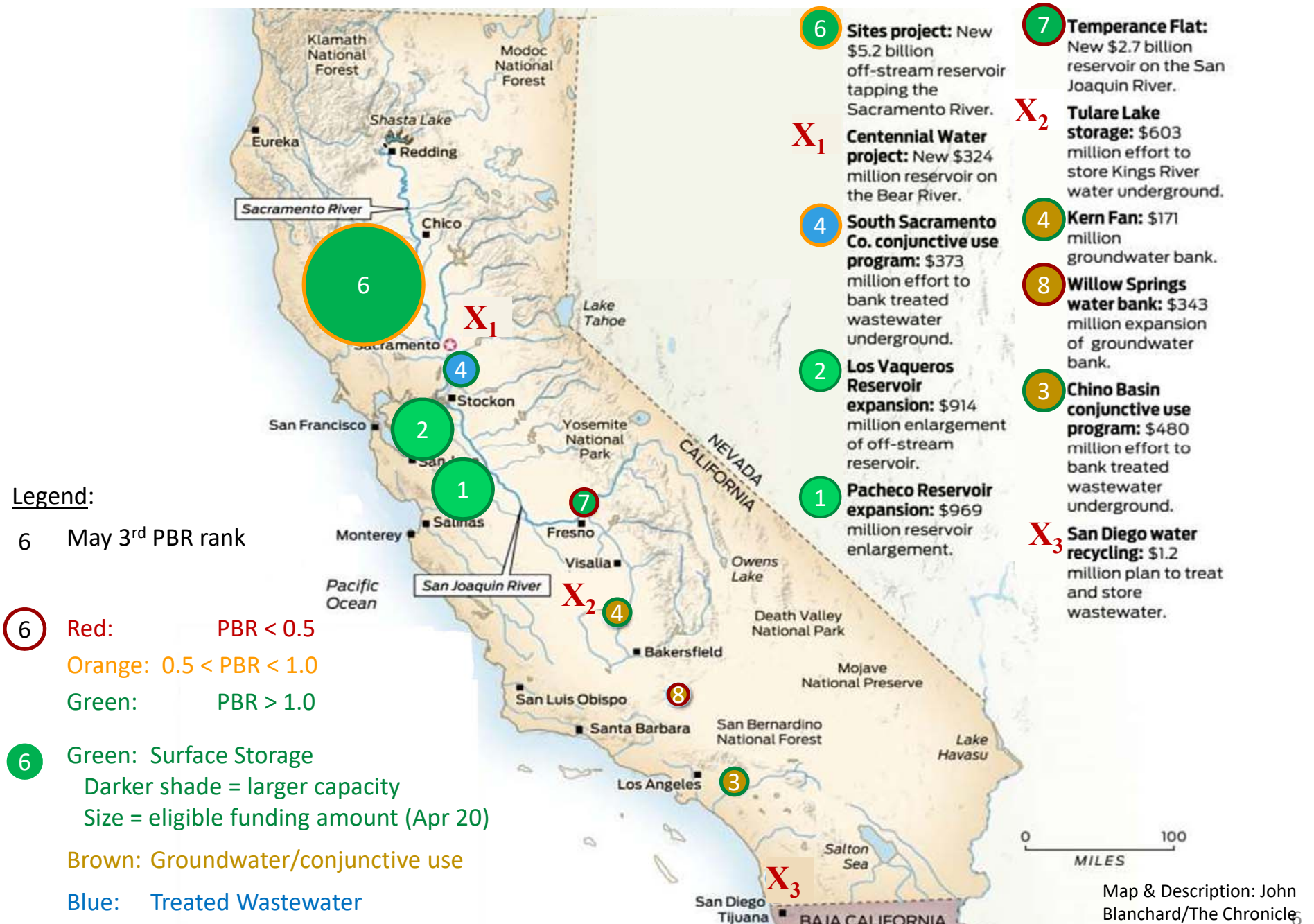


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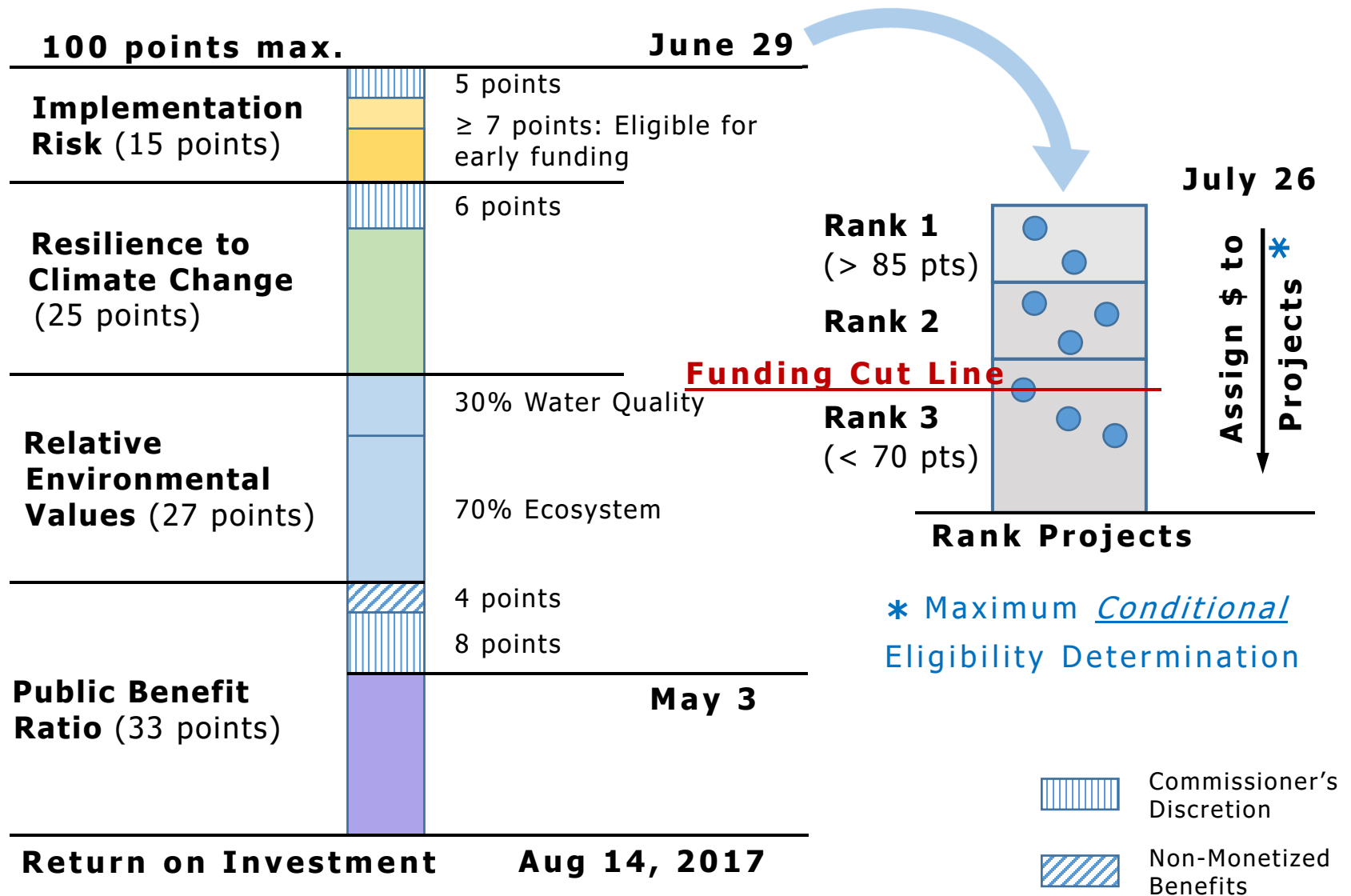
Water for the Environment



Water Commission: May 3rd Synopsys



WSIP Scoring Rubric:



WSIP Evaluation of Sites' Benefits

Process and Timeline:

<u>Date</u>	<u>Component</u>	<u>Criteria</u>	<u>Score</u>
Nov 15	Eligibility & Completeness	Pass	Pass
Aug 14	1. Public Benefit Ratio (PBR): Submitted		2.11 \$ 1,661.7 M
Feb 1	Commission's Staff (63.5% ecosystem)		0.40 \$ 662.0 M
Feb 23	Appeal		1.90 \$ 1,338.0 M
May 03	Water Commissioners Decision		0.73 \$ 1,008.3 M
Jun 29	Non-monetized Benefits		___ + 4
	Commission "Finalize" Points	33 max	___ +/- 25% (8 pts)*
	2. Relative Environmental Values:	27	___ No adjustment
	3. Resilience to Climate Change:	25	___ +/- 25% (6 pts)*
_____	4. Implementation Risk:	15	___ +/- 25% (5 pts)*
June 29	Return on Investment:	100 max	To rank projects
Jul 26	"Max Conditional Eligibility Determination"	\$ ___	Amount by rank
	Early Funding (Implementation Risk ≥ 7)	\$ ___	\$ 49.6 M (requested)

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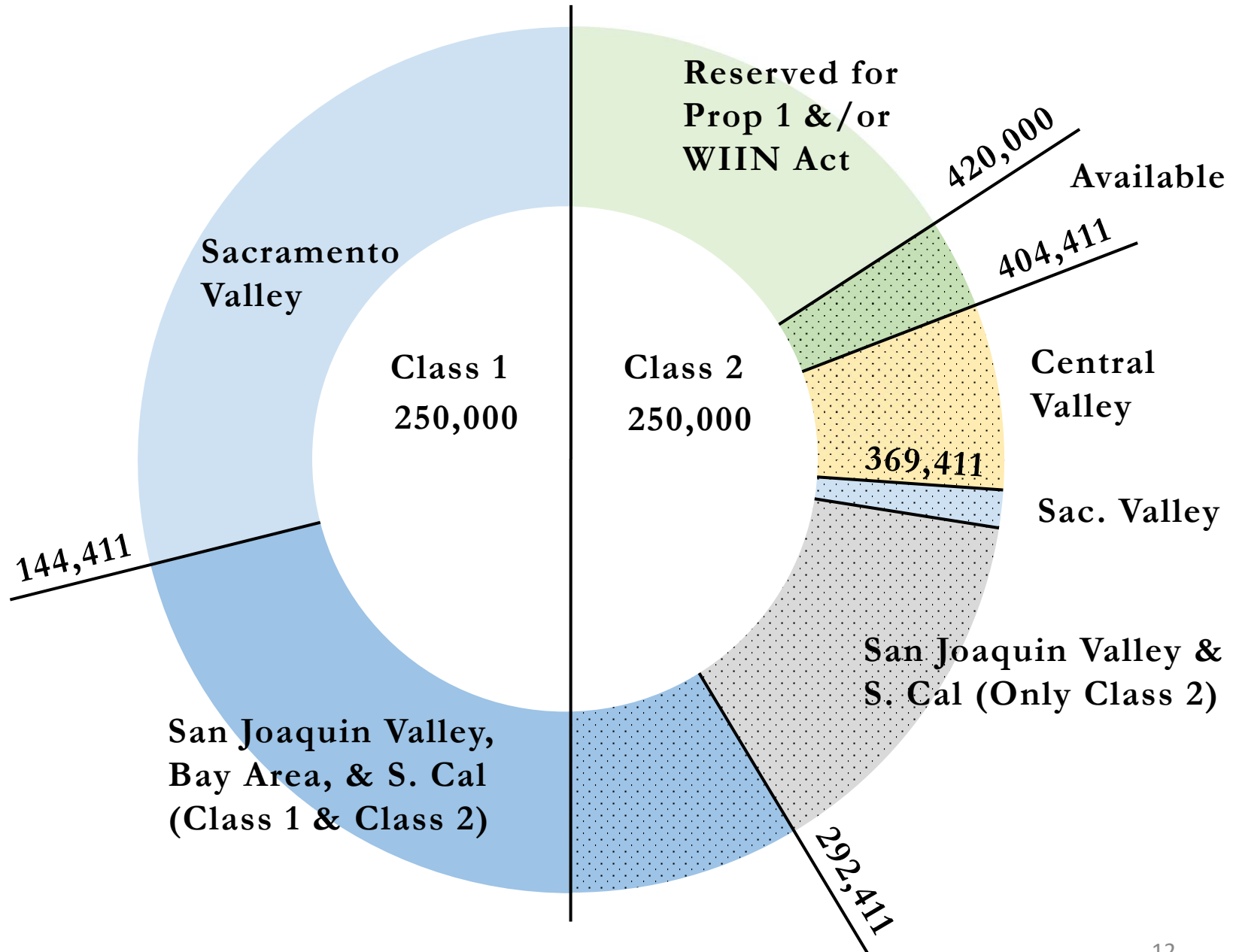
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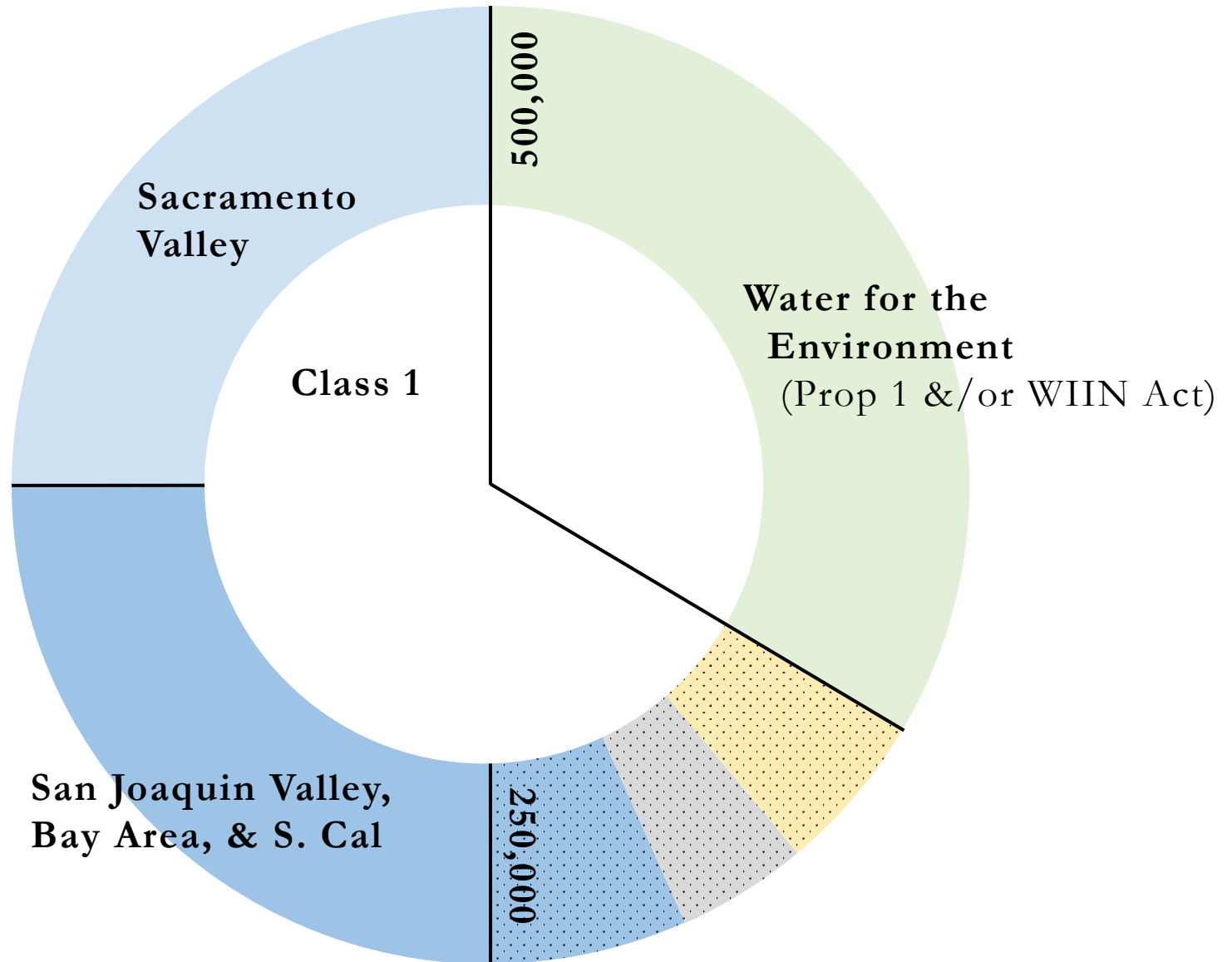
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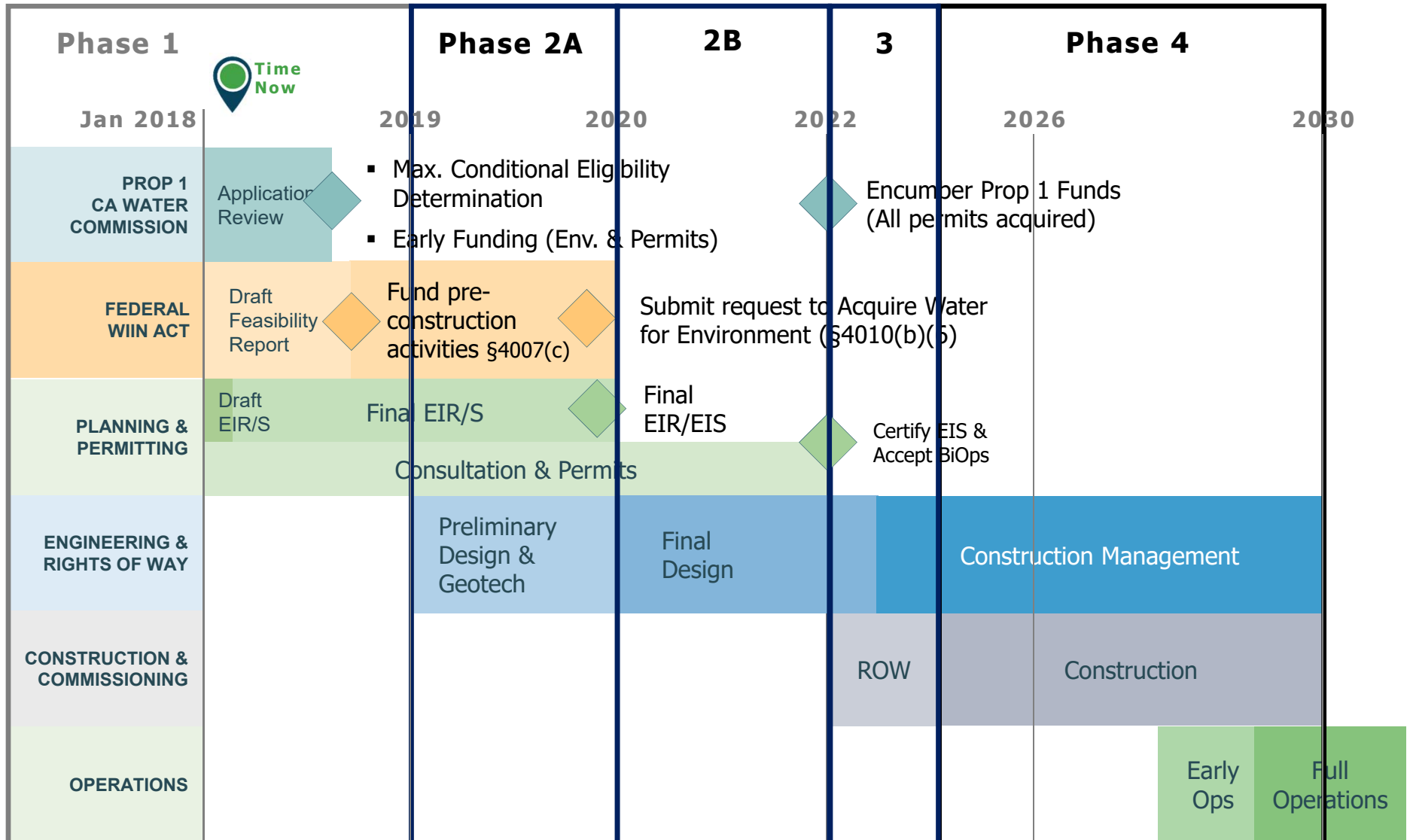
Participation (Diversions into Storage)



Participation, Post-Water Commission (EXAMPLE)



Next Steps:



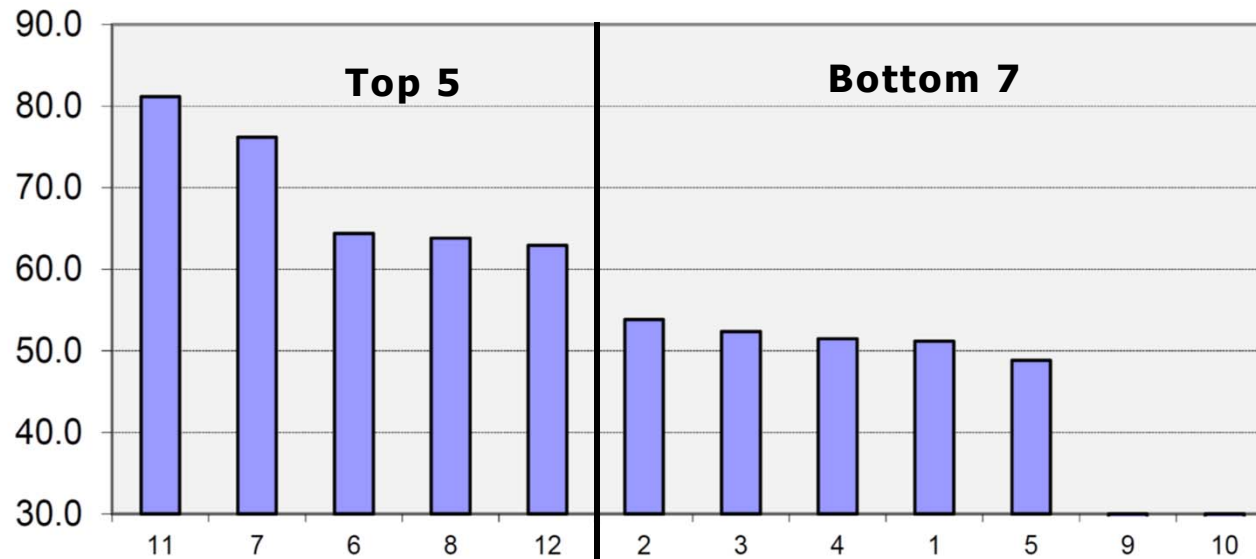


Sites Reservoir Committee Workshop

**Project Update:
2.2 Procurements**

ACWA Conference, May 8, 2018

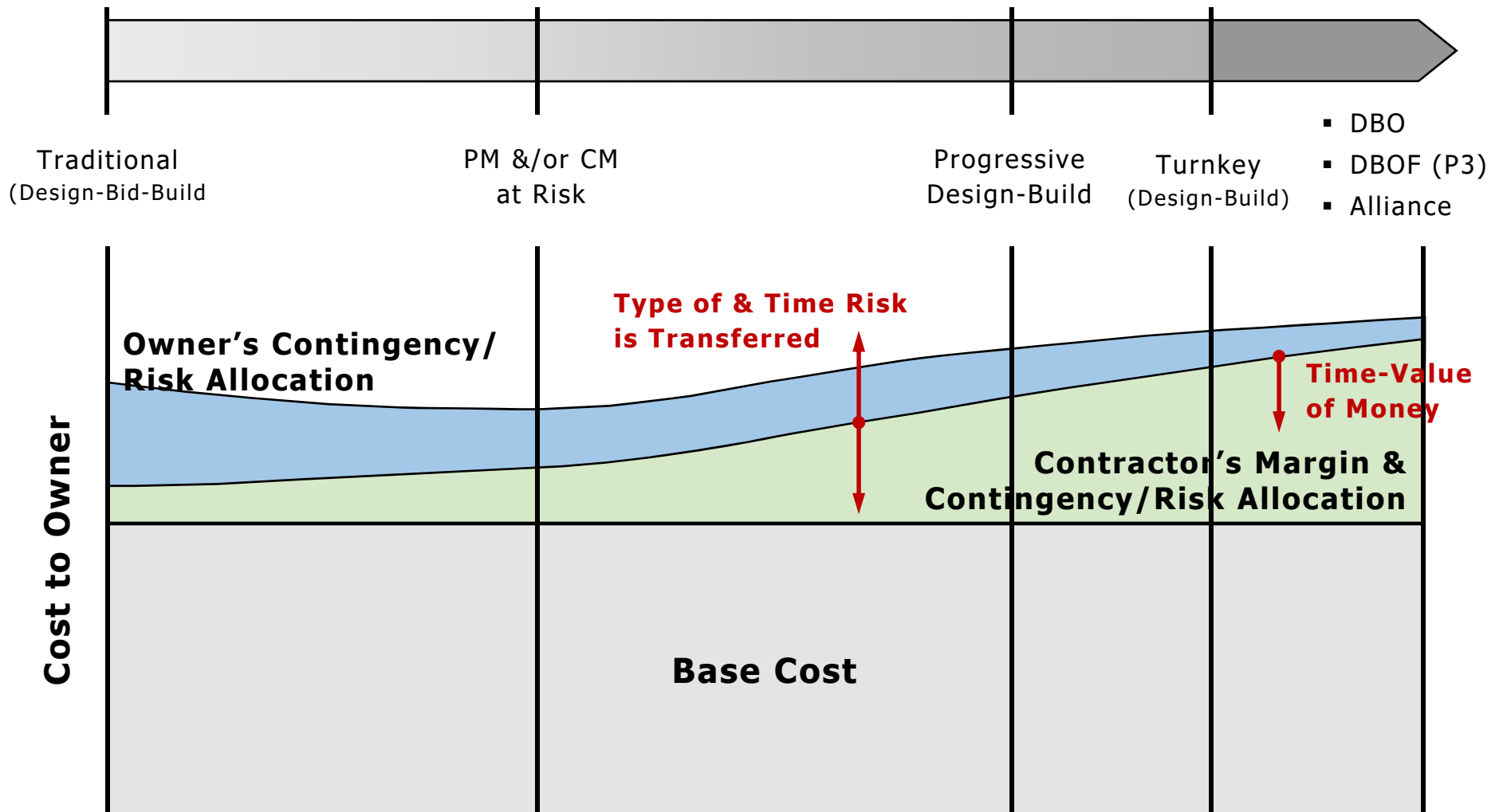
Construction Industry Institute PDCS



<u>Method</u>	<u>Pct</u>	<u>Method</u>
11	84.1	Turnkey
7	78.5	Design-Build or EPC
8	66.2	Multiple Design-Build or EPC
6	64.7	Construction Management @ Risk
12	62.6	Fast Track

<u>Method</u>	<u>Pct</u>	<u>Method</u>
2	52.1	Traditional (DBB) with Early Procurement
3	49.7	Traditional (DBB) with Project Manager
4	48.8	Traditional (DBB) with Construction Manager
1	48.2	Traditional Design-Bid-Build (DBB)
5	47.4	Traditional (DBB) with Early Procurement and Construction Management
9	14.4	Parallel Primes
10	11.2	Traditional (DBB) with Staged Development

Procurement - Considerations



Typical Owner-Managed Risks

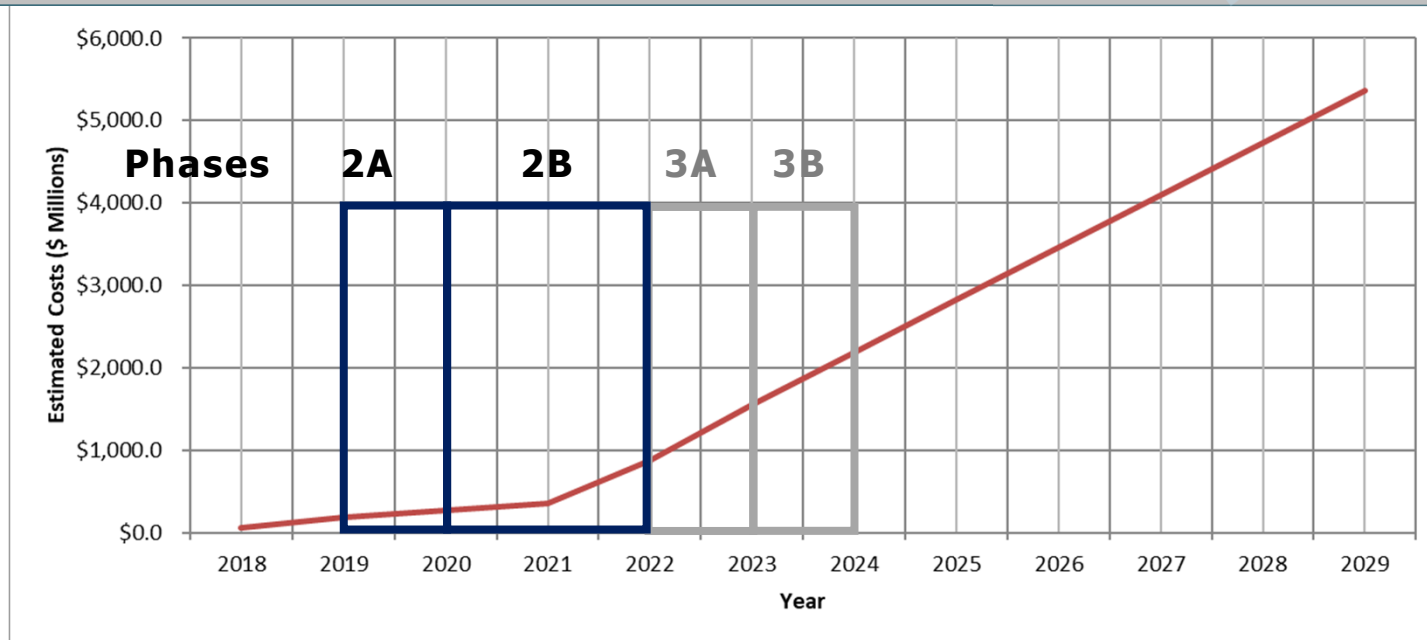
- Ground conditions
- Permit acquisition & requirements
- Real Estate acquisition
- Force Majeure

Typical Constructor-Managed Risks

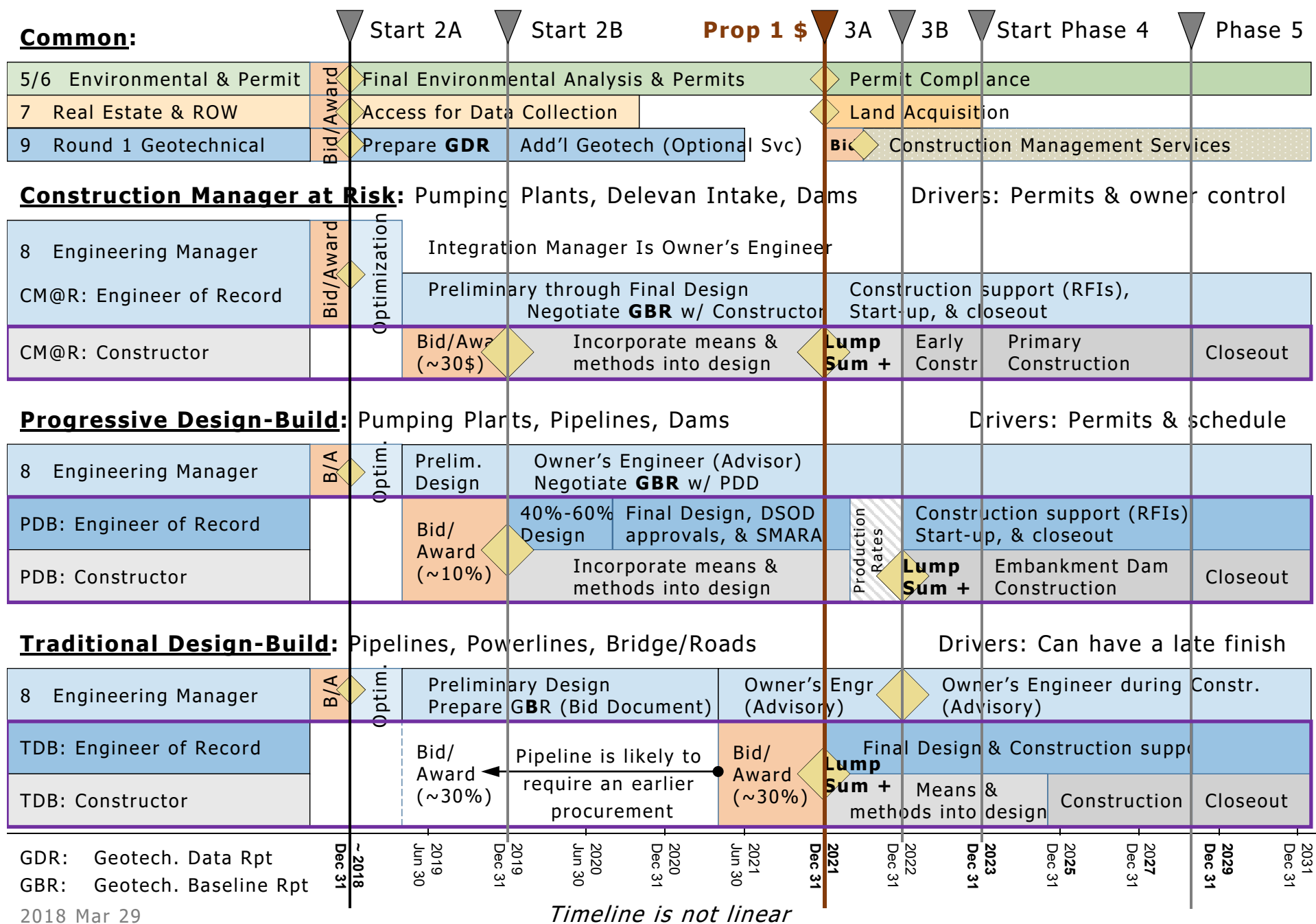
- Integration
- Performance
- Market prices & conditions
- Inclement weather

Phased Implementation Strategy

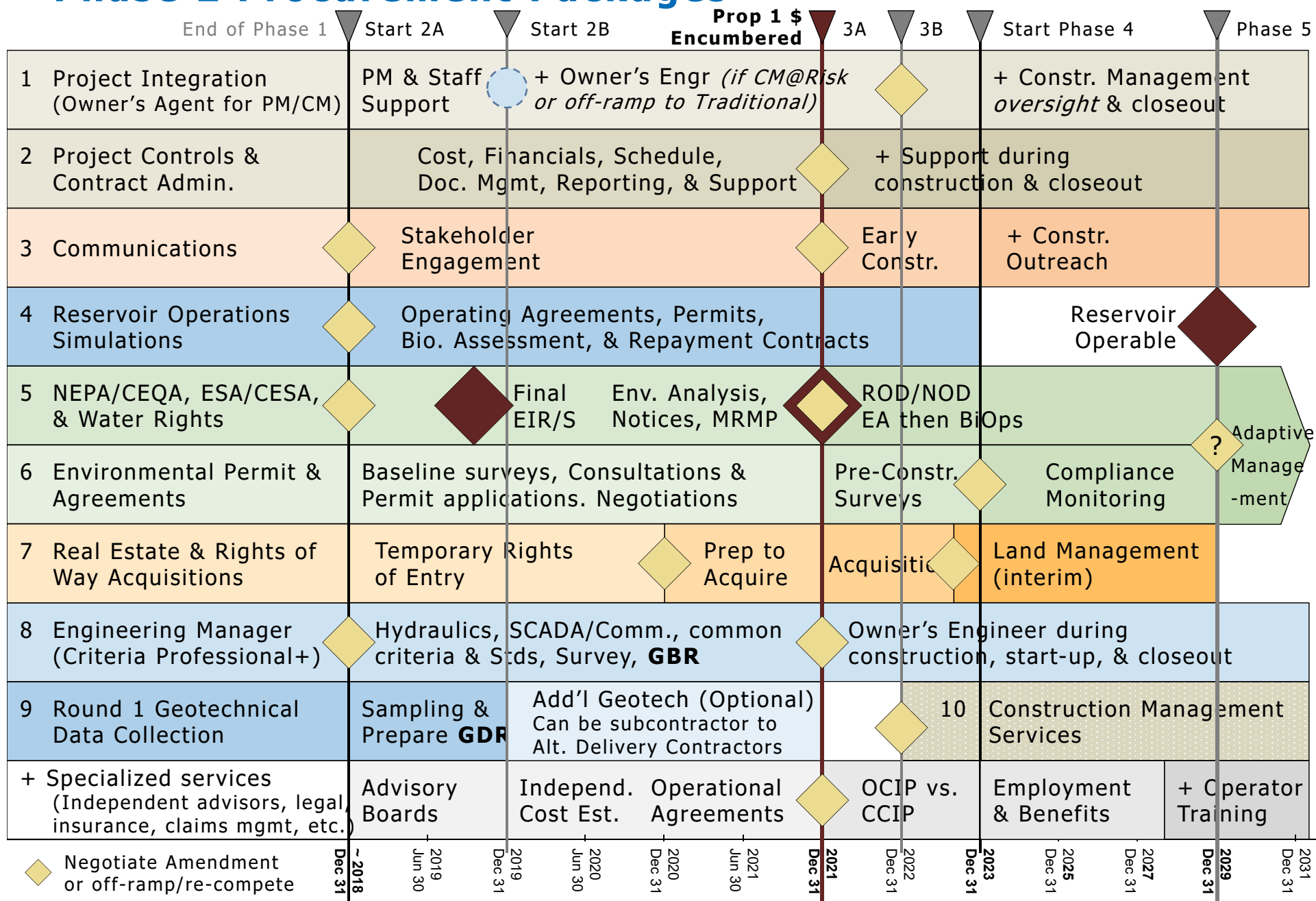
Phase	Start	Finish	Estimate (\$million)
Phase 2A	Jan 2019	December 2019	\$177
Phase 2B	January 2020	December 2021	\$149
Phase 3A	January 2022	December 2022	\$129
Phase 3B	January 2023	December 2023	\$691
Phase 4	January 2024	January 2030	\$3,812
TOTALS (includes an estimate of finance)			\$5,358

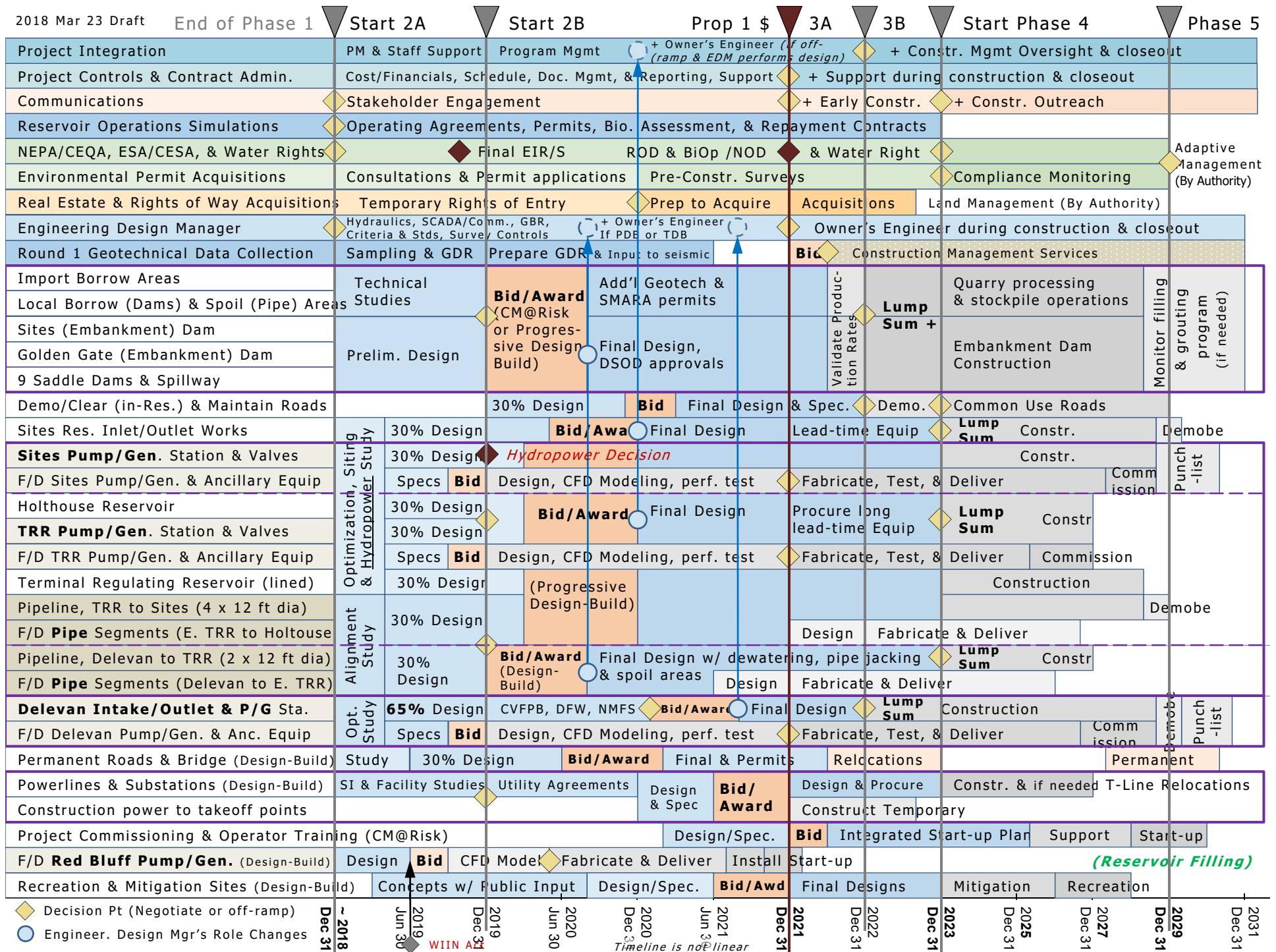


Procurements: Delivery Method Comparison



Phase 2 Procurement Packages





Business Drivers/Best Practices

- Staffing & appropriate span of control
- Provides checks and balances
- Early price certainty (affordability)
- Achieve best value
 - ✓ Competitive selection (2-step selection: Qualifications to short-list, followed by a detailed procurement process & requirements)
 - ✓ Partnering
 - ✓ Equitable risk allocation
- Flexibility to adjust
 - ✓ Adjust to schedule delays – external & internal
 - ✓ Ability to off-ramp
 - ✓ Sufficient bench strength (& succession planning)
- Diverse participation (includes small, local, DVBE, etc.)



General Contract Concepts

- Evaluate new contracts for all required service
- Existing providers may be selected to continue to provide that service
- Respondents can compete for multiple scopes
- Contracts may be stopped at Phase 2b or be extended into Phase 3+
- Contracts may be modified to serve as Authority's representative for Phase 3 or 4
- Contracts are “umbrellas”. Work and budget managed by task order
- Awards are based on qualifications of the firm and their team
 - ✓ Allows use of alternative delivery methods (start of Phase 2B)
 - ✓ Provides flexible task order service contracts
 - ✓ Addresses administrative needs
- Formal (facilitated) partnering process



What is the Project buying for Phase 2?

1. Project Integration
 2. Project Controls
 3. Communications
 4. Reservoir Operations Planning
 5. Environmental Analysis - EIR/S
 6. Permitting & Agreements
 7. Real Estate
 8. Engineering Design
 9. Geotechnical Engineering
- + specialized contracts (e.g. legal, independent review boards)



1. Project Management Integration

- Reports to the Project Operations Manager
- Provides:
 - ✓ Integration of the Project's components and other needs
 - ✓ Quality Management,
 - ✓ Risk Management,
 - ✓ Seismic performance
 - ✓ Geographic Information System
 - ✓ Health & Safety,
 - ✓ Staff support to Owner's Representatives



2. Project Controls & Contract Administration

- Reports to the Project Operations Manager
- Provides:
 - ✓ Scheduling,
 - ✓ Budget & Cost Tracking,
 - ✓ Contract administration & compliance support, (including claims management support)
 - ✓ Reporting & documentation
 - ✓ Document Management & Control,
 - ✓ Administrative Support



3. Communications and Facilitation

- Reports to the Real Estate & Outreach Manager
- Provides:
 - ✓ Landowner coordination support
 - ✓ Stakeholder & *local* agency coordination
 - ✓ Government affairs & legislative support
 - ✓ Public outreach & community relations
 - ✓ Media affairs & strategic communications
 - ✓ Project website and social media platforms



4 Reservoir Operations Simulations

- Reports to the Environmental Planning & Permitting Manager
- Provides:
 - ✓ Model simulations, in river & in-reservoir
 1. Final EIR/S
 2. Permits applications, and acquisition
 3. Agreements
 4. Financing & repayment
 - ✓ Coordinate with preliminary engineering designs development



5. Environmental Analysis – EIR/S

- Reports to the Environmental Planning & Permitting Manager
- Provides:
 - ✓ Responses to comments on the Draft EIR/S
 - ✓ Prepares Final EIR/S
 - ✓ Coordinates with other CA and federal agencies
 - ✓ Prepares draft notices, MRMP, and findings



6. Permitting and Agreements

- Reports to the Environmental Planning & Permitting Manager
- Provides:
 - ✓ Prepare permitting plans and permit applications
 - ✓ Collect environmental field data (e.g.; wetland surveys)
 - ✓ Coordinate with permitting agencies
 - ✓ Prepare draft agreements.
 - ✓ Support permit acquisition



7. Real Estate

- Reports to the Real Estate & Outreach Manager
- Provides:
 - ✓ Obtains temporary access agreements
 - ✓ Support permanent real estate acquisition actions
 - ✓ Interim land management
(post acquisition through Construction)



8. Preliminary Engineering Design

- Reports to the Engineering, Procurement & Construction Manager

Packaging & delivery methods may dictate number of awards

- Provides:

- ✓ Optimization & preliminary plans & specifications
 - All facilities
 - Recreation
 - Grid interconnection
 - Hydropower
- ✓ Common platforms (Hydraulics, topographic survey & controls)
- ✓ Incorporates refined geotechnical
- ✓ Cost and construction schedule estimates
- ✓ Support to environmental planning and permitting efforts
- ✓ Provides requirements to real estate



9. Geotechnical Engineering

- Reports to the Engineering, Procurement & Construction Manager
- Provides:
 - ✓ Investigates geotechnical conditions at key facilities location
 - ✓ Geotechnical Data Report



10. Construction Management Services

- Reports to the Engineering, Procurement & Construction Manager
- Potential for multiple contracts
 - Award contracts to align with construction packaging
- Provides:
 - ✓ Field inspection, testing, and reporting
 - Level of effort is commensurate with contract method.
 - Ranges from Quality Assurance to include Quality Control
 - ✓ Support to start-up and commissioning

