



# **Sites Project**

**Joint Authority Board &  
Reservoir Committee  
Workshop:**

**Contracting and Procurement Strategy**

**January 18, 2018**



# TOPICS

- 1. Overview & Background**
- 2. The Target**
- 3. Strategy**
- 4. Requirements and Components**
- 5. Suggested Request for Qualifications**
- 6. Discussions**

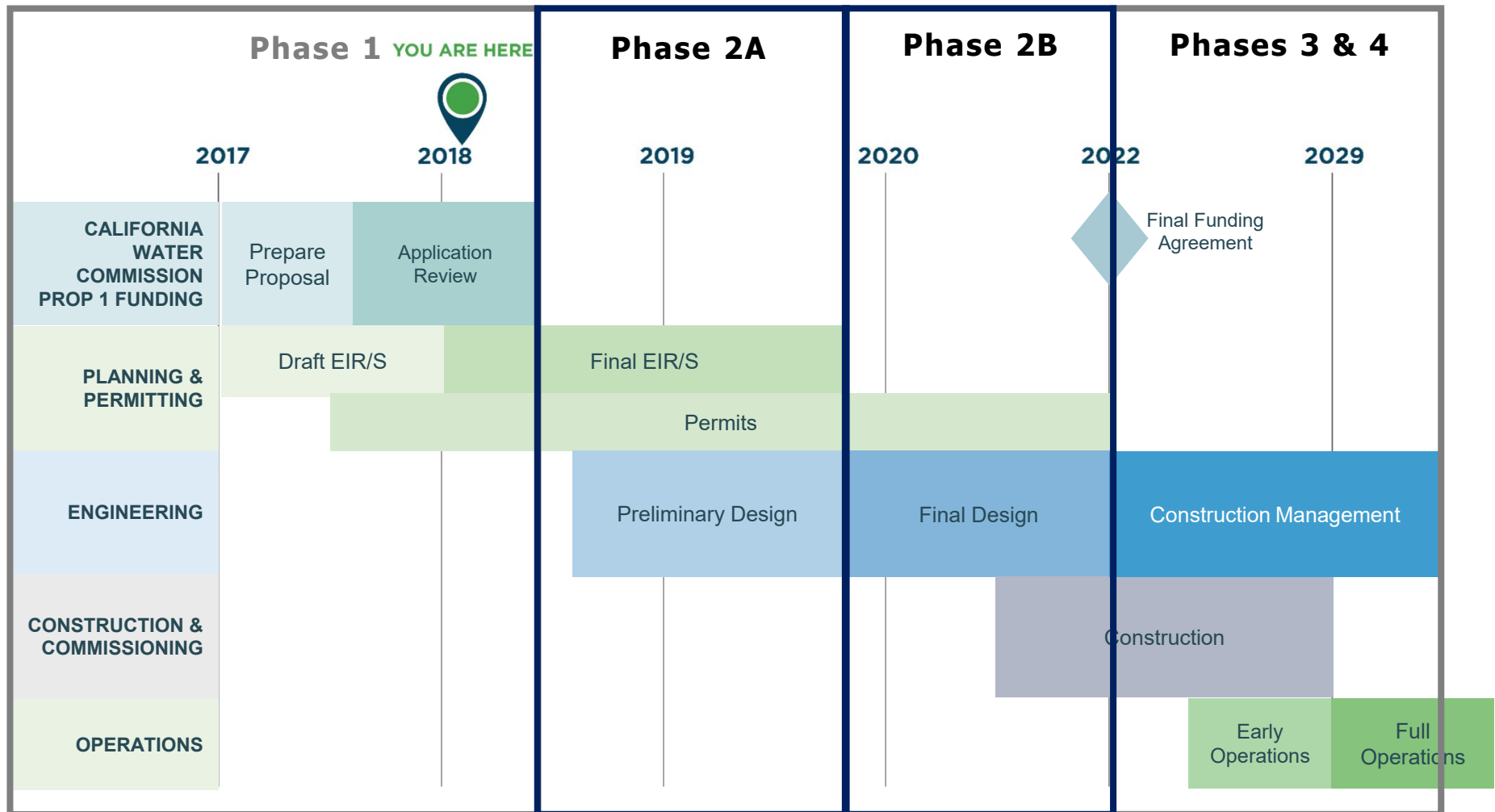


# Overview

- Developing a Phase 2 contracting/technical support approach
  - ✓ Allows use of alternative delivery methods in Phase 3 & 4
- Requires flexible task order service contracts to adapt to the variable needs of the Project
- Addresses administrative needs
- Provides “strawman” work products for discussion and recommendations
  - Scope – work items
  - Organization
  - Schedule
  - Responsibility Matrix
  - Conceptual RFQ

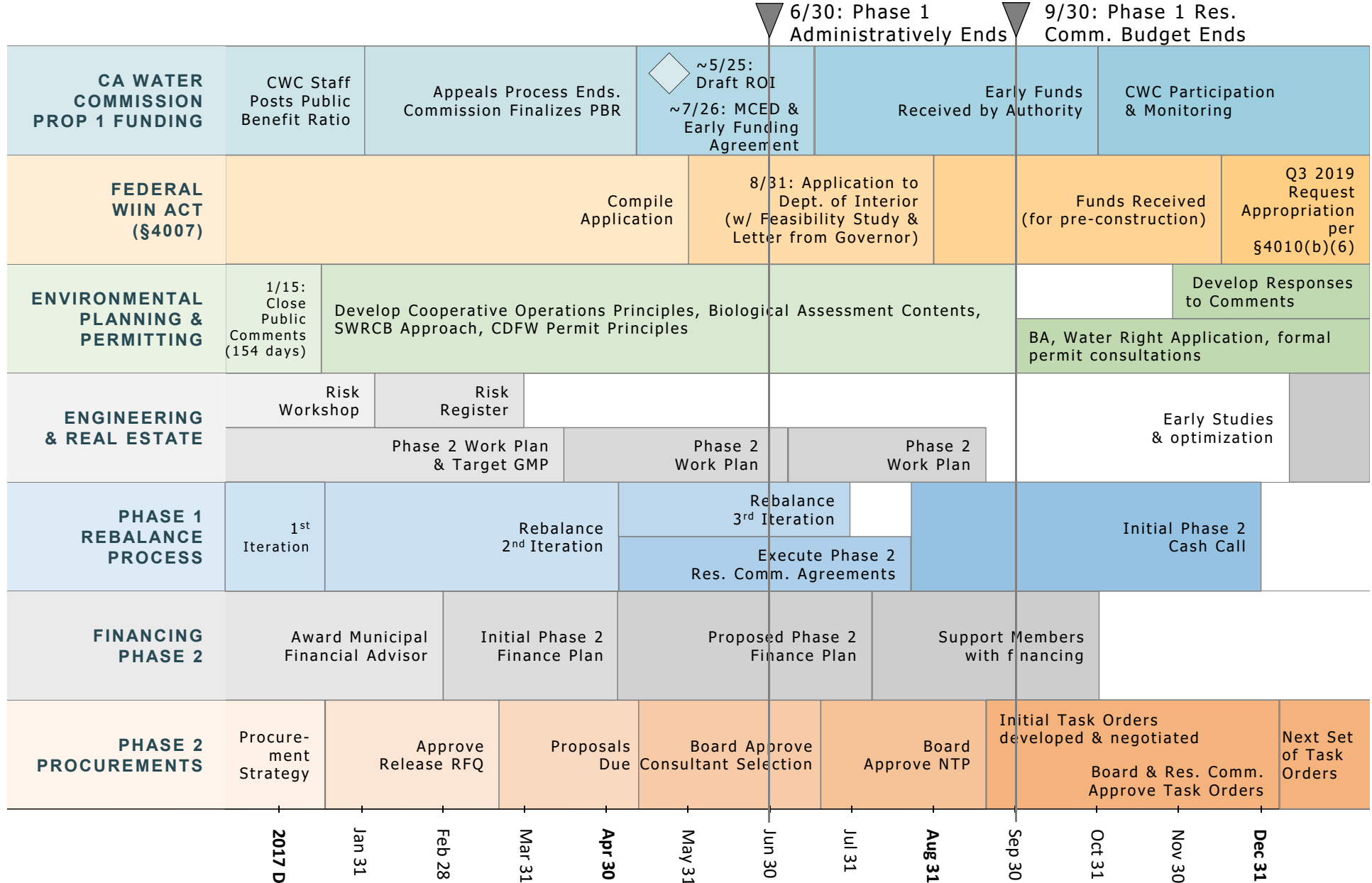
# Implementation Strategy:

## Draft Phase-level Schedule



# Phase 1 Completion Schedule

(Working Draft)

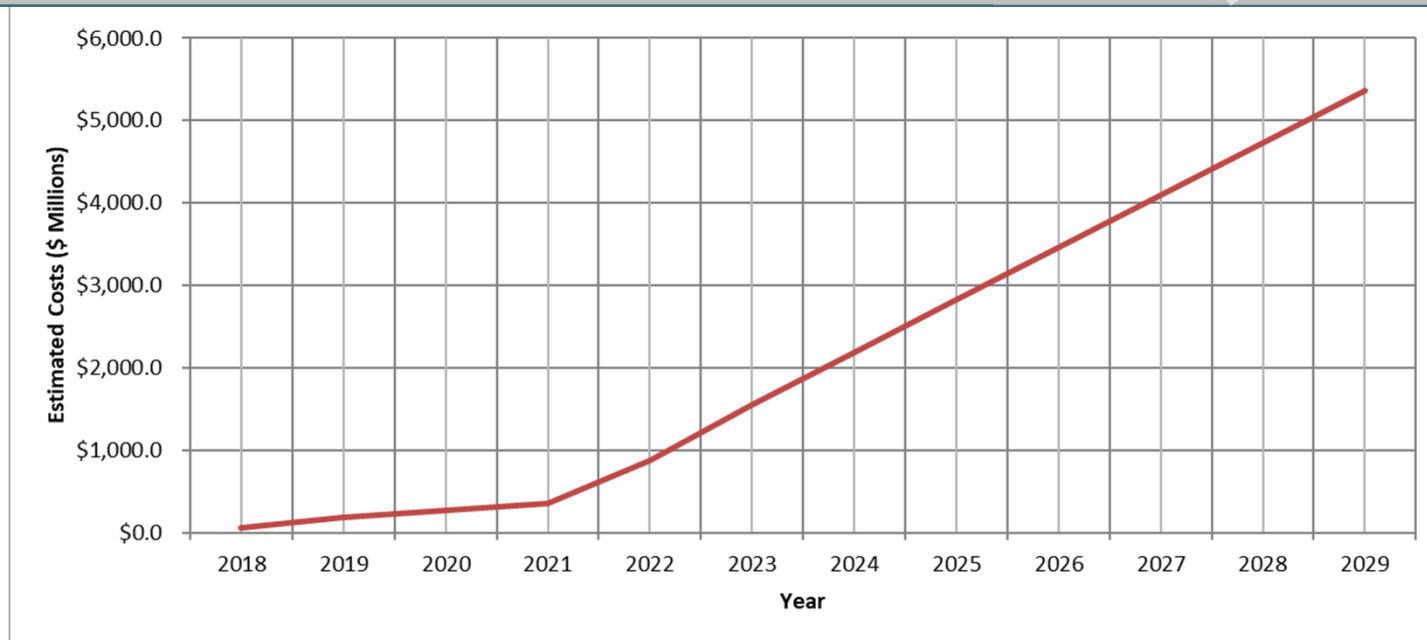


## Phase 2 Requirements

- Administrative Items
  - ✓ Budget, Costs, Schedule
  - ✓ Health and Safety
- Engineering Design
  - ✓ Advance ~10% Concept to ~30% Preliminary level
  - ✓ Develop specialty details (e.g. geotechnical)
- Environmental
  - ✓ Final EIR/EIS
  - ✓ Permitting, Water Rights
- Real Estate
  - ✓ Temporary Right of Entry
  - ✓ Land Acquisition
- Communications, Outreach, Facilitation

# Phased Implementation Strategy

Phase	Start	Finish	Estimate (\$million)
Phase 2A	June 2018	December 2019	\$177
Phase 2B	January 2020	December 2021	\$149
Phase 3A	January 2022	December 2022	\$529
Phase 3B	January 2023	December 2023	\$691
Phase 4	January 2024	January 2030	\$3,812
<b>TOTALS</b>			<b>\$5,358</b>



# What's the end point target



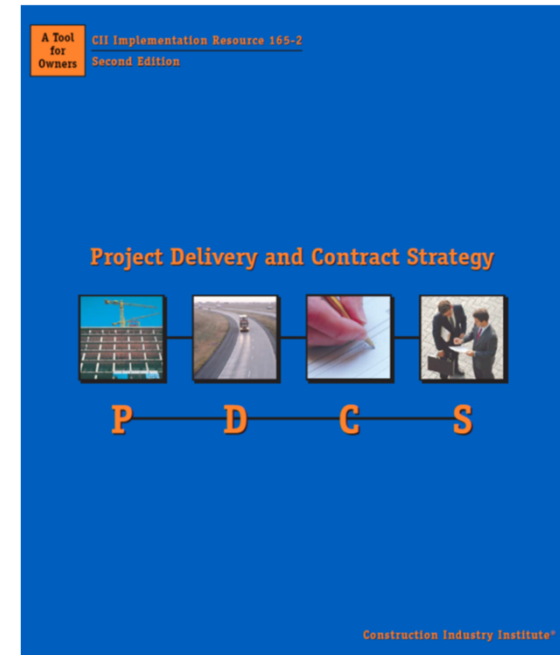


# Construction Industry Institute PDCS

## Owner's Tool for Project Delivery and Contract Strategy Selection

**Purpose:** "to facilitate maximum achievement of the owner's project objectives"

**Process:** 12 construction delivery methods evaluated w/ default compensation approaches provided



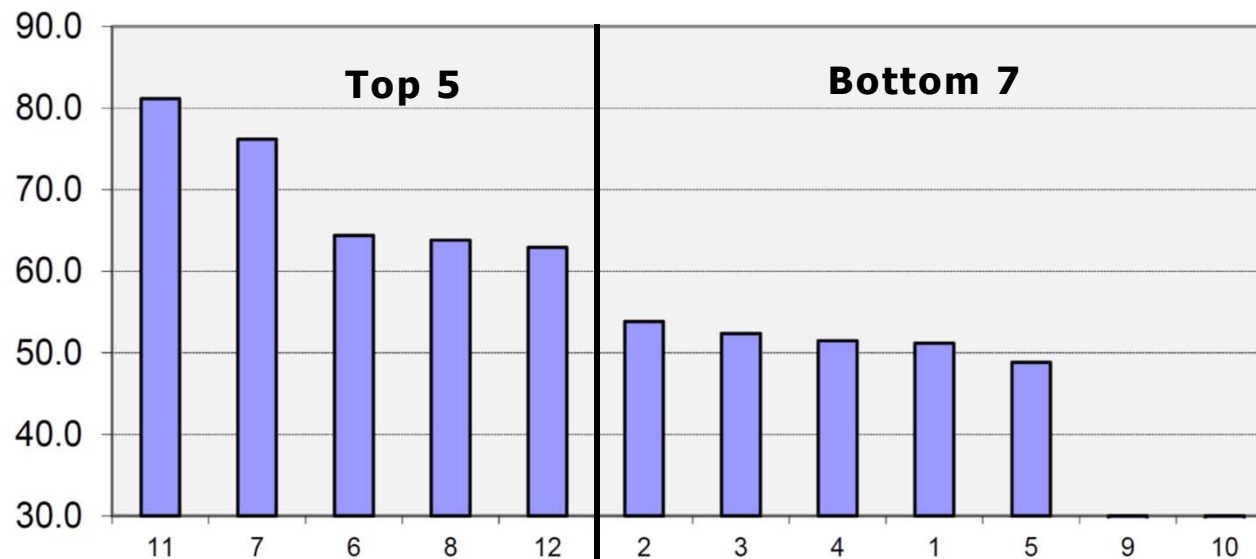
**Additional Considerations** (outside of the Construction Industry Institute's process):

1. Regulatory/Permits
2. Real Estate Acquisition
3. Political/Administration
4. Governance and ownership (today vs. start of construction)
5. Construction bonding capacity

# Construction Industry Institute PDCS

	Factor #	Selection Factor Action Statement	Dec 21 Occurrence	Rank Top 4-6	Score 100	Relative Weighting
Cost Related Factors	<b>1</b>	<b>Control cost growth</b>	11	<b>1</b>	100	29%
	<b>2</b>	<b>Ensure lowest cost</b>	7	<b>6</b>	20	6%
	3	Delay or minimize expenditure rate	3			
	<b>4</b>	<b>Facilitate early cost estimates</b>	9	<b>4</b>	50	15%
	5	Reduce risks or transfer risks to contractor(s)	5			
Schedule Related Factors	<b>6</b>	<b>Control time growth</b>	10	<b>2</b>	80	24%
	<b>7</b>	<b>Ensure shortest schedule</b>	8	<b>5</b>	30	9%
	8	Promote early procurement	1			
Other Factors	<b>9</b>	<b>Ease change incorporation</b>	9	<b>3</b>	60	18%
	10	Capitalize on expected low levels of changes				
	11	Protect confidentiality (Not applicable)				
	12	Capitalize on familiar project conditions				
	13	Maximize Owner's controlling role	1			
	14	Minimize Owner's controlling role				
	15	Maximize Owner's involvement				
	16	Minimize Owner's involvement				
	17	Capitalize on well-defined scope	1			
	18	Efficiently utilize poorly defined scope	1			
	19	Minimize number of contracted parties				
	20	Efficiently coordinate project complexity or innovation	1			

# Construction Industry Institute PDCS



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

Method	Pct	Method
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

# Construction Industry Institute PDCS

Default Compensation Approach

PDCS #	Rating	PDCS	Designer	Constructor	CM (Agent)	PM (Agent)	Contractor	Supplier
<b>11</b>	<b>84.1</b>	<b>Turnkey</b>					Competitive Lump Sum	
<b>7</b>	<b>78.5</b>	<b>Design-Build or EPC</b>					Competitive Lump Sum	
<b>8</b>	<b>66.2</b>	<b>Multiple Design-Build or EPC</b>					Competitive Lump Sum	
<b>6</b>	<b>64.7</b>	<b>CM @ Risk</b>	Firm Price	GMP				
<b>12</b>	<b>62.6</b>	<b>Fast Track</b>	Cost + Fee	Cost + Fee				
2	52.1	Traditional (DBB) with Early Procurement	Cost + Fee	Competitive Lump Sum				Competitive Lump Sum
3	49.7	Traditional (DBB) with Project Manager	Firm Price	Negotiated Lump Sum		Negotiated Lump Sum		
4	48.8	Traditional (DBB) with Construction Manager	Negotiated Lump Sum	Competitive Lump Sum	Negotiated Lump Sum			
1	48.2	Traditional Design-Bid-Build (DBB)	Firm Price	Competitive Lump Sum				
5	47.4	Traditional (DBB) with Early Procurement and CM	Cost + Fee	Competitive Lump Sum	Cost + Fee			Competitive Lump Sum
9	14.4	Parallel Primes	Cost + Fee	Competitive Lump Sum				Competitive Lump Sum
10 12	11.2	Traditional (DBB) with Staged Development	Competitive Lump Sum	Competitive Lump Sum		Cost + Fee		Competitive Lump Sum

# Survey Results

- ✓ Reservoir Committee initial prioritization using the Construction Industry Institute – Owner’s Tool
- ✓ Evaluated 12 common contracting methods- delivery options for the Project
- ✓ Other critical factors – permitting, real estate, governance/ownership, financing
- ✓ Ranking of Concerns
- ✓ Recommendations



# The Strategy



# Project Delivery Strategy – Key Concepts

## **General/Common to all phases:**

- Proposition 1 milestones result in a schedule-driven process
  - ✓ All permits by Jan 1, 2022 (end of Phase 2)
  - ✓ Deliver Public Benefits by 2030
  - ✓ Owner-procure pumps/turbines
- Early price certainty is an important consideration
- Equitable risk allocation (assign risks to the party in the best position to manage it)
- Authority does not plan to have employees until end of Phase 2 (owner's agent/representative)
- Flexibility to adjust as project evolves (MSA or IDIQ)
- Need bench strength & a succession plan
- Need adequate checks and balances plus span of control
- Utilize a competitive process & best value
- Ability to off-ramp should performance become an issue

## **Utilize Alternative Delivery with ability to off-ramp to Traditional Methods**

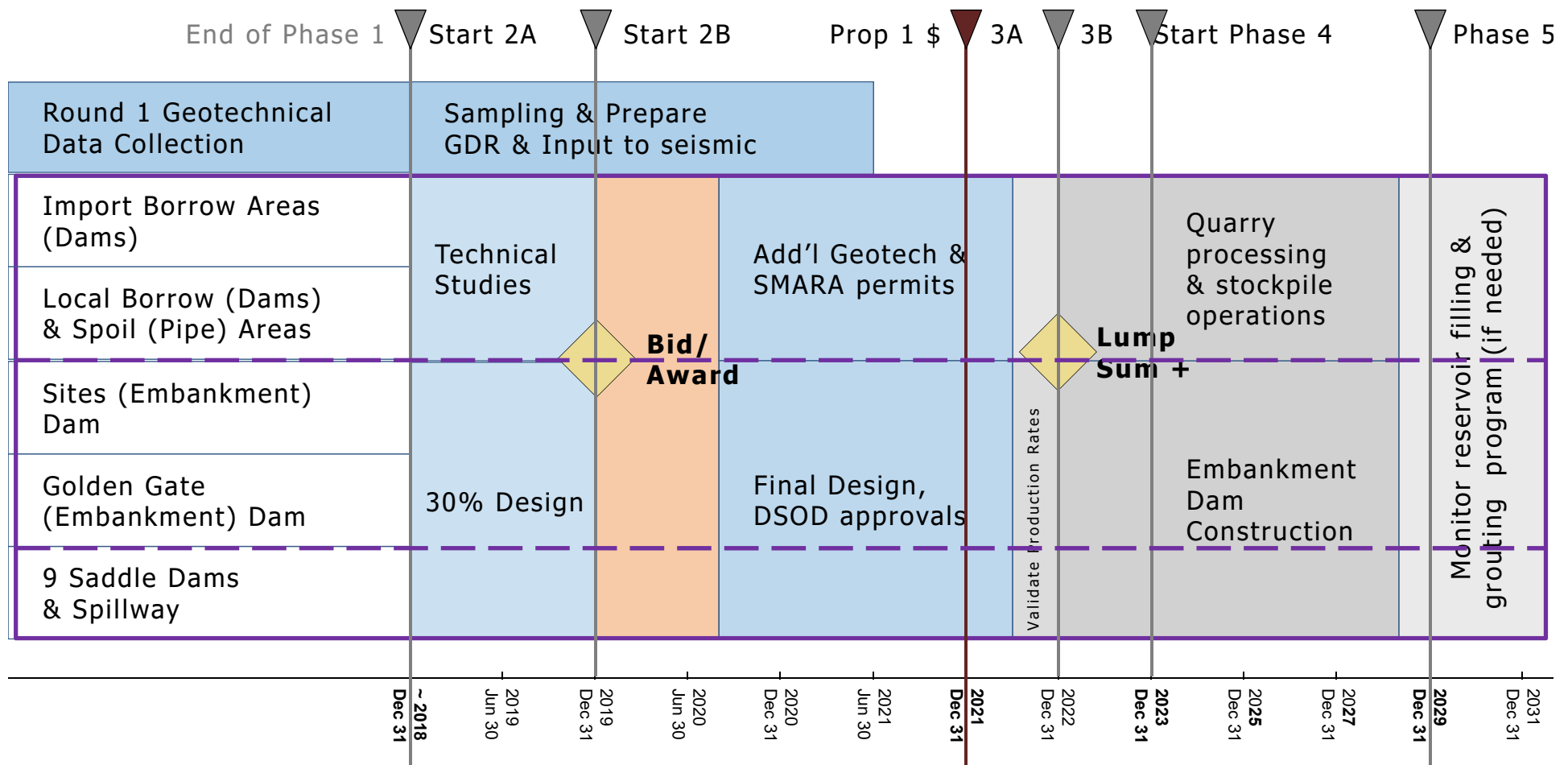
# Example: Contract Packaging for Dams

Options: (Decision needed at end of Phase 2A)

A Turnkey (1 Package)

B Separate borrow sites contract from Dams (2 to 3 contracts)

C Main Dams with borrow sites & Saddle Dams (2 contracts)



*Timeline is not linear*

# Requirements and components



## Phase 2 Requirements

- Administrative Matters
  - ✓ Budget, Costs, Schedule
  - ✓ Health and Safety
- Engineering Design
  - ✓ Advance 10% Concept to 30% Preliminary level
  - ✓ Develop specialty details (e.g. geotechnical)
- Environmental
  - ✓ Final EIR/EIS
  - ✓ Permitting, Water Rights
- Real Estate
  - ✓ Temporary Right of Entry
  - ✓ Land Acquisition
- Communications, Outreach, Facilitation



## Phase 2 Administrative Requirements

### Development and Maintenance of:

- Integrated Project Schedule
- Project Budget
- Cost Tracking
- Contract Administration
- Document Control
- Data Management
- Mapping/GIS
- Executive Assistance
- IT Support
- Health and Safety

## Phase 2 Engineering Requirements

Obtain additional field data (geotechnical, topographic survey)

Develop Preliminary (30%) Designs for:

- Main and Saddle Dams
- Sites Pumping Facilities
- Holthouse and TTR Reservoirs
- Dam Inlet and Outlet Structures
- Delevan Pipeline
- Emergency Outlet
- Delevan Diversion and Outlet

Support Environmental Compliance

## Phase 2 Environmental Requirements

Obtain additional field data (wetlands, cultural, aquatics)

Develop Final EIR/EIS & pre-construction surveys

- Respond to Comments
- Prepare Final EIR/EIS
- Support Findings, Notice of Determination
- Prepare Permit Applications
- Develop Permit Acquisition Plans
- Support development of permit conditions
- Initiate Adaptive Management Planning and Implementation
- Prepare Applications
- Support Permit negotiations

## Phase 2 Real Estate Requirements

Obtain temporary rights of entry for additional field data collection (geotech, wetlands, cultural)

- ✓ Develop land ownership maps
- ✓ Integrate with Design and Environmental teams
- ✓ Contact and negotiate ROE agreements

Prepare for Permanent Land Acquisition Process

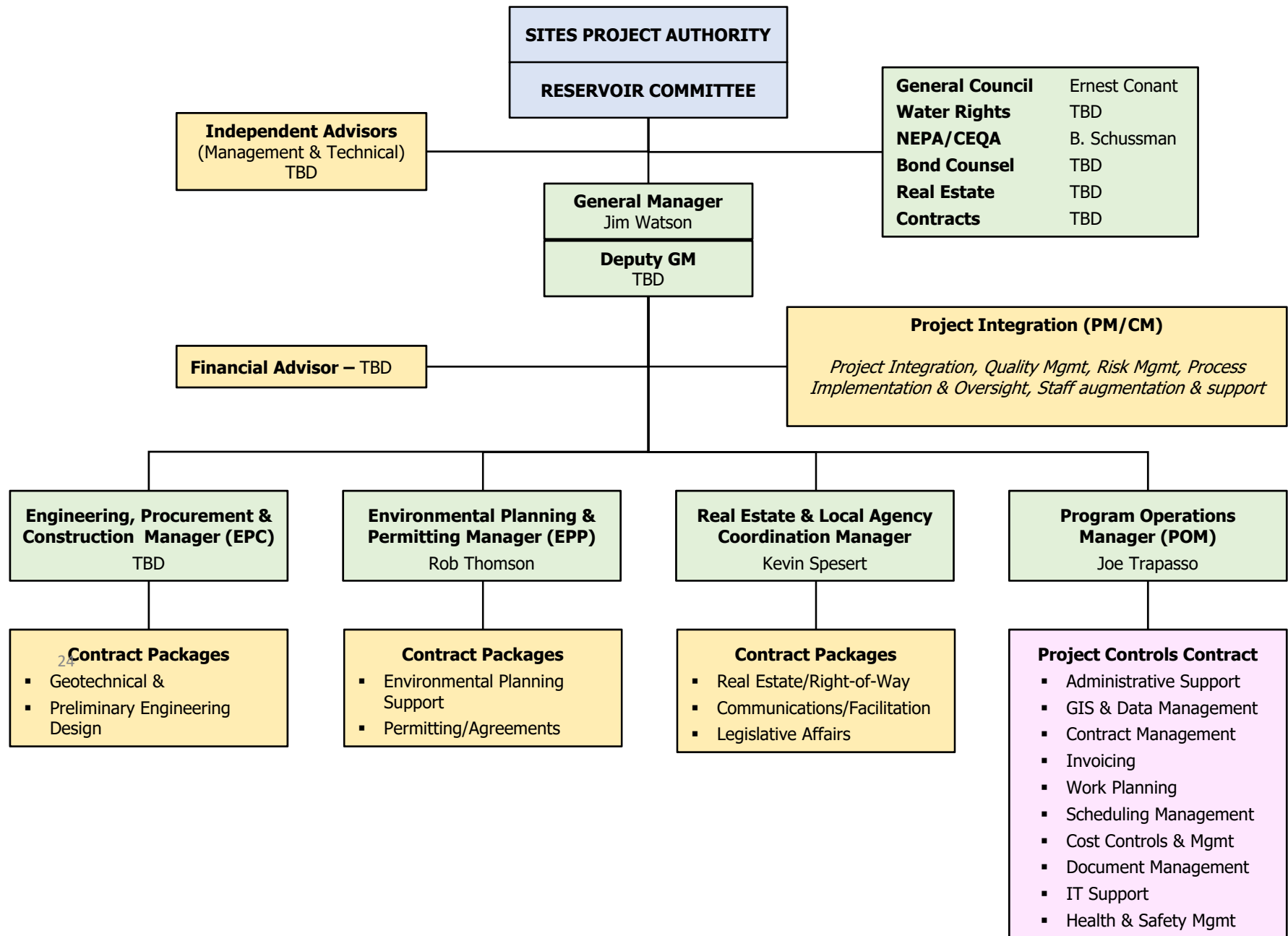
- ✓ Update ownership and constrain maps
- ✓ Integrate with Design and Environmental teams
- ✓ Contact and negotiate land agreements

## Phase 2 Communications Requirements

- Establish/maintain communications with
  - ✓ Impacted landowners
  - ✓ local and regional stakeholders
  - ✓ statewide and national stakeholders
- Facilitate communications with
  - ✓ Elected officials
  - ✓ Regulatory agencies
  - ✓ External stakeholders
  - ✓ Internal participants
  - ✓ News and media



# Phase 2 Organization



## Phase 2 Responsibility Matrix – Admin and Integration

Project Controls	Project Integration
Project Operations Manager	Project Operations Manager
Scheduling, Budget, Cost Tracking, Contract Administration, Document Control, Data Management, Mapping/GIS, Executive Assistance, IT Support	Integrate technical activities and Products. Quality Management, Risk Management, Health & Safety, Staff support to Owner Representatives

## Phase 2 Responsibility Matrix – Engineering Design

Geotechnical Engineering	Preliminary Engineering Design
Engineering, Procurement & Construction Manager	Engineering, Procurement & Construction Manager
Investigate geotechnical conditions at key facilities location. Prepare reports	Prepare - refine designs to support Phase 2 and 3 activities

## Phase 2 Responsibility Matrix – Environmental

Environmental Planning	Permitting and Agreements
Environmental Planning & Permitting Manager	Environmental Planning & Permitting Manager
Prepare Final EIR/EIS, Findings, MMRP, Notices	Prepare permitting plans and applications – draft agreements. Support permit acquisition

## Phase 2 Responsibility Matrix – Real Estate & Outreach

Communications and Facilitation	Real Estate
Real Estate & Outreach Manager	Real Estate & Outreach Manager
Support all external communications. Facilitate internal decision-making	Obtain temporary access agreements. Support permanent real estate deals



# Phase 2 Responsibility Matrix

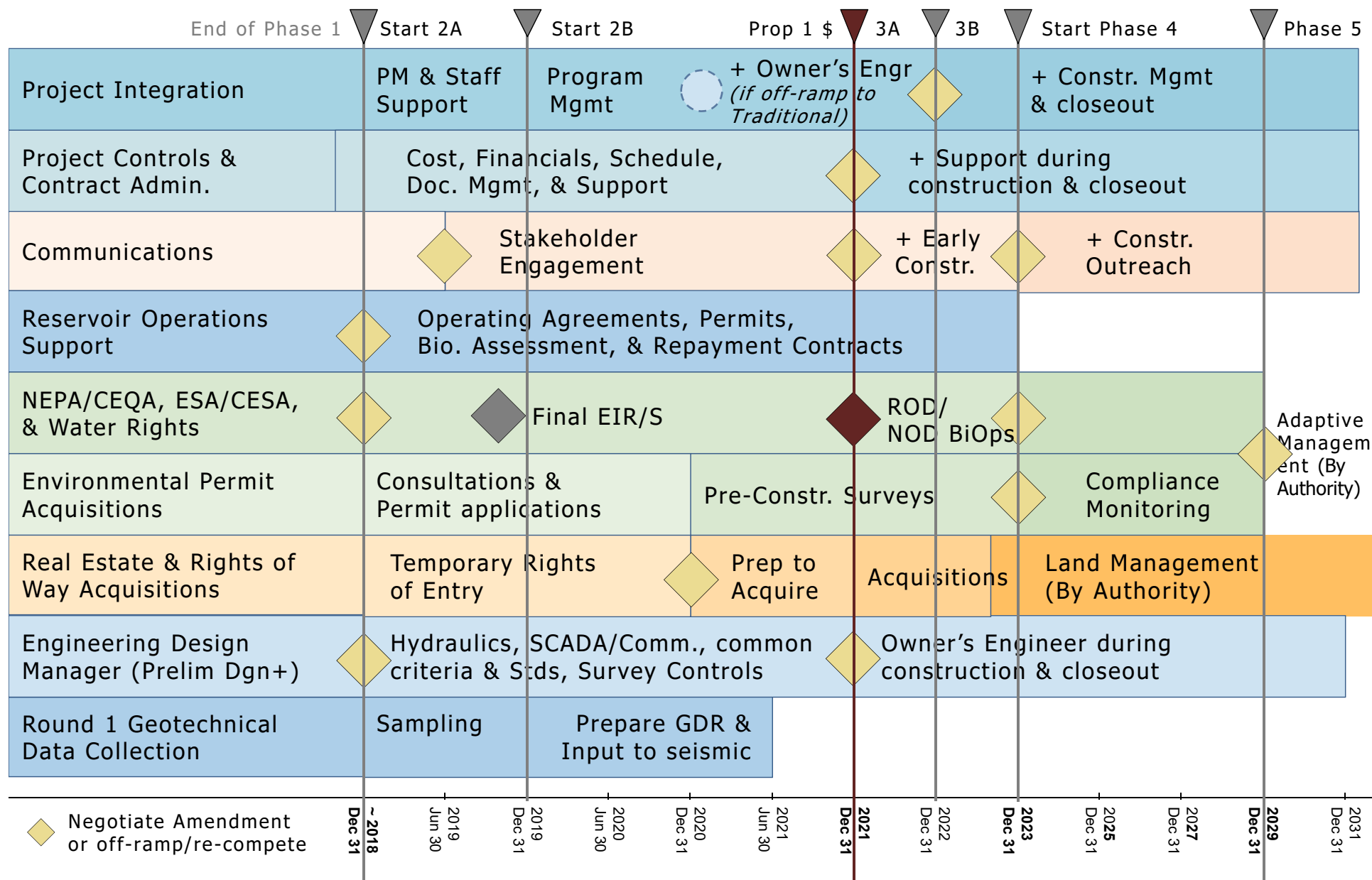
	Project Controls	Project Management Integration	Geotechnical Engineering	Preliminary Engineering Design	Environmental Planning	Permitting and Agreements	Communications and Facilitation	Real Estate	Legal	Authority Staff
Responsible Staff	Project Operations Manager	Project Operations Manager	Engineering, Procurement & Construction Manager	Engineering, Procurement & Construction Manager	Environmental Planning & Permitting Manager	Environmental Planning & Permitting Manager	Real Estate & Outreach Manager	Real Estate & Outreach Manager	Authority Board	
	Scheduling, Budget, Cost Tracking, Contract Administration, Document Control, Data Management, Mapping/GIS, Executive Assistance, IT Support	Integrate other technical needs. Quality Management, Risk Management, Health & Safety, Staff support to Owner Representatives	Investigate geotechnical conditions at key facilities location.	Prepare - refine designs to support Phase 2 and 3 activities	Prepare Final EIR/EIS, Findings, Mitigation, Monitoring, and Reporting Program, Notices	Prepare permitting plans and applications – draft agreements.  Support permit acquisition	Support all external communications  Facilitate internal decision-making	Obtain temporary access agreements  Support permanent real estate deals  Legislative Affairs	Authority Counsel. Special counsel for environmental bond, real estate, infrastructure contracts, and other counsel	
CWC Funding	√								√	①
WIIN Funding	√								√	①
EIR/EIS	√	√		√	①	②	√	√	√	√
Permitting	√	√		√	②	①	√	√	√	√
Engineering Design	√	√	②	①	√	√	√	√	√	√
Real Estate	√	√	√				√	①	√	√
Rebalancing-Governance	√	√					②		√	①
Financing	√	√							√	①

# Draft Request for Qualifications



# Phase 2 Consultant Packages

(Proposed)



## Phase 2 Consultant RFQ

The Authority invites qualified firms (including teams of firms) with extensive expertise and experience in various services and processes described below to submit a Statement of Qualifications.

The Authority intends to select one or more organization to provide expert technical advice and consultation required for the preparation of all studies, reports, agreements and documents and support documentation required to advance the Sites Reservoir Project.

The scope of services includes:

- Project coordination, management and integration
- Prepare engineering designs
- Geotechnical Studies
- Complete the environmental analysis process
- Acquire all regulatory permits and agreement
- Communications and facilitation
- Support the acquisition of rights-of-way, and easements

## Phase 2 Consultant SOQ Contents

Suggested RFQ - requested contents include

- Limited to 25 pages for each scope area
  - ✓ Executive Summary
  - ✓ Identification of Applicant (Name, Business type, Contact Info)
  - ✓ Geographic Location (Offices, number of employees, time at location)
  - ✓ Key Personnel (Specifically who and where, with what experience)
  - ✓ Experience and Technical Competence (scope item specific)
  - ✓ Proposed approach to the work
  - ✓ Knowledge of the Sites Project, CA Water System, Water and Power facilities, regulatory system
  - ✓ Licenses and Certifications
  - ✓ References
  - ✓ Attach Standard form contract

## Phase 2 Consultant Selection Schedule

(Proposed)

A. RFQ published	Early April 2018
B. Contractor Questions	April 16
C. Answers Deadline	April 27
D. SOQ Submission Deadline	May 14
E. Completion of review of SOQ	June 1
F. Interview Dates	June 11 – June 20
G. Recommendation of Selection	August 20
H. Contract approval (Intent to Award)	Sept 17
I. Contract Task Orders Funded (Phase 2 initial funding)	Dec 21

# Discussion



# Comments Received During Workshop

(1/2)

- Critical success factors:
  - Integration
  - Risk transfer – who should “own” the risk
- As the communications function evolves, need to define “stakeholders”
- Best value is obtained through partnerships and teamwork
- Management of risk and quality are important functions  
(currently planned to be provided through the “integration” scope of services)
- As potential participants, federal and state contracting and funding requirements should be considered in request for qualifications/proposals. Examples:
  - Disadvantaged businesses, disabled veterans
  - Disbursement of combined funds. Recognized foundations have been used
- Procurements after Phase 2A: Need to be prepared to receive alternative delivery concepts and potential impacts to permits and/or other aspects of the project. Also, what are trade-offs (“or equal”) vs. accepting a lower level of performance.
- For applicable contracts for services such as permitting, selection process should consider having trustee or cooperating agency participation in selection process in a non-voting capacity.
- Need to address permit application requirements and level of design (e.g. USACE 404 permit applications require ~65% design)



# Comments Received During Workshop

(2/2)

- A/E industry's continued consolidation & mobility of key personnel & expertise. Need to plan for such events and how to retain access to key personnel.
- A/E industry changes primarily in indemnification & insurance (i.e. business risk) - typically in the form of "flow downs" from prime to subs.
  - Indemnification: In some instances, certain qualified subs can't (or are unwilling to) accept the owner's requirements.
  - Insurance: Typically larger amounts specified for larger firms/contracts that increase cost for small subs. In some cases they may not be able to buy the level of coverage being specified.

If owner is looking for best value, provide some flexibility and owner needs to understand where such exceptions are occurring.

- Address potential for contractual conflicts
  - If award to firm "A", can they compete on other contracts?
  - Similar for subcontractors and ability to be prime another contract
- RFQ Solicitation clarifications (proposed 25 page limit). Use attachments, which do not count towards page limit, for
  - Resumes
  - Firm's standard form contract