

MARKETS



DEVELOPMENT UPDATE

April 27, 2022



*Working together to responsibly and economically
keep the lights on today and in the future.*



SouthwestPowerPool



SPPorg



southwest-power-pool



Southwest Power Pool
**WESTERN
ENERGY
SERVICES**

WELCOME AND OVERVIEW

BRUCE REW

SPP SR. VP, OPERATIONS

AGENDA

Welcome and Overview	Bruce Rew, SPP
Governance Design Team Update	Kara Fornstrom, SPP
Transmission Availability Design Team Update	Steve Johnson, SPP
Market Products/Price Formation Design Team Update	Jim Gonzalez, SPP
GHG Tracking Design Team Update	Kara Fornstrom, SPP
Market Monitor Options	Barbara Stroope, SPP
Questions/Discussion	
Next Steps/Schedule	Bruce Rew

GOVERNANCE DESIGN TEAM UPDATE

KARA FORNSTROM, SPP

STAKEHOLDER LEADS

Aly Koslow	Director, Federal Regulatory Affairs and Compliance	Arizona Public Service
David Rubin	Federal Energy Policy Director	NV Energy
Joe Fina	Assistant General Counsel	Snohomish County Public Utility District No. 1
Lea Fisher	Senior Policy Analyst	Public Generating Pool

SPP Support Team

Kara Fornstrom	Director, State Regulatory Policy
Mike Riley	Associate General Counsel
Nicole Wagner	Manager, Regulatory Policy
Patti Kelly	Lead Regulatory Analyst

MARKETS+ GOVERNANCE OPTIONS

2A

2B

Add 3?

SPP Independent Board

Markets+ Participants Executive Committee (MPEC) – Participant Based

Markets+ Working Group (M2WG) – Sector Based

Future Joint (with RTO) Work Groups

Markets+ State Committee

**Markets+ Independent
Governing Board**

**Nominating Committee
(Sector Based)**

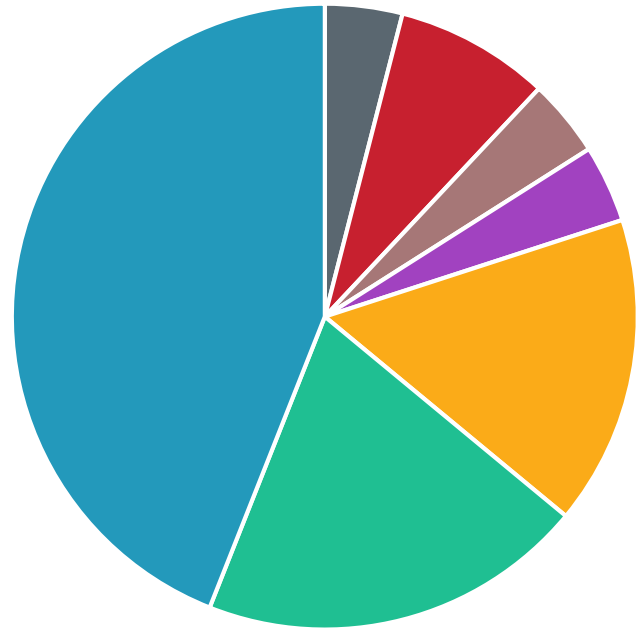
**SPP By-Laws Modification
Board Qualifications?**

**SPP CGC
Add Markets+ Seat?**

SURVEY RESPONDENTS

- Municipal Energy Agency of Nebraska
- Shell Energy North America
- NV Energy
- Interwest Energy Alliance
- Basin Electric Power Coop
- Idaho Power Company
- Western Power Trading Forum
- Powerex Corp.
- Arizona Public Service Company
- Public Service Company of Colorado
- Renewable Northwest
- Western Area Power Administration
- Bonneville Power Administration
- Chelan County Public Utility District
- Public Generating Pool
- Clean Energy Buyers Association
- Western Resource Advocates/Sustainable FERC
- NorthWestern Energy
- Salt River Project
- Northwest Requirements Utilities
- Tacoma Power
- Public Power Council
- Northwest & Intermountain Power Producers Coalition

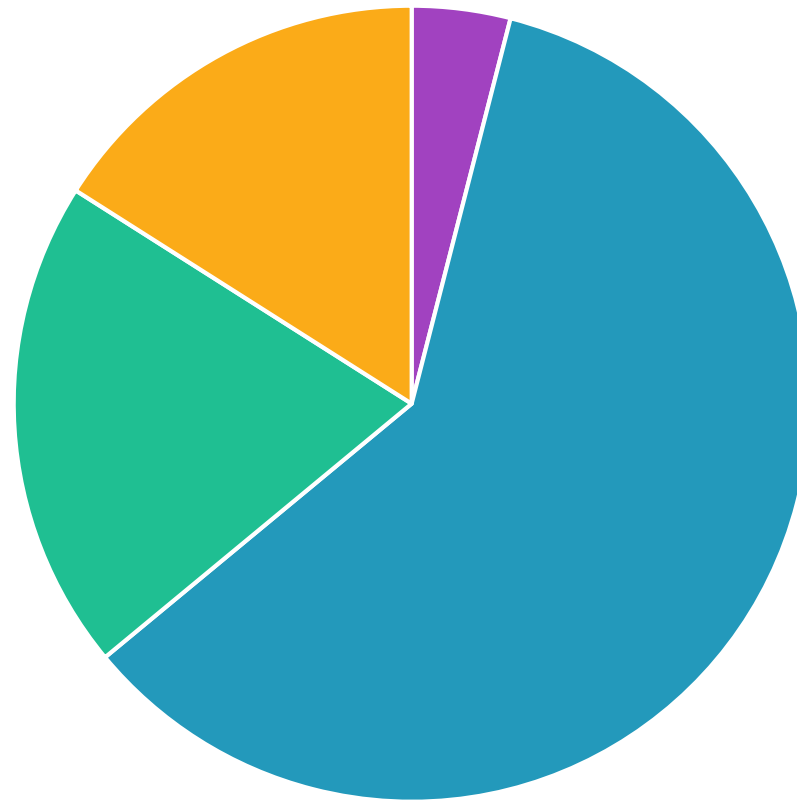
RESPONDENTS - SECTOR REPRESENTATION



- Ind Power Producer (4%)
- Cooperative (4%)
- Federal Agency (16%)
- Other (44%)
- Public Interest Organization (8%)
- Municipal (4%)
- Invester Owned Utility (20%)

- Other:
 - Competitive Marketer
 - Trade Association
 - Public Utility District
 - Public Power
 - Large Energy Customers

PREFERRED GOVERNANCE OPTION



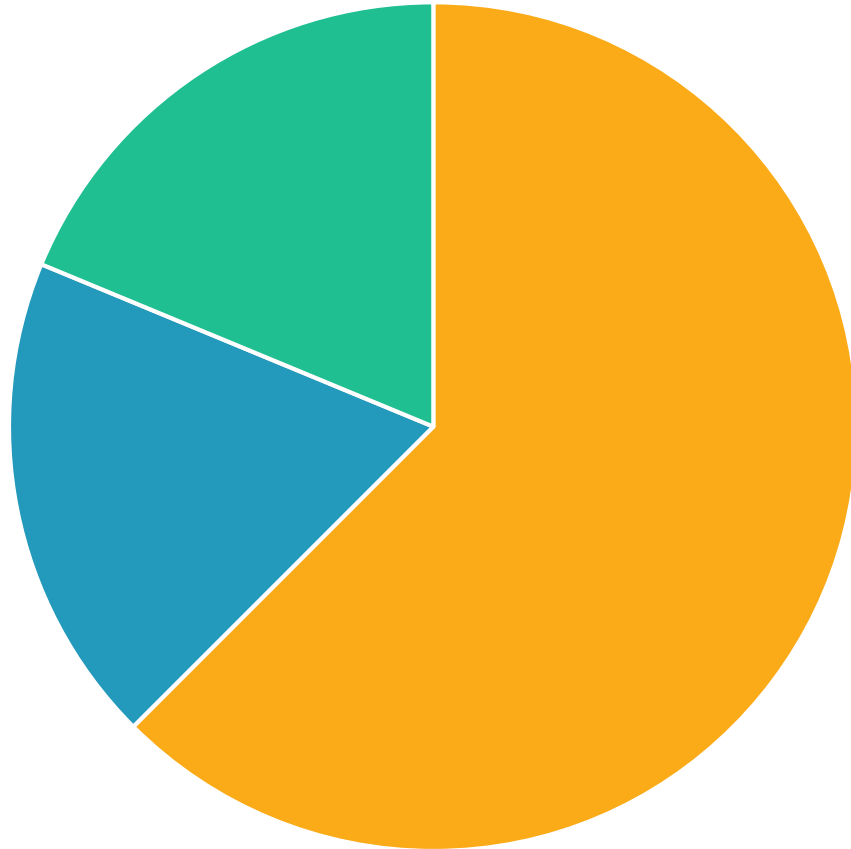
■ Option 2A only (4%)

■ Option 2A with 3 (60%)

■ Option 2B with 3 (20%)

■ Need more information (16%)

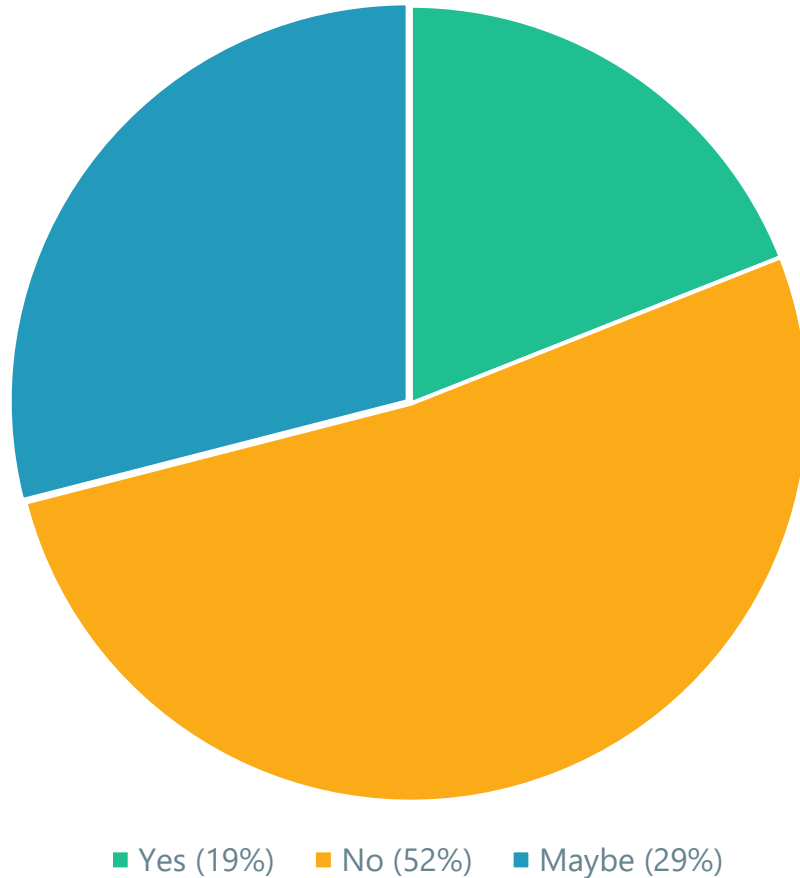
TERMS



■ Three years (50%) ■ Four years (15%) ■ Other (15%)

- Other:
 - Staggering to start
 - One to five years
 - Limit to two terms
 - Minimum of four years

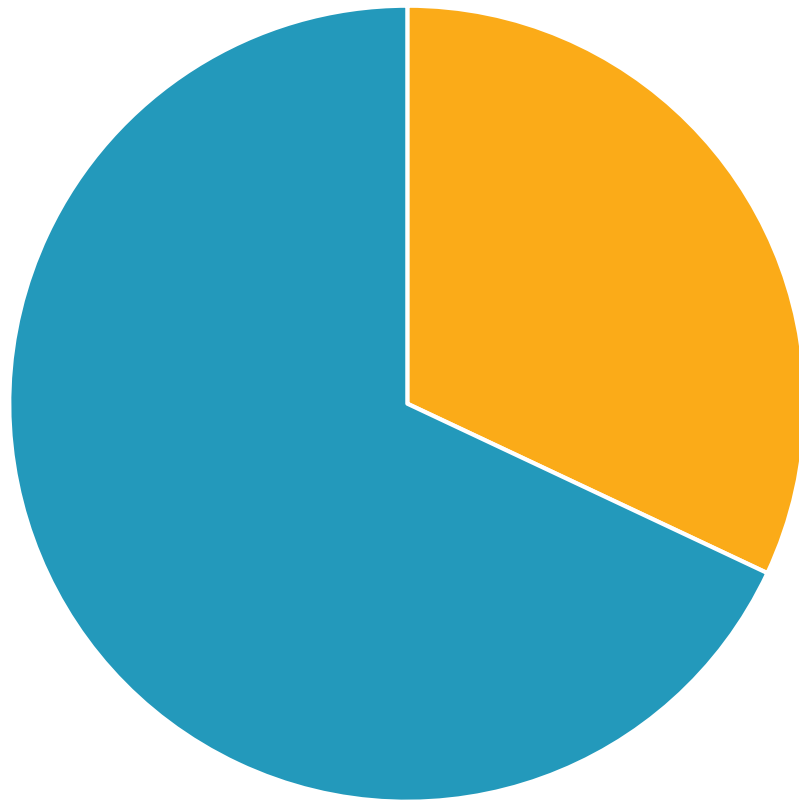
TRANSITIONAL?



- Maybe:
 - Shouldn't be created with an already established phase out
 - Could be dissolved in future, depending on evolution
 - Support for re-evaluating the need

MARKETS+ NOMINATING COMMITTEE

Transparency of meetings



■ Publicly (32%) ■ Privately (68%)

• Sectors to be Represented:

- Independent Power Producer
- State Regulator
- Public Interest Organization
- Cooperative
- Municipal
- Federal Agency
- Investor Owned Utility
- Competitive Marketers
- Trade Groups

GDT FUTURE MEETINGS/SCHEDULE

- April 27: SPP Webinar: Development Update
 - Design Team Updates
 - Market Monitor Options
- May 13: WIEB Webinar: SPP Receives State Regulators Feedback
- May 23: SPP Webinar: Governance Design Team
 - Present Governance Concept Proposal
- June 1-2: In-Person Meeting – Denver
 - Workshop Issues

QUESTIONS/DISCUSSION

TRANSMISSION AVAILABILITY DESIGN TEAM UPDATE

STEVE JOHNSON, SPP

TRANSMISSION AVAILABILITY TEAM

STAKEHOLDER LEADS		
Joe Taylor	Manager, Transmission Access	Xcel Energy
Chris Hofmann	Director Transmission & Generation Operations	Salt River Project
Mike Linn	Director, Market Analytics	Public Power Council

SPP Support Team	
Steve Johnson	Principal Operations Specialist
Hamilton Bitely	Senior Operations Analyst
Shari Brown	Manager, Tariff Administration

TRANSMISSION AVAILABILITY DESIGN TEAM

- Market will leverage flow-based model in day-ahead and real-time
 - Will respect OATT rights and priority
- Collecting transmission revenue data to inform rate recovery need and rate design options to be considered
- Two potential revenue recovery mechanisms
 - Load-based
 - Market-based

TRANSMISSION AVAILABILITY DESIGN TEAM

- First data request sent on April 20th
 - Transmission revenue details
 - Day-Ahead timeline questions
- Initial draft of transmission design white paper posted for review/comment
 - Living document
 - Use to populate service offering

TRANSMISSION AVAILABILITY DESIGN TEAM

- Joint efforts with Market Products and Price Formation Design Team
 - Congestion rents
 - Seams coordination and management
 - Base scheduling

QUESTIONS/DISCUSSION

MARKET PRODUCTS/PRICE FORMATION DESIGN TEAMS UPDATE

JIM GONZALEZ, SPP

MARKET PRODUCTS AND PRICE FORMATION DESIGN TEAM

STAKEHOLDER LEADS		
Jeff Spires	Director, Power	Powerex
Carrie Simpson	Director, Western Markets	Xcel Energy
Brian Cole	General Manager, Resource Management	Arizona Public Service
Russ Mantifel	Director of Market Initiatives	Bonneville Power Administration

SPP Support Team	
Jim Gonzalez	Manager, Real Time Markets
Micha Bailey	Supervisor, Congesting Hedging

DESIGN TEAM MEETING 04/26/2022

- Recap of Phoenix Meeting
- DAMKT Timeline Survey Request
- Discussion Items:
 - High-level Market Objectives and Timeline
 - Ensuring Physical Capacity
 - Flexibility Market Product
 - Unit Commitment

UPCOMING

- Virtual Meeting 05/17/2022
 - 10:00 -12:00 CDT
- Tentative Items:
 - DAMKT Timeline Survey Results
 - Price Formation
 - TBD

QUESTIONS/DISCUSSION

GHG DESIGN TEAMS UPDATE

KARA FORNSTROM, SPP

GHG DESIGN ELEMENT

- Leverage existing work by numerous parties in the West
- Invitations to Present Concepts
 - April 20: 12:00-2:00 (Mountain)
 - May 17: 12:00-2:00 (Mountain)
- Written Comment Opportunity
- June 1-2 In Person Discussion

MARKET MONITORING

BARBARA STROOPE, PH.D.

MANAGER DAY-AHEAD MARKET

FERC REQUIRES OVERSIGHT BY MARKET MONITOR

- Market monitors
 - Identify ineffective market rules and tariff provisions
 - Identify potential anti-competitive behavior by market participants
 - Provide the comprehensive market analysis critical for informed policy decision-making

FERC ALLOWS DIFFERENT APPROACHES

- FERC Order 719 allows ISO/RTO markets to be overseen by
 - Internal monitor
 - SPP
 - CAISO
 - External monitor
 - MISO
 - PJM
 - NYISO
 - Hybrid of both
 - NEISO

ROLE OF MARKET MONITORS

- Ensure workable competition
 - Monitor for horizontal and vertical market power
 - Monitor for market manipulation
- Ensure market transparency
 - Produce reports (e.g., Annual State of the Market)
- Advise on market performance issues
 - Engage in stakeholder process
 - Comment on market design flaws

REVIEWS OF MARKET DESIGN

- Review market rules
 - Existing rules
 - Proposed rules
- Recommend proposed rule and Tariff changes
 - Stakeholders
 - SPP
 - FERC
 - State commissions
 - Other as appropriate

REVIEWS OF MARKET PERFORMANCE

- Annual State of the Market reports
- Quarterly State of the Market reports
- White papers
- Comments in the stakeholder process

MONITOR FOR MARKET MANIPULATION AND ABUSE

- Market manipulation and abuse
 - Monitor
 - Ongoing data analysis
 - Complaints
 - Investigate
 - Refer to FERC
- Market mitigation

EXTERNAL MONITORING APPROACH

- Administrative complexity: easy to moderate
- Options
 - Limited availability experts without conflicting interests
- Processes
 - Data transfer and security
- Cost: moderate to higher

INTERNAL MONITORING APPROACH

- Administrative complexity: easy
 - Staffed by RTO employees
- Processes
 - Relies on RTO infrastructure
- Cost: moderate

HYBRID MONITORING APPROACH

- **Variety of structures**
 - Internal staff
 - External consultants
 - Advisor or surveillance committee
 - All report to board
- **Divide work of monitoring**
 - Example: internal group monitors, external group comments
- **Processes**
 - Data transfer and security
- **Cost: moderate**

SPP'S CURRENT MARKET MONITORING APPROACH

- Independent from SPP RTO
 - Reports to SPP Board, not SPP management
- Reviews market data
 - Reports suspected issues to FERC for investigation
- Engages in SPP's stakeholder process
- Works directly with RTO staff

MARKET MONITORING BUDGETS

- Source: RTO Insider, 06/16/2016

Region	Performed by	2016 Budget
CAISO	Internal: CAISO staff	N/A (Refused to Disclose)
ERCOT	Independent: Potomac Economics	\$3.65 million (14.6 million over four years)
ISO-NE	Hybrid: Potomac Economics / ISO-NE staff	\$900,000 / \$4.7 million
MISO	Independent: Potomac Economics	\$6.46 million
NYISO	Independent: Potomac Economics	\$3.1 million
PJM	Independent: Monitoring Analytics	\$12.5 million
SPP	Internal: SPP staff	\$2.5 million

QUESTIONS/DISCUSSION

NEXT STEPS SCHEDULE

2022 MARKETS+ GOAL AND SCHEDULE

- Draft Service Offering – End of September
 - Written Comment Period
- Final Service Offering – Mid-November
 - Will Not Include: Market Protocols and Tariff Language
- Commitment to Investigate – Q1 2023
 - Financially Binding to Scope Implementation
- Stakeholder Process to Develop Market Protocols and Tariff Language
- Participant Agreement Execution – Fund Implementation

FUTURE MEETINGS

- May 11: Transmission Availability Design Team
- May 17: Market Products & Price Formation Design Team
- May 17: GHG Design Team
- May 23: Governance Design Team

- June 1-2: In-Person Denver

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