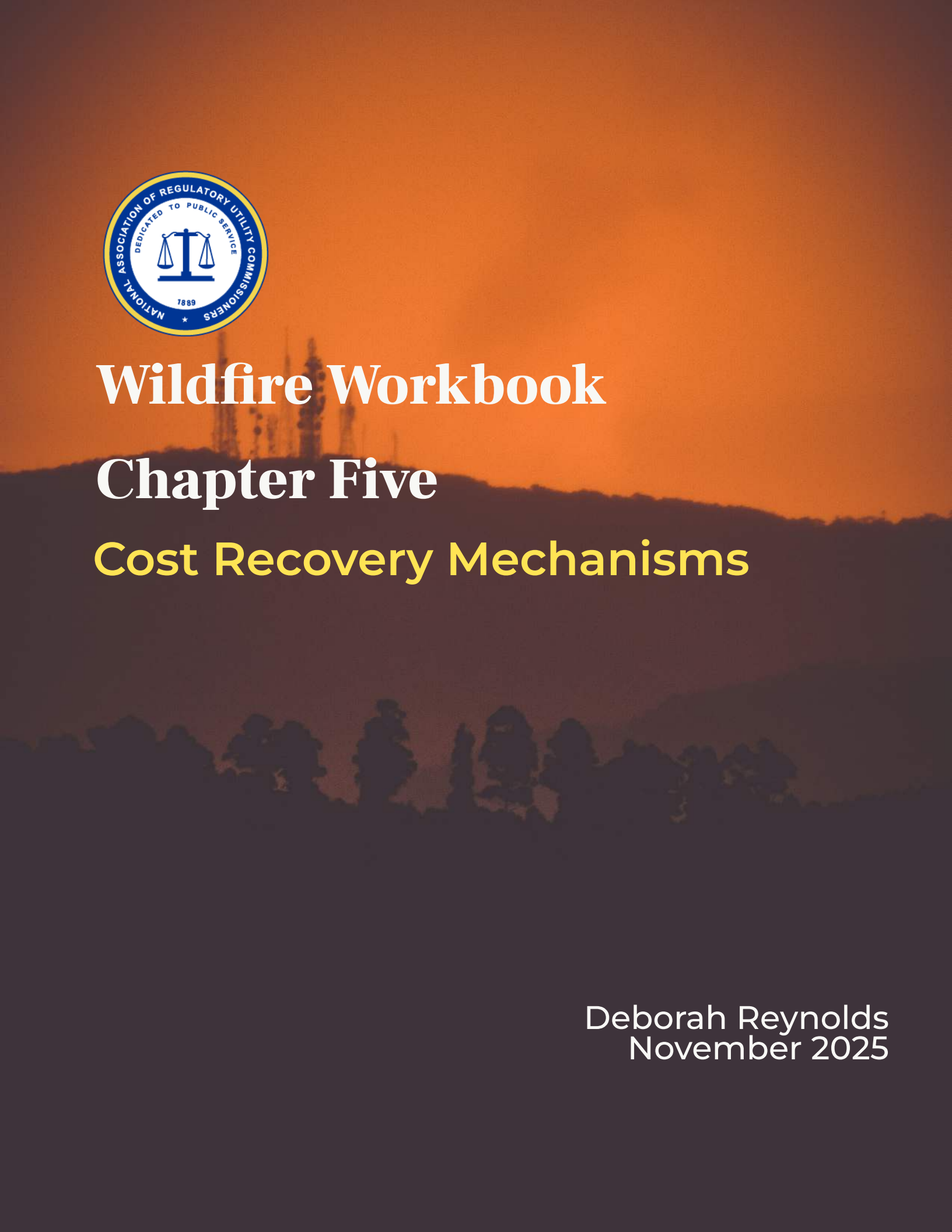

Wildfire Workbook

Chapter Five

Cost Recovery Mechanisms

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November 2025

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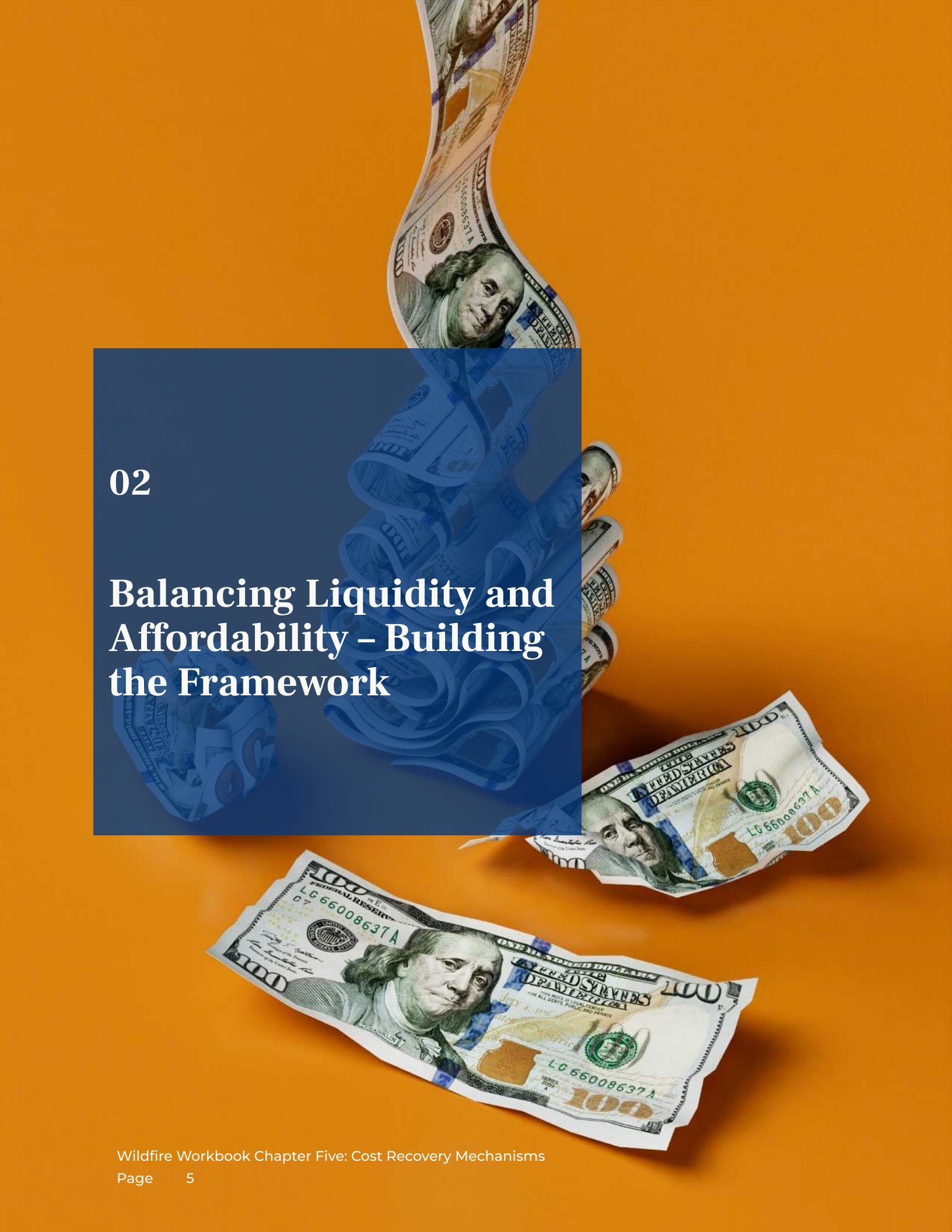
Chapter Introduction

Utility commissioners oversee a complex regulatory framework designed to protect consumers while ensuring that electric utilities recover the reasonable costs of providing safe, adequate, affordable, reliable service and advance public policy goals. Commissions regulate in the public interest and set rates that are fair, just, reasonable, and sufficient. In doing so, they use an overarching cost recovery framework that has evolved over more than 100 years to support the opposing goals of utility liquidity and customer affordability. Wildfire-related costs as described in this workbook may occur throughout this framework.

This chapter explains the framework and how the various methods of cost recovery work together with investment planning – General Rate Cases (GRCs), ancillary cost recovery mechanisms like riders and trackers, and the roles of securitization and Performance-Based Regulation (PBR).

State law controls whether or not a commission can approve certain types of cost recovery. This chapter provides examples of how some states have used investment plans to address both wildfire-related costs and other types of costs, and a brief discussion about negligence in the context of cost recovery.

Finally, this chapter includes deep dives into cost recovery mechanisms generally and into the FERC Uniform System of Accounts (USofA) for regulatory accounting, identifying accounts that may be showing increased costs from wildfire-related activities.



02

Balancing Liquidity and Affordability – Building the Framework

Cost recovery is a puzzle with interlocking pieces:

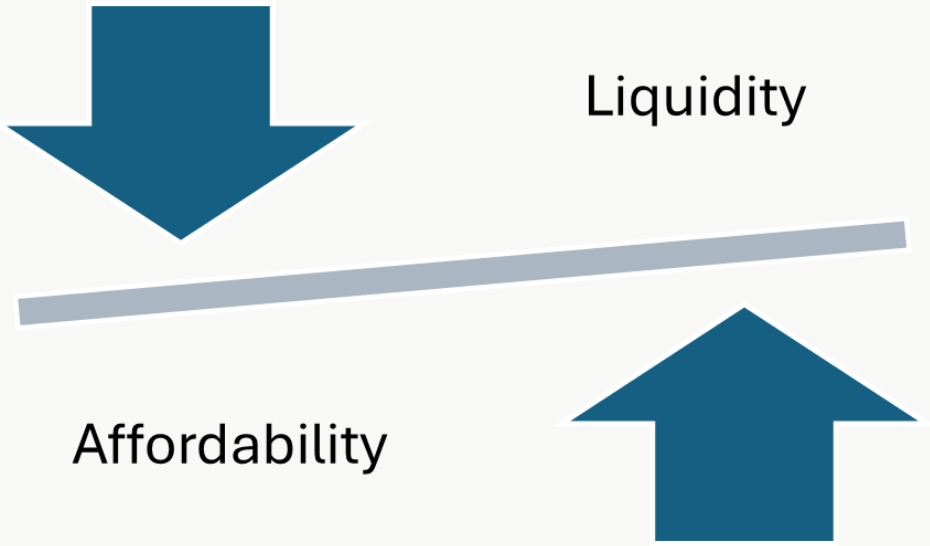
- **GRCs** set the baseline rates for broad cost recovery.
- **PBR** adds incentives to drive performance, often within GRCs.
- **Riders and Trackers** offer flexibility for specific or urgent costs.
- **Securitization** can finance large, one-time expenditures.
- **Investment Plans** justify and guide major spending, ensuring accountability.

As mentioned above, state law controls which of these mechanisms can be approved in a particular jurisdiction. Some states have not enabled these mechanisms via constitution or legislation, and there may be no need to do so at this time. However, as utilities begin to incur wildfire-related costs, it is important to consider whether a state has a mechanism for the cost recovery of large and unexpected costs.

If we accept the premise that the base rates from a general rate case in a particular jurisdiction represent recovery of costs at a reasonable speed, then typically we can also expect that recovery via securitization will be slower than recovery through general rates, and that recovery through a tracker will be faster.

Although the interactions between the mechanisms are very complex, commissions typically find that elements that slow down cost recovery tend to support affordability and encourage the utility to carefully manage its resources, whereas elements that speed up cost recovery tend to support liquidity, particularly when costs that change in a particular year are allowed to be recovered in the same year. Faster recovery can reduce the amount of time available for review and may thus increase the risk of imprudent acquisition. State legislatures and commissions will need to carefully consider these interactions as they make their choices.

Figure 1: Liquidity and Affordability



Viewed within this regulatory framework, as commissions make choices about how different types of wildfire-related costs are recovered, the chosen mechanism will have different impacts on both liquidity and affordability.

Choosing the Appropriate Cost Recovery Mechanism

Most of the time and for most costs, the appropriate cost recovery mechanism will be the general rate case as it has evolved in each state. In many states, one of two interim tools are used in the GRC to compensate the utility for the delay from the beginning of construction until an investment is complete. The first option is to include Construction Work in Progress (CWIP) in rate base which brings projects not yet complete into rates. The second option is to include an Allowance for Funds Used During Construction (AFUDC) into the total cost of the completed project. This increase to the final cost compensates the utility for the time value of money.

While these tools help with capital costs, when new issues like increasing wildfire-related expenses rise up, other mechanisms may be needed to help the utility increase the speed of its response to these new risks. Each category of wildfire costs discussed in this workbook can be evaluated for an appropriate cost recovery mechanism.

Although there is no single best way to recover costs, if a utility needs to increase its spending in multiple areas to respond to wildfire risks, an investment plan, either with or without an attached ancillary cost recovery mechanism, may be the most helpful resource to support the Commission decision. An investment plan should explain the proposed treatment of capital investments versus expenses and differentiate the approach to cost recovery accordingly. Expenses that occur annually or predictably over several years are typically best suited to recovery through the GRC. Ancillary cost mechanisms may be needed when the increasing expenses are not captured in the most recent general rate case.

Further, capital costs will be as part of rate base, so there should be some mechanism for tracking those costs until the investment is complete (deferral is common) and then adding them to rate base in the next GRC if they were prudently incurred. If there is a request for pre-approval of specific investments in the investment plan, then the commission will typically wish to review the cost-effectiveness of the proposal on the front end and review the prudence of the investment once completed on the back end.

Review of an investment plan happens in two steps:

1. Expected cost-effectiveness at the front end. Has the utility evaluated a variety of options to reach its goals and chosen the one that is most cost-effective based on a comparison of expected benefits and costs? (See National Standard Practice Manual for guidance and tools on cost-effectiveness evaluation).
2. Prudency review on the back end. Did the utility do what it said it would do in a prudent manner (actions of a reasonable person based on what was known or should have been known at the time of the decision) and did it do so as efficiently as possible?

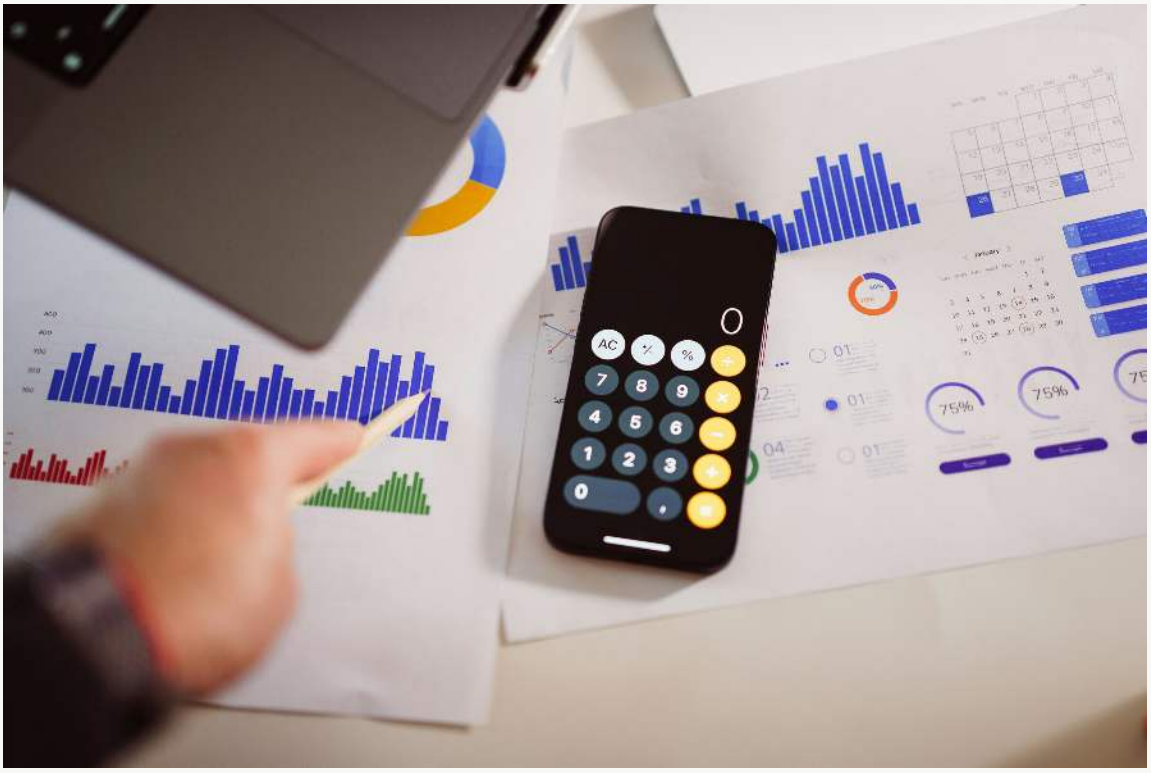


Table 1: Sorting Wildfire-related Capital Costs and Expenses

Cost Category	FERC Accounts	Wildfire Workbook Links
Wildfire Planning and Evaluation	Administrative and General (A&G) Expenses; O&M	Chapter One: Risk Assessment and Mitigation Planning and Chapter Seven: Evaluation and Continuous Improvement
Wildfire Risk Mitigation and Restoration Investments	Construction Expenditures (Capital Costs)	Chapter Two: Mitigation Measures – Grid Hardening, Operational Practices, and Vegetation Management
Wildfire Risk Mitigation and Response Expenses	Operation and Maintenance (O&M) Expenses	Chapter Two: Mitigation Measures – Grid Hardening, Operational Practices, and Vegetation Management, Chapter Three: Communications and Community Engagement, and Chapter Four: Wildfire Response and Coordination
Wildfire Rebuilding	Construction Expenditures (Capital Costs)	Chapter Two: Mitigation Measures – Grid Hardening, Operational Practices, and Vegetation Management

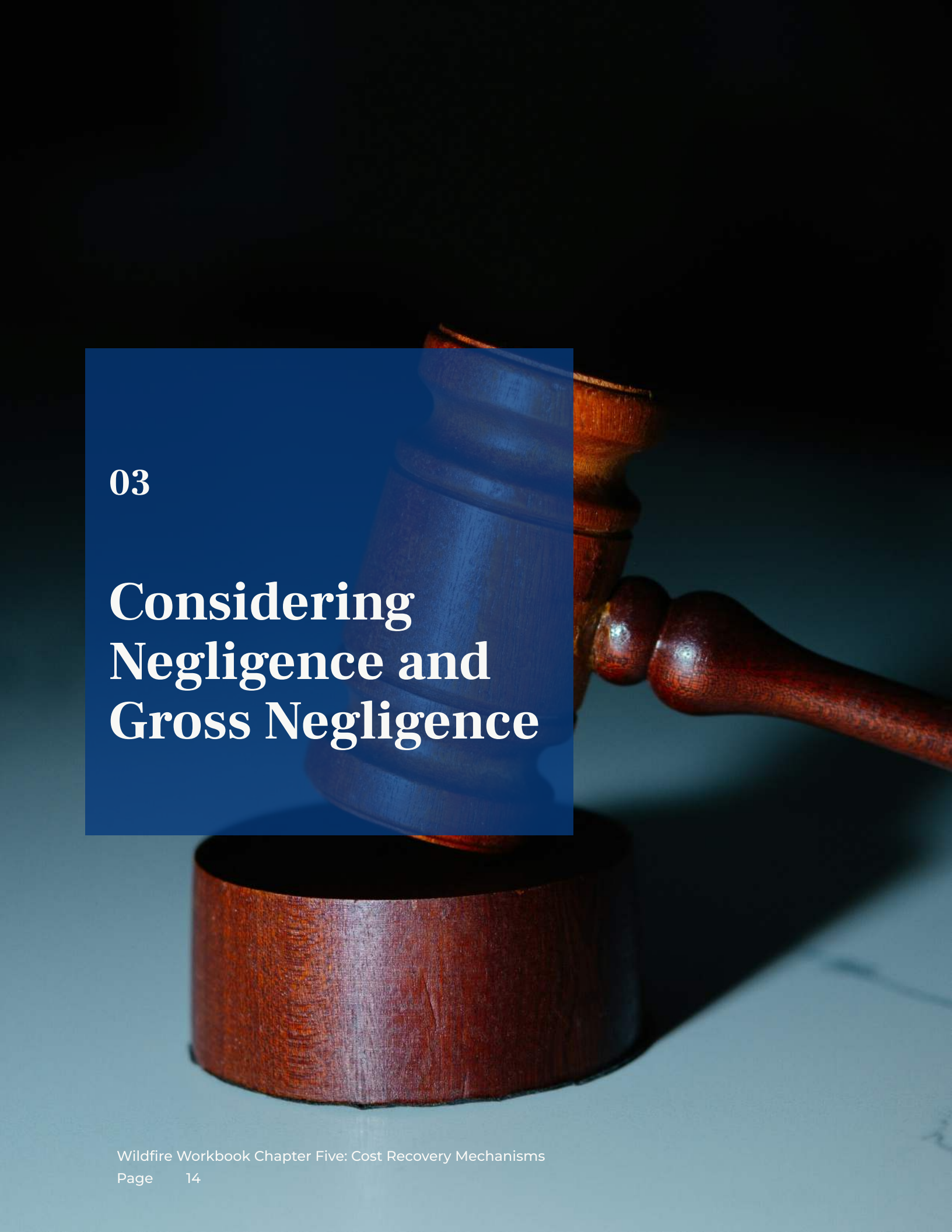
As commissions consider which mechanisms to use for which wildfire costs, there are policy decisions to make about how to track and what costs to pass through. Different states may have addressed some of these policies in legislation. The following questions can help commissions consider their options.

1. Is the cost a recurring expense, an expense that has not been previously reflected in base rates, or a capital investment? Has a baseline for the cost been established?
2. Will the mechanism include forecasted or budgeted costs in customer rates? If so, how will they be trued-up?
3. Will the true-up account for variations in both costs and revenue?
4. Will the true-up incorporate weather differences, or will the utility retain the risk of weather (weather-normalized or not?)?
5. Will the utility be required to accrue interest on excess collections? If so, what rate?
6. If using a deferral account, will the utility be allowed to accrue carrying costs (a return) on deferred costs or under-collections? If so, at what rate?
7. How will the cost recovery mechanism contain costs and keep rates affordable?
8. When should the commission consider eliminating the cost recovery mechanism?
9. When and how should the commission embed costs back into base rates?

Prudency Review for Investment Plans

Some states rely on investment plans to help them monitor and approve costs related to future investments. This model is used for grid hardening in states like Florida with frequent storm damage and in California for wildfire risk mitigation. Commissions using this model review prudence after an investment is complete, and they also review the cost-effectiveness of the proposal during the planning phase. The four key components are:

1. An investment plan for a specific period that includes annual budgets, specific investment details, and cost-effectiveness analyses of the proposed investments. The plan typically includes metrics for success and describes the cost recovery mechanisms and processes for reporting progress.
2. A cost recovery mechanism that is tied to the investment plan, often a tracker. Costs are typically based on expenses from the previous year, sometimes adjusted for actual revenues, and may include the projected budget from the plan. Cost recovery may be conditioned on successful implementation of the investment plan.
3. Progress reports tied to both the investment plan and the cost recovery mechanism.
4. Prudence review that is ongoing and looks both forward and back. This method of review is more intensive than the strict after-the-fact prudence review in a general rate case; however, it can deliver better results that are in line with the policy goals of the state.



03

Considering Negligence and Gross Negligence

As discussed in the chapter on financial risk mitigation, some states have passed legislation that limits utility liability in various ways. (See Chapter Six discussion on Utah legislation limiting utility liability.) That chapter also provides some examples of how commissions have responded to cost recovery of significant liabilities.

Historically, if utilities are found to have acted negligently, recovery from ratepayers of any damages paid to victims may only occur upon the express permission of the regulatory authority – and commissions are reluctant to include such costs in rates. Most state commissions follow FERC guidance for accounting. As an example, the special instructions for utilities to place amounts in FERC Account 228.2, "Accumulated provision for injuries and damages," specifically require commission approval before doing so.

Although not an example of cost recovery from ratepayers, in 2024, the Washington Utilities and Transportation Commission responded to a related issue in a tariff filed by PacifiCorp requesting the addition of a liability limitation. The Commission found that an existing provision of state law which had been in place since 1911 prevented it from limiting the utility's liability (**Washington Utilities & Transportation Commission Order 04, Docket UE-230877**). The Washington Commission acted consistently with other commissions in the Northwest (Idaho Public Utilities Commission **Order No. 36175**; Public Utility Commission of Oregon **Order No. 24-155**; Wyoming Public Service Commission Docket No. 20000-652-ET-23, **Record No. 17434**).

Each commission will need to review its own statutes to determine the appropriate disposition of costs related to liability.

Examples of state laws about utility liability

Washington Revised Code of Washington - RCW 80.04.440

In case any public service company shall do, cause to be done or permit to be done any act, matter or thing prohibited, forbidden or declared to be unlawful, or shall omit to do any act, matter or thing required to be done, either by any law of this state, by this title or by any order or rule of the commission, such public service company shall be liable to the persons or corporations affected thereby for all loss, damage or injury caused thereby or resulting therefrom, and in case of recovery if the court shall find that such act or omission was wilful, it may, in its discretion, fix a reasonable counsel or attorney's fee, which shall be taxed and collected as part of the costs in the case. An action to recover for such loss, damage or injury may be brought in any court of competent jurisdiction by any person or corporation.

Oregon Revised Statutes: ORS 756.185 **- Right to recover for wrongs and omissions; treble damages**

(1) Any public utility which does, or causes or permits to be done, any matter, act or thing prohibited by ORS chapter 756, 757 or 758 or omits to do any act, matter or thing required to be done by such statutes, is liable to the person injured thereby in the amount of damages sustained in consequence of such violation.

If the party seeking damages alleges and proves that the wrong or omission was the result of gross negligence or willful misconduct, the public utility is liable to the person injured thereby in treble the amount of damages sustained in consequence of the violation. Except as provided in subsection (2) of this section, the court may award reasonable attorney fees to the prevailing party in an action under this section.

(2) The court may not award attorney fees to a prevailing defendant under the provisions of subsection (1) of this section if the action under this section is maintained as a class action pursuant to ORCP 32.

(3) Any recovery under this section does not affect recovery by the state of the penalty, forfeiture or fine prescribed for such violation.

(4) This section does not apply with respect to the liability of any public utility for personal injury or property damage.

Florida Statutes Chapter 366.98 - Public utility liability arising out of emergencies and disasters

(1) A public utility is not liable for damages based in whole or in part on changes in the reliability, continuity, or quality of utility services which arise in any way out of an emergency or disaster, including, but not limited to, a state of emergency declared under s. 252.36. Consistent with the commission's jurisdiction over public utility rates and service, issues relating to the sufficiency of a public utility's disaster preparedness and response shall be resolved by the commission.

(2) This section does not create a new cause of action. In the event that there is a conflict between this section and any other section of the Florida Statutes, this section shall control.

Ohio Revised Code Section 4905.61 - Treble Damages

If any public utility or railroad does, or causes to be done, any act or thing prohibited by Chapters 4901., 4903., 4905., 4907., 4909., 4921., 4923., and 4927. of the Revised Code, or declared to be unlawful, or omits to do any act or thing required by the provisions of those chapters, or by order of the public utilities commission, the public utility or railroad is liable to the person, firm, or corporation injured thereby in treble the amount of damages sustained in consequence of the violation, failure, or omission. Any recovery under this section does not affect a recovery by the state for any penalty provided for in the chapters. This section does not apply to a telephone company.

Utah Wildland Fire Planning and Cost Recovery Act, House Bill 66, 2020

Utah Code Section 65A-3-4 - Liability for causing wildland fires.

(2) (a) Except as provided in Subsection (3), a person who negligently, recklessly, or intentionally causes or spreads a wildland fire shall be liable for the cost of suppressing that wildland fire, regardless of whether the fire begins on: (i) private land; (ii) land owned by the state; (iii) federal land; or (iv) tribal land. (b) The conduct described in Subsection (2)(a) includes any negligent, reckless, or intentional conduct, and is not limited to conduct described in Section 65A-3-2.

(3) In an action under this section to recover for property damage resulting from a wildland fire or to recover the cost of fire suppression resulting from a wildland fire, a qualified utility or electric cooperative may not be considered to have negligently caused a wildland fire if: (a) (i) the electrical transmission wildland fire protection plan of the qualified utility or electric cooperative identifies and addresses the cause of the wildland fire for fire mitigation purposes; and (ii) at the origin of the wildland fire, the qualified utility or electric cooperative has completed the fire mitigation work identified in the electrical transmission wildland fire protection plan, including: (A) inspection, maintenance, and repair activities; (B) modifications or upgrades to facilities or construction of new facilities; (C) vegetation management work; and (D) preventative programs; or

(b) (i) the qualified utility or electric cooperative is denied or delayed access to a right-of-way on land owned by the state, a federal agency, or a tribal government after the qualified utility or electric cooperative requests access to the right-of-way to perform vegetation management or fire mitigation work in accordance with an electrical transmission wildland fire protection plan; and (ii) the electrical transmission wildland fire protection plan identifies and addresses the cause of the wildland fire for fire mitigation purposes.

(4) A person who incurs costs to suppress a wildland fire may bring an action under this section to recover those costs.

(5) (a) A property owner who suffers damages resulting from a wildland fire may bring an action under this section to recover those damages. (b) An award for damages to real property resulting from a wildland fire, including the loss of vegetation, shall be the lesser of: (i) the cost to restore the real property to its pre-wildland fire condition; or (ii) the difference between: (A) the fair market value of the real property before the wildland fire; and (B) the fair market value of the real property after the wildland fire.

(6) A person who suffers damage from a wildland fire may pursue all other legal remedies in addition to seeking damages under Subsection [(3)] (4) or (5).

04

Deep Dive: Cost Recovery

When state utility commissions evaluate and determine cost recovery, they balance utility needs with consumer protection and policy goals. GRCs provide stability, PBR drives performance, trackers add agility, and securitization can manage extraordinary costs. Investment plans ensure major investments are justified and monitored. Together, these tools empower state commissions to regulate effectively, ensuring safe, reliable, and affordable electric service in the face of increasing wildfire-related costs.

General Rate Cases: The Foundation of Cost Recovery

What is a General Rate Case?

A General Rate Case (GRC) is the cornerstone of utility cost recovery. It is a formal proceeding where an electric utility submits a detailed proposal to the commission to set or adjust customer rates. The goal is to establish the utility's revenue requirement—the total funds needed to cover operating costs, capital investments, and a fair return on investment.

Different states use different methods for establishing the baseline for the costs evaluated through a GRC, using historical costs, forecasted costs, or a combination of the two (MOST Policy Initiative, Legislative Science Note: Future Test Year, 2025).

A utility with a separate mechanism for tracking wildfire costs may still have wildfire costs that are integrated into the utility's cost recovery through the next general rate case.

- **Key Components:**
  - **Operating Expenses**: Everyday costs like labor, maintenance, fuel, and purchased power. Usually known and measurable. Wildfire costs may include vegetation management, wildfire mitigation planning, insurance, and line patrols. (Note that most states use automatic adjustment clauses or riders for fuel and purchased power costs.)
  - **Capital Investments**: Expenditures on infrastructure, such as power plants or distribution lines. Usually used and useful. This is the utility rate base. Wildfire capital costs may include grid hardening, undergrounding, software, hardware, and communications equipment.
  - **Test year**: Baseline costs from a specific period. The period may be historical, future, or a combination. Wisconsin Public Service Commission requires historical data as a benchmark for evaluating the Future Test Year forecasts (MOST Policy Initiative, Legislative Science Note: Future Test Year, 2025).
  - **Rate of Return**: An opportunity to earn a return or profit based on the utility's weighted average cost of capital (debt and equity) and its level of investment (rate base).
  - **Rates**: How costs are allocated across customer classes (e.g., residential, commercial, industrial) and the development of the resulting rates.
  - **Timing**: Some states use a periodic multi-year schedule for GRCs, and some do not. If not, the rates stay in effect until the commission approves changes to rates in response to another GRC filing.

- **The Process:**
    - The utility files a GRC application with financial data for a test period and cost forecasts for future periods. The details vary by state, but all states review actual recorded costs and revenues at some point in the process and then allow adjustments to those elements during the rate case.
    - The commission reviews the GRC, often with input from commission staff that take an advocacy role, as well as stakeholders like consumer advocates, industrial customers, and low-income customer advocates. Such input is usually in the form of testimony based on audits of the material submitted by the utility. Commissions look for whether the utility's proposal follows the commission's previous guidance on adjustments to expenses and consider requests for additional adjustments.
    - After hearings and briefings, the Commission approves, adjusts, or rejects the utility's proposed rates.
    - Between rate cases, utilities that incur extraordinary costs may request approval to defer or set aside those costs for consideration in the next GRC.

Vegetation Management Cost Increase Example

The vegetation management costs recorded in the previous year will not allow the utility to increase its level of vegetation management in the future year. The commission may approve an increase based on a prior commission order, on an investment plan, or on the increasing year-over-year trend in the utility's prior costs.

Role in Cost Recovery

GRCs ensure utilities recover prudently incurred costs while balancing their financial stability with consumer affordability. However, if GRCs occur infrequently, they may not be agile enough for volatile or unexpected costs. Thus, other mechanisms are required for some costs.

Additional Resources:

- General Rate Case Overview | CPUC
- Major Rate Case Process Overview | Department of Public Service New York

Ancillary Cost Recovery Mechanisms: Flexibility Beyond GRCs

While the GRC is where cost recovery begins, other cost recovery mechanisms are essential tools that allow utilities to recover specific expenses outside the GRC. These mechanisms—known variously as riders, trackers, and adjustment clauses—provide flexibility to address volatile, large, or policy-driven costs without the need for a full rate case. Importantly, the use of these mechanisms can vary significantly depending on how commissions set base rates and if they use multi-year or forward-looking rate setting as opposed to historical based rates.

Below is a breakdown of the most common terms for ancillary cost recovery mechanisms. These terms are often used interchangeably, and definitions of the terms differ by state. *Electricity Regulation in the US: A Guide* by Jim Lazar, Regulatory Assistance Project, provides a helpful discussion about these mechanisms starting on page 100.

A Variety of Terms for Ancillary Cost Recovery Mechanisms

- **Riders**: Surcharges added to customer bills for specific types of costs (e.g., energy efficiency, infrastructure). May include budgeted or forecasted costs.
- **Trackers or Deferrals**: Mechanisms that may result in adjusted rates based on actual costs, often backward-looking. Adjustments may occur in the next GRC or in a separate individual tariff filing.
- **Adjustment Clauses**: Periodic rate adjustments for volatile expenses like fuel or purchased power. (e.g., Purchased Gas Adjustment; Fuel Adjustment Clause)

Elements of Ancillary Cost Recovery Mechanisms

These different kinds of mechanisms are the result of requests from utilities to establish accounting practices that differ from generally accepted accounting principles (expenses must be known and measurable to be recorded in most FERC accounts; investments must be used and useful). Such mechanisms must be approved by order of a commission. Existing mechanisms are typically discussed and explained in commission orders going back many years, sometimes issued in the context of a general rate case, and sometimes not. Some of the earliest mechanisms were the fuel adjustment clauses that followed the 1974 and 1979 oil embargos, when fuel costs rose suddenly.

Proposals for these mechanisms identify the specific costs that will be included, the FERC accounts that will be used to track or defer such costs, and explain the methods used to establish the rates on customer bills.

- **Balancing Accounts**: Track differences between forecasted and actual costs and revenues, with annual or more frequent rate adjustments to reconcile the differences. May be called a true-up.
- **Deferral Accounts**: Tracks incurred costs that are expected to be approved for recovery – may be O&M or capital cost accounts. Costs are subject to prudence review prior to recovery. May or may not include separate cost recovery mechanism.
- **Investment Plans:** If the costs to be recovered will eventually be added to rate base, an investment plan may be part of the development of the cost recovery mechanism.

How They Interact with a GRC

- **Complementing Base Rates**: GRCs set base rates for broad cost recovery, while mechanisms like riders and trackers handle specific costs alongside the GRC cycle. If the mechanism addresses capital costs, incorporation of the capital costs into rate base may occur during a future GRC.
- **Frequent Adjustments**: Unlike GRCs, which may occur every few years, these mechanisms allow for more frequent rate updates (e.g., monthly for fuel riders). These mechanisms often adopt specific elements from the most recent GRC regarding decisions like allocation of costs between customer classes.
- **Oversight**: The commission approves these mechanisms, often with conditions like true-ups and reporting. It is important for the commission to consider the entire picture, both costs recovered through the GRC and costs recovered through ancillary mechanisms.
- **Risks**: Placing too many costs in separate ancillary recovery mechanisms can reduce the incentive inherent in a GRC for utilities to manage their operations efficiently and can make it more difficult for regulators and consumer advocates to see the total impact of individual smaller rate increases on ratepayers.

Securitization: Financing Large, One-Time Costs

What is Securitization?

Securitization is a financing tool sometimes used by utilities to recover large, one-time costs, such as those associated with wildfire liability, storm recovery, coal plant retirements, or environmental compliance. Unlike riders or trackers, which adjust rates for ongoing costs, securitization involves issuing bonds to cover extraordinary expenses upfront. These bonds are repaid over time through a dedicated charge on customer bills, often called a "securitization charge."

How It Works

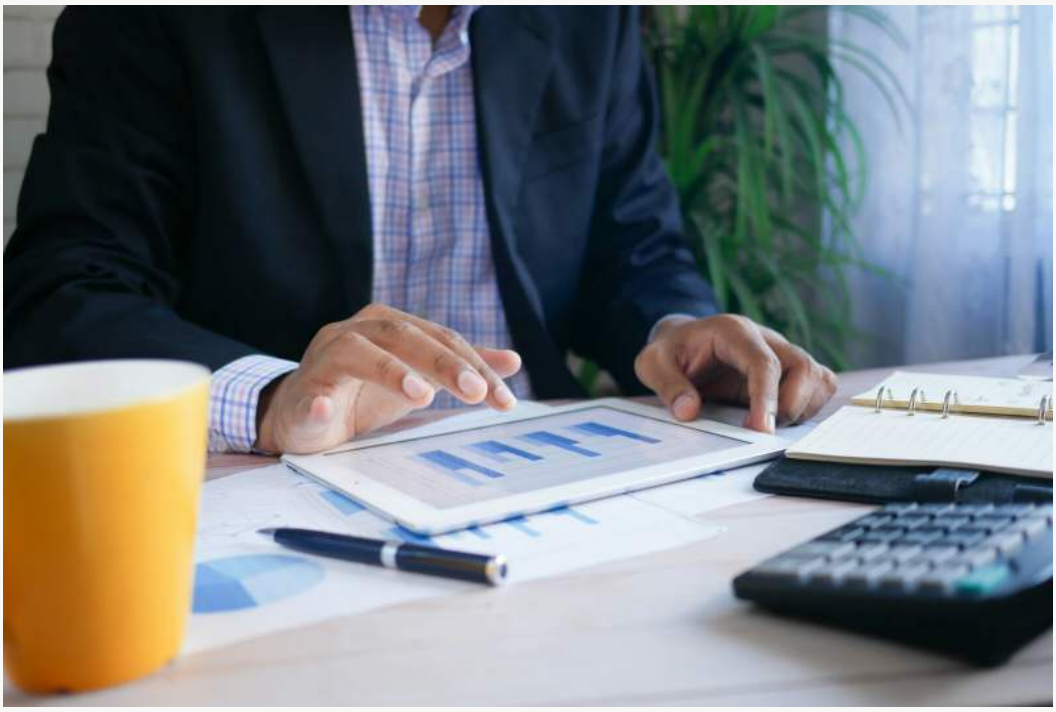
1. **Legislation:** Securitization requires legislative authorization for use as it results in a special purpose entity and binds utility customers to repayment upon issuance. The legislation provides the terms under which securitization can be used.
2. **Proposal**: The utility submits a securitization plan to the commission, outlining the costs to be securitized, bond issuance details, and repayment terms.
3. **Approval**: Once approved, the utility issues bonds, using the proceeds to cover the specified costs.
4. **Repayment**: Customers pay a separate charge on their bills to repay the bondholders, typically over 10 to 30 years.

Potential Benefits of Securitization

- **Lower Financing Costs**: Bonds backed by a dedicated revenue stream sometimes have lower interest rates than traditional utility debt.
- **Rate Stability**: Securitization spreads large costs over longer periods of time, avoiding immediate rate spikes.

Interaction with Other Mechanisms

- **Distinct from Riders/Trackers**: Securitization is best used for large, one-time expenditures, not ongoing operational costs. It's a financing tool, not a rate adjustment mechanism.
- **Example**: Some states have securitized fuel cost spikes.
- **Example**: PG&E securitized $7.5 billion in wildfire liability costs from the 2020 fires.
- **Example**: After Hurricane Harvey, Texas utilities securitized billions in storm recovery costs, preventing sharp rate increases.



Potential Concerns about Securitization

- **Long-Term Debt**: Customers may pay for past costs for decades, and debt will affect the utility's balance sheet.
- **Bill Impacts**: The securitization charge remains until bonds are repaid.
- **Upfront Costs**: The process of establishing securitized bonds is expensive, and these upfront costs could eliminate all the savings.
- **Inflexible**: Once the process is established, the commission and customers are bound by the securitization.

Additional Resources:

- *Mitigating Stranded Asset Risks to Utility Customers: An Exploration of Securitization and Retiring Coal Generation* | NARUC

Investment Plans: The Backbone of Major Cost Recovery

What Are Investment Plans?

Investment plans are detailed proposals utilities submit to the Commission, outlining specific projects—like grid modernization or undergrounding lines—with costs, timelines, and benefits. They are essential for cost recovery mechanisms involving big investments like undergrounding lines for wildfire prevention.

- **What's Included**:
    - **Projects**: E.g., smart meters (advanced metering infrastructure) or undergrounding lines.
    - **Costs**: Capital and operating expense forecasts.
    - **Timeline**: Project milestones.
    - **Benefits**: Cost-benefit analysis including state goals like reliability or decarbonization.

Where Are They Needed?

- **Capital-Intensive Riders**: E.g., Texas's Transmission Cost Recovery Factor requires an investment plan to justify grid upgrades.
- **Policy-Driven Projects**: E.g., California's Wildfire Mitigation Plans detail costs for safety upgrades.

Why They Matter

- **Oversight**: The commission reviews plans to ensure proposed costs are cost-effective and reviews implementation to ensure the investments are prudent.
- **Transparency**: Utilities show how funds will be spent, building trust.
- **Alignment**: Plans link spending to public benefits like safety.

How They Work in Cost Recovery

- **Approval**: Utilities submit investment plans tied to requests for cost recovery. The Commission assesses the merit of the plan and may approve, accept, or simply acknowledge the investment plan.
- **Monitoring**: Progress is tracked via reports and true-ups, ensuring compliance.

Additional Resources:

- "Wildfire Mitigation Plans Database" | Pacific Northwest National Laboratory
- "Wildfire Mitigation Plans" | CA Office of Energy Infrastructure Safety

Cost Recovery Mechanisms with Investment Plans Across U.S. States

Many utility commissions have cost recovery mechanisms (e.g., trackers, riders, surcharges) that include investment plans. These mechanisms allow utilities to recover specific costs, typically for capital-intensive or policy-driven initiatives, outside of general rate cases.

- **Investment Plans:** Each mechanism includes a detailed investment plan submitted to the state PUC, outlining projects, cost estimates, timelines, and public benefits (e.g., reliability). These plans are reviewed for cost-effectiveness and approved with conditions like spending caps or performance metrics.
- **Cost Types:** Costs typically cover capital expenditures (e.g., infrastructure, renewable projects) and sometimes related operating expenses (e.g., maintenance, program administration).
- **Oversight:** All mechanisms involve annual reports, cost recovery filings, and true-ups to reconcile actual vs. forecasted costs and revenues, often with weather normalization for fuel-related trackers.

Table 2: Investment Plan Examples Across U.S. States

State / Utility	Mechanism Name	Types of Costs	Details
California Pacific Gas and Electric (PG&E)	Wildfire Mitigation Plan Cost Recovery	Wildfire mitigation infrastructure (e.g., vegetation management, grid hardening)	Investment plan: $1.6 billion over 2019–2022 for wildfire prevention, including pole replacements and undergrounding lines. Recovered via a surcharge, with annual true-ups. Approved by California PUC to enhance grid safety.
Texas Oncor Electric Delivery	Transmission Cost Recovery Factor (TCRF)	Transmission infrastructure (e.g., new lines, substations)	Investment plan: $2.8 billion for 2023–2027 to expand and upgrade transmission systems. Recovered through semi-annual rate adjustments, subject to PUC of Texas oversight. Focuses on reliability and renewable integration.
New York Consolidated Edison (ConEd)	System Benefits Charge (SBC)	Energy efficiency, renewable energy, clean energy programs	Investment plan: $1.2 billion over 2020–2025 for energy efficiency and distributed energy resources. Recovered via a bill surcharge, with annual reports and performance metrics tied to clean energy goals. Part of NY's Reforming the Energy Vision (REV).

State / Utility	Mechanism Name	Types of Costs	Details
Florida Florida Power & Light (FPL)	Storm Protection Plan Cost Recovery Clause	Storm hardening (e.g., pole upgrades, undergrounding)	Investment plan: $1.1 billion for 2020–2024 to enhance grid resilience against hurricanes. Recovered through a surcharge, with annual filings and true-ups. Approved by Florida PSC to reduce outage durations.
Illinois Commonwealth Edison (ComEd)	Energy Infrastructure Modernization Act (EIMA) Rider	Smart grid, distribution upgrades	Investment plan: $2.6 billion over 2012–2022 for smart meters and grid modernization. Recovered via a formula rate rider, with annual true-ups and performance metrics (e.g., reliability improvements). Extended for ongoing investments.
Pennsylvania PECO Energy	Distribution System Improvement Charge (DSIC)	Distribution infrastructure (e.g., cables, substations)	Investment plan: $400 million over 2021–2025 for aging infrastructure replacement. Recovered via a quarterly surcharge, capped at 5% of distribution charges. Requires PUC approval of investment plans and quarterly filings.
Michigan DTE Electric	Renewable Energy Plan Surcharge	Renewable energy projects (e.g., wind, solar)	Investment plan: $1.7 billion for 2020–2025 to add 2,000 MW of renewable capacity. Recovered through a surcharge, with annual true-ups and performance metrics tied to Michigan's renewable portfolio standard.

State / Utility	Mechanism Name	Types of Costs	Details
Georgia Georgia Power	Integrated Resource Plan (IRP) Cost Recovery	Renewable energy, grid upgrades, environmental compliance	Investment plan: $2.1 billion for 2022–2025 for solar projects and coal plant retrofits. Recovered via a rate rider, with triennial IRP updates and true-ups. Supports Georgia's clean energy transition.
Massachusetts National Grid	Grid Modernization Plan (GMP)	Smart grid, advanced metering, cybersecurity	Investment plan: $500 million over 2018–2023 for grid modernization and customer technologies. Recovered through a tracker mechanism, with annual filings and performance-based metrics for reliability and customer engagement.
Oregon Pacific Power	Wildfire Mitigation Plan Automatic Adjustment Clause	Wildfire related costs	Investment plan: $975 million over 2024-2028 for wildfire mitigation. Recovered via a tracker mechanism, with annual filings and third party evaluation.
Colorado Xcel Energy (Public Service Company of Colorado)	Renewable Energy Standard Adjustment (RESA)	Renewable energy (e.g., wind, solar, battery storage)	Investment plan: $1.6 billion for 2021–2027 to meet Colorado's renewable energy goals. Recovered via a surcharge, with annual true-ups and oversight by the Colorado PUC to ensure compliance with clean energy targets.

Performance-Based Regulation (PBR): Incentivizing Excellence

What is PBR?

Performance-Based Regulation (PBR) shifts the focus from simply recovering costs to rewarding utilities for achieving specific outcomes—like improved reliability, efficiency, or reduced emissions. PBR may also use penalties for failure to achieve specific outcomes. It's a layer of regulation that complements GRCs. It is included here as a possible tool to focus the success of the utility's investment in wildfire risk mitigation.

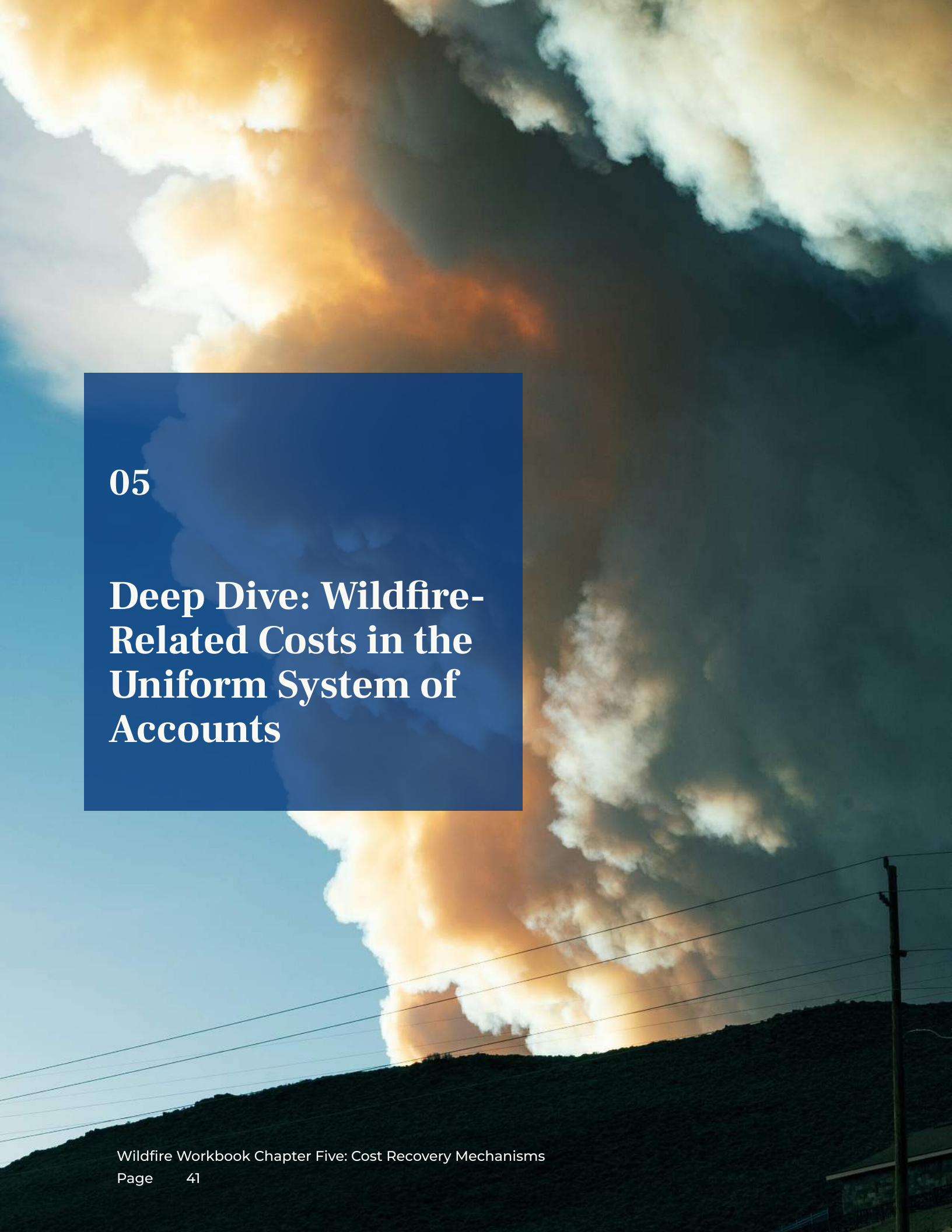
- **PBR Options**:
    - **Incentives**: Extra revenue for meeting targets (e.g., fewer outages) or penalties for falling short.
    - **Decoupling**: Breaks the link between revenue and sales, encouraging energy efficiency. If the decoupling mechanism is not tied to performance-based targets, it is not PBR.
    - **Multi-Year Rate Plans**: Locks in rates over a period of years with performance-based adjustments. If the multi-year rate plan doesn't have performance-based adjustments, it is not considered PBR.
    - **Earnings Sharing**: Splits cost savings between utilities and customers.

How It Ties to GRCs

PBR often integrates with GRCs. During a GRC, the commission might set performance metrics—like a reliability target—and tie them to financial rewards or penalties. While GRCs cover base costs, PBR ensures utilities prioritize policy goals.

Additional Resources:

- "Performance-Based Regulation" | NARUC
- *Performance-Based Regulation: Aligning incentives with clean energy outcomes* | RAP
- "Performance-Based Regulation" | Hawaii PUC



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Deep Dive: Wildfire-Related Costs in the Uniform System of Accounts

Utilities incur substantial costs for wildfire prevention (e.g., vegetation management, grid hardening), response (e.g., emergency repairs, de-energization), restoration (e.g., rebuilding damaged assets), and liability (e.g., settlements for fire damages). These costs are tracked and reported under the Federal Energy Regulatory Commission's (FERC) Uniform System of Accounts (USofA), as prescribed in 18 CFR Part 101, to facilitate transparency, prudence reviews, and potential cost recovery. Among other changes, FERC Order No. 898, effective January 1, 2025, added new electric accounts for computer hardware, software, and communications equipment under existing functions. These new accounts are included in each of the tables in this section. Also note that this order did not apply to gas accounts, so dual-fuel utilities may continue using Account 303 for common assets that serve both the gas and electric parts of the utility.

The USofA provides a standardized framework for classifying costs, distinguishing between capital expenditures (which are depreciated over time and may earn a return) and expense items (which are recorded in the year incurred). Improper classification can lead to ratepayer overcharges, regulatory disputes, or insufficient investment in wildfire risk mitigation. What follows are wildfire-related costs by USofA category, drawing on account descriptions and examples of applicability. These are not exhaustive but focus on the most relevant FERC accounts with wildfire-related costs.

Construction Expenditures (Capital Costs)

Electric Plant in Service Balance Sheet Accounts 101 and 106 summarize the costs from the Electric Plant Accounts 301–399 and represent investments in tangible and intangible assets with a useful life exceeding one year. These costs are capitalized and included in rate base, allowing utilities to earn a rate of return and recover depreciation.

The following table provides a brief overview of specific balance sheet accounts that may contain wildfire related costs. Note that electric software investments were previously found in balance sheet Account 303 and will now show in the electric plant accounts 101 and 106. Utilities are required to disclose the amounts transferred between the accounts, which will be shown in the Transfers column in the 2025 FERC Form 1, pages 204-207.

Table 3: Wildfire-related Costs in Electric Balance Sheet Accounts

Account Number	Description	Examples of Wildfire Costs in Specific Accounts
101 - Electric Plant in Service (Major Only) 106 – Completed construction not classified (Major Only)	Original cost of electric plant owned and used in utility operations	Costs of electric plant summarized here based on Plant Accounts 301-399 (see following table).
105 - Electric Plant Held for Future Use	Cost of plant held for future utility service under a definite plan	*Requires explicit commission approval.* Land or other completed projects for future mitigation. Must have a clear plan to avoid disallowance; useful for long-term wildfire adaptation in vulnerable areas.
107 - Construction Work in Progress—Electric	Balances of ongoing construction projects for electric plant not yet in service	Costs during active wildfire mitigation projects, like pole replacements or undergrounding in fire-prone zones. Interim financing (e.g., Allowance for Funds Used During Construction) accrues here.
154 - Plant Materials and Operating Supplies	Cost of materials purchased primarily for use in the utility business	Equipment stockpiled for construction, operation, and maintenance purposes for post-wildfire rebuilding or future mitigation (e.g., spare fire-resistant poles).

Wildfire-related capital costs shown in the following table may involve activities like undergrounding existing lines, replacing wooden poles with steel or infrastructure upgrades to reduce ignition risks or enhance resilience. Prudence reviews are needed to assess whether these investments are cost-effective and necessary, especially in high-fire-threat districts.

Software investments that support wildfire resilience, such as advanced risk modeling tools, real-time monitoring systems, or predictive analytics software for vegetation management and fire risk assessment, are typically capitalized if they meet criteria for electric plant (e.g., significant cost, useful life over one year). These can include cloud-based platforms for system planning and dispatching in fire-prone areas, which enhance resilience by enabling proactive de-energization or fault detection.

As described above, FERC Order No. 898 directs such costs related to electric utilities to be recorded by function or in general plant accounts, as appropriate. The software accounts will include costs for off-the-shelf and in-house developed software for a wide variety of purposes including modeling, tracking and monitoring, evaluation and assessment systems, operating, planning and transaction scheduling, and reliability applications.

Table 4: Wildfire-related Costs in Electric Plant Accounts

Plant Account Number	Description	Examples of Wildfire Costs in Specific Accounts
350–359 Transmission Plant	Land, structures, poles, conductors, conduits, and related equipment for transmission	350 for easements and rights-of-way for vegetation clearance and fire breaks. 351.1-3 computer hardware, software, and communications equipment. 354/355 for fire-resistant poles/towers. 356 for spark-resistant conductors. 357/358 for underground conduits, conductors, and devices.
360–374 Distribution Plant	Land, structures, poles, conductors, conduits, and related equipment for distribution	360 for easements and rights-of-way for vegetation clearance and fire breaks. 363.1-3 computer hardware, software, and communications equipment. 364 for fire-resistant poles/towers. 365 for spark-resistant conductors. 366/367 for underground conduits, conductors and devices.
387 Energy Storage Plant	Land, structures, and equipment for energy storage facilities	387.1-387.7 battery microgrids to support islanding and Public Safety Power Shutoff activities. 387.8-387.10 computer hardware, software, and communications equipment.
389-399 General Plant	Land, structures, and equipment for utility purposes that is not tied to a specific function	397.1-3 computer hardware, software, and communications equipment.

Operation and Maintenance (O&M) Expenses

O&M accounts (Accounts 500–598 for power production/transmission/distribution; 901–935 for customer/administrative) cover recurring costs expensed in the period incurred, without ROI. Operations expenses relate to the day-to-day activities required to run the system (system monitoring and patrolling), whereas maintenance expenses are for work done to preserve the integrity and functionality of the physical plant (e.g., repairing equipment, vegetation trimming). Both of these costs are critical for ongoing wildfire prevention and may increase post-wildfire.

Ongoing costs for software supporting wildfire resilience, such as annual licenses, subscriptions, or maintenance for monitoring tools, may be expensed here if not capitalized. For example, software updates for real-time risk assessment systems could fall under maintenance accounts.

Table 5: Wildfire-related Operation and Maintenance Expenses

Account Number	Description	Examples of Wildfire Costs in Specific Accounts
560–574 Transmission Expenses	Supervision, load dispatching, station operations, line maintenance, and miscellaneous expenses	563 – Patrols or de-energization during high-risk weather. 569.1-3 – maintenance costs for hardware, software and communications tools used in dispatching or monitoring for wildfire risks. 571 – Vegetation management to prevent ignition and staffing in times of emergency.
577-578 Energy Storage Expenses	Supervision, operation, maintenance, miscellaneous expenses	Costs for energy storage intended specifically for wildfire response or public safety power shutoff mitigation. 577 - supervision, operations, fuel, rent. 578 – maintenance of energy storage equipment, hardware, software, communications, and structures.
580–598 Distribution Expenses	Supervision, load dispatching, station operations, line maintenance, and miscellaneous expenses	583 – patrols or de-energization during high-risk weather. 592.2-4 – maintenance costs for hardware, software and communications tools used in dispatching or monitoring for wildfire risks. 593 – Tree trimming, insulator cleaning, or repairs to prevent arcing in dry conditions and staffing in times of emergency. 591-598 – Post-fire repairs to structures, transformers, substations, etc.

Depreciation and Amortization Expenses

These accounts (Accounts 108–111, 403–407) allocate capital costs over an asset's life. Wildfires may accelerate depreciation through premature retirements (e.g., fire-destroyed equipment). Depreciation rates typically reflect actual risks; extraordinary losses may be amortized separately to smooth rate impacts.

Software costs were previously amortized and recorded in Account 404, but under FERC Order No. 898 they are now depreciated and recorded in Account 108, spreading the investment over the software's useful life while accounting for any accelerated write-offs due to evolving wildfire technologies.

For rare, large-scale events, utilities may use accounts for extraordinary items (e.g., Account 182.1 - Extraordinary Property Losses) if authorized by the regulator. These allow deferral of massive wildfire costs (e.g., multi-billion-dollar rebuilds) for amortization, preventing immediate rate hikes.

Table 6: Wildfire-related Depreciation and Amortization Expenses

Account Number	Description	Examples of Wildfire Costs in Specific Accounts
108 - Accumulated Provision for Depreciation of Electric Utility Plant (Major Only)	Reserves for depreciation, including costs of removal and salvage for retired plant	Reserves for depreciation on fire-hardened assets.
182.1 - Extraordinary property losses	Extraordinary losses not reasonably anticipated and not covered by insurance	*Requires explicit commission approval.* Recovery of cost of studies and analyses, the cost of construction canceled, and utility plant prematurely retired due to unforeseen damages. May include assets retired due to wildfire damage (e.g., burned poles); net of all accumulated depreciation for the retired asset and any insurance or any other provisions. This account is used before the Commission grants any recovery.
182.2 - Unrecovered plant and regulatory study costs	Recovery of assets from 182.1 after Commission approval	Depreciation on fire-hardened assets. Accelerated depreciation for high-risk areas may be in this account if present.
407 - Amortization of Property Losses, Unrecovered Plant and Regulatory Study Costs	Amortization of unrecovered costs from retired plant or studies, as authorized	*Requires explicit commission approval.* Amortizing losses from wildfire-destroyed assets not fully depreciated (e.g., early retirement of lines).

Administrative and General (A&G) Expenses

A&G accounts (Accounts 920–935) include overhead costs like salaries, legal fees, and damages. These often capture wildfire liability and planning, which can be massive (e.g., settlements exceeding $10B for major fires). Some states allow trackers (e.g., California's Wildfire Expense Balancing Account) for recovery.

Minor or subscription-based software costs for administrative wildfire planning (e.g., consulting software for regulatory compliance) may also be expensed here.

Table 7: Wildfire-related Administrative and General Expenses

Account Number	Description	Examples of Wildfire Costs in Specific Accounts
920-921 - Administrative Salaries and Office Expenses	Salaries and supplies for general administration	Staff time for wildfire risk modeling, emergency planning, or compliance reporting; includes costs for office-based software tools supporting resilience planning. Only used if costs are not chargeable directly to a particular operating function.
923 - Outside Services Employed	Fees and expenses of professional consultants and others for general services	External legal fees incurred in defense of wildfire third-party claims.
924 - Property Insurance	Premiums or reserve accruals for insurance protecting against property losses, including fire	Wildfire-specific insurance premiums for owned or leased property.
925 - Injuries and Damages	Costs of insurance, injuries, damages to others, and related reserves not covered by insurance	Liability insurance premiums and reserve accruals protecting against injuries and damages claims. Expenses incurred in settlement of injuries and damages claims net of insurance recovery. Third-party claims for wildfire damages (e.g., property loss, evacuations caused by utility-sparked fires).

Account Number	Description	Examples of Wildfire Costs in Specific Accounts
928 - Regulatory Commission Expenses	Costs of insurance, injuries, damages to others, and related reserves not covered by insurance	Filings for wildfire mitigation plans or cost recovery applications.
930.2 - Miscellaneous General Expenses	Minor costs not allocable elsewhere, including protection from casualties	General wildfire preparedness (e.g. consulting on fire modeling); minor software subscriptions for resilience analytics. Includes "protection" costs like preventing fire damages.
935 - Maintenance of General Plant	General plant including software, hardware, and communications	935.1-3 - maintenance costs for hardware, software and communications tools used in planning for wildfire risks.

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