

State & Local Government Coordination: Benchmarking and Building Performance Standards

EPA's *Benchmarking and Building Performance Standards Policy Toolkit* aims to inform and support state and local government decision makers who are exploring policies to reduce energy use and greenhouse gas (GHG) emissions from existing commercial and multifamily buildings in their communities. This section of the toolkit describes the varied roles that state and local decision makers have in establishing existing building policies and describes how they can coordinate across jurisdictions to help achieve their energy and environmental goals. The toolkit includes four sections—each intended to build on the previous section—that focus on different aspects of policy development, including benchmarking and transparency ([Section 1](#)), building performance standards ([Section 2](#)), state and local government coordination ([Section 3](#)), and data access ([Section 4](#)). Each section lists additional resources on the topic.

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Overview

Dozens of local governments and several states have implemented mandatory building energy benchmarking and transparency policies that use [EPA's ENERGY STAR® Portfolio Manager® tool](#).ⁱ At its core, a benchmarking and transparency policy involves annual reporting of usage data and provides transparency about building performance in the market. Measuring and assessing energy performance through benchmarking can help inform other government priorities and is an important first step to identify energy efficiency improvements. State and local decision makers can establish relationships with building ownersⁱⁱ in their jurisdiction, learn more about their building stock, and use the data collected to



EPA's ENERGY STAR Portfolio Manager

The go-to tool for collecting energy and water use data from commercial and/or multifamily housing buildings is [EPA's ENERGY STAR Portfolio Manager](#). EPA offers robust, off-the-shelf training materials; regularly hosts webinars; and has a help desk to support users. Some fast facts on the tool include:

- The tool is completely cost-free to use.
- Users enter data into their own secure, password-protected account.
- Any building can be benchmarked in Portfolio Manager.
- At least 25% of building square footage nationwide is benchmarked in Portfolio Manager.
- Buildings can use the tool to track GHG emissions and energy, water, and waste costs.
- 1-100 ENERGY STAR scores indicate a building's energy performance compared to similar buildings nationwide, and are available for approximately 21 building types and 60% of commercial floorspace.
- Portfolio Manager can also be used to:
 - Check for possible errors using the data quality checker,
 - Set goals and track progress toward them,
 - Share or transfer properties,
 - Run custom and pre-populated reports, and
 - Apply for ENERGY STAR certification-EPA recognition for top performance relative to similar buildings nationwide-where eligible.





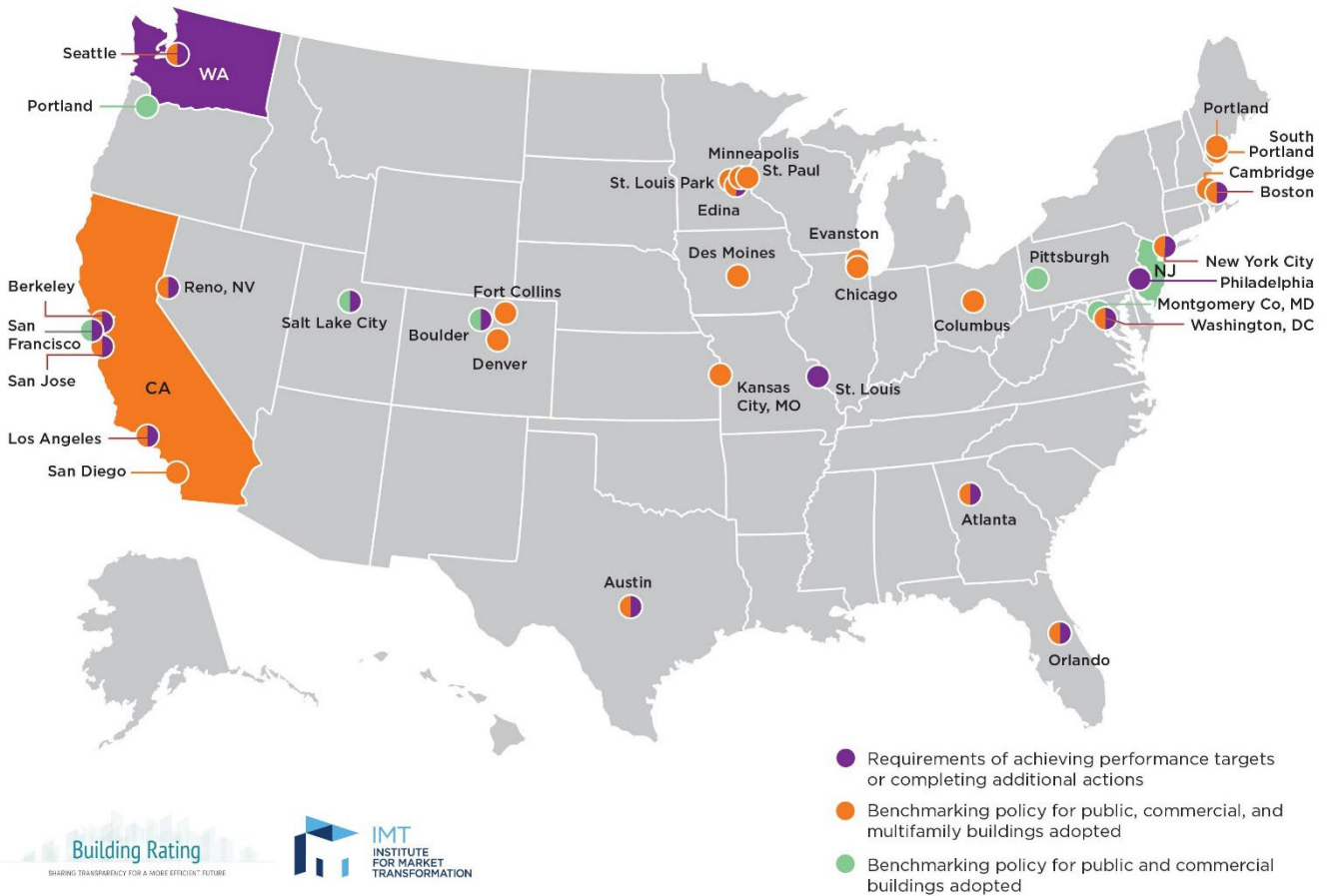
shape new voluntary and mandatory initiatives aimed at improving performance. As shown in the map below, some state and local governments have gone beyond benchmarking and transparency. Some have also enacted requirements for building owners to perform building retrocommissioning, complete an energy audit, invest in cost-effective upgrades, or meet energy- or GHG-based building performance targets.ⁱⁱⁱ

Benchmarking energy use can also serve as the basis for a building performance standard (BPS), a policy that requires building owners to meet performance targets by actively improving their buildings over time, often with interim targets that drive energy savings and emission reductions. While BPS and benchmarking are distinct policies, enabling access to energy consumption data for compliance with benchmarking mandates can help inform BPS policies. Notably, benchmarking data can provide a basis for setting the performance standards that must be

attained under a BPS. As of February 2021, Washington, D.C.; New York City; St. Louis, MO; and Washington State have adopted BPS policies to help meet their goals, and several more local and state governments are exploring them.^{iv} For additional information on benchmarking and BPS policies, see [Section 1](#) and [Section 2](#) of this toolkit.

While much of the activity around benchmarking and BPS policies has occurred at the local level, some states have begun adopting policies. With activity occurring across various jurisdictions at the city, county, and state levels, decision makers have the opportunity to coordinate on a variety of policy design and implementation elements. Coordination can lead to improved policies and reduced compliance burdens for building owners, helping state and local governments achieve their policy goals. Such coordination can also result in shared information, efficient use of resources, and increased transparency.

U.S. City, County, and State Policies for Existing Buildings: Benchmarking, Transparency, and Beyond



Source: Institute for Market Transformation (IMT), "U.S. City, County, and State Policies for Existing Buildings: Benchmarking, Transparency and Beyond," Map (Washington, DC: IMT, 2020), <https://www.imt.org/resources/map-u-s-building-benchmarking-policies/>.



Opportunities for Local and State Coordination



Opportunities for Coordination Between State and Local Governments

This section describes how state and local governments can coordinate across the policy development process, including through establishing stakeholder relationships, setting policy scope and goals, creating a covered buildings list, administering programs, and ensuring access to data.

Understanding Roles

While state and local governments may have different priorities for enacting policies for existing buildings, aligning across planning and implementation can reinforce and support policy design and compliance efforts. Coordination can occur throughout policy development, from stakeholder outreach and policy design to data access and program administration. Many more local jurisdictions than states have benchmarking or BPS policies. States that are looking to initiate such policies for existing buildings could benefit from working with local governments across the state with knowledge of the local building community. Local governments that are considering or currently have policies in place could benefit from accessing the resources or authority of the

state government, particularly when the state has interest in developing their own policy or has similar goals. Local governments who have enacted policies can share information and help to troubleshoot as issues arise for other local governments, especially where they are geographically proximate to one another or share other similarities. In addition, as more states seek to establish benchmarking requirements and BPS policies, they could benefit from connecting with states that have gone through this process already. When considering adopting a BPS, it also important for state and local governments to consider how a BPS would impact existing complementary policies for buildings.

Ultimately, coordination across jurisdictions could help to alleviate the following concerns that can cause confusion for building owners and create barriers to compliance:

- Lack of utility data access solutions;
- Difficulty developing a list of buildings that will be covered by the policy (hereafter referred to as “covered buildings list”) and notifying building owners of requirements;
- Contradictory requirements that create additional compliance burden for building owners;
- Inefficient use of limited public budgets in service of the same goal; and
- Inconsistent reporting deadlines.



The table below describes the various ways that state and local governments can benefit from coordinating throughout policy design and implementation.

How State and Local Governments Can Benefit from Coordination

Benefits to:

States, from working with locals:

- Allows for improved compliance and resulting increased energy savings and emission reductions. Local jurisdictions tend to have the largest share of commercial building stock within the state with the biggest savings potential.
- Expands access to building owners through local government relationships. This can lead to a better understanding of stakeholder needs during policy development and possibly garner local support with compliance.
- Improves covered buildings list through help from local governments' knowledge and records.
- Helps building owners benchmark their data through help from local governments' list of local service and product providers.

Locals, from working with states:

- Improves data access as states' ability to regulate utilities can be crucial for data access, particularly for multi-tenant buildings, and for ability to influence grid emissions that affect local policies.
- Frees up local governments to focus on improving stringency when the state has an existing program (e.g., targeting smaller buildings not subject to a state policy).
- Creates uniformity in data collection and processes that could benefit building owners with properties in multiple jurisdictions.
- Allows for potential access to financial or technical support to help advance an aligned policy.
- Helps to ensure existing or planned local initiatives do not get overwritten by new state mandates.

States and locals, from cross-local or cross-state coordination:

- Allows for sharing of information to help with policy design and implementation.
- Helps with troubleshooting as issues arise and with sharing best practices.
- Helps with data access issues when working with utilities whose territories span jurisdictions.
- Allows for sharing of resources and tools that can make administration more cost-effective.
- Creates consistency in requirements across governments, which can make compliance easier for building owners, especially within the same region.
- Allows for joint procurements for coordinated data management strategies and technical support, and shared reporting frameworks.



Bay Area Benchmarking Coordination

- **Who:** Regional group consisting of staff from San Francisco, Brisbane, Berkeley, and San José, along with other non-governmental organizations. Open to other cities that are thinking about developing polices focused on benchmarking and transparency and building performance.
- **When:** Began in 2019, ongoing monthly calls.
- **How:** Group meets regularly to share information and coordinate across the region.
- **Why:** The smaller group format of neighboring cities affords opportunities to build relationships and speak candidly. The group is helpful for creating alignment across compliance deadlines, data quality checking, and data access solutions, and assisting with troubleshooting and sharing best practices.



Establishing Relationships

Stakeholder engagement is a critical element of designing any benchmarking policy or BPS. Engaging stakeholders at the start of policy design and throughout policy implementation can help state and local leaders align policy objectives with community priorities, build trust, ensure transparency, gather input, and understand the needs of historically underserved groups. Providing an opportunity for the community to weigh in on key decisions can help to create an equitable process and outcomes.^v Holding stakeholder meetings to gather feedback and communicate policy objectives can ensure a thoughtful policy that is shaped by local circumstances.

Local governments typically have an easier time developing relationships with building owners given proximity, available information, and increased opportunities for interaction. States considering policies for existing buildings would benefit from working with local governments to access connections with the building community. Forming relationships with building owners

early in policy development can ensure stakeholder needs are considered and concerns are heard, which could lead to improved compliance.

Given the many benefits that can result from coordination across jurisdictions, governments can also view one another as interested stakeholders to be engaged early and often. For example, states or counties can reach out to local governments across their jurisdictions to understand local priorities that can inform policy design and streamline compliance efforts. Coordination can result in opportunities for deliberate collaboration, see *Bay Area Benchmarking Coordination* and *Hennepin County Efficient Buildings Collaborative* in Minnesota.



Hennepin County Efficient Buildings Collaborative

Overview: The Collaborative is a platform that brings together the county, cities, and building owners to share tools and resources that make benchmarking implementation more cost-effective.

Participants: As of 2020, Edina, Saint Paul, St. Louis Park, and Rochester are involved, and cities outside of Hennepin County can participate as well. Cities can get assistance with adopting a benchmarking ordinance, and with developing and implementing the program. Building owners can get help from the county on how to benchmark their building.

Services offered: Cities can pick and choose what services they opt into, including help with developing a covered buildings list, using a software tool to track reporting, analyzing data, establishing a call center, or creating standardized scorecards.

Standardization: The Collaborative helps create standardization in administering benchmarking and transparency programs and provides much-needed support for small and mid-sized cities.

More information: <https://www.hennepin.us/your-government/projects-initiatives/efficient-buildings-collaborative>

Key Stakeholder Relationships



State and local governments can also benefit from coordinating with utilities in their jurisdictions. This is especially important given the role of utilities in providing the data needed for benchmarking policies and subsequent BPS. See [Section 4](#) of this toolkit for more information on the role of utilities with data access. Utilities can also leverage performance information gained through benchmarking as part of their energy efficiency program offerings, and could help building owners implement efficiency upgrades through those offerings. Governments can engage utilities through working groups or support utility-led efforts to coordinate. For example, the Washington State Department of Commerce is a technical expert for the utility-led working group convened to share information and best practices related to the state's forthcoming BPS policies.



Setting Policy Goals

When establishing policies that target existing buildings, state and local governments may coordinate to consider the impacts of the policy on building owners with properties in overlapping jurisdictions (e.g., where both state and local policies exist). For benchmarking and transparency policies, this could include aligning compliance deadlines, creating consistency across metrics collected, or clarifying exempted building types. Aligning benchmarking policies along these lines can result in reduced compliance burden for building owners and simplify program administration across jurisdictions. As more governments develop BPS policies, aligning policy goals with performance targets becomes particularly



relevant when both state and local standards exist. When that occurs, it is important to consider how well goals align across the different jurisdictions, whether the performance targets are compatible, and how to evaluate progress toward goals and account for attribution. Coordinating across jurisdictions can help clarify objectives and share information that can ultimately result in improved policies and streamlined compliance for building owners. It can also inform the timing of policy adoption and whether it would conflict with adoption plans in another jurisdiction.

Coordination can help ensure energy savings and emission reductions are occurring where there are the biggest opportunities, as local jurisdictions tend to have the largest share of commercial building stock within the state with the biggest savings potential. For example, if a state passes a benchmarking or BPS policy, their legislation could explicitly allow local governments in the state to pass a stricter policy focused on reaching smaller buildings and/or deeper savings.

In California, local governments have enacted stricter policies beyond the statewide benchmarking policy. The state has discretion over whether local governments can get an exemption so that building owners do not have to report twice, though local programs do not have to exceed the state's requirements to be considered for an exemption. Some local governments that adopted policies after the state have found passing a local ordinance easier given that benchmarking had become more accepted. Also, given the importance of data access to benchmarking, the passage of AB 802, which requires utilities to provide building-level energy use information upon request, helped local governments avoid having to negotiate with their local utilities for access to data.^{vi}



Creating a Covered Buildings List

For benchmarking and transparency policies to be successful, state and local governments need a comprehensive list of the buildings for which compliance will be required. Often at the local level this information is available through a combination of tax assessor and other records, but at the state level it may not be readily available. State governments can consider coordinating with local governments to obtain building-level data and may incorporate a requirement into the benchmarking

policy or rulemaking to provide the necessary information. States have looked to the following data sources, often in combination, to develop a covered buildings list:

- **Tax and building department records.** Government tax or building department records can provide insights on the building portfolio in a state or local jurisdiction. Building department records can also allow for analyzing pre- and post-improvement performance and verifying whether work that was permitted was performed and effective.
- **Private databases.** Comprehensive data platforms for the commercial real estate sector, such as CoStar, can help with determining the types and sizes of buildings in a jurisdiction.
- **Geographic information system (GIS) databases.** GIS databases analyze and display geographically referenced information, using data that are attached to a unique location.
- **Unique Building Identification (UBID).** A UBID is a geospatial identifier that allows for the identification of every unique building across the United States in a consistent format, similar to the Vehicle Identification Number on a motor vehicle. Some U.S. cities use UBID for local benchmarking ordinances, as well as for other reporting to third parties.
- **Building owners who previously reported data.** A benchmarking requirement can sometimes bring additional buildings into the mix via reporting that was not captured through other datasets.



Administering Programs

When a state and one or more local governments in that state each have policies, they can consider strategies to streamline program administration and reduce compliance burdens for building owners.

Reporting and Compliance

For benchmarking and transparency policies, streamlining could include aligning reporting or compliance timeframes across jurisdictions (e.g., requiring reporting at the same time of year). It could also include coordinating on the sizes and types of buildings that need to comply as well as those that are exempted. Consistent processes can also help streamline compliance and reduce administrative



burden involved in submitting different data for different jurisdictions (e.g., if only one jurisdiction required water reporting). For example, in California, compliance with a local benchmarking ordinance that has received an exemption from the California Energy Commission fulfills compliance with the statewide mandate.^{vii} Exempted local ordinances send their publicly disclosed data to the California Energy Commission so they can be included on the state dashboard. Allowing for uniformity and reduced compliance burdens may also help building owners that have properties in multiple jurisdictions.

Flexibility for Local Governments

Local governments with experience administering benchmarking policies will need to think through how to align reporting processes with a statewide program, in addition to neighboring local programs, to ensure building owners do not incur increased burden. County-level policies offer a unique opportunity to engage local governments and offer administrative support, particularly to small or mid-sized cities. In Minnesota, Hennepin County's Efficient Buildings Collaborative offers cities a variety of tools and resources to assist with benchmarking adoption and program administration. Montgomery County, Maryland also offers staff and outreach support to other local governments within the county that pass benchmarking ordinances that align with the county's existing requirements. This helps to ensure consistency in requirements within the county.

Establishing Fines

Local governments may be restricted in their authority to levy fines for non-compliance. In such instances, it may be beneficial to coordinate with the state to allow for fines that amount to a value relative to the cost of compliance. While state and local governments may have the authority to issue fines for non-compliance, they generally rely first on education and outreach to building owners to improve compliance.

Funding and Staffing

State and local governments can also consider funding sources and internal capacity to administer a program. Existing funding sources for benchmarking and BPS policies have included grants, external organizational support, compliance fees and fines, and allocating funds

through a jurisdiction's budgeting process. Coordinating across jurisdictions may make new sources of funding available (e.g., through the state energy office or from another jurisdiction's budgeting process).



Ensuring Access to Data

Coordination between state and local governments is critical when working with utilities to ensure the availability of whole-building energy consumption data. This is particularly important if the state is looking to establish a requirement for utilities to provide data or provide clear guidance on what kinds of energy data are subject to customer data privacy protections. For example, in the context of a local benchmarking ordinance, the local government could directly influence data access in instances where they have control over a municipally owned utility. However, in all but a few cases, investor-owned utilities are regulated at the state level by a public utility commission. In these instances, a local government may institute a BPS and require compliance by local building owners. However, the local decision makers may not be in a position to require that all local utilities provide streamlined access to the energy data required for benchmarking. This is where state-level action may come into play:

- Public utility commissions can institute regulatory proceedings to establish clear aggregation thresholds governing the release of whole-building energy consumption data by utilities to building owners. Utilities may seek this level of clarity to ensure that any provision of whole-building energy data subject to aggregation thresholds remains in alignment with their duty to protect customer data.^{viii}
- State legislators can pass laws that explicitly define utilities' responsibility for the provision of whole-building data for benchmarking. This includes the aggregation threshold at or above which whole-building consumption data are no longer considered to be private or confidential customer data. This requirement can be included within a broader statewide benchmarking program or BPS,^{ix} or it can stand on its own.



Role of Utilities in Data Access

The ability of building owners to easily access their whole-building energy consumption data will be a critical factor in the success of benchmarking and transparency requirements and related building performance standards—whether at the state or local level. This is especially important in the context of large, multitenant commercial and multifamily housing properties, where the entity seeking to benchmark (i.e., the building owner or a designated representative such as a property manager) may not be the customer of record for all of the utility accounts that comprise total energy consumption. To help address this issue, many utilities across the country are providing aggregate whole-building consumption data to building owners without requiring the authorization of individual tenants—as long as the building meets or exceeds a threshold number of tenants or utility accounts. Since whole-building data is needed to assess a building’s overall performance, this approach fulfills that need while ensuring that individual tenant energy consumption data remains private. See [Section 4](#) of this toolkit for more information.

- States are exploring the potential for integrated energy databases to house multiple data streams from utilities and system operators related to energy consumption, energy demand, system capacity, renewables, and other energy data, as well as supporting frameworks for data access.^x If developed, these databases could become a single “source of truth” for building owners seeking whole-building data for benchmarking. This could eliminate the need for individual utilities to develop their own technical solutions and to navigate questions related to customer data privacy.

Even absent formal requirements, state-level entities (e.g., state energy offices) can play a significant role in any voluntary stakeholder processes convened by local governments in advance of a benchmarking or BPS policy. State energy offices can facilitate conversations on the importance of data access to the success of BPS policies and can provide important context for how a local government’s policy efforts fit within broader statewide energy and climate goals. This can help utilities better understand the importance of data access and may facilitate utility commitments to provide data access in the absence of formal mandates.

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EPA Resources

EPA offers robust training materials and support to help state and local decision makers understand how to benchmark in Portfolio Manager, implement and finance energy efficiency improvements, and quantify the multiple benefits of energy efficiency:

[ENERGY STAR Buildings Support for State and Local Governments](#)—Fact sheet providing an overview of how EPA’s ENERGY STAR® Commercial and Industrial Branch serves as a partnership among private and public sector organizations to channel marketplace ingenuity, promote energy efficiency, and prevent pollution.

[ENERGY STAR An Overview of Portfolio Manager](#)—Guide describing some of ENERGY STAR Portfolio Manager’s basic functions, such as how to navigate through the tool, enter building data, and connect and share data with others.

[Interactive Maps for Energy Benchmarking](#)—Maps summarizing national, state, and local efforts that use EPA’s ENERGY STAR Portfolio Manager to improve energy efficiency in commercial buildings, and service territories of the utilities providing customers with energy benchmarking data.



[Local Action Framework: A Guide to Help Communities Achieve Energy and Environmental Goals](#)—State and Local Climate and Energy Program’s step-by-step guide to help local and tribal governments plan, implement, and evaluate new or existing energy or environmental projects.

[Tools for State, Local, and Tribal Governments](#)—Overview of the State and Local Climate and Energy Program’s tools to help state, local, and tribal governments quantify and achieve their environmental, energy, and economic objectives.

Additional Resources

[City Energy Project—Engaging the Community in Policy Development](#)—Overview of stakeholder engagement strategies for governments looking to develop policies aimed at building energy performance.

ⁱ “Interactive Maps for Energy Benchmarking Data, Programs, and Policies,” ENERGY STAR, U.S. EPA, <https://www.energystar.gov/buildings/program-administrators/state-and-local-governments/see-federal-state-and-local-benchmarking-policies>.

ⁱⁱ From this point forward, the term “building owner” will be used to indicate “building owner and/or operator,” with the understanding that many property owners rely upon third-party management companies to operate the building on their behalf.

ⁱⁱⁱ Institute for Market Transformation (IMT), “U.S. City, County, and State Policies for Existing Buildings: Benchmarking, Transparency and Beyond,” Map (Washington, DC: IMT, 2020), <https://www.imt.org/resources/map-u-s-building-benchmarking-policies/>.

^{iv} Other jurisdictions have adopted forms of performance requirements for buildings, including San José and Brisbane, CA; Boulder, CO; and Reno, NV. For purposes of this document, we will refer to the types of BPS policies adopted in Washington, D.C.; New York City; St. Louis, MO; and Washington State.

^v National Association of State Energy Officials (NASEO), Facilitating Power, and Minnesota Department of Commerce, Energy Division, *Designing Equity-Focused Stakeholder Engagement to Inform State Energy Office Programs and Policies* (Arlington, VA: NASEO, July 2020), https://naseo.org/data/sites/1/documents/publications/13-0376_0549_000208-KOEHLER%20FINAL%20cover.pdf.

[Institute for Market Transformation and Urban Sustainability Directors Network—Rethinking Energy Data Access](#)—Report that describes how current policies on utility data access limit the availability of data and offers suggestions for how state and local governments can work together with utilities.

[National Association of State Energy Officials, Facilitating Power, and Minnesota Department of Commerce, Energy Division—Designing Equity-Focused Stakeholder Engagement to Inform State Energy Office Programs and Policies](#)—Resource for State Energy Offices seeking to advance equitable policies and programs through deeper and more inclusive stakeholder engagement.

[Pacific Northwest National Lab—Unique Building Identification \(UBID\)](#)—Overview of the unique identification system for buildings that provides a standardized framework under which a unifying field is used to match building data from various sources to a single object.

^{vi} AB-802, Energy efficiency, Chapter 590, Ca. Statutes of 2015, https://leginfo.legislature.ca.gov/faces/billNavClient.xhtml?bill_id=201520160AB802.

^{vii} “Building Energy Benchmarking Program Frequently Asked Questions,” California Energy Commission, 2020, accessed February 2021. <https://www.energy.ca.gov/programs-and-topics/programs/building-energy-benchmarking-program/building-energy-benchmarking>.

^{viii} See the following proceedings: See the following proceedings: Code of Colorado Regulations, Tracking Number 2014-00436, <https://www.sos.state.co.us/CCR/eDocketDetails.do?trackingNum=2014-00436>; Minnesota Department of Commerce, Public Utilities Commission, Docket Number 12-1344, <https://www.edockets.state.mn.us/EFiling/edockets/searchDocuments.do?method=eDocketsResult&docketYear=12&docketNumber=1344>.

^{ix} See the following examples: AB-802 Energy efficiency (Ca. 2015-2016), https://leginfo.legislature.ca.gov/faces/billNavClient.xhtml?bill_id=201520160AB802; HB 1257 Concerning energy efficiency (Wa. 2019-2020), <https://app.leg.wa.gov/bills/bills/BillNumber=1257&Chamber=House&Year=2019>.

^x See: Matter Master 20-00406/20-M-0082, Proceeding on Motion of the Commission Regarding Strategic Use of Energy Related Data (N.Y. 2020), <http://documents.dps.ny.gov/public/MatterManagement/CaseMaster.aspx?Mattercaseno=20-M-0082>.