

# BUILDING ELECTRIFICATION: 10 STEPS FOR A BALANCED APPROACH

The concept of encouraging or mandating building electrification has evolved rapidly from a niche concept among a few cities and proponents, to a mainstream sustainability goal discussed on national and global scales. The potential benefits from electrification are clear in theory, but the path to turn the concept into reality can be complicated, particularly with regard to existing buildings. The issue has quickly gained traction, even while a lot of key information has remained unknown.

BOMA International has been at the forefront of filling this void by releasing two previous documents: a BOMA Policy Brief, **“Building Electrification and Carbon Reduction,”** which provides an overview of the opportunities and challenges along with examples of early public policies; followed by a groundbreaking 35-page study, **“Electrification in Commercial Buildings,”** which examines available technologies, current and future conditions of the electric grid, regional differences, and relevant public policy and programs. Given this new information, and the continued interest in the topic, it’s time for policy recommendations that can turn sustainability goals into reality.

## THE CHALLENGE

The vision is of a built environment comprised of all-electric buildings powered only by electricity and without use of gas combustion or any other fossil fuel source on site. At a time when many jurisdictions are setting carbon emissions goals, renewable energy targets, and energy efficiency standards, decision-makers are turning to building electrification as a potentially significant solution.

Some U.S. localities have proposed and passed regulations targeting the real estate sector with mandates, often focused on bans of fossil fuel hook-ups. The trend particularly targets new construction, although a host of cities are actively considering electrification strategies that could impact existing buildings as well.

To a large degree, proponents have oversimplified the issue, pushing for a solution to decarbonization without considering the current realities of the infrastructure of both existing buildings and the electrical grid. Electrification may be a worthy goal, but it’s a high hurdle to accomplish it equitably, responsibly, and in an economically viable manner. Significant unanswered questions persist, including: the capacity of the electrical grid, the availability of clean energy sources, and the ability of existing buildings to retrofit.

To accomplish electrification—or any path that ultimately leads to the greater goal of decarbonization—will necessitate massive planning and thoughtful collaboration throughout society.

# RECOMMENDATIONS

## COMMERCIAL PROPERTIES

- **Future-Proof Your Building** - Electrification represents a long-term vision that property owners and managers must begin planning for. Regardless of any individual opinions, market drivers and the policy landscape are clearly trending in this direction. Properties can consider instituting green leases for tenants, while planning for the future costs and operational challenges of potentially difficult retrofits.
- **Demonstrate Your Commitment** - Join with the global commercial real estate sector by participating in the BOMA International Carbon Challenge. Be a leader, shift perceptions of our industry's commitment to carbon reduction, and move the needle—one building at a time. Commit to benchmark your buildings' emissions by using ENERGY STAR Portfolio Manager or by manually sharing with BOMA.
- **Engage in the Discussion** - Discussions on electrification are happening and decisions are being made—sometimes without the inclusion of directly affected stakeholders. The commercial real estate industry needs to be at the table on this issue, and BOMA local associations and state coalitions are well-positioned to serve as a forum and communicate with policymakers.

## FEDERAL GOVERNMENT

- **Provide Funding Mechanisms** - Upgrades and retrofits can entail significant expenses and capital can be difficult to raise, representing a high hurdle even if long-term savings may be possible. The government can help by passing legislation such as H.R. 1491, the Small Business Energy Loan Enhancement Act, a bipartisan bill which would expand the maximum loan available through the U.S. Small Business Administration loan program for energy efficient investments and upgrades.
- **Promote Research and Development** - If electrification is going to be achieved at a significant scale, it will entail enormous shifts in technology and infrastructure. The government can play an appropriate role by promoting energy-related research at the national labs and in the private sector.

## STATE AND LOCAL GOVERNMENTS

- **Provide Assistance** - States and localities need to align their sustainability goals with practical strategies to achieve them. Providing financial incentives, technical assistance, and workforce development programs can spur progress toward shared goals that can outpace unfunded mandates.
- **Consider Equity Issues** - The costs and risks of electrification can lead to unanticipated consequences and inequitable outcomes. Jurisdictions should consider alternative compliance pathways and funding mechanisms for disadvantaged stakeholders, keeping small businesses and tenants in mind.
- **Unite Around an Energy Plan** - Governments must use every mechanism available to work with utilities and other stakeholders to build a clean, resilient energy future. Downstream energy users are reliant on upstream energy production, and governments can ensure everyone is on the same page.

## UTILITIES

- **Provide Programs and Data** - Utilities can create demand response programs that include a mix of approaches such as rate designs, price signals and rebates for building owners. Property owners also should have access to whole building energy data to assist in operations as well as compliance.
- **Plan for the Energy Future** - Utilities will play a central role to ensure that electrification can meet emissions goals within a practical business plan. This will also provide a unique opportunity for stakeholder engagement that can strengthen relationships with governments and customers.