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#### **EXECUTIVE SUMMARY**

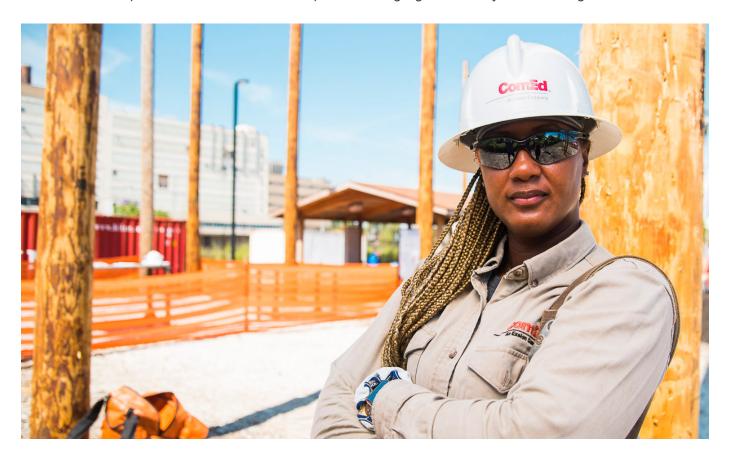
Dear City of Chicago Officials,

# ComEd is incredibly proud to serve the millions of families and businesses within this world-class city. We have served the City of Chicago for well over 100 years now.

We are proud of what we have accomplished over the last several years. For over eight years in a row, ComEd has provided best in record performance every year – we continued to beat our record year over year. In 2020, ComEd provided reliable energy to Chicago families and businesses, on average, 99.97% of the year.

Not only do we provide reliable service, even when faced with extreme weather, we do so while keeping rates affordable. ComEd's average residential rates are 17% lower than the rate in the 10 largest U.S. metropolitan areas and ComEd's average commercial rates are 18% lower than the rates in the top 20 largest metropolitan areas.

In fact, when evaluated by the City's own independent consultant, NewGen Strategies and Solutions, LLC (NewGen), NewGen recommended that the City not pursue municipalization of the electricity system because NewGen's financial analysis showed that the average annual municipal electric utility delivery rate would be greater than the average ComEd delivery rate for each year of the study period from 2020-2039 by approximately 43% – in short, customer bills would go up. Further, NewGen found, the City does not need to own the electric system in order to achieve many of its strategic goals and objectives. We agree.





# We have discussed the City's goals and we've affirmed our commitment and alignment with all of those goals. We are in alignment with the City's vision for the future of Chicago. We are willing partners in achieving that vision.

In the following pages, we'll describe recommendations and ideas that we have to help the City reach its goals all while continuing to be a reliable, civically engaged, innovation partner to the greatest City in the nation. We start by reintroducing ourselves and reviewing our experience in the utility industry in Section 2. We also reflect on why our service achieved record-breaking customer satisfaction in 2020 as we delivered energy to Chicago's 77 communities and 50 wards during the pandemic. In Section 3, we share our recommendations and ideas to achieve the City's goals, which we summarize below:

- Make significant strategic investments necessary to enable the increased integration of clean energy technologies such as solar, battery storage, and electric vehicles
  - Including targeted investments to ensure that we're providing reliable, resilient service and enabling the equitable and affordable integration of renewables in all of Chicago's neighborhoods
- Take our partnership with the City to the next level, by closely collaborating with the City as it carries out its public investment programs, including INVEST South/West, to ensure we are maximizing public investments within historically underinvested communities
- Support the City's solar permit improvements and uptake of renewables by further improving the interconnection process to enable processing of 90% of residential solar applications within one day by December 31, 2025
- Partner with the City to develop educational materials to further educate residents regarding solar adoption, including options available, cost associated with such options, benefits, and other important considerations
- Partner with an organization that has subject matter expertise to study barriers to low-income solar adoption, including solar financing options, to determine pathways to increase access and further reduce the cost of solar to the residents of Chicago

- Support the City's goal to increase electrification in an efficient and effective manner by retaining a consultant to work jointly with the City and ComEd to develop a comprehensive electrification strategy and roadmap for the City
- Continue to bring innovation to the City by developing at least three new demonstration projects designed to investigate innovative grid technologies on or before December 31, 2025
- Build on recent energy efficiency negotiations to include the City in certain pilots that would unlock savings for the City and Chicago residents (as further described in Section 3 herein)
- Offer ComEd's expertise, experience, and learnings in energy efficiency to partner and support the development of the City's building performance standards and decarbonization strategy
- Build on the existing robust reporting already provided by ComEd to the City to include new and enhanced data and information around planned and completed work, energy efficiency-related information, and adoption of clean energy by Chicago residents to further increase transparency
- Form a Low-Income Collaborative to ensure that residents have awareness of, and equitable access to, energy bill assistance. Through the Low-Income Collaborative and other efforts, ComEd proposes ambitious targets around PIPP and LIHEAP enrollments as further described in Section 3 and 4



- Build off our innovative Community Energy Assistance Ambassador (CEAA) program to continue funding local jobs and effective community-based outreach to Chicago communities
- Make concrete, ambitious goals and targets for increased participation of diverse candidates in ComEd's workforce development programs as further described in Section 3 to ensure a healthy pipeline of talented diverse individuals
- Continue to expand and invest in our STEM education programs



Our ideas and recommendations were created specifically to make a meaningful impact in achieving the City's expressed goals. In Section 4, we offer concrete benefits and measurable targets that we'd aim to achieve. Finally, in Section 5, we share our experience with the Community of the Future in Chicago's very own Bronzeville neighborhood. The work we have done in Bronzeville shows us what is possible when grid modernization, innovation, and community partnership come together in one place.

Despite the tribulations of the last year, we remained at the forefront of the industry on issues of climate impact, clean energy, safety, and addressing the needs of underserved communities. While we are constantly working to meet our day-to-day obligations to today's customers, we also believe we have a greater responsibility to future generations, as well.

We are thrilled that the U.S. Environmental Protection Agency and U.S. Department of Energy named ComEd a recipient of the ENERGY STAR Partner of the Year Award with Sustained Excellence for the 9<sup>th</sup> consecutive year, and a recipient of an award from ENERGY STAR for the 12<sup>th</sup> consecutive year. We see this as a nod to our dedication to Chicago families and businesses, working to ensure they enjoy a clean, healthy future.

But this isn't just about what we've done, it's about our future focus and shared commitment to achieving the city's goals. The work we perform today, and our investments tomorrow, illuminate and reinforce our commitment to the city where our employees work, live, and play. That's why we've spent \$1.5 billion in capital investments over the last three years to create a resilient grid for the City of Chicago and its residents.

We are proud of our accomplishments, but we know our work is never done. We will continue our commitment to industry-leading performance, support for our communities, and collaboration to tackle the challenges that come our way. We are steadfast in our promise to work alongside the city to empower our communities and advance the critical cause of equity for the customers we are privileged to serve.

We look forward to acting on our shared commitment and outlining information on how to continue to build bright, clean, and equitable communities in Chicago.

Sincerely,

Joe Dominguez, CEO, and Terry Donnelly, President and COO

# Company Information and Experience

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#### **WHO ARE WE?**



Commonwealth Edison Company (ComEd) is one of the largest utilities in the United States.

ComEd is an Illinois corporation formed over 110 years ago, with its principal place of business exclusively in Illinois.



It is 99% owned by Exelon Energy Delivery Company, LLC, which is 100% owned by Exelon Corporation. ComEd transmits and distributes electric energy to over 4 million customers across northern Illinois, or about 70% of the state's population.



ComEd has had the privilege of delivering clean, reliable, and affordable energy to millions of people who call Chicago home. ComEd is recognized as an industry leader among utilities and is leading at the national level on issues of climate impact, clean energy policy, safety, and programs to address the needs of vulnerable communities.

By nearly every measure, ComEd is delivering the highest levels of service in its history, providing families and businesses the reliable, affordable, and resilient clean energy they need and deserve. In 2020, ComEd provided reliable energy to Chicago families and businesses, on average, 99.97% of the year, including impacts from the August storm. ComEd customers across our entire service territory had reliable energy, on average, 99.94% of the year, including impacts from the August storm.

This reliability is a result of the investments we've made in the grid. Since starting smart grid investments in 2012, ComEd has achieved best on record customer satisfaction, primarily driven by improvement in reliability and reasonable rates. These investments have also avoided more than 16 million customer interruptions across the system due in part to smart grid and system improvements, including distribution automation or digital "smart switches" that automatically reroute power around potential problem areas. The avoided outages have resulted in \$2.7 billion in societal savings, including avoided business losses.<sup>1</sup>

ComEd's smart grid investments and the work of our more than 6,200 employees have delivered the reliable power that families and businesses expect and prepared the system to withstand extreme weather. For example, in August 2020, a powerful storm swept across all of northern Illinois, bringing hurricane winds with gusts higher than 90 miles per hour, extensive lightening, golf-ball-size hail and 13 confirmed tornadoes, including one within the city

<sup>&</sup>lt;sup>1</sup> Customers can see grid modernization changes in their neighborhood by accessing the following website: <u>Smart Grid.</u>



limits of Chicago. We safely restored service to more than half a million customers in less than 24 hours – the fastest time in ComEd history. If not for the smart grid investments made since 2012, this storm would have caused nearly twice as many families and businesses to lose power, a two-week restoration, and millions of additional dollars in costs.

ComEd proved that it can respond to any unexpected challenge or extreme weather event. In 2019, for the third year in a row, ComEd received the Ambassador of Excellence Award from the National Weather Service of Chicago in recognition of ComEd's significant contributions to ensure readiness, responsiveness, and resilience against weather, water, and climate events.

As we continue to invest in our infrastructure to keep pace with the growth of the City and state, ComEd's industry-leading reliability performance is critical to supporting economic development as well, including recruitment of high-tech industries.

These investments do more than just provide the clean, reliable, and affordable electricity that residents expect and the resiliency needed to withstand more frequent extreme weather events - they help to attract new business to the region and foster the growth of existing business. Our ability to provide reliable electricity at affordable and competitive rates creates conditions that attract business growth and recruitment. To spark economic development in Illinois, ComEd added 17 new customer projects that represented 563 megawatts of increased capacity in 2020 - a record. These new customer projects will bring jobs - nearly 6,400 iobs – and an investment of more than \$2.7 billion to Illinois at a time when our state needs investments like this more than ever.



ComEd has been proud to provide critical support as the City pursues its vision of a growing economy, strong communities, world-class education, technology and innovation, and sustainability for all Chicagoans.

As we help to support the growth of the city, we always prioritize the safety of our customers, communities, and employees. Safety is part our culture.

In 2016, ComEd was recognized as one of 16 of America's Safest Companies by EHS Today for empowering and encouraging employees to focus on safety.



#### COVID-19 Response

Our commitment to the City of Chicago goes far beyond keeping the lights on. ComEd is committed to lifting up communities in need by creating economic opportunities and offering financial support. To help respond to the acute financial challenges posed by the pandemic, ComEd increased our annual customer assistance in 2020, connecting customers to more than \$70 million in financial assistance – a record – and supporting more than a quarter of a million customers with stabilizing grants. To help families and communities recover from the economic challenges created by the COVID-19 pandemic, ComEd, the staff of the Illinois Commerce Commission (ICC), and a broad group of stakeholders - including the City of Chicago - worked to develop a comprehensive customer support package. This package, approved by the ICC in June of 2020, extended the moratorium on disconnections and the waiver of new late fees.





Additionally, whether it was the ComEd Bill Payment Assistance Program, which provided bill credits of up to \$500 for residential customers, the more flexible payment arrangements extended through June 2021, the new Service Reconnection Assistance options, the Helping Hand Program, which provided up to \$300 in additional grants to eligible customers, or the Small Business Support Programs, which provided grants of up to \$1,000 to eligible small business customers toward a past due balance, ComEd found new and creative ways to support customers in need during the difficult time.

In 2020, ComEd, Exelon, and the Exelon Foundation provided approximately \$18.6 million to support communities and organizations across northern Illinois – including more than \$2.2 million in COVID relief to organizations like the United Way/Chicago Community Trust COVID-19 Response Fund and the Illinois COVID-19 Response Fund, which provided direct support to those struggling with the impacts of the pandemic.

However, we did not stop there. ComEd also initiated support to hyperlocal community response efforts including food pantries, financial emergency assistance, protective gear, educational programming, and COVID-19 awareness, as well as provided support for small businesses impacted by the pandemic in communities across Chicago.



#### ComEd in the Community

But our pandemic response is only part of our work to support Chicago communities. ComEd has continued to deliver important grants that help drive the quality of life in communities that need it most. Recognizing that access to art in our communities is a crucial element of quality of life, ComEd has partnered with the League of Chicago Theatres to administer the ComEd Powering the Arts Program. The program awards grants of up to \$10,000 to arts and cultural organizations, supporting their efforts to reach underserved audiences in ComEd's service area. Grant recipients can use the Powering the Arts grants in combination with other funding sources to cover a portion of the expenses associated with developing and/or supporting their programs for reaching underserved audiences. Awardees for 2020 include Instituto del Progreso Latino, Green Star Movement, Collaboraction Theatre Company, Changing Worlds, and Definition.

We also embrace our unique role in helping the region become more sustainable. One way we do this is by partnering with Openlands to administer the ComEd Green Region Program. Recognizing that open space in our communities is a crucial element of the quality of our lives, the program awards grants to public agencies supporting their efforts to plan for, protect, and improve open space in ComEd's service area of northern Illinois. Previous awardees include Palmisano Park, Independence Park Teaching Garden, Dorchester Community Garden, Enlace Chicago, the Chicago Park District in support of pollinators at West Pullman Park Natural Area, and the Permaculture Site at El Paseo Community Garden.

The Powering Safe Communities grant program awards grants of up to \$10,000 to support municipal public safety initiatives throughout the ComEd region. ComEd provides the funds and the Metropolitan Mayors Caucus is the grant program administrator. ComEd and the Metropolitan Mayors Caucus announced grants to 21 communities to fund local public safety projects in 2020.

We are proud to say that Chicago is our home too. Lifting up communities, investing in our infrastructure, and providing safe and reliable energy while actively participating in economic development are critical aspects of our values and who we are.

And our 6,200 employees embody our values. This is our home too, and we celebrate and invest in our communities by supporting them with our time and resources. ComEd employees volunteered more than 11,000 hours in 2020 – despite the pandemic – and, through the company's annual fundraising campaign, raised approximately \$1.6 million to support communities and causes close to their hearts.









The company continues to match full-time employees' charitable donations dollar-for-dollar up to \$5,000 for full-time employees (\$10,000 for executives). ComEd is also continuing to connect employees with volunteer opportunities, including those that can be done from home, donating blood, and supporting local food banks.

At the forefront of STEM education, the City of Chicago and ComEd have partnered together for more than half a century to provide STEM scholarships to students in our communities designed to specifically increase diversity in STEM fields. Since 1956, ComEd has partnered with Chicago Public Schools (CPS) in support of the CPS Student Science Fair, Inc. Scholarship Awards. Significantly, the Student Science Fair has awarded 2,180 scholarships, valued at \$4,013,492, to students from 77 Chicago public high schools. Any prospective June CPS high school graduate who has participated in CPS STEM exhibitions (during grades 7-12) at a regional or the city level and/or the symposium/essay competition; and who is planning to major in a STEMrelated field is eligible to apply for a scholarship. The Scholarship Committee, representing business and education, selects scholarship recipients on the basis of participation in the Chicago Public Schools STEM Exhibitions, scholastic achievement, future goals, and personal interviews. ComEd is proud to be an important partner in that effort and looks forward to building on that success.

For the 5th year in a row, ComEd has been recognized as a "Tree Line USA" Accredited Utility for 2021 by the Arbor Day Foundation. The Tree Line USA program exists to recognize best practices in public and private utility arboriculture, demonstrating how trees and utilities can co-exist for the benefit of communities and citizens. There are five core criteria that need to be met to receive the accreditation. These include Quality Tree Care, Annual Worker Training, Tree Planting and Public Education, Tree-Based Energy Conservation, and Arbor Day Celebrations.





It isn't just work for us; we celebrate with each other too. For the seventh year, ComEd will partner with Chicago Park District to "Switch on Summer." This is an important symbolic event that usually marks the start of the summer season by switching on Buckingham Fountain.

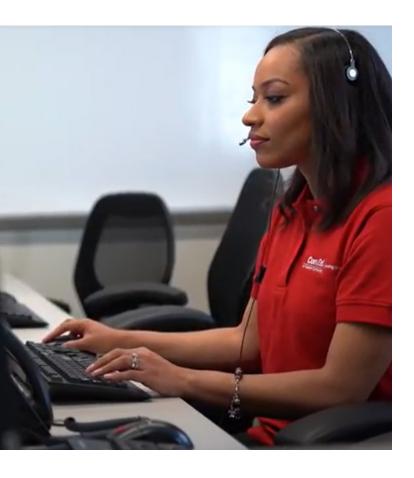
ComEd is enthusiastic to partner with the City for "Switch on Summer" again this year and witness another cultural celebration and kickoff for one of the best summer cities the country has to offer.

#### **Compliance and Ethics**

ComEd is a public utility subject to regulation by the ICC under the Public Utilities Act (PUA). The regulatory framework provides a valuable level of transparency, customer protection, and review by regulatory authorities.

We understand the City's expectation that ComEd enact comprehensive and meaningful ethics reform that rebuilds trust, and we have already moved aggressively to implement comprehensive ethics reforms. Four new policies, effective last year, substantially strengthen oversight, controls, and guidance with respect to ComEd's interactions with public officials. The policies are available at the following website: Policies for Interactions with Public Officials and were designed with the assistance of outside counsel who conducted our extensive internal investigation, Jenner & Block,





and incorporate best practices from a review of numerous other corporate and governmental ethics policies. That is exactly where we need and want to be, and we hope the measures we have taken will become a model for ethics reform at other companies in Chicago and elsewhere.

Exelon also has taken broader steps to strengthen its compliance program, including creating a new position of Executive Vice President for Compliance and Audit, reporting directly to the Exelon CEO and the Audit Committee of the Board of Directors. To fill that role, we hired David Glockner in March 2020. He has served in senior positions in the U.S. Attorney's Office and the Securities and Exchange Commission and as Chief Compliance Officer for Citadel. His assignment includes a top-to-bottom reassessment and, as necessary, rebuild, of our compliance program to ensure that it is world-class.

#### **Workforce and Supplier Diversity**

Our workforce reflects the rich diversity of the communities we are privileged to serve. Among our leadership, 38% of our executives are people of color, while 66% of the C-suite executives are women and people of color. Diversity is a core value, and we know that it is essential to the type of creative and innovative thinking that achieves outstanding results. Our workforce, which consists of 6,200 dedicated, highly skilled crews and employees, is the backbone of our reliability, resiliency, and clean energy leadership.

Our commitment to diversity goes beyond our office walls. Despite the global pandemic, our strong and growing partnerships with our diverse supply chain helped break all records in 2020 with a diverse spend of \$894 million – an all-time high of 42% of total supplier spend and a year-over-year increase of \$156 million. This surpasses our previous record of 41% of total supply spend achieved in 2019, and it's a 3% increase over the 2018 diverse spend total. Increasing the total dollars spent and percentage of diversity-certified supplier inclusion is a core value, and ComEd's 2020 performance is a reflection of this value. This truly represents ComEd's commitment to grow both the amount of spend and the percentage of total spend with diverse supplier.

Additionally, in 2020, ComEd spent a total of \$18.7 million on contracts related to the construction and rehabilitation of ComEd's buildings in Chicago. Of this, approximately 95% was spent using certified minority-owned firms, and 5% was spent using certified women-owned firms. In addition, to expand the pool of certified diverse suppliers, ComEd and Exelon participated in and sponsored several minority- and women-owned business development events, including Chicago United's Five Forward Program, the Chicago Minority Business Development Council's Annual Chicago Business Opportunity Fair, the Women's Business Development Center's Pitch Connections, and workshops with the Illinois Utilities Business Diversity Council.



#### **Innovation**

At ComEd, we have a long history of innovation. We have long recognized that we needed to transform our electric system from a static power system to a responsive and dynamic network model. While technology has certainly been the backbone of this transformation, our people have been just as important to the transformation. We've built a culture to foster that innovation – one that encourages our employees to look at problems more broadly and to bring fresh perspectives to problem-solving.

Further, ComEd is bringing innovation directly to Chicago. Tapping into Bronzeville's strong tradition of innovation and hands-on community spirit, ComEd has collaborated with stakeholders, including civic organizations, academic institutions, and local businesses, to develop and demonstrate technologies and programs that will make the neighborhood a Community of the Future. The Community of the Future and its flagship project, the Bronzeville Community Microgrid (BCM), serve as a living laboratory that enables us to demonstrate the latest technologies while also demonstrating the importance of partnership between the utility and the community to identify programs that serve specific needs as well as support the goals and aspirations of the community. (We share more details and learnings about the Community of the Future in Section 5.)



# Narrative

#### **BUILDING ON OUR HISTORIC PARTNERSHIP**

# The City of Chicago and ComEd have long been at the forefront of enabling a clean energy future for Chicagoans.

ComEd shares the City's goal of a clean energy future, which delivers health and environmental benefits to all residents, but especially those in historically disinvested communities.

The City of Chicago can benefit from the successful transformation of the electric grid as a result of state legislation, and we look forward to continuing our partnership with the City of Chicago to ensure that Chicago leads the nation in building a clean, resilient, equitable future for all.

Chicago has long been a leader in innovative environmental initiatives that promote resiliency, clean energy, cleaner air, and a healthy environment for Chicago families. Chicago has not shied away from pursuing ambitious goals as described in the City's 2008 Climate Action Plan and 2015 Climate Agenda.

Specifically, we recognize the City has committed to:

- Power City-owned buildings by clean, renewable energy by 2025;
- Supply renewable energy for all buildings by 2035;
- Convert to an all-electric public bus fleet by 2040; and
- Develop a citywide building decarbonization strategy.



We share your belief that everyone – regardless of background or status – has an equal right to clean, affordable, and reliable energy as well as access to new energy technologies, and we hope to work with you to create more equitable opportunities for all.

Furthermore, we know that addressing the climate crisis is only part of the story. Black and brown communities suffer from enormous disparities in air quality, access to health care, and economic opportunity. The pandemic has laid bare the huge gulfs in health equity in Chicago that are characterized by life expectancy gaps of 20 or more years in neighborhoods that are just a few miles apart. We can take action that combats the climate crisis, but we must also reduce the air pollution from local gas and diesel vehicles that disproportionately harms disinvested communities, leading to millions of dollars in societal medical costs, premature deaths, and a less vibrant city for us all.

# ComEd has several ideas to help Chicago achieve its stated goals of clean energy and equity:

#### **Energy and Electrification**

#### A Resilient Grid to Enable Renewables

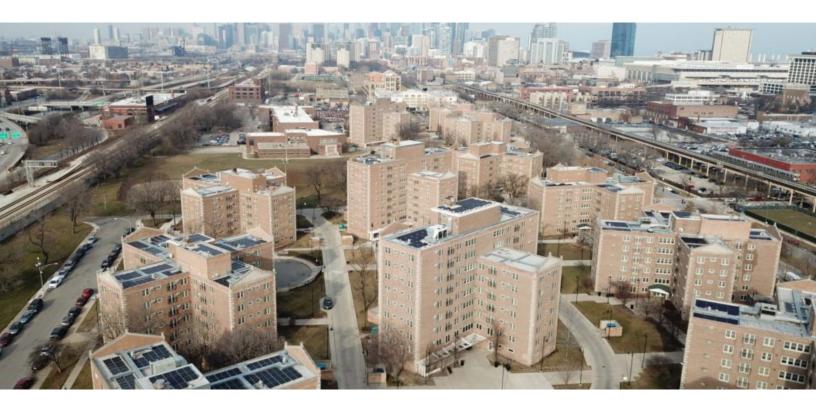
ComEd's region is a national leader in clean energy. In 2019-2020, enough clean energy was available to serve 94% of our customers' hourly consumption. And to improve air quality and public health in all communities, ComEd supports clean and renewable energy growth. Strategic infrastructure investments are necessary to enable the increased integration of clean energy technologies including solar, battery storage, and electric vehicles; ensure the resiliency needed to withstand the severe weather caused by the climate crisis; support broad-based growth and development; and continue to deliver the safe, reliable, affordable, clean energy Chicagoans expect.

In addition, targeted investments in all 77 of Chicago's neighborhoods will ensure that we improve reliability and resiliency, and enable the equitable and affordable integration of renewables through power line and other upgrades.

The City has announced its commitment to maximize public investments within historically underinvested communities in Chicago and ComEd plans to be there every step of the way. Whether through INVEST South/West or otherwise, we stand ready to maximize investments and support the City's infrastructure goals and plans. In sum, strategic infrastructure investments can ensure the grid is prepared for a clean energy future and ready to meet increased usage and customer needs.



3. NARRATIVE \*\*\*\*



#### Solar Interconnection

ComEd has an important role<sup>2</sup> in achieving the City's clean energy goals. We can minimize barriers to solar adoption, expand energy efficiency programs, and ensure that the grid is ready for solar and other renewables so that all communities can access clean energy.

In 2020, a record of 10,250 ComEd residential customers connected energy resources like private solar to the ComEd grid. And we aim to do even better. Just as the City has worked to improve the permitting process for solar installations since 2013, ComEd will implement process and system enhancements that will enable ComEd to process 90% of residential solar applications within one day of submittal by December 31, 2025.

The infrastructure investments we propose above will further ensure that that the grid will be ready to integrate renewable generation, such as solar, in all communities across the City of Chicago including the INVEST South/West neighborhoods.

In addition, we want to help demystify solar adoption; therefore, we would partner with the City to develop educational material for residents regarding solar adoption, including options available, cost associated with such options, benefits, and other important considerations.

ComEd would also propose to partner with an organization that has subject matter expertise to study barriers to low-income solar adoption, including solar financing options, to determine pathways to increase access and further reduce the cost of solar to the residents of Chicago.

ComEd would consult with the City when designing the study and would share the findings of the study with the City to help inform policy.

<sup>&</sup>lt;sup>2</sup> Pursuant to state law, ComEd is an electric distribution company within Illinois' deregulated energy market and is not a generation company.



#### Clean Transportation Transformation

ComEd is taking action to help advance the electrification of transportation to reduce air pollution in all communities. It is now well known that the transportation sector accounts for one-third of all U.S. greenhouse gas (GHG) emissions. ComEd is committed to lead by example in terms of advancing the adoption of electric vehicle (EV) technology in Illinois, which is why we have committed to electrifying 30% of our fleet of 3,000 vehicles by 2025 and 50% of our fleet by 2030. Our goal of electrifying 50% of our fleet by 2030 has the potential to eliminate 29,000 metric tons of GHG emissions, in addition to the 4,000 metric tons that the ComEd fleet already avoids annually.



But no one stakeholder can deploy clean transportation at the amount needed to mitigate climate change. In 2017, the City committed to reducing citywide GHG emissions to levels equivalent to or greater than 26 to 28% reduction from 2005 levels by 2025. We support the City's goal to advance electrification and adoption of electric vehicles within the City to significantly reduce GHG emissions.

Because there are so many complex elements to consider, the best way to make real progress in achieving clean transportation would be to retain a consultant who would work collaboratively with Chicago and ComEd to develop a comprehensive electrification strategy and roadmap for the City. The electrification strategy and roadmap would include recommendations around appropriate goal setting for the City as well as recommendations to overcome barriers to adoption of EVs and other electrification. This work would also include:

- the assessment of technologies, economics, availability, and time horizon around electrifying various parts of the transportation system;
- the development of prioritized strategies to achieve an efficient, swift, and equitable transition to clean transportation; and
- the exploration of other action items, such as: supporting bus electrification, creating incentive programs for EV adoption at freight yards and logistics operations, and developing a used-EV program.

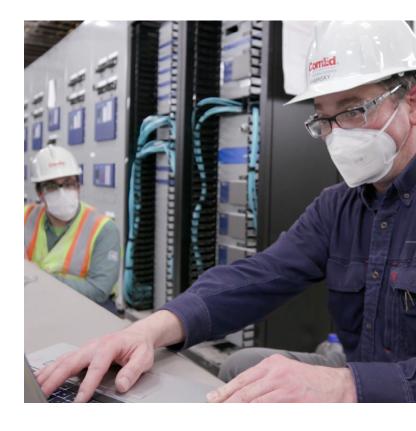
One key element of any strategy to mitigate climate change by integrating clean generation and clean transportation resources must be investment in the necessary grid technologies to integrate these resources without affecting reliability. As part of this effort, ComEd has committed to demonstrating advanced technologies to achieve this goal.

#### Innovation

ComEd has a successful track record of partnership with leading universities, national labs, industry organizations, and government institutions to develop and demonstrate advanced technologies to enable a cleaner energy future. In 2020, we deployed dozens of advanced sensors from phasor measurement units to a new kind of sensor we developed, for which we received a grant from the U.S. Department of Energy (DOE) that will help us integrate renewable distributed energy resources. Through the receipt of \$40 million in funding for new projects from the DOE, we've simultaneously expanded our portfolio of innovative technologies to support expansion and adoption of clean energy systems to help develop the next generation of technologies that can provide a whole new level of service in the future.

To continue our pursuit of learning about and testing cutting edge technologies within the City, we would develop at least three new demonstration projects designed to investigate innovative grid technologies, how and when to best deploy them, and/or their impact on customers, on or before **December 31, 2025.** Specific innovative ideas may include the following, but may be revised by ComEd after consultation with the City: testing reliability and resiliency through advanced grid technologies such as power flow controls; learning about electrification through managed EV charging, EV make-ready, or dynamic wireless charging; and learning about distributed energy resources (DER) integration through distributed energy resource management system, active/smart inverter controls, or transactive energy demonstrations.





#### **Energy Efficiency**

Energy efficiency is an effective strategy to not only meet climate goals through reduced energy usage, but also reduce costs for customers. In June 2008, ComEd launched its Energy Efficiency (EE) program, which offered residential and business customers straightforward methods for managing their energy usage, saving money, and helping the environment. In 2018, ComEd was able to greatly expand these offerings, thanks to the passage of the Future Energy Jobs Act (FEJA).

Since the programs were introduced in 2008, ComEd has helped customers save \$5.7 billion on their electric bills and achieve more than 52.1 million net megawatt-hours in energy savings. This is equivalent to the energy required to power more than six million homes for one year. In 2020 alone, these programs enabled ComEd customers to reduce their energy usage by an estimated 1.8 million net MWh, saving over \$180 million in annual energy costs.



#### **RESIDENTIAL CUSTOMERS**

The program provides several energy-efficiency offerings to all residential customers, including lighting discounts, appliance rebates, single- and multi-family assessments, elementary education kits, and home energy reports. Additionally, with the inception of FEJA, ComEd has been able to provide more robust support to income eligible (IE) customers, through a new portfolio of programs specifically tailored and targeted to help them save energy and money on their bills, by providing free or deeply discounted services and products. These IE offerings include single- and multi-family retrofits, public housing retrofits, affordable housing new construction, IE kits, food pantry product distribution, and IE lighting discounts. Since the inception of FEJA in 2018, ComEd has provided \$25 million in incentives through its programs available to all residential customers in the City of Chicago, and further has provided over \$64 million in energyefficient products, upgrades and incentives through its IE programs in the City of Chicago. These investments have helped Chicago residents save over \$550 million over the life of the EE measures.



#### **BUSINESS CUSTOMERS**

The program also provides commercial and industrial customers, both private and public, cash incentives to install energy-efficient equipment such as lighting, motors, HVAC equipment, commercial kitchen equipment, and chillers. Incentives also help customers improve the operational efficiency of existing building systems (retro-commissioning). Other offerings specifically target developers and architects to incorporate energy efficiency in new buildings and major renovation projects and target small businesses to complete energy-efficiency projects.

Since the inception of FEJA in 2018, more than 2,700 commercial projects have been completed in Chicago, with the support of \$58 million in incentives. These projects range from rebates on energy-efficient equipment to fully funded engineering studies of building operations, and they have saved more than 454,000 net MWh of electricity. Specifically, ComEd has undertaken more than 4,500 energy-efficiency projects in small businesses across Chicago, providing approximately \$24.2 million in incentives. As a result, more than \$120 million in customer savings will be achieved over the life of the projects.

To accelerate public projects in Chicago, ComEd recently completed nearly 50 facility assessments for the City, in support of their 2021 Capital Plan for health centers, libraries, fire stations, senior centers, and office buildings. The facility assessments were completed over three waves of work and have identified 14 GWh of energy saving opportunities that include but are not limited to lighting replacements/retrofits/controls, HVAC fans and pumps with variable frequency drives, and building automation systems.





In addition, the City, ComEd, and other stakeholders recently wrapped up extensive negotiations around the Energy Efficiency Plan 6 for 2022 through 2026. Under Plan 6, ComEd agreed to: spend approximately \$86 million on low-income programs, which represents an increase of approximately 87% from Plan 5 and a more than 240% increase over the statutory minimum requirement; create meaningful new pilots; and share new data and reports with the City and other stakeholders. We are committed to deepening our strategic partnership on energy efficiency with the City, to assisting the City in achieving its energy savings and sustainability goals, and to helping families in underserved communities access energy and associated bill savings.

Under Plan 6, ComEd will pilot offering comprehensive studies, fully funded by ComEd, to large public sector customers to inventory costeffective opportunities for efficiency improvements across such customers' portfolio of buildings or facilities (excluding exempt facilities), as well as related strategic plans for the customers to make identified improvements over a multi-year period.

ComEd would like to build on the recent facility assessment work noted above and would propose to include the City of Chicago (e.g., its buildings) as a pilot city. This pilot would unlock access to projects that could create millions of dollars in annual savings.

The City and ComEd recognize and agree that energy efficiency programs offer opportunities for the efficient use of electric energy and reduction of customers' electric energy costs. Under Plan 6, ComEd will work with relevant ComEd business units to create a pilot that recruits customers who are payment troubled into its income-eligible energy efficiency programs. ComEd would propose selecting eligible customers from one or more community areas in Chicago, jointly selected and agreed to by the City and ComEd. Further, ComEd would propose targeted investments in energy efficiency weatherization funding for the period 2022 to 2025 for weatherization efforts within the INVEST South/West communities.

ComEd would also partner with the City as it establishes building performance standards for existing buildings (in part using data developed through application of the City's energy benchmarking ordinance) as well as standards for new buildings including stretch or reach codes. In addition, ComEd will partner with the City and other key stakeholders in developing the City's building decarbonization strategy as it relates to energy efficiency.



#### Data Transparency

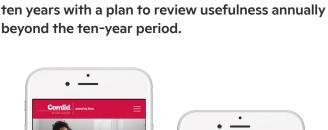
Every year, ComEd provides the City with a variety of data in its Annual Report which provides an overview of ComEd's performance in the City for the prior calendar year, including relevant reliability metrics, tree-trimming activities, other distribution projects, reports on diversity and inclusion for ComEd's workforce as well as suppliers, and a summary of construction on public ways. To further enhance the City's understanding of the investments ComEd is making in communities across the City, ComEd would provide the City with an Environmental System Research Institute, Inc. (ESRI) shapefile identifying completed work reported in the Annual Report and to the extent reasonably practicable, work planned for the next year. In addition, ComEd would provide:

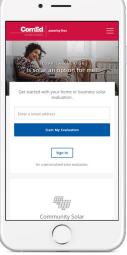
- Native versions of energy efficiency-related quarterly and annual reports filed with the ICC;
- High-level energy efficiency results reports for the City together with native versions of related underlying data on an annual basis; and
- Anonymized information regarding the extent of participation in income eligible energy efficiency programs within the City for the calendar years 2018 to 2020.

To further enhance transparency around clean energy adoption by City residents, ComEd would further provide the City with monthly anonymized reporting data on the adoption of clean energy by residents in Chicago, including the number of Illinois Solar for All projects within the City; zip code level data on the number of residents that have installed rooftop solar systems and number of residents that are subscribed to a community solar project; and aggregate data on the number of new solar interconnection applications broken out by residential, commercial, and community solar, and number and percentage of residential solar facilities incurring interconnection costs greater than \$500.

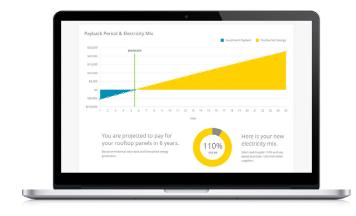
In addition to providing the City with enhanced data and reporting, ComEd currently provides information systems available to the general public such as hosting capacity maps, system improvements map, real-time outage map, Solar toolkit, and EV toolkits.

ComEd would propose to continue to maintain and operate such tools for a minimum period of











# Equity and Neighborhood Development

ComEd residential customers pay less than they did nearly a decade ago with lower rates than customers in comparable U.S. cities, due to careful cost management and transparent, consistent ratemaking.

In 2020, the ICC approved ComEd's request for a third rate decrease in a row – the fifth rate decrease in 10 years – which lowers residential customer bills by about \$1 per month. This results in an average monthly bill of close to \$82, which is lower than customer bills in 2008.

ComEd's electric rates trend below those of other large utilities – in fact, ComEd's average residential rates are 17% lower than the rate in the 10 largest U.S. metropolitan areas and ComEd's average commercial rates are 18% lower than the rates in the top 20 largest metropolitan areas. The percentage of household income that the average ComEd bill represents – 1.4% – is lower than the U.S. average of 2.3%.

The recently enacted legislation calls for ComEd to eliminate late payment fees and, with very limited exceptions, deposits for our low-income residential customers. It also eliminates payment convenience fees for all customers. Still, on the question of how to drive better outcomes for low-income Chicagoans as it relates to energy affordability, some stakeholders have proposed that ComEd simply limit or permanently stop disconnecting electricity for non-paying customers in Chicago. Under current law, however, ComEd cannot voluntarily agree to stop disconnections in one part of its service territory. Because all of our customers – in and outside of Chicago – bear the burden of paying for utility



costs that are not collected, a change in collection practices for one part of the service territory has the potential to shift bad debt expenses to customers in other parts of our service territory as those expenses increase.

While we recognize that disconnect notices and disconnections impact customers, we believe that rather than stopping all disconnections, the better approach is to ensure that customers who receive disconnect notices get the necessary financial assistance available through LIHEAP, PIPP, and other valuable programs. In fact, through the efforts of many stakeholders, Illinois is now poised to double the funding available for PIPP and will soon have in place new measures to improve participation in these critical energy assistance programs. These program changes will provide significant benefits to thousands of our Chicago customers – if they enroll and participate. Even today, over 12,000 Chicago customers are able to benefit from roughly \$7.1 million of assistance dollars as a result of PIPP. When LIHEAP is added in, that total grows to over 66,000 Chicago customers who were able to receive more than \$23.2 million in assistance dollars from just PIPP and LIHEAP in 2020 alone. These critical programs provide invaluable assistance, and we have worked with your leaders and other stakeholders to improve their reach and effectiveness, especially in the hardest-hit Chicago neighborhoods.

At the same time, we know that disconnect processes have a clear impact on bad debt and on incenting customers to take proactive steps to get the help available to them to pay their bills and keep balances from getting out of control. This is why current law requires ComEd to actively engage in balanced outreach and collection efforts – to mitigate bad debt for all customers, especially those struggling with their bills. There is a strong correlation between increased customer enrollment in financial assistance programs, and targeted tools such as disconnect



notices. As we have shared with your team, when ComEd suspended disconnections and disconnect notices in 2020, we saw low numbers of customers reaching out to ComEd and other agencies to enroll in available assistance programs. A sizeable portion of these assistance dollars went unused until ComEd was able to send targeted notices out at the end of 2020, which in turn prompted many customers to reach out and obtain available state and federal assistance dollars before those programs closed for the year. The reality is that without consequence for non-payment, we would experience a circumstance where financially vulnerable customers fail to enroll in programs, where financial assistance programs go unused by city customers, and where customers that can pay elect to forgo payment. All of this would lead to higher burdens on our paying customers.

We believe that an approach that focuses on increasing financial assistance participation in Chicago (as set forth in the "Low Income Collaborative" section) will yield the most sustainable benefits. This approach allows the City to continue to benefit from the fact that our broad customer base provides support for the financial needs of vulnerable customers that represent a greater portion of the Chicago customer base.

#### Financial Assistance

To make energy even more affordable, ComEd has promoted CARE – a suite of financial assistance programs designed to help eligible customers pay their energy bills. The financial assistance programs, including ComEd's CARE programs, offer a variety of financial assistance options, including grants which can be applied to ComEd bills as well as deferred payment arrangements.³ Through CARE, ComEd has deployed nearly \$100 million of ComEd shareholder funds to assist customers in need, including income-eligible customers, those who have experienced hardships, senior citizens, veterans, active/deployed members of the armed services, and nonprofit organizations.



Still we want to ensure that we are providing worldclass customer service and serving as an energy adviser for our low-income customers. ComEd developed a Limited Income Pre-Certification Tool that will remove the guesswork in qualifying customers for certain energy assistance programs. Previously, Customer Service Representatives (CSRs) had to access multiple sources in order to identify opportunities for available assistance. Our Limited Income Pre-Certification Tool now allows our CSRs to match customers based on their household details with energy assistance programs with one click of a button. This will promote first-call resolution, reducing the number of callbacks to get assistance, and ensuring customers can maximize access to programs.

We also understand that some customers prefer to self-serve. ComEd is also building the Smart Assistance Manager (SAM) for those residential customers who would like to manage their electricity expenses and access available assistance without calling our CSRs. SAM is a self-service customerfacing digital tool that empowers customers to take control of their energy decisions through accessible, personalized assistance using data and analytics. ComEd continues to seek ways to continually improve how we serve our millions of customers, including making customer assistance and energy efficiency more accessible, affordable, and effective for everyone.

<sup>&</sup>lt;sup>3</sup> Customers can visit <u>ComEd.com/PaymentAssistance</u> to learn more about financial assistance options



#### LOW-INCOME COLLABORATIVE

As a regulated utility, rates and rate design are established by state law and ICC regulation. The recent energy legislation directs the ICC to study the costs and benefits of discounted rates for low-income customers; that process will include input from various stakeholders. Still, we look for ways to work within existing laws and regulations to ensure electricity remains affordable for all customers in all communities.

We, like the City, believe that bold, ambitious goals to eradicate poverty require community-centered solutions and a coalition of support from various stakeholders. ComEd has identified an important area of opportunity with the potential to bring real relief to families in need. We believe that the joint development of a Low-Income Collaborative can be created to ensure that City residents have awareness of, and equitable access to, energy bill assistance. The collaborative would include ComEd, the City, and key stakeholders, such as select agencies, local community-based organizations, and other local organizations such as local administering agencies, and would address barriers to accessing assistance and maximize customer enrollment and savings.

We believe that any plan created by the collaborative should address: ① Percentage of Income Payment Plan (PIPP) expansion, and ② Low Income Home Energy Assistance Program (LIHEAP) expansion. In addition, ComEd would propose to launch a pilot to proactively identify at least 500 low-income, at-risk customers living within the INVEST South/West communities and provide them a personalized set of energy bill assistance solutions to prevent non-payment disconnections through arrearage protection through 2022. ComEd would take learnings from said pilot to inform future outreach efforts.



#### **COMED ENERGY ASSISTANCE AMBASSADORS**

We continue to learn about the importance of community-led outreach to ensure that available financial assistance and other cost saving programs are maximized. In 2020, ComEd partnered with the Chatham Business Association to supplement our Financial Assistance Hardship Outreach Program. This partnership supplemented our Financial Assistance Hardship Marketing Outreach Program and was called the Community Energy Assistance Ambassador (CEAA) program. This program included a workforce development and training component for residents of communities identified by the City of Chicago as INVEST South/West communities. CEAA provided financial relief to communities who have been economically hardest hit by the national pandemic. CEAA also promoted awareness and enrollment in financial assistance programs including CARE, Bill-Assist, PIPP, and LIHEAP through a combination of 68 virtual and in-person events from October through December, with close to 42,000 customers in attendance and over 100 part-time ambassadors who were hired to assist with this effort. ComEd would recommend building off the CEAA program, and would propose to continue its partnership with local nonprofit community organization(s) to administer the program and fund the hiring of 100 part-time energy ambassadors per year over the next ten years.







#### Workforce Development

ComEd supports industry-leading programs that help to expand the pipeline of diverse workers ready to support a clean energy future. Workforce development is the compilation of comprehensive, focused actions to build economic and human capital in order to create business and community sustainability and remove barriers to decrease unemployment and underemployment. ComEd has a suite of programs and focused partnerships to ensure a highly skilled, diverse workforce for the rapidly transforming industry and region which we serve.

#### **CHICAGO BUILDS**

Our partnership with Chicago Builds, the vocational trades program for Chicago Public Schools juniors and seniors, began in the 2020-2021 academic year. The first half of the school year was focused on planning efforts due to the pandemic and the District's challenges transitioning the normally hands-on learning lab to a virtual format.

During the final weeks of the first semester, we were able to participate in two Career Speaker Sessions in January 2021. The first was an introduction to ComEd, and the second was focused on the work we do in Distribution Operations to deliver electricity to homes and businesses. The second semester featured sessions on Energy Efficiency and our Training for various construction roles within ComEd.

ComEd would like to continue to collaborate with Chicago Public Schools to expand the Chicago Builds program by making an annual investment in the current program to fund materials and an additional instructor, establish an energy curriculum for the Electricity track, provide mentors for the program annually, and create trades-related internship opportunities for up to five students from the program annually over a certain period.



#### CONSTRUCT INFRASTRUCTURE ACADEMY

ComEd launched CONSTRUCT Infrastructure Academy in 2013 with 10 companies and three social service agencies to increase the pool of qualified minority candidates for construction jobs in Illinois. Today, this effort has grown to include northern Illinois' three major utility companies, 30 construction and engineering companies, four IBEW locals, and ten social service agencies. The intensive 11-week program prepares local, diverse job seekers for entry-level positions in the infrastructure industry by providing instruction in job readiness, life skills, job shadowing, and preparation for certifications and testing that is often a prerequisite for employment. Since inception, it has trained more than 650 job seekers, and on average, 70% are employed within the first 90 days of program completion.

In April 2021, 92 participants graduated, with 50 employed. Participating training organizations in the program are ASPIRA of Illinois, Austin Peoples Action Center, Chicago Urban League, Chicago Women in Trades, National Latino Education Institute, Quad County Urban League, St. Sabina, SER Jobs for Progress, Instituto del Progreso Latino, and YWCA of Metropolitan Chicago and the South Suburbs. These agencies help identify and train program participants using common eligibility and completion requirements while providing job counseling and placement services. The 40-plus companies engaged with CONSTRUCT participate in career days, job fairs, and job shadowing, and recruit and hire directly from the program.



#### **DAWSON TECH**

Central to ComEd's and Chicago's partnership is the revitalization of neighborhoods through economic growth and job creation. Collaborative discussions with the City identified areas of economic opportunity of the future in which jobs are expected to be created, such as those in clean energy and technology fields. In response, ComEd is building upon the already strong partnership with Dawson Technical Institute to strengthen the pipeline of talent attending the technical job training program in Bronzeville. Part of the City Colleges of Chicago system, Dawson Technical Institute offers industry-validated training in the construction and utility industries.









Developed with ComEd, the Dawson Overhead Electrical Line Worker Program was developed as a training program for those interested in careers as ComEd overhead line workers. Additional opportunities allow local residents to obtain certification in solar panel installation and energy management that previously had only been available outside of Chicago. The program launched in 2007; since then, 405 students have graduated with an 80% job placement rate.

Over a specified time period, ComEd would propose to use good faith efforts to achieve the following:

- recruit 20% of CONSTRUCT Infrastructure Academy classes from INVEST South/West communities and;
- provide full scholarships (includes tuition, books, and a stipend) for up to five students from the CONSTRUCT Infrastructure Academy to attend Dawson Technical Institute for the electricity program.

#### COMED'S TALENT PIPELINE

Furthermore, in the spirit of continuing to build our talent pipeline, ComEd would propose to use good faith efforts to achieve the following hiring goals:

- commit 20% of new Construction Worker/ Overhead Helper classes to be filled by residents from INVEST South/West communities and;
- commit 20% of new Customer Service
  Representative classes to be filled by
  residents from INVEST South/West classes.



# Building the Future Workforce with ComEd STEM Programs

Lighting a path forward into the future requires emerging talent. ComEd's STEM programs are preparing local Chicago students to not only carry the torch of innovation into the next generation of energy technology, but to lift up their own communities in the process.

To neutralize continued inequalities in marginalized communities and to inspire interest in STEM careers, ComEd provides educational and training opportunities to prepare students for a career in STEM fields.

These students are being trained directly by ComEd professionals first to identify local and global needs and then to address them with creative problem-solving and a STEM-adept skillset. ComEd's STEM programs are preparing this future workforce to combat climate change, to design the grid infrastructure of the future, and to leverage new and emerging technologies in their own Chicago communities.

In order to safely offer programming during the pandemic, ComEd last year launched ComEd STEM Home Labs, its first-ever virtual program to provide 100 Chicagoland students with STEM engagement at home. Through this program, students worked with 20 ComEd engineer mentors to complete a series of five monthly STEM projects. In 2020, a total of 387 students in the City of Chicago were impacted by ComEd STEM Programs.



ComEd would propose to continue investing in the workforce of the future by continuing certain STEM programming. Below please find a summary of the menu of ComEd's STEM programming.

Getting Back to the STEM of Things - In August 2020, ComEd held a virtual session called Getting Back into the STEM of Things for young women in the Chicagoland area. The event introduced 24 high school students to renewable energy and engineering topics. The session involved a hands-on activity mentored by ComEd STEM professionals, during which students learned about the real-world application of energy concepts through building a smart house powered by solar energy. It also included a panel discussion by ComEd female STEM professionals to inspire high school girls who have an interest in STEM.

Create a Spark Freshmen - Throughout this program, high school students from HFS Chicago Scholars connect with ComEd's vast talent resources; mentors inform students about the energy industry and the many career pathways available. The program has the added benefit of helping students develop workplace skills that are vital to success in careers of any type. The proposed plan includes content and recommendations that would provide a view of career pathways including via 4-year college or skilled trades. HFS Chicago Scholars explore an overview of sustainability issues, including clean energy resources (wind, solar, hydro, nuclear), distributed energy resources, emerging technology, and conservation under the mentorship of ComEd engineers. The program also includes career planning and development of workplace skills. In 2020, Create a Spark Freshmen launched on January 18 and ended on June 13, engaging 47 students and 12 mentors in an 80-hour program. Create a Spark Juniors launched on September 12 and ended on December 5, engaging 40 students and seven mentors for a total of 75 hours.

3. NARRATIVE





Dunbar Energy Academy - The Dunbar Energy Academy offers students a learning experience specifically surrounding energy and the utility industry. Throughout the academy, students learn about a variety of energy-related topics through a ComEd-provided curriculum that includes hands-on labs, presentations, guest speakers, and field trips to our Chicago Training Center to hear from industry experts. The Energy Academy includes topics such as introduction to energy and generation, renewable energy, the grid, safety, industry careers, and more.

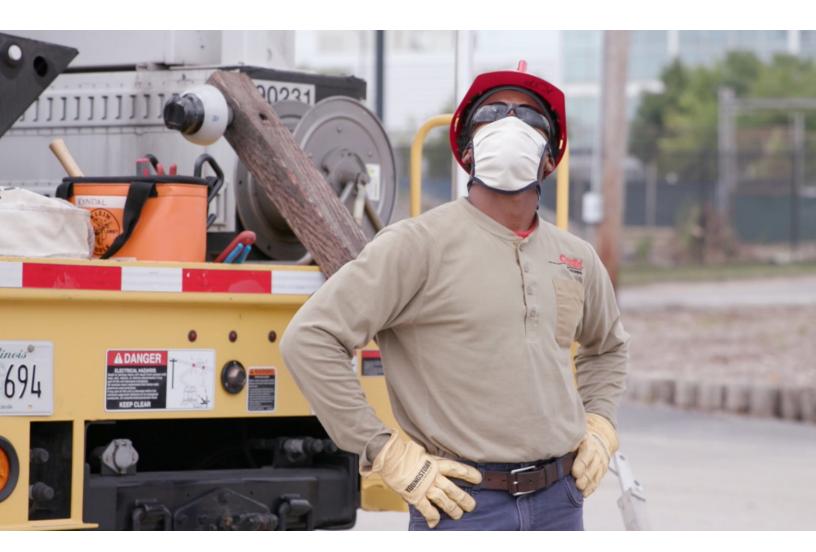
Youth Ambassadors - ComEd again joined with After School Matters to execute the Youth Ambassador program, which resulted in 119 Chicago students, ages 14-18 years, completing the program in 2020. Students participated in one of six online classroom groups. Participating teens took part in handson projects, learned about careers in the energy industry, and learned about the future of renewable energy in Chicago. In addition, ambassadors had opportunities to meet engineers and energy professionals, and to attend a virtual culminating event where they presented their final projects to ComEd professionals and mentors.

ComEd Scholars - Partnerships with three universities in which ComEd provides scholarships for students are central to our strategy to develop a pipeline to the company for internships and jobs, with a high-school-to-college approach. This strategy, supported by ComEd leadership, focuses funding in the most impactful way and builds a deep relationship between the student and company for recruitment. The scholarship program with UIC and IL Tech provides full scholarships for students for their sophomore through senior years. This scholarship fills the funding gap for students seeking degrees in electrical or mechanical engineering. The scholarship program with DePaul University provides a \$12,000 scholarship for students pursuing STEM-related discipline (especially IT) for their entire undergraduate career. This program also supports internship placements at the company for student scholars.

- UIC COMED SCHOLARS: ComEd partners
  with University of Illinois at Chicago to
  provide scholarships to fill the funding gap
  for second-year students pursuing electrical
  and mechanical engineering degrees for the
  remainder of their undergraduate career.
- IL TECH COMED SCHOLARS: ComEd partners with Illinois Tech to fill the funding gap for second-year students pursuing electrical and mechanical engineering degrees for the remainder of their undergraduate career.
- DEPAUL UNIVERSITY COMED SCHOLARS:
   DePaul College Prep ComEd Scholars who study at DePaul University in a STEM-related discipline (especially IT) receive scholarships in the amount of \$12,000 per year for their freshman through senior years.

#### **Governance and Transparency**

In addition to continuing to provide information regarding ComEd's performance and reliability in the Annual Report and reliability reports, which are submitted for review by City officials, including AIS and alderpersons, ComEd has appeared before the Committee on Environmental Protection and Energy on an annual basis together with AIS to assure the City that the grid is ready for summer weather. **ComEd would propose to make non-sensitive portions of the Annual Report available to the public.** In addition, ComEd has dedicated External Affairs Managers who are tasked with serving as the points of contact for key stakeholders across the City, including alderpersons in all 50 wards, as well as developing relationships with local community organizations, not-for-profits, schools, faith-based organizations, and others throughout the City. **ComEd is well-positioned to engage and does engage with a variety of stakeholders as a matter of course. ComEd would be open to engaging with appropriate stakeholders to ensure we have their valuable input and appropriate expertise on the subjects covered in any Energy and Equity Agreement.** 







#### **BENEFITS TO THE CITY AND RESIDENTS**

Both in this RFI response as well as in other discussions with the City around the franchise agreement, ComEd has laid out comprehensive, detailed proposals to achieve the City's goals – we know because they align with our goals as well.

Below we detail some of the benefits that our proposals will bring for the City of Chicago and its residents.

#### **Energy and Electrification**

- Our strategic grid investments will reduce the frequency of power outages in the City by 10%, as compared to the 2018-2020 average by December 31, 2042. This means 60,000 fewer customer outages per year by 2042, which represents approximately \$12 million per year in societal savings, including avoided business losses.
- ComEd's process and system enhancements will further streamline residential solar interconnections such that ComEd will process 90% of residential interconnection applications within the City within one day of submittal. This means a significant reduction in barriers for residential customers to adopt solar.
- ✓ Increased coordination between the City and ComEd will lead to more equitable access to solar energy, put Chicago on a path to 100% clean energy, and create significant environmental benefits. For every 1,000 residential solar installations, we will reduce carbon emissions by nearly 4,000 metric tons – the equivalent of planting around 70,000 trees.
- ComEd's proposal to fund the electrification strategy and roadmap will be a first-of-its-kind collaboration providing the City a comprehensive path forward to achieving its environmental goals and closing health equity gaps in Chicago. For every 10,000 new EVs, we will reduce carbon emissions by over 650,000 metric tons, creating over \$35 million in climate value and an additional \$20 million in health benefits by reducing lungdamaging tailpipe emissions.

- Our energy efficiency weatherization offerings would provide approximately \$35 million in customer savings.
- Including Chicago as a pilot city under the Plan 6 pilot would help the City access public sector offerings through comprehensive assessments which are estimated to identify \$2.25 million annually (equivalent to 25GWh) worth of savings through energy efficiency savings assuming the City invests the project identified.

# Equity and Neighborhood Development

- ➢ By addressing key program barriers through the Low-Income Collaborative, ComEd will use good faith efforts to achieve significant, specific targets for expanding PIPP and LIHEAP enrollments in the City, including:
  - Increase PIPP enrollments by 50% to 17,000 enrollments (compared to 2020 levels) per year in Chicago zip codes by 2026
  - Increase LIHEAP enrollments by 50% to 79,000 enrollments (compared to 2020 levels) per year in Chicago zip codes by 2026
- ✓ Goal to recruit 20% of new Construction Worker/ Overhead Helper classes from INVEST South/ West communities

- ✓ Goal to recruit 20% of new Customer Service Representative classes from INVEST South/West communities
- Provide full scholarships for five students from CONSTRUCT Infrastructure Academy to attend Dawson Technical Institute
- Collaborate with Chicago Public Schools to expand Chicago Builds electricity program
- Lead ComEd STEM Programming with potential to impact over 1,000 high school students

#### **Governance and Transparency**

- Structure and provide the Annual Report that can be publicly shared with City stakeholders
- Continue to appear before the Committee on Environmental Protection and Energy on an annual basis
- Host townhalls or other engagement opportunities to solicit input from the community around transportation electrification strategy and roadmap as well as other critical topics

We are hoping to take our historic partnership to the next level – to collaborate more closely than we have in the past – to ensure we continue to partner to achieve these ambitious goals efficiently and on a timely basis.



















#### **LESSONS LEARNED**

#### ComEd and the City of Chicago are already lighting the way right now for what promises to be an electrifying new path of grid modernization for utility/city partnerships over the next decade.

Beyond providing electricity, ComEd serves as an employer, central contributor to local economic development, and community partner in achieving the City's goals for safe and affordable housing, public safety, quality of life, and a clean environment. Our current and future energy-related investments provide opportunities that community organizations can leverage to achieve their development goals, such as increasing local job creation, building community skills levels, advancing revitalization projects, and helping greater Chicago achieve its air quality and greenhouse gas emissions targets.

ComEd's first Community of the Future, located in Chicago's Bronzeville neighborhood, serves as a prime example of what we can achieve with grid modernization, innovative energy engineering, advanced energy technologies, community investment, and community partnerships.

Community of the Future and its flagship project, the Bronzeville Community Microgrid (BCM), are already tapping into Bronzeville's tradition of innovation and hands-on community spirit to make this one of the greenest, most resilient, most connected neighborhoods in the nation. 2020 brought us even closer to achieving that goal we set in 2016. But what if we could go further? What if Bronzeville could become a model for scalable smart city transformation?



2020 BEST PRACTICES AWARDS

COMED

PRODUCT INNOVATION AWARD
FOR THE BRONZEVILLE COMMUNITY MICROGRID



Grid modernization is vitally important going forward, as the energy industry faces challenges ranging from extreme weather due to climate change, to increased threats of cyber terrorism, to aging infrastructure and a global pandemic. Our electric grid is the foundation of our resilience against all forms of disaster. Although the challenges we face are considerable, they also provide an opportunity for us to work together to achieve our common goals of resilience and sustainability. The strides being made in grid modernization, advanced energy technologies, and community investment give us reason to hope for an illuminated future, lit with a STEM-prepared workforce, new jobs in renewable energy, and decarbonization.

Community of the Future and the Bronzeville Community Microgrid are demonstrating this progress in partnership with the City of Chicago and stakeholders like Chicago Public Schools, Chicago Housing Authority, local businesses, and many others who are making the smart city dream into a reality.



This year, ComEd continued our path toward smart city illumination with Bronzeville as the inaugural location for the Community of the Future program. We are demonstrating networked resilience, a model that starts with innovative energy technology and branches out to enhance the holistic resilience of the surrounding community. From STEM programming to off-grid renewable lighting and an augmented-reality public art mural, ComEd's Community of the Future is a model of not just grid transformation, but community investment that yields increased local resilience.

In 2020, ComEd continued quarterly meetings with the Bronzeville Community Advisory Council (CAC) and established a more formalized approach for collaboration with other members of the community.

In addition to the four CAC meetings held in 2020, we hosted two ideation sessions to include valuable input from members of the community that yielded suggestions to broaden the representation of CAC membership in terms of age and socioeconomic status. We are now working to on-board new CAC members considering this suggestion. We have been intentional about maximizing the relationship with the members of the CAC by adjusting the meeting format to encourage a more collaborative interaction.



## Enhancing the Foundation with the Bronzeville Community Microgrid

As the foundation on which Community of the Future is built, the Bronzeville Community Microgrid (BCM) is one of ComEd's most exhilarating projects, providing the opportunity to demonstrate technologies that increase sustainability and resilience. Many of the advanced energy technologies being demonstrated are helping us integrate large quantities of distributed energy resources, from solar PV to electric vehicles and advanced charging infrastructure, all in the service of enhancing resiliency. In 2020, ComEd has made considerable progress on Phase II of the BCM project, including feeder reconfigurations, communications network installation, and a controllable generation award.

ComEd's buildout of the microgrid communications network in 2020 added fiber communications to all major assets within the microgrid footprint, providing additional benefit to Chicago customers within the footprint, as feeder reconfiguration work included upgrading several critical microgrid customers. In January 2020, ComEd's microgrid master controller, which can operate either one microgrid or a microgrid cluster, was delivered to ComEd's Grid Integration and Technology Lab for testing, a critical step for ensuring this technology's success in the field.

As a part of the Community of the Future initiative, since 2018, ComEd has also surged its Energy Efficiency Program in Bronzeville. This has included outreach, marketing, and educational campaigns, to drive participation in offerings for multifamily buildings, small and large businesses, public sector customers, and homeowners. As a result of this work, ComEd's EE programs have led to 29.6 GWh of energy savings in Bronzeville since 2018, an approximate 11.8% reduction in the community's total energy usage.



### The Inspiring Art of ComEd's Community of the Future

Meaningful art has been a signifier for advanced and thriving communities since the beginning of civilization, and we are honored to contribute to a long and nuanced history of art in Bronzeville through the Community of the Future.

#### Bronzeville Renaissance Mural

The augmented-reality Bronzeville Renaissance Mural was installed in July of 2020 with local partners Gallery Guichard, Before It's Too Late, Little Black Pearl, and the South Side Community Art Center. Local artists Rahmaan "Statik" Barnes and Shawn Warren provided the creative spark from which technology, history, education, and art culture ignited to light a neighborhood beautification project the city can take pride in. The mural celebrates the cultural legacy of Bronzeville's past while raising awareness of climate change and focusing on Bronzeville's innovative clean energy future. Located on a microgrid battery storage wall, the mural stands not just as a symbol of community celebration but also as a symbol of the clean energy technology that is transforming the neighborhood's future.

In a call for connection to the deepest roots of Bronzeville's history, ComEd hosted the first Bronzeville Film Festival Virtual Awards Ceremony in August 2020 with the DuSable Museum of African American History, celebrating short documentary films from high school and college students on the past, present, and future of Bronzeville, for a prize of \$5,000 in scholarships and sponsorship in an international film festival.

This project not only demonstrates ComEd's commitment to celebrating what the community of Bronzeville was, and is, but also our commitment to ensuring the future of what Bronzeville and its residents will become.



#### Resilience in ComEd's Community of the Future

It is not enough for a community to have the appearance of vibrancy. A Community of the Future must have the underlying interconnection to fuse economic, technological, and social vitality to build resilience. We expanded our network of resilience this year by deploying two new Smart Kiosks in Bronzeville, located at the corners of 47th Street and Dr. Martin Luther King Jr. Drive, and 35th and State Streets. The first smart kiosk was installed at 35th and MLK. The Smart Kiosks provide free, easy access to vital, real-time information, including weather notifications, emergency alerts, public transportation route tracking, wayfinding, local business promotion, and neighborhood events.

Simultaneously, this year, we tested the resilience of the Bronzeville Community Microgrid with a disaster simulation exercise in November to evaluate the societal impacts of the microgrid during a disastrous event. This effort is contributing to ComEd's commitment to estimate the benefits of the Bronzeville Community Microgrid and quantify the value of resilience. This effort was led by ComEd, in partnership with The National Center for Disaster Preparedness at Columbia University's Earth Institute, and participants included Illinois Institute of Technology, Chicago Office of Emergency Management and Communication, Chicago Police Department, Chicago Fire Department, and organizations from the Bronzeville Community, such as Bright Star Church, Chicago Public Schools, Mid-South Business Association and Resource Center, and the Renaissance Collaborative.

#### **Expanding Community of the Future**

With Bronzeville's Community of the Future as a model, we seek to continue our tradition of partnership with local stakeholders, community members, and institutions to create "smart communities" in the Chicago area, where the smart grid and a host of other technologies and related services are fully leveraged to enhance the everyday lives of community members.



As a company, we want to partner with communities to help foster the vision that they have for themselves. The success of our inaugural Community of the Future program in Bronzeville is not only in the technology that has been deployed, but also the people's lives that have been impacted. Expanding this model into other Chicago communities allows us to share this vision and expand our impact. Over the next three years, ComEd will expand our footprint within our service territory with a community-focused approach to innovation within the built environment. Our selection criteria enable us to select communities with high needs in socioeconomic, environmental, technical, and exposure categories, and high levels of social capacity to build and sustain long-term relationships. Our community partnerships foster innovation in smart technology adoption, mobility, workforce development, and STEM education. A vision for expansion allows us to cultivate relationships and measurable impacts across the Chicago area toward energy justice and community innovation.





#### **NEXT STEPS**

Beyond the company's vast experience, operational excellence, and strong qualifications, ComEd's values are part of our daily operations and our commitment to the region. We define ourselves through how we operate and what we believe. Our values reflect the principles we stand for and guide our actions and our interactions.

#### **Our Values**

- We are dedicated to safety.
- We actively pursue excellence.
- We innovate to better serve our customers.
- We act with integrity and are accountable to our communities and the environment.
- We succeed as an inclusive and diverse team.

ComEd looks forward to the opportunity to provide more detail on how the company will build on our longstanding partnership with the City to continue as Chicago's electric delivery provider.

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