

COMMUNITY BENEFITS PLAN

OVERVIEW

The Community Benefits Plan is designed to help ensure broadly shared prosperity in the clean energy transition, including access to jobs and other economic opportunities. We propose to accomplish this through activities in the four components described in the following sections: (1) Community and Labor Engagement, (2) Investing in the American Workforce, (3) Diversity, Equity, Inclusion, and Accessibility, and (4) the Justice40 Initiative. Implementation of this Plan will improve ties between the electric industry and community, environmental, labor, and workforce development organizations in northern Illinois and the Lower Rio Grande Valley area of Texas. We will provide training to the existing workforce and help train the future workforce through *Smart Grid Leaders* university programs. Finally, successful installation of SmartValves will reduce harmful emissions and increase community access to affordable, clean energy and smart grid technologies.

1. COMMUNITY AND LABOR ENGAGEMENT

1.1 Goals and Framework

The goals of community and labor engagement are to: (1) build off existing relationships and develop new relationships with diverse labor and community organizations, (2) receive feedback from these organizations that may improve project implementation; (3) develop workforce and community benefits agreement(s); and (4) communicate project opportunities and benefits to promote community support and buy-in.

The project team will engage community and labor stakeholders early and throughout project phases to receive feedback and guidance on how best to include these groups in the process. Stakeholders include workforce organizations, labor unions, local businesses, state and local workforce development boards, American Job Centers, Pre-Apprenticeship Programs, Registered Apprenticeship Programs, Tribal Engagement, and two universities: with a focus on those most impacted by project development.

The affected project districts face challenging health and workforce development issues, compounded by historical practices that limit resident access to reliable jobs.

1.1.1 Community Engagement

Northern Illinois. In 2019-2020, Algonquin engaged with the village of Paw Paw, IL in formal community meetings to explain the benefits and answer questions on the proposed Shady Oaks II Wind Project. The meetings resulted in the approval for construction, and eventual development of a signed Community Benefits agreement. As described in the Technical Volume, the Shady Oaks II Wind Project is already constructed but unable to interconnect to the transmission system due to stability concerns. One of the major benefits of the agreement is annual payments to the Village which only become effective upon commercial operation of Shady Oaks II. This project would enable Shady Oaks II to connect to the grid, thus achieving commercial operation and allowing all the benefits of the agreement to be realized.

The Village of Paw Paw supports this proposed project to DOE, and is eager to finally realize the full benefits of the community benefits agreement. Both Algonquin and the Village of Paw Paw

have agreed to continued community meetings, keeping residents informed about every aspect of the SmartValve installation.

Algonquin has also secured support from Lee County as well as the Paw Paw Community Fire Protection District and the Compton Fire Department, all of which recognize the benefits this Project can bring to the local community and its residents and have expressed a willingness to partner with Algonquin on future community meetings to ensure such benefits, including tax benefits, are communicated to local residents and officials.

Algonquin plans to provide additional outreach to the following environmental and community organizations near the site installation: Illinois Environmental Council; Illinois Clean Jobs Coalition (representing more than 200 consumer, business, environmental, environmental justice, health care, faith-based and student organizations); Illinois Environmental Council; Natural Resources Defense Council; Central Illinois Healthy Community Alliance; RE-AMP Network; and Little Village Environmental Justice Organization.

Lower Rio Grande Valley (LRGV) and Gulf Area, Texas. As part of this proposal, Algonquin has contacted several organizations committed to environmental justice in the Rio Grande Valley. We have expressed to them our interest in partnering to hold regular community meetings and develop community benefit agreements. Further outreach will be provided to the following environmental and community organizations near the site installations: ARISE, Another Gulf Is Possible Collaborative, Chispa Texas, Taproot Earth, and Lower Rio Grande Valley Sierra Club.

1.1.2 Labor Engagement

Northern Illinois: Algonquin has a history of engagement with unionized labor. Algonquin hired White Construction as one of the major contractors in the construction of the Shady Oaks II Wind Farm. White is a union contractor with active partnerships with a number of unions including the International Brotherhood of Electrical Workers (IBEW). The installation of the SmartValves in Illinois will be done by contractors hired by Commonwealth Edison an Exelon Company (ComEd). Algonquin strongly prefers that high-voltage construction work, which includes work with substations and switching stations as well as on transmission lines, be done by local IBEW electric subcontractors. If awarded, Algonquin will strongly encourage the use of unionized labor. This will require outreach to unionized contractors to provide opportunity to submit bids for the work. Where construction activities are directly managed by the prime recipient, union labor will be required. Fortunately, ComEd has a long history of using organized labor for its work, and Algonquin is confident they will select unionized crews. The IBEW local 196 serves the City of Dixon in Lee County, Illinois, where the SmartValves would be installed. Further, Algonquin has researched ComEd's approved contractor list and note that all of the overhead and underground transmission-related contractors are unionized.

Lower Rio Grande Valley and Gulf Area, Texas: Algonquin has a history of ensuring that labor local to the area are hired when building infrastructure. For instance, Algonquin constructed and now owns and operates the 492 MW Maverick Creek Wind Facility in Concho County Texas. The Company's Energy, Procurement, and Construction (EPC) contractor, RES, has an office in Weatherford, Texas and hired local labor sub-contractors and workers in and around the Concho County area during the multi-year construction process. Algonquin would require

engagement with unionized labor through outreach and ensuring opportunities to provide bids, and similarly encourage AEP to hire unionized labor whenever possible for the installation of the SmartValves.

1.2 Social Characterization Assessment

The SmartValve installations are sited in two different locations, in northern Illinois and the Lower Rio Grande Valley region of Texas. SmartValve manufacturing takes place in St. Petersburg, FL. Key demographic information for these locations is summarized in Table 1 (from US Census Bureau, 2020).

Table 1. Demographic data for project locations

%	Lee County, IL	Dekalb County, IL	Cameron County, TX	Hidalgo County, TX	St. Petersburg, FL
White (not Hispanic)	90.6	74.0	8.5	5.7	63.9
Black /African American	6.4	9.0	0.9	1.0	21.0
Hispanic	7.2	12.6	90.0	92.6	8.2
Poverty rate	13.2	14.2	24.6	33.1	12.4
No health insurance	5.9	7.4	29.9	28.8	12.7

Moreover, extensive disadvantaged communities in Texas and Florida are within the same or adjacent municipal jurisdictions to both the SmartValve installation locations and manufacturing facility. Utilizing the EPA's EJSCREEN tool, environmental and socioeconomic challenges in the project areas are highlighted in Table 2.

Table 2. Environmental and Socioeconomic Challenges in Project Areas

Locale	Indicator	Percentile
Lee County, Illinois	Particulate Matter (PM 2.5)	71 st
Some parts of county	Unemployment rate	54 th
	High rate of children under 5	86 th
	High rate of adults over 65	75 th
Texas – Lower Rio Grande Valley (LRGV)	Particulate Matter (PM 2.5)	99 th
	High cancer risk	95 th
	Unemployment rate	97 th
	Limited English speaking rate	89 th
Sections of St. Petersburg, FL	Particulate Matter (PM 2.5)	72 nd
	Unemployment	98 th
	Low life expectancy	99 th

1.3 Two-Way Engagement

We will proactively engage these diverse communities as well as local businesses for meaningful participation in the program, which will offer unique opportunities to attract and utilize a local workforce. In addition to one-on-one direct contacts, we will hold four information sessions (two sessions in each of the two project regions). The information sessions will present information on the project scope and benefits, inform the community of university scholarship opportunities, and include question-and-answer time as well as opportunity for feedback from community members.

One of the key benefits of the SmartValve solution is the overall minimal impact to neighboring communities around the installation sites. Communities will appreciate that equipment can be installed within the substation fencelines, thus avoiding disrupting communities and their residents with being unable to access existing or expanded transmission right-of-ways. Further, the construction timeline is 6-8 months, far shorter than the often experienced transmission line construction work timelines that can impact communities for more extended periods. Agreements with community organizations will center on listening sessions to further explain these benefits and the ability of lower-impact grid modernization projects on customer bills and jobs in electric infrastructure construction and maintenance. Input from community leaders on topical priorities will help guide further communication about job opportunities and project benefits.

1.4 Workforce and Community Agreements Statement

SmartValves will be installed either within the same municipal jurisdiction as the renewable energy projects, or just outside the municipality along the transmission lines connected to the projects at associated substations. As a result, the project team will prioritize developing relationships with municipalities, economic development organizations, and environmental protection organizations with close ties to the generation facility and SmartValve installation locations.

Algonquin has already committed to funding a community benefits agreement with Village of Paw Paw, located in Lee County, Illinois, home of the Shady Oaks II Project, which is detailed in Section 1.1.1. Further, during the permitting phase of the Shady Oaks II Project, Algonquin engaged with landowners in the Village of Paw Paw and Lee County. Algonquin was able to enter into a number of agreements with approximately two dozen landowners with property on and near where Shady Oaks II was constructed. However, a number of benefits, which include both one-time and recurring payments, within these agreements only become effective upon commercial operation of the Project. The proposed project will enable the interconnection of the Shady Oaks II project, and thus both landowners and the local community have strong interest in interconnecting Shady Oaks II so that these full benefits can be realized.

Similarly, in the LRGV region of Texas there are approximately 17 wind generating facilities, each of which likely has agreements with landowners and other community benefit arrangements. Many of the payments associated with these types of agreements are tied to the actual generation realized from the facilities. As a result of the generator curtailments required because of the Generic Transmission Constraints, such payments are currently reduced. The proposed project would help to alleviate the transmission constraints, thereby helping to increase the level of payments being made to landowners and the local communities in this area.

Because of the wide geographic reach of these projects, the project team has an opportunity to establish a broader coalition of supporting entities than is typically seen for renewable or substation-based projects.

The crux of planned, near-term community benefits agreements between the partners as relates to this project includes:

- **Emissions reductions** engendered by the successful SmartValve installations. Using clear and documented protocols for quantifying emissions before and after project commissioning, one or more evaluators (e.g., university researchers in conjunction with project partners) will be added to the project team to certify anticipated results.
- **Commitments** to support future training programs for the union workforce on SmartValve installation and ongoing operations and maintenance activities.

Combined, these agreements provide a comprehensive approach to ensuring local stakeholders are adequately motivated to support SmartValve deployments in mutually beneficial ways, creating opportunities for new careers in the green economy for these local communities.

1.5 Workplan for Community and Labor Engagement

The work plan for Community and Labor Engagement is summarized in Table 3 and discussed in more detail in the Statement of Project Objectives (SOPO).

Table 3. Workplan for Community and Labor Engagement

Task 7.1 - Workforce and Community Benefit Agreement Negotiations	Months 1-6
Task 7.2 - Community Listening Sessions	Months 7-10

2. INVESTING IN THE AMERICAN WORKFORCE (IAW)

2.1 Goals and Framework

The goals of Investing in the American Workforce are to: (1) engage with diverse labor workforce partners who will assemble and install SmartValve devices, (2) train the current workforce in SmartValve procedures and maintenance, and (3) train and support a future diverse workforce in the latest SmartGrid technologies, including SmartValve.

Use of Labor Workforce. Algonquin and Smart Wires will work with local transmission owners to engage and support their use of local and unionized labor wherever possible for the substation-based civil and electrical work associated with SmartValve installations.

Current Workforce Training. Training and education of qualified electrical workers on the safe and proper installation, operation, and maintenance practices of SmartValve units will be supported for all deployments. Algonquin and Smart Wires will engage local qualified electrical worker leadership to ensure their participation and expertise to guide required substation modifications. Establishing these labor relationships at the onset of the project will also help inform plans for regional activity, as this program has been designed to catalyze further adoption and SmartValve installations across these regions. Given the innovative nature of SmartValve units, Smart Wires will allocate significant on-the-ground resources to ensure the local workforce (either at the utility or through a preferred local contractor) is trained in safe installation, operation, and maintenance activities.

Future Workforce Training. A major component of the skilled workforce development program involves partnerships with two higher education institutions regionally co-located with

SmartValve installations: Federally designated Hispanic Serving Institution University of Texas Rio Grande Valley and Northern Illinois University Electrical Engineering departments play an important role in training future electrical utility and system operator professionals. The project team is committed to helping develop local talent with financial and technical support, while modernizing faculty coursework to match the industry standards driving SmartValve installations.

2.2 Use of Labor Workforce

Smart Wires is committed to growing and upskilling its domestic manufacturing capabilities, based in St. Petersburg, FL. Support from the DOE for the program detailed in this project will organically grow the demand for SmartValve units, eliciting capital infusion and associated workforce expansion at the SmartValve assembly facility in St. Petersburg. Smart Wires aims to diversify its component supply chains to account for global uncertainties and is eager to cost-effectively source parts from local and regional suppliers.

Comprehensive workforce agreements will be negotiated with utility and local labor organizations. The construction, operation, and maintenance and/or future expansion of the SmartValve installations will lead to new green and permanent U.S. career jobs, as an outgrowth of new training programs in advanced power generation, transmission, and distribution of complex networks. Algonquin acknowledges the Davis Bacon requirements set forth through the Bipartisan Infrastructure Law, and confirms that all laborers and mechanics performing work as a result of this FOA will be paid wages at rates not less than those prevailing on projects of character similar in the locality as determined by the Davis-Bacon Act.

2.3 Current Workforce Training

Workforce recruitment. Listening sessions with utility and local labor organizations will be offered, which describe the opportunity for increased transmission infrastructure construction activity to support grid modernization efforts, such as the SmartValve project. Special consideration will be given to union workers with experience or demonstrated interest in growing their technical skillset. Field staff from each of the project partners will help run these listening sessions and answer questions from their peers about the technologies and their intricacies. These staff will simultaneously vet potential hires. The strongest argument to attract skilled workers will be the opportunity for competitive pay in a field with a tremendous amount of activity required to meet legally binding private and public commitments to modernize the electric grid. The in-built apprenticeship programs associated with electrical transmission work also provide a clear progression path for new hires to understand when and how their careers will advance.

Training sessions. Training sessions will be provided to utility and local labor organizations on SmartValve installation, operation, and maintenance topics.

2.4 Future Workforce Training

There is significant need for workers with knowledge and skills necessary to implement Smart Grid technology, particularly at a time when Texas, Illinois and the country are facing so many grid-related challenges. Through this project, a **Smart Grid Leaders** future workforce training

initiative will be offered in partnership between Algonquin, SmartWires and the **University of Texas Lower Rio Grande Valley (UTRGV)** and **Northern Illinois University (NIU)**.

UTRGV is a federally-designated Hispanic Serving Institution in Edinburg, Texas, with a 93% (21,848) Hispanic undergraduate students. 64% receive Pell Grants, which are awarded to students with demonstrated financial need. The Department of Electrical and Computer Engineering serves over 370 electrical engineering undergraduate students and 420 computer engineering undergraduate students. The Department has 19 full-time faculty, 12 teaching and research labs, and accreditation by the Engineering Accreditation Commission of ABET.

NIU is located in Dekalb, Illinois with 20% Latinx and 17% black student population. Over 43% of its students receive Pell Grants. The College of Engineering serves 23% Latinx and 13% black undergraduate students and is accreditation by the Engineering Accreditation Commission of ABET.

The *Smart Grid Leaders Initiative* will provide scholarships and specialized support to 20 low-income, diverse, academically talented, undergraduate electrical engineering and computer engineering students. The universities will provide outreach through their existing recruitment efforts targeting underrepresented and disadvantaged high school seniors, promoting the Smart Grid Leaders initiative. Students will be admitted into the *Smart Grid Leaders* program on the basis of unmet financial need, determined by the universities financial aid offices, as well as student academic talent and interest. Scholarships and support services will be provided to 10 students at each university, starting in their freshman year following them through their senior year. Smart Wires and other Smart Grid industry leaders will provide mentorships, field work opportunities at the SmartWires installations sites, and a seminar series to these students throughout the academic year and the grant period. The Initiative will also facilitate summer internships for the *Smart Grid Leaders* through partner organizations' industry connections.

Additionally, the *Smart Grid Leaders Initiative* will provide faculty and course development, building off the significant experience of faculty and strength of existing courses, but with specialized content on the latest Smart Grid technology and challenges.

2.5 Workplan for Investing in the American Workforce

The work plan for Investing in the American Workforce is summarized in Table 4 and discussed in more detail in the SOPO.

Table 4. Work Plan for Investing in the American Workforce.

Task 7.3 - Undergraduate Scholarships	Months 7-54
Task 7.4 - Undergraduate Summer Internships	Months 10-46
Task 7.5 - Utility and Labor Organization Training Sessions	Months 14-15

3. DIVERSITY, EQUITY, INCLUSION, AND ACCESSIBILITY (DEIA)

3.1 Goals and Framework

Our goals for DEIA are to: (1) build on DEIA practices to recruit project staff at organizations directly participating in the project; (2) reach out to diverse businesses and community

organizations to communicate job and contract opportunities and project benefits; and (3) partner with universities (including a federally designated Hispanic Serving Institution) for scholarships and support services targeted for underrepresented and disadvantaged students. DEIA measures will feature recruitment, workforce development, and community and business engagement activities.

3.2 DEIA for Project Staffing

Algonquin DEIA Recruitment. Within Algonquin, the online service *Diversity Jobs powered by Circa* is used to ensure that job postings are posted on the widest possible variety of cultural group job boards, to increase reach into the widest talent pool practicable. Moreover, the company's recruitment professionals undergo a comprehensive training process to help build and enhance their diversity and inclusion talent acquisition practices.

Smart Wires DEI Practices. Smart Wires has established a Diversity, Equity, Inclusion, and Belonging (DEIB) Committee comprised of employees from a broad mix of backgrounds and seniority who are committed to identifying and breaking down barriers to DEI in our workspace and beyond. The committee and company strive to promote diversity by fostering relationships, drawing representation, and encouraging leadership in the communities in which we live and work. Foundational to the mission is promoting a culture of safety, respect, and appreciation for all employees, regardless of race, gender, religion, ethnicity, disability, or sexual orientation. DEIA for Business and Community Outreach

Business Outreach. Algonquin and Smart Wires plan to raise awareness of related construction contracts to qualified minority-owned and/or disadvantaged local business enterprises to further support the community and bring about economic justice. This will be done at town-hall meetings, in- person or virtually as well as via print and social media venues, while providing communication materials in languages relevant to the communities.

Community Outreach. As discussed in Section 1: Community and Labor Engagement, the project team has worked to identify economic development, environmental justice advocacy organizations, and community leaders. These organizations and leaders will help guide the content and distribution plan for community benefits information and job opportunities associated with SmartValve installations, operations, maintenance and any potential future expansion. Informing and educating these organizations as valued and equal project partners in decisions related to workforce retention and community benefits realization is a key facet of the program. To address energy democracy and community ownership of opportunities brought about by SmartValve deployments, our project team will plan presentations and workshops at Community Listening Sessions on opportunities to participate in the project. Engaging with local underserved communities in energy transition job opportunities related to both the renewable energy and adjacent services industry will also underpin the comprehensive DEIA goals of this program. The outreach plan will include communicating project benefits, such as utility bill cost savings, greenhouse gas reduction, and minimal environmental impact to these communities.

3.3 DEIA for Future Workforce Recruitment

Partnerships with Institutions of Higher Education. As discussed in Section 2: Workforce Development, the project team aims to leverage the innovative technological approach and local impact by partnering with institutions of higher education in Illinois and Texas. The *Smart Grid Leaders Initiative* will provide scholarships and specialized support to a total of 20 low-income, diverse, academically talented, undergraduate electrical engineering and computer engineering students at both Hispanic Serving Institution UTRGV and NIU (10 at each institution). NIU's Division of Academic Diversity, Equity and Inclusion helps a diverse student population (over 55% non-white, including 13% black and 23% Hispanic in the College of Engineering) to succeed in their educational goals, find supportive communities and graduate with the skills and experience to succeed. Student organizations representing diverse student cohorts include the National Society of Black Engineers, Society of Hispanic Professional Engineers, and Society of Women Engineers.

Smart Wires and other Smart Grid industry leaders will provide mentorships and a seminar series to these students throughout the academic year and the grant period. We will also facilitate paid summer internships for the *Smart Grid Leaders* at partner organizations.

3.4 Workplan for DEIA

The work plan for Investing in the American Workforce is summarized in the SOPO.

Table 5. Workplan for DEIA

Task 7.2 - Community Listening Sessions	Months 7-10
Task 7.3 - Undergraduate Scholarships	Months 7-54
Task 7.4 - Undergraduate Summer Internships	Months 10-54

4. JUSTICE40 INITIATIVE

4.1 Goal and Framework

The primary goal of the Justice40 Initiative is to demonstrate that at least 40% of the direct and indirect benefits of climate and clean energy investments flow to disadvantaged communities.

The program detailed in this proposal will significantly and directly benefit disadvantaged communities throughout Illinois, Texas, and Florida, as well as the disadvantaged university students who will benefit from the Smart Grid Leaders programs. Based on the criteria recognized by the Council on Environmental Quality Climate and Economic Justice Screening Tool, numerous disadvantaged communities are in and around the proposed SmartValve installation and manufacturing sites in all three states.

SmartValve installations represent a superior economic and environmental solution to unlock the delivery of renewable energy. Disadvantaged communities tend to bear a disproportionate share of the burden associated with the development of traditional network upgrades. The excess costs of unnecessary transmission line construction and upgrades drive up energy costs, which disproportionately harm disadvantaged communities whose residents pay a larger proportion of their total income towards utility bills. SmartValve installations can be orders of magnitude less expensive than traditional solutions, and reduce the need for fossil fuel-based energy generation. Transmission lines have also historically been sited and constructed right

through these very same disadvantaged communities. SmartValve installations are flexibly sited in existing substations, avoiding the environmental impact and community disruption of mobilizing and conducting utility infrastructure work in the midst of a community.

4.2 Project Benefits and Where They Flow

The local electrical industry and skilled manufacturing workforce, students, young families, and the elderly represent a broad cross-section of stakeholders to be affected and receive health and unemployment-reduction benefits from the proposed project. In particular, the skilled electrical and manufacturing workforce and students are likely to receive most of the direct, quantifiable economic development benefits.

Benefits will flow to the communities in Texas and Illinois through:

- Decreased environmental exposure and burdens as the associated renewable energy projects come online and are able to deliver their rated power to the grid.
- Reduced need for higher-emission fossil generation.
- Expectation of reduced cost of electricity to community users.
- Increased parity in community access to clean energy and smart grid technologies, bringing knowledge sharing and job opportunities to historically underserved communities as a result of project team's conscious decisions to work in the targeted communities in Texas, Illinois, and Florida.
- Opportunities for contracting minority/disadvantaged business enterprises, either directly through the project team or with the host utility's preferred subcontractors.
- Listening sessions with community organizations and businesses that will provide a clear outlet for raising awareness of career opportunities in renewable energy and smart grid technologies.
- Increasing power delivery and reducing the risk of customer outages to vulnerable communities during challenging extreme events, through SmartValve's enhanced network resiliency.
- Scholarships and support services to disadvantaged students in the Smart Grid Leaders university program.

This project represents a foothold for growing market adoption of SmartValve in Texas and Illinois, knocking down a barrier for even greater renewable generation build-out. Both of these sites require a strong pipeline of related jobs and associated training to make sure the local workforce is adequately prepared for the next phase of grid infrastructure investment.

4.3 Negative Impacts and Where They Flow

There are very few negative impacts stemming from these SmartValve installations because they can be installed on or adjacent to existing substation land or other small parcels. Unlike conventional transmission line upgrades, installation crews do not need to access transmission line rights-of-way, which can be damaging to the environment and a frustrating inconvenience for community members.

Minor negative project impacts may include:

- The operational noise of the SmartValve devices when in-service can be noticeable to individuals walking near the substation, but this is strictly defined by and set to match standards of other substation equipment, and therefore legally mitigated by the perimeter fence line of the substation.
- Some installation activities will require construction equipment to travel to and access the site, which may slightly increase traffic in the area, though this will be for a limited period of time and will be contained within the substation land footprint.

4.4 Information Gaps

One of the biggest challenges for proposers and evaluators of any transmission investment is determining and validating the associated impact to end-user electricity bills. Several strategies exist to model production cost savings and translating these to end-user electricity bills, however this has not been done to date for SmartValve network upgrades that support increased renewable energy deliverability and interconnection. Support from DOE and several project team partners to model these impacts and validate them with community members is a high priority for the project team to ensure that Justice 40 initiatives are met through this project. Engaging university students funded through this project to help research and analyze the project's impact on end user electric bills will be another means of providing communities with some ownership over the ultimate benefits that flow to their constituents. This research will culminate in a white paper on SmartValve impact to electricity bills in Texas and Illinois.

4.4.1 Assessment of Barriers to Realizing Benefits and Minimizing Negative Impacts

With the passage of the Inflation Reduction Act of 2022, the primary economic factors influencing domestic renewable energy generation growth were set into law, namely the 8 to 10 year commitment to tax subsidies for wind and solar generators. This level of certainty has allowed renewable energy developers to increase their pace of development and commitments to workforce expansion in regions of high renewable energy potential, such as Texas and Illinois. Therefore, the renewable growth and electricity bill reductions are inherent in the project and not reliant on many external factors. Barriers to benefits accruing to end users could be tied up in the financial structures and accounting mechanisms of some electricity markets. Working closely with the host utility and community members will help identify appropriate structures to ensure benefits can be tracked.

One potential barrier to minimizing any negative impacts of the project could be a lack of available footprint in the often-rural substations in Texas and Illinois, necessitating additional small parcel land acquisitions for SmartValve installation. The primary method of overcoming this barrier is by incorporating siting feasibility into the solution optimization process. This allows substation engineers and surveyors to provide on-the-ground knowledge of substation equipment and flexibility for new equipment installation, which often differs from formal utility records and drawings of their substation assets.

4.5 Workplan for Justice40 Initiative

The Workplan for the Justice40 Initiative is summarized in Table 6 and discussed in the SOPO.

Table 6. Workplan for Justice40

Task 7.6 – Electricity Bill Research and Analysis**Months 21-24****5. PROJECT OUTCOMES**

There will be clear expected outcomes for the Community Benefits Plan as follows.

Community and Labor Engagement:

- Improved ties between community/municipal workforce development and environmental organizations and the broader electric industry, including both renewable generation development firms and electric utilities.
- Emissions reductions from increased renewable generator power output engendered by the successful SmartValve installations.

Investing in the American Workforce:

- Reinforcement of union labor selection and enhanced long-term opportunity for workers with experience or demonstrated interest in growing their technical skillsets.
- Redesigned electrical engineering undergraduate curricula to include Smart Grid topics, and student scholarships and summer internships through the *Smart Grid Leaders Initiative* at two higher education institutions.

Diversity, Equity, Inclusion, and Accessibility:

- Increased parity in community access to clean energy and smart grid technologies.
- Increased power delivery and reduced risk of customer outages to vulnerable communities during challenging extreme events, through SmartValve's enhanced network resiliency.

Justice40:

- Establishment of community-based emissions and electricity bill analysis capabilities; improved engagement with state public utility commission rate cases on utility electricity rates.
- Decreased environmental exposure and burdens with fewer fossil fuel peaker plants required to serve community electrical load.

6. RESOURCE SUMMARY

In total, about **\$1.3 million** of the total project budget will be allocated to support the Community Benefits Plan. Portions of staff time for the Project Manager, Community Benefits Manager, Project Coordinator, and Legal Support will be dedicated to implementing the plan, with their combined salary/benefits valued at about \$300,000. In addition, the two university subawards are budgeted at about \$500,000 each (\$1 million total). These resources will support all four program areas roughly equally: Community and Labor Engagement, IAW, DEIA, and Justice40.