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United States Conference of Mayors
Business Council 2019 Best Practices Report:

Mayors and Businesses Driving Economic Growth

2019

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Foreword

The United States Conference of Mayors is proud of the members of the Mayors Business Council and the work they have accomplished with cities to improve the quality of life in America's cities. Working together, our cities have become more livable and more competitive, and the economy is growing stronger every day.

The *United States Conference of Mayors Business Council Best Practice Report*: *Mayors and Businesses Driving Economic Growth* showcases outstanding and innovative public/private partnerships submitted by the Mayors Business Council to inspire other cities and companies to work together in addressing the economic challenges facing cities and our nation.

Mayors and business leaders agree that creative public/private partnerships are a major force in shaping cities of the 21st century and experience has shown when businesses and local governments work together, our cities benefit and our nation is stronger.

The Mayors Business Council has been an integral part of the structure and activities of The United States Conference of Mayors for over 15 years. Central to the mission of our Business Council is the goal of both improving the business environment in cities and sharing the successful public/private partnerships that take many forms with benefits ranging from economic development and environmental improvements to better schools, a more educated workforce, and connected cities through technology.

The Conference looks forward to strengthening its relationship with the business community by nurturing and celebrating the new and creative partnerships between cities and businesses.

Tom Cochran
CEO and Executive Director
The United States Conference of Mayors

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Airbnb: Project 612

Project Description: Airbnb collaborated with the Twin Cities to substantially expand lodging capacity for the 2018 Big Game, thereby welcoming thousands of additional guests and maximizing the region's economic impact.

City Challenge: Even with a recent hotel boom, the Twin Cities possess only about 40,000 hotel rooms, which is less than half of Houston, the host city in 2017. According to news sources, the Twin Cities was expected to host about 125,000 visitors for the game, over three times the number of hotel rooms available. Nearly half of those hotel rooms were reportedly snapped up immediately by the NFL. Minneapolis hotels were reported to have been already sold out a year prior to the game. This left the Twin Cities in a predicament: too many people traveling, not enough places for them to stay. It begged the need for a flexible, scalable platform to expand lodging capacity and allow as many people as possible to stay within the Twin Cities. Said Saint Paul Councilman Chris Tolbert prior to the game: "I don't think there's enough hotel rooms in the Twin Cities for the amount of people that are coming. [...] We're going to need Airbnb for the Super Bowl."

Airbnb and our local hosts realized we were faced with a monumental challenge and opportunity -- to help expand lodging capacity during the Big Game and maximize the economic opportunity for the Twin Cities.

Impact: Airbnb set out to double the size of the Twin Cities Airbnb host community and did so within seven months, ensuring that anybody who wanted to stay within Minneapolis and Saint Paul that week -- particularly fans -- could find a safe, affordable option within close proximity to the stadium and downtown Minneapolis.

This led to over 7,000 estimated guest arrivals staying in Minneapolis and Saint Paul through Airbnb for the Big Game -- people who objectively would not have been able to stay in the city otherwise due to the sold out hotels. Through these guests, Twin Cities homeowners earned $3.7 million in supplemental income. And these guests injected an additional $11 million in spending to the local economy, based on a third party report for the Minnesota Super Bowl Host Committee that projected Super Bowl guests to spend $465 per day, not including lodging.

In all, Project 612 brought a $14.7 million economic impact just for Minneapolis and Saint Paul, according to the Host Committee's guest spending estimate.

How-To: In February 2017 -- a year prior to the Twin Cities Super Bowl -- Airbnb announced Project 612. This was a first-of-its kind initiative aimed at activating the Twin Cities home sharing community to help Minneapolis and Saint Paul take full economic advantage of the Big Game. The goal was to use existing resources -- people's homes --- to keep as many visitors (and their spending dollars) as possible within the corporate limits of Minneapolis and Saint Paul during Super Bowl Week. It represented Airbnb's comprehensive strategy to ally the cities and its local host community to ensure the event made a positive long-term economic impact impact on the region.

Project 612 encompassed a number of tactics, including:

- building relationships between Airbnb hosts and local merchants;
- encouraging interested hosts to activate their listings as early as possible;
- launching a local host club (now known as Homeshare Twin Cities);
- providing pricing tutorials for new hosts.

However, the most important tenet of Project 612 was what seemed like an ambitious goal at the time: doubling the size of the Twin Cities Airbnb host community by February 2018 in order to expand lodging capacity as much as possible and provide affordable and safe accommodations for visitors.

Funding: Airbnb's activities were funded using preexisting budget, resources and personnel.

Tags: Innovation, Impact on City Economy, Increased Tourism

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American Chemistry Council: Preventing Unintended Exposure to Chlorine Gas at Swimming Pools

Project Description: There have been infrequent but troubling incidents of chlorine gas exposure at public swimming pools over the past several years. Recognizing the need to safeguard pool patrons and workers, while retaining the public health benefits of swimming pool water disinfection, the American Chemistry Council (ACC) convened a group of stakeholders to develop a video to train pool operators on understanding and preventing accidental chlorine gas exposure. These experts hail from government health agencies, swimming pool associations, nonprofits, and pool chemical and equipment manufacturers.

After nearly a year of work, the group produced a free video titled "Preventing Unintended Chemical Injection." It details methods to help ensure the pool water circulation pump and chemical feed system operate in unison, thus avoiding accidental chlorine gas exposure. It also outlines best practices pool staff can use to keep swimmers out of the water when there is a heightened risk of accidental chemical exposure. The video debuted at the fall meeting of the World Aquatic Health Conference, is promoted on the CDC website, and in many other venues.

City Challenge: The problem of unintended chlorine gas exposure starts when the water circulation pump and the chemical feed system do not operate in sync. If the water circulation pump stops due to unforeseen circumstances, but the chemical feed equipment continues to add chemicals into the pipes, a chemical reaction can occur in the pipes that produces gaseous chlorine. Under those circumstances, when the water circulation pump is restarted, chlorine gas may be emitted into the pool area, endangering both swimmers and pool staff.

The issue can arise when electrical interlock safeguards are absent or malfunction, or when pool operators fail to recognize a scenario that may result in an accidental exposure to chlorine gas. The video details various levels of electrical interlock protection and provides best practices for pool staff to help avoid gas exposure.

Impact: The new video represents a freely available resource to help educate pool staff on preventing accidental chlorine gas exposures. The causes of these incidents are technical in nature and to our knowledge, no similar video resources were previously available. Through targeted promotion at key swimming pool meetings and media outlets, the video is becoming widely known within the pool operator community. The video impacts all community pool patrons by enhancing safety through the minimization of preventable chlorine gas exposures.

Free Training Video for Pool Operators
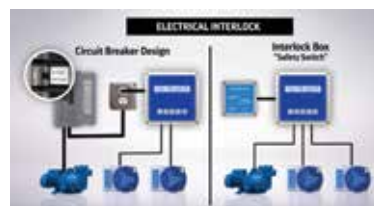
Electrical Interlock Safeguards at Public Swimming Pools

How-To:

1. Discussions among stakeholders concluded it would be beneficial to address the unacceptable and dangerous occurrence of accidental exposures of swimming pool patrons and staff to chlorine gas.

2. The American Chemistry Council (ACC) convened a group of approximately 12 interested swimming pool stakeholders to collaborate on the development of a free training video to help prevent accidental chlorine gas exposures at swimming pools. The project was funded by ACC.

3. The stakeholder group met by teleconference over the course of a year. Each teleconference was attended by a technically minded videographer, who used both animation and live footage to communicate technical safety messages.

4. A draft video was sent to a larger stakeholder group for review and revision until all stakeholders were satisfied.

5. The video was completed and is available on YouTube and at poolinterlocksafety.com. The video is promoted on the Centers for Disease Control and Prevention website. It was introduced at several pool industry conferences and webinars. Video promotion continues through the efforts of the American Chemistry Council and many swimming pool stakeholders.

6. Identify a mechanism to share this information with municipal health departments and appropriate community-based organizations.

Budget: $30,000 + significant staff time from ACC and stakeholders

Funding: Private Financing

Tags: Public Health Protection

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American Heart Association: Healthy Restaurant Kids' Meals

Project Description: In an effort to shift the current culture away from the excessive consumption of sugary drinks in the diets of children, the American Heart Association is working to pass policies that healthy drink options as the standard beverage in restaurant kids' meals. The legislation/ordinances ensure all restaurant meals marketed to children are automatically offered with water, milk or 100% juice. Other beverages can be purchased but are not the default option. The American Heart Association believes strongly in the power of solid public health policy. Therefore, this is an example of the public good of the community being supported at the state/local government level as well as being supported by private business entities.

City Challenge: The policies (project) seek to improve health outcomes among children by reducing sugary drink consumption in restaurant kids' meals. Policies have been passed in: Baltimore, MD; California; Berkley, CA; Cathedral City, CA; Dale City, CA; Davis, CA; Long Beach, CA; Perris, CA, Santa Clara County, CA; San Francisco, CA; Stockton, CA; Lafayette, CO; Louisville, KY; New York City, NY; Hawaii; Wilmington, DE.

The successful execution of the policies (project) include innovation and cost-savings, as one of the easiest ways to address the public health concern of excess sugar consumption among children. One of the intentions of the policies (project) is to reduce healthcare costs over time due to an improvement in health outcomes as a result of less implications of chronic diseases among young people and adults.

Impact: Some children as young as eight have detectable early warning signs of heart disease, and the prevalence of type 2 diabetes in children and youth is increasing. These issues disproportionately affect children of color. While parents are primarily responsible for feeding their children healthfully, they cannot always prepare meals at home. The impact of this policy helps restaurants and communities support parents' efforts to feed their children well. Improving the nutritional quality of restaurant children's meals can help improve diet quality and cultivate lifelong healthy eating behaviors, which can help children grow up at a healthy weight.

How-To: What communities can do. While state law regulates the health and sanitation of restaurants, many cities and counties have the authority to regulate aspects of restaurant operations through zoning and other laws by exercising their authority of government to regulate private conduct to protect and further the public's health, safety, or general welfare. Many communities already regulate restaurants with zoning laws or by regulating other aspects of restaurant operations; for instance, some communities have banned smoking or restricted the sale of foods containing artificial trans fats on restaurant premises. Some communities start by focusing on the beverages sold as part of a children's meal because sugar-sweetened beverages are prevalent and there is strong evidence linking sugary drink consumption with poor nutrition and health. Whether a local government has the authority to regulate restaurants – and to implement this model ordinance – is usually determined by state law. It is important to consult state law to determine whether the local government has the power to regulate restaurants. It is equally important to consult the state's retail food code to identify provisions that would prohibit local regulation of restaurant operations or otherwise govern children's meals. These laws may preempt or prohibit local regulation of the same subject matter. In some states, a state or local board of health may be able to implement the policy.

General Tips: Voluntary Improvements by restaurants are slow. Policy intervention is needed. Among the top-50 restaurant chains that included beverages as part of their children's meals in 2016, three-quarters include sugary drinks. Changing the offerings on children's menus, including changing defaults, can affect what children eat. Evidence from a wide range of fields (including retirement plans, organ donation, health care, and food/nutrition) shows that people tend to stick with defaults and that setting beneficial defaults has high rates of acceptability (defaults are the option people automatically receive if they do not choose something else). Removing sugary drinks from children's menus can send a signal that they are not appropriate everyday beverages for children. Most children consume more calories from added sugars than is recommended for good health, and the number one source of added sugars in the American diet is sugary beverages. More stats are available from the AHA.

Funding: A few of the aforementioned areas, received foundation funding from the Robert Wood Johnson Foundation/Voices for Healthy Kids program. Most of the campaigns, were successful under the leadership of the advocacy staff from the American Heart Association and its coalition partners.

Tags: Children's Health

Kids have enough sugary drinks each year to fill a bathtub.

On average, children are consuming over **30 gallons** of sugary drinks every year.

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Anthem: WV Paramedicine Pilot Project

Project Description: Unicare, an Anthem affiliate, contracts with the ambulance authority to engage hard-to-reach, high-cost, dual diagnosis Medicaid members for Case Management.

- KCEAA Community Paramedicine Providers and UniCare case managers research each member for updated contact information and known health issues.

- One valuable source to track down addresses and phone numbers is the UniCare vendor who provides real-time member hospitalization and emergency room visit notification. The vendor includes this contact information to UniCare at the time of real-time notification.

- KCEAA Paramedicine Providers make the initial call to the member to verify address and schedule a visit and provide materials during the first paramedicine visit. The case manager reviews this information with the member one-on-one.

City Challenge: UniCare Health Plan of West Virginia in partnership with Kanawha County Emergency Ambulance Authority (KCEAA) is piloting an outreach visitation program that engages hard-to-reach, high-cost, dual diagnosis Medicaid members with Case Management. UniCare, through data analytics, provides KCEAA a list of its members who may be eligible for case management. KCEAA dedicates three Community Paramedicine Providers to work the list. The Paramedicine providers, knock on doors of members perform an assessment. UniCare case managers are available telephonically, and as a team they coordinate the immediate health needs of the member including scheduling provider office visits, transportation, and medications. Additionally, they educate the member regarding community resources, health education, and provide a safety check for smoke detectors, CO_2 detectors, and overloaded electrical circuits.

Impact: KCEAA Case Management program launched on November 26, 2018.

- 59 members were identified and located; all 59 consented to the KCEAA program. KCEAA took the member's vitals and performed assessments of the home while the case manager performed a separate telephonic assessment of their current medical and social health history.

- UniCare's case management team has a 48% success rate of reaching the member for follow-up post paramedicine visit. Additionally, 26% are scheduled for follow-up.

- Eight members were referred to UniCare's social worker for services.

- Personal Care Services: Member was unable to bathe or shower due to fear of falling as no one was available to assist her. Action Taken: Paramedic spoke with the building manager to obtain application for a shower wand installation, scheduled member for a PCP visit to obtain a shower chair. Outcome: Member received her shower chair and is awaiting installation of shower wand. Member has been able to bathe and is longer fearful of falling. Avoiding a fall, avoids an injury that could result in a hospital stay and/or surgery.

- Medication education - Member exceeded recommended dosage of Excedrin Migraine due to having migraines daily. Member had not discussed this with her family doctor nor did she have a neurologist. Action Taken: Case manager educated member on medication safety and adherence to all medications, including OTC; scheduled member for a PCP visit; and, provided a list of in-network neurologists to discuss daily migraines. Outcome: The member now has a neurologist and has a prescribed migraine medication. The member is no longer taking Excedrin Migraine medication.

How-to: Through analysis, the health plan identified about 600 high-cost unable to contact members in Kanawha County that have 6 months of continuous eligibility and are currently active. To build the ROI, the plan assumed a 20% engagement rate, and applied a tier approach to the population's total costs to account for the unpredictability. Health Care Management in the health plan will ensure that KCEAA has an appropriate phone number to contact a case manager. Finance will supply KCEAA with monthly member lists and member demographics. The health plan contracted with the ambulance authority to provide the services on a per member per month basis.

Budget: $200,000.00

Funding Sources: Private

Tags: Cost of care/ER avoidance, wellness, nutrition, safety, injury avoidance, fire prevention.

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Arup: Long Beach Civic Center

Project Description: Arup has been the Lead Advisor on the Long Beach Civic Center since November 2013. The new Civic Center will comprise two new 11-story buildings for City Hall and Port Headquarters, a new library, and a revitalized city park.

Under Arup's guidance, the City of Long Beach chose a P3 model - specifically a design-build-finance-operate-maintain (DBFOM) model - to accelerate the new Civic Center. The P3 model shifted construction cost, scheduled risk, guaranteed asset preservation long-term, and created opportunities for economic development. By including incentives for private real estate development, the City created revenue for the public facilities through private investment and activated the downtown core, stimulating a wave of development. Using the DBFOM model, the City streamlined the traditional three- to five-year project development process to just over two years.

The project is substantially into the construction phase, targeting completion by summer 2019. In addition to procurement support, Arup is providing the City construction oversight and project management services through the construction phase, specifically related to cost review and design review.

City Challenge: The existing facilities were determined to be seismically unsafe, in a significantly deteriorated state, and highly energy inefficient, resulting in high operating costs. Prioritizing seismic safety, the City considered the following solutions: (a) Seismically retrofit the existing buildings, together with Code-required upgrades; (b) Rent space in downtown office buildings; or (c) Implement new construction. Ultimately options (a) and (b) proved too costly and logistically challenging, failed to address key concerns around efficiency, or posed too much risk, leading the City to consider alternative project delivery and financing options. Using the State of California–sponsored Long Beach Deukmejian Court House P3 as an example, the City realized that a performance-based DBFOM delivery model would incentivize timely and on-budget completion, thereby minimizing the time spent in unsafe facilities. Importantly, the City will also receive a public asset at the end of 40 year operating period in good repair with plenty of life left to service the City, thereby avoiding the fate of so many public buildings that get replaced too soon in their lifecycle.

Impact: The impact of the new Civic Center is multi-faceted: The City will move into modern, energy efficient, functionally superior, and seismically resilient facilities that cost less than maintaining their existing asset. These facilities will receive adequate, predictable funding and guaranteed, high-quality maintenance during the 40-year term. The P3 contract limits monetary risks to the General Fund, and the private financing does not impact the City's debt capacity or credit rating. Because payments from the City to the developer will closely mirror what it would cost to continue operating and maintaining these facilities, the project doesn't require new taxes or impact the City's General Fund.

The community benefits from a revitalized downtown area and a new Civic Center that has created approximately 8,000 new jobs during construction. The adjacent private development will provide up to 850 residential units, over 1,000 new residents to downtown, a 200-room hotel, and approximately 47,000 gross square feet of retail. The project has also been a catalyst for other real estate projects, with private investment buoyed by the value created by the City's investment in the city core.

How-To:

- Arup built market confidence by recommending a procurement strategy to address the constrained political schedule and helped the City prepare and release an RFP on time.

- Arup helped the City articulate its goals and requirements in a clear and consistent manner in the RFP, which resulted in two excellent proposals with potential to meet the City's stated goals and provide value in the City's downtown assets while achieving wider economic and social development goals.

- An exclusive negotiation agreement governed the co-development process between the City and its partner (Plenary Properties Long Beach) which included developing the design and negotiating the project agreement and financing structure.

- During the procurement and exclusive negotiation stages, Arup has provided the City and Port of Long Beach comprehensive end-to-end services that integrated financial, commercial, real estate, design, engineering, and cost consulting.

- Arup has been providing owner's representative support throughout the construction phase for the City and Port of Long Beach, including contract management, independent cost analysis, design review, and operational readiness work.

General Tips: Hire good advisors to help you analyze and structure your project. The DBFOM delivery model is not always the right answer and can be complex but it can be a powerful development tool in the right circumstances.

Budget: $520m

Funding: Private Financing

Tags: Service Delivery Improvement, Innovation, Cost Savings, Environmental Impact, Impact on City Economy, Jobs Created, Increased Tourism, Business Benefits

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Association of American Railroads: The Chicago Region Environmental and Transportation Efficiency (CREATE) Program

Project Description: CREATE is a first-of-its-kind partnership between the U.S. DOT, State of Illinois, Cook County, City of Chicago, Metra, Amtrak, and the nation's freight railroads. A project of national significance, CREATE is investing billions in critically needed improvements to increase the efficiency of the region's passenger and freight rail infrastructure and enhance the quality of life for Chicago-area residents. The goals of the Program are to: improve passenger rail service, reduce freight rail congestion to boost regional and national economic competitiveness, reduce delays on local streets due to blocked grade crossings, enhance public safety, promote economic development, create and retain jobs, improve air quality, reduce neighborhood and community impacts such as noise from idling or slow-moving trains

Launched in 2003, the CREATE Program involves 70 projects designed to separate freight and passenger trains at six key junctions; eliminate over two dozen at-grade crossings; and increase freight and passenger rail capacity, speed, and reliability in the Chicago area with impacts for rail traffic nationwide.

City Challenge: For almost 150 years, Chicago has been a critical nexus of the North American railroad network. The CREATE Program rail corridors handle more than $1.4 trillion of rail freight annually, but the Chicago rail network is the largest chokepoint in the U.S. A rail car that may take three days to travel the 2,200 miles from Los Angeles to Chicago may then spend more than a day traversing the Chicago region. Over the next 30 years, demand for rail service in Chicago is expected to double. It is critical to the national and regional economy to meet this demand.

Recognizing the growing urgency of the region's rail capacity needs, Mayor Richard M. Daley called on the federal Surface Transportation Board and the rail industry to tackle the problem, which led to the creation of the CREATE Program in 2003.

CREATE is the first and only program in which six of North America's seven Class I railroads have come together as partners to improve shared railroad assets. These railroads have so far invested hundreds of millions of private sector dollars along with federal, state, and local funds dedicated to increasing the efficiency and capacity of the Chicago region's rail infrastructure.

Impact: The CREATE Program has so far received funding commitments of nearly $1.6 billion, including $375 million of private sector funds. 30 out of 70 projects have been completed as of May 2019 and 21 projects are in various phases of design or construction

Implementation of the overall CREATE Program will result in national and local economic benefits estimated at approximately $31.5 billion over a 30-year period related to reduced travel times for rail passengers and freight, reduced motorist and cargo delays, improved rail and highway safety, air quality improvements, and construction-related benefits.

In addition to economic benefits, the CREATE Program is designed to address major multi-jurisdictional capital infrastructure needs. The partnership effectively serves many constituents – governments, communities, freight and passenger railroads – and features a robust organizational structure that can adapt to institutional and market changes. This allows the Program to address complex problems that would not be feasible by government agencies or private companies acting alone.

How-To: At the beginning, a task force made up of representatives from the railroad industry, State of Illinois and City of Chicago was convened to identify and recommend a plan for addressing rail congestion in Chicago. The infrastructure improvements identified by this task force became the CREATE Program.

The CREATE Program was launched in 2003 and is managed through a public-private partnership among the AAR, Chicago and Illinois DOT, and Cook County Department of Transportation and Highways. The AAR is the partnership representative for Amtrak, BNSF Railway Co., Belt Railway Co. of Chicago, CP, CN, CSX, Indiana Harbor Belt Railroad Co., Metra, Norfolk Southern Railway and Union Pacific Railroad. The partnership is guided by a Joint Statement of Understandings, which has been amended four times to address changing needs. Goals, strategies, and objectives at both the program and project level guide CREATE Program activities.

Program management depends upon a robust governance structure. A stakeholder committee sets policy and approves strategic changes in budget or scope. Management and implementation committees deal with tactical or operational issues and oversee project management. A Federal Highway Administration (FHWA) Program Manager is responsible for the management for all Federal interests associated with project delivery; likewise, an AAR Program Manager serves as the liaison and primary contact with all private railroads.

To guide this complex Program, new procedures and policies were developed and implemented. A set of partnership and management practices serves as a guide for successful partnership, process and project delivery. Detailed flow processes identify roles, responsibilities, and actions for various parties at each stage of the process. These processes align activities undertaken by the project partners with federal, state and local guidelines and requirements, and ensure effectiveness and efficiency in project delivery.

General Tips: National, regional and legislative support of the CREATE Program is a key component to its success. In addition to direct participation from state, county, and city governments, CREATE has been acknowledged as a priority by the entire bipartisan Illinois Congressional Delegation; State DOTs from Indiana, Iowa, Kansas, Michigan, Minnesota, and Wisconsin; companies including Ford Motor Company, UPS, Caterpillar, and Walgreens; and associations such as the Illinois Corn Growers Association, Illinois Petroleum Council, and the Indiana and Ohio Chambers of Commerce. These entities serve as a reminder of the national and regional importance of the Program; they have expressed their support in grant funding applications while also raising awareness for the Program and helping to strengthen the partnership.

Budget: The total cost of the CREATE Program is estimated to be $4.6 billion, of which nearly $1.6 billion has been committed or spent.

Funding: Private Financing, Federal Grants, State Grants, Local Funds

Tags: Service Delivery Improvement, Innovation, Cost Savings, Environmental Impact, Impact on City Economy, Jobs Created, Business Benefits

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AT&T: How AT&T and Las Vegas are Using Vertical Infrastructure and IoT to Create a Smart City

Project Description: As part of this Public-Private Partnership (PPP), the City of Las Vegas deployed 50 modular LTE-enabled IoT nodes and a management platform to deliver a range of services intended to address critical city issues. The City is using the nodes to meter the energy used at the street and on the pole, in conjunction with remote smart controls to manage the lighting. Environmental sensors have also been strategically placed to capture microclimate data. Finally, 20 of the 50 deployed nodes are also being used to extend existing Wi-Fi in the City, opening the door for other capabilities and expanded coverage for visitors. Citizens may be able to take advantage of the service for education and employment support.

This PPP has shown that through collaboration, the deployment of new technologies forms the foundation for the City's smart city evolution. To date, the City has achieved energy and cost savings, and has built the case for the expansion of the scope of this deployment.

City Challenge: It answers the question of 'where do I start?' The platform is an easy-to-use, budget-friendly solution that can build on a city's current infrastructure and address issues such as energy efficiency, citizen satisfaction and safety. This IoT deployment has already proven to be beneficial, helping to turn the management of certain city's assets from reactive to proactive. Vertical infrastructure can pave the way to the deployment of a wide variety of IoT solutions. It's never been easier to be a smart city

Impact:

- Reduced electricity usage: the solution remotely allows for lights to be turned on and off at the right time (as designated by the City) and can also be dimmed.

- Help to improved citizenship satisfaction: this technology will help to free up city resources to move beyond routine inspections and citizen complaints to on-demand problem solving.

- Help to improved safety – the smart lighting deployed as part of this PPP will help to deter crime and increase citizen satisfaction in public safety.

- Maintenance efficiency – Proactive monitoring will help to enable quicker response to issues such as when a tree falls or a car hits a post.

Beyond lighting, the nodes can help bring connectivity to underserved area by the expansion of City Wi-Fi, enabling the city to offer its citizens and visitors services outside libraries, schools, and community centers, which can in turn then help to improve the digital divide. In addition, the smart lighting solution can be paired with additional IoT sensors to further expand the city's smart cities infrastructure. For this PPP pilot, air quality sensors were included to measure common pollutants in urban environments such as PM2.5, NO2 and O3.

LTE-enabled lighting node

Lighting management portal

How-To: The City of Las Vegas was interested in testing and implementing new/emerging IoT solutions in its innovation district to support the goals of city leadership. The City and AT&T decided to team up to conduct a field evaluation to determine the best locations to implement and test an IoT platform on City lighting infrastructure. This included selecting multiple locations surrounding Vegas' innovation district for the pilot. Once the locations were confirmed, AT&T worked with the City to install and onboard the devices. It was decided that a 6-month pilot would provide sufficient time to generate key learnings and demonstrate the value of the IoT technology. As part of the onboarding, AT&T provided training to key City stakeholders as to the product's capabilities and usage. The customer-managed portal AT&T provided to the City as part of this pilot has given the City of Las Vegas visibility into its lighting infrastructure performance and helped to make its maintenance crews more efficient. AT&T has also provided technical support and overall project management support during the pilot.

General Tips: The information gathered during the pilot phase provided data on energy savings, giving the City insight into how the City could benefit by the deployment of this smart cities technology at scale. The lighting management portal records energy usage with 99.98% accuracy.

As of May 16, 2019, the conversion of high-pressure sodium (HPS) to LED lighting has reduced energy usage by 38%, and the dimming capabilities have allowed for up to 84% additional energy savings.

Budget: AT&T provided the City with its smart lighting solution at no charge solely for purposes of this pilot to serve as a proof of concept for this smart cities technology.

Funding: AT&T funded

Tags: Service Delivery Improvement, Innovation, Cost Savings, Environmental Impact, Improved safety

Parking and roadway lighting consumes 82% of the outdoor sector's electricity. -- Department of Energy, U.S. Lighting Market Characterization

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Avenu / MuniServices: New Thinking Applied to Old Tax Challenges / Local Business Licensing

Project Description: The easy solution to Garden City's revenue shortfall was to raise taxes—a tortuous process with an uncertain outcome because it needed voter approval. Instead, Garden City engaged Avenu to review existing income from business licenses and found discrepancies between the numbers of registered businesses and the fees they are required to pay.

City Challenge: A city with so much to offer inevitably must meet high expectations for services. Falling behind in maintenance or curtailing service delivery just isn't an option, even when costs rise above revenue. Knowing the tendency for costs will rise, Garden City leadership looked ahead to see if revenue projections would match the cost growth. They didn't.

Impact: Now many years into their relationship, Garden City and Avenu continue to provide businesses with a streamlined way to comply with license requirements. The response to increased fee collections—32 percent higher than when the program started—remains positive. Business owners large and small know their fees are an investment in a community where they can thrive, while city officials have greater confidence in their revenue and cost forecasts. The capability also helps city registrants compete in a fair environment because of increased registrations from remote businesses operating in the city. Perhaps most importantly, the expected level of service delivery means residents and visitors to Garden City get to enjoy one of the crown jewels of the South.

City Hall

Port / Cranes

How-To: Using its software to sift through Garden City's fee schedules and lists of taxpayers from previous years, Avenu showed town leaders where they were entitled to collect more fees.

As Garden City put the new revenue to good use delivering services, Avenu presented another surprise for leaders to take in: $66,000 in anticipated operating costs. By administering the registrations, renewals and collections, Avenu freed up time and materials that the city would have spent contacting the businesses and collecting fees through its manual process. Avenu deployed its system for distributing notices, filing and accepting online payment for license registrations and renewals.

The company acts as the city's agent to issue licenses, and electronically disburses payment into the designated bank account of Garden City. Priced per business license, the web portal and back-end systems scale to any number of licenses the city needs to process, and it doesn't require any printing, mailing or software management from the town.

Budget: The program is on a contingency fee basis so there was no cost to the City.

Funding: When the company put its revenue discovery team on the project to review existing ordinances, revenue projections went up even further because there were occupational and other fees required by statute. Working on a contingency fee basis, Avenu found 267 business licenses that needed registration or renewal. This racked up more than $72,000 in unexpected revenue, which more than covered the forecasted cost increases for services.

Tags: Service Delivery Improvement, Cost Savings, Impact on City Economy, Business Benefits, Increased Revenue

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Badger Meter: City of Auburndale, Florida, Leads the Way with Smart Water Technologies from Badger Meter

Project Description: Located in central Florida, the City of Auburndale is a thriving and steadily growing community that boasts great spaces to live, work and play. In 2016, Auburndale's Public Utilities Department, which serves approximately 11,700 residential and 1,100 commercial water customers, saw a need to replace aging infrastructure across its water system. Though the city's water meters and endpoints had provided many years of reliable service, they were beginning to reach their end of life.

So, the City of Auburndale worked with leading water meter manufacturer, Badger Meter, to upgrade its water system with advanced metering infrastructure (AMI), complete with more accurate and reliable water meters, cellular endpoints, a managed solution and a customer portal for hands-on access to water meter data. Once installed, the new technology helped Auburndale reduce time in the field spent reading meters manually, and the automation allowed the utility to efficiently monitor the system so its employees could devote more time to customer service. The City of Auburndale is leading the way to smart water for its region.

City Challenge: The City of Auburndale prides itself on providing its residents and their families with the best water it can. For many years, the city's Public Utilities Department had effectively been using mechanical meters from Badger Meter and a traditional drive-by system to read and monitor their water system. The traditional drive-by system required utility employees to spend time and energy in the field reading and re-reading water meters. This pulled employees away from larger infrastructure projects across its system.

However, in 2016, when city officials saw that its infrastructure was beginning to reach its end of life, it was an opportune time to not only replace the existing equipment, but also investigate how more advanced technology could benefit the utility, its employees and its customers.

Impact: After securing funding by refinancing existing municipal bonds, the City of Auburndale began its installation of Badger Meter's managed solution, cellular endpoints and new mechanical meters. Several new ultrasonic meters were also implemented for small and mid-sized businesses.

Without the need for utility-owned and fixed-network infrastructure, the new technologies allowed the City of Auburndale to proactively track water consumption data as well as quickly address leaks, improve efficiencies and enhance customer service. To help with customer service, the utility's new managed solution also includes access to a customer-facing mobile application that enables customers to take a hands-on approach to monitoring their water usage. When using the app, which is still being deployed across the city, customers have the ability to see and understand their water use. This is proving to be an effective tool for customers proactively identifying and reporting leaks to the utility team and supporting conservation efforts.

E-Series Ultrasonic water meter installed above ground.

Discussing high water usage with a customer by utilizing BEACON® Advanced Metering Analytics (AMA).

How-To:

1. The City of Auburndale identified a need to replace its aging infrastructure and spoke with numerous metering manufacturers over the course of four to five months to determine the best solution for its needs.

2. After speaking with their third-party resources, the City of Auburndale ultimately selected Badger Meter's advanced metering infrastructure (AMI) solution. The technology provided the most cost-effective solution and did not require funds for infrastructure or continued maintenance.

3. With the decision made, the Public Utilities Department turned its attention to financing. Utility leaders initially thought the project would take three to four years to complete. However, the utility was able to refinance previously purchased bonds to free up the money needed for a rapid installation of its water meter upgrades.

4. With the funding in place, the utility began installation of the new technologies using a third-party installer, which managed the hands-on deployment. The full water utility distribution team also helped to manage the process, making for an easy transition and helping the utility to complete the installation in only nine months.

5. Following the installation, the City of Auburndale began its steady deployment of the customer-facing mobile application. Whenever a customer called in with a question, the utility's customer service representative would provide instruction on how to sign up for the service. So far, the utility team is receiving overwhelmingly positive feedback from their customers and will soon begin a targeted and direct community outreach campaign to encourage more participation and use of the tool.

General Tips: Rather than just replacing aging water meters, utilities have an opportunity to look at the entire system and how technology can enable their teams to better manage and monitor the system, reduce leaks and improve service.

Cellular technologies available today reduce or eliminate the need to install and maintain infrastructure, saving time and freeing up employees for other projects.

To support a complete and rapid installation of the new metering equipment, the City of Auburndale researched and hired a third-party installation service. This service provided real-time inventory management and worked seamlessly with the utility employees to resolve real-time installation issues.

Budget: $3 million

Funding: Municipal Bonds

Tags: Service Delivery Improvement, Innovation, Cost Savings, Impact on City Economy

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Best Buy Co. Inc.: Building Brighter Futures for Young Women in Minneapolis-St. Paul

Project Description: In 2019, Best Buy expanded efforts in the Twin Cities to provide young women pathways to high-skill, high-wage careers and jobs; increase their participation in STEM fields and technical careers; and develop their opportunities in traditionally female-dominated, lower paying employment sectors.

- In collaboration with the Women's Foundation of Minnesota, we launched tech-focused career pathway programs at our Twin Cities Best Buy Teen Tech Centers. Participants learned tech and workforce readiness skills that culminated in paid summer internships.

- We partnered with other leading tech companies to launch the Melinda Gates Reboot Representation Tech Coalition, a $12M effort to double the number of Black, Latina, and Native American women graduating with computing degrees by 2025.

- We are working with the YWCA in Minneapolis and Y-Eureka! on a five-year program for girls focused on STEM-related college/career readiness.

- Through a partnership with Technovation, we are teaching girls how to learn and apply the skills needed to solve real-world problems with technology.

City Challenge: The U.S. is facing a rapidly rising shortage of people qualified for tech-dependent jobs.

Millions of young people from under-served communities have tremendous potential to help fill this gap, but currently lack the tech, training and mentoring to prepare for these future careers. Nearly 24 million young people in the U.S. don't have access to high speed internet at home and more than 20% of households don't even have a computer.

Within this population, young women are especially vulnerable and role models are hard to find. Just 26% of computing jobs are held by women today, and only 11% of senior leadership roles in tech companies are assumed by women.

Impact:

- 28 young women attended our Women's Foundation of Minnesota co-funded career pathways program at two Twin Cities Best Buy Teen Tech Centers.

- We committed $600,000 to the Reboot Representation Tech Coalition and are now feeding the tech talent pipeline with young women of color who attend our Teen Tech Centers in the Twin Cities and nationally.

- Through the YWCA and Y-Eureka! we sponsor more than two dozen 9th grade girls, supported by Best Buy employees who provide them career readiness and tech ed activities throughout the year.

- 42 students were served by the Technovation program, another initiative that benefits from hands-on participation from Best Buy employees who volunteered more than 2,400 hours to the effort.

How-To: Even as Best Buy programs concentrate on tech readiness, we've come to value the important role "high touch" plays for the young people who rely on these efforts.

When we originally launched our Teen Tech Centers in 2012, we focused primarily on access to the technology. We learned almost immediately that the Centers mean so much more than that to young people.

They're safe places to connect with positive adult role models, career mentors and friends. There's a very special power in the humanity and community of the Teen Tech Centers, and we now understand that to be one of their most significant and lasting benefits.

As importantly, we're constantly amazed and inspired by the collaboration we enjoy with our partners – foundations, non-profits and vendors. It's remarkable how our collective interest in helping young people rise way above competitive and other interests. We're honored to bring these varied and powerful forces together to change the lives of our young people in ways that none of us could achieve on our own.

Funding: Private Financing, Foundations and Philanthropy

Tags: Impact on City Economy, Jobs Created, Business Benefits

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Bird: Shared Dockless Electric Scooters

Project Description: As part of Bird's mission to make cities more livable by reducing car usage, Bird provides Los Angeles and over a hundred other cities around the world with shared dockless electric scooters. Named Inc.'s 2018 Company of the Year and one of Time Magazine's 50 Genius Companies, Bird's low-speed, affordable, and zero-emission devices have sparked a revolution in urban transportation.

In 2018, Bird's first year of operations, Americans took 38 million rides on shared dockless electric scooters - more than on every bikeshare system in the country combined. Cities across the country are racing to catch up and meet this extraordinary latent demand for micromobility.

It was in Los Angeles where, barely a year ago, Bird debuted the world's first shared dockless electric scooters. Today, under the leadership of Mayor Garcetti and LADOT, Los Angeles oversees the largest fleet of shared micromobility devices in the country. Cities around the world now look to forward-thinking cities like Los Angeles for guidance: every single day, Bird's riders take tens of thousands of car trips off of Los Angeles streets, providing untold congestion, environmental, and traffic safety benefits.

City Challenge: In California, automobile transportation is by far the largest contributor to greenhouse gas emissions. Los Angeles has recognized that to effectively address the climate crisis, it must immediately change the ways in which Angelenos get around. This is why Bird, in association with LADOT's pioneering Dockless Mobility Program, is honored to make our last-mile, zero emissions solution part of the city's transportation ecosystem.

Los Angeles ranks number one in the country for traffic congestion, with many cascading negative effects on the city, including:

• Productivity: Sitting in traffic costs Los Angeles residents over $19 billion annually in lost productivity.

• Safety: Reducing automobile vehicle miles traveled and vehicles per capita have been proven to be the two most effective ways of reducing traffic fatalities.

• Equity: After housing, transportation is the top cost among Los Angeles households, disproportionately so among low-income individuals.

• Los Angeles has taken leadership in adopting proven solutions like Bird to get people out of their cars, connect people to transit, and provide mobility options for those with limited transportation choices.

Impact: Millions of rides have been taken on Bird's shared dockless electric scooters in Los Angeles. The net effect of all of these rides have had a profoundly positive impact on Los Angeles, including:

• Environmental Impact: Bird eliminates tens of thousands of car trips from Los Angeles's streets every single day, relieving some of the worst traffic congestion in the country while substantially reducing the city's CO_2 emissions.

• Impact on City Economy: Bird provides income opportunities to thousands of local residents to charge, repair, and rebalance Bird's fleet, resulting in millions of dollars in earnings for local residents.

• Business Benefits: Los Angeles's business community benefits from the increased foot traffic in commercial districts where parking is scarce, as well as Bird's partnerships with local businesses.

• Increased Tourism: Visitors to Los Angeles use Bird to easily get around and see local attractions without needing to rent a car.

• Innovative City Planning: LADOT's leading data initiatives and partnership with Bird helps the City make informed, data-driven decisions on transportation.

How-To: Bird launched the world's first shared dockless electric scooters in late 2017 in Venice and Santa Monica, California. As Bird subsequently expanded service across Los Angeles, the city adopted and issued a Conditional Use Permit to allow operations on a provisional basis. By late 2018, Los Angeles approved and began implementing a one-year Dockless On-Demand Personal Mobility Permit program, run by the Department of Transportation. In doing so, Los Angeles was able to harness the data from prior operations, including during the Conditional Use Permit, to design a regulatory framework that encouraged Angelenos to get out of cars. Cities across the country now look to Los Angeles's forward-thinking approach for guidance in managing and expanding last-mile transportation offerings.

General Tips: Los Angeles's regulations are designed to encourage the adoption of shared dockless electric scooters. By embracing these devices and taking a proactive approach to integrate Bird and other e-scooters into its transportation network, Los Angeles has reaped more of their benefits than any other city in the country.

For example, rider surveys consistently show that Angelenos would like to see more e-scooters available, so that it can be a more reliable mode of transportation. By ensuring that providers are able to scale to meet this latent demand, Los Angeles is able to increase service reliability and spur wider adoption - particularly since unmet demand would otherwise lead to even more car trips.

Budget: Bird's shared dockless e-scooters are available to Los Angeles residents, free of charge to the city. Additionally, costs associated with overseeing the dockless mobility program are covered by fees imposed on e-scooter operators.

Funding: Private Financing

Tags: Innovation, Environmental Impact, Impact on City Economy, Jobs Created, Increased Tourism, Business Benefits

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Black & Veatch: Missouri Hyperloop

Project Description: When it comes to the hyperloop rider experience, think of it as air travel without ever leaving the ground. Or a smooth, mega-speed train ride, just floating above the tracks. In either case, it promises to be the most comfortable ride you've ever had, free of turbulence and, thanks to longer acceleration and stopping distances, less bumpiness than runway landings or takeoffs. Passengers climb into "pods" similar to airplane cabins at portals in hyperloop hub cities and find their seats for the frictionless ride inside the low-pressure tube. Levitating above the tracks by magnetic levitation, the pods – after gradual acceleration over a longer stretch than an airport runway – are thrusted ahead by electric propulsion with ultra-low aerodynamic drag. Rider comfort will be at a premium in the fully autonomous – eliminating pilot error – and a completely enclosed system, sparing passengers of any weather hazards. While estimated to be 60 to 70 percent the cost of high-speed rail, hyperloop looks to be coveted by travelers because it's fast, easy and cheap.

City Challenge: A transportation technology company is reimagining ground travel in which passengers and cargo positioned in pods are hurtled through a low-pressure tube at hundreds of miles per hour. But could that "hyperloop" concept work? Black & Veatch embraced the challenge of finding out, heading a state and local coalition in a study that assessed the Missouri viability of what at more than 600 mph could become the world's fastest mode of ground transportation. The 10-month feasibility study – the nation's first involving hyperloop – analyzed the safety of the proposed portal along the relatively flat, straight Interstate 70 stretch linking St. Louis and Kansas City. The study also exhaustively examined the social impact, station locations, regulatory issues, route alignments and rights-of-way matters. And it examined the affordability of being whisked between Missouri's two biggest cities 250 miles apart in roughly a half hour – typically a four-hour drive – for what could cost a rider the price of a tank of gas. In October 2018, Black & Veatch and VHO announced that such a system is safe, sustainable and commercially plausible.

Impact: From traveler mobility to transformative shipping, potential positives abound. Commuters can work between long distances, living in St. Louis while shuttling effortlessly to and from their jobs in Kansas City, or vice versa. Students could commute to various universities along the route. The movement of freight could be revolutionized for the freight industry and shippers, saving them billions of dollars. Goods could be sent to clients "just in time," requiring simply larger warehouses instead of more of them. Demand for commercial infrastructure would be decreased, saving money.

How-To: When it comes to building support for a revolutionary form of travel seemingly ripped from the pages of a sci-fi normal, stakeholders must keep it simple and local, engaging state and legislative decision-makers along the way. A comprehensive regional study assessing the viability – and interest, particularly where high-population urban centers are clustered – in such a futuristic-feeling transportation mode is an advisable first step. Missouri's hyperloop backers also couched hyperloop's place and promise against the backdrop of the state's own storied place in risk-taking and discovery: First the launching point of Lewis and Clark's famed exploration from the Mississippi River to the Pacific Ocean, then the state's status as the 1950s birthplace of the nation's interstate highway system –President Eisenhower's vision for America's 20th-century transportation. A legislative bipartisan "blue-ribbon panel" – headed by Missouri's lieutenant governor and comprised largely of elected officials and business leaders – has been meeting monthly to search of private and public funding that could cover the project's tab, estimated to be $7 billion to $10 billion. The findings of the panel, tasked with coming up with strategies that could accelerate construction of the proposed route, are due in September.

Funding: Private investment preferred

Tags: Innovation, Environmental Impact, Impact on City Economy, Jobs Created, Increased Tourism, Business Benefits

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Boston University: Attracting a Downtown Grocer to New Bedford, MA

Project Description: Through the Boston University's MetroBridge experiential learning program, students in the BU Questrom School of Business explored the feasibility for bringing various types of food markets to scale in downtown New Bedford.

The feasibility study compiled and compared data on four distinct models: traditional grocer, co-op food market, pop-up food stall, and farmers' market. For each of these models, the business students analyzed the feasibility for success in downtown New Bedford based on financial, operational, real estate, infrastructure, and other market conditions. The feasibility study also included case studies for each of the four grocer models, including: ReFresh in New Orleans; Stockbox Grocery in Seattle; Fresh Truck in Boston; and The Farm Market at Mill No. 5 in Lowell, Mass. Additionally, the students interviewed residents and workers in downtown New Bedford about their preferences for accessing fresh food.

City Challenge: The City of New Bedford, Mass. aims to improve access to healthy food by attracting a downtown grocery store. However, current efforts to date have not been successful due to the shortage of quality retail infrastructure and the perceived lack of buying power.

Downtown New Bedford is a "low-income low access" (LILA) census tract, a designation provided by the U.S. Department of Agriculture to describe an area that has a substantial number of low-income households that are more than half a mile away from a supermarket. Residents in LILA communities have to travel further to purchase fresh produce, so their day-to-day groceries typically consist of canned or frozen food.

A downtown grocery store would therefore be a key asset for new and existing New Bedford residents. Currently, residents who live downtown rely on Rite Aid, Walgreens, or Family Dollar for grocery purchases, and there is no option for purchasing fresh produce. Many of these residents are 55+ years-old and do their shopping on foot. Larger supermarket chains are more than a mile away from downtown and beyond a busy highway, raising safety concerns for pedestrians and bikers who wish to access these stores.

Impact: The feasibility analysis report and a detailed presentation were delivered by students to local leaders in New Bedford with the goal of equipping these decision-makers with the information necessary to create a strategy for bringing a fresh food retailer to the city's downtown core. The report affirmed that, at present, downtown New Bedford may not be ready to attract a fresh food grocer in any of the four operational models (traditional, co-op, pop-up, or farmers' market). However, the team recommended that the city:

- Engage in local and regional partnerships to build collective buy-in
- Explore public incentive funding to help support start-up costs
- Further assess market demand for a downtown grocery store by piloting a small-scale pop-up market, offering the farmer's market during weekends, or providing transportation services connecting downtown residents to existing grocery stores

City officials will use this information to help build a plan for expanding access to fresh, healthy foods for residents and employees in the downtown New Bedford.

How-To: This project is the result of a partnership between the MetroBridge program at the Boston University Initiative on Cities and the City of New Bedford. Metrobridge links faculty and student talent in higher education with local governments for the dual purpose of assisting under-resourced cities in Greater Boston and providing experiential learning opportunities. The program sources projects from city partners, matches them with Boston University faculty, and supports the delivery of timely research and recommendations.

Budget: There is no cost for cities in Greater Boston to partner with Boston University's MetroBridge program.

Tags: Service Delivery Improvement, Impact on City Economy

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CGI Communications, Inc.: The Community Showcase Video Program

Project Description: Through its partnership with the United States Conference of Mayors and 3,000 communities nationwide, CGI has carried out their mission of helping communities effectively tell their story.

Over the past 30 years, CGI has found the power in public-private partnerships. Through their program, local businesses gain exposure to potential clients by becoming a sponsor on the Video Tour. They have access to a variety of services that enhance their online presence such as search engine optimization, reputation management services, website design, and more.

Tom Cochran, CEO and Executive Director of the United States Conference of Mayors expressed, "Mayors and business leaders agree that creative public-private partnerships are a major force in shaping cities of the 21st century. Experience has shown that when businesses and local governments work together, our cities benefit and our nation is stronger." This synergy is one of the driving forces that makes CGI's program so powerful. The program allows website viewers to gain a holistic view of your community by highlighting the unique assets of your area and the businesses that support it.

City Challenge: Newark, California and its rich history can be traced back 150 years when the community was built on a foundation of pride and self-determination. They knew the importance of promoting the unique elements of their area. Cities nationwide find it challenging to find the time and resources to promote themselves effectively, and Newark was no exception.

Laurie Gebhard, Assistant to the Newark City Manager stated, "I am a one-person team so I am limited on time to work on projects outside the scope of my job, let alone having the expertise to produce such quality videos."

CGI's Community Showcase Video Program is nationally recognized as a sole-source solution for municipal marketing. CGI does the hard work, so you don't have to.

Impact: The collaboration of industry experience and local knowledge creates magic.

Gebhard elaborated, "The opportunity to select our own chapter topics helped write our story and showed the viewers what areas are important to Newark such as education, real estate and community development." The freedom to illustrate the best qualities of your community further enhances the impact it will make on future residents, visitors and businesses.

Gebhard continued, "I also think featuring local businesses and civic organizations increases community pride. The addition of making the same services available to non-profits this year is rewarding. We appreciate the work non-profits contribute to our community and any time they can be showcased is a plus."

By featuring local organizations and creating custom video chapters, the program educates future residents, visitors and businesses while increasing community spirit for current citizens.

Video Tour interface

How-To: CGI knows staff time and resources are limited, which is why they dedicate over 40 experienced staff members to write the video scripts, film, edit, and provide professional voice-overs.

Here are the steps to get started:

1. Have a meeting with the video production team
2. Select video topics that best highlight your community
3. Choose your filming dates
4. Let CGI take care of the rest!

"I've been working with CGI Communications since 2008 and continue to be pleased by the service and quality of work that they do. The videos are high-quality and really add a professional touch to our website. Everyone at CGI Communications that I've been in contact with throughout the years has been a pleasure to work with. CGI makes the work process easy. Thank you for helping us showcase our community with a professional flare."
- Laurie Gebhard, Assistant to the Newark City Manager

Budget: NO-COST for municipalities

Funding: Business Sponsorships

Tags: Innovation, Cost Savings, Increased Tourism, Business Benefits

Custom Video Tour link for your city's official website

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Citi: EmpoweredNYC

Project Description: To strengthen the financial stability of people with disabilities, Citi is collaborating with the City of New York and National Disability Institute (NDI) on EmpoweredNYC. This multipronged initiative is developing and delivering enhanced financial counseling services tailored to the specific needs of people with disabilities, as well as new trainings for nonprofit and municipal service providers on how to connect people with disabilities with the best information, services, and programs to meet their financial needs. Led by the NYC Department of Consumer and Worker Protection's Office of Financial Empowerment (DCWP OFE) in partnership with Citi, NDI, NYC Mayor's Office for People with Disabilities (MOPD), and the Mayor's Fund to Advance New York City, EmpoweredNYC aims to provide clear and accurate information to empower people with disabilities to make sound financial decisions.

City Challenge: According to the U.S. Census Bureau, only one in five New Yorkers with disabilities are employed. Yet when people with disabilities consider employment opportunities, critical questions such as, "How will employment affect my disability benefits, supports and services?" are too often met with confusing and contradictory advice. While many people with disabilities are actively participating in the workforce, there is a lack of clear guidance to help them navigate complex public benefit and healthcare programs. Additional training on public benefits can help financial counselors provide clear information and reliable advice to people with disabilities so they can make informed financial decisions and build stronger financial futures. Through EmpoweredNYC, financial counselors acquire this expertise so they can offer strong guidance to people and families with disabilities, who often face complex financial questions and decisions. The financial counseling offering builds on DWCP OFE's financial counseling model, which is used at 20+ Financial Empowerment Centers where all New Yorkers can receive free, confidential one-on-one financial counseling from professional counselors.

Impact: EmpoweredNYC financial counseling services are now being offered at accessible locations across the five boroughs of New York City. The free, confidential counseling services are provided by professional financial counselors who have received more than 60 hours of additional training focused on disability benefit programs and how to integrate knowledge of these programs into financial counseling sessions. EmpoweredNYC aims to conduct 2,700 financial counseling sessions with people and families with disabilities. In addition, to bolster the knowledge and awareness of financial challenges faced by people with disabilities, EmpoweredNYC offers monthly webinars to hundreds of disability service providers to instill a stronger understanding of financial challenges faced by people with disabilities.

EmpoweredNYC and
EmpoweredCities
Launch in January 2018

National Convening of Municipal
Leaders in May 2019

How-To: EmpoweredNYC organized five community input sessions–one in each NYC borough–to learn directly from people with disabilities about their financial concerns, and to gather input on what financial counseling services could and should look like to be effective. Community members shared their financial realities, repeatedly citing the high cost of housing and healthcare and their determination to achieve financial stability. Many who receive public benefits such as Social Security Disability Insurance (SSDI) spoke of the complicated benefit eligibility criteria that fueled confusion and, at times, concern about the risks of los-ing these critical supports.

These findings informed the design of the EmpoweredNYC financial counseling services, including the new training for financial counselors on disability benefit programs. The findings also informed the monthly webinars on financial topics that are relevant for people with disabilities.

EmpoweredNYC brought together key partners – municipal agencies and offices with deep expertise and focus on financial capability (Department of Consumer and Worker Protection's Office of Financial Empowerment) and the NYC disability community (Mayor's Office for People with Disabilities), a national nonprofit that is entirely focused on advancing financial inclusion for people with disabilities (National Disability Institute), and Citi, which has long focused on advancing financial capability and empowerment for low- and moderate-income communities. The collaborative design of EmpoweredNYC, along with frequent assessments of what is and is not working, has helped ensure EmpoweredNYC is an impactful initiative.

General Tips: - Be intentional about ensuring accessibility in all aspects of program design, e.g., communications (language, format, and modes of communication), outreach, in-person events, and provision of services. With guidance from the NYC MOPD and NDI, we ensured the five community input sessions offered ASL and CART services and took place in accessible locations. All digital and written content were made accessible, and all event locations were accessible. It is a best practice to integrate these steps into standard communications and event planning to ensure accessibility.

- Request accommodations during the RSVP process for events. Provide materials in electronic format (and in accessible formats) in advance for participants.

- Leverage expertise across partners. The cross-agency collaboration between DCWP and MOPD have allowed each office to leverage the others' expertise to build this important initiative.

Budget: Citi provided a $1 million contribution to the Mayor's Fund to Advance New York City to launch this program. Additional support to Na-tional Disability Institute has supported Empow-eredNYC as well.

Funding: Private Financing

Tags: Service Delivery Improvement, Innovation

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Elucd Inc: Grand Rapids Uses Sentiment Data to Improve Community Trust and Safety

Project Description: City leaders today know that how people feel really matters—it's info they MUST have. But traditional ways to gauge opinions don't cut it. Every mayor wants people in their city to feel safe and to improve the level of trust people have in the police, but they have no way to actually measure that.

Getting actionable feedback from the community is vitally important, but it's increasingly hard to do in a world where the loudest voices drown others out. Every mayor has attended community meetings where the same people show up, mentioning the same issues. Grand Rapids leaders found a way to regularly hear from all four corners of the population--especially those that are hardest to reach.

Having better data leads to better decision making, and all mayors have key metrics and dashboards to manage their cities. Most cities do surveys every year or two, but those don't provide management metrics or real-time information for decision makers. Elucd's tools provide information about what residents in each neighborhood think and want in real-time--every month, or every week, or even every day. Using that information has helped the Grand Rapids Police Department improve trust and safety.

City Challenge: In 2018, Grand Rapids Police Chief David Rahinsky wanted to reduce crime while improving community relations. Following incidents that generated national headlines and charged public meetings, Chief Rahinsky looked for new ways to gauge public sentiment and strengthen trust in the police. He considered commissioning a professional study, inserting a mailer with local water bills, even going door-to-door. But those one-time snapshots wouldn't solve his problem.

Chief Rahinsky learned about Elucd through his Mayor and persuaded the City Council to hire Elucd to provide ongoing data about community sentiment. "Elucd was the first time that I had heard of a way to get actionable data that's reliable, not just anecdotal. What's more, I could break down the data on a neighborhood level." He wasn't overly concerned that Elucd would create yet another metric against which his department would be measured. Instead he focused on the fact that Elucd could help him identify neighborhoods that had weak trust and safety scores so he would know where to allocate limited resources and be data-driven in his efforts to improve trust. "Thanks to Elucd I was able to track how well we were doing."

Impact: Elucd worked with GRPD command staff to provide granular data (that still preserved resident anonymity) to aid decision-making processes and create new opportunities to strengthen policing and community-building efforts.

Neighborhood-level sentiment reporting. Elucd measured sentiment at the neighborhood level to give a more nuanced way to identify patterns and understand how sentiment varied across the city.

Demographic breakdowns of community sentiment. GRPD wanted to know if changes in overall sentiment were driven by changes among specific demographics, so Elucd build tools to further drill down and analyze the results to see where they should be allocating their resources.

Specific community concerns. Like most police chiefs, Chief Rahinsky received lots of feedback from the same few people. To reach a wider pool of people, Elucd asked residents to share specific concerns anonymously. In many cases, residents provided specific, actionable feedback that drew attention to safety-related problems in their community, enabling leaders to tackle specific issues before they morphed into larger problems.

How-To: The power of this project lies in its simplicity. It did not require massive changes in staffing, training, or other management or administration practices. Instead, it involved injecting new data--data made available only through cutting-edge technology--into existing structures and processes in a way that unlocked profound new possibilities.

With the support of the Mayor, the Grand Rapids Police Department launched a pilot project with Elucd. Led by the Chief of Police, GRPD then put the data and tools in the hands of those in the best position to make a difference--command staff, police captains, crime analysts, and community engagement staff. They were not overly prescriptive with how this data should be used: they encouraged officers to try different things and generally embrace a spirit of data-driven experimentation and innovation.

Budget: $75,000/year

Funding: General Purpose City Funds, Asset forfeiture

Tags: Service Delivery Improvement, Innovation, Public Safety; Community Engagement
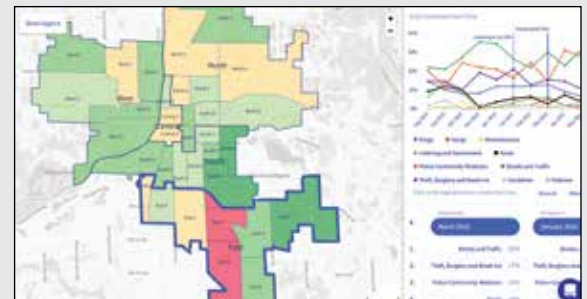
Elucd Custom Platform for Grand Rapids PD

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Ford Motor Company: 2018 City One Challenge in Pittsburgh, Miami-Dade and Grand Rapids

Project Description: The City:One Challenge is a community-informed innovation program for cities to co-create mobility solutions that:

- Widen the perspective of mobility needs and experiences
- Provide immediate impact for residents
- Inform future technology and infrastructure investments

The 2018 City:One Challenge was launched in collaboration with Microsoft, AT&T, and Dell Technologies in three cities across the U.S.: Pittsburgh, Grand Rapids, and Miami. Each Challenge is hosted as a collaboration between local government, the private sector, and community organizations.

City Challenge: Across our three 2018 cities, the City:One Challenge provided an opportunity to build trusted relationships between residents, businesses and government and to connect, empower and build community through mobility, including:

- 24K unique web visitors
- 2,922 active participants
- 10 community working sessions with 500 attendees
- 370 applications received
- 40 semi-finalists
- $300,000 distributed among 6 pilots

Impact: After identifying the needs of residents, the City:One Challenge crowdsourced ideas, shortlisted high-potential ideas, and selected 6 winners to receive pilot funding.

PITTSBURGH:

- Iomob: an open mobility aggregation platform leveraging blockchain technology to public and private mobility providers into a multimodal solution.

- Safe Shift: focused on getting night shift workers to and from work by providing safe and reliable transit during off peak and unpredictable hours.

- Intersection: aims to address the connectivity gap Pittsburgh residents face, whether it's connectivity to the internet, transit information, or city services.

GRAND RAPIDS:

- Kaizen Health: technology company working to modernize and streamline access to medical transportation, integrating services from Lyft, Go!Bus, The Rapid call center, and first/last-mile vehicles.

MIAMI-DADE COUNTY:

- Soofa Signs: solar powered digital bulletins to display real-time transit options and local content. They will pilot in ‹ 3 neighborhoods.

- PikMyKid is a mobile app that makes school transportation more efficient, timely, and comfortable. PikMyKid will pilot in ‹ 10 schools.

How-To: Each Challenge combined community engagement, data analytics and iterative co-creation to put residents at the center of mobility innovation. The Challenge was split into five phases, each with their own aspects of community-centered design and innovation management.

1. Explore: To start, we explored what questions are the most important to address by asking community members to share their transportation experiences, needs, and knowledge of local context to inspire others and ground innovation in the needs and aspirations of real people.

   - Analyzed 492,000+ social media posts and local transportation data
   - 20 intercepts
   - 4 mobility shadows
   - 15 in-depth interviews
   - 5 in-depth interviews

2. Propose: We opened an application period for community members as well as innovators to submit their proposal for ideas that solve the city's Challenge.

   - 10 community working sessions, with 477 participants and 46 residents as panelists
   - 370 applications received

3. Refine: Semi-finalists received expert mentoring and training on develop their solution into a pilot proposal relevant to local communities. The community at large provided feedback on their ideas and helped to identify neighborhoods, communities, or organizations they could consider working with in a pilot project.

   - 40 semi-finalists
   - 35 expert mentors
   - 3 workshops
   - 3 local accelerators

4. Select: A local judging panel selected the top idea(s) to win up to $100,000 to pilot their proposal.

   - 15 Judges
   - 10 hours of interviews
   - 3 Finale Events
   - 6 winners selected to pilot
   - $300,000 in pilot funding awarded

5. Pilot: Winner(s) collaborate with the city and with communities both to implement the pilot and to collect impact metrics that can inform further deployment.

Budget: $250,000 per city

Funding: Private Financing, Foundations and Philanthropy, State Grants, General Purpose City Funds

Tags: Service Delivery Improvement, Innovation, Cost Savings, Business Benefits

Alex Pazuchanics (Asst. Director of Pittsburgh DOMI) sharing the city's values

Residents collaborating and ideating around the city's mobility challenges

Safe Shift, one of the Challenge winners, brought together industry and residents to create a pilot

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HDR: Denver Mobility Choice Blueprint

Project Description: The rapid integration of connected, automated, shared and electric (CASE) technologies has the potential to drastically disrupt our transportation infrastructure environment. Mismatched systems could delay safety benefits, automation could add congestion, electric vehicles could reduce traditional revenue streams, and new transportation options could be available only to select participants.

A unique partnership of the Denver region's primary transportation agencies collaborated with private sector organizations to develop the Mobility Choice Blueprint. Their goal was to understand and identify the best investments in emerging technologies that are revolutionizing transportation mobility.

HDR, in partnership with KPMG, served the client team that included the Colorado Department of Transportation (CDOT), the Denver Regional Council of Governments (DRCOG), and the Regional Transportation District (RTD). Together with the Denver Metro Chamber of Commerce, these agencies established the Mobility Choice Initiative, a nonprofit designed to change how Denver moves, making the city a better place to live and work. Required agencies to look beyond traditional transportation planning.

City Challenge: There were three phases. The first gathered input from the public, stakeholders, transportation agencies and global mobility experts regarding the mobility forces of change. Intensive discussions with a diverse cross-section of residents and a digital engagement approach connected more than 1,000 participants through an interactive website. An online survey produced "mile-high traveler" personas and identified quality-of-life priorities that provided alternative scenario planning. This allowed the team to use technology, community and transportation forces to produce a long-term vision of regional mobility.

The second further developed and evaluated scenarios through qualitative and quantitative methods. The team examined scenarios at a macro level through travel demand model sensitivity tests of emerging technologies and at a human scale using day-in-the-life persona travel diaries based on the ethnography process.

The final phase built around actions to improve regional coordination; optimize transportation systems; maximize funding sources and integrate new technologies.The final Blueprint synthesizes the findings and makes a case for the 34 tactical actions.

Impact: The Mobility Choice Initiative disbanded with the publication of the Blueprint study. However, the collaborative capacity built among the region's transportation agencies is stronger than ever. These new ties allowed each participant to find programmatic synergy and greater role clarity as they deliver transportation infrastructure, policies and services to the region's more than 3 million residents in the face of unprecedented technological and societal changes.

As the team conducted the study, a wide variety of groups across the Denver metropolitan area expressed an interest in the work. The team presented the study at an array of forums. A rare occurrence for public transportation planning, the team engaged 14 global transportation experts to guide and inform the process. Further, as the private sector will become more influential in shaping the future of transportation, private companies provided input, making the dialogue a two-way street for future planning. Finally, the study covered the entire Denver metropolitan region as opposed to focusing solely on one city or municipality, laying the groundwork for a system that effectively serves the whole region.

How-To: A revolutionary planning effort for the integration of connected, automated, shared and electric technology in the transportation system, the Mobility Choice Blueprint offers Denver regional transportation officials a pathway to new technology integration. The unique collaboration between transportation agencies, private sector companies and global transportation experts created the Blueprint, which identified the best investments and aligned programs and policies to prepare for cataclysmic new technologies.

The project gathered input from the public, stakeholders, transportation agencies and global mobility experts on the changing landscape of transportation. By creating profiles of drivers throughout the region, the team assessed transportation user needs — families, work, quality of life, health and wellness — and integrated them into regional planning. Leveraging more than 70 Metro Mobility Ambassadors also helped inform each decision.

The team built consensus on actions to improve regional coordination; optimize transportation systems; maximize funding sources; integrate new technologies such as shared, automated, and electric mobility options; and manage data. The final Mobility Choice Blueprint synthesizes the project's findings and makes a case for the 34 tactical actions, which allowed the team to use technology, community and transportation experts to produce a long-term vision of regional mobility.

General Tips: We employed an innovative approach to planning for emerging technologies related to connected, automated, shared and electric capabilities. It was an umbrella project that examined new mobility technologies and developed a categorization scheme for integrating them into the transportation system.

The team employed an innovative approach to planning for emerging technologies such as micromobility, ride hailing services, microtransit, connected vehicles, automated vehicles and vehicle electrification, as well as system-wide enhancements, including multimodal transportation system optimizations along with data sharing, protection and management. Specifically, in-depth ethnography interviews compared the real-world impacts of maintaining the status quo and proactively planning for new mobility technologies. Using these interviews, the team developed personas to describe the impact of implementing the Blueprint on individuals.

Budget: $400,000

Funding: The project was funded by contributions of $400,000 each from CDOT, DRCOG and RTD. CDOT used FHWA State Planning & Research funding, DRCOG used Surface Transportation Program-Metro funds, and RTD used local funding.

Tags: Service Delivery Improvement, Innovation, Cost Savings, Environmental Impact, Impact on City Economy, Increased Tourism, Business Benefits

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HomeServe: City of Scranton Partnership Educates and Protects Homeowners

Project Description: An unexpected expense can cause significant hardship on household finances. According to the Federal Reserve's Report on the Economic Well-Being of U.S. Households in 2017, 40% of Americans can't afford a $400 emergency expense. A Service Line Warranty Program educates homeowners about their service line responsibilities and helps residents avoid the out-of-pocket expense for unanticipated and costly service line repairs and replacements. Program benefits include: no cost for cities to participate; affordable plans for residents; reduces local officials' frustration; increases citizen satisfaction. Additionally, this public-private partnership program generates an ongoing, sustainable source of revenue for partner municipalities. Many cities use the revenue for assistance programs for disadvantaged residents. It also stimulates the local economy by using fully vetted local contractors to complete the repairs. The City of Scranton made the decision to enter into a public-private partnership with the program in 2015 to educate residents and offer affordable protection.

City Challenge: Scranton, Pennsylvania is the poster child for a legacy city that has revitalized itself with a vibrant arts scene and walkable downtown that boasts farmers' markets, industrial buildings turned trendy lofts, special events and festivals while reclaiming its history as an industrial center and honoring its diverse heritage. Like many older cities, the City of Scranton has seen a steady increase in water infrastructure problems, and local officials are often contacted by residents with water and sewer line issues on the "private side," the portion of the line from the house to the water meter, for which the homeowner is responsible. The City has received many calls from homeowners with broken or leaking service lines expecting assistance from the City. Residents are surprised to learn that the City can't help, and this sometimes results in anger and dissatisfaction with the City. The City needed a way to educate Scranton homeowners about their service line responsibility and offer them affordable protection against this potentially expensive problem.

Impact: Over 600 Scranton homeowners have opted to purchase a plan which has saved them over $250,000 in the past 3 years. "We have a lot of older homes and an older population," David Bulzoni, City of Scranton Business Administrator, said. Bulzoni noted partnering with the program was a proactive way to address one of a myriad of issues and requires very little attention from the city. The City also receives royalty payments from the program which are dedicated to the Scranton Homebuyer Assistance Program (SHAP). Administered by NeighborWorks of Northeastern Pennsylvania, SHAP provides financial assistance for exterior home repairs. Eligible homebuyers can receive up to $5,000 for exterior home repairs and improvements, including roofing, siding, windows, doors, porches, fences, landscaping, and sidewalks. "Applying the funds to this program as opposed to the City's general operating budget enables us to fully leverage dollars to create improvements in the lives of our citizens and enhance the beauty and livability of our neighborhoods," said Bulzoni. "The program has been incredibly well-received and we are glad to have the additional revenue to enable continued funding."

This home was renovated via the Scranton Homebuyer Assistance Program. This program receives all proceeds from the partnership between the City of Scranton and the NLC Service Line Warranty Program.

How-To: Partnering with the program is very simple. The City reviews and approves a 3-page marketing agreement and approves the partnership at a city council meeting or other city meeting. The City is also asked to approve a public awareness letter prior to launch. The process is:

- City homeowners receive an educational mailing twice a year informing them about their responsibility for their home's exterior water and sewer line and offering affordable protection.

- Homeowners can enroll via mail, phone or web.

- The Program's U.S-based call center answers claims calls 24/7/365 and dispatches local, rigorously vetted contractors.

- The contractor calls the homeowner within 2 hours to arrange a convenient time to visit.

- Once the work is complete, the homeowner signs off and the contractor sends the invoice to the Program, so there is no out-of-pocket expense for the homeowner.

- Homeowners are then surveyed on their experience and the city is kept informed through regular reporting.

The city receives a royalty payment once a month based on the number of its homeowners who sign up for repair plans. There is no cost for the city to use this program.

Budget: There is no cost to the city.

Tags: Service Delivery Improvement, Cost Savings, Environmental Impact, Impact on City Economy, Neighborhood revitalization

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IKE Smart City: IKE Smart City: Driving Discovery, Mobility, and Equity with Interactive Touchscreen Kiosks in San Antonio

Project Description: The City of San Antonio selected IKE Smart City to install a network of digital interactive IKE kiosks in 5 key areas through the City. IKE provides a two-way communication platform that achieves the City's objectives and more as an interactive kiosk solution that is robust, easy-to-use, relevant, and engaging.

IKE drives discovery, mobility, and equity through a dynamic and multi-lingual suite of applications that promote restaurants, shops, activities, and events free of charge. IKE offers detailed wayfinding and real-time transit information, and provides listings of civic resources, social services, and job opportunities. Through IKE, the City has deployed a widespread medium for community content, emergency messages and critical updates, along with an emergency call system to improve public safety. IKE also provides the City access to valuable data such as air quality, pedestrian counts, and public polling. IKE is ADA compliant and serves as a free Wi-Fi hotspot ensuring that all citizens can benefit from IKE's presence in the community.

Lastly, IKE Smart City covers all costs associated with IKE while delivering a stream of revenue back to the City through media sales.

City Challenge: The City of San Antonio wanted to connect with residents and visitors to drive citizen engagement in an innovative new way using sidewalk-level interactive digital kiosks in the public Right-of-Way. The platform needed to support smart city initiatives and placemaking goals by delivering connectivity and accessible information in heavily-populated public areas. In addition to seeking a way to support economic development through free business promotion and improved wayfinding, the City was focused on inclusivity to better serve communities in need.

Impact: Through the first four months of 2019, IKE kiosks in San Antonio have been used nearly 10,000 times per month and 83% of all users have been "Very Satisfied" with their experience as measured through IKE's public polling application. Engagement is high and citizens are actively leveraging IKE's content, services, and resources.

The kiosks are positively impacting connectivity in public spaces and benefiting surrounding communities. There have been over 4,300 connections to IKE's free Wi-Fi service across the network.

Very high usage of IKE's Photo Booth application indicates that the platform has infused a sense of fun into the streets of San Antonio and furthered engagement with the City.

IKE has been embraced by the San Antonio community. Press coverage and anecdotal feedback demonstrate community appreciation for the program, and positive sentiments have been widespread on social media outlets.

IKE's Photo Booth application adds vibrancy and fun to city sidewalks

How-To: An integrated team of subject matter experts working together is crucial to the implementation of a smart kiosk platform. From design, fabrication, permitting, and construction, to software development, content management, media sales, operation, and maintenance, each aspect of the program must work seamlessly with the others in order to achieve success. IKE Smart City has found this approach provides a superior product and the most effective and efficient end-to-end solution.

Budget: This project was implemented and is operated at no cost to the City of San Antonio.

Funding: Private Financing, Advertising Revenue

Tags: Service Delivery Improvement, Innovation, Environmental Impact, Impact on City Economy, Increased Tourism, Business Benefits

Wayfinding features improve mobility and drive exploration of a city

IKE helps residents and visitors discover local businesses

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Keolis North America: Keolis Launches First US Autonomous Shuttle on Open Roads in Las Vegas

Project Description: Starting November of 2017, Keolis partnered with the city of Las Vegas, the Regional Transportation Commission of Southern Nevada (RTC) and AAA, to bring the future of transportation to America: the nation's first self-driving vehicle to be fully integrated with a city's traffic infrastructure, in low-speed mixed flow traffic with interaction with vehicles, bicycles, and pedestrians. Keolis oversaw for one year the operation and maintenance of this fully electric shuttle.

The Arma shuttle, manufactured by NAVYA, comes equipped with LiDAR technology, GPS, cameras, and can seat 9 seat-belted passengers, including a trained safety operator. The vehicle can distinguish between moving and fixed objects. Safety features include the ability to automatically and immediately brake in the event of a pedestrian crossing in the path of the vehicle.

This one year pilot's goal was to study how the shuttle interacted in a live traffic environment in downtown Las Vegas' busy Innovation District, and to survey riders on their experience in order to understand why a large percentage of consumers remain wary of driverless technology, and whether a personal experience changes their perception.

City Challenge: Being the first in North America to run a driverless shuttle in open roads, we had to surpass countless technological barriers and social acceptance issues, with the help of the City of Las Vegas and the RTC.

Las Vegas was an ideal place for the launch because of the state's progressive regulations on autonomous vehicles, heavy investment in innovation, the high volume of visitors and a sunny, dry climate that's favorable for testing new driving technology.

Keolis, as a global provider of innovative public transportation services, was able to leverage its partnership with shuttle manufacturer NAVYA, and utilize its experience in running autonomous shuttles, in France, the United Kingdom and in Australia.

Ironically, an incident happened on the first day of the pilot, when a semi-truck unexpectedly backed into the Keolis AV shuttle. Fortunately, there were no injuries and very minor cosmetic damage to the shuttle. Ultimately, the Las Vegas Metropolitan Police Department confirmed the semi-truck driver was at fault for the accident. This incident underscored the importance of autonomous systems in helping establish safer options for the future of transportation.

Impact: The AV pilot ran six days a week, 8 hours a day either from 10 am - 6 pm or 11 am -7 pm, depending on summer heat, on a .6-mile clockwise loop in downtown Las Vegas, with stops at five pre-programmed locations. Maintaining a regular schedule was one measure of success. The shuttle ultimately transported more than 35,000 passengers over the course of the one-year pilot, more than double the initial ridership forecast.

More than 85 percent of riders surveyed indicated they would highly recommend the autonomous shuttle ride to family and friends. In addition, AAA surveys of riders report positive impressions, many of them saying the ride changed their perception of riding autonomous vehicles for the better. Local merchants also experienced a positive impact on sales near shuttle stops.

In May 2018, the City of Las Vegas received for this project the Green Alliance "Transformer Award", an award honoring people and technologies that have moved our society towards improved sustainability.

Finally, thanks to this successful pilot, the City of Las Vegas and the RTC were able to secure a $5.3 million grant from the Federal Highway Administration for a new autonomous shuttle project.

How-To: Our team educated Las Vegas/Nevada officials on data integration, communications processes, and safety measures required to enable the AV shuttle to run safely by communicating with the City's infrastructure, while ensuring that it operated at speeds designated for the road conditions, and according to the city's traffic light system. As a security measure, a remote worker monitored the GPS to ensure that the vehicle adhered to the programmed route.

The City helped bring in sponsors, including the Regional Transportation Commission (RTC), American Automobile Association, and Zappos, who provided dedicated shuttle parking.

Keolis also coordinated with the City as they installed the Dedicated Short-Range Communication (DSRC) devices on 5 traffic signals along the route to communicate their status with the shuttle.

We also worked with Nevada's Department of Motor Vehicles and coordinated with the National Highway and Traffic Safety Administration (NHTSA) to secure certification enabling us to import the NAVYA vehicles from France and to operate them on public roads.

To assist in commercialization, we helped the State of Nevada establish an "autonomous certification" for Nevada's driver's license and trained the shuttle's three operators, who received the first autonomous operator's license in the U.S.

Since Safety is always Keolis' number one priority, we partnered with companies like Drivecam to monitor all incidents that would be out of parameters and deploy new technologies to improve safety. We also partnered with first responders to educate them on proper intervention techniques with an all-electric driverless shuttle.

General Tips: As of June 2019, the City of Las Vegas will offer a new affordable way to travel along the Las Vegas Strip and downtown Las Vegas area – Trip to Strip. This on-demand rideshare service is a convenient option, especially for tourists who want to ride in style in limousine-style interior without paying premium prices.

Trip to Strip vehicles are equipped with complimentary WiFi, USB ports for charging and ample space for luggage. Rides start at $6 and are determined on the distance and number of passengers in the booking party.

Budget: $600,000

Funding: Private Financing, The project cost was subsidized by our partner AAA

Tags: Innovation, Environmental Impact

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Lion: Memphis Keeps its Firefighters Safe with Public/Private Turnout Gear Management

Project Description: The Memphis Fire department adheres to the adoption of the National Fire Protective Association Standard "The Standard on Selection, Care and Maintenance of Protective Ensembles for Structural Fire Fighting and Proximity Fire Fighting -- NFPA 1851". The NFPA 1851 standard calls for the "advanced" cleaning, inspection and repair of all protective equipment that falls under the definition of the standard.

The Memphis Fire Department, based upon these criteria and needs, developed a public/private project with LION Group of Dayton, OH that established the required resources to support a comprehensive management system for the MFD's turnout gear, including manpower and equipment necessary for implementation of NFPA 1851. This management and maintenance program is multi-faceted and encompasses all phases of the "care, maintenance and management" of this critical life-saving equipment.

City Challenge: Senior members of the Fire department leadership realized that performing to NFPA 1851's newly created requirements would be challenging for any Fire Department which is focused primarily on the delivery of public safety and rescue services to the public.

To respond to this challenge, The City of Memphis and MFD entered into a third-party agreement with LION's Total Care Division to manage all phases NFPA implementation and compliance programs. The program, managed by Lion, includes an Independent Service Provider (ISP) third party verification facility within the Memphis Fire departments quartermaster facility; management of the fire departments current certifications; provision of an on-site manager and liaison to the fire department; pickup, delivery and maintenance of all gear; and serving as a quartermaster. Lion's assumption of these responsibilities enables the MFD to remain focused on its primary mission.

Impact: In its first operational quarter, Lion spent approximately $48,000 on garment repairs and saved garments with a value of slightly over $100,000. Annualized, this potential saving represents close to a quarter of a million dollars, a significant savings to the City. Many of the saved garments came from such events as automotive shop fires, jet fuel events at the Memphis International Airport, and heavily soiled garments (such as tar and plastics) that in the past were deemed unusable, labeled as condemned, and destroyed. An additional benefit is the reduction of potentially harmful land fill material.

Though the program is in its early stages, over the next few years it is hoped that the removal of harmful particulates from the turnout gear on a regular schedule and "ad Hock" emergency basis, will improve the health of the firefighters and in the long run help to reduce potential incidents of occupational cancer.

Memphis Total Care Center

How-To: It is important to negotiate a comprehensive agreement that ensures full compliance with NFPA standards and to integrate the services fully into the daily life of the MFD.

The City and MFD view its relationship, therefore, with Lion as a partnership, not just a vendor. Lion has been entrusted with MFD personnel protective clothing that keeps its first responders safe. This means the reporting regimen, constant communication and close working relationship are essential. Since the partnership's launch in 2016, Lion's schedule adherence has been 100% compliant with no missed pickups of PPE to be inspected and timely redistribution back to the stations for firefighters' use. In addition, personnel used to manage the program has remained stable.

To achieve this comprehensive public/private agreement the following services should include, but not be limited to, such activities as the inventorying of gear, lifetime tracking of PPE, record keeping of all activities surrounding the inspection, cleaning and repair of PPE, hiring and managing the employees required to implement and maintain this program, creating and implementing the systems to manage these requirements and reporting the financial needs to maintain and replace the PPE as needed. Included in this system should be a repair regimen that identifies field issues related to the gear's performance; future design recommendations; and replacement planning.

General Tips: All aspects of this management process must be properly documented and criteria for replacement and/or retirement of the equipment must be established.

There are two main reasons why this is critically important. First, the NFPA standard helps protect the health and safety of the Memphis Fire Department first responders by reducing their exposure to potential byproducts created by a fire event. Firefighters can become exposed to such byproducts while responding to and suppressing a fire and coming into contact with such byproducts following a fire. Secondly, the standard provides protocols for proactively managing firefighters' Personal Protective Equipment (PPE) to maximize its useful life through routine and advanced inspection protocols for fire turnout gear.

Budget: $25,000

Funding: Minimal additional extra funding was used to develop this program. Present city facilities and equipment were repurposed for this project. Personnel costs were shifted from the public to the private sector. Costs were added from the Fire Department budget to pay for the direct costs of cleaning and repairing the equipment

Tags: Service Delivery Improvement, Innovation, Cost Savings, Environmental Impact

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McDonald's Corporation: Nationwide Summer Hiring and Education Partnerships

Project Description: Today, employers must provide more than good wages. With close to 850,000 employees across the United States, McDonald's and its independent franchisees have a unique role in closing the education gap. In 2015 we launched the Archways to Opportunity program, which offers employees access to a free high school completion program, upfront college tuition assistance, free English as a second language courses, and free education and career advising services.

McDonald's has proudly partnered with over 30 mayors (and counting!) to support their cities' summer job programs. By highlighting Archways to Opportunity and its commitment to hire hundreds of thousands of local youth, McDonald's has helped mayors achieve their summer hiring goals. This partnership has included dozens of community events in McDonald's restaurants with mayors, local franchisees, and Archways participants to share local opportunities. At his event in Louisville, Kentucky, Mayor Greg Fischer said, "Thank you to McDonald's for showing the way for what leadership and commitment to our City and our local youth is all about."

City Challenge: Working with mayors - from cities like Denver, Colorado, to Columbia, South Carolina to Eugene, Oregon - McDonald's has helped confront the challenges of youth unemployment, soft skill development, and education affordability. While the national unemployment rate has dropped considerably, the national youth unemployment rate remains stubbornly high at 9.2% (according to the Bureau of Labor Statistics). Since 2018, McDonald's summer hiring programs have directly hired young adults, mostly from lower income communities, affected by youth unemployment. During their employment, employees learn and develop transferable soft skills that will help them succeed at McDonald's and beyond.

In 2018, McDonald's invested an additional $150 million in Archways to Opportunity to triple tuition assistance benefits to $2,500 per employee per year, lowered eligibility requirements to just 90 days, and made high school and advising services available to family members for free. By lowering our eligibility requirements, we have been able to help even more youth access important educational resources.

Impact: Our people are at the heart of everything we do at McDonald's. We recognize this responsibility and McDonald's role as a longstanding leader in education and workforce development. Giving people the tools, training, and mentorship needed to succeed in a dramatically changing economy and workplace isn't just a moral imperative, it is vital to ensuring the prosperity of businesses and cities across the country.

McDonald's growing municipal partnership with mayors ensures that every year a new generation of young adults across the country will have the tools to tap into their tremendous potential either through continuing employment at McDonald's, acquiring the soft skills necessary for other future employment, or furthering their education through Archways to Opportunity. Since 2018, McDonald's has hired nearly 500,000 summer workers and since 2015 over 38,500 employees have benefitted from Archways to Opportunity, and McDonald's has awarded over $58 million in tuition assistance.

How-To: In 2018, McDonald's saw an opportunity to partner with mayors, local workforce development agencies, trade associations (i.e. Chambers of Commerce), and McDonald's independent franchisees to promote our seasonal job opportunities in cities throughout the country. Simultaneously, the eligibility to participate in our educational program, Archways to Opportunity, was shortened to 90 days.

When we engaged with Mayors at USCM winter and summer meetings, various mayors saw our partnership as a "first of its kind" way for their youth to secure gainful employment and obtain educational benefits they can use to achieve their goals and live up to their potential.

Special thanks to the following Mayors who have participated in summer hiring events:

Eugene, OR, Mayor Lucy Vinis
Vancouver, WA, Mayor Anne McEnerny-Ogle
Tacoma, WA, Mayor Victoria Woodwards
Louisville, KY, Mayor Greg Fischer
Springfield, MA, Mayor Domenic Sarno
Providence, RI, Mayor Jorge O. Elorza
Denver, CO, Mayor Michael Hancock
Lakewood, CO, Mayor Diane DuBois
San Jose, CA, Mayor Sam Liccardo
Buffalo, NY, Mayor Byron Brown
Trenton, NJ, Mayor Reed Gusciora
Ewing, NJ, Mayor Bert Steinmann
Lawrence, NJ, Mayor Christopher Bobbitt
Columbia, SC, Mayor Stephen K. Benjamin
Hartford, CT, Mayor Luke Bronin
Syracuse, NY, Mayor Ben Walsh
Richmond, VA, Mayor Levar Stoney
Miami, FL, Mayor Francis X. Suarez

McDonald's summer hiring program in partnership with mayors across the country is implemented by:

1. Identifying mayors willing to partner with McDonald's;

2. Partnering with those mayors to promote their municipal summer hiring programs and highlight McDonald's role in helping them to achieve those hiring goals;

3. Securing Mayoral and workforce development agency participation in a summer hiring event at a local McDonald's restaurant with franchisees and Archways to Opportunity participants

Tags: Impact on City Economy, Jobs Created, Business Benefits, Education, Youth Opportunity

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Meridiam: Governor George Deukmejian Courthouse Long Beach, California

Project Description: A decade ago, the court building in Long Beach, California was crowded, lines were long, escalators were failing, and the safety of court staff and the public was at risk. Today, as a result of the innovative procurement approach used by the Judicial Council of California, a modern, spacious, and energy-efficient building is open and serving the public. This groundbreaking project is the first social infrastructure project in the United States delivered through the P3 model. The new Governor George Deukmejian Courthouse has creatively solved the overcrowding and safety issues. Continued operations and maintenance of the facility are guaranteed through 2048 without exposing the State to the risks of cost and schedule overruns or the consequences of deferred maintenance. The Long Beach Courthouse P3 project includes the design, construction, financing, and maintenance of a new courthouse building that houses 31 civil and criminal courtrooms, jury deliberation rooms, a large detention facility, administrative offices and commercial retail place, as well as a new car parking facility.

City Challenge: The orginial courthouse in Long Beach in Los Angeles County, had become one of the worst facilities in the State, in need of repairs and expansion to meet the growing demand. The state of California was facing significant budget challenges, and needed to address infrastructure needs. In 2007, the state legislature authorized the Judicial Council of California, entity responsible for court facilities, to evaluate whether a P3 would be a viable project delivery alternative that would best address the State's goals and objectives for replacing the old court building. After an analysis of procurement and financing options, the Council determined that a P3 using a design-build-finance-operate-maintain (DBFOM) approach would provide the best value for the State. Specifically, the Council found that a long-term contract with built-in performance standards would be the most cost-effective choice over the full life-cycle of the building. This model, known as PerformanceBased Infrastructure (PBI), had not been used before for public buildings in the U.S. Using the PBI approach, and a competitive procurement process, the Council contracted with Long Beach Judicial Partners (LBJP) to DBFOM.

Impact: LBJP was delivered on time and on-budget, and from the start the team was engaged with the local community to ensure needs and concerns were addressed. One stakeholder was Chavez Elementary School, located adjacent to the new building. LBJP worked with representatives of the school to make sure the design of the courthouse would not negatively impact traffic or safety of the schoolchildren, by locating the public entrance to the courthouse on the side of the building facing away from the school. In addition, LBJP contributed funding for a new safety fence around the playground, and invited students to paint a mural on the construction fence. LBJP worked with the City of Long Beach and the County of LA on elements of the project affecting those entities, including the leased office space and the streetscape around the building. The city now has an open courtyard area within the courthouse which has been used for civic events and other gatherings. In addition, LBJP achieved a LEED-Silver rating for the new courthouse from the U.S. Green Building Council with incentive to reduce operating costs, at no additional cost to the state.


How-To: The Meridiam-led Long Beach Judicial Partners consortium was selected as the successful proponent in June 2010, and achieved commercial and financial close in December 2010. Construction progressed well and on budget, with substantial completion achieved in June, 2013, 8 weeks ahead of schedule. Final completion was achieved six months later. The DBFOM Agreement is structured over a 38-year concession with a 32-month construction period followed by a 35-year operating period. Revenues include performance-based fees, subject to appropriation by the State Legislature and meeting performance based indicators, County commercial lease payments, parking operator license payments and retail lease payments. This project is the first US social infrastructure P3 (also called PerformanceBased Infrastructure (PBI) in California). Continued operations and maintenance of the facility are guaranteed through 2048 without exposing the state to the risks of cost and schedule overruns, or the consequences of deferred maintenance. With performance ensured and room for expansion (should it be required), the state should not need another rebuild even far beyond 2048.

Budget: The total project size for the new courthouse was $495m; annual payments to cover the costs of operations and maintenance, to service the debt and pay back the equity, total approximately $50 million a year (not including any deductions for failure to meet performance standards, or any inflation adjustments).

Funding: Private Financing, performance-based payments subject to annual State appropriations

Tags: Service Delivery Improvement, Innovation, Cost Savings, Environmental Impact, Impact on City Economy, Jobs Created, Social Infrastructure Serving the Community
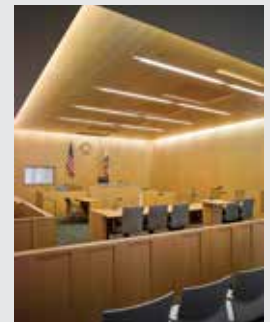
Courthouse

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Rubicon Global: Atlanta Uses Smart City Technology to Power Waste and Recycling Collection

Project Description: With city and state budgets continually being squeezed, more and more cites are turning to public-private partnership agreements as a way to bring innovative thinking and tangible solutions to their citizens. The City of Atlanta's Department of Public Works was looking for just such a partnership, setting ambitious goals for improving efficiency, increasing recycling rates and effectiveness, and driving improved sustainability.

Enter Rubicon Global, a private technology company born in the waste and recycling industry with a mission to end waste, in all of its forms. Rubicon's technology innovation—the RUBICONSmartCity™ platform—provides comprehensive waste and recycling data to cities, enabling them to reduce operating expenses, divert waste from landfills, improve recycling programs, track key metrics, and work toward long-term sustainability goals.

As a pilot program, Rubicon entered into an agreement with the City of Atlanta to install RUBICONSmartCity technology into the City's hauling vehicles and run it free of charge for six months.

City Challenge: Like many cities, the City of Atlanta faced a myriad of challenges related to waste and recycling collection, including:

- Inefficient routes
- Missed pickups
- Recycling going to landfill
- Unreliable vehicles
- Lack of operational data

The partnership between the City of Atlanta and Rubicon addressed these challenges using a combination of Rubicon's smart city technology and operational improvements implemented by the City's Department of Public Works.

Rubicon's technology enabled the City to identify opportunities for improving the efficiency of the City's routes, reducing missed pickups, and pinpointing which vehicles were causing the most breakdowns. In addition, Rubicon helped the City to identify that recycling vehicles were routinely disposing of loads at the landfill instead of the recycling facility. Overall, Rubicon's technology empowered the City with a stream of reliable operational data, enabling the City to make better decisions about improving waste collection throughout the City.

Impact: RUBICONSmartCity was installed in the City of Atlanta's fleet of 89 garbage, recycling, and yard waste vehicles, servicing approximately 96,000 residents. After the conclusion of the pilot, the following results were identified:

- POTENTIAL SAVINGS AND REVENUE: Rubicon identified actual and potential cost savings of up to $783,453 annually in areas such as landfill diversion, optimized waste and recycling routes, and reduced maintenance costs.

- LANDFILL DIVERSION: After analyzing data collected by Rubicon's technology, the City reduced recyclables going to landfill by 83%. This equaled 355 tons of recyclable material being kept out of landfills.

- FLEET MAINTENANCE: Rubicon's data showed that just 10 trucks were responsible for two-thirds of potential maintenance issues. The City focused on these trucks to reduce truck downtime.

- ROUTE OPTIMIZATION: Rubicon adjusted the City's solid waste service schedule from four to five days, decreasing the total amount of trash routes per day and balancing the number of hours driven among drivers.

- SUSTAINABILITY: Rubicon and the City made changes to waste and recycling operations that delivered savings of 4,752 MTCO2e.

How-To: Beyond the technology, cities often need to make operational changes to realize the gains identified by the technology. For example, recycling is a complex and costly issue. One way that a city can improve its recycling efficiency is by having a cleaner recycling stream and by educating its residents about what can and can't be recycled, so an entire load of recycling doesn't become contaminated by non-recyclable materials. To achieve this, cities may need to make a change in the way they handle recyclable materials.

With a commitment to improvement and technology to enable it, cities can make significant gains in improving solid waste and recycling collection. All cities should look at technology companies—such as Rubicon Global—and ask about piloting the technology and solutions first, as opposed to securing budget for the solution immediately. Once the ROI is demonstrated for the project, the conversation on contracts and a longer-term solution can easily be had.

General Tips: The smart cities movement is at a watershed moment. Cities have a once-in-a-generation opportunity to use technology that is low cost, leverages existing city assets, and drives significant process improvement for city systems.

By shifting to a technology-based, data-driven model, public works departments can achieve greater operational efficiency and drive better customer service. By committing to collect and analyze data from the field, sustainability departments can develop better recycling, zero waste, and resiliency policies. Technology can bring these two departments of city government together, ensuring that they are oriented towards delivering more effective service and more sustainable outcomes. Pilot programs through private-public partnerships like these are tremendous opportunities for a great city like Atlanta to make enormous strides in delivering better government.

Budget: For the City of Atlanta, there was no cost incurred for this initial pilot program, as Rubicon offered it as a free six-month pilot. Rubicon offers this to all cities across the United States, and around the world. If a city is interested in how it can leverage technology across its fleets and fleet management process to improve efficiency, increase recycling rates, and drive improved sustainability, Rubicon can work with any city team to make this happen.

Funding: Free Six Month Pilot Program

Tags: Service Delivery Improvement, Innovation, Cost Savings, Environmental Impact

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Signify (formerly Philips Lighting): Leveraging the Transformative Power of Light for Downtown Revitalization

Project Description: In Lynn, City Hall leaders, non-profits, the community and the private sector collaborated to implement a transformative arts program with dynamic lighting. Since the non-profit Beyond Walls initiated its first programs in 2016, downtown Lynn, just north of Boston, has been re-knit with a series of artistically lighted underpasses. "Today, commuters and pedestrians feel welcome whether they arrive by public transit or their own cars to view more than 50 murals, neon art works and lighting installations. Each of these projects have all played a key role in the revitalization of our City and added to the experience both residents and visitors have when visiting our downtown." says Mayor Thomas McGee. The program exemplifies partnership between local and state governments, union labor, the private sector and non-profits. One of the seed grants was provided by the MassDevelopment and the civic crowdfunding platform Patronicity. Commonwealth Places mobilizes community members by providing matching funds up to $50K for the campaign. In Lynn, more than 1,000 residents contributed two years in a row demonstrating the true city-wide impact of the revitalization effort.

City Challenge: Lynn is known for its rich industrial past as well as a vibrant and diverse community, however, shadowy railways and accident-ridden underpasses reinforced economic challenges and detracted from the historic qualities of the downtown. Revamping the downtown underpass lighting was a challenging and ambitious initiative, which required intensive collaboration with multiple parties and professionals. The non-profit organization Beyond Walls undertook the initiative with support from City Hall to transform downtown Lynn as the heart of the community. To accomplish this mission, it not only needed to make the lighting system more robust and aesthetically beautiful but also required greater community engagement to enhance residents' perception of safety in the area.

Impact: The project impacted the community positively in a few ways by supporting local businesses, enhancing residents' perception of safety, attracting tourists, and building civic pride. Many cities report significant upticks in restaurant, hotel, and convention business even the creation of new businesses like night-time kayak tours, evening Segway tours and after-hours festivals. At the unveiling of the underpass lighting, Mayor Thomas McGee led a cheering crowd of more than 500 local residents. Colors danced to the beats of local bands entertaining the crowds for the opening event. Since then, more economic activity, more revitalized storefronts and increased foot traffic is visible downtown. Especially during the Annual Street Art Festival thousands flock to the city and enjoy its restaurants. The three underpasses of Central Square, Washington Street, and Market Street have enhanced the experience of commuters. And now the Mayor is also advocating for renewed ferry service between the Lynn and the Seaport district in Boston – cutting travel time in half and linking the city directly to one of the fastest growing job markets.

How-To:

1. Develop a vision: Al Wilson, the Founder and Executive Director of Beyond Walls, initiated this transformative project. He found strong partners in City Hall, the labor union and the arts community to bring Lynn Lights to life.

2. Collaborate: Successful lighting projects tap into local strengths. Some of the most important support came from local business leaders dedicated community members and creative architecture and lighting design professionals.

3. Develop a lighting plan: an architecture firm, and a lighting-design practice, worked with the community to visualize a holistic masterplan.

4. Secure financing: Driving these projects requires in-kind and financial contributions from many sources. A unique MassDevelopment grant provided significant seed funding. In-kind support from professionals in design and implementation shaped the vision and ensured a successful, professional outcome.

5. Install, evaluate and repeat: Port Lighting Systems coordinated sourcing for all materials, installation and integration of all the systems. The International Brotherhood of Electrical Workers had 40 retired local union electric contractors donate their time to install all the electrical systems.

General Tips:

- Take advantage of state and federal grants and encourage those partner agencies to consider innovative models like the commitment from MassDevelopment. Crowd-funding also makes the local impact of a project highly visible and allows people to actively participate in the budgeting and routing of resources.

- Engage stakeholders early on so they can imagine the impact of the project. The visual excitement of even small demonstrations or mock-ups can be used to excite and inspire stakeholders to support the project.

- Digital technologies like social media platforms play an important role, both for tracking public acceptance and excitement as well as for up-to-the-moment maintenance information, IoT sensing platforms and analytics programs.

- Maintenance plays a key role in any public art project. Port Lighting Systems agreed to maintain the project via Signify's Interact Landmark for three years at no additional cost.

Budget: Beyond Walls raised $260,000 in funding, which doesn't include the significant in-kind contributions from Port Lighting, several professional design firms, and the International Brotherhood of Electrical Workers.

Funding: Private Financing, State Grants, Crowd-funding

Tags: Innovation, Environmental Impact, Impact on City Economy, Increased Tourism, Business Benefits, Public safety, civic pride, citizen engagement and revitalization

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Beyond Walls, Photo credit: Warren Jagger

Sourcewell: Electric Vehicle Purchasing Collaborative

Project Description: The Electric Vehicle (EV) Purchasing Collaborative (the Collaborative) is a partnership designed to help accelerate the electrification of municipal fleets across the country. Through www.DriveEVfleets.org and staff support, the Collaborative works to reduce the costs and barriers to electrifying fleets to make it easy for public fleets to go electric.

This program provides municipalities with access to competitively solicited electric vehicles and charging infrastructure, leasing options that can monetize state and federal tax credits, and tools to provide fleet electrification technical support.

The Collaborative also provides training, best practices, educational resources, and industry connections, creating a one-stop-shop to support electric vehicle transitions for public fleets.

The Collaborative brought together a coalition of over 400 U.S. mayors committed to addressing climate change (climatemayors.org), the Electrification Coalition (electrificationcoalition.org), and Sourcewell (sourcewell-mn.gov), and has already recruited 60 cities and five counties to purchase more than 1,300 EVs before the end of 2020.

City Challenge: With more than 10 million public and private fleet vehicles currently on the road in the U.S. using more than 95 percent petroleum-based fuels, municipal fleets have a very real opportunity to lead the future of transportation. Using electricity as an alternative energy source will reduce dependence on foreign exports and create a more stable energy market in the U.S.; one that is less susceptible to supply and price volatility. Electrification of municipal fleets can help communities become more resilient and guarantees air quality benefits, making communities cleaner, as well as helping them meet increasingly stringent emission requirements. Many cities have climate action goals, and EVs contribute to sustainability initiative goals around reduced emissions and petroleum use. To address other challenges, additional electric vehicles will be added to the Collaborative over time–including medium and heavy vehicles and transit buses, as well as additional light duty vehicles that are coming to market.

Impact: As founders of the initiative, Los Angeles Mayor Eric Garcetti, along with 19 other cities and two counties, launched the electric vehicle purchasing collaborative in 2018. The program was developed in partnership with the Electrification Coalition, a nonprofit working to accelerate the mass adoption of electric vehicles to reduce oil dependence, and the nation's premier cooperative purchasing organization, Sourcewell. As of May 2019, they are joined by over 40 other cities and numerous counties. Fleets are excellent candidates for vehicle electrification. Because fleet managers consistently rank the low cost of ownership as the most significant factor in acquisition decisions, cities will find they can save money through reduced operations and maintenance costs. EVs contribute to sustainability initiative goals around reduced GHG emissions and/or petroleum use. Additional vehicles will be added to the Collaborative over time–including medium and heavy vehicles and transit buses, as well as light duty vehicles that are coming to market. To date, 65 cities and counties of all sizes from across the U.S. have committed to transition a portion of their fleet to electric.

Electric fleet vehicle charging

How-To: The Collaborative uses cooperative purchasing contracts to facilitate its EV procurement. The foundation of cooperative purchasing and efficient public procurement is rooted in a process that is both public and open, and fair and competitive. These principles ensure efficient stewardship of taxpayer dollars when government entities procure goods and services. Cooperative purchasing fosters effective, broad-based competition within the free enterprise system. It affords other governments the benefits from time and administrative savings, and allows for cost efficiencies generated from economies of scale. Sourcewell executes cooperative purchasing contracts of behalf of the Collaborative's participants. This is accomplished through cooperative purchasing and joint exercise of powers statutes, which allow for the Collaboration's cities to utilize the competitive solicitation and cooperative contracts Sourcewell has solicited and awarded. Sourcewell follows a procurement process as prescribed by law. This fair and open competitive solicitation process ensures maximum competition among vendors, as well as ensures it meets the procurement requirements that cities must comply. Cities and other governments in every state benefit from the procurement advantage Sourcewell provides. In 2018, more than 30,000 public agencies utilized 355 cooperative purchasing contracts in $2.9 billion worth of procurements, a true testament to the success of cooperative purchasing. Learn more at sourcewell-mn.gov.

General Tips: Cooperative purchasing is an established and accepted method of government procurement that increases efficiency and transparency in government purchasing. Solicitations are conducted on behalf of all eligible governments, resulting in increased competition. The discounted volume pricing is achieved through aggregated volume, and these contracts may then be utilized by governments. When used as a procurement tool by purchasing officials, cooperative purchasing results in significant time savings, reduced administrative costs, and access to the best value of products and services needed, at cost savings – which maximizes taxpayer resources.

Budget: There is no cost. Drive EV Fleets is a turnkey, one-stop, procurement portal providing municipalities everywhere equal access to competitively solicited electric vehicles, accompanying charging infrastructure, fleet management, and innovative financing op

Tags: Innovation, Cost Savings, Environmental Impact, Impact on City Economy, Business Benefits, Transportation

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Splunk: Splunk: Los Angeles Adopts Analytics Driven Cybersecurity Defense

Project Description: Splunk provides Los Angeles with holistic views of its cybersecurity posture. The City's cybersecurity team uses Splunk to investigate, monitor, analyze, and act on data from across the city's numerous departments for a unified security posture. Using pre-built, easily customizable dashboards, executives and analysts have always-available, real-time situational awareness of cybersecurity events across the city's IT infrastructure. With all security data in one continuously updated database, the Los Angeles cybersecurity team views and compares any machine-generated data, including disparate computer logs and both structured and unstructured data, to extract all-inclusive, actionable security intelligence.

City Challenge: The City of Los Angeles delivers services to 4 million residents and 50 million annual visitors, employs 40,000 employees, operates a major airport, seaport, and water and power infrastructure. Serving Los Angeles requires a vast digital infrastructure with over 100,000 computing endpoints. These endpoints generate 1 Billion cybersecurity records daily - including cyber-attacks such as ransomware and distributed denial of service (DDoS) attacks. "Mayor Garcetti issued an executive directive to improve cybersecurity," said Timothy Lee, Chief Information Security Officer for Los Angeles. "This meant collecting and evaluating all of our data in real time. We needed a scalable SIEM (Security Information and Event Management) platform to drive an integrated, citywide SOC (Security Operations Center)."

Impact: Los Angeles's cybersecurity analysts can monitor for malware and identify attackers and their targets within the city's digital infrastructure. Splunk dashboards alert for security events, enabling prompt responses to intrusions that threaten public services or assets. Analysts conduct searches and forensic investigations, drilling down to track hazards anywhere in the enterprise. "By using the Splunk platform to gain visibility into network activities, we assess risks, prioritize and mitigate threats, and proactively address vulnerabilities," says Lee. "Our Splunk SIEM is like having video cameras on every block; it provides visibility into what's happening on the network, which is foundational to safety."

How-To: To protect its digital infrastructure, the City of Los Angeles deployed Splunk's scalable cloud-based Security Information and Event Management (SIEM) solution as the core data analytics engine of its Security Operation Center (SOC). With Splunk, Los Angeles proactively investigates, monitors, analyzes, and acts on its data to prevent cybersecurity incidents.

Funding: General Purpose City Funds

Tags: Cybersecurity

LA's Security Operations Center (SOC)

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Stantec: Permanent Canal Closures and Pumps Project

Project Description: In response to Hurricane Katrina's devastation of New Orleans, the USACE embarked on a $14.6 billion HSDRRS to repair the damage and improve the resiliency for the surrounding community. The final piece of this massive initiative was the $690 million Permanent Canal Closures and Pumps design-build project with Stantec as the lead design engineer and architect.

Over 450 Stantec staff from 55 offices collaborated with our design partners and the client.

City Challenge: As part of an integrated team, Stantec designed a long-term flood damage risk reduction system to reduce the risks and damage of a 100-year storm event. The facility has three main functions. First this system provides drainage pumping and improved water evacuation for the City's three main outfall canals.

This is accomplished with giant five-story high axial flow pumps and vertical motors. Second, the solution acts a flood barrier from Lake Pontchartrain's storm surges, which can have wave heights of almost 14 feet. This is accomplished using 18-foot high surge gates. Third, the facility is a power station with enough generator power and fuel to run the station for five days.

Impact: As part of an integrated team, Stantec designed a long-term flood damage risk reduction system to reduce the risks and damage of a 100-year storm event.

The system can operate continuously and independently for up to five days during major hurricane events. Total pumping capacity of 24,300 cfs or enough to fill an Olympic sized swimming pool in less than 4 seconds. The solution acts a flood barrier from Lake Pontchartrain's storm surges, which can have wave heights of almost 14 feet.

This project was recently featured on The History Channel's Project Impossible and in ASCE's Civil Engineering magazine. It also received an Award of Excellence, Municipal and Civil Infrastructure in 2018 from the ACEC-BC.

17th Street Station
- 15 generators (2.6 MW each)
- Total pumping capacity of 12,600 cfs

Orleans Avenue Station
- Four generators (2.6 MW each)
- Total pumping capacity of 2,700 cfs

London Avenue Station
- 11 generators (2.6 MW each)
- Total pumping capacity of 9,000 cfs

How-To: Stantec provided full design services including post-feasibility site planning, project management, coordination, and design analyses for soft soils geotechnical investigations in the coastal environment, corrosion protection, architecture, innovative cofferdam design, civil/landscape, environmental permitting, hydraulic analysis, structural, mechanical, electrical, instrumentation, and VE focused on design optimization to reduce riprap, reinforcing steel, and concrete quantities, and resiliency measures (e.g., splash pads). Efforts included quantity take-offs and cost/schedule risk analyses. Developed design-build RFP packages for project elements (e.g., 200-mph copper roofing systems) for subcontractors to bid. All were done in compliance with ER1110-2-1150 (E&D for Civil Works Projects) and ER1110-1-12 (Quality Management).

For each pump station, the design includes connection to the existing coastal flood risk reduction levee system with new and upgraded earthen levees; concrete T-walls up to 18.5' tall incorporating a 2.0' extension above the existing levee system to accommodate uncertainty and sea level change; slide gate vehicle closures; and large gate closure structures at each canal. Scour protection from wave attack on the flood side and overtopping on the protected side was incorporated into the design of both earthen levees and floodwalls. Scour protection requirements were determined through hydraulic wave modeling including SWAN and Bouss2D.

The Design Management Team mobilized on-site one week after NTP and was substantially completed in 4 years including design, review approvals, construction and commissioning. This project was recently featured on The History Channel's Project Impossible and in ASCE's Civil Engineering magazine. It also received an Award of Excellence, Municipal and Civil Infrastructure in 2018 from the ACEC-BC

Budget: $690 million

Funding: USACE was the lead agency for the project in partnership with the State of Louisiana's Coastal Protection and Restoration Authority (CPRA).

Tags: Service Delivery Improvement, Innovation, Environmental Impact

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SUEZ North America: Process Optimization of Hinkley Water Treatment Plant for Mohawk Valley Water Authority

Project Description: SUEZ North America started operating the Hinckley WTP as a Ppublic-Pprivate Ppartnership for the Mohawk Valley Water Authority (MVWA) in Utica, N.Y. on August 1, 2017. We immediately began a program of process optimization that involved pilot testing to evaluate virgin vs. regenerated granular activated carbon (GAC). GAC is a proven option to remove certain chemicals, particularly organic chemicals, from water. GAC filters also can be used to remove chemicals that give objectionable odors or tastes to water such as hydrogen sulfide or chlorine. SUEZ, working hand in hand with the MVWA, tested virgin GAC filters against filters that used GAC that had been regenerated by thermal treatment. SUEZ also tested clarifier rinse and filter backwash profiles to reduce flows and loading on the sludge lagoons, testing to optimize coagulant type and dosage to reduce Total Organic Carbon (TOC).

City Challenge: The 32 million-gallon-per-day water treatment plant had been constructed in 1992. In recent years, it was facing safety, regulatory, compliance, and environmental issues (due to its high chemical usage). SUEZ and MVWA sought ways to optimize operations, reduce costs, and improve regulatory compliance. Successful results would yield economic and environmental benefits. Specifically, the use of regenerated GAC (approved by the NY State Department of Health) lowers costs associated with filters by about 25 percent—savings that can be passed on to ratepayers. Additionally, SUEZ and MVWA worked together to eliminate 150,000 to 240,000 gallons each day of washwater used in the filtration process, providing a savings of $44,000 a year. A next initiative now underway is to reduce the use of soda ash and supplement it with orthophosphate, which forms an insoluble coating on plumbing pipes and fixtures. If successful, that plan would also extend GAC life to four years from one year, adding another $500,000 saved over a four-year cycle.

Impact: Optimization of the Hinkley Water Treatment Plant for Mohawk Valley Water Authority had positive environmental and economic impacts. First, it lowered the cost to produce water, yielding a favorable impact on rates. The project also provided further proof of the environmentally sustainable benefits of using regenerated GAC. This provides further impetus for other communities to use this optimized process. By reducing washwater volumes, SUEZ and the MVWA also showed other communities how they could reduce water production costs and improve the processing of water-treatment sludge and extends sludge lagoon life.

How-To: SUEZ started operating the Hinckley Water Treatment Plant for the Mohawk Valley Water Authority (MVWA) in Utica, N.Y., on August 1, 2017. We immediately began a program of process optimization that involved:

- Pilot testing to evaluate virgin versus regenerated GAC;

- Preparation of a Beneficial Use Determination (BUD) submittal to the NYSDEC for innovative reuse of the water treatment residuals;

- Clarifier rinse and filter backwash profiles to reduce flows and loading on the residuals lagoons; and

- Testing to optimize coagulant type and dosage to reduce Total Organic Carbon (TOC).

- Evaluating switching from gaseous chlorine to hypochlorite for disinfection, primarily for safety reasons.

The use of regenerated GAC was approved by the NYSDOH and has resulted in savings of $250,000 per year. With BUD approval, MVWA could save another $125,000 a year. SUEZ and MVWA are continuing to pursue that aspect of the optimization project, but are giving priority to the GAC and backwash portions.

The optimization and research approaches can be adapted by other SUEZ companies. Currently working on similar BUD application for Pawtucket, RI, to reduce costs and provide a sustainable and environmentally friendly way to dispose of water treatment residuals. All these techniques can be used in business development opportunities to showcase our innovative approach to process optimization and research.

Budget: All optimization work was covered under our Technical Support Services and performed by SUEZ/MVWA staff and laboratory. The optimization work is part of the $16 million, five-year contract that SUEZ and MVWA signed for SUEZ to operate, maintain, and impro

Funding: Public Private Partnership

Tags: Service Delivery Improvement, Innovation, Cost Savings, Environmental Impact

Mohawk Valley Water Authority's Hinkley Water Treatment Plant

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VMware: North Las Vegas: A City Rises

Project Description: Innovation is a best practice in everything. North Las Vegas Mayor John Lee recognized the need for change, and partnered with VMware to virtualize the city's infrastructure. The city modernized its servers, networking, and storage, using VMware technologies such as VMware NSX, vSan, ESXi, Horizon View, and vRealize Log Insight. VMware worked side-by-side with city personnel to successfully implement the new technologies. The partnership enabled North Las Vegas to virtualize all its software applications.

City Challenge: In 2013, the City of North Las Vegas was teetering on the brink of financial, social, and political collapse. The Great Recession had left this medium-sized city of 250,000 with more than $152 million in debt, the highest rate of home foreclosures in the nation, and the state of Nevada poised to take over the city and divide the municipality among its neighbors.

Prior to virtualizing its infrastructure, the city struggled to meet the demands of its 13 city departments and the citizens they collectively serve. Costly and difficult to service, the city's servers were constantly breaking down to the detriment of vital city services like the police and fire departments they were dedicated to support. Field operations by these departments and other city agencies were compromised as a result.

Impact: North Las Vegas has seen a significant increase in its ability to administer citizen services. By virtualizing city infrastructure, the city government has improved its operations while reducing costs. Now, residents can receive faster approval for business or construction permits. Additionally, the city government can use Internet of Things (IoT) monitoring to conserve water and other resources. Public libraries can use desktop virtualization to increase educational opportunity and workforce development.

The improved efficiencies have enabled new business investment and construction, adding millions of dollars to the city's economy. Under Mayor Lee's leadership, North Las Vegas has transformed into an innovative hub for businesses and citizens, and shows great promise for the years to come.

How-To: First, Mayor John Lee had the vision to revitalize the city's economy through infrastructure virtualization. He wanted to encourage business growth in North Las Vegas by creating more user-friendly city services.

To achieve his goal, Mayor Lee partnered with VMware to virtualize the city's infrastructure.

North Las Vegas first virtualized its servers. Next, it virtualized the city's networking and storage with VMware NSX and VMware vSAN. Throughout this transformation, VMware worked closely with the city government, in a critical support role. Finally, the city started incorporating other VMware products, including VMware ESXi, VMware Horizon View, and VMware vRealize Log Insight.

Today, North Las Vegas uses VMware virtualization technologies to support its entire software portfolio, including its cloud services. Now, the city is better able to increase opportunities for its residents and more efficiently respond to their needs.

Tags: Service Delivery Improvement, Innovation, Cost Savings, Environmental Impact, Impact on City Economy, Jobs Created, Business Benefits

VMware server virtualization enables North Las Vegas to improve

The city's fully-virtualized, IoT-based, state-of-the-art water treatment plant.

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Walgreens: Walgreens Safe Medication Disposal

Project Description: In 2017, more than 47,000 Americans died from an opioid overdose and an additional 1.7 million Americans suffered from substance abuse disorders related to prescription opioids. There is a tremendous need for partnerships at every level to help combat this crisis. In response, Walgreens launched a Safe Medication Disposal Program in 2016 to help get unused prescription medications out of our homes and disposed of in an environmentally responsible manner in our retail locations.

Safe medication disposal kiosks provide a year-round solution to dispose of unwanted, unused or expired prescription medications, including controlled substances, and over-the-counter medication at no cost. Safe medication disposal is one of the best ways to ensure medications are not accidently used or intentionally misused by someone else.

Walgreens has installed over 1,300 Safe Medication Disposal kiosks in our stores in 46 states and Washington, DC and will continue to expand to 1,500 disposal kiosks. Our expansion has focused on Walgreens stores near military bases and other areas where the opioid epidemic has challenged communities.

City Challenge: Communities often had few options for the safe disposal of prescription medications. In many municipalities, the disposal of medication is left up to the police departments, creating an additional burden on financially strapped departments. In addition, some residents might feel uncomfortable, for various reasons, bringing their medications to a law enforcement entity.

This perceived barrier to medication disposal led to residents flushing medication down toilets and harming the environment, disposing of the unwanted medications in the trash, or simply keeping the medication at home.

Old medications in the home are dangerous on many levels. Studies show teenagers who abuse prescription drugs are most likely to get them from a friend or family member's medicine cabinet. In addition, the availability of old medications often leads to individuals self-prescribing harmful combinations of prescription drugs.

The availability of a year-round permanent disposal option in 1,500 of our retail stores across the country helps protect our loved ones from the misuse of prescription drugs and helps protect our environment.

Impact: In only three years, the Safe Medication Disposal program has collected over 1.2 million pounds of unwanted prescriptions – including controlled substances and other medications. This represents 1.2 million pounds of medication that our teenagers could have had access to, that our rivers could have been exposed to by flushing medications, and that could have endangered lives by being in the wrong hands.

In addition, it is providing a resource that public safety entities had been providing, and funding, on their own.

Jacksonville Florida's Mayor Lenny Curry was one of the many mayors joining Walgreens to help promote the safe disposal of prescription drugs.

How-To: We have currently installed 1,300 kiosks and expanding to 1,500 kiosks in the near future. While we don't have any plans to install more than 1,500 kiosks, we encourage Mayors and local officials in our communities that have disposal kiosks to partner with us for a media and public awareness event. We are eager to replicate these events in communities across the country.

In areas where we do not have a kiosk, we can partner with the local police department and local government to have disposal events in our store parking lots on DEA National Drug Take Back Days, held in April and October of each year.

General Tips: Retail stores can be an invaluable partner in the fight to combat the opioid crisis.

Funding: Private Financing

Tags: Innovation, Cost Savings, Environmental Impact

Safe Medication Disposal Kiosks are available in over 1,300 retail locations

Many municipalities, such as Baton Rouge, helped promote safe medication disposal in our stores through their social media properties.

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• Baton Rouge, LA - Mayor Sharon Weston Broome
• Beaverton, OR - Mayor Denny Doyle
• Brooklyn Park, MN- Mayor Jeffrey Lund
• Brunswick, NJ - Mayor Kevin McEvoy
• Brookfield, WI - Mayor Steve Ponto
• Cheyenne, WY - Mayor Marian Orr
• Colorado Springs,

Waste Management: City of Moreno Valley's Innovative Homeless-to-Work Program

Project Description: In late 2017, the City of Moreno Valley, CA, created and implemented an innovative Homeless-to-Work program in partnership with the Salvation Army and Waste Management. Identifying people who were homeless through a Point-in-Time Homeless Count, Mayor Yxstian Gutierrez adopted a very proactive approach to end homelessness in Moreno Valley – and serve all of Moreno Valley residents, not just those with permanent housing.

Leveraging the proven track record of the Salvation Army to find permanent solutions for people who are homeless, and engaging Waste Management to provide supplies for job sites, which morphed into creating full-time job opportunities, the City of Moreno Valley implemented the Homeless-to-Work program. In its first year, more than 25 percent of the people identified as homeless obtained permanent employment in 2018. As importantly, these residents regained their self-confidence and skills necessary to successfully reintegrate into society and retain employment.

City Challenge: The City was experiencing increased pressure from residents and businesses to find solutions to end homelessness. The low number of homeless individuals in Moreno Valley, relative to the County or State, limited available governmental funding. Undaunted, the Mayor directed staff to create a program that would provide transitional employment and wrap-around services for all individuals who were homeless.

Mayor Gutierrez recognized that community engagement was vital to the program's success and a trustworthy social service partner was essential to establish credibility with key stakeholders. The Salvation Army was selected as the outreach partner to oversee the Homeless-to-Work program, while providing matching funds to ensure the program's viability.

Participants in the Homeless-to-Work program were trained to beautify areas of the City. As part of its commitment and continued investment in Moreno Valley, Waste Management provided supplies for the participants on the job sites – safety vests, tools, trash bins. As the program evolved, Waste Management hired qualified participants for permanent employment – providing individual stability and overall community benefits.

Impact:

- The positive outcomes of the Homeless-to-Work program are numerous. More than 25% of the individuals who were homeless found permanent employment. Plus, every individual without permanent housing has been contacted by a Homeless-to-Work representative, and there is a waiting list to enroll in the program.

- In addition to case management, the Salvation Army helped participants obtain identification and social security cards, along with accessing much-needed healthcare.

- More than 100 areas of the City were beautified through the efforts of the Homeless-to-Work participants.

- Encouraging individuals who were homeless to participate in the program initially posed a challenge. An individual whom residents trusted – a man who had been living on the streets for 30 years, had successfully made the transition to full time employment, and owned his own home - was appointed Program Coordinator.

- Mayor Gutierrez touted the City's commitment and participants' successes at every chance, using social media and a local theater commercial to reach more than 20,000 people a month. This passion translated into buy-in for the program from residents and community partners.

How-To:

- The 2017 Riverside County Point-in-Time Homeless Survey identified individuals who were unsheltered in the City of Moreno Valley.

- Mayor Gutierrez directed staff to address the needs of all Moreno Valley individuals who were homeless by creatively leveraging governmental, social service, and private resources. The City's goal was to find a permanent solution to end homelessness and provide opportunities for individuals who were homeless to gain employment.

- The Salvation Army was selected to oversee the Homeless-to-Work program; Waste Management was enlisted initially to provide job site supplies. Federal funds were secured through the Emergency Solutions Grant and CDBG.

- A Program Coordinator who had formerly been homeless was appointed to build trust and encourage participation among the residents who were homeless in Moreno Valley.

- The Salvation Army developed Human Resource policies to ensure compliance with CA employment laws and restrictions.

- The program was developed to include 10 hours of paid work weekly for the participants beautifying Moreno Valley.

- Participation in the program grew; Waste Management began to provide opportunities to qualified program participants for full time employment.

- The City of Moreno Valley continues to celebrate the success of its Homeless-to-Work program by reaching out and engaging every single individual who is homeless in the City.

General Tips: Local issues, like homelessness, will not wait for and cannot be solved alone by government entities – local issues require committed local partners working together to create lasting solutions.

Engaging Vince as the Program Coordinator, who was previously homeless himself, not only built trust among the participants, but his life experiences allowed him to tear down the barriers that are all too common among people who are homeless. If a participant said she didn't have a ride to the job site, Vince would pick her up. If someone couldn't work because they were hungry, Vince would feed them. He often volunteered to be participants' references when completing their job applications. Vince was vital to the success of the Homeless-to-Work program.

Budget: The total cost of the City of Moreno Valley Homeless-to-Work Program was $190,000 across the City, Salvation Army, and Waste Management.

Funding: Private Financing, Federal Grants, Salvation Army

Tags: Innovation, Cost Savings, Environmental Impact, Impact on City Economy, Jobs Created, Enabled individuals who were homeless to regain their dignity and become valuable members of the Moreno Valley community.

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Wells Fargo: West Edge Factory Solar Training Institute

Project Description: The U.S. Conference of Mayors and Wells Fargo first announced the CommunityWINS® Grant Program in 2015, with a three-year, $3 million commitment by Wells Fargo to accelerate neighborhood revitalization, economic development and job creation in municipalities across the U.S.

In 2016, Huntington, W. Va. Mayor Steve Williams was recognized with top honors on behalf of Coalfield Development and a $150,000 grant was awarded to the West Edge Factory Solar Training Institute in the distressed West End neighborhood to train dislocated coal- and manufacturing-sector workers in solar-roof installation. Funded by the Wells Fargo Foundation, Coalfield Development—a non-profit community development organization based in southern West Virginia—was empowered to establish central Appalachia's first ever comprehensive solar training center—Solar Holler, LLC.

City Challenge: Coalfield Development addresses the lack of opportunity for people caused by an undiversified economy and a stale workforce development system. Systematic failures have led to high rates of generational poverty. The region served by Coalfield Development is one defined by coal economically, culturally, and socially, coal is at the heart of their identity. Yet coal is an industry in rapid decline as the world moves toward cleaner forms of energy. Yet it is not as if Appalachia did well when coal was booming either. A lack of economic diversity and over-dependence on one industry has led to generational cycles of poverty and economic depression. 17.9% of working age West Virginians are on disability, nearly more than half the national average (U.S. Census, 2015). Even more disturbing than high unemployment figures is the low labor participation rate illustrating how many people have completely given up on leading productive careers. West Virginia has the lowest labor participation rate in the nation at 49.1% (U.S. Census, 2015). Some rural counties we serve have nearly 50% poverty rates.

Impact: The Solar Center is part of a larger revitalization project called WestEdge Factory Revitalization. This community-based effort has taken a formerly vacant factory 100,000 square feet in size and repurposed it in to a job training and job creation engine for the entire region. This service is desperately needed since the region has been economically devastated by the decline of the coal industry. The Solar Center occupies 10,000 square feet of the facility.

Since redevelopment has commenced at the Solar Center, crime is down 42% in this neighborhood, according to city police. Property values are up, on average, 13% according to local officials.

Solar Holler has trained over 40 people in modern solar skill-sets, many of them unemployed and suffering economically from the coal industry's decline.

Through this new social enterprise, Coalfield Development has been able to create more than 30 new permanent jobs in the community.

How-To: Coalfield Development's solution is a family of social enterprises that pioneer new and viable economic markets while at the same time creating direct employment and personal development opportunities for disadvantaged workers, workers who can develop the skills necessary for these new markets to function. Their mission is to support a family of social enterprises that inspire the courage to grow, activate the creativity to transform perceived liabilities into assets, and cultivate the community needed for real opportunity in Appalachia through mentorship, education, and employment.

Coalfield's primary social innovation is the 33-6-3 model whereby crew members work 33 hours on-the-job (paid) staffing one of our five social enterprises listed above; six credit hours of coursework at the community and technical college pursuing an Associate's Degree in Applied Science, and three hours of personal development such as planning, time-management, emotional health, physical health, communication, etc. They have created over 200 new jobs, and helped create more than 40 new businesses.

General Tips: Coalfield Development Corporation was featured in Wells Fargo's "Stories of Better" campaign, which celebrated remarkable people and how the company is "Building Better Everyday" through philanthropy and community volunteerism. Jared Blalock, a laid-off coal miner in Williamson, West Virginia, who received education and training from the Coalfield Development Corporation and found a new job in construction is featured in the campaign.

Budget: The CommunityWINS grant program is aimed at accelerating neighborhood revitalization, economic development and job creation in municipalities across the U.S., with a $1 million commitment by the Wells Fargo Foundation. In 2016, a $150,000 CommunityWINS grant was awarded to the West Edge Factory Solar Training Institute in the distressed West End neighborhood to train dislocated coal- and manufacturing-sector workers in solar-roof installation.

Funding: The U.S. Conference of Mayors and Wells Fargo first announced the CommunityWINS grant program in 2015, with a three-year, $3 million commitment by Wells Fargo. In 2018, the public-private collaboration was extended through 2020 with an additional $3 million commitment by Wells Fargo, bringing the combined total to $6 million over six years.

Tags: Innovation, Environmental Impact, Impact on City Economy, Jobs Created

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Solar Company Logo

Jared Blalock, Williamson, WV

Working Scholars powered by Study.com

Project Description: Working Scholars powered by Study.com is an innovative education program, that The program works to eliminate two of the largest barriers to education: time and money by providing an on-demand college experience.

Students determine the pace at which they earn their fully accredited bachelor's degree. The flexible and low-cost college pathway helps employees gain fundamental skills, knowledge and credentials needed for career progression. Achieved by video-based microlearning modules that seamlessly stack into a bachelor's degree program, we drive utilization by combining an engaging user experience with a compelling social purpose, and our price point allows employers to provide access to all employees. By providing this enhanced education benefit, cities can attract, retain and develop staff, which helps to develop a more robust pool of talent, while creating or enhancing a succession program.

Through Working Scholars city employees can obtain a bachelor's degree for as little as $9,000 compared to the average college degree cost of $36,000.

City Challenge: To provide low-cost bachelor's degree pathways for city employees by allowing them to utilize the city's existing education benefits.

Impact: Participating cities have seen significant increases in employee engagement and excellent retention of program participants. Due to the low-cost nature of this program, cities are reporting increased utilization of their education benefits and improved return on investment. Participating employees have also been identified as being more motivated and confident in their work. "By having a workforce that is more educated, it elevates the level of service we are able to provide to our community." Malcolm Corona, Mayor Pro-tem City of Perris.

Student Cohort Group Pic

Perris, CA Billboard Community Invitation

Community Developers Investing in City

How-To:

1. City employee creates staff report for approval by council to authorize tuition assistance for participating employees.

2. Council approves resolution and signs agreement with Working Scholars to begin program implementation.

3. The Working Scholars team collaborates with city staff to introduce employee population to Working Scholars and holds an information session to provide specifics about the program.

4. Qualification process is undertaken by potential participants. Rigorous qualification criteria is established to ensure city is only paying for participants who are committed to and will be successful in the program.

5. Upon successful qualification student is fully enrolled in the program. As a way to foster a sense of community, the program is launched in a cohort structure. Welcome kick-off event is held to on-board new students into the program and formally introduced to their success coach.

6. The Success Coach will become the student point of contact for the duration of the program to help encourage, motivate, and maintain program engagement and participation.

7. Any existing college credit transcripts are reviewed, to ensure all applicable credits are utilized toward participants' college degree attainment.

8. Students are assigned first set of courses and are now on their way to continue progressing through the program.

9. Working Scholars meets with internal city staff stakeholders on a regular basis to review program results and participant progression.

10. Graduation is held when participant completes all required coursework.

11. Students will ultimately earn a bachelor's degree in business or liberal arts from a regionally accredited university.

General Tips: Participating cities are also leveraging this program within their communities, identifying available city funds and re-purposing them to achieve greater bachelor's degree attainment.

Budget: $9000 - $16,000

Funding: General Purpose City Funds

Tags: Business Benefits, College Attainment

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Zencity: Using AI to Measure Community Support and Launch a Safe Parking Program to Tackle Homelessness in Beaverton, OR

Project Description: In the late summer of 2018, the City of Beaverton, Oregon, instituted a ban against car camping on its city streets in response to complaints by residents and local businesses. The ban gave rise to significant media and community attention, including proposals for alternative solutions for tackling homelessness in the City. One of the community-proposed solutions included Safe Parking, which is a program that gives homeless men and women living in their vehicles a designated, safe place to park as well as other services they need, such as access to clean restroom facilities, storage space, and more. In November 2018, at the next opportunity available, the City put in a supplemental budgeting request to fund the project. By spring 2019, the City was ready to roll out its first Safe Parking sites, making the city-hosted location one of only two sites in the greater Portland metro region. The City was challenged to implement the program in coordination with the community, and in particular with the cooperation of those neighborhoods most impacted - the neighborhoods where the first Safe Parking sites would be launched.

City Challenge: The City secured funding for the Safe Parking program in November 2018, and began rolling out the first sites by spring 2019. Throughout the program's planning and rollout, the City was faced with the challenge of aligning with residents, local businesses, and the specific neighborhoods that would be most impacted by the new Safe Parking sites. Beaverton used Zencity to measure, understand, and address the community impact of the program and specific concerns by city-neighborhood.

Zencity uses AI to automatically aggregate and analyze feedback data from resident interactions from social media, local news, and more. The City of Beaverton began using Zencity in September 2018 after Mayor Doyle met the Zencity team at the USCM Winter 2018 meeting. The City uses the platform to understand real-time, wide-spread community feedback and as a capacity-building tool. Beaverton used Zencity to track 3 months of data related to the Safe Parking program to keep an ear to the ground and understand particular neighborhood concerns; engage with the community more effectively; and respond in a localized way.

Impact: With Zencity's data analytics, Beaverton was able to launch a Safe Parking program with the support of its community by:

1. Continuously tracking the program's community impact-generally and by neighborhood-from the planning process through the launch of the first sites.

2. Understanding neighborhood-specific concerns and responding with localized solutions.

3. Differentiating how the majority of residents felt about the program (in support) from the vocal minority (in opposition), enabling the program to move forward. The City could rely on more than just the smaller, less representative contingent opposing the program in public meetings.

4. Having a more nuanced understanding of resident discourse. In public meetings, residents only had 2-3 minutes to testify. On social media, there was more back and forth and residents could reference external resources. Zencity enabled the City to analyze this information, e.g., Zencity's data helped the City realize it needed to amend land use - a process it has now started.

5. Better showcasing to residents the way in which the City listened to its community and integrated their feedback and ideas back into the City's budgeting and planning.

How-To: The best practice was developed by:

1. Aggregating resident feedback using Zencity's data-collecting technology.

2. Narrowing in on data points which pertained specifically to the City's Safe Parking program - something done automatically by the Zencity platform.

3. Identifying leading topics and discourse trends using Zencity's geo-location technology, in order to identify how different neighborhoods - like Central Beaverton where the first Safe Parking sites were being rolled out - were responding.

4. Analyzing the data pertaining to the Safe Parking program generally and by specific neighborhood to generate meaningful, actionable insights based on real Beaverton community feedback.

5. Adopting communication and engagement techniques, and making real decisions based on the insights generated and data collected.

General Tips: Zencity uses AI and big data to reinvent the way local governments make decisions. The platform helps cities understand their real needs and priorities by automatically gathering and analyzing millions of feedback points from online and offline resident interactions - including social media, city hotlines, traditional news channels, and more. Zencity then distills reliable, actionable insights from this data to help local governments better prioritize resources, track performance, and connect with their communities.

Budget: Measuring and understanding wide-scale resident feedback on the City's Smart Parking program is part of the general cost of the Zencity platform, which measures data from multiple channels (including social media, city hotlines, and more), across all city

Funding: General Purpose City Funds

Tags: Service Delivery Improvement, Innovation, Cost Savings, Business Benefits

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