



Filling Energy Workforce & Energy Project Pipelines: Cross-Sector Collaboration in the Inland Empire

California Climate and Energy Collaborative Forum

July 10, 2025



Jennifer Aguilar, DrPH
Energy Program Manager
**I-REN (San Bernardino
County Transportation
Authority/San Bernardino
Council of Governments)**



Juliet Agtang
I-REN Fellow
City of Palm Springs



Tony Yun
I-REN Fellow
City of Ontario



Vivian Trinh
Energy & Sustainability
Associate
**San Bernardino
Community College
District**



Yash Patel
Associate Director of
Energy & Sustainability
**San Bernardino
Community College
District**



Moderated by:
Lauren Seymour
Assistant Director of Energy Services
The Energy Coalition

Agenda

I. I-REN Overview

- Our Programs
- Public Sector Services
- I-REN Energy Fellowship Program
- Cross-Sector Collaboration

II. Fellow Case Studies

III. Host Site Perspective

IV. Takeaways & Best Practices

V. Questions



I-REN Overview

Who We Are

We are a network of partners, including the Coachella Valley Association of Governments, the San Bernardino Council of Governments, and the Western Riverside Council of Governments, formed to serve the cities and communities of our region.



Your Local Champion for Energy Efficiency

Our mission is to **build a stronger clean energy economy and community** throughout California's Inland Empire by connecting residents, businesses, and local governments to a wide range of energy efficiency resources.

Together, we will **empower local governments** to practice energy efficiency, enable code compliance in the building industry, and support workforce education and training in our region.



Our Programs

Our Programs



**Public Sector
Program**



**Workforce Education &
Training Program**



**Codes & Standards
Program**

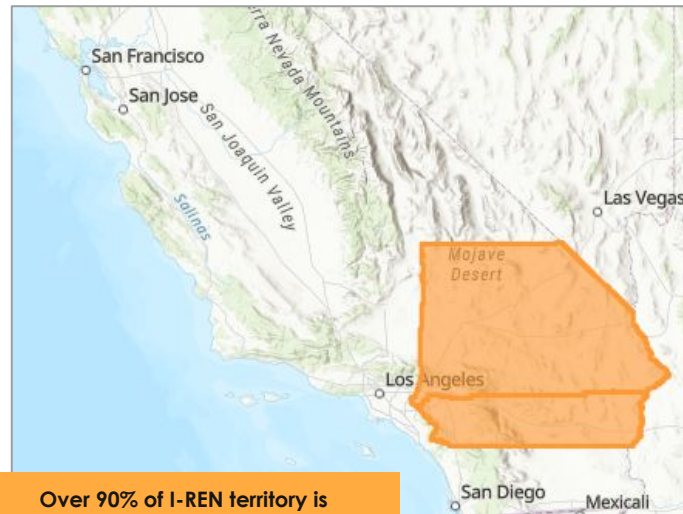
Eligible Public Agencies

Who is eligible for I-REN Public Sector services and support?

Public agencies* in the I-REN territory (San Bernardino and Riverside counties)

- Cities
- Counties
- Special districts
- K-12 school districts
- Tribes
- Water/wastewater agencies/districts
- Other public agencies

I-REN Territory



Over 90% of I-REN territory is considered hard-to-reach or underserved!

*All facilities and infrastructures with an electric and/or natural gas account serviced by SCE and SCG that lists an eligible public agency as the customer on record within the program geographic territory are eligible for I-REN services



Public Sector Services

Customized project support throughout your journey...



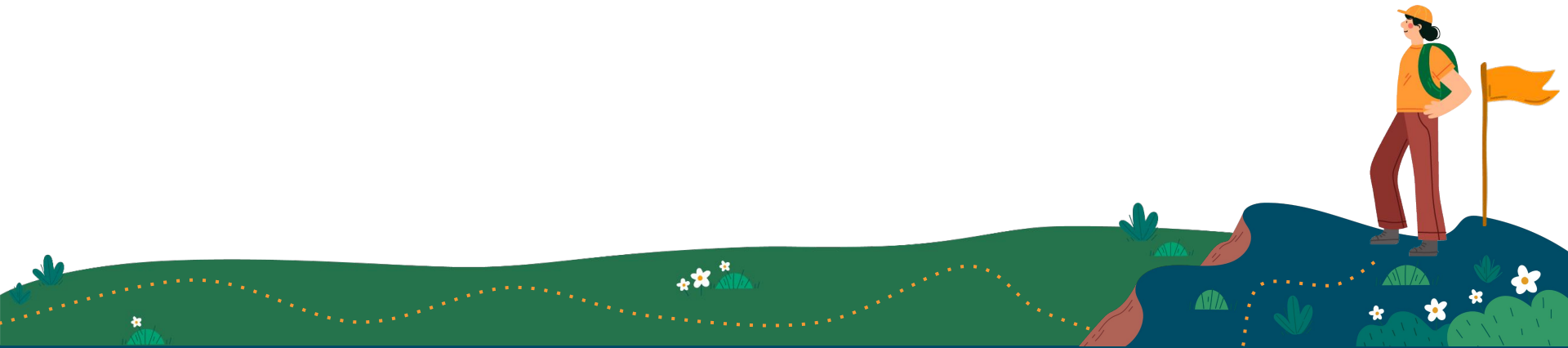
Data
Collection
and
Analysis

Energy
Resilience
Roadmap

Energy
Audit

Project
Financial
Analysis

Funding and
Financing
Secured



...With assistance and learning opportunities all along the way!

Data
Collection
and
Analysis

Energy
Resilience
Roadmap

Energy
Audit

Project
Financial
Analysis

Funding and
Financing
Secured

Onboarding
Meetings

Workshops

Webinars

Case
Studies

Celebrating
Success!



Cash for Kilowatts Incentives

I-REN's Cash for Kilowatts incentive offers funding for holistic energy efficiency projects. We'll give you cash for every kilowatt-hour of energy you save!

Why Cash for Kilowatts?



Financial boost

Cash for Kilowatts eases the financial burden of energy projects. Every dollar saved means resources available to reinvest in your community.



Focus on critical facilities

Emergency, cooling, and resilience centers play a vital role in keeping us safe and comfortable. We offer **double the incentives** for these facilities!



All about results

Whether it's HVAC replacements, lighting, controls, or another energy efficiency project type, you'll likely be eligible for incentives.



I-REN Energy Fellowship Program

Understanding the Inland Empire's Energy Workforce Needs



I-REN developed an **Energy Workforce Gaps Assessment** to understand the workforce needs of employers in the inland region and identify gaps or challenges to hiring a skilled energy workforce.

Assessment Findings

Regional Energy Industry Analysis

Over 75% of workers in critical energy-related roles are projected to retire or transfer between 2020 and 2030, highlighting the need for immediate recruitment and retention strategies.

Energy Employer Survey

Respondents indicated that job applicants/employees lack technical, workplace, and interpersonal skills equally, indicating need for a multifaceted approach to addressing gaps.

Regional Training Assessment

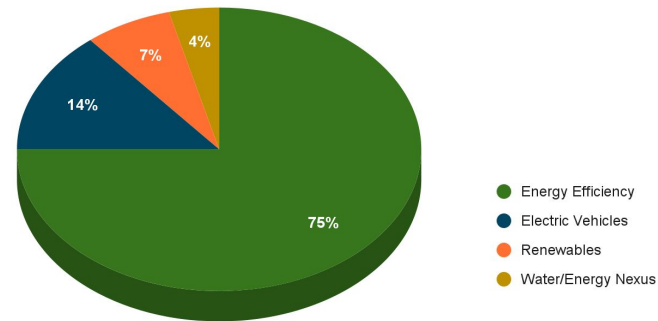
Local institutions and stakeholders are building training and certification pathways for the energy industry to address gaps in workforce readiness.

I-REN Energy Fellow Program

- Launched in 2023, in partnership with CivicSpark (PHI), an AmeriCorps Program
- Fellows spend 11 months (~1,700 hours) supporting a wide range of energy efficiency and sustainability projects
- Benefits include \$35,000 living allowance, \$7,395 education awards, and professional development training

2024-25 Cycle

- 14 fellows placed at 12 host sites (public agencies within the I-REN region)
- Tours/networking opportunities and leadership program



Types of fellow projects



Cross-Sector Collaboration

Public and WE&T Cross-Sector Collaboration

Measurable Impacts by Fellows

- **4 agencies** hosted a second-year fellow
- **2 second-year fellows** hired by host sites
- **35 facilities** evaluated across 12 public agencies
- **\$439,282** in annual utility savings
- **\$4.1 million** in lifetime savings
- **14 Cash for Kilowatts projects** and rising
- Over **\$1.3 million** in incentives identified and supported by an I-REN fellow

Project Pipeline Supported by Fellows

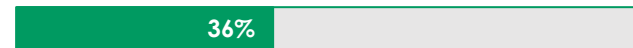
Annual electric energy savings

1,821,879 kwh/year



Lifetime electric energy savings

17,033,094 kWh



Annual gas energy savings

9,825 therms/year



Lifetime gas energy savings

106,522 therms



Future of I-REN Fellows

Goals

- 27 fellows and 27 public agency host sites
- Possible EM&V study to identify gaps

Next cycle applications are due
July 10th, 2025!

Fellows will begin at host sites on
October 6th, 2025.





Fellow Case Studies

Case Study: City of Palm Springs

1st Term

- **Palm Springs residential building by building vintage map**
Identified and mapped residential buildings by construction era to analyze vintage concentration patterns
- **Energy efficiency survey**
Collected insights into the energy concerns and priorities of homeowners and renters
- **Incentives for residents and contractors**
- **Energy audits for Palm Springs fire stations**



2nd Term

- **Reach codes**
Refined and adapted policies through community outreach, resulting in balanced, collaborative solutions
- **City facility audits**
- **Community engagement**

Case Study: City of Palm Springs

Whole Building Fire Station Audits



City of Palm Springs Fire Station Audit May 2024

**Estimated
Lifetime Cost
Savings**
\$141,243

Lifetime Energy Savings
846,772 kWh
Cars Off the Road
133 cars per year

**Estimated
Incentives**
\$46,460

**Q1
2024**

Palm Springs connects with I-REN

City of Palm Springs staff works with I-REN to collect energy data and help identify top consuming sites.

**Q2-Q4
2024**

I-REN conducts energy efficiency audits at all Fire Stations

Palm Springs elects to move forward with energy efficiency audits at all fire stations; I-REN conducts audits and identify lighting, HVAC, and building envelope retrofit opportunities.

**Q2-Q3
2025**

I-REN helps secure funds

I-REN prepares Palm Springs energy efficiency incentive application to secure Cash for Kilowatts funds for three fire stations.

Case Study: City of Ontario



- Enhancing safety, operational efficiency, and citywide connectivity
- Projected to generate over **\$75 million** in utility and operational savings
- Successfully managed **\$20 million+ in solar farm projects**, significantly improving energy performance
- All municipal building **LED lighting** systems are fully integrated and **centrally controlled**, offering fingertip access for scheduling, monitoring, and diagnostics.

Annual Energy Consumption

~37.5 million kWh

Annual Energy Cost

~\$9.5 million

Active Energy Contracts

1,131

Case Study: City of Ontario

Energy Projects

- Improve solar farm outputs at Police Dept. and Convention Center
- Install battery backup systems at Police Dept.
- Standardize AC temperatures in buildings city-wide
- Lead AB 802 benchmarking requirement compliance
- Support city online billings for electricity and gas



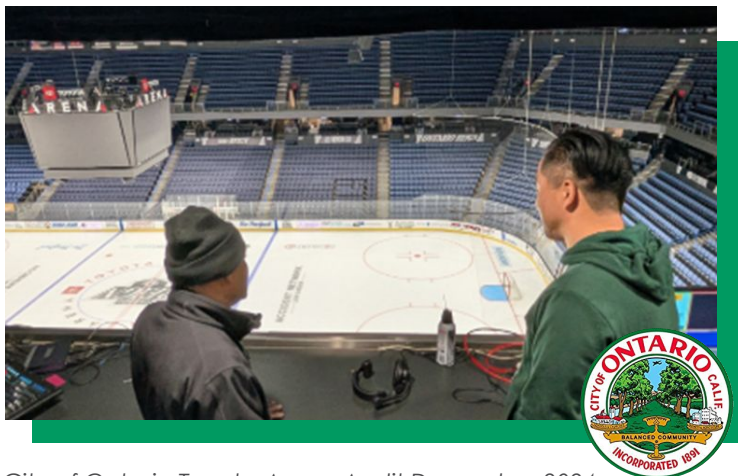
City and Community Engagement

- Participate in eight I-REN tours to explore sustainability and equity initiatives across the Inland Empire
- Participate in city events and volunteer projects
- Serve as San Bernardino County science project judge and poll worker
- Greet 100+ staff and crew in Integrated Waste each morning before 6 AM departures

Case Study: City of Ontario



Whole Building Site Audits: City Hall & Toyota Arena



City of Ontario Toyota Arena Audit December 2024

Estimated Cost Savings
\$815,723

Lifetime Electric Savings
3,947,763 kWh
Cars Off the Road
619 cars per year

Estimated Incentives
\$322,788

**Q4
2023**

Ontario connects with I-REN

City of Ontario staff works with I-REN to collect energy data and help identify top consuming sites.

**Q2-Q4
2024**

I-REN conducts energy efficiency audits at City Hall & Toyota Arena

I-REN identifies City Hall and the Toyota Arena as Ontario's highest energy-consuming facilities in the Preliminary Energy Resilience Roadmap; Ontario elects to move forward with audits at both locations.

**Q1-Q2
2025**

I-REN presents their findings

I-REN presents its energy efficiency findings for both facilities and supports as the City considers which energy efficiency retrofit recommendations to pursue.

Note: Total Annual consumption is based off of utility data that was analyzed and included in City's Preliminary Roadmap.

Case Study: San Bernardino Community College District (SBCCD)

Campus Energy Analysis & Peak-Shaving Strategy

- Collected 15-minute interval data from each building and perform cost analysis
- Improved campus energy operations from analysis of seasonal peak loads at both campuses

Solar Farm & Battery Energy Storage System

- Provided project management assistance
- Monitored solar PV output and solar battery discharge data
- Validated battery recharge and programming for effective peak-shaving during on-peak hours

Implementation of 140 EV Charging Stations

- Analyzed the pricing structure fee by conducting market research via local cost scan
- Coordinated efforts with vendors and campus staff to facilitate EVCS delivery and installation



Case Study: San Bernardino Community College District (SBCCD)



**Q3
2023**

SBCCD connects with I-REN

I-REN connects with SBCCD regarding the Workforce Education & Training programs and is introduced to the public sector offerings

**Q3
2024**

I-REN & SBCCD discuss project financing support

I-REN and SBCCD identify opportunity to fill gaps in project financing and pursue full project scope by leveraging Cash for Kilowatts

**Q4 2024
Q1 2025**

I-REN encourages increased efficiency, helps secure funds

SBCCD adjusts to more efficient equipment selections after I-REN discussions; I-REN completes application and gets approval for Cash for Kilowatts incentives

San Bernardino Valley College Interior LED Lighting Retrofit



SBCCD is upgrading the interior lighting at San Bernardino Valley College North Hall and Library

Lifetime Electric Savings
1,481,352 kWh
Cars Off the Road
232 cars per year

**Lifetime Electric
Cost Savings**
\$353,412

Incentives Secured
\$226,579, ~74% of
gross project cost

Note: Energy savings and incentives are estimates. Incentives dispersed will be based on savings realized after project completion.

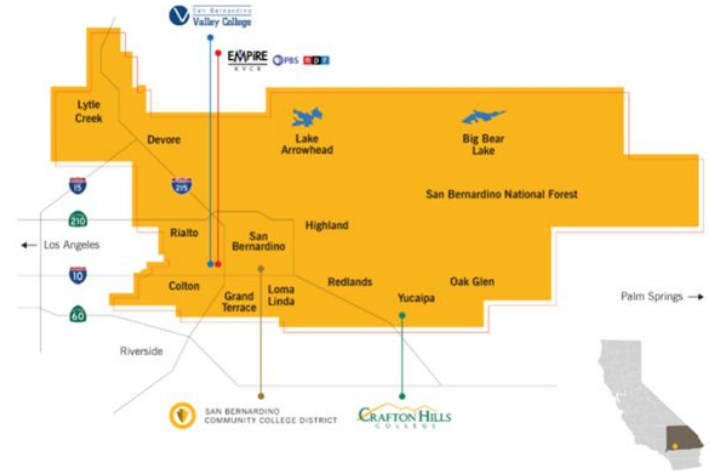


Host Site Perspective

About San Bernardino Community College District (SBCCD)



- Founded in 1926
- Home of Crafton Hills College, San Bernardino Valley College, Empire KVCR 91.9 FM, and TV Channel 24
- Designated Hispanic-Serving Institution (HSI)
- Nearly 8 out of 10 students pay \$0 tuition fees after completing FAFSA or CA Dream Act Application
- Generates \$723.2 million annually to local economy in the Inland Empire



SBCCD Facilities Planning, Construction, Sustainability & Local Outreach Department



10 Existing + 5 Upcoming
LEED Buildings
Districtwide



Technical Building
(LEED Platinum + ZNE)



Performing Arts Center
(LEED Platinum + LEED
Zero)



Student Services
Building (LEED Gold +
Envision + ZNE)



Instructions Building
(LEED Platinum)



Zero Net Energy Plan
(Identifies Future
Projects)



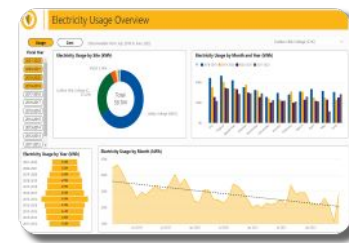
Solar Photovoltaic +
Battery Storage



EV Charging Stations
(Incentivized through
SCE)



Sustainability Plan
(Identifies Key initiatives)



Energy Dashboard to
Track the Consumption

Gaps Filled by the Fellowship



Transform Data Collection Into Informed Decisions



Energy Project Implementation Support



Pursue Incentives And Grants To Reduce Project Costs



Expand Bandwidth to Advance More Projects



Build a Workforce Pipeline to Long-Term Vision



Increases Student Engagement in Sustainability

Long-Term Benefits of Fellowship



Access to Talent and Fresh Perspective



Accelerated Project Outcomes



Supports Interdepartmental Collaboration



Expanded Partnerships and Visibility



Student and Community Impacts



Takeaways & Best Practices

Takeaways and Best Practices

1. Established third-party support is crucial for managing a fellowship program (i.e. payroll, human resources, etc.)
2. Ensure benefits of fellows are clearly communicated to site hosts and match fellow's skill sets with site host's needs
3. Provide a hands-on support system for fellows and site hosts throughout (and even after) the fellowship process
4. Collaboration between sectors led to improved outcomes
 - a. Programs initially operated independently; fellows identified opportunities to support Public Sector projects at their host sites
 - b. Focus on targeted outreach to site hosts with Public Sector projects where additional capacity is needed



Questions



Visit **iren.gov** to learn more.

