

# Lessons Learned: Contra Costa Asthma Initiative

Sustainability Committee

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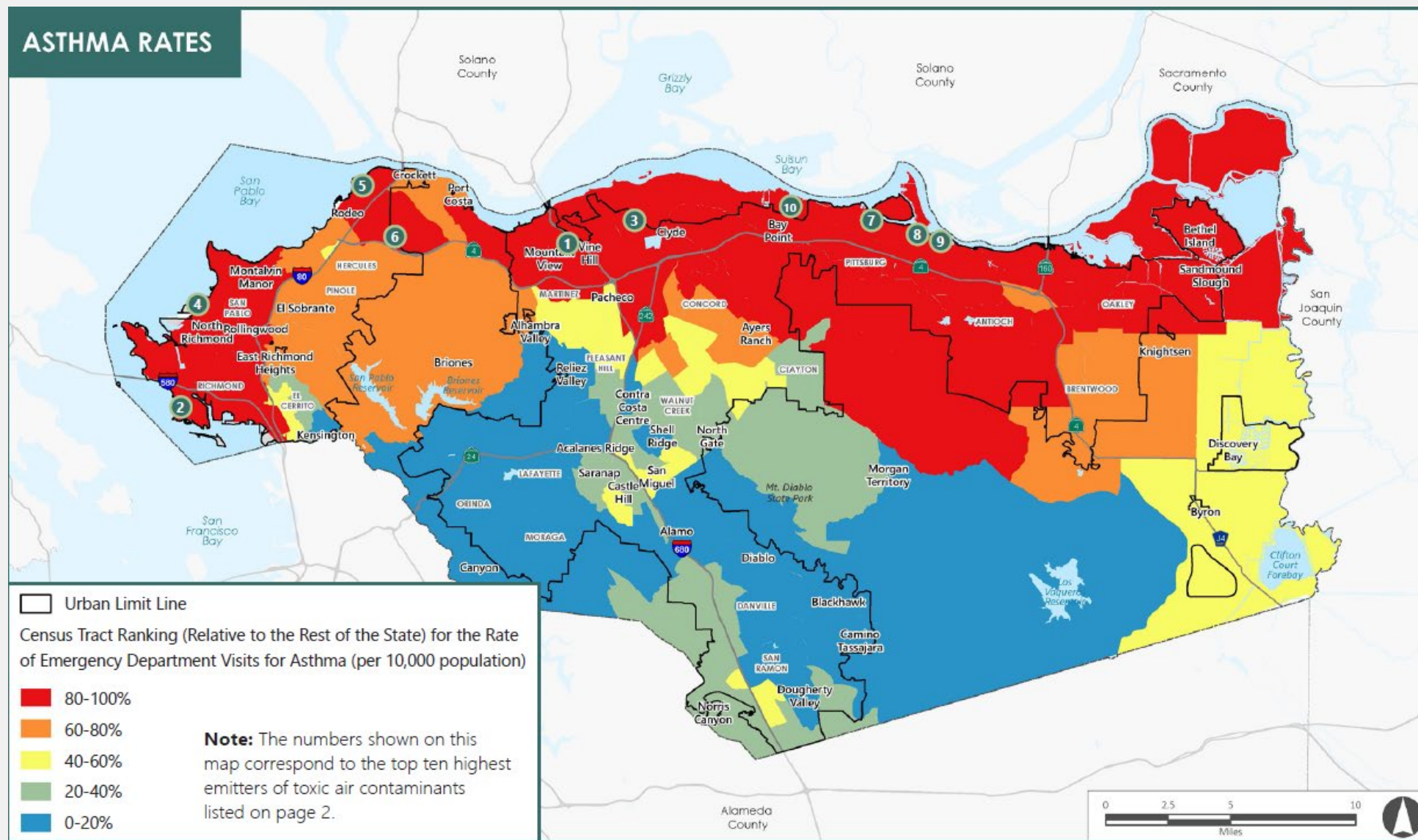
Department of Conservation and Development

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# What Motivates Us

1. Martinez Refinery
  2. Chevron Products Company
  3. Marathon Refinery\*
  4. West Contra County Landfill
  5. Phillips 66 – San Francisco Refinery\*
  6. Phillips 66 Carbon Plant
  7. Los Medanos Energy Center
  8. Delta Energy Center
  9. Air Liquide Large Industries US
  10. Criterion Catalysts Company LP
- \* Approved to process renewable fuel 5/2022.



# Funding for the Contra Costa County Asthma Initiative (Asthma Mitigation Program)



2018/2019: Awarded Phase I Technical Assistance Grant from the Green and Healthy Homes Initiative to Develop Business Plan to Expand Services to improve Health Outcomes



2019/2020: Awarded Phase II Technical Assistance Grant from Green and Health Homes Initiative      Research feasibility of integrating Project into the State health care billing system



2020: Awarded grants from State and Regional Air District to implement Business Plan



2021-2023: Implemented Contra Costa Asthma Initiative

Connecting County Health Plan clients to reduce Asthma related ER visits with in-home asthma education and energy efficiency services

## Program Component

## Staffing Organization

### Home Visits

#### 3 Home Visits for Asthma Education

Coordinate with PCP on Asthma Action Plan; medication usage training; environmental triggers training; follow up with PCP and care manager

#### Consumer Supplies to reduce asthma triggers

e.g. green cleaning supplies, allergen mattress and pillow covers, integrated pest management, food storage containers



### Home Assessment

#### Environmental assessment

Identify home-based asthma triggers and write remediation scope

Single Family:  
County  
Weatherization

Multi Family:  
Association for  
Energy Affordability

### Trigger Remediation

#### Remove asthma triggers from home

Moisture issues (mold removal, ventilation, plumbing leaks)  
Allergens (carpet removal/cleaning), and  
Irritants (HVAC, combustion gases, VOCs)



### EE/Weatherization

#### Lower energy bills and improve comfort of home

*Leveraged funds*

Lighting, heat pumps, energy-efficient appliances, HVAC



# Asthma client Home Visits

- 150 First Home Visits
- 185 Supply drop-offs for 134 members (some had more than one supply drop-off for air purifier deliveries)
- 64 Third Home Visits
- 37 Forth Home Visits

## Your Asthma Control Test Score

**20**  
YOUR SCORE

Average Asthma Control Test Scores before and after went from 15.4 to 18.9



# Home Asthma Mitigation Measures Implemented

**12 Home Upgrades Provided with Asthma Related Energy Efficiency Measures at no cost to client or property owner**

- \$10,797 – Average Cost per Home Upgrade (contractor installation equipment cost only)

**3 Homes were served exclusively by the State's Low-Income Home Energy Assistance Program**

## **Measures Implemented**

- Bathroom Fan replaced – 11
- Kitchen Exhaust component – 8
- Electric Panel upgrades – 8
- Gas Stove replacements – 6
- Duct repair and sealing – 6
- Window replacements – 4
- Minor envelope repairs – 4
- Cleaning Services – 7 homes (2 of 7 received some of the energy efficiency measures above)

# Rental Property Participation Rates

| Landlord Status                                                                                                                                                                                                                                                | Count of Landlord Status |
|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------|
| Didn't Make Contact - Landlord Unresponsive                                                                                                                                                                                                                    | 6                        |
| Client was the Homeowner (no landlord permission needed)                                                                                                                                                                                                       | 12                       |
| Landlord Agreed to Services                                                                                                                                                                                                                                    | 14                       |
| Landlord Declined Services                                                                                                                                                                                                                                     | 11                       |
| Made initial Contact - Landlord ultimately Unresponsive                                                                                                                                                                                                        | 6                        |
| N/A*                                                                                                                                                                                                                                                           | 36                       |
| Never Reached Out to landlord - Member Declined Services                                                                                                                                                                                                       | 35                       |
| Never Reached Out to the landlord - Member Unresponsive to contact by AEA                                                                                                                                                                                      | 50                       |
| <b>Grand Total</b>                                                                                                                                                                                                                                             | <b>170</b>               |
| *The N/A includes members who were removed from the list for a variety of reasons. Some of them received virtual visits and/or assessments from AEA and some received no services from AEA. Some were not counted towards the total enrollment in the program. |                          |
| <b>Landlord Information Obtained by AEA</b>                                                                                                                                                                                                                    | <b>n= 37</b>             |
| <b>% Agreed</b>                                                                                                                                                                                                                                                | <b>37.8%</b>             |
| <b>% Declined</b>                                                                                                                                                                                                                                              | <b>29.7%</b>             |
| <b>% Unresponsive</b>                                                                                                                                                                                                                                          | <b>32.4%</b>             |

# Lessons Learned



Success of future programs depends on having tight timeline of implementation – lags between steps in the pilot hurt uptake, participation and follow-up.



Future success will depend on increasing Rental Properties willingness to participate in similar programs. Recognize that not all landlords are going to be willing to participate and that goals need to be set accordingly.



Ability to pull resources from different energy efficiency and other home improvement programs. Only 6 homes received measures implemented by an additional program. Were not able to provide additional mitigation measures to homes served by the LIHEAP program. Layering funding from multiple sources of funding is necessary to address mitigation measures not covered by energy efficiency programs.



Pairing asthma trigger mitigation services through the MediCal CalAIM program with EE programs is challenging because of the different models of CalAIM implementation regionally. In CCC, MediCal CalAIM is implemented through a service provider contracted with by the Contra Costa Health Plan (CCHP). TBD if future collaborations between this service provider, CCHP and an EE provider will be possible.

# Thank You!



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