



# **Item 9: Advancing Window Retrofits and Reducing Fireplace Air Leaks to Improve Energy Efficiency in Existing Buildings - GFO-22-501**

July 26, 2023 Business Meeting

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Energy Efficiency Research Branch



# Solicitation Overview

- GFO-22-501: Advancing Window Retrofits and Reducing Fireplace Air Leaks to Improve Energy Efficiency in Existing Buildings
  - Group 1: High-Performance Window Retrofits for Commercial Buildings
  - Group 2: Strategies to Reduce Fireplace Air Leaks in Residential Buildings
- Funding from:
  - Gas R&D funding
- Project Funding:
  - 3 projects
  - \$2.6 Million

## GRANT FUNDING OPPORTUNITY

**Advancing Window Retrofits and Reducing  
Fireplace Air Leaks to Improve Energy Efficiency  
in Existing Buildings**

**Gas R&D Program**



**GFO-22-501**

<http://www.energy.ca.gov/contracts/index.html>

State of California  
California Energy Commission  
(August) November 2022  
(revised)



# Benefits to Californians

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- Reduced heating/cooling loads, GHG emissions, and energy costs
- Improved occupant comfort
- Inform future codes and standards and energy efficiency programs



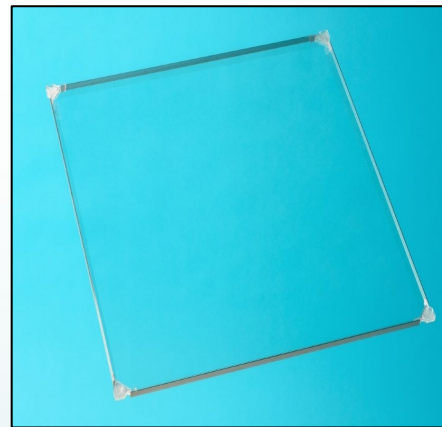
# Item 9a: Electric Power Research Institute, Inc.



- Project Location:
  - 2 schools in the Bakersfield
- Funding:
  - CEC: \$1,535,556
  - Match: \$ 260,000



Freemont Elementary School  
Source: Bakersfield City School District

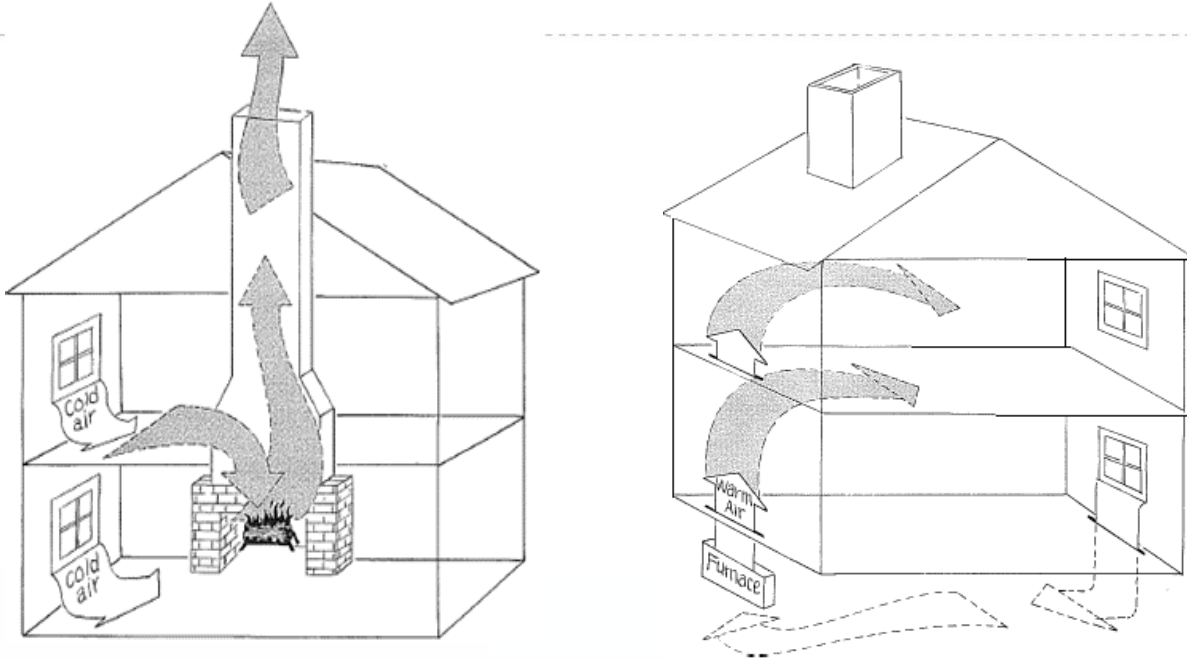


Retrofit panel  
Source: WexEnergy

- Project Focus:
  - Secondary window system by WexEnergy



# Item 9b: DNV Energy Insights USA Inc.



Source: LBNL



- Funding:
  - CEC: \$238,160
  - Match: \$ 16,655
- Study Focus:
  - Fireplace characterization
  - Evaluation of air leakage
  - Evaluation of pollutant infiltration and health impacts
  - Educational materials

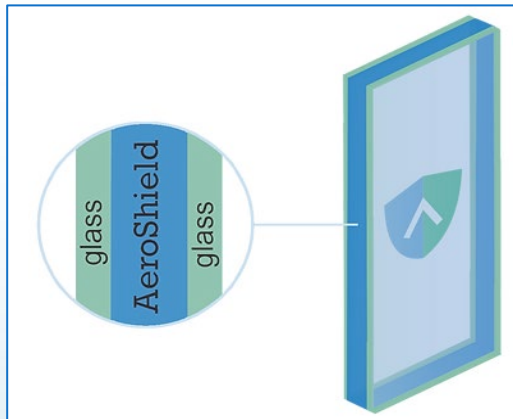




# Item 9c: Institute of Gas Technology d.b.a. GTI Energy



Source: Alpen



Source: AeroShield

- Project Location:
  - Indian Wells
- Funding:
  - CEC: \$864,506
  - Match: \$775,000
- Project Focus:
  - Triple-pane thin-glass secondary window system
  - Novel secondary window systems



# Staff Recommendation

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- Adopt staff's determination that these actions are exempt from CEQA.
- Approve Item 9 for three grant agreements with
  - Electric Power Research Institute, Inc.
  - DNV Energy Insights USA, Inc.
  - Institute of Gas Technology d.b.a. GTI Energy