PUEBLO ENERGY ADVISORY COMMISSION

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CITY OF PUEBLO LEADS BY EXAMPLE: RECOMMENDATIONS & UPDATES

1 — Energy Performance Contract (EPC)

2 — New Building Requirements (City Only)

3 — Fleet Purchasing Priorities

4 — Staff Capacity to Support Energy Goals

① ENERGY PERFORMANCE CONTRACT (EPC)

JUSTIFICATION: CASH FLOW POSITIVE ENERGY IMPROVEMENTS AND UTILIZES EXPERTS TO HELP THE CITY WORK TOWARDS ELECTRIFICATION AND RENEWABLE ENERGY GOALS

Update:

Reviewed former EPC work and performance measures and internally reviewing target facilities for a Round 2.

Budget Needs:

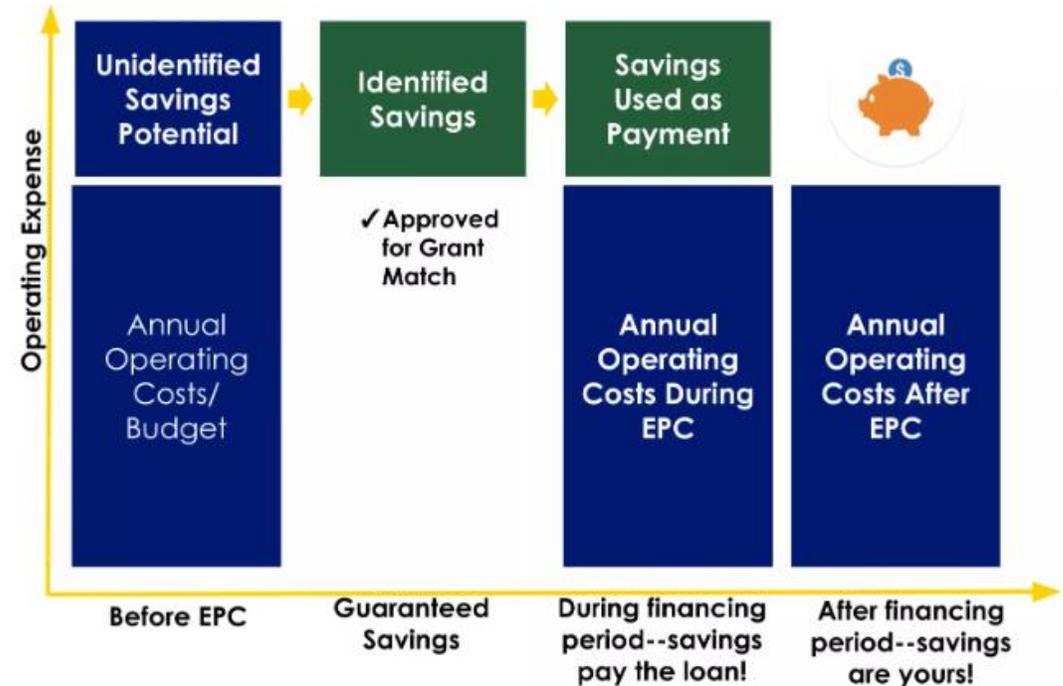Round two audit funding allocation of up to $_____.

Image Credit: Colorado Energy Office

② NEW CONSTRUCTION REQUIREMENTS

JUSTIFICATION: THE CITY CANNOT MEET ITS OWN 100% RENEWABLE GOAL IF ITS BUILDINGS BURN FOSSIL FUELS

Photo Credit: Salt Lake City Fire, LINETEC

Proposal

Ordinance or policy that all new construction of City-owned buildings must be net zero, with specific exceptions.

In Practice

The City's new fire stations have been designed to a net zero standard, whereby the buildings will be highly energy efficient and will make or supply their energy through renewable resources, which results in zero carbon emissions.

Possible Language

When designing new City buildings, architects, engineers and consultants, and other participants must seek an integrated design that that meets energy, environmental and social goals while keeping costs within budget. Bids for new construction or renovation to any City-owned facility should include language that target the following building features:

1. *Highly energy efficient*

2. *All electric, except for opportunities to utilize cogeneration and/or where alternative fuels meet resilience planning goals*

3. *Powered by on or offsite renewable energy*

4. *Take advantage of opportunities to benefit the electrical grid*

HOW DOES A BUILDING ACHIEVE NET ZERO ENERGY?

2 Orientation

3 Design and passive strategies

1 Location

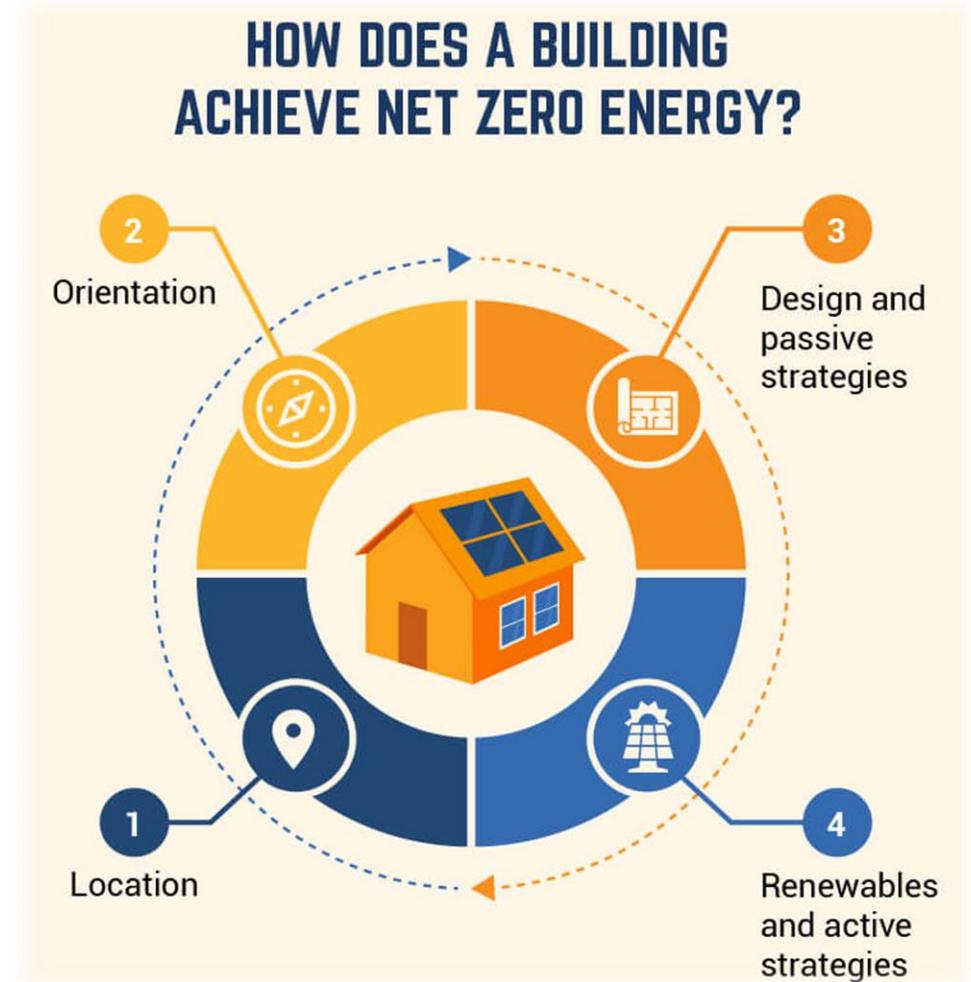4 Renewables and active strategies

Image Credit: www.bigrentz.com

③ NO OR LOW-EMISSIONS FLEET PURCHASING POLICY

JUSTIFICATION: THE CITY SHOULD BE A LEADER IN VEHICLE ELECTRIFICATION (AND CAN SAVE MONEY & CARBON OVER TIME) BY DOING SO

Initial Progress

Identifying which vehicles in the fleet are prospects for electrification and where charging infrastructure will be required to support an electrified fleet.
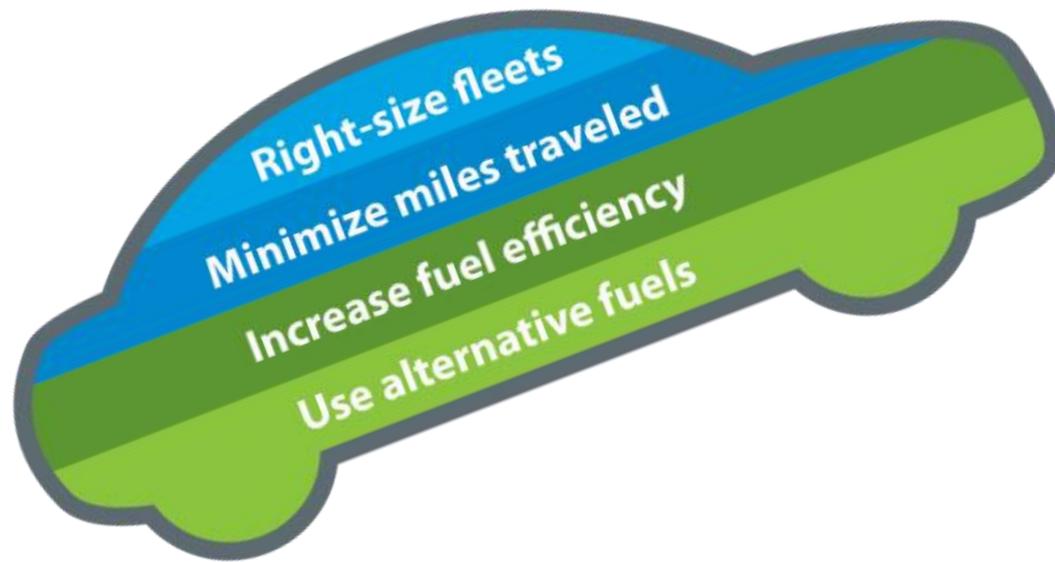
Proposal

- Adopt a "Sustainable and Resilient Fleet Policy" and budget for charging infrastructure.

- Establish a process for fleet right-sizing to reduce fuel demand by minimizing the number of City-owned vehicles.

- Implement and maintain route optimization.

Photo Credit: Yale Center for Business and the Environment

③ NO OR LOW-EMISSIONS FLEET PURCHASING POLICY

Right-size fleets
Minimize miles traveled
Increase fuel efficiency
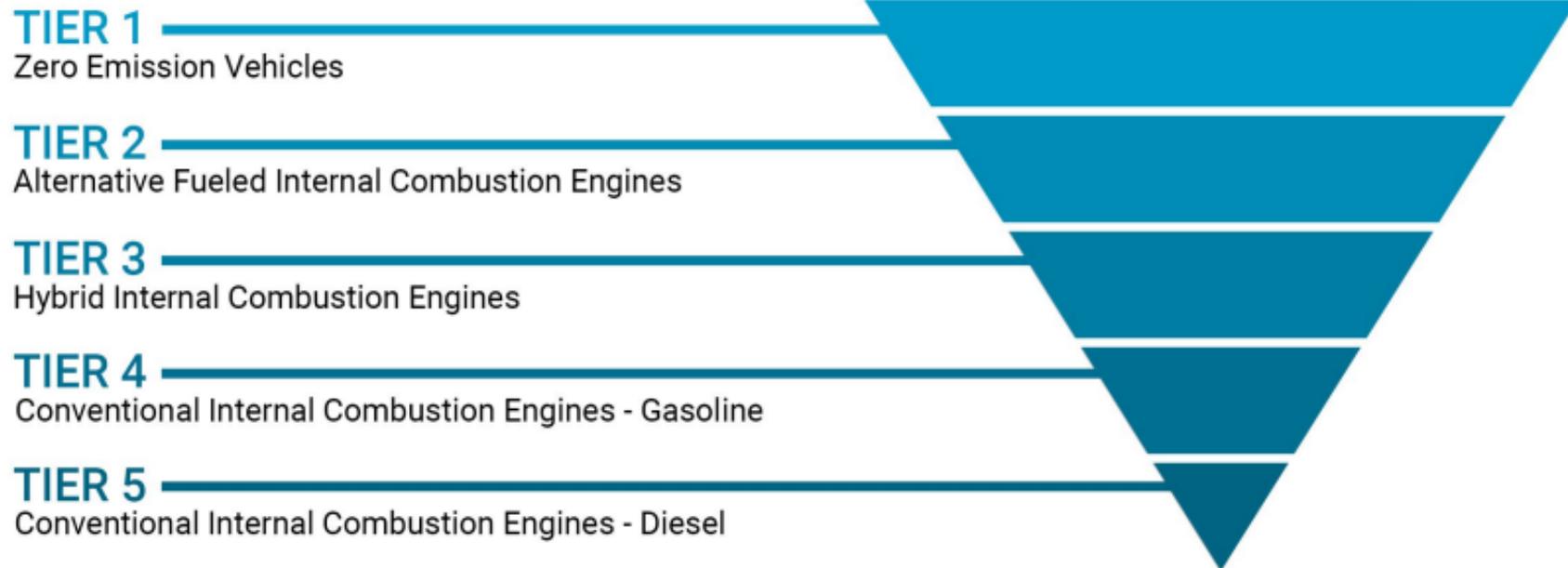Use alternative fuels

Examples

- All fleet vehicles should be replaced with electric vehicles assuming that a comparable electric model is available from a mainstream manufacturer for within 10% of the total cost of ownership of the gas version.

- 100% electric bus procurement by 2025.

- EV procurement requirement to gradually increase from:
  - 10% of new purchases in 2024 to
  - 50% by 2026 to
  - 100% by 2032

Image Credit: Department of Energy EERE

Tiered approach to purchase prioritization

The strategy for fleet-wide carbon reduction is strengthened with its ability to strongly discourage the purchase of new ICE vehicles through a multi-tiered procurement approval process.

TIER 1
Zero Emission Vehicles

TIER 2
Alternative Fueled Internal Combustion Engines

TIER 3
Hybrid Internal Combustion Engines

TIER 4
Conventional Internal Combustion Engines - Gasoline

TIER 5
Conventional Internal Combustion Engines - Diesel

Image Credit: electrificationcoalition.org

④ ENERGY STAFFING

JUSTIFICATION: IMPLEMENTATION OF THESE STRATEGIES BOTH INTERNALLY AND AT COMMUNITY SCALE REQUIRE MORE CAPACITY THAN A COMMISSION

Option 1

Appoint existing staff member(s) to coordinate and verify implementation of policies and progress.

Option 2

Contract entities to work with staff on various projects and generate progress tracking dashboards.

Option 3

Hire an Energy, Sustainability & Resilience, or Climate Action Coordinator or Manager.

Option 4

Create an Office of Energy Efficiency & Renewable Energy, Climate Action & Resiliency, or Sustainability & Resiliency.

Image Credit: Edison Energy