Proposed Chula Vista

Building Performance Ordinance

Policy Background Adopted by City Council in 2017, Chula Vista's Climate Action Plan calls for "building performance reporting and public disclosure" policies and directed city staff to "develop a Residential and Commercial Energy

Conservation Ordinance for City Council consideration." The plan set a target of retrofitting 20% of multifamily and commercial space to achieve 50% savings by 2035.

Why existing buildings? The City of Chula Vista is committed to meeting its GHG targets. And energy consumption from buildings is a significant sources of community-wide GHG emissions. New buildings tend to

Goals

- Help buildings save energy and reduce utility bills
- Encourage market transparency for building energy efficiency
- Reduce carbon emissions

have a very low (or even net-zero) carbon footprint due to strict new construction standards. However older buildings that have not yet implemented money-saving energy efficiency upgrades consume relatively large amounts of energy.

Why a building performance ordinance? Building performance ordinances (BPOs) start by getting easy-to-digest energy performance information in the hands of building owners and users. This improves market transparency and facilitates management of building energy costs.

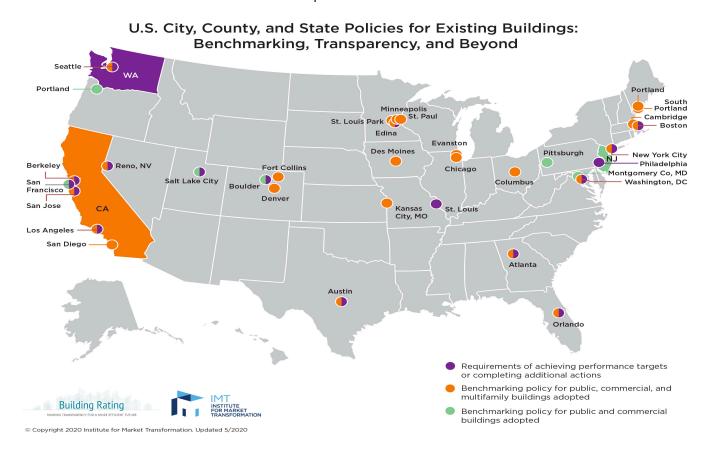
Buildings that are relatively energy efficient tend to be rewarded when the market can more easily value their lower energy costs. Similarly, for buildings that make steady energy efficiency progress, BPOs strengthen the incentive to improve. On average, buildings that benchmark each year see a steady decline in utility costs and energy consumption of about 2-3% per year.

For less energy efficient buildings that do not experience progress after a few years of benchmarking, Chula Vista's BPO creates a pathway for implementing energy efficiency improvements that make financial sense. Lower performing buildings that do not meet performance targets by their fifth benchmarking year will be required to conduct energy audits to identify savings opportunities. Following an audit, those building owners are given another 5 years to make minimum improvements identified by the audit that pay for themselves in a reasonable amount of time.

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About Building Performance Ordinances

- Buildings are one of the largest sources of a City's emissions
- Buildings that track and rate their energy performance (a.k.a. benchmarking)
 typically attain an average annual energy savings of 2-3%
- Similar ordinances have been adopted in more than 30 U.S.



Building Performance Ordinance Comparison

Jurisdiction	Year	Building Size (sqft)	Bench- marking	Public Disclosure	Audits	Perform- ance Standard
State of California	2015	50,000+	✓	✓		
Los Angeles	2015	20,000+	✓	✓	✓	
San Francisco	2011	10,000+	✓	√	✓	
San Jose	2018	20,000+	✓	✓	✓	
Washington DC	2012	10,000+	✓	✓	✓	✓
St. Louis	2017	50,000+	✓		✓	✓
New York City	2009	25,000+	✓	✓	✓	✓
Chula Vista*		20,000+	✓	✓	✓	✓

^{*}As proposed

Ordinance Applicability



Commercial buildings over 20,000 sqft



Multifamily buildings over 20,000 sqft

Requirements Overview

Benchmark Report building

energy use annually

Disclose Share ENERGY STAR Score

with owners and tenants

Audit If buildings do not meet

performance targets <u>after 5 years</u>

they must conduct an energy audit

to identify savings opportunities

Improve After an audit, low performing buildings

must show minimum improvement within

5 additional years

Benchmark and Disclose

(annually)

Audit

(after 5 years)

Improve

(after 10 years)

Roll-out Schedule

Building Size	Benchmark (annually)	Disclose	Audit (every 5 years)	Improve (every 10 years)
50,000+ sqft ¹	Since 2018	Since 2019	Starting 2022- 2025	Starting 2027- 2030
20,000+ sqft	Starting 2021	Starting 2022	Starting 2025- 2026	Starting 2030- 2031

¹ Under California's Building Energy Benchmarking Program (AB802), buildings larger than 50,000 sqft are already required to benchmark and disclose annually. Commercial buildings began in 2018, and Multifamily in 2019. Starting 2021, buildings will submit their benchmarking report to the City of Chula Vista instead of the state.

Commercial Building Requirements

	Who	What	When
Benchmark	All	Submit energy data	Annually from 2021
Disclose	All	Provide benchmarking report to current and prospective owners and tenants	Starting 2021 or 2022
Audit	Buildings with ENERGY STAR score below 80 that do not meet Performance Targets after 5 years of benchmarking (10-30%2 energy use reduction)	Conduct an ASHRAE Level I Audit (including Retro- commissioning where appropriate ³)	Every 5 years, beginning 2022 through 2026
Improve	Buildings with ENERGY STAR score below 65 that do not meet Minimum Improvement requirements after 10 years of benchmarking (10-15%4 energy use reduction)	Implement cost- effective measures identified in the audit in order to reduce energy consumption at least 10-15% ⁴	Every 10 years, beginning 2027-2031

² Applicable percentage depends on a building's starting score as follows: Score of 0-45, 30%; Score 0f 46-65 20%; Score of 66-79, 10%.

³ Retro-commissioning is required with an audit for buildings larger than 50,000 square feet that have mechanical building equipment and serviceable digital controls

⁴ Applicable percentage depends on a building's starting score as follows: Score of 0-45, 15%; Score 0f 46-65 10%.

Multifamily Building Requirements

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	Who	What	When		
Benchmark	All	Submit energy data	Annually from 2021		
Disclose	All	Provide benchmarking report to current and prospective owners and tenants	Starting 2021 or 2022		
Upgrade	Buildings constructed before 2006	Implement basic one-time upgrades in rental units	2022-2026		
Audit	Buildings with significant common load ⁵ and a score below 80 that <u>do not</u> meet Performance Targets after 5 years of benchmarking (10-30% ² energy use reduction)	Conduct an ASHRAE Level I Audit for common areas (including Retro- commissioning where appropriate ³)	Every 5 years, beginning 2022 through 2026		
Improve	Buildings with significant common load ⁵ and a score below 65 that <u>do not</u> meet Minimum Improvement requirements after 10 years of benchmarking (10-15% ⁴ energy use reduction)	Implement cost- effective measures identified in the audit in order to reduce energy consumption at least 10-15%4 for common areas	Every 10 years, beginning 2027-2031		

⁵ Multifamily buildings with at least 10,000 sqft of common floor area or master-metered apartments

Frequently Asked Questions

Why Benchmark? Annual benchmarking helps owners and users know where they stand and track progress toward reducing energy usage and GHG emissions.

What is the Audit Requirement? If a building does not achieve specific improvement thresholds (a 10-30% reduction in EIU depending on starting score) after 5 years of benchmarking, they must conduct an ASHRAE Level 1 Energy Audit. Buildings over 50,000 sqft with central equipment and digital controls are also required to conduct retro-commissioning. Buildings with a score below 60 then have another 5 years to make a minimum 10-15% improvement.

What if a building is already efficient? Buildings with an ENERGY STAR Score of at least 80 are exempt from the Audit requirement. We estimate that about 40% of Chula Vista buildings already have a score of at least 80.

What is the Minimum Improvement Requirement? By the tenth year of benchmarking, buildings that still have a score below 65 need to demonstrate a minimum improvement (a 10-15% reduction in EIU depending on starting score). Owners may implement cost-effective recommendations from their energy audit or choose other measures that reduce their energy consumption by 10-15%. We estimate 75% of Chula Vista buildings already have a score above 65.

Why are improvement percentages given in ranges? It is easier for less efficient buildings to improve by a given percentage than for buildings that are already more efficient. In recognition of this, and to incentivize more efficient buildings, the ordinance uses score tiers. See Footnotes 2 through 5 for score tier details.

What about Multifamily Buildings? Multifamily rental apartments that have not already been updated with basic energy efficiency updates like LED lighting and low-flow water fixtures will be required to make a few one-time updates, choosing from a menu of options. Multifamily buildings with common spaces larger than 10,000 sqft are also subject to the audit and improvement requirement.

What about the split-incentive issue with commercial leases? Building owners are required to share audit findings with their leasees and discuss whether co-investment in energy-efficiency makes sense for both parties.

What if a building is not eligible for an ENERGY STAR Score? Certain buildings are not eligible for an ENERGY STAR Score for a variety of reasons. In such cases, the ordinance specifies corresponding weather-normalized EIU levels, which are used in lieu of scores.

Questions/Feedback? To learn more or provide comments, please contact Barbara Locci at blocci@chulavistaca.gov.

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How do buildings Benchmark?

Starting in 2021¹, buildings will need to report their whole-building energy usage each year to the City of Chula Vista. This is done through an online process using ENERGY STAR Portfolio Manager, a free online tool administered by the EPA.

Portfolio Manager rates building energy efficiency, providing an ENERGY STAR Score on a scale of 1-100. The score is computed by comparing a building's Energy Use Intensity (EIU) to similar buildings nationally while adjusting for size and weather. Nearly 25% of U.S. commercial buildings already benchmark in ENERGY STAR Portfolio Manager.

You can directly connect ENERGY STAR Portfolio Manager to SDG&E to import a building's energy data. The tool also lets you auto-fill Chula Vista's Benchmarking report template, performs a quality check, and allows you to submit directly to the City electronically.

