

Cap-and-Trade Program Summary of 2015-2021 Natural Gas Supplier Use of Allocated Allowance Value

Purpose

This report summarizes how natural gas suppliers (NG suppliers) used the value of allowances allocated to them by the California Air Resources Board (CARB) under the Cap-and-Trade Program (Program) during the period 2015-2021. The value of these allocated allowances is referred to as “allocated allowance value” or, if the allowances have been consigned to auction and sold, “allocated allowance auction proceeds” or “auction proceeds.”¹

Background

Under the Cap-and-Trade Regulation (title 17, California Code of Regulations, sections 95801 *et seq.*) (Regulation),² NG suppliers face a compliance obligation for each ton of greenhouse gas (GHG) emissions released from the combustion of the natural gas supplied to their customers, less any natural gas delivered to facilities that are covered by the Program. To protect utility ratepayers from this Program cost while maintaining the Program incentive to reduce natural gas use, CARB allocates free allowances to NG suppliers. Pursuant to the Regulation, these allowances must be used for the benefit of natural gas ratepayers, consistent with the goals of the California Global Warming Solutions Act of 2006 (Assembly Bill 32, Nuñez, Chapter 488, Statutes of 2006, AB 32). NG suppliers were first covered by the Program in 2015, and the first NG supplier allocations were from the 2015 allowance budget year (i.e., vintage 2015 allowances).

For 2021, allowances allocated to NG suppliers were approximately 12 percent of the total Program allowance budget. Per section 95893(a) of the Regulation, the number of allowances annually allocated to each NG supplier is based on the NG supplier’s

¹ Proceeds resulting from the auction of allowances allocated to NG suppliers are distinct from the auction proceeds received by the State from the auction of State-owned allowances, which are deposited into the Greenhouse Gas Reduction Fund (GGRF) pursuant to section 16428.8 of the California Government Code. For more information on GGRF expenditures, see: [California Climate Investments webpage](#).

² *Cap-and-Trade Regulation (unofficial copy)*.

2011 total sales of natural gas, less any natural gas sold to facilities that are covered by the Program, and declines each year in proportion to the decline of the overall Program cap.

CARB allocates allowances to two types of NG suppliers—investor-owned utilities (IOUs) and publicly owned utilities (POUs)—that together provide most natural gas supplied in California. IOUs are the largest NG suppliers in the State and are subject to oversight by the California Public Utilities Commission (CPUC), which also directs how the IOUs use their allocated allowance auction proceeds consistent with the Regulation. POUs are much smaller than IOUs and are owned and operated by city governments, which determine how to use their allocated allowance value. Both IOUs and POUs must spend their auction proceeds in accordance with the requirements in the Regulation.

The Regulation requires all NG suppliers to consign a minimum percentage of their allocated allowances from each vintage year to the four quarterly Program auctions held during that calendar year. The minimum consignment requirement was 25 percent for vintage 2015 allocated allowances and increases by five percent each year, as specified in Tables 9-5 and 9-6 of the Regulation. The minimum consignment requirement was 55 percent for vintage 2021 allocated allowances and will reach 100 percent for vintage 2030 allocated allowances. As required by section 95893(d)(3) of the Regulation, NG suppliers must either use the resulting auction proceeds for programs to reduce GHG emissions or return the proceeds to ratepayers as non-volumetric credits. For IOUs, the percentage of allowances consigned to auction is approximately equal to the percentage of Program compliance costs that IOUs pass through to their customers in rates. Allowances that IOUs do not consign to auction are used directly for Program compliance, reducing their Program costs, and thus reducing the costs passed through to customers.

CARB Reporting Requirements and This Summary Report

The Regulation requires each NG supplier to report to CARB by June 30 of each year on its use of allocated allowance value during the prior calendar year. The NG supplier must describe how allocated allowance value was used during the calendar year and how those uses were consistent with the requirements of the Regulation.

The “IOU Use of 2015-2021 Allocated Allowance Value” section of this report summarizes the individual IOU use of allocated allowance value reports submitted to CARB. Through 2021, about 60 percent of the allowances allocated to IOUs have been deposited directly for compliance. The remaining allowances allocated to IOUs were consigned to auction, and most of the auction proceeds have been returned to residential ratepayers in the form of annual on-bill California Climate Credits.

The “POU Use of 2015-2021 Allocated Allowance Value” section of this document summarizes the individual POU use of allowance value reports submitted to CARB. Through 2021, just over half of the allowances allocated to POUs have been deposited

directly for compliance. The remaining allowances allocated to POUs were consigned to auction, and two-thirds of the auction proceeds were unspent as of January 1, 2022.

IOU Use of 2015-2021 Allocated Allowance Value

There are four investor-owned natural gas suppliers (investor-owned NG supplier, or IOU) in California with a compliance obligation under the Program: Southern California Gas Company, Pacific Gas and Electric Company, San Diego Gas & Electric Company, and Southwest Gas Corporation. Together, the four IOUs account for almost all retail natural gas sales in California, and they receive about 98 percent of the allowances allocated to NG suppliers. The total value of vintage 2021 allowances that CARB allocated to IOUs was approximately 856 million dollars.³

IOU use of allocated allowance auction proceeds is largely directed by CPUC consistent with requirements of the Regulation. Per CPUC Decision 18-03-017,⁴ auction proceeds from vintage 2015 through 2017 allocated allowances, less a small amount used for administration and outreach expenses, were netted against Program compliance costs for those years. Starting in 2018, this CPUC decision directed all IOU auction proceeds to annual credits for residential ratepayers. The amount of auction proceeds available for these credits was then reduced during 2020 through 2023 so that a portion of proceeds can be used to support building decarbonization programs, as required by Senate Bill (SB) 1477 (Stern, Chapter 378, Statutes of 2018). Three additional CPUC decisions then directed proceeds in 2022 and 2023 to various initiatives.⁵ These uses of proceeds for these new CPUC-directed activities will be reported in future years.

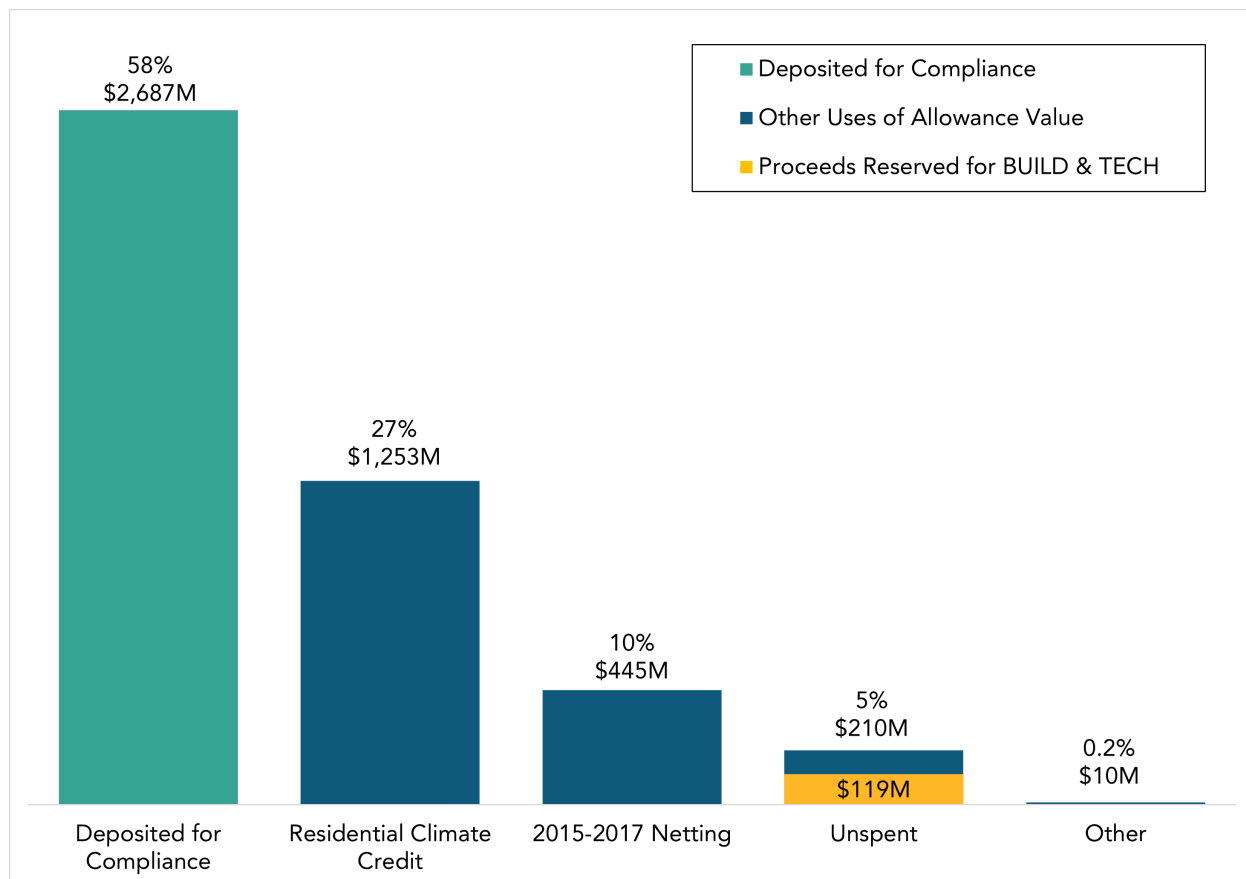
Figure 1 shows the cumulative use of allocated allowance value by all IOUs during the period 2015-2021. The information presented in Figure 1 is based on the IOU annual reports to CARB. Each category of allowance value use shown in Figure 1 is described later in this report. CARB has compiled Figure 1 data, annual allocated allowance auction proceeds, and specific reported uses of allocated allowance value in a publicly available [spreadsheet](#).

³ The calculation of total allowance value assumes an allowance deposited for compliance is worth 22.04 in 2021 (the average of the settlement prices at the four auctions held in 2021) and relies on auction proceeds amounts reported by the IOUs to CARB in the NGS use of allowance value reports.

⁴ Decision Modifying Decision 15-10-032, D.18-03-017 (March 2018). [CPUC Decision 18-03-017](#).

⁵ [Decision \(D\). 20-12-031](#) (Dec. 2020) reserves \$5 million of quarterly auction proceeds from 2022 through 2023 (for a total of \$40 million) to fund monetary incentives for biomethane projects to interconnect to the IOU natural gas pipeline system. [D. 22-02-025](#) (Feb. 2022) reserves \$40 million of 2022 auction proceeds to develop at least two pilot projects for the conversion of biomass to bio-synthetic natural gas for pipeline injection. [D. 22-04-036](#) (April 2022) reserves \$40 million of 2023 auction proceeds to fund incentives for heat pump water heaters distributed through the Self-Generation Incentive Program.

Figure 1. IOU Use of 2015-2021 Allocated Allowance Value (\$4.6 billion).⁶



Through 2021, investor-owned NG suppliers have received approximately 4.6 billion dollars in allocated allowance value over the history of the Program, which either (1) has been spent on eligible activities, (2) has been reserved for spending on specific programs in future years, or (3) is not yet spent or reserved for specific future spending as of January 1, 2022. Figure 1 shows that of the total vintage 2015-2021 allowance value that has been received or reserved, 58 percent was used directly for Program compliance and 10 percent was netted against 2015-2017 Program costs. After a small amount was used to cover outreach and administrative costs, 27 percent was returned to residential households as annual California Climate Credits. Five percent remained unspent due to (1) use of forecasts when calculating per-household

⁶ "Other" includes administrative and outreach costs and a small number of building decarbonization incentives distributed through the BUILD and TECH programs in 2021, which combined account for 0.22% of total allocated allowance value. The amount of allocated allowance value presented in this figure includes interest accrued on unspent auction proceeds.

California Climate Credits,⁷ and (2) funds reserved for building decarbonization programs (BUILD & TECH).

Allowances Deposited for Program Compliance

Per CPUC direction in Decision 15-10-032,⁸ all investor-owned NG suppliers deposit into their compliance accounts the maximum number of allocated allowances that is allowed by the Regulation (section 95893(b), Table 9-5). Each NG supplier surrenders these allowances to CARB to partially fulfill its compliance obligation under the Program, thereby reducing its Program compliance costs, which are recovered from ratepayers. The percentage of allowances allocated to IOUs that were deposited for compliance was 75 percent in 2015, 70 percent in 2016, 65 percent in 2017, 60 percent in 2018, 55 percent in 2019, 50 percent in 2020, and 45 percent in 2021.

2015-2017 Auction Proceeds Netted Against 2015-2017 Program Compliance Costs

In 2018, CPUC Decision 18-03-017 directed each IOU to net the auction proceeds it had received from the sale of vintage 2015-2017 allocated allowances against the costs it incurred in purchasing allowances to meet Program compliance obligations for covered emissions during 2015-2017. After this netting, the remaining balance of auction proceeds for each IOU was applied to its 2018 Residential California Climate Credits.

Residential California Climate Credit

CPUC Decision 18-03-017 directed most IOU auction proceeds from 2018 and following years to be used for annual credits to residential ratepayers. These credits are referred to as California Climate Credits to mirror the semi-annual credits electric IOU ratepayers have received since 2014. These annual credits first appeared on customer bills in either October 2018 or April 2019 (depending on the IOU) and subsequently have been distributed each April.⁹

The California Climate Credit provides ratepayers with partial relief from the Program compliance costs that are passed through in natural gas rates. For each IOU, all auction proceeds not used for the other purposes listed below (i.e., administration, outreach, and building decarbonization programs) are divided equally among that IOU's residential customers and returned to each residential customer as a flat on-bill

⁷ The amount of unspent auction proceeds due to the use of forecasts is included in the amount of auction proceeds available in subsequent years.

⁸ Decision Adopting Procedures Necessary for Natural Gas Corporations to Comply with the California Cap on Greenhouse Gas Emissions and Market-Based Compliance Mechanisms (Cap-and-Trade Program), D.15-10-032 (October 2015). [CPUC Decision 15-10-032](#).

⁹ For more information, see the Residential Natural Gas California Climate Credit section on the [CPUC California Climate Credit webpage](#).

credit. Since this credit is not tied to the volume of energy consumed, it helps offset the Program cost burden without blunting the carbon price signal passed through in rates. The California Climate Credit is especially impactful for low-income ratepayers that pay a higher proportion of their income on utility bills and are less able to retrofit their homes.

Building Decarbonization

SB 1477 directs a portion of IOU auction proceeds to fund two building decarbonization programs: the Building Initiative for Low-Emissions Development (BUILD) Program and the Technology and Equipment for Clean Heating (TECH) Initiative. BUILD focuses on increasing electrification in new buildings, and TECH aims to electrify space and water heating, especially in existing buildings. Both programs benefit ratepayers and reduce GHG emissions by transitioning California homes away from fossil natural gas and toward low-carbon electricity.

The programs are defined by SB 1477 and directed by CPUC Decision 20-03-027.¹⁰ SB 1477 requires that, for each budget year starting July 1, 2019, and ending June 30, 2023, \$50 million of combined IOU auction proceeds be set aside to fund BUILD and TECH. Each IOU contributes its share of auction proceeds to these programs in proportion to its share of total IOU allocated allowances. \$50 million represents about 11 percent of 2021 IOU auction proceeds. Through the end of the 2021 calendar year, the IOUs have spent \$5.6 million on BUILD and TECH (largely on early-stage administrative, outreach, and education costs) and reserved \$119 million for future program expenditures.

Administration, Outreach, and Education

Administrative, outreach, and education costs include necessary costs to administer and promote the California Climate Credits and other allowed uses of auction proceeds that benefit ratepayers. The BUILD and TECH Programs have also included a small amount of educational expenditures related to building electrification. Around 0.2 percent of total IOU auction proceeds expenditures have been for administrative, outreach, and education costs during 2015-2021.

POU Use of 2015-2021 Allocated Allowance Value

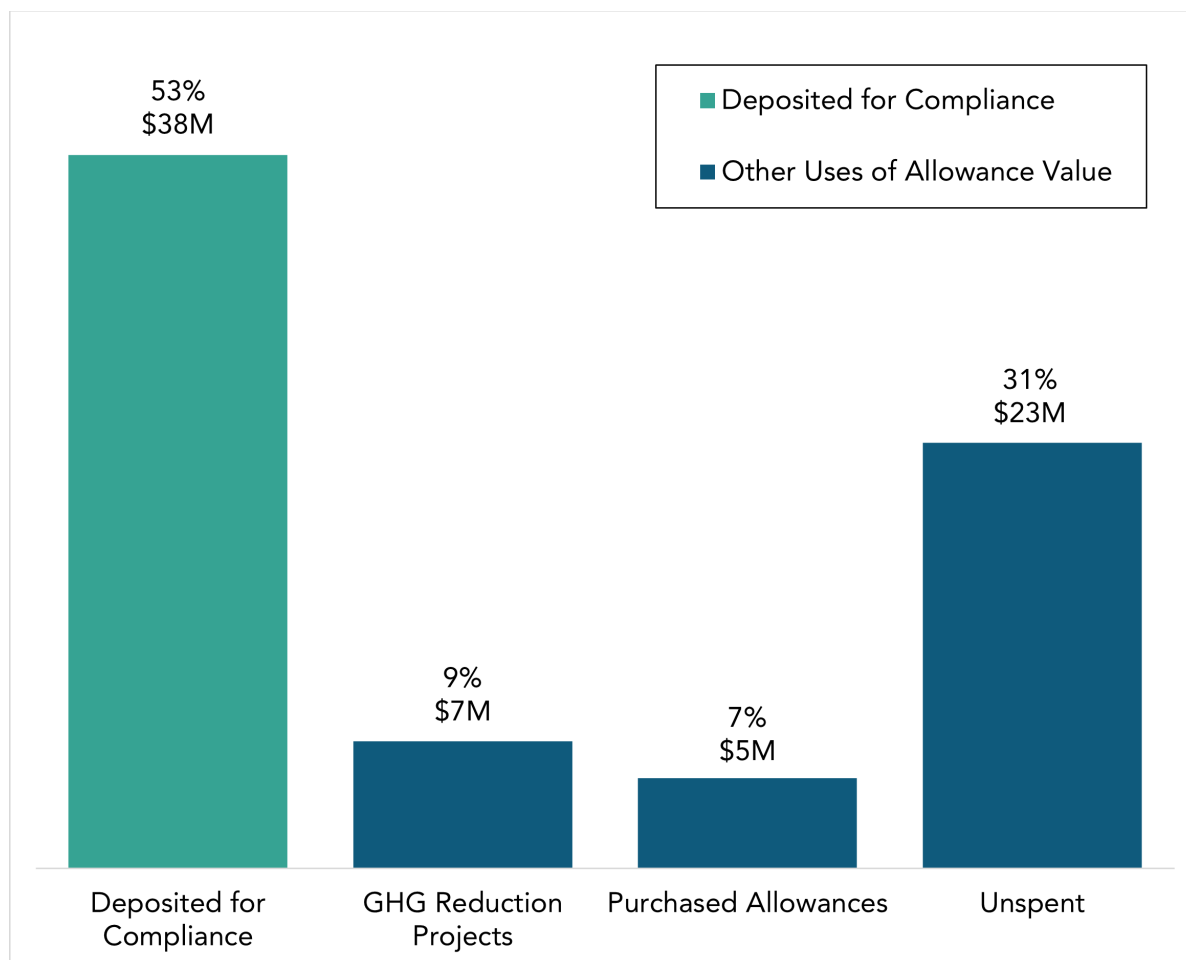
There are three publicly owned natural gas suppliers in California: City of Long Beach, City of Palo Alto, and City of Vernon. POUs supply a small fraction of the total natural gas consumed in the State, and they receive about two percent of the allowances allocated to all NG suppliers. The total value of vintage 2021 allowances that CARB allocated to POUs was approximately 13 million dollars.

¹⁰ Decision Establishing Building Decarbonization Pilot Programs, (D.) 20-03-027 (March 2020). [CPUC Decision 20-03-027](#).

Allowances allocated to POUs can be either deposited for compliance or sold at auction, however a minimum percentage must be consigned to auction each year as specified in Tables 9-5 and 9-6 of the Regulation. As with the IOUs, the Regulation requires that the use of these allowances must benefit ratepayers, consistent with the goals of AB 32. POUs are overseen by their local governing boards and are not subject to CPUC jurisdiction or the requirements of SB 1477.

Figure 2 shows the cumulative use of allocated allowance value by all POUs during the period 2015-2021. The information presented in Figure 2 is based on the individual POU annual reports to CARB. CARB has compiled Figure 2 data, annual allocated allowance auction proceeds, and specific reported uses of allocated allowance value in a publicly available [spreadsheet](#).

Figure 2. POU Use of 2015-2021 Allocated Allowance Value (\$73 million).¹¹



POUs have received approximately 73 million dollars in allocated allowance value over the history of the Program. Figure 2 shows that of the vintage 2015-2021 allowance value allocated to POUs, 53 percent was used directly for Program compliance, seven percent was used to purchase allowances in 2016 (which is no longer an allowable use of auction proceeds), nine percent was used for GHG reduction projects, and 31 percent remains unspent as of January 1, 2022. GHG reduction projects have included installing LED streetlights, building energy efficiency retrofits, solar energy projects, battery storage, industrial efficiency activities, residential energy efficiency outreach, and installing electric vehicle charging stations. If a POU does not spend proceeds on eligible activities before the rolling 10-year deadline set in section 95893(d)(8) of the Regulation, it must return the proceeds to ratepayers in a non-volumetric manner.

¹¹ Administrative and outreach costs are included within other activities rather than shown separately because they were not required to be reported separately to CARB until reporting for the 2018 data year. Details on administrative and outreach costs can be found in the accompanying spreadsheet.