

MARKET MONITOR REPORT FOR AUCTION 14

Prepared for:

RGGI, Inc., on behalf of the RGGI Participating States

Prepared By:



December 9, 2011



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The Regional Greenhouse Gas Initiative (RGGI) is a cooperative effort by participating states to reduce emissions of carbon dioxide (CO₂), a greenhouse gas that causes global warming.

RGGI, Inc. is a non-profit corporation created to provide technical and administrative services to the CO₂ Budget Trading Programs of Connecticut, Delaware, Maine, Maryland, Massachusetts, New Hampshire, New Jersey, New York, Rhode Island, and Vermont.



MARKET MONITOR REPORT FOR AUCTION 14

As the Market Monitor for the RGGI CO_2 allowance market, Potomac Economics monitors the conduct of market participants in the auctions and in the secondary market to identify indications of market manipulation or collusion. We also review the administration of the auctions by World Energy Solutions. This report summarizes our findings regarding RGGI Auction 14, which was held on December 7, 2011.

We observed the auction as it occurred and have completed our review and analysis of its results. Based on our review of bids in the auction, we find no material evidence of collusion or manipulation by bidders.

A large number of bidders participated in the offering of CO_2 allowances for the current control period (with a 2009, 2010 and 2011 vintage year). Thirty-eight entities submitted bids to purchase 63 percent of the available supply of allowances, resulting in a clearing price equal to the reserve price of \$1.89 per ton. Compliance entities or their affiliates purchased 99 percent of the allowances in the offering. There was no indication of barriers to participation in the current control period offering.

A small number of allowances were auctioned for a future control period (with a 2014 vintage year), although no bids were submitted to purchase these allowances. There was no indication of barriers to participation in the future control period offering.

Based on our review of the administration of the market, we found that:

- The auction was administered in a fair and transparent manner in accordance with the noticed auction procedures and limitations.
- The auction results were consistent with the market rules and the bids received.
- Sensitive information was treated appropriately by the auction administrator.
- There were no indications of issues with the auction platform such as hardware or software problems, communications issues, or security breaches.

In summary, the results of our monitoring of RGGI Auction 14 raise no material concerns regarding the auction process, barriers to participation in the auction, or the competitiveness of the auction results. The appendix provides additional information about the market for RGGI CO_2 allowances and outcomes of the auction.



APPENDIX

A. DISPERSION OF PROJECTED DEMAND

The wide dispersion of projected demand for RGGI allowances across compliance entities facilitates the competitive performance of the auction.

The following figure shows the relative shares of projected demand for RGGI allowances by compliance entity in the current control period. The largest compliance entity represents only 12 percent of the total projected demand for allowances. Almost half of the projected demand is composed of entities that each account for less than 4 percent of the total demand. Participation by a large number of entities facilitates the competitive performance of the auction.

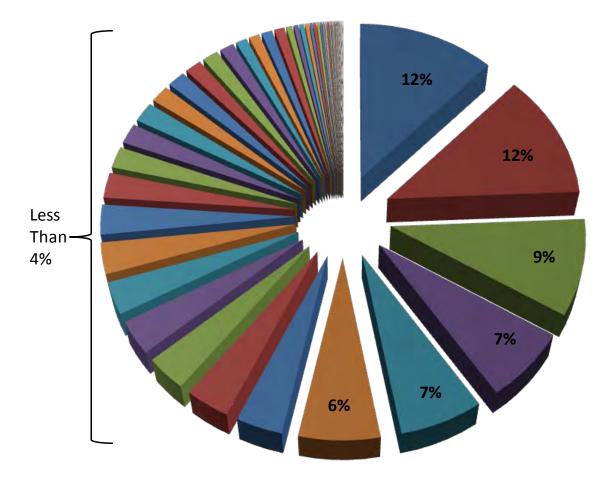


Figure 1: Projected Demand for RGGI Allowances Shares by Compliance Entity



B. DISPERSION OF BIDS IN AUCTION 14

In the offering of current control period allowances, bids were submitted by a large number of compliance entities and two non-compliance entities. A small number of allowances were also auctioned in advance for a future control period, although no bids were submitted in this offering. In our review of the bids and the qualification process, we found no material evidence of anti-competitive conduct or significant barriers to participation.

The following figure summarizes the quantities of allowances for which bids were submitted in the two offerings. In the offering of current control period allowances, two compliance entities submitted bids for a large quantity of allowances (e.g., at least 5 million tons). Overall, compliance entities accounted for 99 percent of the quantity of allowances for which bids were submitted in the offering of current control period allowances. The quantity of allowances for which bids were submitted increased to 0.63 times the available supply in Auction 14 from 0.18 times the available supply in Auction 13 and 0.30 times the available supply in Auction 12.

In the offering of future control period allowances, no bids were submitted in Auction 13 or in Auction 14. The last auction in which bids were submitted for future control period allowances was Auction 12 when bids were submitted for 0.57 times the available supply.

The bid quantities were widely distributed among the 38 bidders in the offering of current control period allowances. The concentration of bids, using the Herfindahl-Hirschman Index ("HHI"), rose from 884 in Auction 13 to 2344 in Auction 14. The HHI rose because two compliance entities accounted for the majority (66 percent) of allowances for which bids were submitted in Auction 14. The HHI is a standard measure of concentration calculated by squaring each entity's share and then summing the squares across all entities (hence, the index ranges from 0 to 10,000).



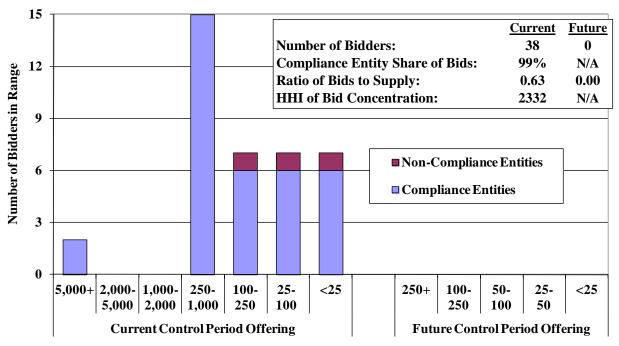


Figure 2: Quantity of Bids Submitted by Entity By Type of Entity and Quantity Bid

Quantity of Bids Submitted (in Thousands of Tons)



C. SUMMARY OF PURCHASES OF ALLOWANCES IN AUCTION 14

In the offering of current control period allowances, awards were widely distributed across 38 bidders with two bidders purchasing five million tons or more and seventeen bidders purchasing 250,000 tons or more. Compliance entities or their affiliates purchased 99 percent of the allowances in the offering of current control period allowances.

The share of allowances purchased and several other quantities are reported for each of three types of entities:

- *Compliance Entities*: This includes all compliance entities and their affiliates. In this report, affiliated firms are firms that: (i) have a parent-subsidiary relationship with a compliance entity, (ii) are subsidiaries of a parent company that has a large interest in a compliance entity, (iii) have substantial control over the operation of a budget source and/or responsibility for acquiring RGGI allowances to satisfy its compliance obligations.
- *Environmental/Individuals*: This includes non-compliance entities describing themselves as "Environmental Groups" or "Individual Person" in their qualification application.
- Other Non-Compliance Entities: This includes all other non-compliance entities.

The following statistics summarize the purchases and holdings of allowances by compliance entities and their affiliates under the RGGI program:

- In Auction 14, compliance entities and their affiliates purchased 99 percent of the current control period allowances sold.
- In the first fourteen RGGI auctions, compliance entities and their affiliates purchased:
 - ✓ 86 percent of the current control period allowances sold,
 - \checkmark 92 percent of the future control period allowances sold, and
 - ✓ 86 percent of all allowances sold.
- Compliance entities and their affiliates will hold 97 percent of the allowances in circulation following the settlement of allowances sold in Auction 14.

The following table shows the quantity of allowances purchased by each bidder. The identity of each bidder is masked, and the bidders are ranked according to the amount of allowances awarded, from largest to smallest.

Number of Current Control		
Bidder	Period Allowances Awarded	
Bidder 1	10,745,000	
Bidder 2	7,300,000	
Bidder 3	990,000	
Bidder 4	980,000	
Bidder 5	803,000	
Bidder 6	734,000	
Bidder 7	600,000	
Bidder 8	533,000	
Bidder 9	490,000	
Bidder 10	400,000	
Bidder 11	340,000	
Bidder 12	312,000	
Bidder 13	300,000	
Bidder 14	300,000	
Bidder 15	260,000	
Bidder 16	250,000	
Bidder 17	250,000	
Bidder 18	220,000	
Bidder 19	201,000	
Bidder 20	193,000	
Bidder 21	185,000	
Bidder 22	140,000	
Bidder 23	136,000	
Bidder 24	110,000	
Bidder 25	87,000	
Bidder 26	75,000	
Bidder 27	70,000	
Bidder 28	61,000	
Bidder 29	60,000	
Bidder 30	47,000	
Bidder 31	25,000	
Bidder 32	20,000	
Bidder 33	19,000	
Bidder 34	17,000	
Bidder 35	16,000	
Bidder 36	15,000	
Bidder 37	5,000	
Bidder 38	4,000	

Table 1: Quantity of Allowances Awarded by Bidder



D. SUMMARY OF BID PRICES IN AUCTION 14

The distribution of bid prices submitted in the auction indicates that the demand for allowances was relatively elastic, which is a signal that the results were competitive.

The following table reports several statistics regarding the bid prices for bids submitted in Auction 14. The median and mean bid prices are weighted by the quantity of each bid.

	Current	Future
Bid Prices:		
Minimum	\$1.89	N/A
Maximum	\$5.00	N/A
Average (Median)	\$1.91	N/A
Average (Mean)	\$1.99	N/A
Clearing Prices:	\$1.89	N/A



E. NAMES OF POTENTIAL BIDDERS IN AUCTION 14

In accordance with Section 2.8 of the Auction Notice for CO_2 Allowance Auction 14 on December 7, 2011, the Participating States are releasing the names of Potential Bidders in Auction 14. The states defined potential bidders as: "Each Applicant that has been qualified and submitted a complete *Intent to Bid*." The list of 49 Potential Bidders is as follows:

AES Eastern Energy, LP AES Warrior Run Cogeneration Facility Aircraft Services Corporation Astoria Generating Company, LP Brooklyn Navy Yard Cogen Partners, LP Caithness Long Island, LLC Calpine Energy Services, LP Cargill Power Markets, LLC Castleton Power, LLC Chambers Cogeneration, LP ConocoPhillips Company Consolidated Edison Comp. of NY, Inc. **Constellation Energy Commodities Group** Covanta Energy Corporation CP Energy Marketing (US) Inc. Dominion Energy Marketing, Inc. Dynegy Marketing and Trade, LLC Empire Generating Co., LLC EquiPower Resources GenOn Energy Management, LLC Green Mountain Power Corporation H.Q. Energy Services (US) Inc. Hawkeye Energy Greenport Indeck-Corinth Limited Partnership Jamestown Board of Public Utilities

J-Power USA Development Co., Ltd. Kleen Energy Systems, LLC Koch Supply & Trading, LP Logan Generating Company, LP Massachusetts Bay Transportation Auth. Massachusetts Muni. Wholesale Elec. Co. Massachusetts Water Resources Authority Millennium Power Partners, LP Morgan Stanley Capital Group, Inc. National Grid Gen. dba National Grid New Athens Generating Company, LLC NextEra Energy Power Marketing, LLC North American Energy Alliance, LLC NRG Power Marketing, LLC Old Dominion Electric Cooperative Panda Brandywine, LP Power Authority of the State of New York Public Service Company of New Hampshire RBC Rochester Gas and Electric Corporation Selkirk Cogen Partners, LP Sunoco Power Generation, LLC Verso Paper Corp. Wallingford Energy, LLC