

## DEPARTMENT OF THE INTERIOR

### TITLE:

### **Buy America Project Waiver: Santa Clarita Valley Water Agency (AMI Capable Water Meters)**

#### **1. Summary**

Agency: Department of the Interior, Bureau of Reclamation

Proposed Waiver: The Department of the Interior (DOI), Bureau of Reclamation (Reclamation) is issuing a project waiver of the requirements of section 70914 of the Build America, Buy America Act (Buy America Preference) included in the Infrastructure Investment and Jobs Act (Pub. L. No. 117-58) for Advanced Metering Infrastructure (AMI) capable water meters used in an infrastructure project funded through Award No. R22AP00509. This waiver is to be in effect through the end of the award's period of performance on July 31, 2025.

This waiver action permits the use of non-domestic AMI capable water meters through Award No. R22AP00509.

Waiver type: Nonavailability of a domestic product of satisfactory quality.

Waiver level: Project level waiver (not a general applicability waiver).

Waiver justification summary: AMI capable water meters utilizing radio frequencies (RF) are not manufactured within the United States (US) of a satisfactory quality for use in the identified project. Use of any other manufactured AMI capable water meter risks incompatibility with the current infrastructure installed in previous phases of the project. The Santa Clarita Valley Water Agency's (SCVWA) found no other RF AMI capable water meters that can be installed with the current infrastructure while retaining functionality with the agency's existing system. Integrating a different AMI meter type (i.e., cellular) into the current SCVWA system will result in compatibility concerns that would negate the \$10 million and twelve-year effort by the district to update the current system that utilizes the Master Meter and Sensus AMI type water meters. Using another manufacturer's AMI water meter will risk system-wide failure, potential lapse in service, and less efficient water-use in a service area where drinking water is a limited resource that cannot afford to be wasted. SCVWA found no other domestic RF AMI water meters of satisfactory quality and compatibility to successfully integrate this project within the existing system in order to improve service reliability and water conservation efforts in the Santa Clarita Valley service area.

Length of the waiver: From the effective date of the final waiver until the award's period of performance end date on July 31, 2025.

Summary of items covered in the waiver: 21,163 AMI capable water meters utilizing RF, currently manufactured by Master Meter and Sensus.

Summary of award: Under the [Water and Energy Efficiency Grant program](#), projects are funded to conserve and use water more efficiently. This award proposes to upgrade dated water meter infrastructure with AMI, to increase efficient water usage in Santa Clarita, CA by providing water users with daily usage information. These components will increase SCVWA water conservation efforts through accurate and real-time meter readings, improved detection of leaks and immediate corrective responses, facilitation of more efficient billing processes, a reduction in the amount of manual labor required to read water meters and will enhance customer education on water usage and conservation. SCVWA serves a population of approximately 300,000 and has expended \$10 million in AMI compatible meters and infrastructure since the effort began in 2015. The SCVWA has been evaluating and planning for the transition to AMI compatible water meters since 2002.

This award will fund the phased replacement of 21,163 meters with RF AMI capable meters. In addition, this phase of the project proposes to upgrade 11,000 existing meters with leak detection capabilities and connects these meters to the SCVWA's Customer Engagement Portal (CEP). These two components are expected to upgrade 44% of the meters in the service area resulting in the conservation of an estimated 2,946 acre-feet per year (AFY) in water savings and 2,522,333 kilowatt-hours (kWh) per year in energy savings.

## **2. Background**

The Buy America Preference set forth in section 70914 of the Build America, Buy America Act included in the Infrastructure Investment and Jobs Act (Pub. L. No. 117-58), requires all iron, steel, manufactured products, and construction materials used for infrastructure projects under Federal financial assistance awards be produced in the US.

Under section 70914(b), the DOI may waive the application of the Buy America Preference, in any case in which it finds that: applying the domestic content procurement preference would be inconsistent with the public interest; types of iron, steel, manufactured products, or construction materials are not produced in the US in sufficient and reasonably available quantities or of a satisfactory quality; or the inclusion of iron, steel, manufactured products, or construction materials produced in the US will increase the cost of the overall project by more than 25 percent. All waivers must have a written explanation for the proposed determination; provide a period of not less than fifteen (15) calendar days for public comment on the proposed waiver; and submit the proposed waiver to the Office of Management and Budget's (OMB) Made in America Office for review to determine if the waiver is consistent with policy.

## **3. Description of Award**

Title of project: Automated Metering Infrastructure (AMI) Project Phase 1

Description of Project: Under the [Water and Energy Efficiency Grant program](#), projects are funded to conserve and use water more efficiently. This award proposes to upgrade dated water

meter infrastructure with AMI, to increase efficient water usage in Santa Clarita, CA by providing water users with daily usage information. The proposed Master Meter and Sensus components will increase water conservation through accurate and real-time meter readings, detection of leaks in the system and immediate corrective responses, facilitation of the billing process, reduction in the amount of manual labor required to read water meters, and customer education on water use and conservation. SCVWA serves a population of approximately 300,000 and has expended \$10 million in AMI compatible meters and infrastructure since the effort began in 2015. The SCVWA has been evaluating and planning for the transition to AMI compatible water meters since 2002.

This award will fund the phased replacement of 21,163 meters with AMI capable meters. In addition, this phase of the project proposes to upgrade 11,000 existing meters with leak detection capabilities and to connect these meters to the CEP. These two components are expected to upgrade 44% of the meters in the service area that will conserve an estimated 2,946 AFY in water savings and 2,522,333 kWh per year in energy savings.

Recipient name and Unique Entity Identifier (UEI): Santa Clarita Valley Water Agency (SCVWA); UEI: NTVBCVJJHF99

Federal Award Identification Number (FAIN): R22AP00509

Federal Financial Assistance Listing: 15.507, WaterSMART (Sustain and Manage America's Resources for Tomorrow)

Federal financial assistance funding amount: \$2,000,000.00

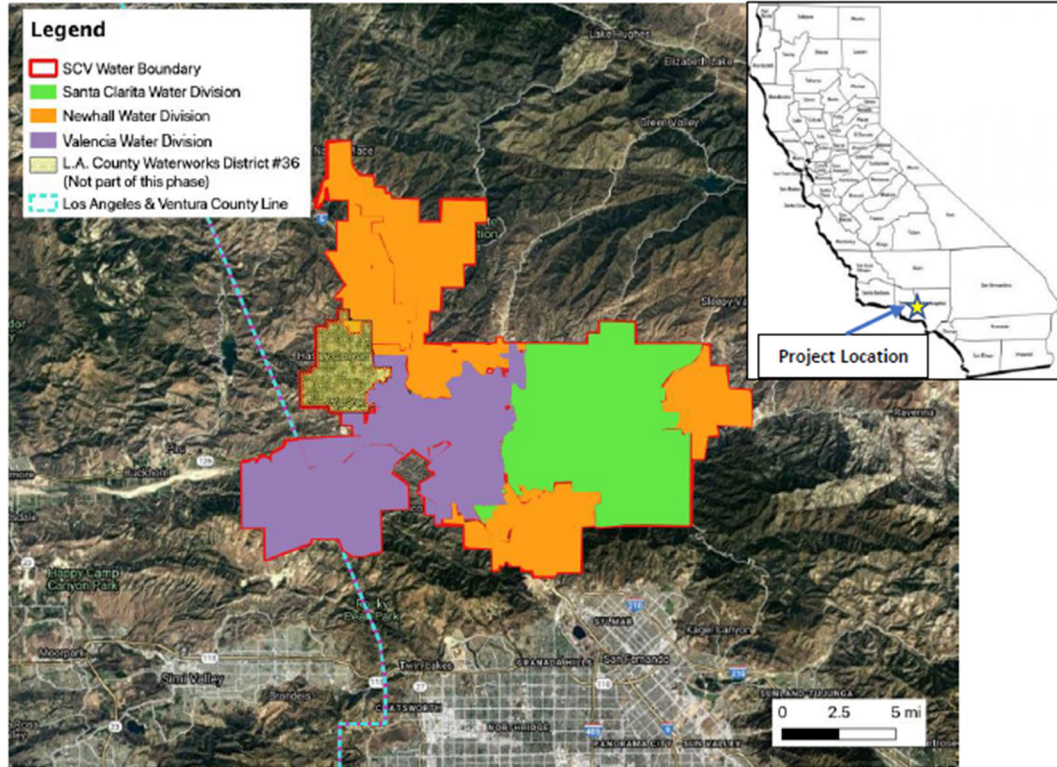
Total cost of infrastructure expenditures, including all Federal and non-Federal funds:  
\$9,130,518.00

Infrastructure project description and location: To further increase the Santa Clarita Valley's water supply reliability and to support water conservation and system management efforts, SCVWA has embarked on replacing its existing water service meters with AMI and launching the CEP. The CEP will provide SCVWA customers with daily water use information. The components will increase water conservation through accurate and real-time meter readings, detection of leaks in the system, immediate corrective responses, facilitation of the billing process, reduction in the amount of manual labor to read water meters and customer education on water use. This phase will replace 21,163 meters with AMI capable meters. In addition, this phase of the Project proposes to upgrade 11,000 existing meters with leak detection capabilities and to connect these meters to the CEP. These two components are expected to upgrade 44% of the meters in the service area that will conserve an estimated 2,946 acre-feet per year (AFY) in water savings and 2,522,333 kilowatt-hours (kWh) per year in energy savings. SCVWA is directly managing and implementing the AMI Project. These upgrades will improve SCVWA's overall management of the system and enhance customer service.

The AMI Project, located in Los Angeles County in the state of California, will replace existing water meters in three service areas within SCVWA's boundaries as shown in Figure 1. Since

there are many locations where meters will be installed, the latitude and longitude for the SCVWA headquarters is 34° 26' 7.2492" N and 118° 31' 15.6432" W, respectively.

Figure 1. Project Location Map



The AMI project replaces water meters in three (3) current SCVWA areas as summarized in Table 1 (below).

Table 1. New AMI Meter Installation Locations

Division	Number of New AMI Meters
Castaic	1,910
Newhall	424
Pinetree	2,819
Santa Clarita	1,822
Tesoro	1,188
Valencia	13,000
<b>Total</b>	<b>21,163</b>

#### 4. Description of Covered Items

Manufactured products: RF AMI compatible water meters for this project are exclusively supplied by Master Meter and Sensus. These water meters rely on radio frequencies for system

notifications. Neither Master Meter nor Sensus manufacture water meters that meet the 55% cost threshold as defined in OMB Memorandum M-22-11 *Initial Implementation Guidance on Application of Buy America Preference in Federal Financial Assistance Programs for Infrastructure* (OMB M-22-11) required for consideration as a domestically manufactured product, though both companies assemble their products within the US. Master Meter manufactures 50% of the meter bodies in the US, but this does not include the end points, resins, printed circuit boards, meter electronics or batteries, which are manufactured outside of the US. The components of the Sensus water meters are manufactured outside of the US. Neither Master Meter nor Sensus can source at least 55% of the total cost of the AMI compatible meters from domestic sources in order to comply with Buy America Preference. Both Master Meter and Sensus are also evaluating the idea of moving manufacturing to the US, but have no immediate plans or timeframes identified. Suppliers for AMI water meter components are global, and the meter industry at large is dealing with this challenge.

## **5. Waiver Justification**

Anticipated impact if no waiver is issued: If a waiver is not granted, then the project as defined would not be possible to complete within the grant period. Integrating a different AMI water meter into the current system will result in incompatibility issues, negating the \$10 million and years of effort spent updating the current system using the Master Meter and Sensus AMI water meters. Using any other type of AMI water meter will risk system wide failure, lapse in services, and loss of water used efficiently when drinking water cannot afford to be wasted. Thus, no other water meters provide the compatibility quality necessary to implement this project successfully.

The decision to use both Master Meter and Sensus AMI water meters in the Santa Clarita service area dates to 2018, when SCVWA was formed. However, the efforts to transition to AMI water sensors began as early as 2002. SCVWA is a California Special District formed under Senate Bill 634 on January 1, 2018, SB 634 that brought together three retail water agencies (i.e., Newhall County Water District, Santa Clarita Water Division, Valencia Water Company) with water wholesaler Castaic Lake Water Agency. When the three organizations merged, the separate distribution, reporting and billings systems were integrated into one cohesive operating entity with as little additional infrastructure costs being passed along to its customers as possible. All three organizations had been evaluating their water meter infrastructure since the early 2000s, conducting market research, pilot projects, and system integration tests. At the time of the merger, all three organizations were using a combination of the Master Meter and Sensus AMI water meters.

The legacy agencies assessed the current meter technologies being used and decided to continue using both Master and Sensus meters. This was decided based on the prior meter technology comparisons each legacy agency conducted and the significant amount of infrastructure, money and technological integrations that have been invested in these systems. Utilizing the two existing AMI water meter technologies will provide significant cost savings and continuity of operations by installing new meters (or replacing meters) that are compatible with existing infrastructure. No other AMI water meters provide the compatibility and quality necessary to implement this project successfully.

Description of efforts made to avoid the need for a waiver:

- SCVWA conducted market research to identify any AMI water meters that would meet the 55% cost threshold to be considered a domestically manufactured product under OMB M-22-11. However, based on initial market research, the most expensive components of AMI water meters (i.e., end points, resins, printed circuit boards, meter electronics and batteries), are manufactured outside of the US. The industry is just beginning to understand the Buy America Preference. SCVWA held multiple outreach calls with Master Meter and Sensus to explain the Buy America Preference. As of right now, there are no plans to move manufacturing to the US, and no decisions have been made within the industry to respond to the Buy America Preference.
- Reclamation partnered with the Environmental Protection Agency to conduct additional market research on AMI water meters. The market research team contacted thirteen suppliers of AMI smart water meters. Companies were asked whether they can manufacture or source AMI smart meters that are manufactured in the US and compliant with BABA provisions. Nine of the thirteen companies responded to outreach requests. Of the nine, one company offers an AMI water meter that is manufactured within the US.
- SCVWA reviewed the results of this market research. SCVWA determined that the AMI water meter manufactured within the US does not meet their product specifications, as it relies on cellular rather than RF communication methods. SCVWA is not able to utilize cellular communication methods, as there are many service areas where cellular service is not adequate. Additionally, transitioning from RF to cellular communication would negate the \$10 million investment SCVWA has already made into its RF AMI water meter system and would require retrofitting meter boxes to fit the new cellular AMI water meter design, imposing an additional cost.

SCVWA and Reclamation made a good faith effort to identify an alternative domestic product that meets project specifications. However, based on all currently available information, there are no AMI capable water meters utilizing RF communication that can be utilized in the current project.

Expectations for the agency, award recipients, and industry at the conclusion of the waiver:

Reclamation expects to work with the recipients implementing AMI water meter upgrades, such as SCVWA, throughout the course of the projects to re-assess opportunities to incorporate compliant meters that will be compatible with existing infrastructure. At the conclusion of the waiver, Reclamation will work with recipients to evaluate possible domestic sources of supply for upcoming or new projects to achieve compliance going forward.

SCVWA expects to perform regular market research and coordinate with Reclamation to identify any opportunities for domestic sourcing of AMI water meters that will also be compatible with existing infrastructure. Industry has yet to indicate any clear intention to move manufacturing of the compatible meters to the US, though it is possible that companies could adjust sourcing of at least 55% of the cost of its components to domestic sources.

## **6. Assessment of Cost Advantage of a Foreign-Sourced Product**

Under OMB M–22–11, agencies are expected to assess “whether a significant portion of any cost advantage of a foreign-sourced product is the result of the use of dumped steel, iron, or manufactured products or the use of injuriously subsidized steel, iron, or manufactured products” as appropriate before granting a public interest waiver. DOI’s analysis has concluded that this assessment is not applicable to this waiver as this waiver is not based on the cost of foreign-sourced products.

## **7. Summary of Public Comments**

The proposed waiver was posted on [DOI’s public facing webpage](#) and a notice of the waiver was also posted to the [Made in America website](#) on December 8, 2022 to satisfy the requirement to publish any proposed Buy America Project Waiver and provide the public with fifteen (15) days to submit comments. The Department of the Interior sought public and industry comment from all interested parties and encouraged current manufacturers of the product in question to submit comments regarding anticipated timeframes for shifting manufacturing to a domestic market. The comment period for this proposed waiver closed on December 23, 2022. No comments were received in response to the public posting of the waiver.