Short Form Work Paper WPSDGEREHC0024

**Revision 3**

**San Diego Gas & Electric**

**Energy Efficiency Engineering**

**Fan Delay Controller for Residential Air Conditioners**

**December 20, 2018**

# Fan Delay Controller for Residential Conditioners Short Form WP

## Introduction

This short form workpaper documents the values adopted from SCE’s workpaper entitled “Fan Delay (Cycle Off) Controller for Residential Air Conditioners” (SCE17HC052 Revision 0). SDG&E adopts all the values in SCE17HC052 Revision 0, with the following exceptions:

1. Measure Application Type was adjusted to Add-On Equipment (AOE) from Retrofit Add-On (REA) per E-4818.

## Document Revision History

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| --- | --- | --- | --- |
| **Rev** | **Date** | **Author** | **Summary of Changes** |
| 0 | 10/25/10 |  | Adapted from SoCalGas Workpaper SCG0077 Revision #0 dated April 4, 2010, developed by Verified, Inc. Revised weighting in multiple tables for SDGE Climate zones. Added SDGE Work paper number. |
| **1** | **08/25/14** | **Phillip Hasley (Hasley Consulting)** | - Adopted SCE Work Paper SCE13HC052.1  - Updated Workpaper name  - Removed calculation template  - Removed Table of Contents  - Replaced summary tables with At-A-Glance Summary  - Updated EUL\_ID  - Updated NTG  - Added GSIA  - Updated load shapes  - Updated building types |
| **2** | 12/15/16 | Eduardo Reynoso (SDG&E) | Adopted Short Form Workpaper based on referencing IOU lead workpaper by SCE, SCE13HC052 Rev2. |
| **3** | 12/20/18 | Keith Valenzuela (AESC) | -Adopted Short Form Workpaper based on referencing IOU lead workpaper by SCE, SCE17HC052 Rev0.  -Added new Measure Application Types and Delivery Type for 1/1/19. |

Table 1: Measure Summary Table

|  |  |
| --- | --- |
| **Section** | **Value** |
| **1.1 Measure & Baseline Data** | Please reference SCE17HC052 Revision 0 Section 1.1 Measure Description & Background |
| **1.2 Technical Description** | Please reference SCE17HC052 Revision 0 Section 1.2 Technical Description |
| Measures | |  |  |  |  |  | | --- | --- | --- | --- | --- | | **Measure Codes** | | | | **Measure Name** | | SCG | SDG&E | SCE | PG&E | | N/A | 420156  462282 | AC-20510 | N/A | Fan Delay (Cycle Off) Controller for Residential Air Conditioners |   Note: SDG&E has two measure codes per measure to account for each available delivery type (Direct Install and Downstream Incentive) |
| Code for Measure | Please reference SCE17HC052 Revision 0 Section 1.4.2 Codes and Standards Analysis |
| Requirements | Please reference SCE17HC052 Revision 0 Section 1.1 Measure Description & Background  Note: Contractor referenced must be SDG&E approved. |
| **1.3 Installation Type and Delivery Mechanisms** |  |
| Installation Type | Add-on Equipment (AOE) |
| Delivery Mechanisms | DnDeemed  DnDeemDI |
| **1.4.1 DEER Data** |  |
| Net-to-Gross Ratio | Please reference SCE17HC052 Revision 0 Section 1.4.1 DEER Data |
| Effective and Remaining Useful Life | Please reference SCE17HC052 Revision 0 Section 1.4.1 DEER Data |
| **Section 2. Calculation Methodology** | Please reference SCE17HC052 Revision 0 Section 2 Calculation Methodology |
| **Units** | Please reference SCE17HC052 Revision 0 At-A-Glance Summary |
| **Section 3. Load Shapes** | Please reference SCE17HC052 Revision 0 Section 3 Load Shapes |
| **Section 4. Costs** |  |
|  |  |
| Base Cost | Please reference SCE17HC052 Revision 0 Section 4.1 Base Case Costs for details on how baseline cost estimates were determined.  SDG&E adopts all cost and created SDG&E measure cost IDs for reporting purposes. SDG&E measure cost IDs are included in Ex-Ante tables submission. |
| Measure Cost | Please reference SCE17HC052 Revision 0 Section 4.2 Measure Case Costsfor details on how measure cost estimates were determined.  SDG&E adopts all cost and created SDG&E measure cost IDs for reporting purposes. SDG&E measure cost IDs are included in Ex-Ante tables submission. |