

Wood Management

SUMMARY

This utility procedure provides guidance for vegetation management (VM) pre-inspectors (PIs) and wood management contractors (WMCs) creating and processing wood management work records in ArcGIS Online and the Collector Application (Collector). The information captured is for the management of wood generated as a result of both Expanded Vegetation Management (EVM) and non-EVM work. The Wood Management program offers customers the following four work types for managing wood and brush/slash:

- **Remove** (wood is removed from the property)
- **Relocate/Move** (wood is moved to a different location on the property)
- **Chip on site/Broadcast** (wood is chipped and broadcast on the property)
- **Cut** (wood is cut to specified dimensions)
- **Brush Removal** (only available for non-EVM work)

Level of Use: Informational Use

TARGET AUDIENCE

All VM PIs and WMCs conducting EVM and non-EVM wood management activities.

SAFETY

PG&E staff and contract workers must review and follow all applicable safety standards and procedures before performing work. This includes reviewing tailboards and wearing appropriate personal protective equipment (PPE) for the job. All workers are also responsible for adopting best management practices when addressing environmental impacts in accordance with [Job Aid TD-7102P-01-JA01, "Best Management Practices \(BMPs\)."](#)

BEFORE YOU START

- The user must utilize ArcGIS Online and the Collector Application to manage the tree points and non-EVM wood management data points that have WM **Yes** selected.
- IF the user does not have access to ArcGIS Online and the Collector Application, THEN fill out the [AWRR_NewUserRequestForm.xlsx](#) and email it to [REDACTED]
- For general support for using ArcGIS Online and the Collector Application, contact [REDACTED].

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- When wood management is needed, the user must make edits to the tree point or non-EVM wood management data point, vegetation project polygon (polygon), AND EVM parcel records in Collector.

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PROCEDURE STEPS

1 Determination of Eligibility for The Wood Management Program

NOTE

The final determination of whether or not work can be performed falls upon the WMC who is performing the work, taking into account the capability of the equipment used and the site conditions (slope, obstacles, riparian area, etc.).

1.1 The PI must perform the following tasks to evaluate whether the potential work meets the qualifications required for the wood management program:

1. Determine whether potential wood management work will require specialized equipment. The following wood management work types require specialized equipment:

- Remove
- Relocate/Move
- Chip on site/Broadcast

2. Considering the capability of the equipment used and the site conditions (slope, obstacles, riparian area, etc.), EVALUATE whether the wood is accessible.

1.1 (continued)

3. IF unsure whether the wood is accessible,

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THEN CONSULT with the WMC to make the determination based on issues including, but not limited to the following examples:

- Bridge weight limits
 - Slope restrictions
 - WLPZ boundaries
4. IF not accessible to equipment,
- THEN only two options are available:
- (1) Cut (wood cut to dimensions specified by the customer)
 - (2) Leave wood as found.
5. IF accessible to equipment, DISCUSS the applicable work type options with the property owner.
6. USE this information to fill out the Vegetation Management Request for Wood Management and Removal Form (RWMF).

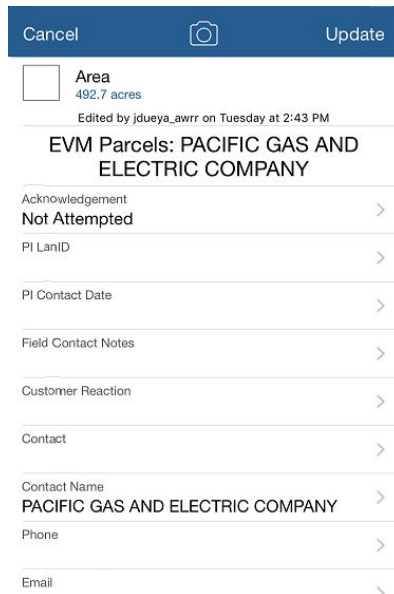
2 EVM Wood Management Data Entry

2.1 The PI must perform the following steps to edit the tree point:

1. Make the following entries in Collector:
 - a. CHANGE the Wood Management field of the EVM tree data point to **YES**.
 - b. From the **WM Work Type** drop-down menu within the tree point, SELECT the appropriate work type listed below:
 - **Remove**
 - **Relocate/Move**
 - **Chip on site/Broadcast**
 - **Cut**

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- 2.2 IF any wood management is required for a tree point within the polygon,
 THEN EDIT the polygon by SELECTING **Yes** for the Wood Management field.
- 2.3 Perform the following steps to edit the EVM parcel:
 1. IF any WM is required for a tree point on a parcel,
 THEN ADD the RWMF number (**RWMF #**) in the required field in the parcel record.
 2. PERFORM the following steps to UPLOAD a picture of the signed RWMF to the parcel record:
 - a. BEGIN EDITING the EVM parcel where wood management is taking place.
 - b. On the top toolbar, SELECT the **camera** icon.



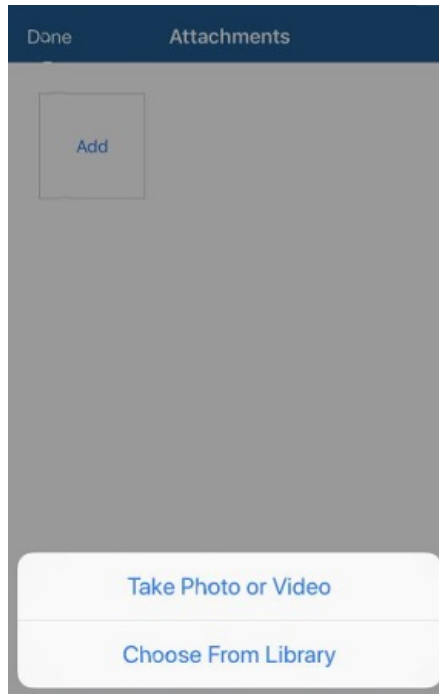
- a.
 - b.
 - c. SELECT **Add**.



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2.3 (continued)

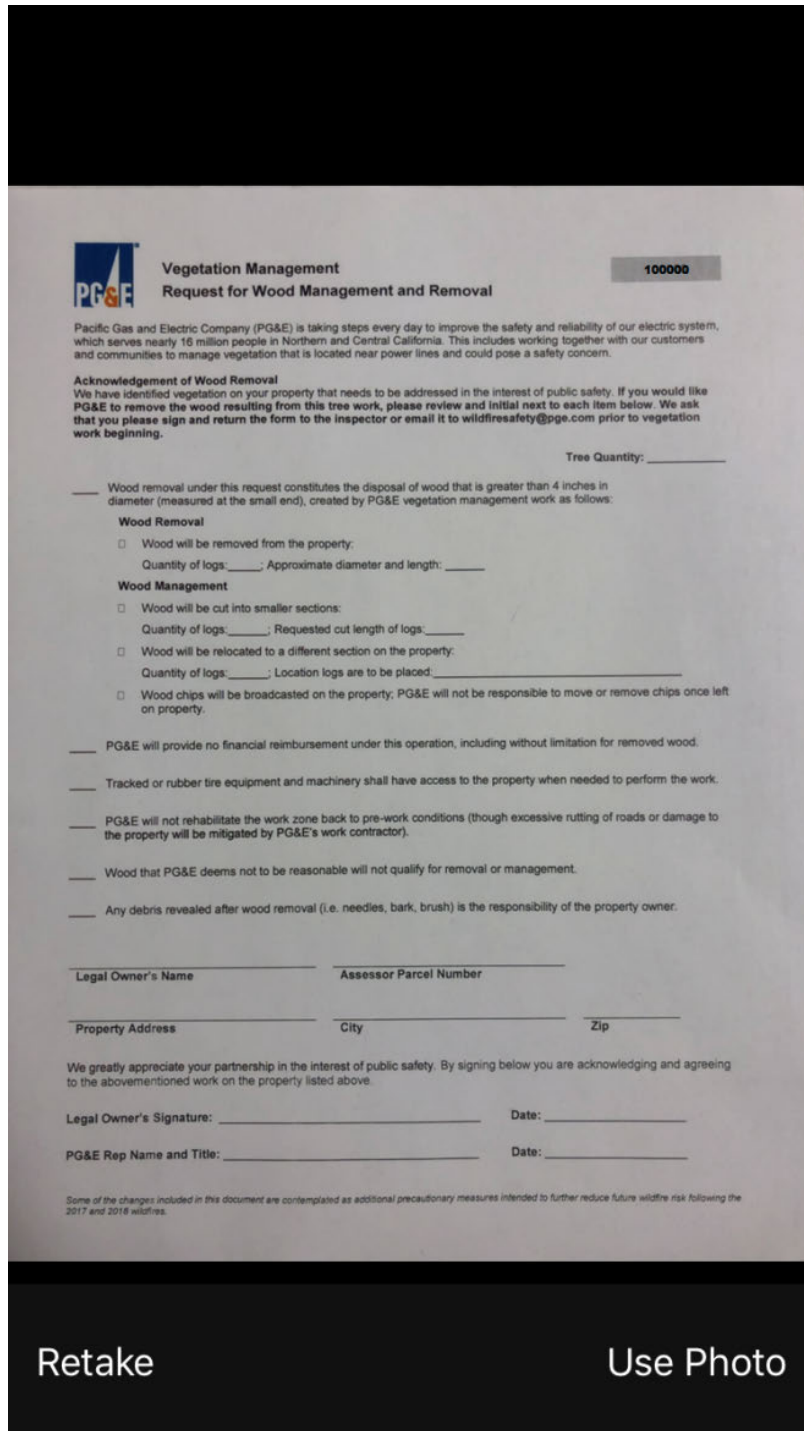
d. **SELECT Take Photo or Video.**



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2.3 (continued)

- e. TAKE a photograph of the RWMF, being sure to CAPTURE the entire form, including the form number in the gray box on the upper right.



PG&E Vegetation Management
 Request for Wood Management and Removal 100000

Pacific Gas and Electric Company (PG&E) is taking steps every day to improve the safety and reliability of our electric system, which serves nearly 16 million people in Northern and Central California. This includes working together with our customers and communities to manage vegetation that is located near power lines and could pose a safety concern.

Acknowledgement of Wood Removal
 We have identified vegetation on your property that needs to be addressed in the interest of public safety. If you would like PG&E to remove the wood resulting from this tree work, please review and initial next to each item below. We ask that you please sign and return the form to the inspector or email it to wildfiresafety@pge.com prior to vegetation work beginning.

Tree Quantity: _____

____ Wood removal under this request constitutes the disposal of wood that is greater than 4 inches in diameter (measured at the small end), created by PG&E vegetation management work as follows:

Wood Removal

Wood will be removed from the property.
 Quantity of logs: _____; Approximate diameter and length: _____

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Wood will be cut into smaller sections:
 Quantity of logs: _____; Requested cut length of logs: _____

Wood will be relocated to a different section on the property.
 Quantity of logs: _____; Location logs are to be placed: _____

Wood chips will be broadcasted on the property; PG&E will not be responsible to move or remove chips once left on property.

____ PG&E will provide no financial reimbursement under this operation, including without limitation for removed wood.

____ Tracked or rubber tire equipment and machinery shall have access to the property when needed to perform the work.

____ PG&E will not rehabilitate the work zone back to pre-work conditions (though excessive rutting of roads or damage to the property will be mitigated by PG&E's work contractor).

____ Wood that PG&E deems not to be reasonable will not qualify for removal or management.

____ Any debris revealed after wood removal (i.e. needles, bark, brush) is the responsibility of the property owner.

____ Legal Owner's Name _____ Assessor Parcel Number _____

____ Property Address _____ City _____ Zip _____

We greatly appreciate your partnership in the interest of public safety. By signing below you are acknowledging and agreeing to the abovementioned work on the property listed above.

Legal Owner's Signature: _____ Date: _____

PG&E Rep Name and Title: _____ Date: _____

Some of the changes included in this document are contemplated as additional precautionary measures intended to further reduce future wildfire risk following the 2017 and 2018 wildfires.

Retake **Use Photo**

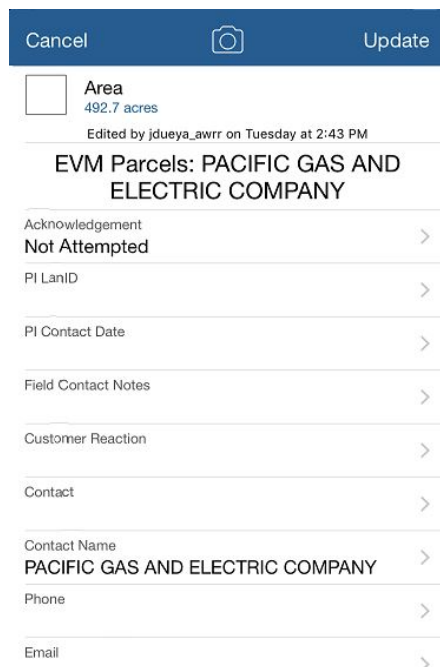
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2.3 (continued)

- f. Assess the **legibility** of the photo AND perform the steps below:
 - (1) If illegible, **SELECT Retake** to take and redisplay the photograph as many times as necessary until satisfied with the legibility.
 - (2) Once satisfied with the legibility of the photograph, **SELECT Use Photo**.

Collector returns to the parcel display screen, as displayed below.

- g. On the top toolbar, **SELECT Update**.



Collector attaches the RWMF to the parcel record and returns to the map display screen.

- 2.4 Mark trees in accordance with [Attachment 1, "Wood Management Marking Guidelines."](#)
- 2.5 Move on to the next data point or exit the procedure.

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3 Non-EVM Wood Management Data Entry

NOTE

The purpose of the non-EVM WM data points is to collect information for additional wood management resulting from past PG&E vegetation work and requested by the customer in exchange for allowing the current EVM tree work to take place.

Additionally, these data points allow collection of information for trees that meet the current qualifications for the CEMA Wood Management Program within Amador, Calaveras, El Dorado, Fresno, Kern, Madera, Mariposa, Nevada, Placer, and Tuolumne Counties.

- 3.1 To VERIFY that the wood or brush/slash is a result of PG&E VM activities, CHECK PG&E VM records for past routine, CEMA, reliability, or transmission work on the property.
- 3.2 IF the wood or brush/slash is not a result of VM activities,
THEN EXIT this procedure;

OTHERWISE, CONTINUE with Step 3.3 below.
- 3.3 Perform the steps in [Section 1 on Page 2, "Determination of Eligibility for The Wood Management Program,"](#) to evaluate whether the potential work meets the qualifications required for the wood management program.
- 3.4 Determine the quantity of trees that require wood management as follows:
 1. Perform the following tasks for logs that are decked to determine the quantity of trees:
 - a. Determine the average length of the logs in the deck.
 - b. Determine the height of an average tree of similar species and diameter in the area.
 - c. Calculate the average number of logs per tree: Divide the height of an average tree (b) by the average log length in the deck (a).
 - d. Determine the number of logs in the deck.
 - e. Calculate the quantity of trees: Divide the number of logs in the deck (d) by the average number of logs per tree (c).

Example: Assuming the following numbers and applying the formula,

(a) Average length of logs in deck: 4 ft.

(b) Average tree height: 16 ft.

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3.4 (continued)

(c) Average number of logs per tree: 4

(d) Number of logs in the deck: 32

Tree quantity: $(b/a)/d = 8$

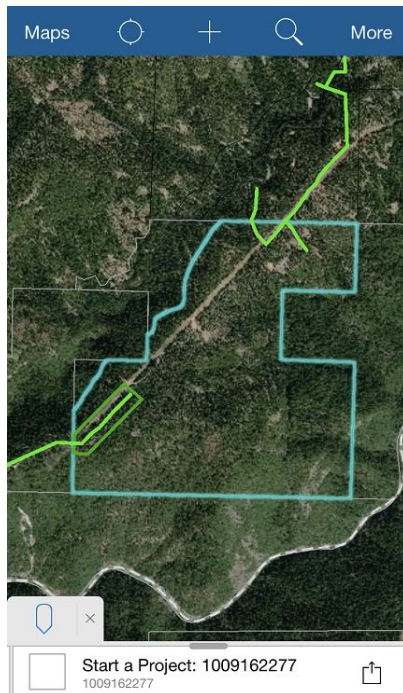
Summary: If there are approximately 4 logs per tree, and there are 32 logs in the deck, then the tree quantity is 8.

2. One unit of brush/slash measures as 6.5 ft. x 6.5 ft. x 6.5 ft. (or 275 cu. ft.)

3. An individual tree equals 1 unit.

3.5 Perform the following steps to create a non-EVM WM data point in Collector:

1. SELECT **Start a Project** at the bottom of the map page as shown below.

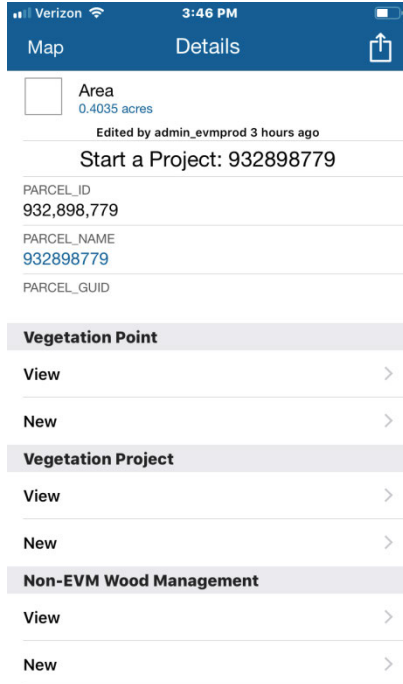


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3.5 (continued)

Collector displays the Details screen shown below.

2. SELECT Non-EVM Wood Management **View** or **New**.

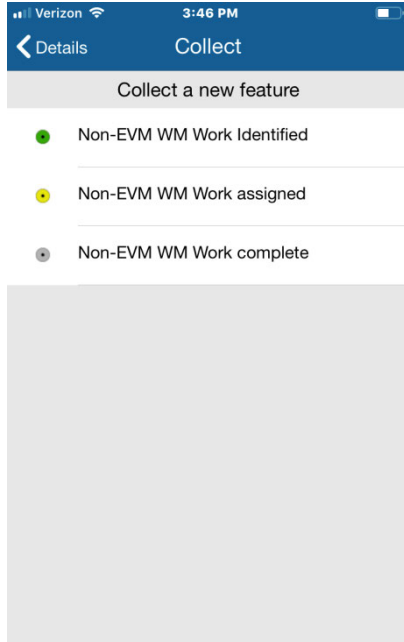


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3.5 (continued)

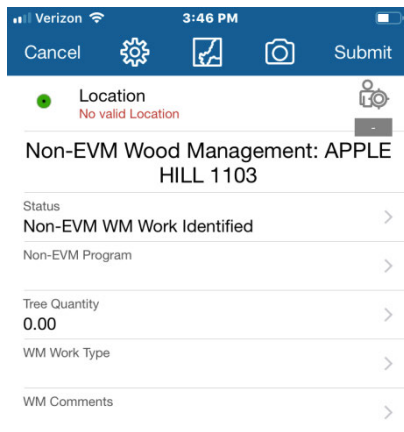
For a new project, Collector displays the Collect screen shown below.

3. SELECT the **Non-EVM Wood Management Work Identified** feature.



Collector displays the Non-EVM WM Work Identified screen shown below.

4. SELECT **Non-EVM Program**.

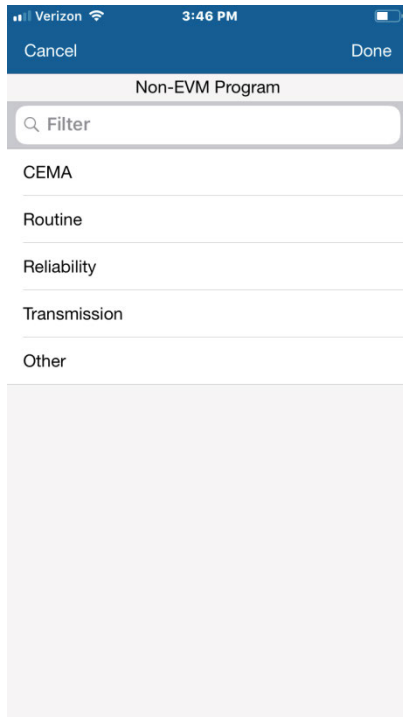


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3.5 (continued)

5. On the **Non-EVM Program** drop-down menu, **SELECT** one of the following options:

- **CEMA**
- **Routine**
- **Reliability**
- **Transmission**
- **Other**



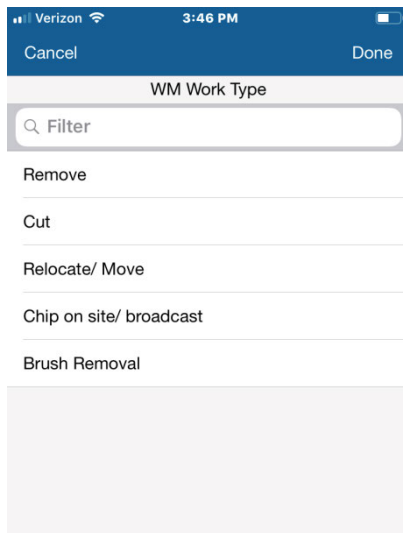
6. On the Non-EVM WM Work Identified screen, **SELECT WM Work Type**.

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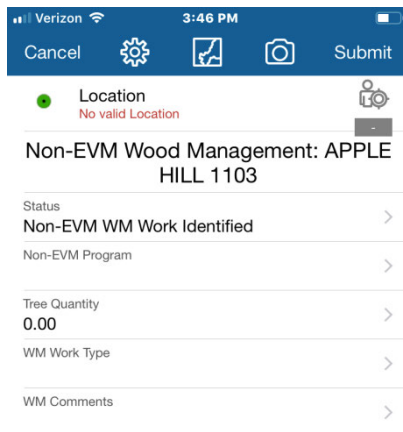
3.5 (continued)

7. On the **WM Work Type** drop-down menu, **SELECT** the appropriate work type listed below:

- **Remove**
- **Cut**
- **Relocate/Move**
- **Chip on site/Broadcast**
- **Brush Removal**



8. On the Non-EVM WM Work Identified screen, under **Tree Quantity**, **ENTER** the quantity of trees or brush/slash units.



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9. IF multiple work types are requested for non-EVM wood or brush/slash on the parcel, THEN repeat steps 2 through 8 above.

3.6 PERFORM [Step 2.3.2 on Page 4](#) to UPLOAD a picture of the signed RWMF to the parcel record.

3.7 Mark trees in accordance with [Attachment 1, "Wood Management Marking Guidelines."](#)

3.8 Move on to the next data point or exit the procedure.

4 Issuing Work Using ArcGIS Online for Regional Wood Management Leads (RWMLs)

4.1 The RWML must perform the following steps before issuing work to the WMC:

1. Review pending work for completeness and accuracy for both EVM and non-EVM.
2. Follow up with the PI team to address any discrepancies and ensure that they are resolved.
3. For non-EVM data points, SEARCH for those where **Status = Work Identified**.
4. IF **Status = Work Identified**,
THEN EDIT **Status** to **In Progress**.

4.2 ISSUE work to the WMC for EVM tree points and non-EVM data points with the following criteria:

- For EVM tree points: **Status = Tree Work Complete AND Wood Management = Yes**.
- For non-EVM data points: **Status = In Progress**.

5 Wood Management in ArcGIS Online or Collector for WMCs

5.1 The WMC must perform the following steps for EVM tree points and non-EVM data points:

1. CONFIRM that the signed RWMF is attached to the corresponding parcel record for each assigned parcel requiring wood management.
2. REFER to the **Work Type** selection AND REFERENCE marked trees in the field to ENSURE that the correct work type from the following list is performed (see [Attachment 1, "Wood Management Marking Guidelines"](#)).
 - **Remove** (wood is removed from the property)
 - **Cut** (wood is cut to dimensions specified by the customer)
 - **Relocate/Move** (wood is moved to a location on the property specified by the customer)

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- **Chip on site/Broadcast** (wood is chipped and broadcast on the property)
- **Brush Removal** (only available for non-EVM work)

5.1 (continued)

3. Perform the prescribed work.
4. When wood management is complete, UPDATE the status of **EVM Tree Points** and **Non-EVM Data Points** in Collector to **Wood Management Complete**.

5.2 Once all points requiring wood management are completed within the polygon, the wood management contractor must UPDATE the status of the polygon in Collector to **Wood Management Complete**.

END of Instructions

DEFINITIONS

Brush/slash: Wood and debris less than 4" in diameter resulting from VM tree work.

Brush/slash Unit: A volume of brush measuring 6.5 feet (ft.) by 6.5 ft. by 6.5 ft. equals 1 unit.

Catastrophic Event Memorandum Agreement (CEMA) Program: A PG&E program in Amador, Calaveras, El Dorado, Fresno, Kern, Madera, Mariposa, Nevada, Placer, and Tuolumne Counties, that addressed dead and/or dying trees with the potential to strike overhead conductors. Sometimes referred to as "Second Patrol."

EVM Wood: Wood greater than 4" in diameter resulting from PG&E EVM work.

Non EVM-Related Wood: Previously downed wood greater than 4" in diameter resulting from other PG&E VM work (routine, CEMA, reliability, transmission, and AWRR).

Non-Qualifying Wood: Wood that is not a result of PG&E VM activities (private work, Caltrans, local Fire Safe Council projects, etc.).

Qualifying Wood:

- Wood that is a result of PG&E VM operations.
- Wood that is reasonably accessible by equipment/machinery.
- Wood that is greater than 4" in diameter.

Reasonable Access: Wood that is accessible to equipment, taking into account the capability of the equipment used and the site conditions (slope, obstacles, riparian area, etc.).

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Regional Wood Management Lead (RWML): Specialist in each region who provides pending work data to wood management contractors.

Request for Wood Management Form (RWMF): The form that must be signed by the property owner authorizing the removal of wood from private property.

Riparian Area: The area within 25 feet horizontal distance of the Ordinary High Water Mark, or the top of the bank if the OHWM is not easily identified, of streams, rivers, flood plains, lakes, estuaries, marshes, tidelands, lagoons, and wetlands, including ephemeral, seasonal, and perennial waters. It also includes ditches which are part of a natural or re-routed stream, irrigation or drainage ditches with riparian vegetation and unobstructed connection to a natural watercourse, and ponds which can support native fish or amphibians.

Superuser: Specialist in the ArcGIS Online and Collector applications.

Wood: Wood resulting from a project that is not chipped by the felling contractor (usually greater than 4" in diameter).

Wood Management: The PG&E program for removing qualifying wood resulting from PG&E utility vegetation clearance work.

IMPLEMENTATION RESPONSIBILITIES

Wood management leadership must communicate roll-out expectations to superuser group who must then roll out to the field users using the Guidance Tailboard as a resource.

GOVERNING DOCUMENT

NA

COMPLIANCE REQUIREMENT / REGULATORY COMMITMENT

NA

REFERENCE DOCUMENTS

Developmental References:

NA

Supplemental References:

[Utility Bulletin TD-7102B-020, "Enhanced Vegetation Management Scope"](#)

APPENDICES

NA

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ATTACHMENTS

[Attachment 1, "Wood Management Marking Guidelines"](#)

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DOCUMENT REVISION

Utility Bulletin TD-7102B-008, "Expanded Wood Management Marking Guidelines"

Utility Bulletin TD-7102B-009, "Expanded Wood Management Data Entry"

DOCUMENT APPROVER

██████████ Senior Manager

DOCUMENT OWNER

██████████ Vegetation Program Manager

DOCUMENT CONTACT

██████████ Vegetation Program Manager

██████████ Contract Forester

REVISION NOTES

Where?	What Changed?
NA	This is a new utility procedure.