



Document Title:
Aluminum Dead End Wedge

Document Type: **Specification** Engineering Type: **Material Specification** Document No.: **4350.286**

Department
Distribution

Version:
02

Effective Date:
Jul 25, 2024

Shared document with: N/A

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Related/Referenced Documents

N/A

Version	Date	Revision Comments
1	Nov. 14, 2022	Initial release
2	Jul. 25, 2024	General format modifications and Table of Compliance (TOC) added.



Item Version History

Warehouse Catalog #	Asset Suite #	Version	Date
002-81948	81948	2	7/25/2024
002-81949	81949	2	7/25/2024
002-81950	81950	2	7/25/2024
002-81951	81951	2	7/25/2024



1. Introduction

This is a general specification that covers the minimum requirements for an aluminum dead-end wedge to be used in the distribution system in Puerto Rico. Further information will be provided by LUMA Energy at the time of order placement and will provide information on site specific conditions, quantity, and other requirements. This document includes the general electrical and mechanical characteristics of the equipment/material.

2. Special Requirements

Samples shall be furnished as requested by LUMA Energy. Vendors that have supplied this equipment/material to LUMA on previous orders will not have to furnish samples at bid opening. The equipment/material will be received at the LUMA's general warehouse (011) at Palo Seco, Puerto Rico. Shipping will include transportation and unloading at the indicated warehouse.

3. Literature

Descriptive and technical literature must be supplied by the vendor at time of bidding. This literature may include, but is not limited to details of material, drawings, documented testing, and instructions for use and installation. Failure to submit documents on time will cause bidder disqualification. If required by LUMA, final drawings shall be submitted by the vendor before the manufacturing and shipping process for approval.

4. Compatible with

For compatible manufacturers and models, see Table 2. These models are examples of the equipment/materials described in this document and do not represent a preference. LUMA will evaluate equally any models not listed here during any acquisition event.

5. Markings

- 5.1. Containers shall be marked outside with LUMA Energy's purchase order and item number.
- 5.2. Packaging labels and tags shall be waterproof.

6. Packaging

All equipment/material shall be packaged and marked in such a way as to facilitate handling and protection from damage and that the receiving warehouse can readily identify it and send it, in one complete unit, to a field location without opening crates or boxes to sort items and/or parts.

7. Number Per Package (Logistics)

For package see Section 12 Table 2, or as requested by LUMA.

8. Acceptance Criteria

- 8.1. Test required: certified by external laboratories.
- 8.2. Product shall be manufactured in accordance with the latest issue below (section 8.3). When conflicts occur between purchaser's specifications and the latest issue below, the purchaser's specification shall prevail.
- 8.3. Latest applicable codes, standards, and other regulations: Aluminum Association.
 - a. ANSI Z535.4: Product Safety Signs And Labels
- 8.4. If any other standard different from the ones indicated in this document are used, the supplier must provide information showing compatibility with the required ones.

9. Description

- 9.1. Aluminum deadend wedge used for attaching the bare neutral conductor of service entrance installations.
- 9.2. Shall be compatible with ACSR and aluminum-based conductors.
- 9.3. The wedge material shall be aluminum alloy. It shall have an anti-corrosion treatment.
- 9.4. Shall be manufactured with either a rigid bail or a flexible bail, as requested by the LUMA during an acquisition event (see Table 1).
- 9.5. For rigid bail:
 - a. Suitable for latching neutral conductor to eye hooks and insulators.
 - b. Shall be stainless steel.
 - c. The wedge shall have a locking mechanism securing the latch on the rigid bail.
- 9.6. For flexible bail:
 - a. Suitable for installation with hooks and small eyes.
 - b. Shall be furnished as a covered stainless steel wire braid.
- 9.7. Shall be furnished with two labels: one for warning (shall always be orange as per ANSI Z535.4) and one to indicate size (see Table 1 for specific color).
- 9.8. Shall meet the cable range and strength requirements as shown in Table 1.

9.9. Table 1: Wedge Characteristics and Warehouse Information

Warehouse number	Asset Suite	ACSR Cable Range (Min. – Max.)	Bail type	Minimum Mechanical Strength	Size Label Color
002-81948	81948	#6-#2 AWG (0.160"–0.332")	Rigid 2.5" diam.	800 lbf (3.56 kN)	Orange
002-81949	81949	#6-#2 AWG (0.160" – 0.332")	Flexible	800 lbf (3.56 kN)	Orange
002-81950	81950	#4 – 1/0 AWG (0.248" – 0.414")	Rigid 2.5" diam.	900 lbf (4.00 kN)	Blue
002-81951	81951	#4 – 1/0 AWG (0.248" – 0.414")	Flexible	900 lbf (4.00 kN)	Blue

10. Inspection

The acceptance of any equipment/material shall in no way relieve the vendor from his responsibility to meet all the requirements of this specification, and it would not prevent subsequent rejection if such equipment/materials were found later to be defective.

11. Proposal Information

11.1. Submitted proposals must include:

- a. Technical information, tests, and drawings.
- b. Table of Compliance completed by the bidder with reference (see Appendix 1).

12. Table 2: Warehouse and Asset Suite Identification Number

Warehouse Catalog #	Asset Suite #	Compatible Manufacturer	Compatible Model	Quantity per Carton
002-81948	81948	Hubbell	SW7195LBI	100
002-81949	81949		SW7195FLI	100
002-81950	81950		SW7187LBI	50
002-81951	81951		SW7187FLI	25

— End of Specification —



Appendix

Appendix 1: Table of Compliance

Line	Criteria	Description	Pass/Fail (P / F)	Comments
1	Specification	The Proponent complies with the corresponding specification document (4350.286).		
2	Industry Standards	The Proponent complies with the industry standards established in the specification document. (ANSI/ASTM)		
3	Supporting Documents	Tech. info., tests, and drawings provided.		
3	Material	Aluminum alloy. Includes anti-corrosive treatment.		
4	Minimum Mechanical Strength	<ul style="list-style-type: none"> • #6 – #2 AWG: 800 lbf • #4 – 1/0 AWG: 900 lbf 		
5	Cable range	<ul style="list-style-type: none"> • #6 – #2 AWG, or • #4 – 1/0 AWG 		
6	Labels	<ul style="list-style-type: none"> • One for warning • One for cable size 		
7	Rigid Bail	<ul style="list-style-type: none"> • Suitable for latching neutral conductor to eye hooks and insulators. • Shall be stainless steel. • The wedge shall have a locking mechanism securing the latch on the rigid bail 		
8	Flexible Bail	<ul style="list-style-type: none"> • Suitable for installation with hooks and small eyes. • Shall be furnished as a covered stainless steel wire braid. 		

NOTE: This table is only a checklist for reference. The compliance shall be with the complete document. Marking a PASS in the table won't be accepted as a compliance without the technical information required to certify it.











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Final Audit Report

2024-07-25

Created:	2024-07-25
By:	Rodolfo Flores (rodolfo.floresortiz@lumapr.com)
Status:	Signed
Transaction ID:	CBJCHBCAABAAH-MIF39zBhBhaoHsz8XvaYN_W_HpqQ-G

"4350.286 Aluminum Dead End Wedge (07-25-2024)" History

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2024-07-25 - 7:15:25 PM GMT
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2024-07-25 - 7:15:30 PM GMT
-  Document e-signed by Rodolfo Flores (rodolfo.floresortiz@lumapr.com)
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Signature Date: 2024-07-25 - 7:15:55 PM GMT - Time Source: server
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2024-07-25 - 7:15:56 PM GMT
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2024-07-25 - 7:20:35 PM GMT
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Signature Date: 2024-07-25 - 7:25:18 PM GMT - Time Source: server
-  Document emailed to Ricardo Castro (ricardo.castro@lumapr.com) for signature
2024-07-25 - 7:25:20 PM GMT
-  Email viewed by Ricardo Castro (ricardo.castro@lumapr.com)
2024-07-25 - 9:02:43 PM GMT
-  Document e-signed by Ricardo Castro (ricardo.castro@lumapr.com)
Signature Date: 2024-07-25 - 9:03:09 PM GMT - Time Source: server
-  Agreement completed.
2024-07-25 - 9:03:09 PM GMT