



TF 255 115 kV Structure—Shielded, Single-Circuit, Deadend Tap

Scope

This structure is used for a three-way dead end when shielding is required.

Line Tap Angle: 65° to 90°.

Standard References

- TD 001 Poles, Wood — General Information
- TD 100 Conductor—General Information
- TD 201 Shield and Guy Wire—General Information
- TD 300 Grounding—General Information
- TD 500 Tension Hardware—General Information
- TD 600 Guys and Anchors—General Information
- TD 800 Insulators—General Information
- TD 900 Bolts, Nuts, and Washers—General Information

RCMS Code: CU

			TF 255
Conductor - Through Circuit			
	Code		•
397.5 ACSR "Ibis"	C		
795 ACSR "Drake"	D		
954 ACSR "Cardinal"	E		
1272 ACSR "Bittern"	F		
1557.4 ACSR "Potomac"	I		
795 AAC "Arbutus"	G		
1272 AAC "Narcissus"	H		
None	Z		
Conductor - Tap Circuit			
	Code		•
397.5 ACSR "Ibis"	C		
795 ACSR "Drake"	D		
954 ACSR "Cardinal"	E		
1272 ACSR "Bittern"	F		
1557.4 ACSR "Potomac"	I		
795 AAC "Arbutus"	G		
1272 AAC "Narcissus"	H		
None	Z		
Shield Wire			
	Code		•
3/8 EHS	A		
1/2 EHS	B		
7 #8 AW	C		
7 #6 AW	D		
3/8" Equiv. OPGW	M		
1/2" Equiv. OPGW	N		
None	Z		
Insulation			
	Code		•
Porcelain	A		
Polymer	B		
Pole Class			
	Species	Code	•
1	Douglas fir	C	
H1	Douglas fir	D	
H2	Douglas fir	E	
H3	Douglas fir	K	
H4	Douglas fir	L	
H5	Douglas fir	M	
H6	Douglas fir	N	
1	Western red cedar	H	
H1	Western red cedar	I	
H2	Western red cedar	J	

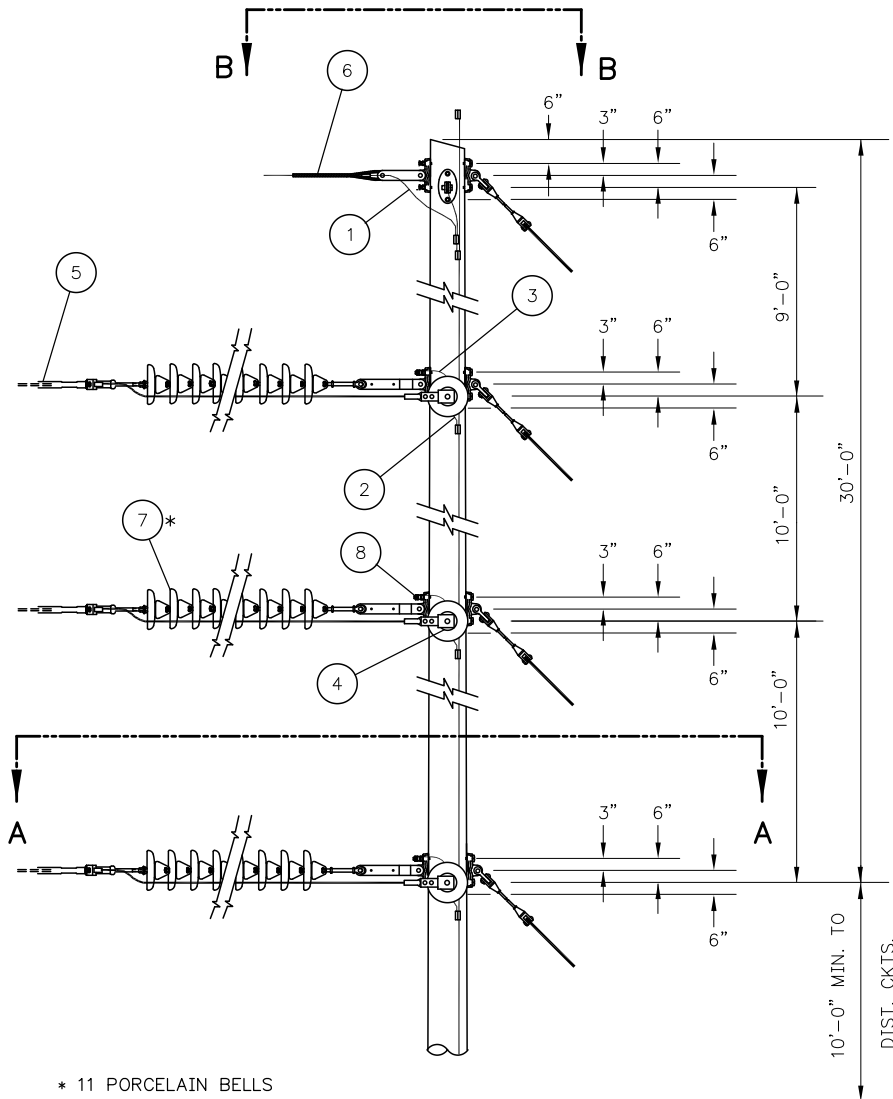
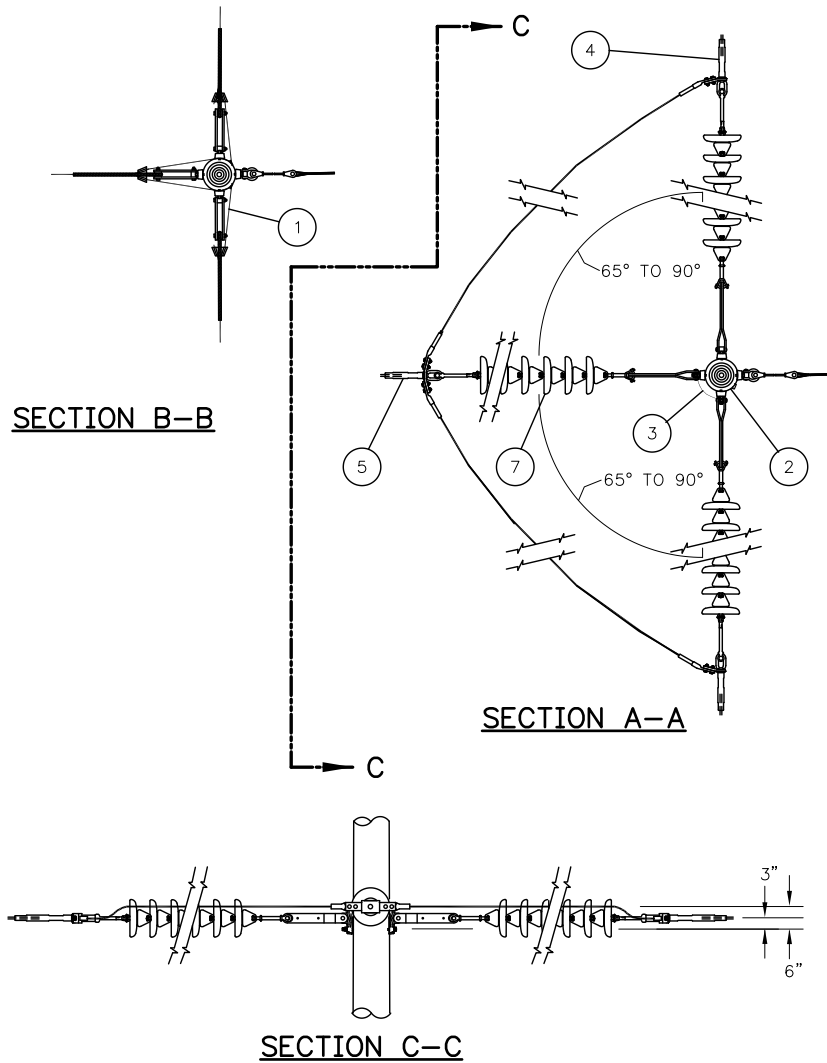


Figure I—Structure Layout



avian-safe design

Figure 2—Structure Layout

Table 1—Components

Item	Qty.	Standard	Description
1	3	TD 325_	Grounding Assembly, Shield Wire-to-Pole Ground
2	3	TD 322E	Grounding Assembly, Hardware-to-Structure Ground
3	3	TD 321E Z	Grounding Assembly, Hardware-to-Hardware
4	6	TD 520__	Tension Assembly, Conductor
5	3	TD 521__	Tension Assembly, Conductor, Double Jumper
6	3	TD 525_A	Tension Assembly, Shield Wire, Guy Grip
7	9	TD 826F_A	Insulator Assembly, Dead-End, with 15" Link
8	16	TD 928_D	Bolt Assembly, Machine, 1"

Table 2—Additional Material to Be Specified to Complete the Structure

Item	Qty.	Standard	Description
A	1	TD 020__A	Wood Pole Assembly
B	1	TD 622, TD 623, TD 624, TD 625, TD 626, TD 627	Guy Assembly
C	1	TD 630_A_	Anchor Assembly

Notes

1. Compression fittings are specified for the through and tap circuit conductors.
2. If the tap conductor selected is smaller than the through conductor, the size of the smaller conductor dead end may restrict the maximum current that can be carried through it by the larger through conductor jumpers. Contact Transmission Engineering for assistance.
3. All hardware is to be bonded when it is separated by less than eight inches. Bond wire shall loop around the bolt.
4. Install spring washers with loop end up where possible.
5. All pole attachment hardware shall be bonded to the pole grounding assembly.
6. Guy assemblies shown in item B of Table 2 are all available options. Make specific selections and quantities based on structural needs.
7. The pole class option code selects the bolt length. The larger the pole class, the longer the bolts.