

PUBLIC UTILITIES COMMISSION

505 VAN NESS AVENUE
SAN FRANCISCO, CA 94102-3298



July 18, 2022

EA2022-973

Rainie Torrance
Assistant Utilities Manager
Needles Public Utilities Authority
817 Third Street, Needles, CA 92363

Subject: Audit of Needles Public Utilities Authority Electric Department

Ms. Torrance:

On behalf of the Electric Safety and Reliability Branch of the California Public Utilities Commission (CPUC), Kyle King and Joceline Pereira of my staff conducted an electric distribution audit of Needles Public Utilities Authority Electric Department from May 23, 2022, to May 27, 2022. The audit included a review of Needles Public Utilities Authority Electric Department records and field inspections of Needles Public Utilities Authority Electric Department electric facilities.

During the audit, my staff identified violations of one or more General Orders (GOs). A copy of the audit findings itemizing the violations is enclosed. Please advise me no later than August 18, 2022, by electronic or hard copy, of all corrective measures taken by Needles Public Utilities Authority Electric Department to remedy and prevent such violations.

If you have any questions concerning this audit, you can contact Kyle King at (213)-222-3260 or Kyle.King@cpuc.ca.gov.

Sincerely,

A handwritten signature in blue ink that reads "Fadi Daye".

Fadi Daye, P.E.
Program and Project Supervisor
Electric Safety and Reliability Branch
Safety and Enforcement Division
California Public Utilities Commission

Enclosures: Audit Findings

Cc: Lee Palmer, Director, Safety and Enforcement Division, CPUC
Nika Kjensli, Program Manager, ESRB, SED, CPUC
Kyle King, Utilities Engineer, ESRB, SED, CPUC
Joceline Pereira, Utilities Engineer, ESRB, SED, CPUC

AUDIT FINDINGS

I. Records Review

During the audit, my staff reviewed the following records:

- Overhead and underground detailed inspections records.
- Completed and pending corrective action work orders.
- Safety hazard notifications.
- Preliminary Basic Work Plan
- Needles Public Utilities Authority Electric Department documented inspection program.
- Pole 1689N Transition
- Electric Distribution Maps
- Pole loading calculations

II. Field Inspections

My staff inspected the following structures during the field inspection portion of the audit:

	Structure No.	Structure Type	Location
1	4979N	Utility Pole	Needles
2	5292N	Utility Pole	Needles
3	3308N	Utility Pole	Needles
4	3309N	Utility Pole	Needles
5	3933N	Utility Pole	Needles
6	3932N	Utility Pole	Needles
7	3791N	Utility Pole	Needles
8	3754N	Utility Pole	Needles
9	4171N	Utility Pole	Needles
10	4168N	Utility Pole	Needles
11	1110N	Utility Pole	Needles
12	4163N	Utility Pole	Needles
13	1109N	Utility Pole	Needles
14	4087N	Utility Pole	Needles
15	4084N	Utility Pole	Needles
16	1356N	Utility Pole	Needles
17	3701N	Utility Pole	Needles
18	3702N	Utility Pole	Needles
19	3705N	Utility Pole	Needles
20	3709N	Utility Pole	Needles
21	1116N	Utility Pole	Needles
22	3708N	Utility Pole	Needles
23	3319N	Utility Pole	Needles
24	3745N	Utility Pole	Needles
25	3746N	Utility Pole	Needles
26	3104N	Utility Pole	Needles
27	3793N	Utility Pole	Needles
28	3772N	Utility Pole	Needles
29	1346N	Utility Pole	Needles
30	3386N	Utility Pole	Needles
31	3367N	Utility Pole	Needles
32	4640N	Utility Pole	Needles
33	1172N	Utility Pole	Needles
34	1060N	Utility Pole	Needles
35	5280N	Utility Pole	Needles
36	1686N	Utility Pole	Needles
37	2852N	Utility Pole	Needles

38	4040N	Utility Pole	Needles
	Structure No.	Structure Type	Location
39	1194N	Utility Pole	Needles
40	4528N	Utility Pole	Needles
41	4535N	Utility Pole	Needles
42	1195N	Utility Pole	Needles
43	1196N	Utility Pole	Needles
44	3514N	Utility Pole	Needles
45	3508N	Utility Pole	Needles
46	3510N	Utility Pole	Needles
47	3288N	Utility Pole	Needles
48	1192N	Utility Pole	Needles
49	3518N	Utility Pole	Needles
50	1579N	Utility Pole	Needles
51	3519N	Utility Pole	Needles
52	3286N	Utility Pole	Needles
53	4055N	Utility Pole	Needles
54	4082N	Utility Pole	Needles
55	4061N	Utility Pole	Needles
56	1193N	Utility Pole	Needles
57	2979N	Utility Pole	Needles
58	1191N	Utility Pole	Needles
59	1570N	Utility Pole	Needles
60	4616N	Utility Pole	Needles
61	4816N	Utility Pole	Needles
62	1381N	Utility Pole	Needles
63	4698N	Utility Pole	Needles
64	4697N	Utility Pole	Needles
65	4622N	Utility Pole	Needles
66	4651N	Utility Pole	Needles
67	4611N	Utility Pole	Needles
68	1375N	Utility Pole	Needles
69	4601N	Utility Pole	Needles
70	1382N	Utility Pole	Needles
71	4617N	Utility Pole	Needles
72	4621N	Utility Pole	Needles
73	4684N	Utility Pole	Needles
74	4619N	Utility Pole	Needles
75	4682N	Utility Pole	Needles
76	4659N	Utility Pole	Needles
77	1380N	Utility Pole	Needles

78	4614N	Utility Pole	Needles
	Structure No.	Structure Type	Location
79	4602N	Utility Pole	Needles
80	4515N	Utility Pole	Needles
81	1052N	Utility Pole	Needles
82	1053N	Utility Pole	Needles
83	1051N	Utility Pole	Needles
84	1050N	Utility Pole	Needles
85	1049N	Utility Pole	Needles
86	3908N	Utility Pole	Needles
87	3262N	Utility Pole	Needles
88	1904N	Utility Pole	Needles
89	1371N	Utility Pole	Needles
90	3919N	Utility Pole	Needles
91	3921N	Utility Pole	Needles
92	3937N	Utility Pole	Needles
93	1383N	Utility Pole	Needles
94	1376N	Utility Pole	Needles
95	3354N	Utility Pole	Needles
96	3338N	Utility Pole	Needles
97	4604N	Utility Pole	Needles
98	4554N	Utility Pole	Needles
99	4594N	Utility Pole	Needles
100	4608N	Utility Pole	Needles
101	4595N	Utility Pole	Needles
102	4606N	Utility Pole	Needles
103	4597N	Utility Pole	Needles
104	3349N	Utility Pole	Needles
105	4598N	Utility Pole	Needles
106	4668N	Utility Pole	Needles
107	4667N	Utility Pole	Needles
108	4637N	Utility Pole	Needles
109	4670N	Utility Pole	Needles
110	3343N	Utility Pole	Needles
111	4518N	Utility Pole	Needles
112	4519N	Utility Pole	Needles
113	4515N	Utility Pole	Needles
114	4612N	Utility Pole	Needles
115	4639N	Utility Pole	Needles
116	1620N	Utility Pole	Needles
117	1631N	Utility Pole	Needles

118	1528N	Utility Pole	Needles
	Structure No.	Structure Type	Location
119	4687	Pad-Mount Transformer	Needles
120	3748	Pad-Mount Transformer	Needles
121	3750	Pad-Mount Transformer	Needles
122	3749	Pad-Mount Transformer	Needles
123	4029	Pad-Mount Transformer	Needles
124	3862	Pad-Mount Transformer	Needles
125	4644	Pad-Mount Transformer	Needles
126	4571	Pad-Mount Transformer	Needles
127	4555	Pad-Mount Transformer	Needles
128	4570	Pad-Mount Transformer	Needles
129	4559	Pad-Mount Transformer	Needles
130	3869	Pad-Mount Transformer	Needles
131	4556	Pad-Mount Transformer	Needles
132	4558	Pad-Mount Transformer	Needles
133	7200	Pad-Mount Transformer	Needles
134	5003	Pad-Mount Transformer	Needles
135	4030	Pad-Mount Transformer	Needles
136	3864	Pad-Mount Transformer	Needles
137	3752	Pad-Mount Transformer	Needles
138	5129	Pad-Mount Transformer	Needles
139	5044	Pad-Mount Transformer	Needles
140	3341	Pad-Mount Transformer	Needles
141	5084	Pad-Mount Transformer	Needles
142	3742	Pad-Mount Transformer	Needles
143	4568	Pad-Mount Transformer	Needles
144	3745	Pad-Mount Transformer	Needles
145	4534	Pad-Mount Transformer	Needles
146	5081	Pad-Mount Transformer	Needles
147	S3739	Pad-Mount Switch	Needles
148	3720	Pad-Mount Transformer	Needles
149	4642	Pad-Mount Transformer	Needles
150	3680	Pad-Mount Transformer	Needles
151	3681	Pad-Mount Transformer	Needles
152	5077	Pad-Mount Transformer	Needles
153	5021	Pad-Mount Transformer	Needles
154	5050	Pad-Mount Transformer	Needles
155	5196	Pad-Mount Transformer	Needles
156	0624N	Utility Pole	Needles
157	4684N	Utility Pole	Needles

158	3708	Pad-Mount Transformer	Needles
	Structure No.	Structure Type	Location
159	3703	Pad-Mount Transformer	Needles

III. Field Inspection - Violations List

GO 95, Rule 51.6, Marking and Guarding, High Voltage Marking of Poles, states in part:

Poles which support line conductors of more than 750 volts shall be marked with high voltage signs. This marking shall consist of a single sign showing the words "HIGH VOLTAGE", or pair of signs showing the words "HIGH" and "VOLTAGE", not more than six (6) inches in height with letters not less than 3 inches in height. A pair of signs may be stacked to a height of no more than 12 inches. Such signs shall be of weather and corrosion-resisting material, solid or with letters cut out therefrom and clearly legible.

The high voltage signs supported on each of the following poles were either missing or damaged:

- 1116N
- 4979N
- 4171N
- 4640N
- 1194N
- 3286N
- 1381N
- 1375N
- 4614N
- 4595N
- 4518N
- 3745N
- 5292N
- 4163N
- 1172N
- 3514N
- 4082N
- 4698N
- 1382N
- 4602N
- 4606N
- 4515N
- 3746N
- 3308N
- 1109N
- 1060N
- 3510N
- 4061N
- 4697N
- 4617N
- 4515N
- 4598N
- 4612N
- 3104N
- 3309N
- 1356N
- 5280N
- 3288N
- 1193N
- 4622N
- 4682N
- 3354N
- 4668N
- 3772N
- 3933N
- 3701N
- 1686N
- 3518N
- 2979N
- 4651N
- 4659N
- 4594N
- 4637N
- 3386N
- 3791N
- 3709N
- 2852N
- 1579N
- 1191N
- 4611N
- 1380N
- 4608N
- 4670N

GO 95, Rule 54.6-B, Ground Wires, states in part:

That portion of the ground wires attached on the face or back of wood crossarms or on the surface of wood poles and structures shall be covered by a suitable protective covering (see Rule 22.8).

The ground moulding on each of the following poles were damaged:

- 4979N
- 3386N
- 3791N
- 5280N
- 3701N
- 3518N
- 3745N
- 4082N
- 3772N
- 2979N
- 1375N

GO 95, Rule 56.2, Overhead Guys, Anchor Guys and Span Wire Use, states in part:

Guys shall be attached to structures, as nearly as practicable, at the center of load. They shall be maintained taut and of such strength as to meet the safety factors of Rule 44.

The down guy wire supporting each of the following poles was loose:

- 5292N
- 3519N

GO 95, Rule 31.6, Abandoned Lines, states in part:

Lines or portions of lines permanently abandoned shall be removed by their owners so that such lines shall not become a public nuisance or a hazard to life or property. For the purposes of this rule, lines that are permanently abandoned shall be defined as those lines that are determined by their owner to have no foreseeable future use

Pole 4061N supported a transformer that had an abandoned conductor and was not properly removed.

GO 95, Rule 38, Table 2, Column C, Case 19 requires the radial separation between down guy wires and communications conductors to be 3 inches.

A down guy wire attached to Pole 4601N was touching a communications conductor.

GO 128, Rule 17.1, Design Construction and Maintenance, states in part:

Electrical supply and communication systems shall be designed, constructed, and maintained for their intended use, regard being given to the conditions under which they are to be operated, to enable the furnishing of safe, proper, and adequate service.

Padmounted transformers 4568 and 5129 had damaged external enclosures, which appears to have resulted from a vehicle striking the enclosures.