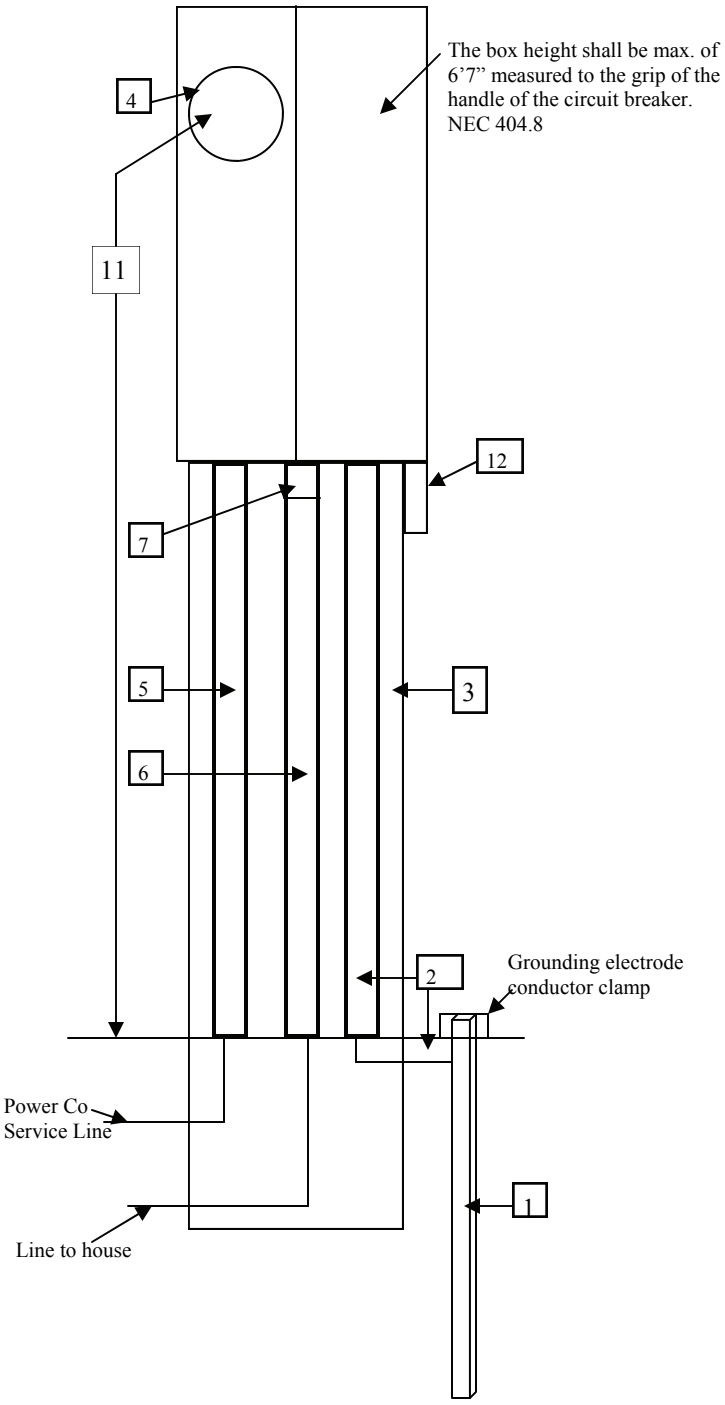
HUMBOLDT COUNTY & CITY OF WINNEMUCCA BUILDING DEPARTMENTS
UNDERGROUND ELECTRICAL SERVICE HANDOUT



1. Ground Electrode Conductor may be:
   a. Rods of iron or steel or stainless steel at least 5/8" in diameter
   b. Rods of listed nonferrous metal (copper or copper clad) not less than 1/2" diameter
   c. Pipe or conduit not less than 3/4" trade size & where of iron or steel shall have the outer surface galvanized or otherwise metal coated for corrosion protection
   d. The electrode shall be installed such that at least 8' of length is in contact with the soil. NEC, Section 250-52 A(5)
   e. The grounding electrode conductor clamp shall be installed above ground
2. Grounding Electrode Conductor—Bare #6 copper for 100 amp service. Bare #4 copper for 200 amp service. NEC Table 250.66.
   Shall be enclosed in approved conduit & connected to ground rod. If using metal conduit enclosure see attached for bonding of conduit.
3. Wood pole—6x6 square pressure treated
4. Meter base—(socket) with main disconnect breaker NEC 230.70. General means shall be provided to disconnect all conductors in a building or structure from the service entrance conductors. The disconnect shall be an external disconnect in stalled immediately adjacent to the meter locations. Switch boards and panels shall comply with NEC, Article 408.
5. Service conduit Schedule 80 sunlight resistant PVC (8' long min) Size conduit per wire size installed. Secure conduit to pole.
6. Load side conduit, Schedule 80 sunlight resistant PVC . Size conduit per wire size.
7. Conduit access fitting (optional). Install approved fittings and bushings.
8. Electrical lines burial depth
   a. Direct burial cables—24"
   b. Rigid metal conduit—6"
   c. Intermediate metal conduit-6"
   d. Rigid nonmetallic conduit (Sunlight resistant PVC) approved for direct burial—18"
   e. All wiring installed in conduit shall be ap proved for underground or wet location.
9. If a backer board is used it shall be of rot resistant material. Unistrut preferred
10. Panels shall be attached to the pole with lag bolts or other means that provide a permanently secured connection. NEC 110.13
11. NV Energy requires 48" from the ground to the center of the meter socket.
12. For temporary electric for construction purposes a GFCI outlet or circuit breaker shall be installed & wired appropriately. Receptacles used in wet locations outdoors will be required to have an enclosure that is weatherproof and remains so even when plug is inserted. (Bubble covers required). NEC 406.8(B)
13. Contact the local power company for specific utility company requirements. Commercial equipment is required to be preapproved by the power company.
    NV Energy—(800)962-0399
    Harney Electric—(775)272-3336

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