Electrical Facility Requirements for Government fee, easement land, or waters.

1. All installations and materials must comply with the N.E.C. for marinas, boatyards and wet locations. Requirements may exceed the N.E.C.

2. A weatherproof disconnect or circuit breaker box must be located on private property, as near to the Corps fee or easement line as practical. The disconnect or circuit breaker box must be weatherproof and must be mounted on a pressure treated post 5 feet high and anchored in the ground 24 inches. The box must be properly grounded using an 8 foot ground rod driven into the ground 2 feet from the post. Wiring entering and leaving the box must be in conduit. Where circuit breakers are installed on floating structures, a high water disconnect must be provided.

3. Wiring leaving the box and installed underground may be direct burial type wire. UF and USE type wire are approved for direct burial without conduit. The bare ground wire should be covered with green tape. The distance of the run and load will determine the wire size. This wiring must be buried a minimum of 2 feet below the surface with warning tape buried 1 foot below the surface. THW or equal stranded wire may be used for the entire installation provided that it is color coded black for hot, white for neutral, and green for ground and installed underground in electrical conduit.

4. All aboveground wiring must be in approved watertight electrical conduit with proper connections. Non-metallic rigid electrical conduit or metallic rigid threaded type conduit may be used. Conduit which leads to receptacles or switches must be supported with sufficient clamps installed to prevent movement. Flexible conduit must be used at all moveable joints. PVC waterpipe is not allowed to be used in lieu of electrical conduit.

5. All excess openings in receptacle boxes, junction boxes, lighting fixture boxes or any other fixture must be plugged with a threaded plug and sealed with a waterproof sealant to insure that they are watertight.

6. All switches exposed to the elements must be installed in waterproof boxes and mounted at least 3 feet above the land or dock surface. Switch covers must be rated for "wet locations when cover is closed."

7. Receptacle covers which are treated as approved for "wet locations when cover is closed" may be used if properly installed and if used only for temporary hookups. They will not be allowed for hookups which are left unattended or that could be rained upon. Receptacle covers which are subjected to rain or will be left unattended must be approved for "Wet locations when cover is open and outlet is in use." All receptacles must be mounted at least 3 feet above the land or deck surface.

8. When the underground feeder wire reaches the walkway to the boathouse or boat dock, a junction box must be installed and THW or equal stranded wiring connected to the underground feeder conductors. The THW wire must be color coded black (hot), white (neutral), and green (ground).

9. The THW wire must be properly wired with polarity checked. The green (ground) wire must be connected to the ground terminal of all receptacles and also to the ground LUG inside the receptacle box and/or lighting fixture box. In addition, when metal poles are used for lighting fixtures, the pole must be grounded using the same grounding circuit to insure continuity of the ground. The ground wire must run continuous back to the on shore ground which protects the entire system. The metal light pole should not be directly connected to the water.

10. ALL RECEPTACLES <u>MUST</u> BE PROTECTED BY A GROUND FAULT INTERRUPTER.