NEW CONSTRUCTION TRAFFIC SIGNAL INSPECTION REPORT

Intersection: _____
Date / Time: _____
Technician: _____

Legend: 1 = no problem found 2 = problem found 3= not applicable

A Cabinet Equipment.

1. _____Visually inspect the cabinet for damage.
2. _____ Visually inspect lightning surge protection for damage.
3. _____ Check and record the safety ground rod for conductivity. _____ Ohms.
4. _____ Check that cabinet drawings are legible and in good condition.

B Cabinet Service.

1. _____Check all breaker connections.
2. _____ Check all ground connections.
3. _____ Check and record service voltage. _____
4. _____ Check and record service amperage. _____

C Cabinet General Operation

1. _____Check thermostat and fan operation.
2. _____Check for GFCI convenience receptacle.
3. _____Check relays.
4. _____Check cabinet light.
5. _____Check for proper load switch seating.
6. _____Check all terminal screws and connections for tightness and discoloration.

D Cabinet Switch Operation.

1. _____ Check for Police Switches.
2. _____ Check for Cabinet switches.

Comments:_____
_____

E Cabinet Mechanics.

1. ____ Inspect lock mechanism and hinges.
2. ____ Check anchor bolts.
3. ____ Check cabinet documentation.
4. ____ Check cabinet weatherproofing.
5. ____ Check for cabinet filter.

F Controller.

1. ____ New Controller SN# _____.
2. ____ Check controller settings with intersection timing sheet.
3. ____ Check for correct time and date.
4. ____ Insure all calls are placed on each phase and serviced.
5. ____ Check 24V DC controller output.
6. ____ Measure controllers monitor output.

G Conflict Monitor.

1. ____ New Conflict Monitor SN# _____
2. ____ Insure Load Switch and traffic signal indications are the same.
3. ____ Check for correct time and date.

H Vehicle Detection.

1. ____ Check amplifiers for proper settings and operation.

I Pedestrian Detection.

1. ____ Inspect pedestrian push buttons.
2. ____ Operate each push button and check for proper operation.
3. ____ Inspect pedestrian's signs and markings.

J Mast Arm Intersections.

1. ____ Check all exposed signal cable for jacket and insulation damage.
2. ____ Check all nuts and bolts on mast arm and signal heads for proper tightness.
3. ____ Check hand hole covers for proper installation.
4. ____ Measure and record height of lowest point of signal to roadbed beneath._____FT/IN

K Signal Indications.

1. ____ Check alignment of signal heads.
2. ____ Make sure signal head has drip loop.
3. ____ Check condition and mounting of back plates.

Comments:_____
_____
_____

L Signal Heads.

1. ____ Check reflectors.
2. ____ Check signal door gasket.
3. ____ Check signal head lenses.
4. ____ Check hoods and louvers.
5. ____ Check signal door hinges and wing nut attachments.
6. ____ Check signal head hardware for damage.
7. ____ Check all electrical connections.
8. ____ Check head visibility and alignment.

M Traffic Control Signs and Markings.

1. ____ Check signals, signs, and markings for agreement.

N Interconnect.

1. ____ Check overall operation of installed system.

O Video Detection.

1. ____ Check for proper zone alignment (zone should be located in the lower 2/3 of the screen) and assignment (phase and channel).
2. ____ Check zones to insure proper vehicle detection and controller receiving calls.
3. ____ Check video wiring/coax connections for all cameras.
4. ____ Using #10 welding shield to simulate night operation. Check for proper operation.
5. ____ Verify video does not show horizon within view.
6. ____ Verify quality threshold is set to 4 with quality timeout set to 2 minutes.
7. ____ Check for proper alignment of all cameras.
8. ____ Check camera brackets and hardware for tightness and proper mounting.

P Opticom.

1. ____ Check channels for proper phasing using portable emitter.
2. ____ Test for communication with all detectors (push selector till F is displayed and push toggle switch to high). Verify all detectors in use should flash.
3. ____ Check detectors for proper alignment (all detectors).
4. ____ Check detector brackets and hardware for tightness and proper mounting.
5. ____ Check wiring for proper connection within detector.
6. ____ Verify weep holes have been opened.

Comments:_____
_____
_____
_____
_____
_____
_____
_____

Q Junction Boxes.

1. ____Inspect junction boxes and covers.
2. ____ Check junction boxes for water. Verify weep hole is opened in concrete boxes.
3. ____ Check wire connections within junction box.
4. ____ Check insulation for cracks and missing sections of insulation.
5. ____ Check splices that require weather proofing for integrity.
6. ____ Check and record grounding rod reading. _____ Ohms.
7. ____ Insure boxes are flush and level with ground. (Trip hazard)
8. ____ Insure that signal cables are not in contact with the junction box cover to avoid damage to the cable.
9. ____ Verify lid has lifting hook or ring.

R Generator/UPS

1. ____ Visually inspect overall appearance of cabinet for damage.
2. ____ Record number of hours of operation. _____ hours
3. ____Inspect flexible lines and connections.
4. ____ Check natural gas lines for leaks, damage, or corrosion.
5. ____ Check oil for proper level.
6. ____ Check the safety ground rod for conductivity and record reading. _____ Ohms.
7. ____ Check that air ducts and louvers are clean and not blocked (if blocked, clean)
8. ____ Check for air filters.
9. ____Exhaust system, check for leakage (carbon or soot indicates a leak).
10. ____ Check for fire hazards
11. ____ Check for loose or broken hangers and supports.
12. ____ Check battery operation for charge and rate.
13. ____ Measure battery condition using battery testing analyzer and record.
14. ____ Inspect electrical system wiring for visual damage.
15. ____ Check for abrasion where wiring subject to motion.
16. ____ Inspect for visual wear or damage of engine and mounting.
17. ____ Check items listed on the pre start list for generator set.
18. ____ Exercise generator set. Record any deficiencies.
19. ____ Check general condition of equipment for signs of vibration, leakage, excessive noise, extreme temperature, or deterioration.
20. ____ Check tamper switch for proper mount and installation.

Comments: