

Optional Information

Name of School:

Date of Inspection:

Vocational
Program/Course/Room:

Signature of Inspector:

**Use of Electrical Equipment
Self-Inspection Checklist**

Guidelines: This checklist covers the regulations issued by the U.S. Department of Labor OSHA under 29 CFR 1910.334. It applies to electrical use systems. This checklist does not apply to qualified persons working on generation, transmission, and distribution installations; communications installations; installations in vehicles; and railway installations.

Definitions of terms appearing below in bold, italicized font are provided at the end of the checklist to help you understand some of the questions.

Portable Electric Equipment	<u>Please Circle</u>
1. Is portable equipment handled in a manner which will not cause damage? [29 CFR 1910.334(a)(1)]	Y N N/A DK
2. Are flexible cords connected to equipment not used for raising or lowering that equipment? [29 CFR 1910.334(a)(1)]	Y N N/A DK
3. Is it prohibited to fasten flexible cords with staples or otherwise hanging them in a fashion which could damage the outer jacket or insulation? [29 CFR 1910.334(a)(1)]	Y N N/A DK
4. Are portable cord and plug-connected equipment and flexible cord sets (extension cords) visually inspected before use every day? [29 CFR 1910.334(a)(2)(i)]	Y N N/A DK

Note: Cord and plug-connected equipment and flexible cord sets which remain connected once they are put in place and are not exposed to damage need not be visually inspected until they are relocated.

Comments/Corrective Action:

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| 5. | If there is a defect or evidence of damage which might expose students to injury, is the defective or damaged item removed from service and are students/teachers prohibited from using it until repairs and tests have been made? [29 CFR 1910.334(a)(2)(ii)] | Y N N/A DK |
| 6. | Do flexible cords used with grounding-type equipment contain an equipment grounding conductor? [29 CFR 1910.334(a)(3)(i)] | Y N N/A DK |
| 7. | Have any attachment plugs or receptacles been connected or altered in any way which would prevent proper continuity of the equipment grounding conductor at the point where the plugs are attached to the receptacles? [29 CFR 1910.334(a)(3)(ii)] | Y N N/A DK |
| 8. | Have any of these devices been altered to allow the grounding pole of the plug to be inserted into slots intended for connections to the current-carrying conductors? [29 CFR 1910.334(a)(3)(ii)] | Y N N/A DK |
| 9. | Is the use of adapters which interrupt the continuity of the equipment ground prohibited? [29 CFR 1910.334(a)(3)(iii)] | Y N N/A DK |
| 10. | Is portable electric equipment and flexible cords used in highly conductive work locations (such as those inundate with water or other conductive liquids), or in job locations where students are likely to contact water or conductive liquids, approved for those locations? [29 CFR 1910.334(a)(4)] | Y N N/A DK |

Note: *Ground-fault circuit interrupters* (GFCI) are recommended in these situations.

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| 11. | Are students/teachers required to dry their hands when plugging and unplugging flexible cords and plug-connected equipment if energized equipment is involved? [29 CFR 1910.334(a)(5)(i)] | Y N N/A DK |
| 12. | Are energized plug and receptacle connections handled only with insulating protective equipment if the condition of the connection could provide a conducting path to the student's hand (if, for example, a cord connector is wet from being immersed in water)? [29 CFR 1910.334(a)(5)(ii)] | Y N N/A DK |
| 13. | Are locking-type connectors properly secured after connection? [29 CFR 1910.334(a)(5)(iii)] | Y N N/A DK |
| 14. | Portable cables shall not contain splices unless the splices are of the permanent molded, vulcanized type. Terminations on portable cables rated over 600 volts, nominal, shall be accessible only to authorized and qualified personnel. (NFPA 400.36) | Y N N/A DK |

Comments/Corrective Action

Electric Power and Lighting Circuits

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| 15. | Are load rated switches, circuit breakers, or other devices specifically designed as disconnecting means, used for opening, reversing, or closing of circuits under load conditions? [29 CFR 1910.334(b)(1)] | Y N N/A DK |
| Note: Cable connectors not of the load break type, fuses, terminal lugs, and cable splice connections may not be used for such purposes, except in emergency. | | |
| 16. | After a circuit is de-energized by a circuit protective device, is it required that the circuit may not be manually reenergized until it has been determined that the equipment and circuit can be safely energized? [29 CFR 1910.334(b)(2)] | Y N N/A DK |
| 17. | Is the practice of repetitive manual reclosing of circuit breakers or reenergizing circuits through replaced fuses prohibited? [29 CFR 1910.334(b)(2)] | Y N N/A DK |
| 18. | Is the modification of over current protection of circuits and conductors prohibited? [29 CFR 1910.334(b)(3)] | Y N N/A DK |

Test Instruments and Equipment

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| 19. | Are only qualified persons allowed to perform tasks such as testing, troubleshooting, and voltage measuring on electrical equipment operating at voltages equal to or greater than 50 volts (due to shock risk)? [NFPA 70E 110.4(A)] | Y N N/A DK |
| 20. | Are only <i>qualified persons</i> permitted to perform testing work on electric circuits orequipment? [29 CFR 1910.334(c)(1)] | Y N N/A DK |
| 21. | Have test instruments and equipment and all associated test leads, cables, power cords, probes and connectors been visually inspected for external defects and damage before the equipment is used? [29 CFR 1910.334(c)(2)] | Y N N/A DK |
| 22. | If there is a defect or evidence of damage that may expose a student to injury, is the defective or damaged item removed so that no student/teacher can use it until the necessary repairs and tests have rendered the equipment safe? [29 CFR 1910.334(c)(2)] | Y N N/A DK |

Comments/Corrective Action

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| 23. Are test instruments, equipment and their accessories been rated for the circuits and equipment to which they will be connected? Are they designed for the environment in which they will be used? [29 CFR 1910.334(c)(3)] | Y N N/A DK |
| 24. When flammable materials are present only occasionally, is electrical equipment capable of igniting them prohibited? [29 CFR 1910.334(d)] | Y N N/A DK |

Comments/Corrective Action

Definitions:

Ground-fault circuit-interrupter means a device whose function is to interrupt the electric circuit to the load when a fault current to ground exceeds some predetermined value that is less than that required to operate the overcurrent protective device of the supply circuit.

Qualified person means one familiar with the construction and operation of the equipment and the hazards involved. Whether a teacher/student is considered to be a "qualified person" depends upon various circumstances in the workplace. It is possible and, in fact, likely for an individual to be considered "qualified" with regard to certain equipment in the workplace, but "unqualified" as to other equipment. A person who is undergoing on-the-job training and who, in the course of such training, has demonstrated an ability to perform duties safely at his or her level of training and who is under the direct supervision of a qualified person is considered to be a qualified person for the performance of those duties.

Comments/Corrective Action

Safe Schools: A Health and Safety Check
NJ Safe Schools / New Jersey Department of Education

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