
Overview

This standard is about programming and operating automation systems and machinery for theatre and live productions. This involves interpreting and implementing the creative direction or production requirements, through programming and using control desks; or operating stage machinery such as lifts or turntables within a venue. This can include the programming of cues and states for automation systems, aligning with production or venue requirements

This will also involve the safe and precise operation of automation systems during rehearsals and live performances.

This also involves using clear communication protocols during all phases of the production process, including preparation, rehearsal and live performance.

This standard is for Automation technicians and Scenic automation technicians.

Performance criteria

You must be able to:

1. collate information from creative and technical teams regarding the production requirements
2. check automation and stage machinery components are safe and in the correct order for performance
3. check the condition of automation and stage machinery components and carry out minor repairs to an agreed standard
4. check that communications equipment, mechanical equipment and cue systems are working as required
5. operate machinery in line with organisational procedures and the manufacturer's instructions
6. program cues and states in line with safety requirements and system capabilities
7. operate control desks and systems in line with organisational procedures and the manufacturer's instructions
8. test and adjust programming for reliability and alignment with creative goals
9. document programming outcomes for operational use
10. monitor system performance and respond promptly to issues
11. identify any irregularities or problems and deal with these in line with procedures, reporting any that cannot be resolved to the responsible person
12. isolate equipment when required
13. undertake fault finding in components and systems
14. identify, record and report defects in performance
15. carry out post-stop checks in line with manufacturers' operating instructions
16. leave automated systems and stage machinery safe and secure in line with legislation, organisational requirements and codes of practice

Knowledge and understanding

You need to know and understand:

1. systems architecture, functions and limitations
2. how to read and interpret technical drawings to operate the automation system
3. electrical theory and its application to the systems used
4. mechanical theory and its application to the systems used
5. the automation, rigging equipment or components to select, based on technical requirements
6. operational protocols for various automation systems
7. health and safety requirements for automation programming
8. principles of motion programming and synchronisation
9. the automation system(s) used by the organisation and how to program it or them
10. the organisation's safety and communications protocols for operating automation and stage machinery
11. the operation of machinery in the context in which it is to be used during production
12. communication procedures for live environments
13. the importance of having communications and mechanical equipment and cue systems in working order
14. the issues that may occur when using automation and what to do about them
15. fault finding processes and procedures
16. the cue system and how to respond to these
17. the running order for the performance

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