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## Overview

This standard identifies the competences you need to apply fairing/filling compounds to yacht and boat substrates, in accordance with approved procedures. You will be required to obtain all information necessary to carry out the fairing/filling activities. You will be required to check that all surfaces to which fairing/filling compound is to be applied have been correctly prepared and that any necessary exclusion, containment, masking, protection, ventilation and heating requirements are implemented. You will be expected to use the appropriate and/or specified equipment and ensure that it is correctly set up, maintained and adjusted.

Your responsibilities will require you to comply with organisational policy and procedures for the fairing/filling activities undertaken and to report any problems with the fairing/filling activities, materials or equipment used, that you cannot personally resolve, or are outside your permitted authority, to the relevant people. You will be expected to work with either a high level of supervision or as a member of a team. You will take personal responsibility for your own actions and for the quality and accuracy of the work that you carry out. Where team working is involved you must demonstrate a significant personal contribution during the team activities in order to satisfy the requirements of the standard and competency in all the areas required by the standard must be demonstrated.

Your underpinning knowledge will be sufficient to provide a sound basis for your work and will provide an informed approach to applying fairing/filling compounds to yachts or boats. You will understand the fairing/filling procedures and techniques used and their application. You will know about the substrates, their preparation requirements, fairing/filling materials and their preparation requirements, in sufficient depth to provide a sound basis for carrying out the activities to the required standard.

You will understand the safety precautions required when carrying out the fairing/filling applications. You will be required to demonstrate safe working practices throughout and will understand the responsibility you owe to yourself and to others in the workplace, both ashore and afloat.

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## Performance criteria

### You must be able to:

1. work safely at all times, complying with health and safety legislation, regulations, directives and other relevant guidelines
2. ensure the material surfaces to be treated are suitably prepared for the fairing/filling compound applications
3. check that the appropriate equipment and tools are set up and maintained at satisfactory operating conditions and levels
4. carry out the fairing and filling process in accordance with operating procedures and the specification requirements
5. ensure that the treated surface achieves the required fairness and meets the industry and contractual standards and customer's acceptance criteria
6. deal promptly and effectively with problems within your control and report those that cannot be solved
7. dispose of waste and excess materials in line with agreed organisational procedures
8. shut down the equipment to a safe condition and reinstate the work area on completion of the fairing/filling activities

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## Knowledge and understanding

### You need to know and understand:

1. the safe working practices and procedures to be observed when working with fairing/filling materials and application tools (such as general workshop and site safety, appropriate protective equipment, protecting other workers from the effects of the work, safety in enclosed/confined spaces, working at height, atmospheric controls)
2. statutory requirements, risk assessment procedures and relevant requirements of HASAWA and COSHH
3. the hazards associated with the fairing/filling products to be applied (including information to be found in manufacturers' data sheets and in Chemical Hazard Information and Packaging for Supply (CHIPS) data sheets and with any tools and equipment used (solvent vapours, dermatitis exposure, airborne particles, heat) working at heights and over water, confined spaces and the importance of adequate and safe lighting)
4. the environmental impact of the operations you are carrying out and of the materials you are using and the minimisation of this impact
5. the requirements for working in confined spaces and the importance of emergency procedures and safe systems of work (including safe evacuation, closing down compartments, permits to work, Required Air Quantities (RAQs) and local exhaust ventilation (LEV) to maintain safe conditions, the provision of adequate and safe lighting and avoidance of sources of ignition)
6. the personal protective equipment (PPE) to be worn during the fairing/filling processes
7. how to obtain the necessary job instructions required for the work being carried out
8. the need to ensure that the substrate has been correctly prepared for the fairing/filling product to be applied
9. the importance of maintaining appropriate environmental conditions for the application and curing of the product being applied
10. the procedures for the safe handling and safe use of the products being applied
11. selection of the correct tools and equipment for the preparation and application of the materials to be used
12. why tool/equipment control is critical and what to do if a tool or piece of equipment is unaccounted for on completion of the activities
13. the techniques required for the application of the materials to a variety of surfaces
14. the requirements for working afloat, on outer bottoms and at height
15. the procedure to contain and to clear away spillages
16. the quality control requirements and techniques to be observed
17. the identification of faults in application, their causes and their correction
18. the safe and appropriate disposal of waste materials

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19. the extent of your own responsibility and whom you should report to if you have problems that you cannot resolve

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## Scope/range related to performance criteria

1. Carry out all of the following during the fairing/filling activities:
  1. ensure you have the necessary information to carry out the fairing/filling activities (such as job instructions)
  2. adhere to procedures or systems in place for risk assessment, COSHH, CHIPS data, personal protective equipment and other relevant safety regulations
  3. confirm that all necessary husbandry and containment arrangements are in place, and are adequate
  4. maintain safe access and working arrangements for the work area
  5. carry out any necessary protection of non-treated areas by means of masking, taping, covering
  6. provide weather protection for the areas to be faired/filled (where appropriate)
  7. carry out the fairing/filling activities using appropriate techniques and procedures
  8. ensure that environmental conditions meet the requirements for the application of the fairing/filling compounds (such as surface temperature, air humidity, ambient temperature, dew point)
  9. provide any means required to promote the curing of the product used (such as air supply, warm air, heating)
2. Carry out the all of following when applying the fairing/filling compounds:
  1. confirm that the product is correctly specified
  2. prepare the product in accordance with manufacturers' recommendations
  3. select appropriate and correct tools as recommended and/or specified by the product manufacturer
  4. apply product in accordance with manufacturers recommendations and specifications (such as: temperature, mixing ratios, thicknesses)
3. Apply fairing/filling compounds on three of the following surfaces:
  1. horizontal 'flat' surfaces
  2. inclined surfaces
  3. round parts
  4. vertical 'flat' surfaces
  5. curved surfaces
  6. corners (such as outside corners, edges, obscured corners)

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7. fairing other minor blemishes, spot repairs
  4. Apply fairing/filling layer(s) to achieve all of the following:
    1. applied fairing/filling layer(s) without defects (such as air-pockets, surface contamination, excessive overfill areas)
    2. smooth surface, free from all surface irregularities (such as pinholes, lumps, sharp edges)
    3. uniform material colour without streaks or lumps
    4. correct component/project surface profile which meets industry and contractual standards and customer acceptance criteria
  5. Apply fairing/filling, in accordance with one of the following:
    1. BS, EN or ISO standards and procedures
    2. customer (contractual) standards and requirements
    3. company standards and procedures
    4. product manufacturer's specifications and recommendations
    5. recognised compliance agency/body's standards (such as Lloyds, Boat Safety Scheme, BMEA Code)
    6. other accepted international standards
  6. Reinstate the work area on completion of the fairing/filling activities, to include carrying out all of the following:
    1. cleaning and returning all tools, equipment and excess materials
    2. remove protection and exclusion arrangements (if no longer required)
    3. complete all relevant documentation
    4. leave the work area in a safe and tidy condition

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## Behaviours

You will be able to apply the appropriate behaviours required in the workplace to meet the job profile and overall company objectives, such as:

- strong work ethic
- positive attitude
- team player
- dependability
- responsibility
- honesty
- integrity
- motivation
- commitment

SEMME2130

Carrying out the application of fairing/filling compounds to yachts and boats



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