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MODEL CLAUSES FOR CIVIL ENGINEERING WORKS

SECTION 170 GENERAL REQUIREMENTS FOR PROTECTIVE COATINGS

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SECTION 170

GENERAL REQUIREMENTS FOR PROTECTIVE COATINGS

Definitions

170.001 The following definitions apply to Sections 170 to 176 of the Model Clauses.

ambient air temperature The temperature of air surrounding a material, substrate or structure measured local to the material, substrate or structure but at a distance where the temperature is not affected by their presence.

Stripe coat A supplementary contrasting coloured coating brush applied to specified areas of steelwork where surface tension stresses can create low film build areas (for example, at arris edges, hole peripheries) and where additional film build is required such as at weld seams and bottom flanges.

substrate temperature The temperature of a face of a substrate as measured by a contact thermometer.

Coating works

170.002 Coating works shall be undertaken in accordance with Appendix 170/1.

The scope of the coating works shall be as specified in Appendix 170/2.

Materials

170.003 Protective coating systems, protective coatings, sealants and, where appropriate, ancillary materials shall be compliant with the requirements of NR/L3/CIV/039, and be registered as such in the Products and Drawings database (PADS).

Protective coating systems are defined in NR/L3/CIV/039, but a system not listed in that standard may be submitted for approval for use provided that it is;

- (i) certificated by an Independent Test House as being compliant with NR/L3/CIV/039,
- (ii) registered in PADS,
- (iii) compliant with the contract performance requirements.

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Contractor and operatives **170.004** The Contractor shall operate a Quality system complying with BS EN ISO 9002 and hold a currently valid certificate for that system.

Operatives shall be appropriately skilled and experienced in the use of the specified materials and methods used to prepare the surfaces and apply the coatings.

Contractors shall be registered with the Institute of Corrosion ICATS Scheme. At least 80% of the operatives of a Contractor employed to apply coatings to metal substrates shall be trained and accredited through this Scheme: where there are fewer than 5 operatives they all shall be fully trained. When requested, a Contractor shall provide evidence to the Employer's Representative that they comply with these requirements.

Unless otherwise stated in Appendix 170/3, the personnel used to monitor and inspect coating operations shall be trained and certified to a minimum of Level 1 under the ICorr Scheme.

Plans for working **170.005** Prior to any work commencing on site, the Contractor shall forward to the Employer's Representative; risk assessments; a Construction Phase Plan (supported as necessary, by other information that details the procedures to be followed); and an Inspection and Quality Plan.

Where instructed in Appendix 170/4, the Contractor shall, in advance of the main Works, undertake a procedure trial and/or produce a reference panel.

The sequence of working shall be such that surfaces inaccessible after re-assembly receive the full specified preparation and protective coating system.

Removal of advertisement boards, screens etc **170.006** As necessary, advertisement boards, screens, timber decks, mesh parapets, etc., shall be taken down to allow for thorough cleaning and coating of the areas to be coated, and where specified, dusted, cleaned, and re-fixed. Boards to be re-fixed shall be stored in a safe place and protected from paint splashes, defacement, damage etc.

Following the removal of any permanent protective boarding etc. that was installed to protect people and property, temporary boarding shall be provided and maintained and repositioned when necessary to allow the work to proceed whilst maintaining an adequate protection barrier at all times.

Protection of adjacent surfaces, property, equipment etc. **170.007** The Contractor shall protect surfaces adjacent to those being prepared and coated from damage.

Containment shall be provided so that spent grit, other debris and overspray from coating works does not contaminate the ground, buildings, equipment etc, or affect people outside the work boundary.

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Contaminated surfaces shall be cleaned by Contractors at their own expense.

Supply and use of materials generally

170.008 The coating materials used by a Contractor shall be (a) recommended for use by their manufacturers for the particular surface and conditions of exposure, and (b) compatible with each other.

The preparatory and ancillary materials used by a Contractor shall be recommended by their manufacturers, and also by the manufacturer of the protective coatings, for the type and condition of the surfaces being prepared.

Except when specified otherwise as an approved protective coating system, all the coatings of a protective coating system shall be sourced from one manufacturer.

For the particular project, the finish coat of a protective coating system shall be formed from the same batch of material. Whenever possible, the other coats of a system shall be formed from a single batch, but where more than one batch is used the Contractor shall keep the batches separate, allocate them to distinct parts or areas of the works, and inform the Employer's Representative of this allocation.

Unless previously agreed with the Employer's Representative, and approved by the manufacturer of the coating material, a coating material shall not be thinned.

Product data sheets, safety data sheets and Control of Substances Hazardous to Health Regulations (COSHH) statements for all materials shall be readily available on site at all times.

Material storage

170.009 Coatings and, where necessary, other materials shall be stored in a facility that provides clean and dry conditions at a temperature maintained between 5°C and 27°C, and in accordance with any special storage conditions printed on the containers and/or as specified by the manufacturer.

Protective coatings shall not be stored in open containers.

Protective coatings shall be used on a 'first in/first out' basis.

All materials shall be used within their 'Use By' life.

Mixing of coatings

170.010 All liquid coatings shall be mixed before use until they are homogeneous. Coatings that have sediments that cannot be fully incorporated or that have contaminants shall not be used.

Mixing equipment shall be clean and dry and not contaminate the coating materials in any way.