Introduction

The following general procedure is applicable to steel sphere support legs encased in dense concrete. Unless directed to the contrary in this proposal Promat FENDOLITE® MII shall be mixed and applied in accordance with the current Promat FENDOLITE® MII & FENDOLITE® TG Energy Industries Application Manual. Prior to carrying out any work the condition of the steel substrate and the dense concrete including its steel reinforcement should be inspected and repaired, if necessary.

Inspection of concrete surfaces

All concrete surfaces to be protected shall be in good condition be free from release agents, oil, grease, dirt, dust, grime or any other contaminants. If there is any doubt as to the condition of the concrete substrate then an expanded metal lath should be used – please consult Promat for further advice.

If the concrete has been painted then the paint should be removed using a sodablast system or similar approved. Alternatively an expanded metal lath can be used – please consult Promat for further advice.

Attachment of mesh retention pins

To aid the installation of the mesh within the Promat FENDOLITE® MII, self-adhesive pins may be installed at 400mm centres, provided that the application is to all 4 sides of the column.

PROMAT® SBR Bonding Latex / Promat FENDOLITE® MII keycoat

The keycoat is a 50 : 50 mix of PROMAT® SBR Bonding Latex (8.5 litres) mixed with water (8.5 litres), the total 17 litres of watered-down PROMAT® SBR Bonding Latex is then mixed with the 20kg of Promat FENDOLITE® MII. Apply the keycoat so as to give a 20-50% coverage of the background with blobs of material standing off approximately 5mm from the surface. Ideally the material should be flicked on manually using a trowel, or sprayed with a low throughput using an 11mm nozzle and a low air pressure of approximately 10 psi. The Keycoat must be allowed to cure and dry thoroughly before proceeding with the application of the Promat FENDOLITE® MII. Typically this will take between 24-36 hours depending on the environmental conditions.

Installation of mesh reinforcement

Promat propose the use of Promat's 50mm x 50mm PROMAT® Plastic Coated Galvanised mesh. If self-adhesive pins have been installed wrap a sufficient length of mesh round the leg of sufficient length and overlap by two mesh apertures and tie together using the cut ends or wire ties at 150mm centres. Secure the mesh on the pins using speed fix washers. Pull the mesh away from the concrete surface so as to lie substantially within the mid third of the Promat FENDOLITE® MII. A minimum overlap of two mesh apertures is required at all joins which should be securely tied with galvanised wire ties or twisting the cut ends of the mesh together at 150mm centres. If the mesh is to be

installed without the use of adhesive pins then mesh the leg as described above and use biscuits of Promat FENDOLITE® MII to stand the mesh off the concrete surface.

NOTE: No more than three layers of mesh must overlap at any one point.

Application of Promat FENDOLITE® MII

Spray apply Promat FENDOLITE® MII to achieve the specified thickness. Promat FENDOLITE® MII applied without mechanical reinforcement should be applied to a nominal thickness of 25mm. If mechanical reinforcement is specified then this thickness must be increased to 30mm to ensure that the mesh reinforcement is fully encapsulated within the Promat FENDOLITE® MII. Where possible, Promat FENDOLITE® MII shall be applied as a single coat to the required thickness. **Promat FENDOLITE® MII must not be trowelled flush with the reinforcing mesh as this can create a plane of weakness.** The final coat shall be at least 8mm thick to avoid cracking. The suggested finishing technique is to level the surface with a steel float to close down the surface.

Water shedding

All top horizontal surfaces should be sloped to shed water.

Promat FENDOLITE® MII / steel junctions

Promat FENDOLITE® MII / steel junctions shall be sealed by cutting a 'U' shape into the material and applying a polysulphide or silicone based mastic sealant.

NOTE: Promat recommend that the mastic seal is not applied until after any final surface treatment.

Final surface treatment

Promat propose that on curing and drying of the Promat FENDOLITE® MII, the surface is treated with a Promat approved topcoat paint system. The selected topcoat system must be applied strictly in accordance with the manufacturer's recommendations. It is necessary to maintain the correct environment conditions as stipulated in our current Promat FENDOLITE® MII & Promat FENDOLITE® TG Energy Industries Application Manual immediately before, during and after the particular application. Refer to Promat Energy Industries Data Sheet EIDS 028 for the selection of an appropriate topcoat.

The information given in this Application Procedure is based on practical experience, independent and other tests and represents, in Promat's opinion, the best technical advice available. Since the products are applied under circumstances beyond our control, Promat can accept no direct or consequential liability, whether in contract or in tort, for the interpretation of such recommendations and reserves the right to modify the recommendations as necessary. Should it be unclear as to the meaning of any of the instructions given above, or if further information is required, please consult Promat.