山下正人（㈱京都マテリアルズ）他：さびを制御し防食する反応性塗料の研究開発、材料と環境、66,21-24(2017)

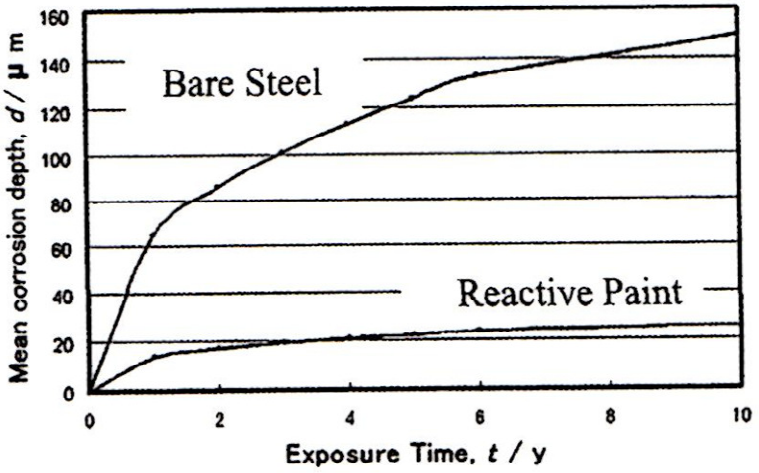

Fig. 2 Mean corrosion depth as a function of exposure time for the bare mild steel and that with the reactive paint coating of two-layered 15 micron thick vinylbutyral resin type.

図 2　　無塗装炭素鋼と反応性塗料（Al3+イオンを含有するブチラール樹脂各々15μの２層塗装膜）塗布鋼の耐候性比較

Bare Steel：無塗装炭素鋼、Reactive paint：反応性塗料塗布した炭素鋼

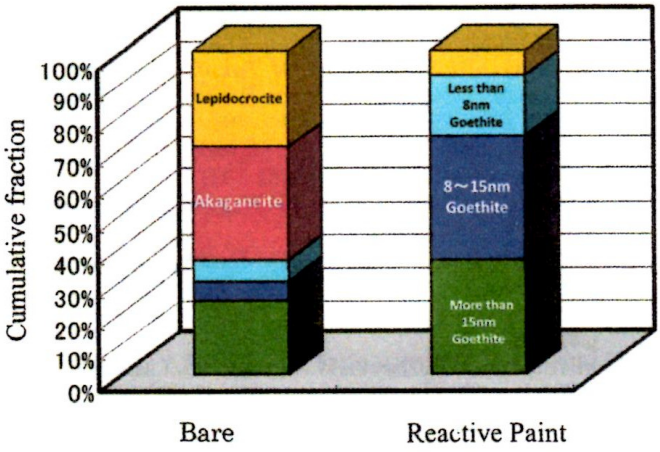

Fig. 3 Mass fraction of each ferric oxyhydroxide crystal in the rust layers formed on the bare mild steel and that with the reactive paint coating of two-layered 15 micron thick vinylbutyral resin type, exposed for 10 years. Crystal size of goethite analysed by X-ray diffraction and Mössbauer spectroscopies is classified into three ranges of less than 8nm, between 8nm and 15nm and more than 15nm.

図 3.　図 2 において 10 年間暴露した無塗装炭素鋼および反応性塗料を塗布した鋼に生成したさびの種類