

SOLDERABLE COATINGS

ONE OF THE CEMCO-FSL RANGES OF WET PROCESS SYSTEMS

While HASL still remains the preferred solder coating within the Assembly industry, highly dense topography and specialist applications dictate the need for alternative finishes. For this reason, Immersion Tin, Immersion Silver, Nickel Gold and other inorganic and organic finishes are employed.

Cemco-Fsl's experience of immersion type applications has enabled us to offer a range of chemistry-specific process systems.

No matter which process you decide upon you can be sure that Cemco-Fsl has worked closely with most chemical manufacturers and is therefore able to manufacture a system with the correct specification. We also offer the facility to chemistry test the system, providing the opportunity to qualify the process prior to delivery. If, due to space restraints, you are unable to accommodate a straight line system we can supply lines in different configurations. As a manufacturer of automatic panel handling systems we can also tailor make systems to integrate with existing process lines.

Cemco-Fsl systems incorporate an Allen-Bradley touch screen menu-driven display and PLC control. All process variables are independently adjustable and can be monitored and recorded via an optional PC-driven collection package. An optional modem is also available to facilitate on-line fault finding.

We maintain a flexible approach to customer requirements, and are able to build custom made systems within the confines of the Chemistry used. The equipment is constructed using appropriate materials for longevity of use. It is simple to operate, designed for easy access and with ease of maintenance in mind. Safety features include cover switches, high/low level control/alarms, phase failure indicator and earth leakage protection.



A typical Solderable coating system consists of four basic steps.

Stage 1 : In-feed conveyor. Pre-Cleaner. Cascade Wash.

Light organic residues are removed from the copper surfaces, followed by a water wash section.

Stage 2 : Copper Conditioner. Cascade Wash. Inspect.

The copper surface is conditioned, producing a highly active finish required to obtain the subsequent bright solder finish, followed by a water wash section.

Stage 3 : Pre-dip.

A flood immersion process preparing all copper surfaces for the final coating stage.

Stage 4 : Solderable protective coating. Cascade and Power Wash. Dry.

A flood immersion stage for the deposition of the solderable coating which includes an organic monomolecular protective layer, followed by a multiple stage wash and dry.

