EDITORIAL . . .

Research on Electroplating Materials

A large number of industrial metal finishing processes are imported directly or indirecIty into our country. This may give the feeling that this may be due to paucity of research centres in India. To some extent this may be true, judging from the volume of metal finishing research publications in our country when compared to research in U.K., U.S.A., Germany, or Japan, which export a number of their processes to us. However, few research papers on metal finishing are published. These investigations are carried on in the research laboratories but not by the metal finishing supply houses. These are generally investigations of phenomena rather than the development and production of new or improved processes which can be used by industry. Research in India appears to have occupied itself largely with fundamentals.

Time and again it has been pointed out by the various heads of research laboratories and the Government of India, that applied science has fallen behind the Western countries because research organisations have not produced effective entrepreneurs to expoit it.

Metal finishing field is an attractive one for research in universities and research organisations, who orient their postgraduate projects to gain higher degrees like M.Sc., or Ph.D. It is probable that those in charge of these research projects have little appreciation of the intrinsic value of the task which the research student is asked to undertake. This results in a number of research papers of which only a few are likely to result in benefit to industry. The object seems primarily to be to produce a degree—winning thesis rather than to add to useful knowledge which will be helpful to our industry. It should be possible to orient research so that both objectives, i.e. degree earning and industrial bias, are achieved. Because of the purely academic type of research pursued there is very little liaison between the laboratories engaged in metal finishing research and the metal finishing industry. The Government of India periodically ask both the research institutions and the industries to exchange notes for mutual advantage and to reduce dependence on imports.

What Dr. S. Wernick[1] has said in an editorial regarding British research is apt here. "What is wanted is a modicium of liaison between the Universities and the metal finishing industry so that the former may become aware of the real problems of the latter. The result could be that in a few years the public money that is currently being invested in university grants and the establishment of first class research facilities, second to none in the world, would at last bear useful fruit to the benefit of all concerned."

In an editorial[2] in this Journal it is said: "Government-owned research and technological organisations which are already in existence should seek to co-operate in a partnership with the plating industry, so that our electroplating industry forges ahead with regard to technological advances in this field. Such a co-operative effort is essential now more than ever before."

Applied research, on the addition agents—brighteners for zinc, nickel, copper, tin, cadmium, etc., cleaners and allied materials, is essential now more than ever before, as metal finishing industry has established itself in India.

References

(1) S. Wernick, Editorial.
Bulletin of the Institute of Metal Finishing, Vol. 47, Part 5, Page 3, 1969.

(2) This Journal, Editorial
Vol. 14, No. 4, Page 90, 1965.

—S.K.