

merit are described. The comments by the author, after the description of tests for each physical property, are both interesting and instructive.

The two chapters composing the last heading, Miscellaneous, are devoted respectively, to descriptions of methods for detecting adulterants in cement, and trial burnings of cement mixtures in the laboratory.

This book is written in so lucid a matter that it can be readily understood, by even those not familiar with the subject treated; while at the same time it is so up-to-date and full of personal notes and comments, that even those who have specialized on the subject, will find it of interest and value.

A. W. DOW.

THE MANUFACTURE OF METALLIC ARTICLES ELECTROLYTICALLY.—ELECTRO-ENGRAVING. BY DR. O. PFANHAUSER, MANUFACTURER, VIENNA. Translated by Joseph W. Richards, Professor of Metallurgy, Lehigh University The Chemical Publishing Co., Easton, Pa, 1906. pp. viii + 162. Price \$1.25.

This book is a digest of the literature, and particularly of that part of it relating to the patents, upon the electro-deposition of metals. The deposition of copper naturally receives the greatest attention. The various chapters treat of Baths for Copper Galvanoplasty, Physical Properties of the Copper Deposit, Behavior of Copper Anodes, Constants of the Bath and Calculation of the Amount of the Deposit, Industrial Plants, Particular Devices, Manufacture of Metallic Powders and Foil, Production of Wire, Manufacture of Large Bodies, of Mirrors, of Tubes, Electrolytic Etching and Engraving. This book will be useful alone to the manufacturer working along this line, and in very many cases the incompleteness of statement will be exasperating to anyone trying to follow any particular procedure.

HENRY FAY.

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