VII.—Proceedings.

Regular Meeting, Thursday, March 6th, 1879, at 8 o'clock, P.M.

The meeting was called to order, Vice-President Leeds in the chair. In the absence of the Recording Secretary, Mr. Casamajor was appointed Recording Secretary *pro tem.* The minutes of the preceding meeting were read and adopted.

The minutes of the meeting of the Board of Directors, held at the office of Mr. W. H. Nichols, on Thursday, March 6, 1879, were then read.—*Present*—Messrs. Nichols, Endemann, Squibb, Casamajor, Leeds, Goldmark, Chandler, Waller and Goldschmidt. Dr. Squibb in the chair.

Dr. Waller reported that No. 4., Vol. 1, of the Proceedings, would be ready for the printer in about a week, a statement which was confirmed by Dr. Chandler.

The Treasurer reported $1,100 in the treasury.

It was moved and carried, that the publication of the Society should, in the future, be known as the "*Journal of the American Chemical Society*," which shall be published monthly, and contain the Proceedings, original papers, re-prints, *resumés* of special subjects, and abstracts of important papers published in other journals.

Moved and carried that the subject of admitting advertisements to the covers of the Journals be referred to the Committee on Publications, to report at the next meeting of the Board.

Moved and carried, that this Committee report a list of abstractors and reviewers of current chemical literature, and that the names of the Committee on Publications, the abstractors and reviewers, appear on the title page of the Journal.

It was moved that the sum of one hundred dollars be paid annually to the member of the Committee on Publications whom that Committee shall appoint working editor.

This motion was laid on the table.

The following gentlemen were then elected:

As Members, C. G. Wheeler, C. F. Erhardt, T. B. Stillmann, Aug. Eimer, W. F. Hildebrandt, J. F. Kelly; *Associates*, Joseph Binns, J. Seal, Wm. Ziegler, A. M. Despard.

The following names were proposed:

As Members, Wm. Van Slooten, Marcus Benjamin; *Associate*, John A. Scherer.

The first paper, entitled "Notes on Cupro-Manganese," by Augustus Rahl, was read, the chairman remarking that an alloy composed of 7 parts copper, and 1 part of tin, easily cast, resists well the action of acetic acid and of moderately dilute sulphuric acid.

The second paper, "Notes upon Chicle," by Geo. A. Prochazka, Ph. D., and H. Endemann, Ph. D., was read; in the ensuing discussion, Mr. Stilwell said that he had found the coloring matter of chicle was easily soluble in water.

The third paper, by Prof. C. A. Goessmann, "The Examination of the Minnesota Early Amber Cane," was read by title and ordered to be published.

Dr. Ira Remsen gave a description of a new journal, devoted to chemistry, which he is about to publish.

Prof. Leeds then showed the Society an easy method for

THE DETECTION OF MINUTE TRACES OF WATER IN ALCOHOL.

Anthraquinone $C_{14}H_8O_2 = C_6H_4 <^{CO}_{CO}> C_6H_4$, is not only converted into hydro-anthraquinone $C_6H_4 <^{CO}_{CO}> C_6H_4$ by zinc dust and caustic soda, but also by treatment with sodium amalgam. When the hydro-anthraquinone so formed is brought into contact with water there is formed a clear, dark red solution of sodium-hydro-anthraquinone, which, on pouring off the excess of amalgam, gradually loses its color in contact with the air, or, if shaken, is quickly converted, needles of the anthraquinone separating. This reaction has been taken advantage of by Prof. A. Claus (Bec. d. Deutsch. Chem. Gesell. X, p. 927) to detect the minutest traces of water in ether, absolute alcohol, etc. If some crystals of sublimed anthraquinone are treated with absolute, alcohol-free ether, the crystals are converted into brownish-black crystals of sodium-anthraquinone. The least drop of water produces a magnificent red coloration, which disappears on agitation in contact with air, but reappears on standing. This can be repeated a dozen times, or as long as water and sodium-amalgam are still present.

When absolute alcohol is used, a dark green zone appears along the line of contact of amalgam and alcohol, which, on slight agitation colors the entire solution of a magnificent green, but entirely disappears on contact with air, anthraquinone being in all probability again formed.

Dr. Squibb said that anthraquinone was more sensitive to water than even anhydrous sulphate of copper. He also said that in the

manufacture of anhydrous alcohol, it should be distilled after its separation from lime, instead of while mixed with lime, as stated in the text books. Prof. Leeds also spoke upon the detection and estimation of nitrous acid by means of meta-diamidobenzol.

A letter was received from Dr. T. Sterry Hunt, accepting the presidency of the Society, and that on account of his absence in Europe, he had only lately learned of the honor conferred upon him.

Adjourned.

P. CASAMAJOR,
Recording Secretary pro tem.

The librarian reports that the following books and exchanges have been received by the Society:

ADDITIONS TO THE LIBRARY OF THE AMERICAN CHEMICAL SOCIETY.

From Jan. 1 *to March* 1, 1879.

PRESENTED BY AUTHOR.

Presented by Marcus Benjamin, Ph. B.:

"Dangerous Cosmetics." Pamphlet.

Presented by Gideon E. Moore, Ph. D.:

"On Chalcophanite: A New Mineral Species." Pamphlet.

"On the Chemical Constitution of the Wax of the Myrica Cerifera." Sheet.

"On the Electrolysis of the Substituted Derivatives of Acetic Acid." Sheet.

"On the Occurrence in Nature of Amorphous Mercuric Sulphide." Sheet.

"On Brushite." Pamphlet.

Presented by A. A. Hayes, M. D.:

"On the Wide Diffusion of Vanadium, and its Association with Phosphorus in many Rocks." Sheet.

Presented by John L. Hayes:

"Sheep Husbandry in the South."

Presented by Prof. Mariana Barcena:

"Vicente Fernandez, Analisis Cauylitativa Cuantitativa del Mezcal."

ACQUIRED BY GIFT.

Presented by S. A. Goldschmidt, Ph. D.:

J. Lawrence Smith; Paris Exposition (1867); "Report on Industrial Chemistry."

F. A. P. Barnard, LL. D.; Paris Exposition (1867); "The Industrial Arts and Exact Science."

"Society of Public Analysts." Proceedings, Vol. I, 1876.

Presented by P. Casamajor:

"Sugar Cane." Vol. X, 1878.

Presented by Waldron Shapleigh:

"Enquête sur la Question de l'Impot du Sucre a la Consommation." 2 vols.

Presented by Prof. Mariana Barcena:

J. W. Mallet. "La Barcenita" (a new mineral).

Presented by Messrs. Matthiesen & Wiechers:

"Kolbe's Journal fur Pracktische Chemie." Nos. 16 and 17, Vol. VIII (completing vol.).

Presented by Dr. C. F. Chandler:

"New York Board of Health." Report, 1874–5.

PURCHASED BY THE SOCIETY.

"Liebig, Kopp and Will, Strecker, Naumann, Fittica, Jahresbericht."

30 Vols; 1847–'76.
Part I, 1877.
Register, 2 Vols; 1847–'56, 1857–'66.
Part 1, Register; 1867–'76.

"Dingler's Polytechniches Journal."

3 Vols; 167, 168, 171.

No. 984 completing Vol. 170.

"Fresenius. Zeitschrift fur Anylytical Chemie."

14 Vols. and Register.

ACQUIRED BY EXCHANGE.

From Bureau of Statistics, Treasury Department.

Imports and Exports of the United States from July to Sept., 1875.

Statistics of Commerce and Navigation of the United States. 1877.

From the American Society of Civil Engineers.

Proceedings. 2 Vols; 1876–'7; Jan.—Sept., 1878, inclusive.

From the American Journal of Pharmacy.

"American Journal of Pharmacy;" 3 Vols; 48 (No. III lacking), 49 and 50.

From the American Philosophical Society.

Proceedings. 11 Vols.; 1861–'78.

From the New York Academy of Sciences.

Annals. Vol. I.

From the Newcastle-on-Tyne Chemical Society.

Transactions. Vol. III and first half of Vol. IV.

From the Italian Chemical Society.

"Gazetta Chimica Italiana;" 8 Vols.; 1871–'8.

APPARATUS.

Presented by Prof. A. R. Leeds.

Screen for Lantern.

List of Exchanges Received

During January and February, 1879.

AMERICAN.

Anthony's Photographic Bulletin.
The Pharmacist and Chemist.
" Journal of the Franklin Institute.
" Popular Science Monthly.
" American Journal of Pharmacy.
" Physician and Pharmacist.
" American Bookseller.
Van Nostrand's Engineering Magazine.
New Remedies.
The Philadelphia Photographer.
" Crockery and Glass Journal.
" Engineering and Mining Journal.
" American Gas-Light Journal.
" Oil, Paint and Drug Reporter.
" American Manufacturer and Iron World.
" Druggists' Circular.
" Brewers' Journal.
" Manufacturer and Builder.
" Manufacturers' Review and Industrial Record.
" Brick, Pottery and Glass Journal.
" American Gardner.

ENGLISH.

The Chemical News.
" Journal of Applied Science.
" Chemical Review.
" Journal of the Society of Arts.
Sugar Cane.
Iron.

FRENCH.

Moniteur de la Teinture.
Revue des Industries Chimique et Agricoles.
Revue Industrielle.
Annales du Genie Civil.
Repertoire de Pharmacie.
Technologiste.

Journal des Fabricants de Sucre.
Moniteur Scientifique.
Moniteur Industriel.

GERMAN.

Berg und Huettenmaennische Zeitung.
Oesterreichische Zeitschrift fur Berg und Huettenwesen.
Polytechniches Notizblatt.
Photographische Mittheilungen.
Archiv der Pharmacie.
Deutsche Industrie Zeitung.
Wochenschrift fur Zuckerfabrickation.
Deutsche Gerberzeitung.

S. A. GOLDSCHMIDT,
Recording Secretary.

VIII.—Notes on Cupro-Manganese.

By A. RAHT, A. M.

Received March 6th, 1879.

Several French chemists have pointed out as early as 1869 that an admixture of manganese to copper, bronze and brass, tends to increase their hardness, elasticity and toughness. Since then, it appears that some parties in France have manufactured a compound styled "cupro-manganese," as a convenient form for alloying.

Some cupro-manganese was imported from France into this country about a year ago. Experiments have been made with it by large brass and bronze manufacturers; all these gave, however, negative results; the metal proving more apt to tear and crack under the rolls and punching-machines after an addition of this cupro-manganese.

No matter how much the inferior European copper may be improved by an admixture of manganese, one could hardly expect the same action on the superior quality of Lake Superior copper. However this may be, it is evident that even inferior copper could not be improved by the addition of a metal with such impurities, as shown by the following analysis of the imported French cupro-manganese.

It contains besides copper :