NOTE.—This year also appears in the table as "Before the Use of Pasteurized Milk." An error.

1897—July. Walker-Gordon cream was recommended.

1898—This was a revolutionary year in the history of the institution. The infants were removed to pavilions and the main hospital was practically rebuilt except the walls. There were new plumbing, new floors and new metal ceilings throughout.

Beginning in January, 1898, all the bottle-fed infants received modified Walker-Gordon cream. At the March meeting Walker-Gordon cream was mentioned with praise.

April meeting. The executive committee reported that Mr. N. Straus had given a pasteurizing apparatus for milk. This proved to be a set of eight copper boilers instead of the tin ones used until then. The committee also commended the nurse in charge of the milk.

In May, "Attending Physician Stowell reported more and better nurses than heretofore, more graduate nurses and therefore better results." The number of wet-nurses was increased from twenty to fifty and they nursed 139 babies. "No change in diet," says the paper.

Beginning in January all infectious diseases were removed from the island by the Department of Health, thus saving mortality figures at Randall's Island.

Boarding or farming-out was resumed in April, sixty-one babies being sent to country homes. "No change in hygiene was made?"

The superintendent's report to the commission contains this: "Many improvements were inaugurated and carried out."

1901—January. Dr. Neff reports a great number of infants in bad condition, and says: "The milk fed the children should come from the cows on the island" (referring to bottle-fed infants).

1903—October. "An average of thirty babies daily have received modified milk prepared from Walker-Gordon cream. Cooley creamers have now been provided and hereafter we can produce our own gravity cream." This was in the hope of having fresh cream with low bacterial count.

Thus we find that Walker-Gordon cream was in use for six years, 1898-1903, whereas the article referred to credits "a carefully selected herd on the island." Alas! the history of that herd and their tuberculosis has been published (*Medical Record*, June 20, 1908).

It is a matter of record that sterilized milk was in use there as early as 1890, and that pasteurized milk was in use through all the years of the table. "Before and after the use of pasteurized milk," are therefore contrary to fact. Instead of "no change in hygiene," there was removal of some infants to pavilions, some to the country, and all the contagious cases from the island. Instead of "no other change in diet" witness the records:

	1897	1898	1899	1900	1901
Orphans wet-nursed	21	138	152	156	159
Orphans bottle-fed	591	506	462	389	262

The percentage of deaths was at its highest point under pasteurized milk. Other factors caused the fall, not pasteurized milk.

WILLIAM L. STOWELL, New York.

Visiting Physician to the New York City Children's Hospital and Schools, Randall's Island.

[A proof of the above was referred to the authors of the article criticized and they reply:]

To the Editor:—The statistics quoted in our article were taken from page 243 of the chapter on "Morbidity and Mortality Statistics as Influenced by Milk" in Bulletin 56 of the Hygienic Laboratory, entitled "Milk and Its Relation to Public Health." The article is written by Dr. J. M. Eager, Assistant Surgeon-General, Public Health and Marine-Hospital Service. No reference is made to the original source of these statistics, and we took it for granted that they were taken from the reports of the Infant Asylum at Randall's Island, by the government official. We have not had a chance to examine the original records giving the mortality figures for the Infant Asylum at Randall's Island, and are glad to note that Dr. Stowell says that the figures quoted "are correct for the most part."

The fall in the death-rate since 1879 is attributed in our article to the installation of a pasteurizing plant. The extracts from the minutes of the meeting of the medical board of the institution show that the pasteurizing plant was given by Mr. Nathan Straus to the institution in April, 1898.

Extracts from the minutes are quoted to show that before this time the milk had been sterilized, and that in 1895 the milk was heated in large steam caldrons in the kitchen, and in 1896 in wash boilers, heated over gas stoves. From the comments on the methods of "sterilization" practiced, appearing in the extracts of the minutes for 1890 and 1893 it appears that they were not carried out very satisfactorily.

The improvements made since 1897 in the sanitary conditions of the institution, and in the care of the patients are such as have been made in many other infant asylums and hospitals. In the report of the Department of Charities for 1893 there is recorded a long list, covering three pages, of improvements in the building, equipment and caretaking. Why did this not result in an immediate lowering of the death-rate in 1893?

Bottle feeding was practiced quite as extensively in 1898, as in 1897, and the percentage of deaths in the two years is 44.36 and 19.80, respectively.

After a careful study of the extracts from the minutes quoted in Dr. Stowell's letter, we are still of the opinion that the fall in the infant mortality, beginning in 1898, simultaneously with the installation of improved pasteurizing apparatus given by Mr. Nathan Straus, is due to the change in diet and cannot be explained on the basis of sanitary improvements or attributed to the other changes made in the institution.

GOTTFRIED KOEHLER, M.D., Chicago.

Assistant Commissioner of Health.

C. ST. CLAIR DRAKE, M.D., Chicago.

Assistant Chief, Bureau of Vital Statistics.

Not Prepared to Furnish Cancer Serum

To the Editor:—In the New York news in THE JOURNAL, January 28, it is stated that I have announced that I am prepared to supply a serum which has been shown to be effective in treating cancer. This statement is wrong. The dispatches which have appeared in the daily press referring to an interview in one of the Buffalo papers have been so changed from the original as entirely to misrepresent my position.

I have not announced a cure for cancer. Neither do I believe that vaccination will be beneficial in more than a limited percentage of cases. The results obtained in this laboratory have shown that methods which have given experimental results with animals have some applicability in human beings. There have been encouraging results in a limited number of cases. The method is not applicable in advanced cases; some patients have done badly under this treatment.

The matter is still in the experimental state, and it is not possible to place the vaccine in the hands of the profession, nor would it be desirable for patients to come to Buffalo at the present time. The results have been sufficiently encouraging, however, to warrant asking the State of New York to provide a hospital for the purpose of developing and elaborating this and other methods of treatment for cancer.

HARVEY R. GAYLORD, Director of Cancer Laboratory.

Pneumonic Plague in China

To the Editor:—Noting the pneumonic character of the plague in China and the fact that there are no dead rats, I would say that while in Siam it was my observation and knowledge that the pneumonic form of the disease was contracted from patients with the bubonic form and from rats, I have also found dead rats and dead chickens under the houses of those dead of the pneumonic form of the plague.

Eleven people died in one house of the pneumonic plague. The disease was carried by infected rats which traveled from Korat, where the bubonic form prevailed, in freight trains loaded with rice, to Ban Phagi, 100 miles away, where plague in the pneumonic form broke out ten days later than at Korat. The reason the pneumonic form was not so prevalent in Siam is that the people live practically in the open air, so that personal contagion is greatly eliminated.

CHARLES S. BRADDOCK, JR., New York.
Late Chief Medical Inspector, Royal Siamese Government.

A Correction of the Carnegie Foundation Report on Medical Education in Montreal

To the Editor:—Permit me to utilize your columns in order to rectify an error in Bulletin 4 of the Carnegie Foundation, dealing with Medical Education in the United States and Canada. I refer to my account of the medical department of Laval University, Montreal. This institution is entirely distinct from Laval University, Quebec, which also has a medical department. The Quebec school, however, publishes in its catalogue certain data respecting the Montreal school, and I inadvertently give in my account of the Montreal school some material taken from the inadequate statement in the Quebec catalogue.

The staff of the Montreal school numbers 50, of whom 20 are professors.

The number of beds in the two general hospitals used should have been given as 290, and an additional statement that the school has several supplementary hospitals should have been made.

The lectures on chemistry for medical students are given by a professor in the medical faculty.

ABRAHAM FLEXNER, New York City.

Queries and Minor Notes

ANONYMOUS COMMUNICATIONS will not be noticed. Every letter must contain the writer's name and address, but these will be omitted, on request.

AGAR-AGAR IN CONSTIPATION

To the Editor:—Please describe the use of agar-agar in the treatment of constipation. X. Y. Z.

To the Editor:—Please give references to the literature on the agar-agar treatment of constipation. J. K. B.

ANSWER.—A small proportion of constipated individuals owe their constipation to a too vigorous digestion, which removes from the intestinal contents all the soluble and nutritive constituents and leaves a mass which becomes hard and dry, and in which bacteria fail to produce the acids which normally stimulate the bowels to move. This difficulty is often increased by a too nutritious diet; that is, the patient is not in the habit of eating enough food with debris in it, such as whole wheat or graham bread and the vegetables and fruits which have indigestible fibers.

For this condition agar-agar is prescribed because it is an insoluble and indigestible substance with a marked affinity for water; consequently, when a considerable quantity of it is taken it absorbs water in the intestinal canal, and thus renders the feces soft and bulky. The softness ensures easy passage and their bulk stimulates the action of the bowel on the principle that tension of a muscle arouses its contractile power.

Agar-agar is found in commerce in the form of strips, which must be ground or cut into small pieces for use. It can also be obtained in the form of a coarse powder. It is administered in a dose of from a teaspoonful to a tablespoonful, or more, once or twice daily, mixed with some form of food, such as cereal, stewed apples, etc. The following articles discuss this subject:

Schmidt, A.: Explanation and Rational Treatment of Habitual Constipation, *München. med. Wchnschr.*, Oct. 10, 1905; abstracted in *THE JOURNAL*, Dec. 23, 1905, p. 192.

Mangelsdorff: Agar-Agar in Habitual Constipation, *Therap. Monatshefte*, May, 1908; abstracted in *THE JOURNAL*, June 20, 1908, p. 2117.

Gompertz, L. M.: Chronic Constipation Clinically Considered, *Am. Jour. Med. Science*, October, 1909.

Martinet, A.: Agar-Agar in Chronic Constipation, *Presse Médicale*, Paris, March 30, 1910.

Gompertz, L. M.: Agar-Agar Treatment of Chronic Constipation, *Practitioner*, London, May, 1910; abstracted in *THE JOURNAL*, July 2, 1910, p. 89.

Morse, L. J.: Agar-Agar in Treatment of Constipation in Childhood, *THE JOURNAL*, Sept. 10, 1910, p. 934.

WORKS ON PRODUCTION OF CLEAN MILK

To the Editor:—I note in *THE JOURNAL* (January 7, p. 48), an editorial on milk production, in which you refer to an article in *Hoard's Dairyman*. Please give me the address of the publishers, and the names of publications and publishers of any other recent works on the production of clean milk.

W. B. SUMMERALL, Atlanta, Ga.

ANSWER.—*Hoard's Dairyman* is a periodical published in Chicago, at 164 Dearborn Street.

The following are some of the books which may be consulted on this subject; the Hygienic Laboratory bulletin gives a very complete bibliography:

Pearson: Jensen's Milk Hygiene, J. B. Lippincott Co., Philadelphia.

Spargo: The Common Sense of the Milk Question, Macmillan Co., New York.

Milk and Its Relation to the Public Health, Bull. 56, Hyg. Lab., U. S. Public Health and Marine-Hospital Service, Washington, D. C.

Ward: Pure Milk and the Public Health, Taylor and Carpenter, Ithaca.

WATER SUPPLIES AND TYPHOID

To the Editor:—Three or four years ago *THE JOURNAL* published a comprehensive article on the water-supply of cities, showing the sources of water and the death rate from typhoid during the year. I have probably loaned the article and am not now able to locate it with the indexes at hand. Can you give me the date on which it appeared, and also any more recent articles along this line?

G. L. KING, Alliance, Ohio.

ANSWER.—The article referred to is probably one which appeared serially in *THE JOURNAL*, May 18 and 25 and June 1 and 8, 1907. Other articles on the subject which may be of interest are as follows:

Typhoid Epidemics at Ithaca; special article in *THE JOURNAL*, March 21 and 28 and April 4, 1903.

Typhoid Epidemic at Butler, Pa.; special article in *THE JOURNAL*, Dec. 12, 1903, p. 1476.

Fulton, J. S.: Typhoid Fever and Hindrances in Its Prophylaxis, *THE JOURNAL*, Jan. 9, 1904, p. 1.

Johnson, W. S.: Quality of Public Water-Supplies, *THE JOURNAL*, Aug. 31, 1907, p. 762.

Clark, H. W.: Filtration of Public Water-Supplies, *THE JOURNAL*, Aug. 31, 1907, p. 764.

Dutton, W. F.: Responsibilities of Municipalities in the Ohio Valley for Epidemics of Typhoid Fever, *THE JOURNAL*, Oct. 31, 1908, p. 1496.

Breitenbach, O. C.: Choleraform Diarrhea of Cold Weather—"Winter Cholera," *THE JOURNAL*, Oct. 31, 1908, p. 1496.

Soper, G. A.: The Discharge of Sewage Into Tidal Waters, *THE JOURNAL*, April 17, 1909, p. 1221.

Evans, W. A.: Lake Michigan Water for Drinking Purposes, *THE JOURNAL*, Oct. 2, 1909, p. 1091.

Wood, H. B.: The Economic Value of Protecting Water-Supplies, *THE JOURNAL*, Oct. 2, 1909, p. 1093.

Lumsden, L. L.: Epidemiologic Studies of Typhoid Fever, *THE JOURNAL*, Oct. 16, 1909, p. 1257.

Typhoid Fever in Milwaukee and the Water-Supply; special article in *THE JOURNAL*, July 16, 1910, p. 211.

Fell, G. E.: The Currents at the Easterly End of Lake Erie and Head of Niagara River, and Their Influence on Sanitation of City of Buffalo, *THE JOURNAL*, Sept. 3, 1910, p. 828.

Dutton, W. F.: Present-Day Problems and Progress in Prevention of Typhoid Fever, *THE JOURNAL*, Sept. 3, 1910, p. 834.

Typhoid Fever in Detroit and the Water-Supply; special article in *THE JOURNAL*, Oct. 8, 1910, p. 1234.

Typhoid Fever in Des Moines, Iowa, and the Water-Supply; special article in *THE JOURNAL*, Jan. 7, 1911, p. 41.

WHY THE FETUS DOES NOT DROWN IN THE LIQUOR AMNII

To the Editor:—Why is it that the fetus does not drown in the bag of waters?

H. K. M.

ANSWER.—Until the fetus is expelled into the world the lungs are in a condition of complete atelectasis. No respiratory movements have occurred; hence there has been no opportunity for the liquor amnii to enter the air cells. The fetus obtains its oxygen through the maternal blood and cannot drown. After expulsion there does not remain a sufficient amount of liquid in the air passages to interfere with breathing.