

The effluent drain-water has fewer micro-organisms than the water of the Seine when it enters Paris. It has the purity of spring-water coming from the earth. To demonstrate the utility of the system as applied to agriculture has been slow and difficult, and not less laborious than the efficacy of epuration. For the latter the analyses made by the savants were proof beyond dispute, for the former the concurrence of the humblest practitioner; and it required time, much time.

The slowness of experiments in agriculture may be understood when we remember that to reach an end we must go through all the phases of vegetation, from the sowing of the seed to the harvest. To-day our cultivators are in complete possession of their art, and in the recent horticultural exhibition every one admired the remarkable products which received honorable distinctions.

In agriculture, successes which would be shown by beautiful samples obtained in the fields of experiment would be objects of curiosity. It is necessary to secure economical results, and these go far beyond the utmost expectations. For the landlord of the soil the rent value of the hectare has increased five-fold—from 90 to 450 francs. For the farmer or cultivator the prosperity has not been less. The net value of vegetable products rose from little or nothing to 4,000 francs per hectare.

In a sanitary point of view, the results have not been less satisfactory, and here again it is necessary to observe the facts on the ground. One sees a numerous population, robust and healthy in proportion to its prosperity. Its vigor assures a healthy nutrition equivalent to its works, which is the best hygiene.

As to the effects of irrigation, the same occurs at Gennevilliers which always takes place where irrigation is practised: from the moment it is made frequent, without stagnation, and at regular intervals, a condition which is far from favorable for the development of paludal

influences. The determining causes are eliminated; a constant activity is maintained in the vegetable life, which absorbs in its circulation all its own residues and all the organic elements placed within reach.

Highly to the honor of the city of Paris be it said that, by the perseverance of its representatives, by the science and devotion of its engineers, the problem of epuration of the residues of cities and of their utilization by agriculture is absolutely and definitely solved. We have no longer the experiment of Gennevilliers; we have a system permanent and regular for the future.

The population of Gennevilliers has increased by farmers coming to occupy the lands, thirty-four per cent. in ten years. Among the city documents of Paris lately presented to the city of Boston, and placed in the Public Library, may be seen photographs of the departments of this branch of the municipal service as well as of the products of the land. The commission, in recommending the acceptance by the city of the terms which the state proposes for the extension of the work so as to include the sewage of the entire city, recommends a municipal ordinance which shall require all the water-closets in the city to be connected with the drains, and an absolute abandonment of cesspools, which now are so common in Paris. Up to the present time the city has declined to accede to the terms of the State, as they are deemed too exacting and require a very large amount of money for the purchase of the land. The success of epuration by this method is not questioned. The work of Babut du Maris, lately published, says "the city has just obtained 2,500 acres for the extension of the sewage farm."

During the past ten years sanitarians and engineers have made great progress toward a solution of this question of the utilization and purification of sewage, and it is fair to presume, from the great increase in the number of cities and towns