THE FURTHER DEVELOPMENT OF ANTI-TUBERCULOSIS WORK IN NEW YORK STATE

Preliminary Report and Recommendations of the Committee on Tuberculosis of the New York State Health Commission

by John A. Kingsbury, Chairman of the Committee

The very substantial progress which has attended the efforts to combat tuberculosis during the past twenty-five years has shown that this disease eventually can be controlled. The tuberculosis death rate has been reduced by 53 per cent in up-state New York and by 50 per cent in New York City since 1907. While decreases in mortality have occurred among persons in every age period, the greatest saving of lives has been among infants and children and among wage-earning men; this reflects perhaps more specifically the efforts to protect the children from infection in tuberculous families and the sanatorium care of persons affected with the disease, although many other anti-tuberculosis and public health activities as well as social and economic changes have contributed to the general result. The reduction in the mortality rate is an accomplishment of which the State justly can be proud. But great as it undoubtedly is, it cannot be looked upon as the attainment of an ultimate goal, for a situation still exists which challenges

1 The New York State Health Commission was appointed on May 1, 1930. The Committee on Tuberculosis is one of several subcommittees which were appointed to study present-day public health problems in the State, and to make recommendations looking toward the development of more effectual public health protection. Serving on the Tuberculosis Committee with Mr. Kingsbury were: Miss Grace L. Anderson, Dr. Reginald M. Atwater, Dr. Edward R. Baldwin, Bailey B. Burritt, Miss Alta E. Dines, Dr. Albert H. Garvin, Edward Hochhauser, Harry L. Hopkins, Dr. Harry E. Kleinschmidt, Dr. E. P. Kolb, George J. Nelbach, Dr. John M. Nicklas, Dr. Robert E. Plunkett, Dr. Frederick Rand Rogers, Dr. George C. Ruhland, Fred M. Stein, and Dr. Nathan B. Van Etten.
the best efforts of scientists engaged in research, of the medical profession, of the public health officials, and of social and relief agencies. The successes so far gained should be regarded merely as preliminary victories in the warfare against the disease and should give an incentive to greater effort. The time has come for reaping the fruits of successful experience by more extensive and more direct application of that experience, and an enlarged effort will be peculiarly opportune in the next few years.

The Tuberculosis Situation in New York State Today

The fact must be faced squarely that the tuberculosis situation in the State is still far from satisfactory. It may be summarized by a few simple statements that, without any rhetorical embellishment, are eloquent and emphatic in themselves:

1. In 1929, over 4,000 deaths from tuberculosis occurred in up-state New York. Most of these deaths could have been prevented if adequate facilities existed for the efficient application of existing scientific knowledge of the prevention of the disease and of the care of tuberculous patients.

2. A conservative estimate, based on the ratio of cases to deaths, is that probably not less than 20,000 active cases of the disease exist in up-state New York and not less than 25,000 cases in New York City. Thousands of these cases are undiagnosed and untreated. It is safe to say that if modern facilities for the prevention of the disease could have been provided in all parts of the State, for all classes of the people, and with full cooperation and proper coordination of public health, medical, and social services, a large proportion of these 45,000 cases would not exist today.

3. The tuberculosis death rate in the urban areas of the State in 1929 was more than 35 per cent higher than the
rate for rural areas, and in New York City it was 45 per cent higher than in rural areas. Although the death rate has been considerably reduced, the problem of urban tuberculosis thus still exists; it continues to be bound up with such conditions of life and work peculiar to cities as unsatisfactory housing and the opportunity for infection, the lack of light and fresh air and outdoor recreation, the handicaps of poverty, and industrial hazards, all of which are conducive to the breakdown of resistance to the disease.

4. The fact that the decline in the tuberculosis death rate in rural areas has not kept pace with that in urban areas during the past ten or fifteen years is one of especial significance. It can be interpreted to mean that the facilities for prevention and care are grossly inadequate and ineffective and the mortality rate, although lower than in urban areas, is inexcusably high in the country, which ordinarily is considered as most favorable to a low prevalence of the disease.

5. The disease still takes its largest toll in life and illness among children, among men in the period when their economic value is at its maximum, among women at ages from 20 to 35 years, the period of their greatest fertility as well as highest earning capacity, and thus among adults of both sexes when their responsibility for the next generation is greatest. In fact, the social consequences of tuberculosis are still more serious than those of any other disease. As Mr. Homer Folks recently said in his DeLamar lecture at Johns Hopkins University:

"We are entitled to great encouragement from the decline of tuberculosis, but perhaps we are beginning to feel too comfortable about it. Noting that in the total mortality rate five or six other diseases now stand higher, we are likely to overlook the fact that those deaths fall preponderantly in the very early or the late periods of life, and for that reason are less significant as a factor in human happiness.
ness and well being. Each death from tuberculosis rings down the curtain on a tragedy, which has continued, usually, over a period of years, and so involves a wide circle of suffering, loss, and harmfulness, extending far beyond the individual patient. Even if he apparently recovers, many of these losses have already been incurred, the economic security of the family remains precarious, and oftentimes the evil day is only postponed."

These facts unerringly point to the need for more adequate protection of infants and young children from infection, for further study of industrial and occupational hazards and for more effective means for their mitigation, and for more adequate care of tuberculous patients and their families, especially those in which the disease is a catastrophe that entails grave economic and social consequence.

**General Considerations as to Policies**

Recognizing the situation which has been briefly depicted above, the committee has considered practicable ways in which it can be met. At this time, it desires to outline very briefly certain general considerations upon which further recommendations will be made in its final report, and to make certain specific recommendations for immediate attention.

The possibilities of wider and more efficient application of existing knowledge. There is every reason to believe—as indeed the available evidence clearly shows—that the death rate from tuberculosis and the number of active cases cannot be reduced to a much greater extent by existing facilities and by methods now generally used. Yet the knowledge we already have of how to prevent and cure tuberculosis is sufficient to bring about far greater reductions in its prevalence and its mortality if this knowledge can be applied in an adequate manner to a larger proportion of our population.
In fact, actual experiments and demonstrations have shown that further reductions can be effected by using more effectively the existing methods of combating the disease. For example, it is a thoroughly established fact that if more adequate facilities are afforded for the discovery of active cases as sources of infection, the problem of caring for those who are exposed to these sources will be greatly simplified. It is known that if persons, particularly infants and children, can be protected against infection from active cases in the family, the disease can be prevented in a far greater degree than it is now. It is also known that if the methods already tried and proven successful in the discovery of cases in their early stages can be extended, the chances of recovery are greatly increased. The prevalence of tuberculosis has long been known to be associated with poverty, with domestic over-crowding, with certain industrial dusts, with over-fatigue, with malnutrition, with lack of sunshine and light, and with insufficient or unwholesome recreation; efforts to remove or ameliorate these conditions aid the population to increase its resistance to the disease. Such measures and methods as these, discovered by patient research, aided by accretions of mechanical invention, developed by experiment in actual practice, and tested by results, await a wider application by the public through its officially constituted agencies.

The possibility of applying the existing knowledge of tuberculosis prevention and cure more effectively on a wider scale depends, however, upon more efficient public health and social welfare and relief machinery. And among the most important steps in this direction, the committee believes, is their rapid improvement.

Development of efficient city and local health departments essential to effective tuberculosis activities. A consideration
which the committee regards as of fundamental importance is that tuberculosis prevention and cure can be brought about most effectually only when integrated with well-organized local health organizations and when there is active cooperation with the medical profession and when proper facilities are available for hospitals and social service relief. The experience of twenty-five years has clearly shown that antituberculosis activities cannot be carried on to the best advantage separately from other public health, medical and social service, and relief work; they must be woven into all of the public health and welfare activities in which State and local, public and private agencies engage. Such a coordination of effort must be gradual, of course; it can be effected only step by step. But it is almost useless to attempt to coordinate State and other anti-tuberculosis activities with inefficient local health administrations that are unable to discharge the responsibility for the discovery, diagnosis, reporting, and sanitary supervision of cases of the disease in the areas where they occur. For this reason, the committee regards the more rapid development of well-rounded city and county health departments throughout the State as basic to the further development of the anti-tuberculosis work of all agencies during the coming decade.

The quality of services now rendered in the promotion and care of the disease and in the care of tuberculous patients should be improved. It is unanimously agreed by all who are in a position to judge that the need for improving the quality of the services now rendered is urgent. This involves better equipment for diagnosis, such as the X-ray and fluoroscope, for use, by the personnel of State and local institutions and by the medical profession; better qualified medical officers in public tuberculosis sanatoria and hospitals; especial instruction in tuberculosis for nurses and social and relief personnel;
more rigid supervision of local tuberculosis clinics and dispensaries and of private nursing homes and boarding and rooming houses in which tuberculous patients are cared for; a further coordination of activities relating to tuberculosis of the State Health, Education, and Social Welfare Departments, particularly with respect to the training of personnel; better facilities for the wider information of the public as regards the disease, more effective health teaching in the schools, and a marked improvement in the vocational training and rehabilitation of cases; uniform records of cases and of tuberculous families.

These improvements are necessary if the facilities and services which the State has already undertaken to provide and render are to keep abreast of modern methods of preventing and treating the disease. There is no new policy involved here; rather is it the application of the sound principle that the State should do efficiently what it has set out to do.

**Social welfare and relief are an essential part of an effective anti-tuberculosis program.** The peculiar social consequences of tuberculosis to the affected individual and his family make it necessary that adequate provision should be made for the efficient administration of social welfare and relief. Provision is already made for some welfare and relief activities, but at present they are inadequate, poorly coordinated, and not well supervised. It is evidenced by studies in up-state New York, for example, that there is a failure to maintain the essential continuity needed in the care of tuberculous patients and their families; this is due in part to the lack of proper supervision and in part to inadequate knowledge by the local personnel of the social and relief problems involved. The committee is strongly of the opinion that adequate provision should be made by new legislation to supplement...
the existing laws, that State, county, and city tuberculosis hospitals and sanatoria should be authorized to employ hospital social workers, and that administrative improvements should be effected whereby the public health, welfare, and civic authorities, both official and voluntary, can promote continuously a better utilization by the counties and cities of the provisions in the Public Welfare Law and the Poor and Child Welfare Act for charitable relief in tuberculous families. It is fully realized that under present conditions the social welfare and relief activities are decentralized and that with so large a number of health officers and commissioners of welfare it is difficult in the circumstances to obtain proper coordination, but the need for better coordination is imperative.

The after care of the tuberculous. The problem of the after care of the tuberculous who have been discharged from sanatoria or from other institutions and who either cannot or should not go into full-time industry without a period of either further treatment or some form of supervised recuperation or part-time work, is a very real problem both from the point of view of the individual and his family and from the point of view of the State. Neither the State nor the private agencies have as yet found the way to solve this problem, nor do they quite know the size of it. They do, however, know the seriousness of it and the wastefulness that is due to the inadequacy of the present method.

In order to make effective all the enormous expenditure in medical and social work that is being put into the problem of overcoming the acute stages of the disease in sanatoria and institutions, there is no more important phase for the State to study and take forward steps on, than the after care problem of the tuberculous. The committee, therefore, suggests that, in order to take intelligent action, a committee be
appointed of those best informed in this problem, to make a careful study and constructive recommendations.

Need for more sanatoria. This is regarded by the committee as of extreme practical importance at the present time. Since 1909, when the County Tuberculosis Hospital Law was passed, nearly all of the larger counties in this State have created sanatoria. Many of the smaller counties, however, most of which have populations of less than 35,000, have not found it possible to create such institutions and it would certainly not be economical to maintain them. As a result, there are twenty-four counties in up-state New York with a total population of more than 1,119,000 without public sanatorium facilities and the State and counties have only about 60 per cent of the hospital beds necessary for the segregation of tuberculous patients. Furthermore, a number of the counties which have constructed sanatoria find it increasingly difficult to maintain proper standards because of cost. In these counties without sanatoria and in counties with sanatoria that cannot meet the accepted standards of medical and other care, there seems to be no other alternative except the provision of modern sanatorium facilities by the State.

Facilities for research. Although the wider application of existing knowledge of prevention and cure of tuberculosis will undoubtedly result in further reduction of its prevalence and mortality, there are many unsolved questions in the etiology and epidemiology of the disease, and many opportunities for further improvement in methods of prevention, care, and relief. The solution of these should be aided and all op-

2 The New York State Legislature, in the spring of 1931, made provision for carrying out this recommendation, which prior thereto had been incorporated into a preliminary report of the New York State Health Commission and conveyed to the Legislature as part of a special message from Governor Franklin D. Roosevelt. Specifically, the new law provides an appropriation of $750,000 for the purchase of sites for three district State sanatoria and for the construction of one of them during the fiscal year beginning July 1, 1931.
opportunities should be taken advantage of in order to promote efficiency and economy in the greatest possible degree.

Unfortunately, however, the anti-tuberculosis agencies of the State exist today without proper facilities and equipment for conducting that sort of research which is recognized as essential to the efficient conduct of so large and important an organization. We cannot rest content in the false assumption that all of the knowledge necessary for the control of the disease is at hand. Further research is needed in order to discover the conditions which break down resistance to disease that are involved in the mode of living and in the conditions of work. Further research is also necessary in the most economical and efficacious administrative procedure. Carefully planned and conducted experiments in modes of preventing infection or bringing about immunity, in providing better methods for caring for infected children and tuberculous patients, and in the administration of social and relief measures, are highly desirable. These lines of research should be encouraged by the State, either in collaboration with existing research organizations or within its own organization in cooperation with local health and social agencies.

**Recommendations**

Having in mind the situation and the more urgent needs, the committee has formulated certain legislative recommendations. Briefly summarized, these are:

1. That the State provide and maintain at least three additional sanatoria for all types of tuberculosis cases, to be located geographically with reference to the unmet needs of sections of the State.

2. That in connection with the State sanatoria, there shall be established suitable institutional and field facilities for finding, instructing, and following-up patients.
Market day in a Chinese village
A Chinese barnyard scene and privy
3. That the Public Health Law be so amended as to place more definitely upon the local health officer the responsibility for bringing about the discovery, registration, and sanitary supervision of all cases of tuberculosis.

4. That adequate provision be made for social service and relief for tuberculous patients and their families.

5. That the Public Health Council be authorized to prescribe the qualifications for the position of chief medical officer of the public tuberculosis sanatoria and hospitals (State, county, and city) and that no such official shall receive appointment unless he possesses such qualifications, except that such qualifications may be waived, pending the availability of a qualified candidate.

6. That the State be enabled to provide through the State Sanatorium at Ray Brook, as at present, through the proposed State district sanatoria, and through the State Department of Health, facilities for the study of tuberculosis by physicians in all diagnostic and treatment procedures, including the use of the X-ray and fluoroscope, and also that authority be given to county and State tuberculosis sanatoria to establish an affiliated cooperative relationship with the training schools for nurses, whereby pupils may receive special courses of instruction in tuberculosis.

7. That the State Commissioner of Health shall be authorized to prescribe a uniform system of records for the administrative control of tuberculosis, to be kept by the appropriate local health authorities and that the State Health Department be enabled to furnish the proper blanks for such records to the local health authorities free of charge.

8. That the power of licensing the local tuberculosis dispensaries and clinics whether conducted by public authorities or voluntary agencies, be transferred to the State Department of Health from the State Department of Social Welfare.
and that such licensing power thus lodged in the State Department of Health include power to the Public Health Council in its discretion to prescribe rules and regulations for the location, quarters, equipment, staff, and administration of such dispensaries and clinics.

9. That all tuberculosis sanatoria not operated by public authority, all rooming and boarding houses and nursing cottages in which tuberculosis cases are housed will be required to secure a license annually from a public health authority and that the Public Health Council be given power to establish rules and regulations for the organization and operation of such sanatoria, rooming and boarding houses, nursing cottages, and other establishments or agencies for the care of tuberculosis.