

To overcome this the physician, in his daily round of work, can do very much more, indeed, than all other educators combined, and through his wise and persistent advice such a change of feeling might soon be brought about as would loosen the general purse-string. The beneficent effect of the action of efficient Health Boards is readily seen in the resulting decrease of disease, and every medical man should further their efforts in every way possible. Not a privy pit should be allowed to exist anywhere. Wells should be so constructed as to prevent the entrance of surface and subsoil water down to an impermeable clay stratum. Dumping grounds should be provided for the proper disposal of refuse and garbage. A pure water supply should be obtained, and thorough cleanliness encouraged of cellar and surface soil. Phthisical patients and their families must be instructed as to the infectious nature of consumption, and taught to employ a proper method of destroying the sputum, thus lessening for themselves and others the danger of contracting the disease. The milk supply should be carefully watched, and wherever tuberculosis shows itself in our herds it should be stamped out. The use of tuberculin forms a ready and sure means of diagnosis. For the very poor at least homes for consumptives should be provided. To accomplish all this is the work of years, but not until typhoid and diphtheria practically disappear, and tuberculosis has become as rare as small-pox, can the best possible results be said to have been attained.

A REVIEW IN BACTERIOLOGY.

At the last meeting of the British Medical Association the President, Dr. Fox, in his able address on the "Medical Man and the State," alluded to some of the more recent advances in medical science during the last few years, prominent amongst which was the subject of "Bacteriology." He said: "It is in this realm of investigation that our profession has given some of the best services to the State." We would like here to recall some of these services, and their practical application both in preventing and relieving suffering.

During the past few years the investigations on enteric fever, typhus, plague, diphtheria, cholera,

pneumonia, phthisis, tetanus, glanders and abscess have, to a great extent, reorganized preventive medicine, and caused a great change in the treatment of those diseases.

The investigations of M. Pasteur have brought the death rate in rabies down to less than one per cent., and Pasteurian institutes are now established in India, Germany, Austria, France, England and America. To the same great scientist's researches, anthrax among sheep is being stamped out by a system of inoculation of an attenuated virus, rendering the animal immune.

Sir Joseph Lister's great discovery (at first only problematic, but now a household word), when applied in the various branches of surgery has not only rendered possible many operations hitherto never attempted, but also has saved thousands upon thousands of lives in the ordinary operations and application of surgical treatments. It is now demonstrated that abscesses caused by the staphylococci have a tendency to remain localized, whilst those due to streptococci are followed frequently by metastatic abscesses, as in erysipelas, puerperal fever and ulcerative endocarditis.

The researches of Koch and Fraenkel, the representatives, as it were, of the two great schools in Germany, have revealed the tubercle bacilli and the pneumococcus, establishing the fact that the diseases tuberculosis and pneumonia are due solely to specific micro organisms which are capable of being cultivated, and on reinoculation of again producing the disease in question, thus proving beyond any doubt the contagiousness of these diseases and the necessity of proper isolation and disinfection. The discovery of Koch, by which he hoped to destroy the tubercle bacilli in the human subject, while not proving as satisfactory as at first expected, yet marks a great advance towards the desired end, having, as it has, a decided curative action on all tubercular skin affections.

Although typhoid fever has been demonstrated as a disease due to a specific bacillus, yet in this disease we find numerous other micro-organisms accompanying, such as streptococci pyogens and the staphylococcus aureus and albus. What part they play in the disease is accounted for by several authors in several ways, but none is generally accepted; in fact, the whole matter is deeply