I quite anticipate that these opinions will be freely challenged. Paracentesis as a routine treatment in acute otitis has, since its first introduction, so far as I am aware, never been questioned; but, on the contrary, is by every authority advocated and practised, so much so that there can be but few otologists who have ever allowed themselves to stand by and observe how a case would behave without puncture.

I feel I have only touched the borders of a vast and important territory. The cases that have come within the scope of my observation are not numerous enough, nor is their variety sufficiently great, even if the arguments were without flaw, to justify one in claiming that the contentions are beyond question or criticism, though I should be without apology if I were not a devout believer in the truth of the opinions to which I have given expression.

The results are, at any rate, sufficiently encouraging to induce me to hope that further investigation in this field may lead to more perfect treatment through fuller and more perfect understanding of the laws that govern Acute Otitis Media.

Art. VI.—Pneumonia: a Multiple Infection. By J. W. Moore, M.D., M.Ch., B.A. Univ. Dubl., F.R.C.P.I.; Diplomate in State Medicine and Ex-Scholar, Trin. Coll. Dubl.; Senior Physician to the Meath Hospital and Co. Dublin Infirmary; Professor of Practice of Medicine, Royal College of Surgeons in Ireland.

In a suggestive paper on "Varying Infection in Pneumonia," which was published in The New York Medical Journal, October 9, 1897, the author, Dr. W. H. Thompson, M.D., LL.D., of the Bellevue Hospital, writes thus:—"Of late years lobar pneumonia often fails to follow the definite course commonly ascribed to it. While its onset remains much the same in its suddenness, and in the rapid development of its acute symptoms, yet for some time I have

*Read before the Medical Section of the Royal Academy of Medicine in Ireland on Friday, November 19, 1897. [For discussion on this paper see page 80.]
declined to fix the probable date of the crisis or the duration of its subsequent stages. It may be that the advent in 1890–91 of the severest and most prolonged visitation of epidemic influenza recorded in history may have something to do with this change by contributing the influence of a mixed infection, but whatever be the cause, there is little doubt that acute lobar pneumonia now often departs more widely from its former characteristic course. In the histories of a series of eleven cases occurring consecutively in my winter service in Bellevue Hospital, in only three of them could it be said that they conformed to the old-fashioned type, with a definite crisis and a progressive change for the better afterward, while in three a partial crisis only occurred, and in five none at all. In eight out of the eleven the convalescence was very tedious, and marked by a variety of constitutional symptoms in which often the essentially toxic nature of the disease was strikingly indicated. Nothing could better illustrate than they did what a gain it was to modern pathology when lobar pneumonia was finally recognised as more an infection than an inflammation, and that its danger is due rather to systemic poisoning than to pulmonary damage. That infections by micro-organisms, however, should vary in their developments from time to time is what we should expect."

It will be observed from a close reading of the foregoing paragraph that Dr. Thompson inclines to the view that the varying phenomena presented by pneumonia in different cases probably depends upon a varying virulence of its supposed specific micro-organisms, the affection being regarded as an essential disease analogous to diphtheria, enteric fever, small-pox, or any other infective malady.

The micro-organisms in question are two—namely, (1) The Micrococcus of Sputum Septicaemia (Fränkel), Micrococcus pneumoniae crouposae (Sternberg) or Diplococcus pneumoniae (Weichselbaum), and (2) the Pneumococcus (Friedländer) or Bacillus pneumoniae (Flügge). The former is now generally recognised as the usual agent in the production of acute croupous pneumonia, or, as I much prefer to call it, pneumonic fever. It was discovered by Dr. George M. Sternberg, now Surgeon-General of the United States Army, in