

how comes it that these arteries, these kidneys, this heart, are so changed? For all this is no swift infliction; it signifies modifications implying a long duration and gradual progress, modifications which again cannot have been without their insidious causes to take us farther back still; and so on. Thus, as in tuberculosis, we are laying aside the attitude of amazement or resignation, and are putting on that of the scout; if perchance we may detect the first approaches of the enemy, or even by timely diplomacy prevent him before war is declared. We are receding from the fatalism of the early pathological anatomists, and returning to that desire for more and more timely forecast which distinguish the schools of Cos and Cnidus; the forecast in which lie the proof of scientific knowledge and the means of prevention.

At the present time we are enthusiastic in the foreknowledge and prevention of tuberculosis; we are waylaying the epidemics in their courses; we are ardently pursuing the tracks of cancer; and as one by one we disarm them, we are gathering understanding and hope. It is my desire to-day to bring you to a like encouragement in respect of the apoplexy of cerebral hemorrhage.

That cases of "stroke" are not all the same kind, we have known for some time past; especially since the researches of Kirkes. On the cases in which healthy arteries are blocked by casual embolism, however, I have not now to speak; moreover, we will set aside all cases in which the effects of extrinsic poisonous or bacterio-toxic agents are concerned. We are to consider those in which disease of long-standing is found in the arteries about the seat of the hemorrhage. In a large number of these cases, however, we find no effusions of blood, or none in bulk, at any rate; the circulation of the brain is arrested, but by a silting up of the arteries rather than by rupture of them. Moreover, in these cases we find that the heart, abnormal as it may be, does not indicate present or previous hypertrophy; often indeed an atrophy. We find too that the arteries of these cases often present calcification of the middle coat, while the body at large is one in which senile change is far advanced, and probably not advanced prematurely—the patients do not run between sixty-five and seventy, but between seventy-five and eighty-five. In apoplexy by cerebral hemorrhage, the outbreak in the brain is no fault of this organ, but wholly its misfortune. By apoplexy we lose day by day able citizens whose mental powers before the fatal seizure were intact both in vigor and quality. The pathological signs are