

place and state for fifteen years at least, and exposed to the air and dust, and moreover had previously been preserved in spirits of wine. To his great astonishment and that of his pupils, the animal died an hour afterwards.

Can the chemist or the pathologist, who takes often more pleasure in verifying his diagnosis by *post mortem* examination than in his Therapeutics to prevent death, can either of them explain why a speck of vaccine lymph will protect a child from small-pox, for a period of years, while at the same time the old material of the body which has been vaccinated has been metamorphosed and carried out of the system, and new material has been substituted for the old? These facts will stand when the disbeliever and the dim of eyesight will pass away.

While upon the subject of infinitesimals affecting the tissues of the body, I may mention a few cases of what by medical men is called Idiosyncrasy, that is a condition which renders some persons more than others liable to inordinate impressions from certain stimuli.

Some of these might be referred to thus, Henry III. of France could not bear a cat to come near him. Tycho Brake trembled at the sight of a hare. Erasmus was always thrown into a fever when he ate fish. Ulandislaus King of Poland ran away at the sight of an apple, and the same fruit made de Quercito, secretary of Francis I., fall a bleeding. Carden the philosopher could not endure eggs. Crassus had an insurmountable dislike to bread. And Cardinal Hanny de Cardonne swooned at the smell of a rose, &c., &c., and so there is something, whatever it is, which passes from the orator, the musician, warrior or poet, into the life-blood of the multitude whose hearts they arouse into tumultuous action. Can the chemist detect any or all of these by tests, he has not done it as yet, but they are all facts, and these are equally strong facts, as to the effects of infinitesimal specific medicine acting curatively on abnormal cell structure. Notwithstanding bigoted disbeliefs, it would appear then from reflection upon these data, that there is a living force guiding the functions of all organism? That force may be incomprehensible, may be beyond the tests of the chemist, whether it acts in health or disease, or in the growth of organs.

It commences to act in the one embryo cell of about the one hundred and twentieth part of an inch in diameter, it guides the multiplication of that cell into other cells, in their formation of the bones, heart, brain, kidneys, and every organ, however intricate and varied, and it guides the ceasing of that multiplication of cells, when the organs have arrived at their full strength. So you will perceive when that force has to be reached, whether residing in a single cell or an aggregation of them in any organ, which is in an abnormal condition. To that your therapeutical artillery must be directed to penetrate, for all the changes, whether in the fluids or solids in dynamic diseases, are the consequences of alterations induced by the vital force. Now I must draw to a close by stating that there is a difference in the structure of all organic tissue, each organ performs its own duty, in its nutritive, formative and secretory functions, in its own peculiar way.

The mucous membrane of the mouth has its peculiar structure, whereby it pours out mucous, the salivary glands from their peculiar structure select from the blood and secrete saliva; the epithelial or villous lining of the stomach permits the digestive juice to flow, the liver to form its bile and grape sugar, the kidneys to discharge the duty of selecting the worn-out or effete tissues from the blood of the body which passes through them, and so on, every organ having its own characteristic and admirable structure for the end in view, and these organs all made in their intricacy, by characteristic cell growth, originated by the