

leucocytes with œdema of the boundary layer (the "lymphomatous" nephritis of Wagner). Lastly, all three may be combined. The first form is most common, but the type seems to depend upon the nature of the infection. The tendency of scarlatina for instance, to cause a glomerulonephritis or an acute interstitial inflammation is well known.

Occasionally the primary infectious diseases are ushered in by an acute nephritis, which may predominate the clinical picture, as in the so-called "renal typhus." Generally, however, the cases occur late on in the course of a specific infection, and are to be regarded as complications due to the effort at elimination. They are probably exaggerations of the common conditions of cloudy swelling, between which and true inflammation, no hard and fast line can be drawn. Again, some of these cases may be the result of a mixed infection.

Further, all grades of severity exist, from a mild inflammation up to a true local suppurative condition. The infection may be in some cases an 'ascending' one from the bladder, but more commonly a 'descending' one from the blood-stream. Only on the latter supposition can we explain the nephritides which occur in skin affections, anginas, and intestinal disorders.

It should not be forgotten that an acute attack may be grafted upon a chronic nephritis which was unsuspected, thus simulating a primary attack. ("Acute recurring nephritis" of Wagner.)

The idiopathic cases are those which occur in previously healthy persons; often the only causes that can be assigned are chilling of the body, or excessive exercise in the cold. This form is especially apt to occur in alcoholics. That there is some relation between the skin and the kidney seems clear.

The etiology of these and the forms occurring in chronic disease will be discussed later.

When we come to consider the production of chronic nephritis the task becomes more difficult. It is usual to teach that the acute cases may become chronic, and that the cirrhotic kidney is an end-stage of the chronic parenchymatous nephritis, or is due to arterial disease, or again, to certain poison, as alcohol, gout, and lead. (The "primäre Schrumpfniere" of the Vienna School.) This does not, however, explain all the cases; cases of contracted kidney occur where there was no history of any acute attack, and run an insidious course. And again, cirrhotic kidneys may occur in children, where there could be no question of arterio-sclerosis or chronic intoxications from mineral substances.

Further, the cirrhotic kidney has been known to result from infective diseases, as pneumonia (diplococcus), and influenza. The etiological elements in this form then seem to be very various, and the course apparently without any fixed rule.

While it is generally admitted that acute nephritis is in the immense majority of cases, due to some infective agent, as yet, I believe, no one