The pathological examination showed that there were present small portions of kidney tissue with some infiltrated muscle, and some caseous-looking material. The kidney showed nodules which were white in colour, and about the size of a split pea. On section these nodules were seen to contain a creamy-yellow material, which was firm enough in consistence to be scraped out. The sections showed a fibrous tissue stroma containing blood-vessels, around which were collections of lymphocytes. There were also seen some proliferative changes in the blood-vessels. There were no giant-cells nor definite tubercles seen, neither were there any areas of true caseation made out. In the sections of the kidney it was seen that the whole of its structure was distorted by an invasion of fibrous tissue. The glomeruli were surrounded by dense fibrous tissue, and the tubules, which were few in number, were shrunken and small. There was a diffuse infiltration by white cells of varying kinds, of which mononuclears predominated. Here and there the cell infiltration was darker, whilst in other places the admixture of varying types of cells gave rise to the appearance of granulation tissue. Some of these areas of loose tissue were delimited by fairly well defined fibrous bands. The vascular spaces were small but numerous. The larger vessels showed thickening of their walls. Plasma cells were seen throughout the tissue, and many fibroblasts were visible amongst them. The fibrous areas showed a strikingly diffuse permeation of the kidney relics by white fibrous tissue, and cell-aggregations were here scarce. Tubercle bacilli were not found.

It is clear that the evidence in this case, for or against tuberculosis, is conflicting. While it is almost out of the question to consider tuberculosis as a diagnosis when the typical systems of giant-cells are absent, or above all when no giant-cells occur, yet it is equally certain that cases have been described as tuberculous in which there was little more basis, microscopically, than in this case; and tuberculosis in the cow of the chronic type, affords exactly similar appearances to those here described. The only problem lies in the question of the possibility of this case being syphilitic in origin. In a syphilitic mass one would expect to see little more than occurs in this case; there would be the irregular cell-aggregations without any arrangement suggestive of a tubercle, and there might be no giant-cells. Plasma cells, occurring in large proportions, would also be a feature of a syphilitic lesion. On the other hand one would not expect to find such a diffuse change as occurs here, and one would expect to find a more localized gummatous mass with arrangement of cells at its edge. The present specimen shows numerous masses of granulation tissue with a very thin fibrous tissue