

[329] to 16.2 per cent, catarrhal jaundice 4.5 per cent, chronic alcoholic and fatty liver 6.9 to 8.33 per cent, luetic hepatitis 4.1 per cent, cirrhosis 3 to 13.4 per cent and in phosphorus liver 6 per cent. Falk and Hesky²⁸ showed that the urine of pregnant women contained increased amino acid N in 75 per cent of pregnancies. This they attributed to liver injury associated with pregnancy.

Falk and Saxl²⁸ have attempted further to follow the peptid N as well, determining both the amino and peptid N after feeding various nitrogenous foodstuffs to patients with normal and diseased livers. On feeding glycocoll to patients, they learned that diseased livers could not convert this amino acid into urea, but that it was excreted in part unchanged in [330] the urine. The peptid nitrogen they found increased when the amino N was high.

In a second communication these authors divided the liver cases into four groups, giving the results as indicated in the literature.

GROUP I.—Comprising tumors, sarcoma, carcinoma, leukaemia, amyloid disease, and chronic passive congestion. Normal amino and urea N values are encountered in sarcoma, leukemia, amyloid disease, and chronic passive congestion (Stadelmann). In carcinoma the urea N may be reduced while the amino N per cent is high.

GROUP II.—Consisting of various intoxications, *e. g.*: chloroform, phosphorus and alcohol; and febrile conditions, such as typhoid, scarlet fever, and pneumonia. The febrile diseases are associated with only slight diminution of urea N, while in the other conditions—phosphorus poisoning, for instance, the decrease is somewhat greater, 74 to 86 per cent (Münzer), 55 to 85 per cent (Sjöqvist) of the total N instead of the normal 91 per cent.

GROUP III (ICTERUS).—In 27 cases of catarrhal jaundice and cholelithiasis there was no appreciable reduction of urea N which remained 80 to 87 per cent of the total N (von Noorden), 85 per cent (Mörner and Sjöqvist). The amino N is occasionally increased 8.1 per cent (Mörner and Sjöqvist), 4.9 to 9.5 per cent (von Noorden). The amino and peptid N is increased 4.5 per cent (Glaessner), 4.6 per cent (Falk and Saxl).