

sterno-mastoids are felt to be rigid, and twitch in a clonic manner, as do also the muscles of the back of the neck. The chin is occasionally drawn downwards, and slightly to the right side. The tongue is not affected and no difficulty is experienced in swallowing. If the eyelids be forcibly separated, it is seen that the eyeballs roll about, showing that the extrinsic ocular muscles participate in the condition. When he stands, and especially walks, the spasms are worse, and so close his eyes that he becomes practically blind and has to be led about. His head rotates from side to side, and he endeavors to hold it still with both hands. There appears to be a serous discharge from the nose when the spasms are on, and the saliva seems to increase in amount; as a result of the former the patient continually sniffs, and this symptom appears to be a very constant one in cases of tic.

Dr. R. A. Reive kindly examined the eyes and reported as follows:

JOHN BURCHARD, age 57.

V.O.D. 201 (Hp.) + 1.00, spt. 20 xx +

O.S. 201 xx + 1.25, spt. 20 xx +

Fundus Ocl., normal.

Field " "

Tension " "

Muscular balance, normal.

Slight chronic conj., and slight photophobia.

Have ordered correcting lenses.

The spasms completely cease during sleep; they are very little affected by heat, cold, or light, although it was noticed in March that bright light brought the spasms on. As already stated, they are at their worst when the patient walks about, and are nearly absent when he sits or lies with the eyes closed. When he opens the eyes the spasms set in whether he be in the dark or in the light. By firm pressure on the affected muscles he can slightly control the spasms, but otherwise they are entirely beyond the control of the will. Romberg's sign is absent, but the knee-jerks appear to be gone. There are no sensory symptoms, except occasional pains in the affected muscles, apparently of the nature of cramp. The urine is normal, except that the sp. gr. is slightly low, 1013.

*Remarks.*—Here we have, then, a typical case of tic, and from the fact that the movements are unaccompanied by any psychological phenomena, and, further, are not of a co-ordinate nature, it is evident that it belongs to the first of the four classes, viz., that of simple tic.

The only two conditions with which it might be confused would be chorea and paramyoclonus multiplex, but the movements are not of choreic nature at all, and in paramyoclonus