

TONING BROMIDE PRINTS.—No. 5,602, 1913 (March 7, 1912). By the aid of suitable developers the latent image in photographic emulsions can be developed directly into a coloured picture in so far as the oxidization products, which are formed when the latent picture is reduced, are coloured and, owing to their physical or chemical properties, remain at the place where they are formed. A yellowish-brown picture is so obtained when developing with pyrogallie acid, a blue picture with indoxyl, and a red one with thioindoxyl.

The object of the invention is to obtain coloured pictures of this kind not from the latent picture, but from a black developed picture.

It is found that pictures which are developed black can be converted into coloured pictures with developers of this kind by first converting the silver of such pictures into reducible silver compounds by means of a mixture of ferricyanide of potassium and bromide of potassium, and by then reducing such compound with developers corresponding to requirements. In this case we obtain besides the silver picture a coloured picture due to the coloured oxidation product. In this manner it is possible subsequently to convert any black silver picture into a coloured one. By repeating the operation new coloured materials can be

deposited at the places containing the silver, so that any desired intensification can be thereby obtained. Lastly, in order to obtain a pure coloured picture the silver can be removed by one of the known agents.

For example, a black silver picture is bleached in a solution of 10 per cent. ferricyanide of potassium and 10 per cent. bromide of potassium, well diluted with water, and then developed to a yellowish-brown colour in a solution of pyro. 0.1 gm., soda 2 gms., and water 100 c.c.s.

Or a picture bleached as just described is developed to a red colour in a solution of thioindoxyl carboxylic acid 0.5 gm., acetone 5 c.c.s., potash 2 gms., and water 100 c.c.s. Dr. Rulolf Fischer, 20, Beyrnestrasse, Streglitz, Berlin.