

rate of 4 rats. The thyroid from one of the rats killed on the ninth day of injection showed a marked hyperplasia. The thyroid glands of the 3 rats which were treated for 13 days showed an unusual picture. In 2 cases there was a generalized hyperplasia, but scattered throughout the gland were large alveoli with a flat, atrophic type of epithelium. The thyroid of the third rat is shown in Fig. 3. Many of the alveoli have a normal epithelium, while others show an atrophic type.

Summary. We have reported the physiological effects of a highly purified extract of the anterior pituitary containing the thyrotropic hormone, which gives complete replacement therapy in the hypophysectomized rat and also produces a hyperplasia of the thyroid with hyperthyroidism in both the rat and the guinea pig.

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Tobacco Sensitiveness in Angina Pectoris and Coronary Artery Disease.

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Harkavy, Hebal and Silbert¹ reported the incidence of tobacco hypersensitiveness in 68 cases of thrombo-angiitis and in 122 controls. In this study it was found that 83% of thrombo-angiitis cases were hypersensitive to various tobacco extracts when tested by the intradermal method. Thirteen out of 20 patients were demonstrated by the passive transfer method to have reagins for tobacco. Only 10% of the control smokers reacted to tobacco.

The present investigation deals with results of a similar study in patients with arteriosclerosis of the coronary arteries who presented the clinical syndrome of angina pectoris, with diagnostic electrocardiographic changes. The tobacco employed in these tests was separate extracts of Burley, Maryland, Virginia, and Xanthis (Turkish tobacco), prepared according to the method of Coca. An extract consisting of a mixture of tobaccos obtained from the Allergy Department of the New York Hospital through the courtesy of Dr. Cook was also employed.

Of 36 patients with coronary artery disease, all of whom were

¹ Harkavy, Hebal and Silbert, *Proc. Soc. Exp. Biol. and Med.*, 1932, **30**, 104.

smokers, 13 or 36% were found to give positive intradermal reactions of the urticarial type to one or another tobacco. Two cases were also tested with extracts of tobacco smoke. These tests were carried out with a saline extract (Coca) of a concentrate, prepared by Dr. Harry Sobotka from an alcoholic solution of cigarette smoke. Both patients gave positive intradermal reactions. A final conclusion, however as to the significance of smoke reactions will have to be reserved. The average age of the 13 patients who reacted positively to tobacco extracts was 45. Four of these had a personal history of allergy. The average age of the 23 patients who did not react to tobacco was 60 years.

The serum of 6 of the positively reacting patients was studied for the presence of specific reagins to tobacco by the passive transfer method of Prausnitz and Kustner. In 4, reagins could be demonstrated.

The extract of mixed tobacco obtained from Dr. Coca which was nearly free of nicotine gave the largest number of positive reactions. Twelve patients tested with 10% solution of nicotine tartrate 1:10,000 and 1:5,000 were found to be negative.

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Anatomy of Normal and Reduplicated Limbs in Urodeles.

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A study of the anatomy of double limbs in urodeles with especial reference to musculature and blood vessels was made as a basis for a further understanding of the process of reduplication.

Double limbs were produced by rotation of the fore limb bud, both in the normal position and 3-5 segments posterior, in a number of species of *Amblystoma* (*Ambystoma*) and in *Eurycea bislineata*. Statistical treatment revealed specific differences in the proportions of total suppression, of reduplication and the subsequent resorption of one member of the pair. More cases of reduplication occurred in those species in which the growth of the limbs is most rapid. Most frequent resorption of one member, however, was found in those with the fastest general growth. *A. tigrinum* showed the greatest number of cases of total suppression. Limbs transplanted