is of rare occurrence. The vice of betel chewing, so generally practiced in Ceylon and all through India, is unquestionably responsible for the frequency with which carcinoma of the mucous lining of the mouth is met with in those countries. The principal constituents of "betel" are the betel leaf, areca nut, caustic lime and some sort of a strong condiment, all powerful irritants of the mucous membrane. The disease affects the buccal surface of the cheek, generally commencing opposite the teeth of the lower jaw and spreading with varying rapidity according to the pathologic type of the tumor.

*Trauma.*—The influence of traumatism in the etiology of carcinoma is variously estimated by different authors. Trauma exercises a more important role in the causation of sarcoma than carcinoma. In most cases in which an alleged single trauma has been charged with having caused the disease, the carcinoma was present when the injury was received, the injury having called the patient's or physician's attention to it. Carcinoma seldom, if ever, follows a single injury, but develops more frequently in consequence of prolonged irritation.

*Prolonged Irritation.*—Frequently repeated and long-continued irritation is usually recognized as an exciting, if not the principal, cause of carcinoma. Certain occupations, habits, malposition and diseases of teeth and displacement of organs due to abnormal sources of irritation must be included under this category as agents which so often precede carcinoma and which must be regarded at least in the light of determining causes, as without such local harmful action the disease might not have made its appearance. The local irritation effects tissue changes conducive to carcinoma formation in persons who are subjects of a hereditary or acquired predisposition or aptitude to the disease. It would be well to study more thoroughly and on a larger scale, experimentally and clinically, the effect of chronic irritation on the etiology of carcinoma.

*Chronic Inflammation.*—While the histologic processes observed in inflammation have nothing in common with carcinoma clinical observatons appear to prove that carcinoma not infrequently develops in an organ or part which is the seat of a chronic inflammation. It is not at all uncommon to find a carcinoma take its starting point in ulcers of the stomach, and chronic ulcers of the lower extremities, in tubercular lesions of the skin, and in chronic inflammatory affections of the mucous membrane of the tongue and other organs. Goodhart