Editorial

LOW MOLECULAR WEIGHT HEPARIN- AN ALTERNATIVE THERAPY FOR LICHEN PLANUS.

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Lichen planus is a unique, common inflammatory disorder that affects the skin, mucous membrane, nail and hair[1,2]. The primary lesions of lichen planus are characteristic, almost pathognomic, small, violaceous, flat-topped, polygonal papule. Pruritus is often prominent in lichen planus[3,4]. There is a predilection for the flexor wrists, trunk, medial thighs, shins, dorsal hands and glans penis. Evidence suggests that lichen planus is a T-cell mediated skin disorder. The dermal infiltrate consist largely of T-cells that attach to keratinocytes, abnormally expressing HLA-DR and intercellular adhesion molecule-I antigens on their surface. This lymphocyte-keratinocyte apposition is believed to lead the destruction of the epidermis. Clinical evidence also supports the role of cell mediated immunity in lichen planus. CD4+ lymphocytes have been shown to produce endoglycosidase (heparanase), which allows them to penetrate into the sub endothelial basal lamina[5]. Administration of low dose low molecular weight heparin, devoid of anticoagulant properties, inhibits T-lymphocyte heparanase activity, which is crucial in T cell migration to target tissues in lichen planus. It appears that the immunomodulatory molecules in heparin might be sulfated disaccharides which seem to inhibit the production of the key proinflammatory cytokine tumor necrosis factorl- (TNF- Low molecular weight heparin preparations are produced by fraction of standard heparin. Enoxaparin, a low molecular weight heparin is widely used to prevent and treat thromboembolic disorders. Like other low molecular weight heparin, it shows improved pharmacodynamic properties and a better safety profile than nonfractioned heparins. It shows a decreased ability to prolong the activated partial thromboplastin time while still possessing an antithrombotic property through its potentiation of the inhibition of anti-factor A. As a dose of 3mg weekly subcutaneously, heparin injections have been reported to significantly improve the symptoms of pruritus and activity of the disease. Few side effects of low molecular weight heparin, such as bleeding are dose dependent and are a direct result of its therapeutic action. However other reactions, such as heparin induced skin necrosis are idiosyncratic and rare[4].

"Efficacy of low dose low molecular weight heparn in the treatment of cutaneous lichen planus" by Khan MS[1] et al in this issue of JAFMC is a time honoured work on this field. This type of treatment for lichen planus is practiced in our CMH with much success. Though the sample size was small we hope this publication will enlighten and enrich our knowledge and encourage others to carry out research in large scale.

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