

Management of superficial lesions on an extensive area requires a large electron field. A uniform maximum field size of 58 cm x 58 cm at SSD=194 cm is achieved with a custom-made external scattering filter consists of concentric acrylic disks. During the application of this field to treat patients monitoring TLDs on different parts of the patient indicated significant difference in the absorbed dose. Electron beam energy (E_0) is determined from the percent depth dose measurement. The results of this measurement indicate there is no significant difference in energy across the treatment plane or with SSD. The absorbed dose is also measured in the treatment plane using both TLD and an ion chamber. Absence of significant difference in these measurements indicate that the observed difference in the absorbed dose may have been caused by electron beam grazing the surface. Details of the scattering filter design, and the results of the energy and absorbed dose measurements will be presented.