



ARTICLE COMPRISING α -HEXATHIENYL

Abstract

A previously unknown phase of α -hexathienyl, designated α -6T/HT, exhibits diffraction peaks at $2\theta = 4.31, 8.64, 12.96, 17.32, 26.15$ and 29.08° in a
5 $\text{CuK}\alpha$ powder X-ray diffraction pattern, and is expected to have properties (e.g., high hole mobility) that make the phase desirable for use in, e.g., thin film transistors. Substitution of thin films of α -6T/HT for prior art organic thin films in thin film transistors and other devices is contemplated.