

Optimisation of deposition parameters of Ionised Jet Deposition (IJD) created Titanium nitride thin films

čtvrtek 5. září 2024 9:25 (25 minut)

Titanium nitride is often used as a protective coating due to its hardness. Ionized jet deposition has a potential to improve and diversify ways of making TiN thin films. We optimised the nitrogen pressure in the IJD chamber to suppress concentration of titanium oxide in films. We manufactured a set of films using different deposition pressures. Based on the XRD data, higher gas pressure is preferable. In contrast, lower gas pressure contributes to higher film growth, based on AFM data.

Hlavní autor: KOLÁŘ, Martin

Spoluautor: SKOČDOPOLE, Jakub

Přednášející: KOLÁŘ, Martin

Zařazení sekce: Preparation techniques and analysis