

**PATTERNED TEXTURING OF THE SEAL SURFACE
FOR A ROLLER CONE ROCK BIT**

ABSTRACT

Surface texturing is employed to modify the topography of one or more surfaces (radial or cylindrical) of the sealing system for a roller cone rock bit. The surface texturing produces a regular or repeated patterned dimpled surface which retains additional lubricant helpful in reducing friction in the boundary and mixed lubrication regimes.

[No Figure]