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CONCERNING THE ASSIGNATION OF THE PROCESSING ACCURACY OF A MODULAR DRILL BY USING THE FINITE ELEMENT SIMULATION

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Abstract

The modular elements devices are more and more used within flexible production. The use of simulation with the finite element method allows settling the processing accuracy of such equipments since the designing level. This paper presents the main stages in simulating the behavior of an adjustable modular system of tools guidance in holes processing and the influence of the system configuration over the processed material and of the diameter of the hole over the strain of the slip bushing.
The limits of the processing accuracy are shown, ensured by three configuration of the guiding unit of the tool.

Keywords

Simulation, MEF, Drilling processing, Modular elements, Flexible production