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Effects of Depth of CutonCylindricalMillingProcess in Steel Casting: A NumericalStudy

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Abstract: Thecomplexity of themillingprocess has ledustostudydifferentparameters, amongwhich are thecuttingspeed, feedspeed, chip volume, cutting time and associatedcosts, which are thefocus of thisstudy. Forthispurpose, a calculationalgorithmwasdesigned in whichfixedparameterswereleft and thecuttingdepthwasvariedfrom 2 to 8 mm.Thisresulted in anincrease in process times and costs, whichwasexpectedduetotheremoval of more material and a negativeimpactonthesurfacefinish of thepart.
Keywords: Milling, chip, speed, cutting, depth.

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