SOLUTIONS FOR THE CYLINDRICAL MILLS DESIGN FOR A HIGHER SURFACE QUALITY

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The paper does a synthetically presentation of the state-of-the-art for the researches for theoretical and experimental contributions regarding the influence of several constructive and technological parameters on the milled surface's roughness, in various work conditions of the technological system. Starting from an equation of the micro - asperities height that has as component an angle parameter of the mill's teeth, the paper analyses in detail and present correlation equations for the total profile height (the Rt roughness parameter) of the machined surface as a function of all the geometrical parameters that regards angles, dimensions (the mill's external diameter) and, also, technological parameters (the cutting feed and the cutting speed). Because the values range for the angle parameters determined in this manner, especially taking account the cutting tool's strength, the chip's flushing, machinability, does not bring supplementary information regarding the fundaments of the machining process (for roughing or finishing operations) that strongly influence the roughness obtained during cutting. Therefore, the paper analyses the mode in which the combination of various values of the angles that define the cutting tool's geometry or his function influences the roughness, by being kept constants the mill's external diameter, teeth number and the technological cutting parameters. The results obtained within the data computing are important for the cutting tool's designers and for the process engineers, being a criteria in their target to optimize the milling process especially for the machined surface state criteria.

ASPECTS REGARDING THE SIZING OF THE CYCLONES FOR DEDUSTING OF INDUSTRIAL GASES

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The paper aims to present the theoretical basis of the gas dedusting through sedimentation in the field of centrifugal forces: the sedimentation rate of the dust particles, the necessary time to carry out the process, the limit size of individual particle and the influences on them of the different constructive and functional sizes. On this basis is provided a method for technological sizing of the cyclones used to gas dedusting. The calculation example is a guide for using this method.

THE INFLUENCE OF THE BALLS WEAR ON THE DIMENSIONAL COMPOSITION OF THE GRINDING LOAD FOR BALL MILL

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During functioning of the mill is producing the balls wear of the grinding load, who producing the changing of the mass and the dimensional composition who affecting the next performances: flow decreasing, final product finesse decreasing.
In order to keep the performance of the mill within acceptable limits, the use of the load balls is supplemented if it is the case.
This paper presents different options to restore the use of the load balls to the initial capacity.

EXPORT DECISION AND INTERNATIONALIZATION STRATEGIES OF SMALL AND MEDIUM-SIZED ENTERPRISES

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Due to the liberalization of international trade, the competitiveness between countries has increased considerably, and the structure of national companies has become more and more complex. Difficulties adapting to the international environment are numerous, companies identifying severe problems related to communication and marketing strategies. As a result, companies must integrate into the new environment created by globalization of international trade by identifying and achieving competitive advantage, ensuring international specialization of countries.

FINANCIAL ANALYSIS, FUNDAMENT OF PERFORMANCE MANAGEMENT OF AN INDUSTRIAL COMPANY

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Achieving a double function of diagnosis and regulation, the financial analysis of an economic-engineering company constitutes a basic and necessary instrument of a performance management. In the paper, is presented a financial analysis based on balance sheet data, drawn up for S.C. MECANICA S.A. A system of relevant indicators was used, through which absolute conclusions resulted and depending on which the whole future economic and financial policy of the company will be based. The research has been focused on applying the system of indicators concluded on data published on site-ul http://www.mfinante.ro.

APPLYING INDUSTRIAL REENGINEERING MODELS TO ASSESS THE MANAGERIAL POTENTIAL OF A INDUSTRIAL COMPANY

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The purpose of this paper is to highlight the importance of applying industrial reengineering models by any local company, in this case S.C. MECANICA S.A. The strategy approached had its basis on a profound analysis on the technical-managerial and economic-financial aspects for the evaluation of strengths and weaknesses of the company, of opportunities and dangers in the exterior environment, and for the final and global assessment based on the following criteria: economic-financial, managerial, quality-competiveness, technological, human-social and environmental. The researcher was focused on the analysis of technical and economic indicators, data published on http://www.mfinante.ro website.