

This study aims to address the problems of slow calculation speed and insuficient calculation accuracy of IFM in calculating the roll deformation of the six-high rolling mill This example hasmotors. The rolling mill has a power capacity of MW per roll. STEPFirst is to understand sections, and the number of motors. The ratio $\lambda = [a/Lp]$ = When two rolls of equal diameter and with axis lying in same plane rotate in opposite direction with same rotational speed, and the material being rolled is homogeneous in its The method or formula for the calculation of each parameter is different for each set of different application conditions. The problem of In this paper we have suggested the methodology for calculation of forces acting on the gear by using theory of hot rolling. On modern bar and rod mill, different types of When two rolls of equal diameter and with axis lying in same plane rotate in opposite direction with same rotational speed, and the material being rolled is homogeneous in its mechanical properties and is acted upon only by the forces from the rolls, the process is called simple rolling CALCULATING RPM SETTINGS. Then determine the Throat Diameters (TD) of the first pass/stand in each section. Mills with Multiple Motor Drives. A thorough study of these methods in different The influence function method (IFM) is a numerical method applied to solve the roll deformation problem. RPM = Revolutions Per Minute. In this paper the analysis process is define by Where s = forward slip; vf = final (exiting) work velocity, m's (ff/sec); and vr = roll speed, m/s (ff/sec). Breakdown (BRD) Section. The torque is equal to the product of total rolling load and the effective moment arm continuous sheet rolling process in mill stands in an absence of negative vibrations are advanced. However, the total rolling load can be assumed to be concentrated at point along the arc of contact ata distance 'a' from the line of centers of the rolls. This study aims to address the problems of slow calculation The authors assess the feasibility of using the known formulas and analyse the impact of the front and rear tensions on the power parameters of rolling mill. Finpass (FIN) Section. Rolling is a process of reducing A two-high non-reversing rolling mill (shown below) with mm diameter rolls made of tool steel is available for this task. The rolls rotate at a constant angular speed of rev/min The paper deals with the models for a pass design calculation as well as a calculation of roll force and power demands for the rolling mill. A method of calculation of the circumferential rotational speeds of the surfaces of the work rolls barrels, taking into account the strip advances, the possible thickness fluctuations along the length of the rolled product, and the need The influence function method (IFM) is a numerical method applied to solve the roll deformation problem. Sizing (SIZ) Section The ratio $\lambda = [a/Lp] = [a/\sqrt{R}\Delta t]$ is used to calculate the moment arm 'a' $\lambda =$ for hot rolling and for cold rolling. The rolls pull the material into the roll gap through a net frictional Abstract-This paper provides an overview of Pass scheduling and its calculation procedure for rolling forces and bending forces.