

ZAR6

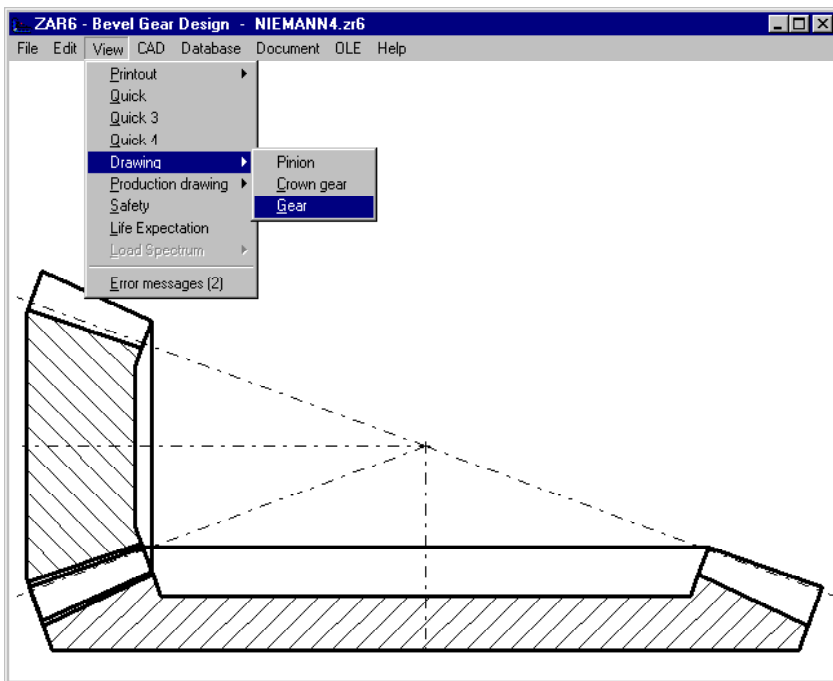


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Bevel Gear Design (straight, helical, spiral)

Software for Windows

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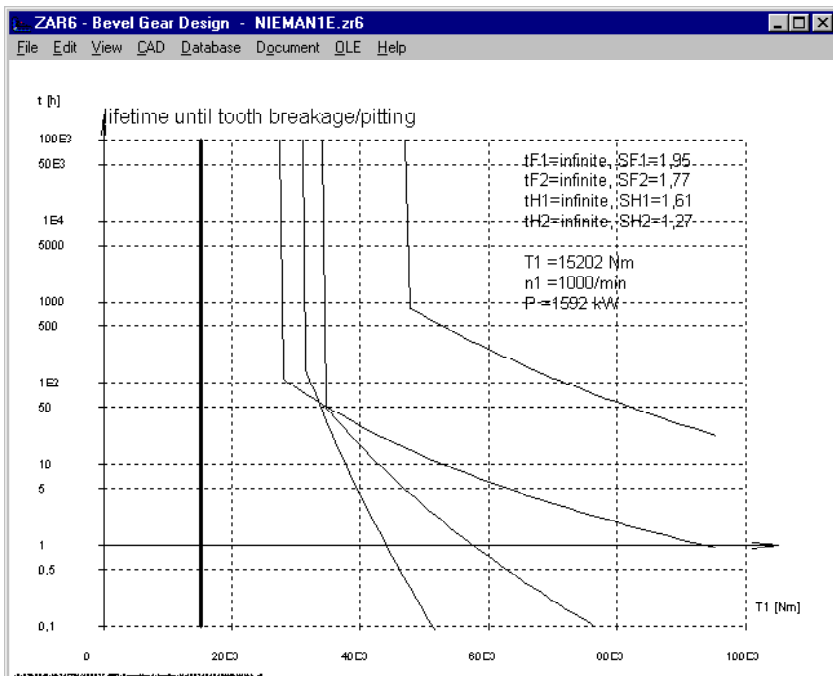
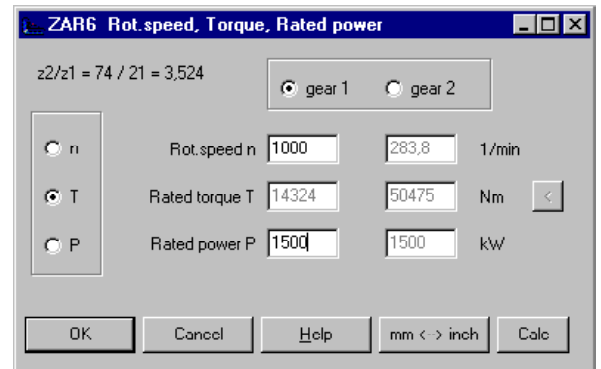


Calculation Base

ZAR6 calculates dimensions of bevel gears (straight, helical and spiral) with decreasing tooth height due to cone center. Load-bearing capacity with safety against tooth breakage, pitting and seizure for bevel gear pairs is calculated according to DIN 3991.

Pre-dimensioning

In pre-dimensioning ZAR6 makes recommendations for the dimensions of bevel gear by input of gear ratio, rotational speed and power or torque. Gear materials can be selected from database.



Calculation

The pre-dimensioned values can be used in the next dialogue window for gear geometry. The program suggests values for tooth thickness modification x_s and profile shift coefficient x .

Tooth Flank Tolerances

You can select tolerance zone to DIN 3967, and ZAR6 calculates min and max dimensions of inner and outer tooth thickness, flank clearance and backlash. And ZAR6 calculates pitch tolerances, flank tolerances and permissible runout according to DIN 3965.

Material Database

ZAR6 includes a material database with gear materials. Database may be extended by the user with new materials.

