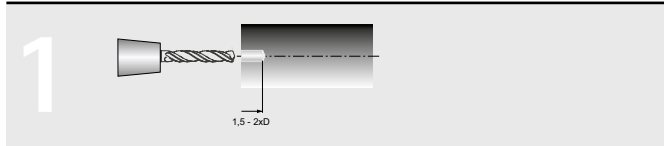


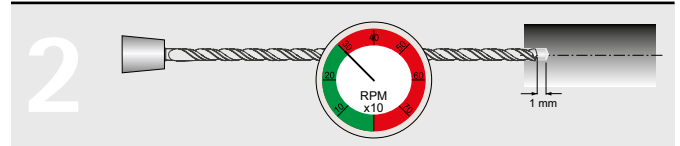
Deep drilling

For MEGA-Deep-Drill | MEGA-Deep-Drill-Alu



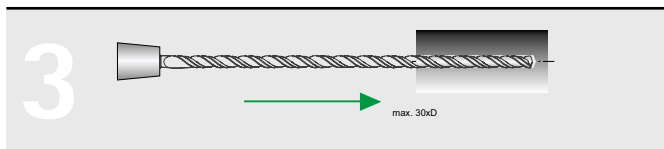
Making a pilot bore

- Recommendation for spotting drill, see following page (or 0,01 - 0,02 mm larger as the deep drill diameter)
- Pilot bore depth between 1.5 and 2xD



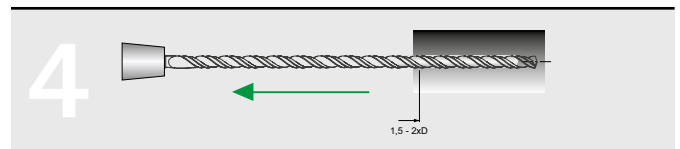
MEGA-Deep-Drill – entry into the pilot bore

- Entry at max. 300 min⁻¹ and v_f = 1000 mm/min
- Without coolant – up to 1 mm before the bottom of the pilot bore
- Turn on coolant



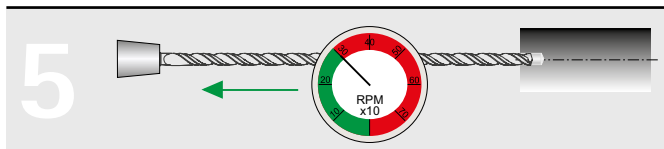
Drilling using a MEGA-Deep-Drill

- Cutting speed (v_c) and feed rate (f) according to table (see page 286). Drill without chip removal cycles



MEGA-Deep-Drill – moving back

- Move back at current spindle speed and double the feed (= 2 x v_f) to 1.5 - 2xD until you reach the end of the bore



MEGA-Deep-Drill – run out of the bore

- Switch off coolant
- Run out at max. 300 min⁻¹ and v_f = 1,000 mm/min

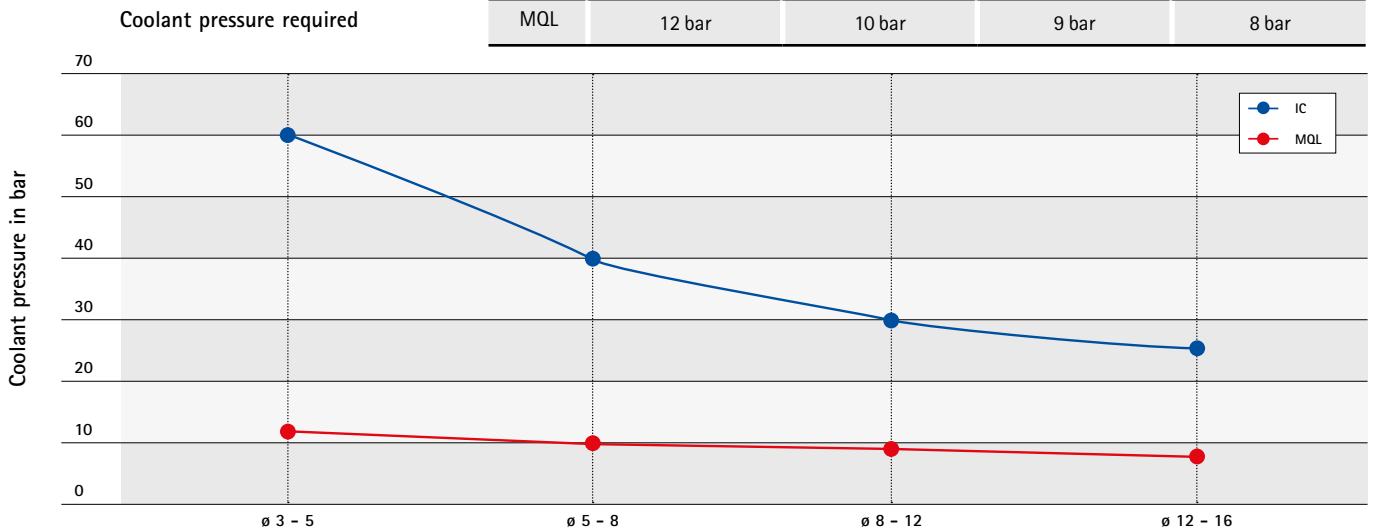
Application instructions for diameter ≤ 3 mm:

- Select a coolant type suitable for small tools for optimum cooling lubrication
- Effective filtration of the cooling medium prevents the cooling channels from becoming clogged up
- Select a suitable drilling cycle (drilling with chip removal cycles if necessary)

Coolant pressure required

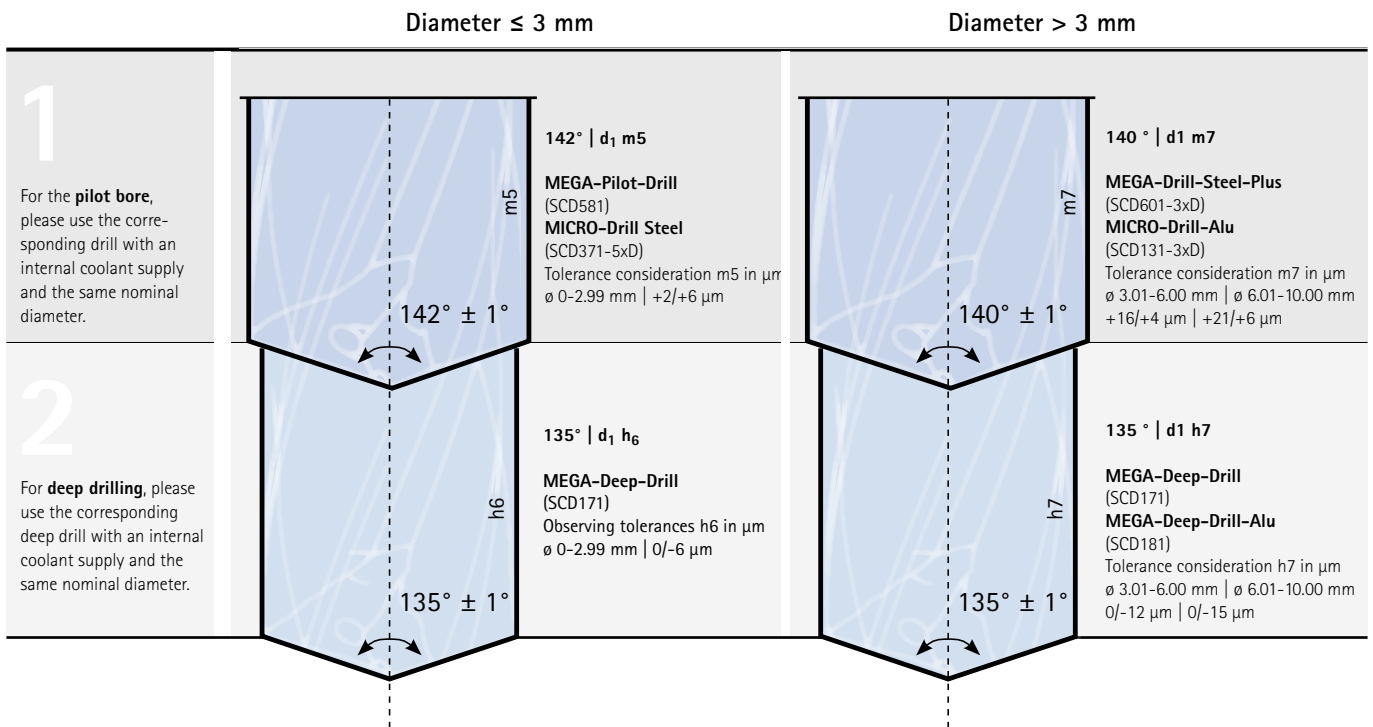
For MEGA-Deep-Drill | MEGA-Deep-Drill-Alu

	ø 3 - 5 mm	ø 5 - 8 mm	ø 8 - 12 mm	ø 12 - 16 mm
IC	60 bar	40 bar	30 bar	25 bar
MQL	12 bar	10 bar	9 bar	8 bar



Deep drilling 15xD – 30xD in two steps:

Deep drilling 15xD – 30xD with MEGA-Deep-Drill (SCD171) and/or MEGA-Deep-Drill-Alu (SCD181)



Deep drilling 40xD in three steps:

Deep drilling 40xD with MEGA-Deep-Drill (SCD171) and/or MEGA-Deep-Drill-Alu (SCD181)

Optimally designed for reliable machining.

