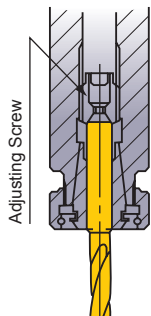
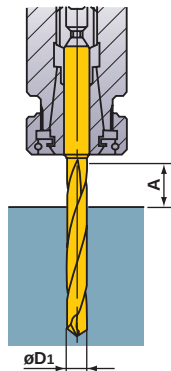


DRILLING (SOLID CARBIDE)

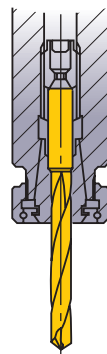
CARBIDE

MINI-MWS**OPERATIONAL GUIDANCE****Drill Holding**

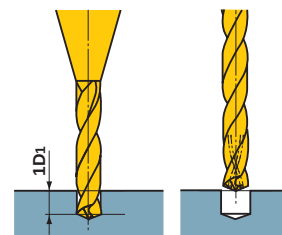
Thrust bearing type collet chuck holds the drill securely.

Drill Length

$$A \geq D1 \times 2.0$$

Drill Installation

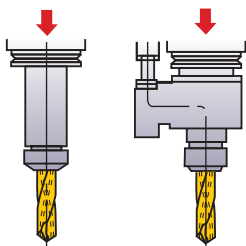
Do not clamp on the flutes.

Drill Installation

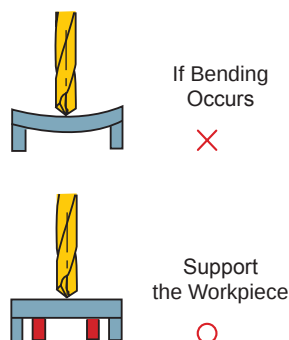
- ① For pilot hole drilling, use the SB type drill.
- ② Use the prepared hole as a guide when using a drill with an oil hole. Depending on the cutting conditions, peck feed is recommended.

Through Coolant Type

Spindles Through Coolant Type Revolving Coolant Machine Type



Recommended coolant pressure: $\geq 3\text{Mpa}$
At least 1.5Mpa is required.

Thin Workpiece**Coolant Handling**

- 1) Small particles of swarf will jam in the oil hole of small diameter drills. Always use a fine mesh filter as a preventative measure.
- 2) Dirt and dust particles adhere to the oil in old coolant and prevent an efficient flow. Regular coolant exchange is recommended.

NOTES ON USE

- Please use a fine mesh filter (mesh $\leq 3\mu\text{m}$) for coolant to prevent jamming in the oil hole.
- For deep drilling with the MWS-DB long drill, machining a pilot hole is recommended. (Otherwise, centrifugal forces may cause drill breakage.)