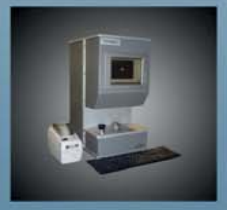
BALLOFFET



Semi Automatic Ultrasonic Machine BD 140 SA

Die Shaping & Polishing Machine

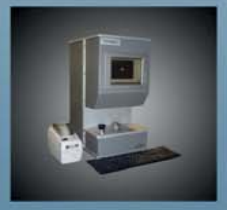
SPECIFICATIONS:

Die size worked	: 0.10 to 3.0 mm
Electrical supply	: 220-240V 5A 50/60Hz 1 Ph
Air supply required	: 4 Bars (50 PSI) 1/4” bore hose
Ultrasonic generator	: 140W 20Khz
Cooling	: Air cooled
Finish	: SS panel and grey paint
Grinding system	: Manually driven with special fine grinding wheels
Needle holders	: for Ø 2.5 - 3 - 4 - 5 mm needles
Needles	: Ø 2.5 - 3 - 4 - 5 mm

DIMENSIONS:

Width	: 770 mm
Height	: 950 mm
Depth	: 400 mm
Weight	: 95 Kg

BALLOFFET



Semi Automatic Ultrasonic Machine BD 140 SA

The BD 140 SA has been specially developed to shape natural and polycrystalline diamond dies from 0.10 mm up to 3.0 mm, while maintaining accurate and consistent die geometry.

Semi automatic needle grinding, using a fine grinding wheel, makes it possible to reduce each machining cycle to only a few seconds duration, which results in a marked improvement in accuracy and significant saving of time.

This feature makes it particularly useful to repair and maintain dies with accurate control of reduction, entrance and exit angles.

An exclusive type of swinging die holder allows it to perform the mirror polish, with impressive results.

The manually driven needle grinding operation takes approximately 5 seconds.

The working time on the die will not exceed 15 seconds in shaping operation, but could reach up to 60 minutes in a PCD die polishing operation.

Standard needle sizes are 2.5 - 3 - 4 - 5 mm diameter fitted into aluminium needle holders. Needle changing is simple, and up to 20 dies can be worked with a single needle.

The BALLOFFET system allows to fit the needle into the needle holder quickly and without brazing or clamping.

It takes a few seconds and secures a perfect ultrasonic transmission from the head down to the tip of the needle.

The following parameters are preset by the operator :

- drill angle to be ground
- duration of ultrasonic machining
- ultrasonic power level
- die spindle working pressure
- swinging angle in polishing operation.