

DATA SHEET

Name of die

Drawing die

- An Example of profit obtained -

Year, month, day

Dec. 25, 1978

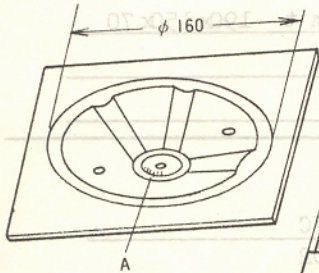
Mode of working

Stamping

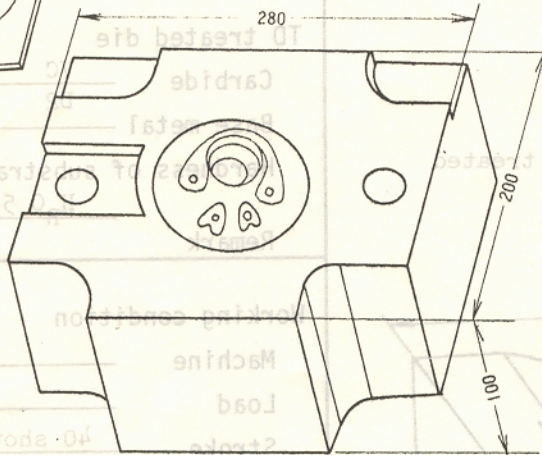
Name of firm

Kyoei Kogyo Co.

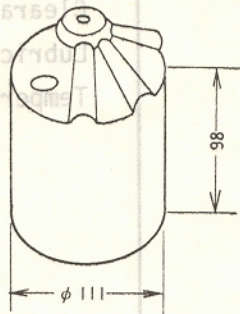
Sketch of product



Sketch of TD-treated die (1)



Sketch of TD-treated die (2)



Work material (Product)

Material Cold rolled mild steel

Size 2.3mmt, 200 x 200

Hardness

Remark

TD treated die

VC

Carbide

D2

Base metal

Hardness of substrate

H_R C58

Remark

Working condition

Machine 300 T

Load

Stroke 40 shots/min.

Clearance

Lubrication None

Temperature of work

Result

Base metal, Treatment and hardness of the die to be compared

D2, Hardened

Life and other evidences

TD die Still usable at 100,000 shots, without Lubricant.

The die to be compared Repair work was needed at every 1,000 shots because of scoring on A position, even under application of Lubricant.

Profit obtained through application of TD process

1. Disuse of Lubricant.
2. Decrease in Die consumption.
3. Decrease in repair work.
4. Improvement in product quality.
5. Decrease in shut-down time due to 1 and 3.