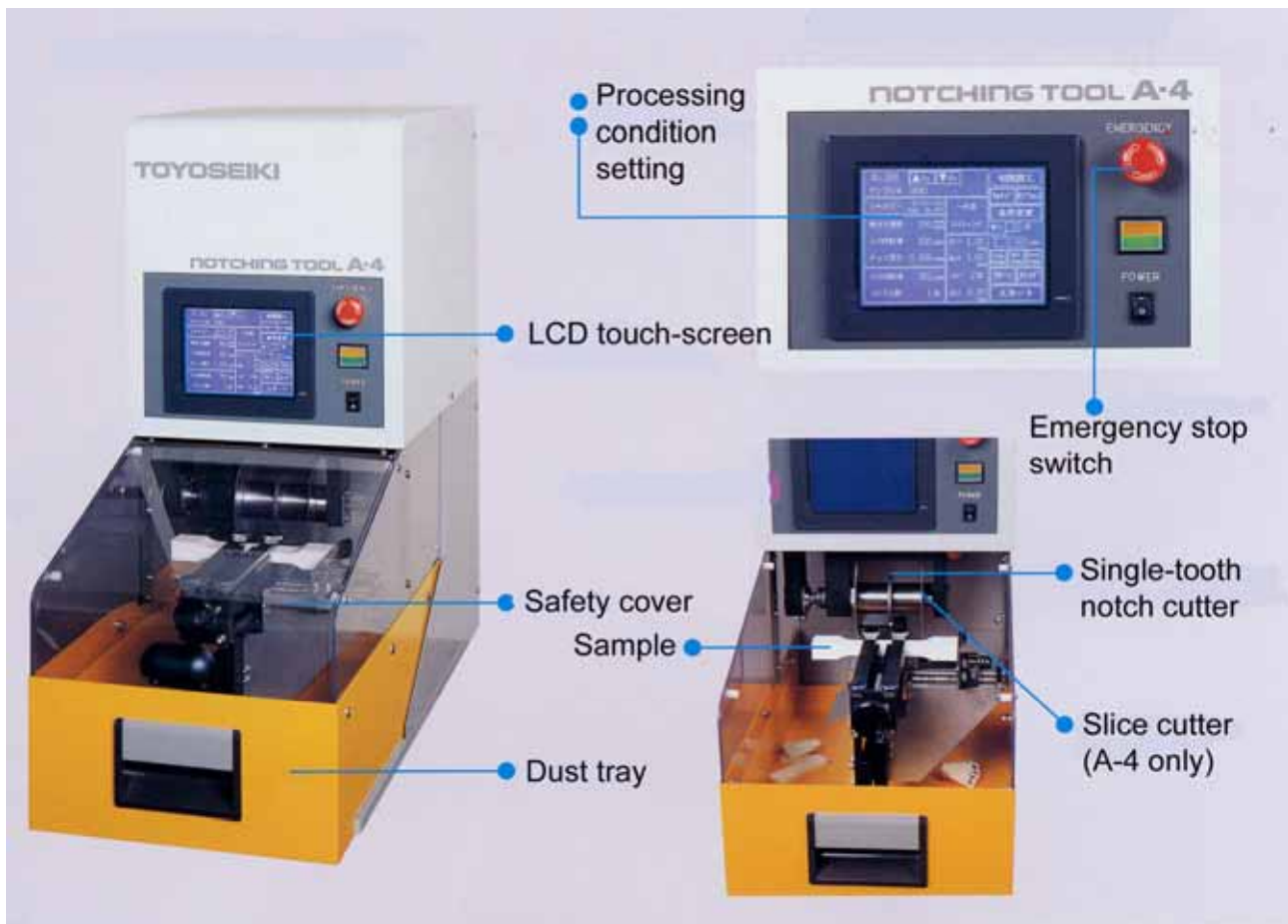


## No.628 Notching Tool, A-4 / A-4E

*Advanced Notcher for Izod/Charpy specimens conforms to ISO 2818 and JIS K 7144*

Notching Tool, A-4..... Slice cutting + Notching  
Notching Tool, A-4E..... Notching only



### **APPLICATION**

The Notching Tool, A-4 series are miniature, computerized, numerically controlled milling machine for preparing a variety of notched specimen bars. All operations except mounting and dismounting of the sample are automatic. It automatically positions, cutter according to sample and notch dimensions.

The instrument employs a precision servo motor control system with a touch screen control display. Safety interfaces protect the operator from accidents. The cutter speed and table travel speed can be optimized for the sample material. (*Fixed cutter speed for A-4E*)

The instrument can store up to 99 (16 for A-4E) user-defined cutting programs. Bars can also be automatically cut from the ISO universal test specimen (*A-4 only*).

## FEATURES

1. All operation except mounting / dismounting of sample are automatic. Notching and slicing are automatically performed. (Notching only for A-4E)
2. Allows simultaneous processing of ISO multipurpose sample slicing and cutting. (Notching only for A-4E)
3. Employs pulse motor which allows cutting at high precision of 0.01mm
4. LCD touch-screen setup, operation and display; memory recall of 99 user cutting programs (16 for A-4E)
5. Automatic detection of zero-height (sample bottom) reference point
6. Safety cover locks during cutting; automatic safety inter locks and emergency stop
7. Double notching processing also available using optional double notch-holder

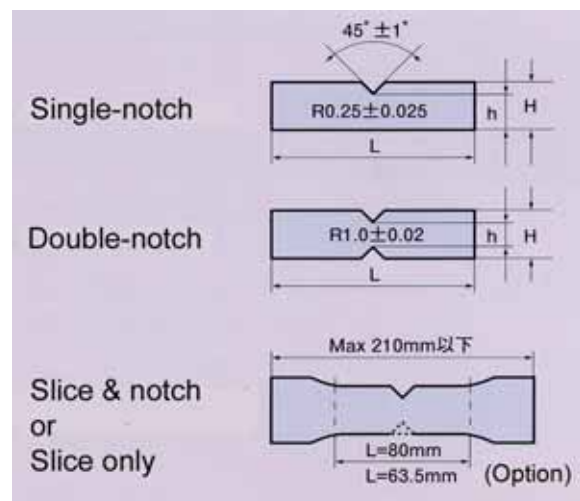
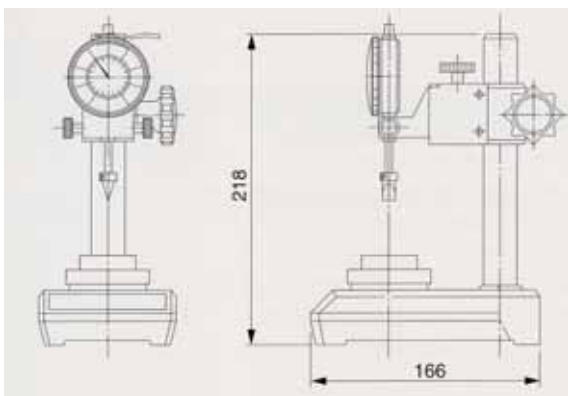
## SPECIFICATIONS

	A-4	A-4E
Notching system	Single-tooth, Milling type (conforms to ISO 2818, JIS K 7144) Automatic operation except sample mounting & dismounting	
Processing items	Single notching Slice cutting Double notching (Option)	Single notching Double notching (Option)
Notching capacity	Length: 50-210mm Height: 3-15mm Thickness: Max. chuck clearance 100mm (Correspond to 4mm x 25 pcs.)	
Notch height setting	Digital setting, increments in 0.01mm steps	
Notch height setting motor (Z axis)	Pulse motor, precision ball screw	
Table slide motor (X axis)	Pulse motor, ball screw, speed adjustable (50-1200mm/min.)	
Cutter motor	AC servo motor Speed adjustable: (200-900rpm)	Synchronous motor Fixed speed: (50Hz:300rpm, 60Hz:360rpm)
Notch cutter (V type)	External diameter $\Phi$ 75mm, Angle 45°, Tip-radius 0.25mm High speed tool steel single-tooth disk type (1 pc. attached as a standard accessories)	
Notch cutter speed	Max. 165m/min.	
Slice cutter (Specimen end cutter)	Diameter $\Phi$ 100mm, Thickness 1mm, High-speed tool steel (2 pcs/set attached as standard accessories)	-----
Slice cut length	80mm (for ISO multipurpose sample) 63.5mm (Option)	-----
Safety devices	Safety cover open...Automatically stops Cutter rotation and table emergency stop switch Leakage breaker (30mA)	
Electrical	AC100V, 50/60Hz, 8A (Other voltages also possible)	AC100V, 50/60Hz, 3A (Other voltages also possible)
Dimensions & weight	Approx. 30(W) x 70(D) x 70(H)cm, 65kg	

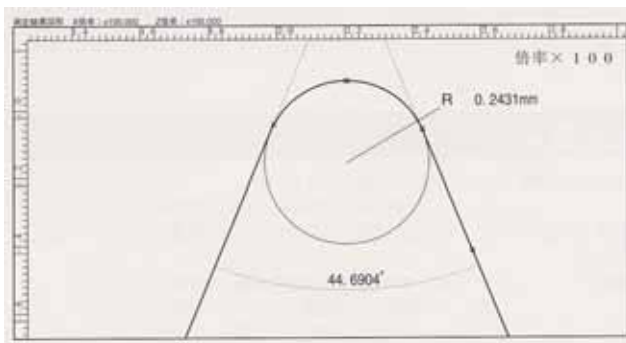
## OPTIONS

1	Notch height gauge, model N
2	Available notch cutters (1) Single-tooth V notch cutter, Normal metal (45°, 0.25mmR tip), model 1V75SK (Standard) (2) Single-tooth V notch cutter, Carbide (45°, 0.25mmR tip), model 1V75WC (3) Multi-tooth V notch cutter, Normal metal (45°, 0.25mmR tip), model 175SKH (4) Single-tooth V notch cutter, Normal metal (45°, 0.1mmR tip) (5) Multi-tooth V notch cutter, Normal metal (45°, 0.1mmR tip) (6) Single-tooth U notch cutter, Normal metal (1.0mmR Tip) (7) Single-tooth V notch cutter for “double notching”, Normal metal (45°, 1.0mmR), model 1W75SK
3	Available slice cutters (1) Normal metal slice cutter (2 disks/set), model S10SK (Standard) (2) Carbide slice cutter (2 disks/set), model S10WC
4	Available slice collar (1) Slice collar for 80mm long slice (38mm x2, 4mm x1), model SC80 (Standard) (2) Slice collar for 63.5mm long slice (29.75mm x1 , 8.3mm x2, 4mm x1), model SC63.5
5	Centering holder for “double notching” (for 10mm height), model WN10

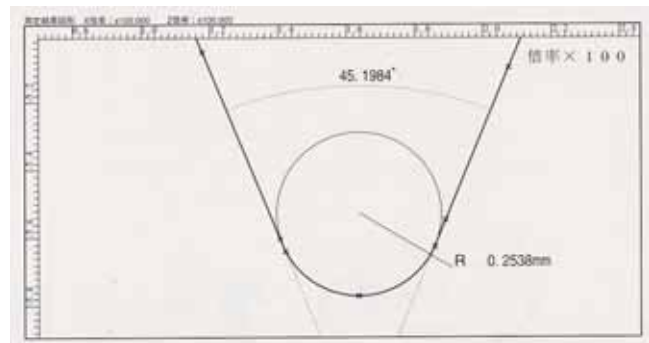
## Notch height gauge



## Notch cutter tip dimension is inspected by Digital Contour Measuring Instrument



Dimension of single-tooth cutter tip shape



Dimension of notched ABS sample shape