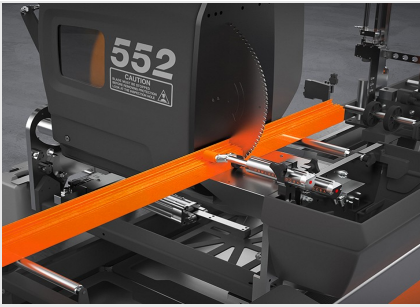# TKE 552

Twin Head Cutting-Off Machines

Twin-head cutting-off machine with automatic mobile head movement driven by an NC-controlled brushless motor. Pneumatic tilting of cutting units from 90° to 22°30' (outward) in two fixed positions or with optional mechanical adjustment system for intermediate angles. Hydro-pneumatic blade feed.

Profile clamping

The profile to be cut is clamped by two horizontal hold-down devices with extreme precision and in absolute safety. For vertical clamping, particularly for special cuts, the machine can be equipped with a patented system of horizontal hold-down devices. When two considerable lengths are cut, the profile is supported by a manually positioned intermediate support.

Head Guards

The machining zone is protected by two automatically positioned local guards installed on the cutting units. The guards are made of scratch-proof polycarbonate and they are opened/closed automatically by a pneumatic cylinder at the appropriate points of the cutting cycle.

Load and unload

The cutting-off machine is equipped with a roller conveyor on a mobile head for standard loading and unloading procedures. The roller conveyor can be optionally fitted with an extra vice to immobilise the residual profile and an electronic machined profile thickness meter for automatic cutting positions correction in accordance with the real profile dimensions, with the associated surface treatments tolerance.

Control

The control panel, installed on a support sliding on bearings along the front side of the machine, allows correct mobile heads positioning in accordance with the required cutting schedule. The interface uses a 7" touch-screen and fully personalised software and is packed with bespoke functions that are unique to this machine. The machining cycle can be optimised by creating cutting lists, thereby reducing scrap and cycle times for parts loading-unloading.

Intermediate tilting adjustment (Optional)

The standard version allows performing cuts at 45° and 22°30' by mechanically presetting the end stops. An optional system is provided for tilting manual adjustment of cutting units to any intermediate angles by means of a manual handwheel, which is particularly useful when performing out-of-square cuts.

Printer preparation (Optional)

The machine is prepared for the installation of a printer that can be selected from compatible models. The set-up includes software enabling for the label printing function, mechanical support elements for positioning on the machine, wiring and preparation for electrical connection, and a folding cover to protect the printer from shocks and possible entry of swarfs.

TKE 552 / TWIN HEAD CUTTING-OFF MACHINES

MACHINE CHARACTERISTICS

Electronic control of the X axis	●
X axis positioning speed (m/min)	25
Mobile head position reading with absolute magnetic strip direct measuring system	●
Pneumatic head tilting	●
External tilting	45° / 22°30′
Mechanic adjustment of intermediate angles with digital display of the position	○
Hydropneumatic blade feed	●
Adjustable blade feed rate	●
Effective cut, according to model (mm)	5.000
Cemented carbide blade	2
Blade diameter	550
Blade motor power (kW)	2,2
Electronic profile thickness gauge	○

SAFETY DEVICES AND PROTECTIONS

Pneumatically-operated front local protection	●

PROFILE POSITIONING AND CLAMPING

Pair of horizontal pneumatic vices with "low pressure" device	●
Pair of horizontal vertical vices	○
Pair of additional horizontal vices	○
Manually positioned profile intermediate supports	1
Roller conveyor on mobile head (mm)	2.000
Additional vice for profile support on roller conveyor	○

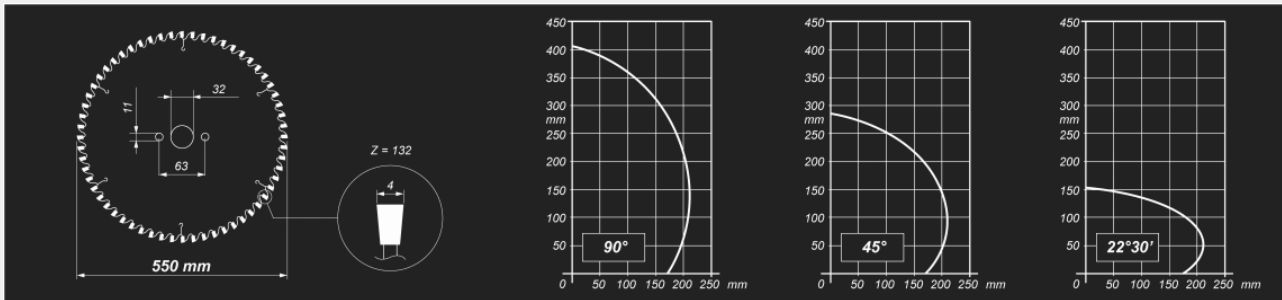## LUBRICATION AND SUCTION

Micro-mist lubrication system with water and oil emulsion	●
Preparation for automatic start-up of external exhauster	●
Swarf and short cuts extractable drawers	6
Dredging system for swarf discharge	○

FUNCTIONS

Perform single cuts	●
Execution of intermediate angles cuts	○
Execution of cyclical cuts from cutting lists	○
Special cut function PRO (longer, shorter, chamfered and wedge cut)	○
Semi-automatic cut function SLICE (thrust cut)	○
Cutting lists import	○

CUTTING DIAGRAM

Included ●   Available ○