Rough Grinding and Cutting

Purpose

The main goal of rough grinding and cutting off is to remove as much material (stock) as possible. Surface finish is of minor importance. This process involves leveling or smoothing edges and shaping cast, forged, or welded pieces. It can also involve removing material to form or enlarge a cavity. Typical tasks include fettling castings, trimming welding joints, or cutting off.

Choosing the Tool

Several factors determine the choice of tool, including the type of grinding work, the workpiece material, shape, location, the abrasive used, and the power required. More power enables more material to be removed over time.

Choosing Wheel Diameter and Thickness

Key considerations when choosing wheel diameter include ease of use, machine speed, and economy:

- Many operators prefer the smallest wheel possible as it is lighter and generates less torque.
- Machine speed (rpm) is crucial. Safety codes restrict maximum speeds; larger wheels have lower maximum speeds.
- Larger wheels provide more usable abrasive material at a lower additional cost.
- Wheel thickness is also a matter of cost-effectiveness. Thicker wheels offer more abrasive material for the same price, but thinner wheels may be necessary for precision control or confined spaces, despite requiring a heavier tool and higher air consumption.

Technique

When using grinders, the material removal pattern is unpredictable, unlike stationary machines. Each grain on the abrasive acts as a tiny cutting tool, removing small chips of material. Over time, these grains become blunt, but the right abrasive will cause blunt grains to break off, exposing new, sharp grains, which is essential for effective grinding. Self-sharpening is crucial for effective grinding. Grinding with a rocking movement helps different parts of the abrasive touch the workpiece, aiding the self-sharpening process. When cutting off material, this rocking motion should follow the wheel's rotation direction.

Experience unparalleled precision and efficiency with our circular cutters.

Description

Our circular cutters can successfully perform circular cutting operations in carbon fiber and fiberglass (GRP). Exclusively designed for use with diamond-coated blades, our circular cutters ensure superior cutting performance. They feature a robust cutter blade guard with an integrated dust extraction hood, compatible with external vacuum sources. This innovative design effectively prevents the inhalation of harmful dust particles, safeguarding the operator's health. Ideal for industrial applications, our circular cutters combine power, safety, and ease of use for superior results every time.

Features

- Diamond-Coated Blade Compatibility
- Integrated Dust Extraction Hood
- Robust design
- Powerful and lubrication free motor
- 26mm (1") cutting depth

Benefits

- Precision cutting
- High level of operator safety and comfort
- Clean workspace

Circular Cutters

LCS39 Details

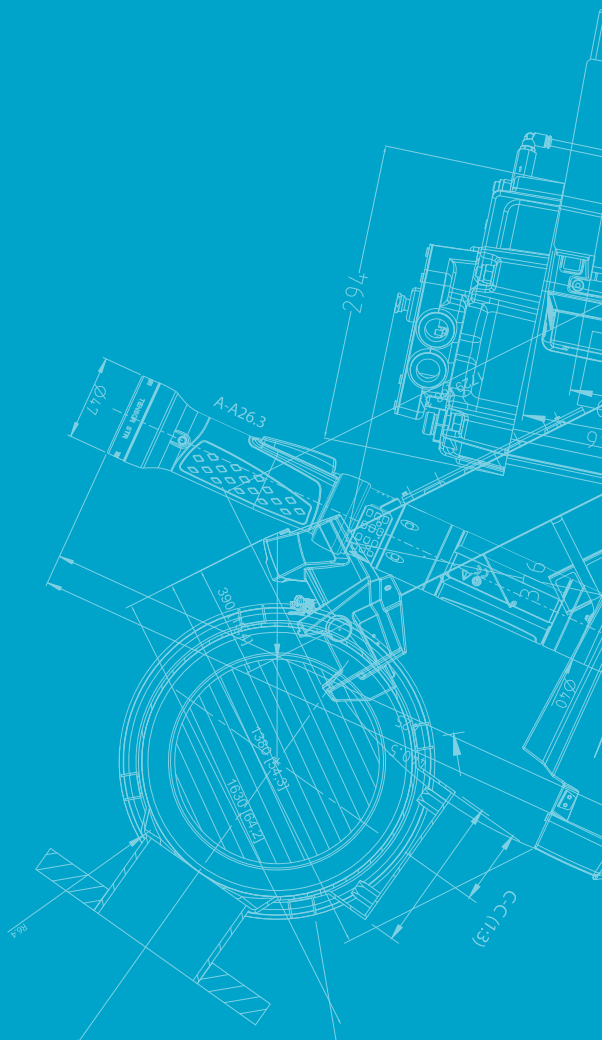
LCS39

Model	Max free speed	Max cutter wheel dia	Max cutting depth	Max output	Length	Weight	Air consumption at free speed	Rec hose size	Air inlet thread BSP	Dust extraction hood	Ordering No.
	r/min	mm	mm	kW	mm	kg	l/s	mm	in		
LCS39 S150D	15000	100	26	1.8	306	1.8	17.6	13	3/8	•*	8424 1125 07

*Suction requirement: 200 m^3/h

Accessories

	Ordering No.
Included	
Allen key (3mm)	0902 0111 00
Allen key (5mm)	0902 0113 00
Allen key (6mm)	0902 0114 00
Face spanner	4080 0729 00
Exhaust hose	4150 1532 02
Optional	
Diamond disc for fiber glass (Ø75mm - max thikness of material: 18mm)	3780 5073 00
Diamond disc for fiber glass (Ø100mm - max thikness of material: 25mm)	3780 5074 00
Suction hose set (150mm)	3780 2724 31
Productivity kit (MIDI-FRL-1/2-BSP EQ10-T13)	8202 0850 17
MULTIFLEX-3/8 cover	8202 1350 42
MULTIFLEX-3/8	8202 1350 22



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