Blades

AN INTRODUCTION TO WOOD-MIZER BLADES



Sawmill users in more than 100 countries depend on Wood-Mizer's wide range of blades to cut their timber. For many species of logs, specialized blades are needed for the best cutting performance. Wood-Mizer's blade testing teams work across Asia, Europe, Africa, and the Americas to develop and improve our selection of blade brands and profiles to meet the most difficult sawmilling challenges. Whatever wood you are cutting, Wood-Mizer has a blade to meet your needs.

Wood-Mizer has been producing blades specifically for sawmill applications since 1987, and is still the only sawmill manufacturer in the world to produce its own blades. With ISO 9001 certification since

2003, quality control systems are strictly adhered to at each stage of blade production. Blade quality is carefully monitored. Our exclusive CBN sharpening and computerised setting equipment ensure that Wood-Mizer blades meet the highest standards.

Whether your needs are small or large, Wood-Mizer blades are affordable and deliver excellent performance. Blades can be ordered in any custom length. Wood-Mizer blades come in five distinct brands: RazorTIP, BiMETAL, MaxFLEX, DoubleHARD and SilverTIP. All Wood-Mizer blade can be easily sharpened and maintained on-site using Wood-Mizer's sharpening and setting equipment.







The RazorTIP blade is tipped with Stellite teeth, and is specifically designed for extreme hardwood cutting. When other blades dull with only a few cuts, the RazorTIP Stellite-tipped blade is just getting started.

When you need a blade for tough, abrasive woods, Wood-Mizer's RazorTip blade meets the challenge.





The BiMETAL blade for cutting wood is designed for high performance in industrial production environments.

The high-alloy backing material of the BiMETAL blades offers a combination of durability and fatigue resistance, resulting in longer sharp life than MaxFLEX or DoubleHARD, especially when cutting harder, more abrasive wood species.





The MaxFLEX blade features premium quality steel, chosen by Wood-Mizer to outperform competitors and maximise performance for customers.

The specialized alloy provides longer blade flex-life and increased durability. This premium quality blade will provide high performance results at an exceptional value.





The DoubleHARD blade has been Wood-Mizer's most popular blade for more than a decade.

It is affordable and dependable for all general sawing conditions. Higher quality steel is used, and the teeth are induction hardened. DoubleHARD blades are tough, non-brittle, and will not chip or wear prematurely.

DoubleHARD blades offer unmatched cutting flexibility, whether you want to cut frozen or kiln-dried timber, softwoods, hardwoods or knotty woods. Both large businesses and mobile sawyers alike depend on DoubleHARD blades for their sawing.





The SilverTIP blade is a proven economical blade, for high production and resaw environments.

A standard, very flexible base material is used to maximise flex-life, and the teeth are induction hardened. This combines exceptional sharp life with maximum flex-life in our SilverTIP blades for the secondary processing environment.

RazorTIP Blades

Raw material	Profile	Thickness / Width (mm)		
BR2732	7/34, 10/30	1.07 x 32		
BR3732	7/34, 10/30	1.14 x 32		
BR3738	7/34, 7/39, 10/30	1.14 x 38		
BR4738	7/34, 10/30	1.40 x 38		

BiMETAL Blades

Raw material	Profile	Thickness / Width (mm		
BB2734	10/30	1.07 x 34		

MaxFLEX Blades

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Raw material	Profile	Thickness / Width (mm)
BM1735	10/30	1.00 x 35
BM2732	10/30	1.07 x 32
BM2735	9/29, 10/30	1.07 x 35
BM3732	9/29, 10/30	1.14 x 32
BM3738	9/29, 10/30	1.14 x 38
BM4738	10/30	1.40 x 38
BM5738	10/30	1.27 x 38
BM3738 BM4738	9/29, 10/30 10/30	1.14 x 38 1.40 x 38

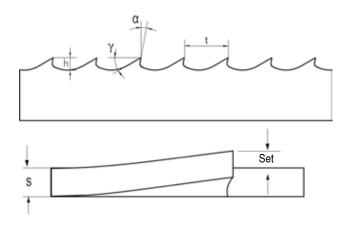
DoubleHARD Blades

Raw material	Profile	Thickness / Width (mm)		
BD1735	10/30	1.00 x 35		
BD1740	10/30	1.00 x 40		
BD1750	10/30	1.00 x 50		
BD2732	7/34, 10/30	1.07 x 32		
BD2735	9/29, 10/30	1.07 x 35		
BD2750	9/29, 10/30	1.07 x 50		
BD3732	7/34, 7/39, 9/29, 10/30	1.14 x 32		
BD3738	4/32, 7/34, 7/39, 9/29, 10/30, 13/29	1.14 x 38		
BD5738	10/30, 13/29	1.27 x 38		

SilverTIP Blades

Raw material	Profile	Thickness / Width (mm)			
BS1735	10/30	1.00 x 35			
BS1740	10/30 1.00 x 40				
BS1745	10/30	1.00 x 45			
BS1750	10/30	1.00 x 50			
BS2732	10/30	1.07 x 32			
BS2735	9/29, 10/30	1.07 x 35			
BS2750	9/29, 10/30	1.07 x 50			
BS2775	10/30	1.07 x 75			
BS3738	4/32, 7/39, 9/29, 10/30, 13/29	1.14 x 38			
BS4745	10/30, 13/29	1.40 x 45			
BS5775	7/39, 10/30	1.27 x 75			
BS7420	10/30	0.80 x 20			

BLADE PARAMETERS



a - Hook Angle

t - Tooth spacing

h – Tooth Height (Depth of Gullet)

S - Thickness of blade

V - Back Angle

TOOTH PROFILES

Recommended profiles for different applications:

4/32 recommended for very hard or frozen wood

7/34 recommended for hardwood. works best with engines over 15kW

recommended for frozen/tropical/extreme hardwoods. 7/39 works best with engines over 15kW

9/29 recommended for hard or frozen wood

10/30 recommended for general purpose sawing. softwoods or easy-to-saw hardwoods

13/29 recommended for softwoods

	HOW TO READ THE BLADE PART NUMBER
В	How sold: B = BOX OF BLADES
D	How read: R = RazorTip BLADES B = BiMetal BLADES M = MaxFlex BLADES D = DoubleHard BLADES S = SilverTip BLADES
2	Thickness: 1 = 1.00 mm 2 = 1.07 mm 3 = 1.14 mm 4 = 1.40 mm 5 = 1.27 mm 7 = 0.80 mm 9 = 0.90 mm
7	Tooth spacing: 4 = 1/2" = 12.7 mm 7 = 7/8" = 22.2 mm
32	Width: 20 = 20 mm 25 = 25 mm 32 = 32 mm 34 = 34 mm 35 = 35 mm 38 = 38 mm 40 = 40 mm 45 = 45 mm 50 = 50 mm 75 = 75 mm
IH	Details of teeth: ST = STELITE TIP (RazorTip only) HS = HIGH SPEED (BiMetal only) IH = INDUCTION HARDENED (MaxFlex, DoubleHard, SilverTip) NH = NON-INDUCTION HARDENED (MaxFlex, DoubleHard, SilverTip)
1030	Details of profile: 0432 = BLADE PROFILE 4°/32° 0734 = BLADE PROFILE 7°/34° 0739 = BLADE PROFILE 7°/39° 0929 = BLADE PROFILE 9°/29° 1030 = BLADE PROFILE 10°/30° 1329 = BLADE PROFILE 13°/29°
-401	Length: LENGTH IN CENTIMETERS
-F15	Type of box and quantity of blades: F = FLAT BOX S = SQUARE BOX 05 = 5 PCS PER BOX 08 = 8 PCS PER BOX 10 = 10 PCS PER BOX 15 = 15 PCS PER BOX

RECOMMENDED BLADE SPECIFICATIONS

	Extremely soft wood	Average wood	Extremely hard or frozen wood			
Angle / Back Angle	13° / 29°	10° / 30°	4° / 32°	7° / 34°	7° / 39°	9° / 29°
Tooth Height	7.6mm	6.4mm	6.4mm	7.1mm	8.1mm	5.5mm
Thickness 1.00mm	-	0.019"- 0.021"	-			
Thickness 1.07mm	0.021"- 0.023"	0.019"- 0.021"	0.016"- 0.018"			
Thickness 1.14mm	0.025"- 0.027"	0.023"- 0.025"	0.018"- 0.020"			
Thickness 1.27mm	0.027"- 0.029"	0.024"- 0.026"	0.019"- 0.023"			
Thickness 1.40mm	0.028"- 0.030"	0.025"- 0.027"	0.020"- 0.024"			
	Tooth Height Thickness 1.00mm Thickness 1.07mm Thickness 1.14mm Thickness 1.27mm	Soft wood 13° / 29°	soft wood wood K Angle / Back Angle 13° / 29° 10° / 30° Tooth Height 7.6mm 6.4mm Thickness 1.00mm - 0.019"- 0.021" Thickness 1.07mm 0.021"- 0.023" 0.019"- 0.021" Thickness 1.14mm 0.025"- 0.027" 0.023"- 0.026" Thickness 1.27mm 0.027"- 0.029" 0.024"- 0.026"	soft wood K Angle / Back Angle 13° / 29° 10° / 30° 4° / 32° Tooth Height 7.6mm 6.4mm 6.4mm Thickness 1.00mm - 0.019"- 0.021" Thickness 1.07mm 0.021"- 0.023" 0.019"- 0.021" Thickness 1.14mm 0.025"- 0.027" 0.023"- 0.025" Thickness 1.27mm 0.027"- 0.029" 0.024"- 0.026"	soft wood wood hard or from the properties of	soft wood wood hard or frozen wood k Angle / Back Angle 13° / 29° 10° / 30° 4° / 32° 7° / 34° 7° / 39° Tooth Height 7.6mm 6.4mm 6.4mm 7.1mm 8.1mm Thickness 1.00mm - 0.019"-0.021" - - Thickness 1.07mm 0.021"-0.023" 0.019"-0.021" 0.016"-0.018" Thickness 1.14mm 0.025"-0.027" 0.023"-0.025" 0.018"-0.020" Thickness 1.27mm 0.027"-0.029" 0.024"-0.026" 0.019"-0.023"

New blades are set at the factory with a 4, 7, 9, 10 or 13° hook angle. Blade set and hook angle can be modified by users.



SHARPENERS

BMS500/600 - PROFESSIONAL BLADE SHARPENER

The BMS500 is designed to suit the requirements of high-production sawmills that sharpen blades continuously. It features industrial-grade construction, and automatic features that let you focus less on sharpening blades, and more on being efficient with your time.

The BMS500 sharpener will sharpen a blade from 25mm wide to 75mm wide and tooth spacing from 12.7mm to 28.6mm. The BMS500 uses an industrial 203mm diameter CBN wheel to sharpen blades, and the wheel rotates at 4250 rpm. The hood lifts up and the grinding wheel lifts out of the way for easy blade installation and removal. The hood features a viewing window and interior LED lighting so the operator can closely and safely monitor the sharpening progress.

variable grinding speed, and two modes: Set-Up and Run. The sharpener is quickly configured to stop after an exact number of teeth have been sharpened. A carbide scraper deburrs each tooth and the oil wiper pads clean excess oil off the blade automatically. Grinding oil is cleaned by a series of magnets that remove iron filings from the oil.

Designed by professional blade maintenance experts for quality and production, the BMS500 is the ultimate band blade sharpener on the market today.

The user-friendly control station includes a tooth counter display,

BMS600 - Same features as the BMS500, but with a larger pump for increased and efficient coolant flow.

BMS250 - PERSONAL BLADE SHARPENER

The BMS250 blade sharpener is ideal for the sawyer looking to invest in a high quality, automatic sharpener that can sharpen blades regularly and reliably for a timber cutting business.

The BMS250 automatically sharpens blades according to a set number of teeth. The hood enclosure and grinding wheel lift out of the way for easy blade installation and removal. It features an auto-shutoff, and a variable speed feed rate controlled from the control panel. The heavy-duty hood encloses the blade during sharpening and includes an exhaust vent. An oil wiper pads clean excess oil off the blade automatically. The BMS250 uses 127mm full profile CBN grinding wheels, which come in various profiles, and are ready to sharpen out-ofthe-box. The BMS250 is equipped with a 0.18kW single phase AC motor with a speed of 2800 rpm. An oil lubrication system keeps the blade cool

> for reuse. The tooth pusher is adjustable for fine-tuning, as well as the blade height platform is easily adjusted to manage blades from 25mm to 50mm wide.

during grinding, and magnets attract the metal filings, cleaning the oil

CBN WHEELS -

CBN WHEELS 127 MM (5") AND 203 MM (8")

Wood-Mizer supplies specially designed borazon grinding wheels in five profiles which exactly match our factory set profiles:

- 4/32 recommended for very hard or frozen wood
- 7/34 recommended for hardwood. works best with engines over 15kW
- 7/39 recommended for frozen/tropical/extreme hardwoods. works best with engines over 15kW
- 9/29 recommended for hard or frozen wood
- 10/30 recommended for general purpose sawing. softwoods or easy-to-saw hardwoods
- 13/29 recommended for softwoods

203mm borazon grinding wheels are available for all Wood-Mizer blade profiles. The 203mm wheel is made for use with the BMS500/600 industrial blade sharpener. The larger grinding surface provides longer sharpening life of the grinding wheel, and a faster grind, resulting in top quality sharpening.





TOOTH SETTERS -

BMT300 - AUTOMATIC TOOTH SETTER / SINGLE

The BMT300 industrial toothsetter is designed for professional blade sharpening businesses and large sawmill companies. Maximum blade width is 75mm, and the feed rate is up to 24 teeth per minute.

The BMT300 pneumatic setter ensures extremely accurate and consistent tooth setting. The computer "learns" from the first few teeth exactly how much pressure should be applied to ensure accurate setting. An electronic control panel displays all parameters and diagnostic tools. Simply install the blade, and start the setter in the mode you wish to run. When one side of the blade is finished, invert the blade, re-install it in the setter, and move the blade pusher into the reverse position.

Several different modes and functions allow flexibility with how the setter will operate and the parameters that

it will use. Inspection Mode simply checks the set on the teeth. Regular setting modes can detect set patterns, and bend back overset teeth automatically. After setting the blade, the setter will stop, or will double-check the blade to ensure that the set is exact. Tolerances for minimum and maximum set can be adjusted.

The BMT300 is designed as the toothsetting companion for the BMS500 blade sharpener for companies with multiple band sawmills in operation as well as for ReSharp service centres whose business is based on blade maintenance.



TOOTH SETTERS

BMT250 - DUAL TOOTH SETTER / WITH ELECTRIC **FEED SYSTEM**

The BMT250 dual toothsetter semi-automatically sets of both sides of your blades with high quality and efficiency. The BMT250 is equipped with electric power feed that keeps the blade moving smoothly forward until all teeth are set.

The BMT250 can be adjusted to set blades 25mm-75mm wide, and from 13mm-32mm tooth spacing. The BMT250 is controlled with a central control panel that features an automatic tooth counter, which stops when all teeth have been set.

The gauge precisely measures the set in each tooth to ensure your tooth set is accurate and ready to cut like a new blade again.



BMT200 - DUAL TOOTH SETTER / MANUAL CRANK

Set both sides of your blade at the same time easily with the manual BMT200 toothsetter, which will help you extend your blade's sharp life and get the most accurate cut of timber. The BMT200 is designed for affordable blade tooth setting. One turn of the crank sets two teeth and moves the blade forward at the same time.

The BMT200 handles 25mm-75mm blades, can set from 13mm-32mm tooth spacing, and can finely adjust tooth space indexing. The gauge precisely measures the set in each tooth to ensure your tooth set is accurate and ready to cut like a new blade again.



BMT150 – CRANK TOOTH SETTER

Set both sides of your blade at the same time easily with the manual BMT150 toothsetter, which will help you extend your blade's sharp life, improve cutting performance, and get the most accurate cut of timber.

The BMT150 is designed for affordable blade tooth setting. By pulling back on the lever, both teeth are set, and by pushing forward, the blade is advanced to the next set of teeth. This cycle continues until the blade is completely set. One cycle sets all blade teeth. There is no need to invert the blade.

The BMT150 handles 25mm-76mm blades, can set from 6mm-32mm tooth spacing, and can finely adjust tooth space indexing. A set gauge is included standard and precisely measures the set in each tooth to ensure your tooth set is accurate and ready to cut like a new blade again.



BMT100 – CRANK TOOTH SETTER

The BMT100 is designed for simple, accurate, and affordable blade tooth setting. Simply manually advance the blade and set one side at a time. The gauge precisely measures set in each tooth to ensure your tooth set is accurate and ready to cut like a new blade again. Once one side of the blade is completed, invert the blade and set the alternating teeth.

Adjustable blade arms allow you to handle 25mm-50mm blades, and indexing pawls support various blade profiles. The set point can be adjusted if required. For the individual who has low volume but who needs to ensure consistent set, the BMT100 is a great way to get started.





RESHARP SERVICE



LEAVE BLADE SHARPENING TO THE EXPERTS

Many of Wood-Mizer's distributors offer our full ReSharp service, where your blades are not only sharpened, but completely re-manufactured to like-new quality again. The same machines used to produce blades on Wood-Mizer's production lines are used by our ReSharp locations. Each blade is sharpened using the best CBN grinding technology, along with computerised tooth setting to ensure accuracy and straight, smooth cuts.

CUSTOMER BLADE MAINTENANCE PACKAGE

Wood-Mizer has developed a range of sharpening equipment to suit your needs from basic sharpeners to industrial high production sharpeners. For customers unable to benefit from a ReSharp Service, we have a Blade Maintenance Package that will allow you to recondition your own blades. The blade maintenance system will give you "near" factory results. Our sharpening and setting equipment has been carefully designed to be the best balance between low-cost, excellent results and long life under difficult working conditions.

All Wood-Mizer sharpeners utilise super abrasive CBN grinding wheel technology to ensure the best sharpening results. Wood-Mizer manufactures our own CBN wheels, which are pre-shaped to each blade profile, eliminating the need to configure your sharpening stone. When you use a Wood-Mizer CBN wheel to sharpen your blades, you are sharpening them to our factory specifications.