

# THREADING TOOLS FOR THE PRODUCTION OF NUTS





#### Application

- for fully automatic tapping of nuts with through hole threads in a run-over tapping process
- for nut height up to max. 1.5×d

#### Your advantage

- high productivity due to process-reliable chip evacuation and low tool wear
- qualified technical consulting by BASS specialists

### AMGB R

for welding

	Dimensions	
	М	M3 – M12
	MF	M4×0.5 – M12×1.5
	UNC	UNC No8-32 - UNC7/16"-14
	UNF	UNF No8-36 – UNF7/16"-20

# AMGB L

for soldering



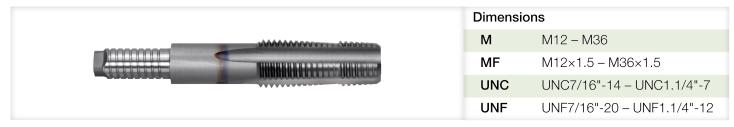
# AMGB V

screw system (cartridge)



# AMGB F

screw system (spring)





### **NUT TAPS**

#### Model

tool material	HSSE
thread length	standard 24 thread turns, different thread lengths on request
thread tolerance	customizable
coating	TIN / TICN
nut material	cold and hot formed steels up to grade 10
shank connection	AMGB R for welding AMGB L for soldering AMGB V with screw system (cartridge) AMGB F with screw system (spring)

### Shank

for AMGB V

#### Model

according to the machine type - or according to customer specifications

Dimensi	ons
М	M12 – M36
MF	M12×1.5 – M36×1.5
UNC	UNC7/16"-14 – UNC1.1/4"-7
UNF	UNF7/16"-20 – UNF1.1/4"-12

### Cartridge

for AMGB V

#### Application

The cartridge connects the tap nib with the bent shank. If the torque gets too high (tool wear) the cartridge breaks, disconnecting the assembly.

#### Your advantage

The cartridge saves shank and tap from breaking so that both are reusable.

Dimensio	ons
М	M12 – M36
MF	M12×1.5 – M36×1.5
UNC	UNC7/16"-14 - UNC1.1/4"-7
UNF	UNF7/16"-20 - UNF1.1/4"-12



# VARIO K RZ

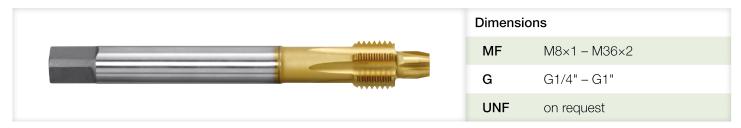
cutting tap with reamer

### Application

- for fully automatic tapping of union nuts in a reversing tapping cycle
- chamfer length min. 1.5 thread turns

#### Your advantage

Customized high quality cutting taps convince through best perfomance.



#### Model

tool material	HSSE
dimensions	customizable
thread tolerance	customizable
coating	TIN / HL
nut material	cold and hot formed steels up to grade 10

# **DURAMAX K RZ**

roll tap with reamer

#### Application

for union nuts with chamfer length min. 1 thread turns

#### Your advantage

Customized high quality roll taps convince through best perfomance.



#### Model

tool material	HSSE-PM
dimensions	customizable
thread tolerance	customizable
coating	TIN / TICN
nut material	cold formed steels





### **VARIANT H**

cutting tap with spiral point

#### Application

for tapping of nuts with through hole threads in a reversing tapping cycle

### Your advantage

Constant quality and high availability in different thread tolerances offer planning reliability.

Dimensio	ons
М	M2 – M24
MF	M8×1 – M30×1.5
UNC	UNC1/4"-20 - UNC1"-8
UNF	UNF1/4"-28 – UNF1"-12

### Model

tool material	HSSE
chamfer form	B/3.5–5.5
thread tolerance	6H / 6G / 7G / 6H+0.1 / on request
coating	TIN / TICN / HL
dimensions	DIN 371 / DIN 376
nut material	cold and hot formed steels up to grade 10

### **AVANT H25**

cutting tap with spiral flute 25°

#### Application

for tapping of nuts with blind hole threads in a reversing tapping process

#### Your advantage

- high process reliability due to optimal evacuation of chips
- high tool life

Dimensi	ons	
М	M2 – M24	
MF	M8×1 – M30×1.5	
UNC	UNC1/4"-20 – UNC1"-8	
UNF	UNF1/4"-28 – UNF1"-12	
G	G1/8" – G1"	

#### Model

tool material	HSSE
chamfer form	E / 1.5-2
thread tolerance	6HX / 6GX / on request
coating	HL
dimensions	DIN 371 / DIN 376
nut material	cold and hot formed steels up to grade 10



# **DURAMAX N**

roll tap

#### Application

for chipless threading of nuts with through or blind hole threads in a reversing tapping cycle

# Your advantage

- high tool life
- qualified technical consulting by BASS specialists

	Dimensions	
	М	M2 – M16
	MF	M8×1 – M24×1.5
	UNC	UNC1/4"-20 - UNC5/8"-11
	UNF	UNF1/4"-28 - UNF3/4"-16

#### Model

tool material	HSSE / HSSE-PM
chamfer form	C/2-3/E/1.5-2
thread tolerance	6HX / 6GX / on request
coating	TIN / TICN
dimensions	DIN 371 / DIN 376
nut material	cold formed steels

# Streicher Tapping Machines Partner of BASS







# **TECHNICAL INFORMATION – YOUR INQUIRY**

# **RUN-OVER TAPPING PROCESS**

Thread	dimension	tolerance	cutting direction RH LH	nut height
Nut material	material	cold formed hot formed	resistance [N/mm <sup>2</sup> ]	hardness
Tool data	thread length [turns]		number of flutes	coating
	sketch			
	shank connection screw system (cartridge) screw system (spring)		for soldering for welding	
	further tool data (dimensions,)		gauge dimension go: gauge dimension no-go:	
Machine	manufacturer	machine type	nut type	processing horizontal vertical
	number of spindles	coolant lubrication	cutting speed v_ [m/min]	rotation speed rpm [1/min]

# **REVERSING TAPPING PROCESS**

Thread	dimension	tolerance	Cutting direction RH LH	bore hole through hole blind hole
	bore depth [mm]	thread depth [mm]	bore hole diameter	process thread cutting thread roll forming
Nut material	material	cold formed hot formed	resistance [N/mm <sup>2</sup> ]	hardness
Tool data	chamfer form	flute form / design	number of flutes	coating
	l1 [mm]	12 [mm]		
	14 [mm]	d2 [mm]		
	a [mm]	d3 [mm]		
	further tool data (dimensions,)		gauge dimension go: gauge dimension no-go:	
Machine	manufacturer	machine type	workpiece clamping	processing horizontal vertical
	tool clamping	number of spindles	coolant lubrication	
	cutting speed v <sub>c</sub> [m/min]		rotation speed rpm [1/min]	





# www.bass-tools.com

BASS GmbH & Co. KG Tapping Technology Bass-Strasse 1 97996 Niederstetten Deutschland · Germany

 Tel.:
 +49 7932 892-0

 Fax:
 +49 7932 892-88

 E-Mail:
 info@bass-tools.com