

7. Drills

Drills

Drills with HM working part and holder made from steel permanently joint with carbide, brazed drills and monolithic drills made entirely from HM. Drills with HM tips, designed for professional machining of solid soft, hard and glued wood and other wood-based materials. They are used for through and dowel drilling, counterboring and drilling slots for hinge boxes.

Drills are manufactured from the highest quality carbide in a special shaping technology, properly selected for the machining process and material as well as type of work, parameters and conditions prevailing during the machining, in order to guarantee proper work of the tool and chip flow from the machining zone both in standard and extreme conditions. Monolithic drills are made entirely from high quality small-grain carbide in the advanced profile sharpening technology.

The tools are designed and produced with special rake face and optimized chip flow. Very precise manufacturing allows for working with rotation speed up to 9000 r.p.m. All drills are manufactured on modern CNC machines of world-renowned producers, which guarantee high accuracy and precision of the produced tools. Quality control takes place directly on the machine by using special

measurement systems as well as outside the machine on special measurement devices. The construction and production remains in accordance with all points of safety standard EN/PN-847-1 concerning tools for mechanical woodworking.

The *Drills* chapter includes only example types of drills with their basic dimensions. On special request, we can suggest, design and produce a proper tool for the required type of machining, material and parameters and conditions of work. Production time of drills marked as "+" as well as special ones made on client's request usually doesn't exceed 9-15 working days.

Orders should include

- working part diameter (D),
- shank part diameter (d),
- shank length (s),
- working part length (h),
- type of machined material,
- profile drawing with dimensions or profile sample,
- other information relevant for designing and production process.



Contents

7. DRILLS

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Pictograms



solid dry softwood



solid dry hardwood



chipboard



glued wood



MDF board



dowel drills



through drills



cylinder boring bits



mechanical feed



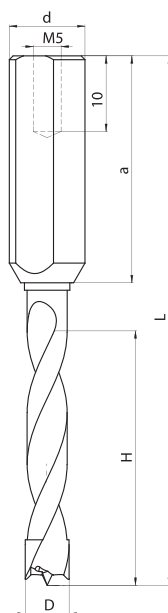
carbide



carbide monolith

• available/stock product
 + possible production time 9-15 working days.
 Minimum order: brazed drills - 10 pcs., monolithic drills - 8 pcs.

WN-31



Monolithic dowel drills with increased life, type **WN-31** designed for professional machining of wood and wood-based materials as chipboard, laminated board, MDF and others, for use on multi-spindle drilling machines.

This is a group of drills with HM core, which significantly increases working part stiffness, resulting in longer and stable work. Special blade geometry and manufacturing precision guarantee higher machining efficiency and blade's life.

Type of work: dowel drilling.

Material: wood and glued wood, chipboard, MDF and similar materials.



| Catalogue number | Type | D mm | d x a mm | L mm | H mm | ↗ | |
|------------------|-------|---------|-------------|---------|---------|---|---|
| K3500001 | WN-31 | 3 | 10 x 39 | 57,5 | 15 | R | • |
| K3500002 | WN-31 | 3 | 10 x 39 | 57,5 | 15 | L | • |
| K3500015 | WN-31 | 3,5 | 10 x 39 | 57,5 | 15 | R | • |
| K3500016 | WN-31 | 3,5 | 10 x 39 | 57,5 | 15 | L | • |
| K3500005 | WN-31 | 4 | 10 x 30 | 57,5 | 24 | R | • |
| K3500006 | WN-31 | 4 | 10 x 30 | 57,5 | 24 | L | • |
| K3500007 | WN-31 | 5 | 10 x 30 | 57,5 | 24 | R | • |
| K3500008 | WN-31 | 5 | 10 x 30 | 57,5 | 24 | L | • |
| K3500009 | WN-31 | 6 | 10 x 30 | 57,5 | 24 | R | • |
| K3500010 | WN-31 | 6 | 10 x 30 | 57,5 | 24 | L | • |
| K3500011 | WN-31 | 8 | 10 x 30 | 57,5 | 24 | R | • |
| K3500012 | WN-31 | 8 | 10 x 30 | 57,5 | 24 | L | • |
| K3500013 | WN-31 | 10 | 10 x 30 | 57,5 | 24 | R | + |
| K3500014 | WN-31 | 10 | 10 x 30 | 57,5 | 24 | L | + |

Drills D=10 mm made entirely from HM,
without regulating screw in the shank.

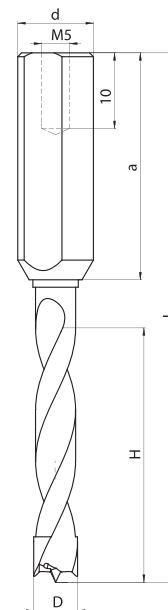
Monolithic dowel drills with increased life, type **WN-32** designed for professional machining of wood and wood-based materials as chipboard, laminated board, MDF and others, for use on multi-spindle drilling machines.

This is a group of drills with HM core which significantly increases working part stiffness, resulting in longer and stable work. Special blade geometry and manufacturing precision guarantee higher machining efficiency and blade's life.

Type of work: dowel drilling.

Material: wood and glued wood, chipboard, MDF and similar materials.

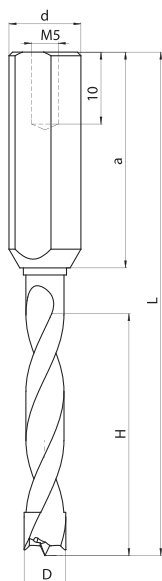
WN-32



| Catalogue number | Type | D mm | d x a mm | L mm | H mm | ↗ | |
|------------------|-------|---------|-------------|---------|---------|---|---|
| K5100005 | WN-32 | 3 | 10 x 39 | 70 | 28 | R | • |
| K5100006 | WN-32 | 3 | 10 x 39 | 70 | 28 | L | • |
| K5100015 | WN-32 | 3,5 | 10 x 30 | 70 | 35 | R | • |
| K5100016 | WN-32 | 3,5 | 10 x 30 | 70 | 35 | L | • |
| K5100007 | WN-32 | 4 | 10 x 30 | 70 | 35 | R | • |
| K5100008 | WN-32 | 4 | 10 x 30 | 70 | 35 | L | • |
| K5100017 | WN-32 | 4,5 | 10 x 30 | 70 | 35 | R | • |
| K5100018 | WN-32 | 4,5 | 10 x 30 | 70 | 35 | L | • |
| K5100001 | WN-32 | 5 | 10 x 30 | 70 | 35 | R | • |
| K5100002 | WN-32 | 5 | 10 x 30 | 70 | 35 | L | • |
| K5100019 | WN-32 | 5,5 | 10 x 30 | 70 | 35 | R | • |
| K5100020 | WN-32 | 5,5 | 10 x 30 | 70 | 35 | L | • |
| K5100009 | WN-32 | 6 | 10 x 30 | 70 | 35 | R | • |
| K5100010 | WN-32 | 6 | 10 x 30 | 70 | 35 | L | • |
| K5100003 | WN-32 | 8 | 10 x 30 | 70 | 35 | R | • |
| K5100004 | WN-32 | 8 | 10 x 30 | 70 | 35 | L | • |
| K5100011 | WN-32 | 10 | 10 x 30 | 70 | 35 | R | + |
| K5100012 | WN-32 | 10 | 10 x 30 | 70 | 35 | L | + |

Drills D=10 mm made entirely from HM,
without regulating screw in the shank.

WN-37



Monolithic dowel drills with increased life, type **WN-37** designed for professional machining of wood and wood-based materials as chipboard, laminated board, MDF and others, for use on multi-spindle drilling machines.

This is a group of drills with HM core, which significantly increases working part stiffness, resulting in longer and stable work. Special blade geometry and manufacturing precision guarantee higher machining efficiency and blade's life.

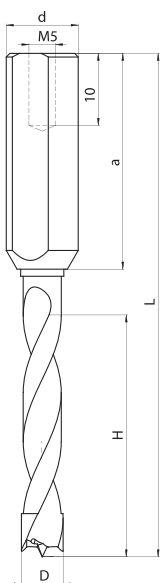
Type of work: dowel drilling

Material: wood and glued wood, chipboard, MDF and similar materials.



| Catalogue number | Type | D mm | d x a mm | L mm | H mm | ↙ | |
|------------------|-------|------|----------|------|------|---|---|
| K5800007 | WN-37 | 5 | 10 x30 | 77 | 45 | R | • |
| K5800008 | WN-37 | 5 | 10 x30 | 77 | 45 | L | • |
| K5800005 | WN-37 | 5,5 | 10 x30 | 77 | 45 | R | • |
| K5800006 | WN-37 | 5,5 | 10 x30 | 77 | 45 | L | • |
| K5800003 | WN-37 | 6 | 10 x30 | 77 | 45 | R | • |
| K5800004 | WN-37 | 6 | 10 x30 | 77 | 45 | L | • |

WN-41



Monolithic dowel drills with increased life, type **WN-41** designed for professional machining of wood and wood-based materials as chipboard, laminated board, MDF and others, for use on multi-spindle drilling machines.

This is a group of drills with HM core, which significantly increases working part stiffness, resulting in longer and stable work. Special blade geometry and manufacturing precision guarantee higher machining efficiency and blade's life.

Type of work: dowel drilling

Material: wood and glued wood, chipboard, MDF and similar materials.



| Catalogue number | Type | D mm | d x a mm | L mm | H mm | ↙ | |
|------------------|-------|------|----------|------|------|---|---|
| K6800001 | WN-41 | 5 | 10 x30 | 90 | 55 | R | • |
| K6800002 | WN-41 | 5 | 10 x30 | 90 | 55 | L | • |
| K6800003 | WN-41 | 5,5 | 10 x30 | 90 | 55 | R | + |
| K6800004 | WN-41 | 5,5 | 10 x30 | 90 | 55 | L | + |

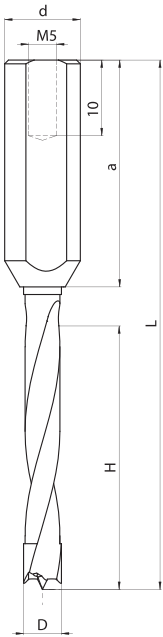
Monolithic dowel drills with increased life, type **WN-45** designed for making holes in solid wood. Special construction of the drill allows for better chip flow which guarantees high quality of solid wood machining.

This is a group of drills with HM core which significantly increases working part stiffness, resulting in longer and stable work. Special blade geometry and manufacturing precision guarantee higher machining efficiency and blade's life.

Type of work: dowel drilling

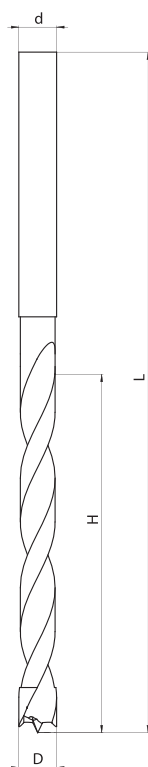
Material: solid wood

WN-45 for wood



| Catalogue number | Type | D mm | d x a mm | L mm | H mm | ↙ | |
|------------------|-------|---------|-------------|---------|---------|---|---|
| K8200001 | WN-45 | 5 | 10 x 30 | 77 | 45 | R | + |
| K8200002 | WN-45 | 5 | 10 x 30 | 77 | 45 | L | + |
| K8200003 | WN-45 | 6 | 10 x 30 | 77 | 45 | R | + |
| K8200004 | WN-45 | 6 | 10 x 30 | 77 | 45 | L | + |
| K8200005 | WN-45 | 8 | 10 x 30 | 77 | 45 | R | + |
| K8200006 | WN-45 | 8 | 10 x 30 | 77 | 45 | L | + |

WN-46



Monolithic dowel drills with increased life, type **WN-46**, characterized by equal diameter of the working part and shank, designed for professional machining of wood and wood-based materials as chipboard, laminated board, MDF and others, for use on multi-spindle drilling machines.

This is a group of full HM drills with increased stiffness, resulting in longer and stable work. Special blade geometry and manufacturing precision guarantee higher machining efficiency and blade's life.

Drills made entirely from carbide, without the flat part and regulation screw in the shank.

Type of work: dowel drilling.

Material: wood and glued wood, chipboard, MDF and similar materials.



| Catalogue number | Type | D mm | L mm | H mm | ↗ | |
|------------------|-------|---------|---------|---------|---|---|
| K8400001 | WN-46 | 3 | 70 | 35 | R | + |
| K8400002 | WN-46 | 3 | 70 | 35 | L | + |
| K8400003 | WN-46 | 4 | 80 | 45 | R | + |
| K8400004 | WN-46 | 4 | 80 | 45 | L | + |
| K8400007 | WN-46 | 5 | 90 | 50 | R | + |
| K8400008 | WN-46 | 5 | 90 | 50 | L | + |

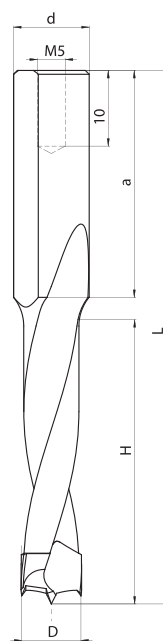
We offer the flat part on the shank
on customer's request.

Dowel drills with HM tip, type **WN-01**, designed for professional machining of wood and wood-based materials as chipboard, laminated board, MDF and others, for use on multi-spindle drilling machines.

Type of work: dowel drilling.

Material: wood and glued wood, chipboard, MDF and similar materials.

WN-01



| Catalogue number | Type | D mm | d x a mm | L mm | H mm | ↗ | |
|------------------|-------|---------|-------------|---------|---------|---|---|
| K0100005 | WN-01 | 6 | 10 x 30 | 70 | 35 | R | • |
| K0100006 | WN-01 | 6 | 10 x 30 | 70 | 35 | L | • |
| K0100019 | WN-01 | 6,5 | 10 x 30 | 70 | 35 | R | + |
| K0100020 | WN-01 | 6,5 | 10 x 30 | 70 | 35 | L | + |
| K0100007 | WN-01 | 7 | 10 x 30 | 70 | 35 | R | • |
| K0100008 | WN-01 | 7 | 10 x 30 | 70 | 35 | L | • |
| K0100021 | WN-01 | 7,5 | 10 x 30 | 70 | 35 | R | • |
| K0100022 | WN-01 | 7,5 | 10 x 30 | 70 | 35 | L | • |
| K0100009 | WN-01 | 8 | 10 x 30 | 70 | 35 | R | • |
| K0100010 | WN-01 | 8 | 10 x 30 | 70 | 35 | L | • |
| K0100059 | WN-01 | 8,2 | 10 x 30 | 70 | 35 | R | • |
| K0100060 | WN-01 | 8,2 | 10 x 30 | 70 | 35 | L | • |
| K0100023 | WN-01 | 8,5 | 10 x 30 | 70 | 35 | R | • |
| K0100024 | WN-01 | 8,5 | 10 x 30 | 70 | 35 | L | • |
| K0100025 | WN-01 | 9 | 10 x 30 | 70 | 35 | R | • |
| K0100026 | WN-01 | 9 | 10 x 30 | 70 | 35 | L | • |
| K0100011 | WN-01 | 10 | 10 x 30 | 70 | 35 | R | • |
| K0100012 | WN-01 | 10 | 10 x 30 | 70 | 35 | L | • |
| K0100027 | WN-01 | 11 | 10 x 30 | 70 | 35 | R | • |
| K0100028 | WN-01 | 11 | 10 x 30 | 70 | 35 | L | • |
| K0100013 | WN-01 | 12 | 10 x 30 | 70 | 35 | R | • |
| K0100014 | WN-01 | 12 | 10 x 30 | 70 | 35 | L | • |
| K0100029 | WN-01 | 13 | 10 x 30 | 70 | 35 | R | • |
| K0100030 | WN-01 | 13 | 10 x 30 | 70 | 35 | L | • |
| K0100033 | WN-01 | 15 | 10 x 30 | 70 | 35 | R | • |
| K0100034 | WN-01 | 15 | 10 x 30 | 70 | 35 | L | • |

The drills can be used with PG-02 countersink installed on the shank.

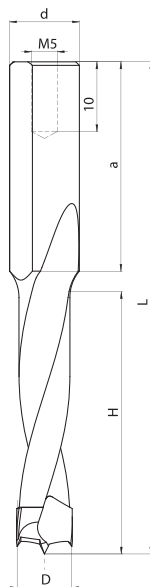
More information on page 7.26 of our catalogue.

WN-02

Dowel drills with HM tip, type **WN-02**, designed for professional machining of wood and wood-based materials as chipboard, laminated board, MDF and others, for use on multi-spindle drilling machines.

Type of work: dowel drilling.

Material: wood and glued wood, chipboard, MDF and similar materials.



| Catalogue number | Type | D mm | d x a mm | L mm | H mm | ↻ | |
|------------------|-------|---------|-------------|---------|---------|---|---|
| K0200003 | WN-02 | 6 | 10 x 27 | 57,5 | 25 | R | + |
| K0200004 | WN-02 | 6 | 10 x 27 | 57,5 | 25 | L | + |
| K0200015 | WN-02 | 7 | 10 x 27 | 57,5 | 25 | R | • |
| K0200016 | WN-02 | 7 | 10 x 27 | 57,5 | 25 | L | • |
| K0200013 | WN-02 | 7,5 | 10 x 27 | 57,5 | 25 | R | + |
| K0200014 | WN-02 | 7,5 | 10 x 27 | 57,5 | 25 | L | + |
| K0200005 | WN-02 | 8 | 10 x 27 | 57,5 | 25 | R | • |
| K0200006 | WN-02 | 8 | 10 x 27 | 57,5 | 25 | L | • |
| K0200019 | WN-02 | 8,2 | 10 x 27 | 57,5 | 25 | R | + |
| K0200020 | WN-02 | 8,2 | 10 x 27 | 57,5 | 25 | L | + |
| K0200007 | WN-02 | 10 | 10 x 27 | 57,5 | 25 | R | • |
| K0200008 | WN-02 | 10 | 10 x 27 | 57,5 | 25 | L | • |
| K0200023 | WN-02 | 12 | 10 x 27 | 57,5 | 25 | R | + |
| K0200024 | WN-02 | 12 | 10 x 27 | 57,5 | 25 | L | + |
| K0200031 | WN-02 | 14 | 10 x 27 | 57,5 | 25 | R | + |
| K0200032 | WN-02 | 14 | 10 x 27 | 57,5 | 25 | L | + |
| K0200025 | WN-02 | 15 | 10 x 27 | 57,5 | 25 | R | + |
| K0200026 | WN-02 | 15 | 10 x 27 | 57,5 | 25 | L | + |

The drills can be used with PG-02 countersink installed on the shank.

More information on page 7.26 of our catalogue.

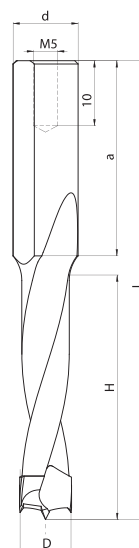
Dowel drills with HM tip, type **WN-04**, designed for professional machining of wood and wood-based materials as chipboard, laminated board, MDF and others, for use on multi-spindle drilling machines.

Type of work: dowel drilling.

Material: wood and glued wood, chipboard, MDF and similar materials.



WN-04



| Catalogue number | Type | D mm | d x a mm | L mm | H mm | ↙ | |
|------------------|-------|------|----------|------|------|---|---|
| K0400023 | WN-04 | 6,5 | 10 x 30 | 77 | 40 | R | + |
| K0400024 | WN-04 | 6,5 | 10 x 30 | 77 | 40 | L | + |
| K0400025 | WN-04 | 7 | 10 x 30 | 77 | 40 | R | + |
| K0400026 | WN-04 | 7 | 10 x 30 | 77 | 40 | L | + |
| K0400009 | WN-04 | 8 | 10 x 30 | 77 | 40 | R | • |
| K0400010 | WN-04 | 8 | 10 x 30 | 77 | 40 | L | • |

Dowel drills with HM tip and double helix line, type **WN-06**, designed for professional machining of wood and wood-based materials as chipboard, laminated board, MDF and others, for use on multi-spindle drilling machines.

Type of work: dowel drilling.

Material: wood and glued wood, chipboard, MDF and similar materials.



WN-06

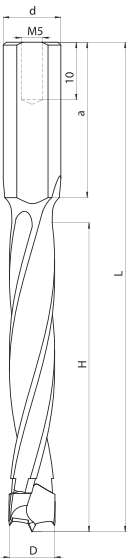


| Catalogue number | Type | D mm | d x a mm | L mm | H mm | ↙ | |
|------------------|-------|------|----------|------|------|---|---|
| K0600015 | WN-06 | 7 | 10 x 27 | 90 | 55 | R | + |
| K0600016 | WN-06 | 7 | 10 x 27 | 90 | 55 | L | + |
| K0600001 | WN-06 | 7,5 | 10 x 27 | 90 | 55 | R | + |
| K0600002 | WN-06 | 7,5 | 10 x 27 | 90 | 55 | L | + |
| K0600013 | WN-06 | 8 | 10 x 27 | 90 | 55 | R | • |
| K0600014 | WN-06 | 8 | 10 x 27 | 90 | 55 | L | • |

The drills can be used with PG-01 countersink installed on the working part.

More information on page 7.26 of our catalogue.

WN-07




Dowel drills with HM tip and double helix line, type **WN-07**, designed for professional machining of wood and wood-based materials as chipboard, laminated board, MDF and others, for use on multi-spindle drilling machines.

Type of work: dowel drilling.

Material: wood and glued wood, chipboard, MDF and similar materials.



| Catalogue number | Type | D mm | d x a mm | L mm | H mm |  | |
|------------------|-------|------|----------|------|------|---|---|
| K0700005 | WN-07 | 7 | 10 x 27 | 85 | 45 | R | + |
| K0700006 | WN-07 | 7 | 10 x 27 | 85 | 45 | L | + |

The drills can be used with PG-01 countersink installed on the working part.
More information on page 7.26 of our catalogue.

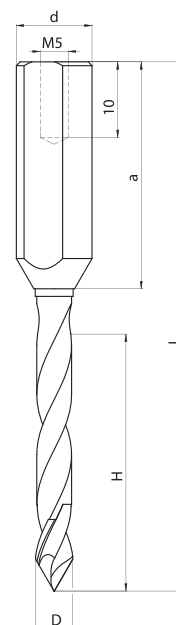
WP-15

Monolithic through drills with increased life, type **WP-15** designed for professional machining of wood and wood-based materials as chipboard, laminated board, MDF and others, for use on multi-spindle drilling machines.

This is a group of drills with HM core which significantly increases working part stiffness, resulting in longer and stable work. Special blade geometry and manufacturing precision guarantee higher machining efficiency and blade's life.

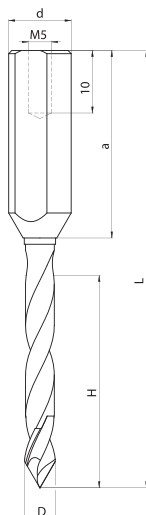
Type of work: through drilling.

Material: wood and glued wood, chipboard, MDF and similar materials.



| Catalogue number | Type | D mm | d x a mm | L mm | H mm | ↗ | |
|------------------|-------|---------|-------------|---------|---------|---|---|
| K4700009 | WP-15 | 3 | 10 x 39 | 70 | 28 | R | • |
| K4700010 | WP-15 | 3 | 10 x 39 | 70 | 28 | L | • |
| K4700011 | WP-15 | 4 | 10 x 30 | 70 | 35 | R | • |
| K4700012 | WP-15 | 4 | 10 x 30 | 70 | 35 | L | • |
| K4700013 | WP-15 | 4,5 | 10 x 30 | 70 | 35 | R | • |
| K4700014 | WP-15 | 4,5 | 10 x 30 | 70 | 35 | L | • |
| K4700003 | WP-15 | 5 | 10 x 30 | 70 | 35 | R | • |
| K4700004 | WP-15 | 5 | 10 x 30 | 70 | 35 | L | • |
| K4700015 | WP-15 | 5,5 | 10 x 30 | 70 | 35 | R | + |
| K4700016 | WP-15 | 5,5 | 10 x 30 | 70 | 35 | L | + |
| K4700005 | WP-15 | 6 | 10 x 30 | 70 | 35 | R | • |
| K4700006 | WP-15 | 6 | 10 x 30 | 70 | 35 | L | • |
| K4700001 | WP-15 | 8 | 10 x 30 | 70 | 35 | R | • |
| K4700002 | WP-15 | 8 | 10 x 30 | 70 | 35 | L | • |

WP-26



Monolithic through drills with increased life, type **WP-26** designed for professional machining of wood and wood-based materials as chipboard, laminated board, MDF and others, for use on multi-spindle drilling machines.

This is a group of drills with HM core which significantly increases working part stiffness, resulting in longer and stable work. Special blade geometry and manufacturing precision guarantee higher machining efficiency and blade's life.

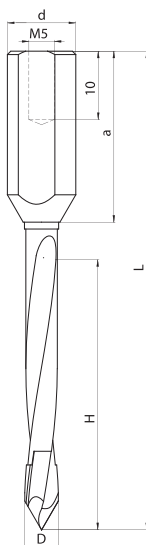
Type of work: through drilling.

Material: wood and glued wood, chipboard, MDF and similar materials.



| Catalogue number | Type | D mm | d x a mm | L mm | H mm | ↖ | |
|------------------|-------|------|----------|------|------|---|---|
| K7000001 | WP-26 | 5 | 10 x 30 | 77 | 45 | R | • |
| K7000002 | WP-26 | 5 | 10 x 30 | 77 | 45 | L | • |
| K7000003 | WP-26 | 5,5 | 10 x 30 | 77 | 45 | R | + |
| K7000004 | WP-26 | 5,5 | 10 x 30 | 77 | 45 | L | + |
| K7000005 | WP-26 | 6 | 10 x 30 | 77 | 45 | R | + |
| K7000006 | WP-26 | 6 | 10 x 30 | 77 | 45 | L | + |

WP-35 for wood



Monolithic through drills with increased life, type **WP-35** designed for making holes in solid wood. Special construction of the drill allows for better chip flow which guarantees high quality of solid wood machining.

This is a group of drills with HM core which significantly increases working part stiffness, resulting in longer and stable work. Special blade geometry and manufacturing precision guarantee higher machining efficiency and blade's life.

Type of work: through drilling.

Material: solid wood.



| Catalogue number | Type | D mm | d x a mm | L mm | H mm | ↖ | |
|------------------|-------|------|----------|------|------|---|---|
| K8100001 | WP-35 | 5 | 10 x 30 | 77 | 45 | R | + |
| K8100002 | WP-35 | 5 | 10 x 30 | 77 | 45 | L | + |
| K8100003 | WP-35 | 6 | 10 x 30 | 77 | 45 | R | + |
| K8100004 | WP-35 | 6 | 10 x 30 | 77 | 45 | L | + |
| K8100005 | WP-35 | 8 | 10 x 30 | 77 | 45 | R | + |
| K8100006 | WP-35 | 8 | 10 x 30 | 77 | 45 | L | + |

WP-36

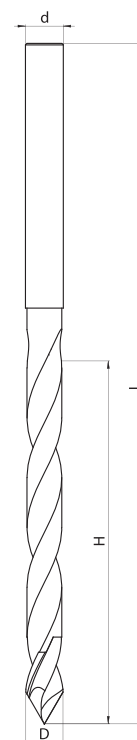
Monolithic through drills with increased life, type **WP-36**, characterized by equal diameter of the working part and shank, designed for professional machining of wood and wood-based materials as chipboard, laminated board, MDF and others, for use on multi-spindle drilling machines.

This is a group of full HM drills with increased stiffness, which results in longer and stable work. Special blade geometry and manufacturing precision guarantee higher machining efficiency and blade's life.

Drills made entirely from carbide, without the flat part and regulation screw in the shank.

Type of work: through drilling.

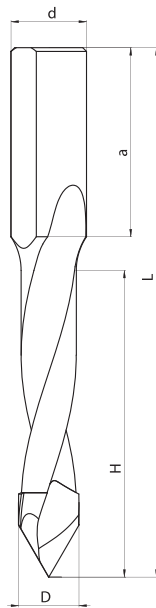
Material: wood and glued wood, chipboard, MDF and similar materials.



| Catalogue number | Type | D mm | L mm | H mm | ↗ | |
|------------------|-------|---------|---------|---------|---|---|
| K8300001 | WP-36 | 3 | 70 | 35 | R | + |
| K8300002 | WP-36 | 3 | 70 | 35 | L | + |
| K8300003 | WP-36 | 4 | 80 | 45 | R | + |
| K8300004 | WP-36 | 4 | 80 | 45 | L | + |
| K8300007 | WP-36 | 5 | 90 | 50 | R | + |
| K8300008 | WP-36 | 5 | 90 | 50 | L | + |

We offer the flat part on the shank
on customer's request.

WP-01




Through drills with HM tip, type **WP-01**, designed for professional machining of wood and wood-based materials as chipboard, laminated board, MDF and others, for use on multi-spindle drilling machines.

Type of work: through drilling.

Material: wood and glued wood, chipboard, MDF and similar materials.

7



| Catalogue number | Type | D mm | d x a mm | L mm | H mm |  | |
|------------------|-------|---------|-------------|---------|---------|---|---|
| K0500005 | WP-01 | 6 | 10 x 25 | 70 | 40 | R | • |
| K0500006 | WP-01 | 6 | 10 x 25 | 70 | 40 | L | • |
| K0500019 | WP-01 | 6,5 | 10 x 25 | 70 | 40 | R | + |
| K0500020 | WP-01 | 6,5 | 10 x 25 | 70 | 40 | L | + |
| K0500007 | WP-01 | 7 | 10 x 25 | 70 | 40 | R | • |
| K0500008 | WP-01 | 7 | 10 x 25 | 70 | 40 | L | • |
| K0500025 | WP-01 | 7,5 | 10 x 25 | 70 | 40 | R | + |
| K0500026 | WP-01 | 7,5 | 10 x 25 | 70 | 40 | L | + |
| K0500009 | WP-01 | 8 | 10 x 25 | 70 | 40 | R | • |
| K0500010 | WP-01 | 8 | 10 x 25 | 70 | 40 | L | • |
| K0500035 | WP-01 | 9 | 10 x 25 | 70 | 40 | R | + |
| K0500036 | WP-01 | 9 | 10 x 25 | 70 | 40 | L | + |
| K0500011 | WP-01 | 10 | 10 x 25 | 70 | 40 | R | • |
| K0500012 | WP-01 | 10 | 10 x 25 | 70 | 40 | L | • |
| K0500013 | WP-01 | 12 | 10 x 25 | 70 | 40 | R | • |
| K0500014 | WP-01 | 12 | 10 x 25 | 70 | 40 | L | • |

The drills can be used with PG-02 countersink installed on the shank.

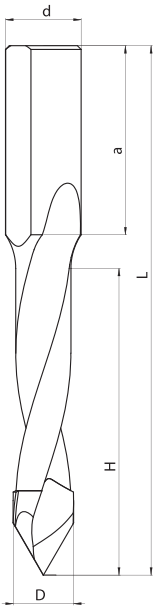
More information on page 7.26 of our catalogue.


WP-06

Through drills with HM tip, type **WP-06**, designed for professional machining of wood and wood-based materials as chipboard, laminated board, MDF and others, for use on multi-spindle drilling machines.

Type of work: through drilling.

Material: wood and glued wood, chipboard, MDF and similar materials.



| Catalogue number | Type | D mm | d x a mm | L mm | H mm |  | |
|------------------|-------|---------|-------------|---------|---------|---|---|
| K2000001 | WP-06 | 7 | 10 x 25 | 77 | 45 | R | + |
| K2000002 | WP-06 | 7 | 10 x 25 | 77 | 45 | L | + |
| K2000009 | WP-06 | 8 | 10 x 25 | 77 | 45 | R | • |
| K2000010 | WP-06 | 8 | 10 x 25 | 77 | 45 | L | • |

The drills can be used with PG-02 countersink installed on the shank.
More information on page 7.26 of our catalogue.

WN-48, WP-42



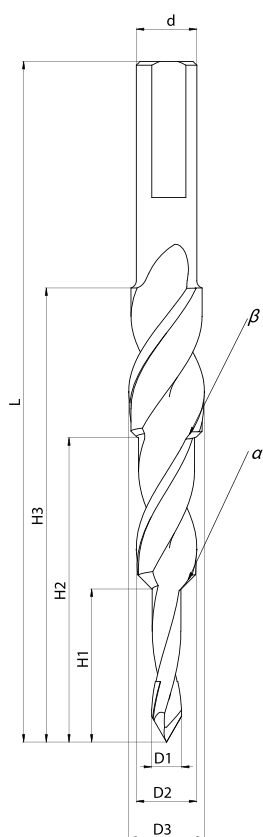
Monolithic step drills with increased life, dowel type **WN-48** and through type **WP-42**, designed for professional machining of wood and wood-based materials as chipboard, laminated board, MDF and others, for use on multi-spindle drilling machines. Special construction of the drill allows for making high quality combined holes without using the countersink.


This is a group of full HM drills with increased rigidity, which results in longer and stable work. Special blade geometry and manufacturing precision guarantee higher machining efficiency and blade's life.

Step drills are made entirely from carbide, without regulation screw in the shank, on individual customer's request.

We can manufacture step drills:

- dowel or through type,
- with various α and β angles,
- with or without the flat part in the shank.



| Catalogue number | Type | D ₁ mm | D ₂ mm | d | L mm | H ₁ mm | H ₂ mm |  | |
|------------------|-------|----------------------|----------------------|----|---------|----------------------|----------------------|---|---|
| K9200001 | WP-42 | 6 | 10 | 10 | 105 | 45 | 65 | R | + |
| K9200005 | WP-42 | 8 | 10 | 10 | 60 | 55 | 65 | R | + |

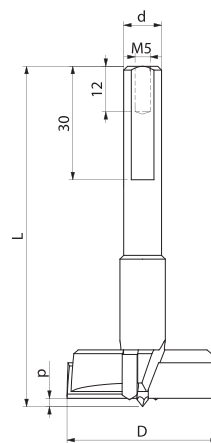
Cylinder boring bits with HM tip, type **TW-301** (right) designed for making holes for box hinges in wood and wood-based materials as chipboard, laminated board, MDF and others.

Type of work: dowel drilling.

Material: wood and glued wood, chipboard, MDF and similar materials.

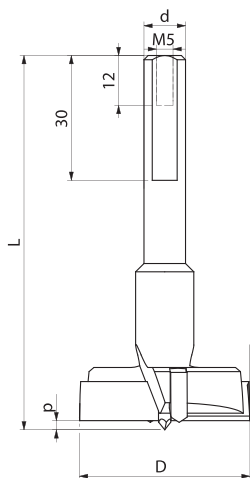


TW-301 right



| Catalogue number | Type | D mm | L mm | d mm | p mm | ↗ | n _{max} | |
|------------------|--------|---------|---------|---------|---------|---|------------------|---|
| W0100080 | TW-301 | 15 | 57 | 8 | 1,5 | R | 9000 | + |
| W0100001 | TW-301 | 15 | 57 | 10 | 1,5 | R | 9000 | • |
| W0100067 | TW-301 | 15 | 70 | 10 | 1,5 | R | 9000 | • |
| W0100307 | TW-301 | 15 | 90 | 10 | 1,5 | R | 9000 | + |
| W0100002 | TW-301 | 16 | 57 | 10 | 1,5 | R | 9000 | • |
| W0100003 | TW-301 | 17 | 57 | 10 | 1,5 | R | 9000 | + |
| W0100004 | TW-301 | 18 | 57 | 10 | 1,5 | R | 9000 | • |
| W0100005 | TW-301 | 19 | 57 | 10 | 1,5 | R | 9000 | • |
| W0100081 | TW-301 | 20 | 57 | 8 | 1,5 | R | 9000 | + |
| W0100006 | TW-301 | 20 | 57 | 10 | 1,5 | R | 9000 | • |
| W0100082 | TW-301 | 20 | 70 | 10 | 1,5 | R | 9000 | • |
| W0100250 | TW-301 | 20 | 90 | 10 | 1,5 | R | 9000 | + |
| W0100007 | TW-301 | 22 | 57 | 10 | 1,5 | R | 9000 | • |
| W0100008 | TW-301 | 24 | 57 | 10 | 1,5 | R | 9000 | • |
| W0100058 | TW-301 | 25 | 57 | 8 | 1,5 | R | 9000 | + |
| W0100009 | TW-301 | 25 | 57 | 10 | 1,5 | R | 9000 | • |
| W0100063 | TW-301 | 25 | 70 | 10 | 1,5 | R | 9000 | • |
| W0100064 | TW-301 | 25 | 90 | 10 | 1,5 | R | 9000 | + |
| W0100010 | TW-301 | 26 | 57 | 10 | 1,5 | R | 9000 | • |
| W0100011 | TW-301 | 30 | 57 | 10 | 1,5 | R | 9000 | • |
| W0100012 | TW-301 | 34 | 57 | 10 | 1,5 | R | 9000 | • |
| W0100212 | TW-301 | 35 | 57 | 8 | 1,5 | R | 9000 | + |
| W0100013 | TW-301 | 35 | 57 | 10 | 1,5 | R | 9000 | • |
| W0100062 | TW-301 | 35 | 70 | 10 | 1,5 | R | 9000 | • |
| W0100233 | TW-301 | 35 | 90 | 10 | 1,5 | R | 9000 | + |
| W0100014 | TW-301 | 40 | 57 | 10 | 2,2 | R | 9000 | • |
| W0100015 | TW-301 | 45 | 57 | 10 | 2,2 | R | 9000 | • |
| W0100016 | TW-301 | 50 | 57 | 10 | 2,2 | R | 6000 | • |
| W0100047 | TW-301 | 50 | 70 | 10 | 2,2 | R | 6000 | + |
| W0100282 | TW-301 | 50 | 90 | 10 | 2,2 | R | 6000 | + |
| W0100018 | TW-301 | 55 | 57 | 10 | 2,2 | R | 6000 | • |
| W0100017 | TW-301 | 60 | 57 | 10 | 2,2 | R | 6000 | • |

TW-302 left



Cylinder boring bits with HM tip, type **TW-302** (left) designed for making holes for box hinges in wood and wood-based materials as chipboard, laminated board, MDF and others.

Type of work: dowel drilling.

Material: glued wood, chipboard, MDF and similar materials.



| Catalogue number | Type | D mm | L mm | d mm | P mm | | n _{max} | |
|------------------|--------|---------|---------|---------|---------|---|------------------|---|
| W0200001 | TW-302 | 15 | 57 | 10 | 1,5 | L | 9000 | • |
| W0200054 | TW-302 | 15 | 70 | 10 | 1,5 | L | 9000 | • |
| W0200002 | TW-302 | 16 | 57 | 10 | 1,5 | L | 9000 | + |
| W0200004 | TW-302 | 18 | 57 | 10 | 1,5 | L | 9000 | + |
| W0200006 | TW-302 | 20 | 57 | 10 | 1,5 | L | 9000 | • |
| W0200059 | TW-302 | 20 | 70 | 10 | 1,5 | L | 9000 | • |
| W0200009 | TW-302 | 25 | 57 | 10 | 1,5 | L | 9000 | + |
| W0200052 | TW-302 | 25 | 70 | 10 | 1,5 | L | 9000 | • |
| W0200053 | TW-302 | 25 | 90 | 10 | 1,5 | L | 9000 | + |
| W0200010 | TW-302 | 26 | 57 | 10 | 1,5 | L | 9000 | • |
| W0200011 | TW-302 | 30 | 57 | 10 | 1,5 | L | 9000 | + |
| W0200012 | TW-302 | 34 | 57 | 10 | 1,5 | L | 9000 | + |
| W0200013 | TW-302 | 35 | 57 | 10 | 1,5 | L | 9000 | • |
| W0200051 | TW-302 | 35 | 70 | 10 | 1,5 | L | 9000 | • |
| W0200086 | TW-302 | 40 | 90 | 10 | 1,5 | L | 9000 | + |

Cylinder boring bits with HM tip, type **TW-301** (right) designed for making holes for box hinges in wood and wood-based materials as chipboard, laminated board, MDF and others.

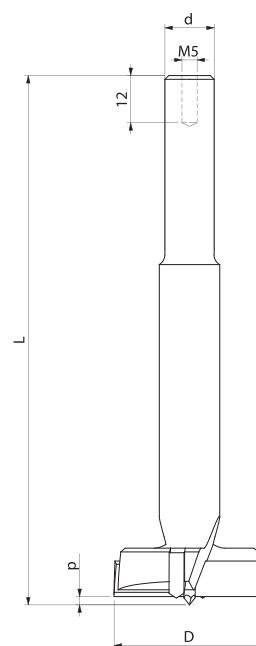
Boring bits with shank other than $d=10$ mm are made as standard without the flat part.

Type of work: dowel drilling.

Material: glued wood, chipboard, MDF and similar materials.



TW-301



| Catalogue number | Type | D mm | L mm | d mm | p mm | ↗ | n _{max} | |
|------------------|--------|---------|---------|---------|---------|---|------------------|---|
| W0100388 | TW-301 | 25 | 140 | 13 | 1,5 | R | 9000 | + |
| W0100147 | TW-301 | 50 | 140 | 16 | 2,2 | R | 6000 | + |

We offer the flat part on the shank on customer's request.

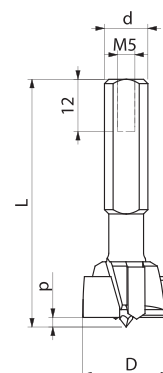
Cylinder boring bits with HM tip and decreased pilot (centering point) height, type **TW-301A** (right) designed for making holes for box hinges in wood and wood-based materials as chipboard, laminated board, MDF and others. Special boring bit construction – decreased pilot height eliminates the risk of ripping the material on the other side of the board, with small material thickness.

Type of work: dowel drilling.

Material: glued wood, chipboard, MDF and similar materials.

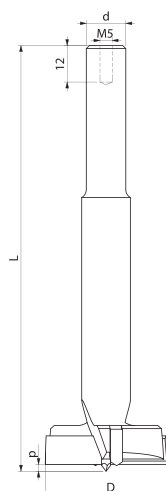


TW-301A



| Catalogue number | Type | D mm | L mm | d mm | p mm | ↗ | n _{max} | |
|------------------|---------|---------|---------|---------|---------|---|------------------|---|
| W0100336 | TW-301A | 15 | 57 | 10 | 1 | R | 9000 | + |
| W0100098 | TW-301A | 15 | 70 | 10 | 1 | R | 9000 | + |

TW-302



Cylinder boring bits with HM tip, type **TW-302** (left) designed for making holes for box hinges in wood and wood-based materials as chipboard, laminated board, MDF and others.

Drills with shank other than $d=10$ mm are made as standard without the flat part.

Type of work: dowel drilling.

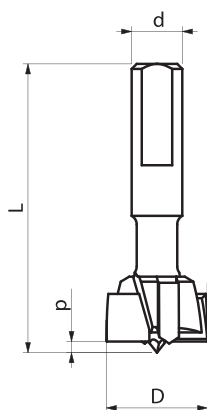
Material: glued wood, chipboard, MDF and similar materials.



| Catalogue number | Type | D mm | L mm | d mm | P mm | | n _{max} | |
|------------------|--------|------|------|------|------|---|------------------|---|
| W0200140 | TW-302 | 40 | 140 | 13 | 2,2 | L | 9000 | + |

We offer the flat part on the shank
on customer's request.

TW-302A



Cylinder boring bits with HM tip and decreased pilot (centering point) height, type **TW-302A** (left) designed for making holes for box hinges in wood and wood-based materials as chipboard, laminated board, MDF and others. Special boring bit construction – decreased pilot height eliminates the risk of ripping the material on the other side of the board, with small material thickness.

Type of work: dowel drilling.

Material: glued wood, chipboard, MDF and similar materials.



| Catalogue number | Type | D mm | L mm | d mm | P mm | | n _{max} | |
|------------------|---------|------|------|------|------|---|------------------|---|
| W0200336 | TW-302A | 15 | 57 | 10 | 1 | L | 9000 | + |
| W0200098 | TW-302A | 15 | 70 | 10 | 1 | L | 9000 | + |

Cylinder boring bits with pilot drill, type **TW-301C** (right) and **TW-302C** (left) designed for making holes for box hinges in wood and wood-based materials as chipboard, laminated board, MDF and others. Special boring bit construction allows for making high quality combined holes in one operation.

Cylinder boring bits with pilot drill are produced only on individual customer's request. We can manufacture, as a component, a pilot drill:

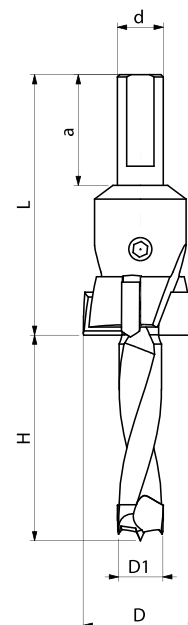
- dowel or through type,
- monolith or with HM tip.

Drills with shank other than $d=10$ mm are made as standard without the flat part.

Type of work: dowel and through drilling (depending on the component).

Material: glued wood, chipboard, MDF and similar materials.

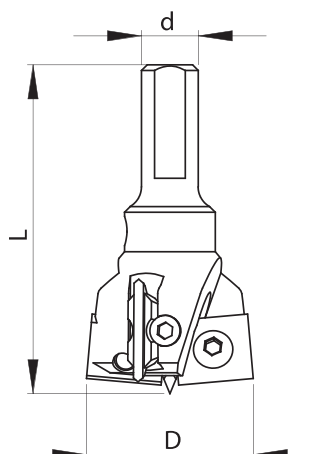
TW-301C TW-302C



| Catalogue number | Type | D mm | D ₁ mm | L mm | d mm | H mm | a | ↙ | |
|------------------|---------|---------|----------------------|---------|---------|---------|----|---|---|
| W0100426 | TW-301C | 25 | 10 | 57 | 10 | 45 | 25 | R | + |
| W0100267 | TW-301C | 30 | 7 | 70 | 10 | 30 | 30 | R | + |

We offer the flat part on the shank
on customer's request.

FTS-30




Cylinder boring cutter heads with exchangeable HM knives, type **FTS-30** designed for making holes for box hinges in wood and wood-based materials as chipboard, laminated board, MDF and others.

Type of work: dowel drilling.

Material: glued wood, chipboard, MDF and similar materials.



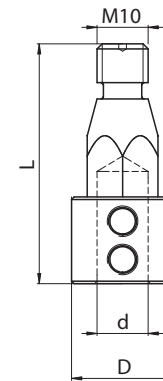
| Catalogue number | Type | D mm | L mm | d mm |  | |
|------------------|--------|------|------|------|---|---|
| FTS.30P2501.01 | FTS-30 | 25 | 58 | 10 | R | + |
| FTS.30L2501.01 | FTS-30 | 25 | 58 | 10 | L | + |
| FTS.30P2501.02 | FTS-30 | 25 | 70 | 10 | R | + |
| FTS.30L2501.02 | FTS-30 | 25 | 70 | 10 | L | + |
| FTS.30P2601.01 | FTS-30 | 26 | 58 | 10 | R | + |
| FTS.30L2601.01 | FTS-30 | 26 | 58 | 10 | L | + |
| FTS.30P2601.02 | FTS-30 | 26 | 70 | 10 | R | + |
| FTS.30L2601.02 | FTS-30 | 26 | 70 | 10 | L | + |
| FTS.30P3001.01 | FTS-30 | 30 | 58 | 10 | R | + |
| FTS.30L3001.01 | FTS-30 | 30 | 58 | 10 | L | + |
| FTS.30P3001.02 | FTS-30 | 30 | 70 | 10 | R | + |
| FTS.30L3001.02 | FTS-30 | 30 | 70 | 10 | L | + |
| FTS.30P3501.01 | FTS-30 | 35 | 58 | 10 | R | + |
| FTS.30L3501.01 | FTS-30 | 35 | 58 | 10 | L | + |
| FTS.30P3501.02 | FTS-30 | 35 | 70 | 10 | R | + |
| FTS.30L3501.02 | FTS-30 | 35 | 70 | 10 | L | + |

Spare parts for cutter heads FTS-30

| Cat. nr | Name | Dimensions | Quantity | | | Cat. nr | Name | Dimensions | Quantity | | |
|-----------|-------|------------|----------|---|---|-----------|----------------|------------|----------|---|---|
| | Knife | Bx13,2x2 | 2 |  | + | WHAS00004 | Screw | M4x6 | 2 |  | • |
| N0000726 | Spurs | 18x6x3,5 | 2 |  | + | WHAS00063 | Screw | M3,5x6 | 2 |  | + |
| WHA101602 | Pilot | Ø3x33,5 | 1 |  | + | WHAW00008 | Push screw | M6x6 | 1 |  | • |
| | | | | | | WHAS00026 | Locating screw | M5x10 | 1 |  | + |

Conical drill holder.

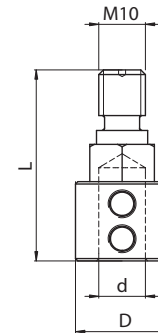
For conical drill holders we use push screws M6 x 6 according to DIN 914 standard.

OST-01

| Catalogue number | Type | D mm | d mm | L mm | | |
|------------------|--------|---------|---------|---------|---|---|
| U0001001 | OST-01 | 20 | 10 | 47 | R | • |
| U0001002 | OST-01 | 20 | 10 | 47 | L | • |

Cylindrical drill holder.

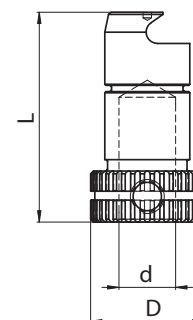
For cylindrical drill holders we use push screws M6 x 6 according to DIN 914 standard.

OWA-01

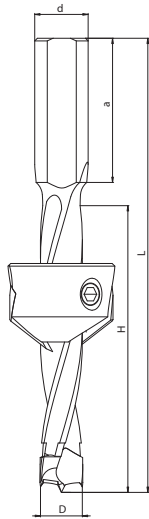
| Catalogue number | Type | D mm | d mm | L mm | | |
|------------------|--------|---------|---------|---------|---|---|
| U0001003 | OWA-01 | 20 | 10 | 41 | R | • |
| U0001004 | OWA-01 | 20 | 10 | 41 | L | • |

Quick-release drill holder.

For quick-release drill holders we use push screws M6 x 6 according to DIN 553 standard.

OSZ-01

| Catalogue number | Type | D mm | d mm | L mm | |
|------------------|--------|---------|---------|---------|---|
| U0001005 | OSZ-01 | 20 | 10 | 37 | • |



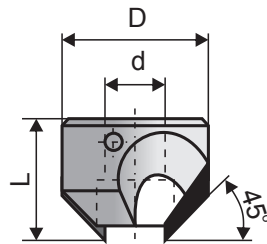
PG-01

Countersink for drills.

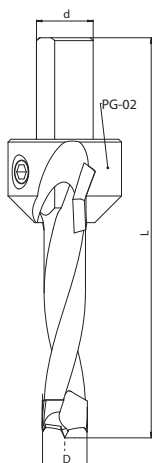
PG-01 countersink is used with drills with brazed HM tips:

- WN-03,
- WN-06,
- WN-07.

The countersink can be mounted on the working part of a drill with double helix line.



| Catalogue number | Type | D mm | d mm | L mm | ↗ | |
|------------------|-------|------|------|------|---|---|
| K1000001 | PG-01 | 14 | 4 | 12 | R | + |
| K1000002 | PG-01 | 14 | 4 | 12 | L | + |
| K1000003 | PG-01 | 14 | 5 | 12 | R | + |
| K1000004 | PG-01 | 14 | 5 | 12 | L | + |
| K1000005 | PG-01 | 16 | 6 | 14 | R | + |
| K1000006 | PG-01 | 16 | 6 | 14 | L | + |
| K1000007 | PG-01 | 16 | 7 | 14 | R | + |
| K1000008 | PG-01 | 16 | 7 | 14 | L | + |
| K1000009 | PG-01 | 16 | 8 | 16 | R | + |
| K1000010 | PG-01 | 16 | 8 | 16 | L | + |
| K1000011 | PG-01 | 20 | 10 | 18 | R | + |
| K1000012 | PG-01 | 20 | 10 | 18 | L | + |
| K1000013 | PG-01 | 20 | 12 | 18 | R | + |
| K1000014 | PG-01 | 20 | 12 | 18 | L | + |



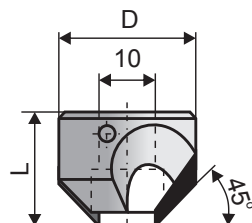
PG-02

Countersink for drills.

PG-02 countersink is used with drills with brazed HM tips:

- WN-01,
- WN-02,
- WN-04,
- WP-01,
- WP-03,
- WP-06.

The countersink can be mounted on the shank of a drill. It is necessary to use a cylindrical shank with the flat part.



| Catalogue number | Type | D mm | d mm | L mm | ↗ | |
|------------------|-------|------|-------|------|---|---|
| K4000001 | PG-02 | 20 | 4÷10 | 15 | R | + |
| K4000002 | PG-02 | 20 | 4÷10 | 15 | L | + |
| K4000003 | PG-02 | 22 | 11÷12 | 16 | R | + |
| K4000004 | PG-02 | 22 | 11÷12 | 16 | L | + |