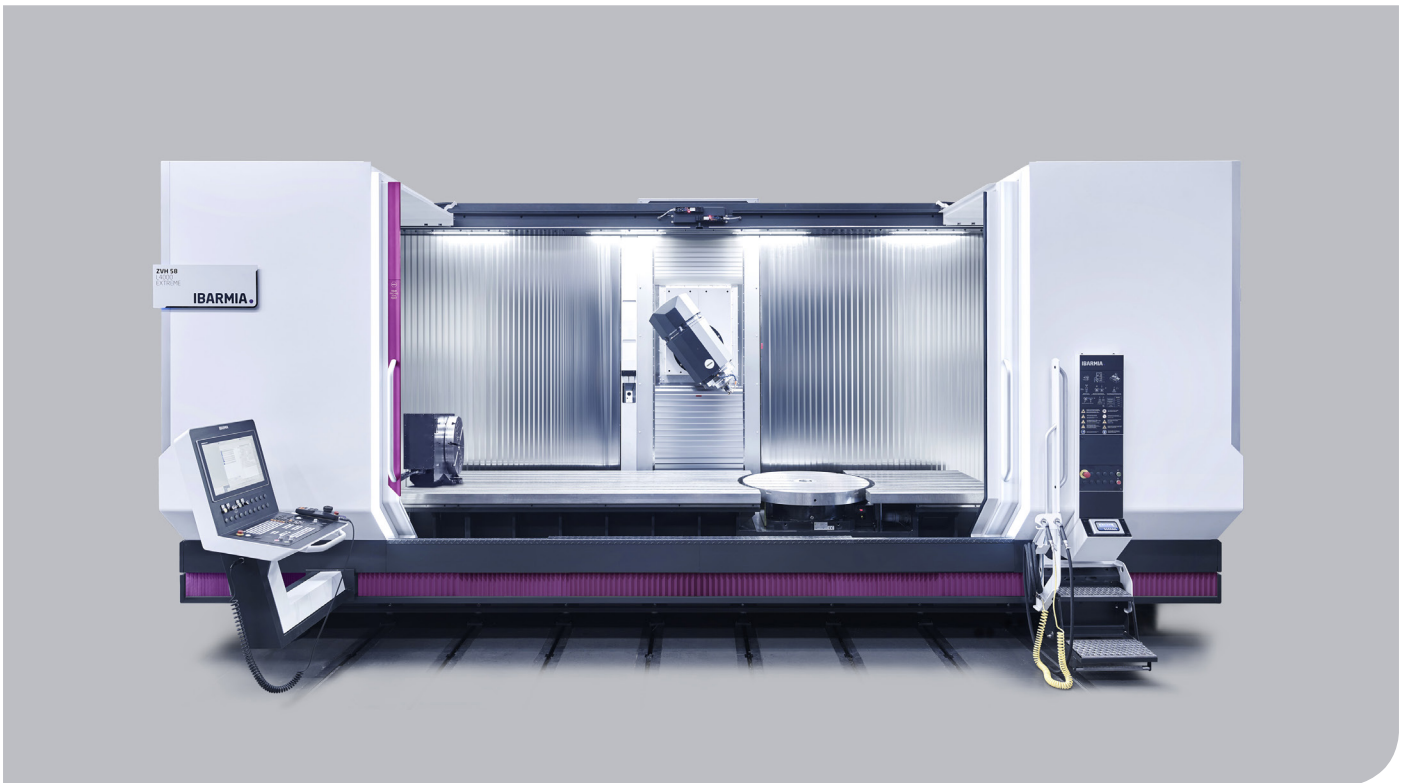


IBARMIA.

ZVH EXTREME

40 / 45 / 48

TECHNICAL SPECIFICATIONS



ZVH EXTREME

Combine 5 axis vertical and/or horizontal machining capacity with a fixed table so you can be ready for any job at the shortest notice.



Z SERIES

ZVH EXTREME**ZVH 40****ZVH 45****ZVH 48****STROKES**

| | | | | |
|--|----|----------------------------------|------|------|
| -X axis travel (length) | mm | 1600 - 12000 | | |
| -X axis travel working in 2 areas (vertical) | mm | 2x 515 (L1600) - 2x 2715 (L6000) | | |
| -Y axis travel (cross) | mm | 600 | 800 | 1000 |
| -Z axis travel (vertical) | mm | 900 | | |
| -B axis head range | ° | +/-105 | | |
| -Maximum swing diameter (C axis integrated rotary table) | mm | 900 | 1100 | 1300 |

TABLE

| | | | | |
|--|-------------------|---|---|--|
| -Fixed table dimensions | mm | L1600-2200: X+400 mm; <L3000: X+600 mm & Y +50 mm | | |
| -Maximum table load capacity | Kg/m ² | 1500 | | |
| -Number of "T" slots | | 5 | 7 | |
| -"T" slots size | mm | 18 H7 | | |
| -Distance between "T" slots | mm | 125 | | |
| -Min. / Max. distance spindle nose / table | mm | V (0----900) - H (360----1260) | | |
| -Table height | mm | 1050 | | |

TILTINH HEAD

| | | | | |
|--------------------------|----|------|--|--|
| -Turning torque | Nm | 782 | | |
| -Position clamping force | Nm | 6000 | | |

MAIN SPINDLE

| | | | | |
|-----------------|-----|--|--|--|
| -Spindle taper | | Standard: SK 40 - Option: BT 40 / HSK A-63 | | |
| -Maximum speed | rpm | Standard: 12.000 - Option: 20.000 | | |
| -Maximum power | kW | Standard: 46 - Option: 40 | | |
| -Maximum torque | Nm | Standard: 200 - Option: 135 | | |

CONTROLS

| | | | | |
|-----------------------------|--|------------------------------|--|--|
| -Available digital controls | | Fanuc / Heidenhain / Siemens | | |
|-----------------------------|--|------------------------------|--|--|

FEED

| | | | | |
|---------------------------------------|-------|--|--|--|
| -Feed thrust X-Y-Z 100% (S3 40%) | N | X: 11.992 (17.261) / Y: 8521 (11.689) / Z: 7669 (10.520) | | |
| -Rapid feed for positioning X-Y-Z | m/min | 45-48-48 | | |
| -Maximum working feed X-Y-Z | m/min | 30 | | |
| -Rapid feed for positioning in B axis | rpm | 50 | | |

ACCURACY VDI / DGQ3441

| | | | | |
|--|----|--------------|--|--|
| -Positioning accuracy Tp X-Y-Z (1000 mm) | µm | 10 | | |
| -Repeatability | µm | 5 | | |
| -Measuring system on B axis | | Rotary scale | | |
| -Positioning accuracy Tp B | s | 8" | | |

ZVH EXTREME**ZVH 40****ZVH 45****ZVH 48****CAPACITIES**

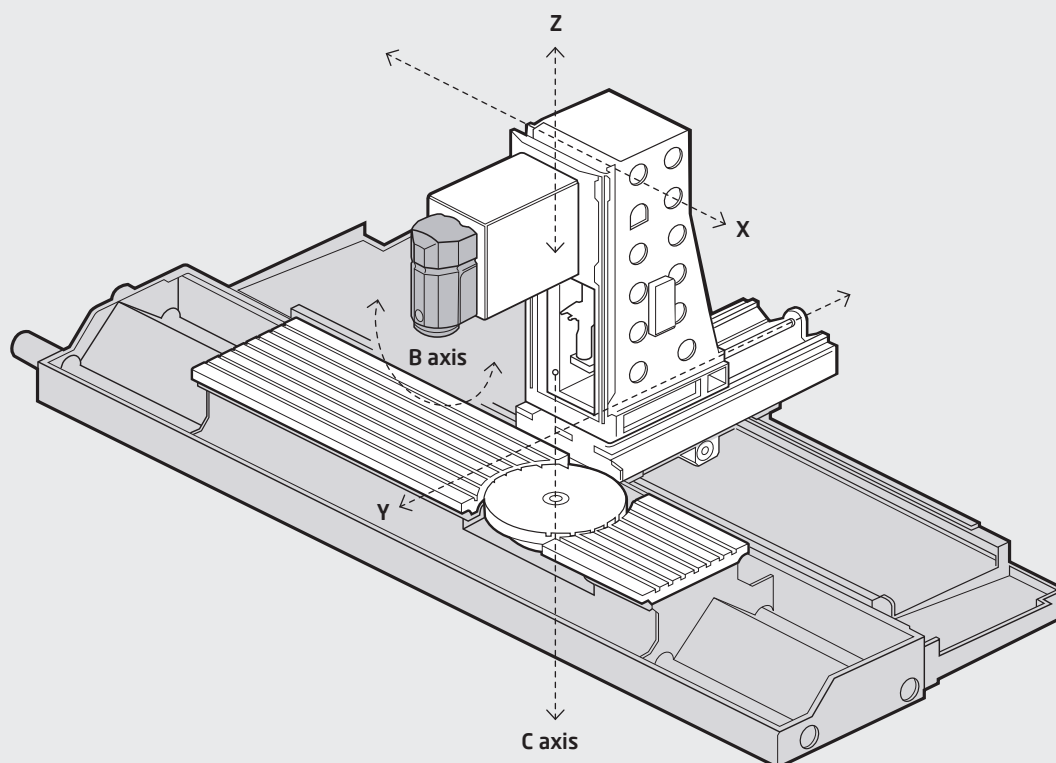
| | | |
|------------------------------------|----------------------|-----|
| -Milling capacity in steel St 60 | cm ³ /min | 900 |
| -Drilling capacity in steel St 60 | ∅ mm | 50 |
| -Tapping de roscado en acero St 60 | mm | M33 |

TOOL MAGAZINE

| | | | |
|------------------------------------|----|---|--|
| -Number of tools | | 24. Optional: 40, 60, 80 and more available on request. | |
| -Maximum tool length | mm | 350 | |
| -Maximum tool weight | Kg | 10 | |
| -Maximum tool ∅ with full magazine | mm | 150 (80 with 60-80 ATC) | |
| -Maximum tool ∅ with free spaces | mm | 125 | |
| -Tool changing time | s | 8" | |
| -Chip to chip time | s | 10" | |

GENERAL

| | | | | |
|--|-----|---|-----------------|-----------------|
| -Machine painted in 3 colours | RAL | White 9010, Ligth Grey 9006, Dark Grey 7021 | | |
| -Total power installed | kW | 60 | | |
| -Power connection voltage | V | 400 V / 50 Hz | | |
| -Required compressed air pressure | bar | 6 | | |
| -Machine length (L1600 / L6000) | mm | 5850 (L1600) - 11650 (L6000) | | |
| -Aproximate net weight (L1600 / L6000) | kg | 12.500 / 27.500 | 14.500 / 29.500 | 15.500 / 32.500 |



INCLUDED ITEMS IN STANDARD CONFIGURATION

- 4 axis model: longitudinal X, transversal Y, vertical Z, tilting head B, combined with C and/or A axis rotary table.
- Direct measuring on linear axes X / Y / Z.
- Measuring by rotary scale on rotary axes B / C / A.
- Travelling on lineal guides and ball screws.
- Servomotors with braking system for the axes.
- Rack and pinion system on machines from 6000 mm long.
- Hydraulic counter weight for the head.
- Electerspindle thermal compensation.
- 24 tool ATC magazine.
- Air blast for tool cleaning.
- Totally encapsulated working area.
- Vertical covers on X axis (steel bellows).
- Illumination of working area.
- Double auger system for chip evacuation.
- Removable lateral pannels.
- Moving and rotary control panel (360°) along machine bed (except L1600).
- Touch screen 19".
- Chip Conveyor with integrated coolant tank.
- External coolant system around the spindle.
- Programmable central lubrication system.
- Climatised electrical cabinet.
- Machine levelling elements.
- Informative cartel in black methacrylate.
- SMART POINT machine data monitoring system.

OPTIONAL ITEMS

- Coolant through spindle.
- NSM software and division wall of working areas.
- Transport cart for the division wall.
- ATC magazines up to 200 tools (fixed magazines, rack type...).
- Pick up stations integrated in the machine to hold special tools and angular heads.
- Special tool magazines up to 400 positions managed by arm robot.
- Tool measuring and touch systems.
- C axis integrated rotary tables up to $\varnothing 1200$ mm.
- Big diameter rotary tables up to $\varnothing 2000$ mm together with the fix table.
- Bolt on rotary tables to be used either in horizontal or vertical axis.
- Special working table configurations: moving tables, trunnion fixtures...
- Steam and mist aspiration system.
- Spray and air guns.
- "Comfort" pack: Sliding access stairway along the longitudinal travel with supports for air and water guns.
- "Illumination" pack: LED lights with acoustic signal indicating the state of the machine, integrated into the sides.
- 3 light tower with acoustic signal indicating the state of the machine.
- Camera settings and display mode.
- CNC control with touch screen up to 24".
- Advanced HMI.
- Portable electronic hand-wheel with support in the control pannel.