

Tunnel excavator Blue Badger I e-Badger



Hydraulic cutter with the e-Badger

■ For tunnel cross-sections from Ø 3,5 m

Weblink
Blue Badger

■ High breakout forces for the tunnel excavate

Weblink
e-Badger

■ Equipment specially developed for tunneling

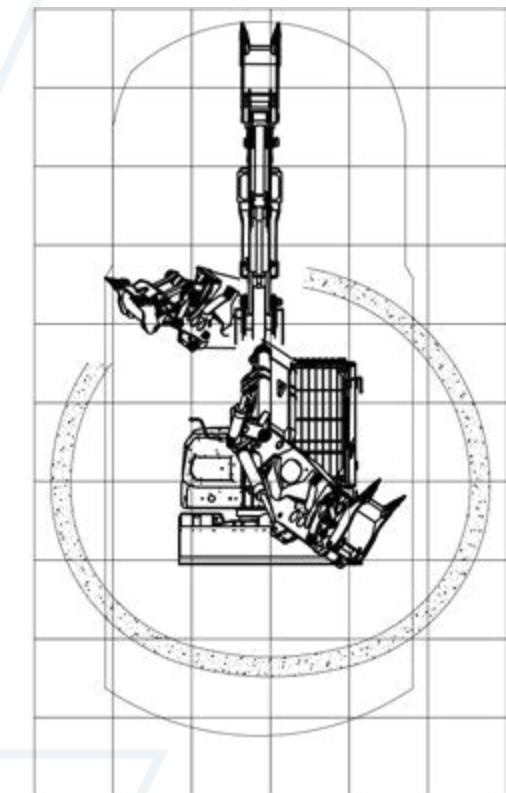
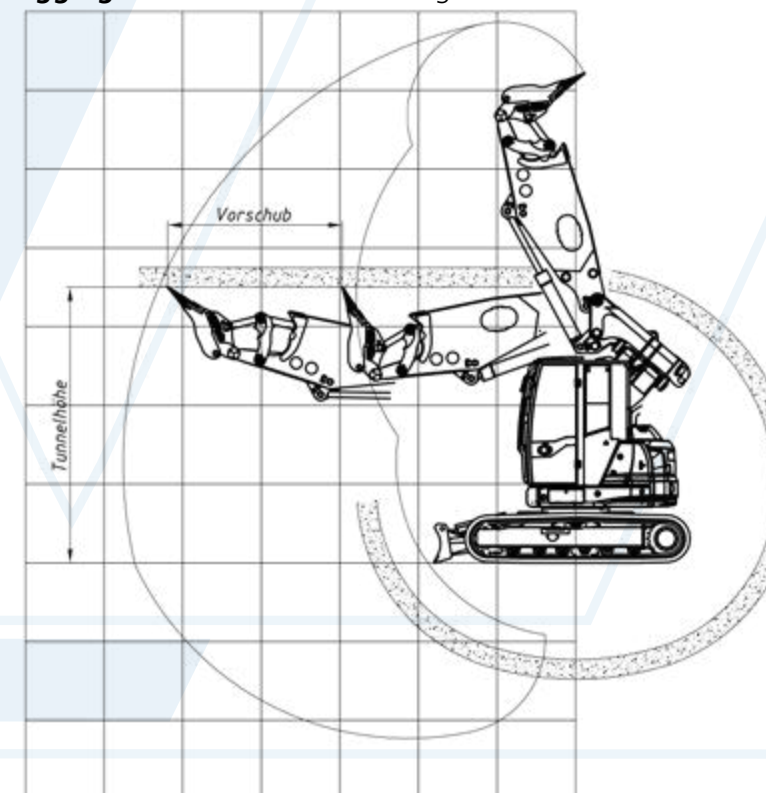
■ Precisely designed for the tunnel construction

Digging arc	
Tunnel height [m]	Feed [mm]
3,5	2.220
4	2.403
4,5	2.366
5	2.255
5,5	2.212

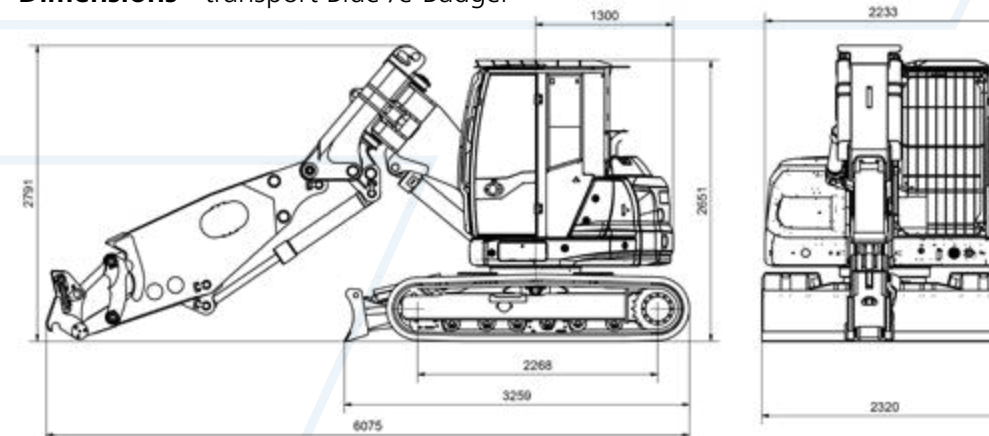
Technical details (Subject to change)

Model	Blue Badger	e-Badger
Operating weight, kg	12.800	12.700
Engine power, kW	53,7	50
Tunnel height minimum, m	3,5	3,5
Tunnel width minimum, m	2,5	2,5
Tunnel width min. - 180° Rotate uppercarriage, m	4,2	4,2
Standard quick coupler	A-Lock BB	A-Lock BB
Breakout force, kN	85	85
Tear force, kN	100	100
Control voltage, V	12 DC	12/24 DC
Central greasing unit	✓	✓
Engine model		
Engine type	Yanmar Turbo Diesel Stage 5 / Tier 4 Final	Synchronous reluctance motor (SRPM)
Exhaust aftertreatment	Particular filter (DPF)	-
Fuel content I E-connection	105 L	400VAC 50 Hz - 125A
Consumption, Ø	9,3 l/h	45 kW/h
Cooling	Water cooling	Water cooling
Safety features - standard		
Quick coupler A-Lock with SUVA-certification	✓	✓
Automatic fire extinguishing system	✓	✓
Emergency stop button and reversing alarm device	✓	✓
Rear view and side view camera	✓	✓
Stop valves on all cylinders	✓	✓
Cabin with ROPS and FOPS Stage II	✓	✓
Closed cabin with sound reduction**	✓	✓
Hydraulic system		
Tank capacity	90 L	90 L
System capacity	120 L	120 L
Hammer-/ shear circuit	max. 130 L/min, max. 290bar	max. 130 L/min, max. 290bar
Grapple-rotation circuit	max. 20 L/min, max. 200bar	max. 20 L/min, max. 200bar
Hydraulic system - type	Axial piston pump with LS, Hyd.-pilot control	Axial piston pump with LS, Hyd.-pilot control
Separate tank line with return filter	✓	✓
Separate leakage oil line with leakage oil filter	✓	✓
Possible Attachments		
Tunnel driving bucket, loading bucket	Tunnel-bucket 460, bucket 800FG2.5	Tunnel-bucket 460, bucket 800FG2.5
Hydraulic breaker	WH10 TU/UW	WH10 TU/UW
Hydraulic cutter	WR15, WFR150, D15	WR15, WFR150, D15
Drilling attachment	AB1300, AB2300-BB, WIDA	AB1300, AB2300-BB, WIDA
Demolition shear	TunnCut 500	TunnCut 500
Tunnel gripper	Lattice arch gripper GBG-180	Lattice arch gripper GBG-180

Digging arc - schema Blue-/e-Badger



Dimensions - transport Blue-/e-Badger



Quick coupler
A-Lock BB



Option for e-Badger

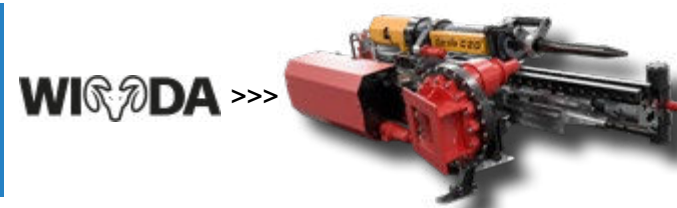
- Battery-Pack for transfer trips
- Voltage 691 V (nominal)
- Gross capacity 52 kWh

operation video >>>



** according to 2000/14/EC as amended LWA dB(A) 99

Tunnel-attachment-tools fitting on Blue Badger | e-Badger



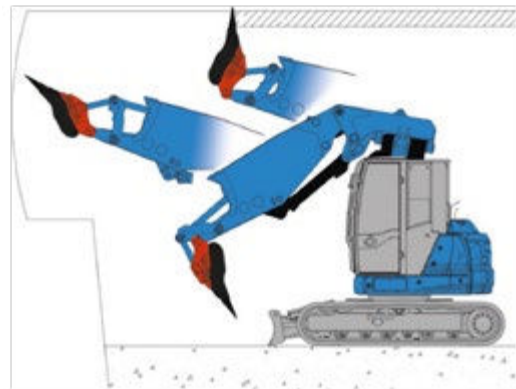
Weblink
Drilling technology



Tunnel driving bucket LPT460



Teeth: 2x ESCO U30 P
Cutting width: 460 mm
Connection: A-Lock BB



Standard-form suitable for tunneling
and for overhead follow-up work

Bucket LP800FG2.5



Teeth: 5x ESCO U20 S
Cutting width: 800 mm
Capacity: 367 l/SAE
Connection: A-Lock BB

Hydraulic breaker WH10 TU/UW



✓ **Tunnel-version (TU):** Special
tunnel sealing for the chisel |
High-speed-piston with a shortened stroke
for additional protection

✓ **Underwater-version (UW**):**
Prepared with a separate connection for
the air supply in the area of the bushings
and the piston

✓ **Combination with TU & UW**:**
Additional protection against the ingress of
water, dirt, and dust | Long service life
** An external air supply is required

Operating weight: 750 kg (ohne Adapter)
Oil flow: 60 - 120 L/min
Working pressure: 125 bar
Pressure relief valve: 160 bar
Chisel Ø: 95 mm
Drilling pattern: WH10/12



The **NEW**
tunnel sealing

Hydraulic cutter Rockwheel



Cutter D10 (Compact)

Hydraulic power: 29 kW
Max. oil flow: 113 L/min
Optimum oil flow: 60 L/min

Torque of cutter: 4.174 Nm @ 350bar
Drum speed: 80 rpm @ 120 L/min

Operating weight: 462 kg (without adapter)
Number of chisel: 56 pc.

Application: Profiling, Tunnel drive

Cutter D15 (Performance)

Hydraulic power: 41 kW
Max. oil flow: 132 L/min
Optimum oil flow: 120 L/min

Torque of cutter: 6.945 Nm @ 350bar
Drum speed: 96,2 rpm @ 120 L/min

Operating weight: 595 kg (without adapter)
Number of chisel: 65 pc.

Application: Tunnel drive, Mining

Option: Cutter D10 or D15
with 360° rotator

Endlessly rotatable in according
to a integrated rotary union

Optionally, all types are also available
with a **water spray unit**
for dust suppression



Demolition shear Tunn-Cut 500 H



Weight without adapter: 1.340 kg
Max. opening width: 520 mm
Excavator weight: from 12 to.

Hydraulic data:

Rotation pressure: max. 200bar
Rotation oil flow: 20-25 L/min
Open/close pressure: max. 350 bar
Open/close oil flow: max. 200 L/min

DARDA CC700

Weight without adapter: 600 kg
Max. opening width: 650 mm
Excavator weight: 7 - 15 to.

Hydraulic data:

Rotation pressure: max. 200bar
Rotation oil flow: 70 L/min
Open/close pressure: max. 250 bar
Open/close oil flow: 25 - 100 L/min



Lattice arch gripper GBG-180



Custom-made **tunnel arch gripper**
specifically designed for the safe installation
of **tunnel arches**

Tilting function: 2 x 45°

Drilling pattern: WH17/22, WH10/12
or ALBB - direct

Interchangeable gripping units:

Possible **3-belt H1 arches:** 70, 95, 115
Possible **4-belt H1 arches:** 190

Hydraulic data:

Max. pressure: max. 200bar
Max. oil flow: 20-25 L/min

