Instruction Manual

Battery-operated hydraulic Cutting Tool
InLineBox-CS6

MASTER BASE Fits all OEM batteries

CE

Original instruction manual Ident-No.: 72806000-BA ☐ InLineBox-CS6 Ma (suitable for Makita batteries) Edition: 03/2021 Revision: F	HOLGER CLASEN GmbH & Co. KG Alsterdorfer Straße 228 22297 Hamburg, Germany P. +49 40 511 28-0 info@holger-clasen.de holger-clasen.de

Content

Thank you for placing your trust in us by purchasing this tool.

1 General Information

We hereby confirm that the tool described in this instruction manual complies with the basic safety and health requirements pursuant to the EC Machinery Directive 2006/42/EC, the EMC Directive 2014/30/EU and the RoHS Directive 2011/65/EU relating to electromagnetic compatibility.

Keep this instruction manual in a place that all users of the tool are familiar with and can access easily. Read this manual carefully before using, maintaining, repairing or disposing of the tool. Make sure that you clearly understand the instructions and symbols explained in this manual or attached to any tools.

You can prevent accidents by adhering to the following basic safety advice pursuant to the EC Machinery Directive 2006/42/EC and the regulations for hand-operated tools. In any case inform yourself about and comply with the accident prevention regulations applicable in your country.

Do not remove existing labels and stickers, especially those containing legally required information.

Upon receiving the tool, make sure that the packaging is intact and the tool did not suffer any transportation damage. In case of damage, please contact HOLGER CLASEN`s customer service at +49 40 511 28-0. Keep the packaging.

If operated correctly and if the required service intervals are adhered to, we grant a warranty of 24 months beginning as of the day of delivery unless legal regulations require other warranties.

Symbols used:

 WARNING!

 Danger of hand injuries

 Please wear safety goggles

 Please wear safety shoes

 Please wear protective clothes

 Don’t dispose of in residual waste

Label:

Danger of hand injuries

Type label – Housing bottom

2 labels – Type, Comfort-Series

Serial No.: In the battery shaft

2 General Safety Information

⚠ WARNING

Danger due to overheating, breakage, or electric shock of the battery.
The tool, the battery and the charger are matched components.

- ▶ This tool may only be operated with a suitable rechargeable battery.
- ▶ Charge the battery with the appropriate charger.
- ▶ Only use the original battery and charger.

Charge the battery in accordance with the instructions.

- ▶ Connect the charger to a power source with suitable power specifications.
- ▶ Do not use a DC or motor-driven generator.
- ▶ Unplug the charger after charging is complete.
- ▶ Do not use the charger in the rain.

Pay attention to the temperature of the battery, the charger and the environment.

- ▶ Do not charge the battery at temperatures below 0° or above +40° C.

Ensure sufficient ventilation of the battery during the charging process.

- ▶ Do not cover the battery and charger during charging.

Do not short-circuit the contact surfaces of the battery.
Failure to do so may result in bursting of the battery and leakage of hazardous materials.

- ▶ Secure the contact surfaces of the battery with the cover provided for this purpose.
- ▶ Do not store the battery without the cover together with metal parts such as nails, screws, etc.

Do not place the battery in a fire.
Failure to do so may result in bursting of the battery and leakage of hazardous materials.

Hydraulic fluid under pressure.
Escaping fluid under pressure can cause severe injury or death.

- ▶ If injure, seek medical attention immediately.

Danger due to electric shock.
The tool is not insulated in contact with electrically charged parts.

- ▶ Never work live strands / cables!
- ▶ When using the device on or near live wires, wear suitable personal protective equipment
- ▶ Do not touch the power plug or the battery with wet hands.

Exposed Cutting Blades.
Danger of hand injuries.

- ▶ Never reach into the running tool.

Influence by electromagnetic waves.
The functionality of pacemakers can be influenced by electromagnetic waves emitted.

- ▶ Keep the tool at least 15 cm or more away from the pacemaker.

Risk of injury to the hand.
Prevent the tool from starting up unintentionally

- ▶ Always move the blade to the starting position after use or before changing parts and remove the battery.
- ▶ Keep your fingers away from the trigger when transporting the tool.
- ▶ Secure the trigger.

Danger due to inhalation of dust.
Depending on work environment dust hazardous to health may be generated during machining.

- ▶ Wear a protective mask during dusty operation.

Danger of eye injuries
Material can fly around.

- ▶ Wear protective goggles. Normal goggles do not provide sufficient protection.

Danger to persons in the vicinity due to breakage.
During operation, overload/material fatigue can cause damage to the head. Parts flying around can cause injuries.

- ▶ Do not point the head of the tool at persons in your environment during operation.

Failure to observe the following instructions may result in property damage or accidents:

Use the tool within the scope of its intended use.
Do not overload the tool. Overloading can lead to blocking, excessive heat generation and ignition.

Keep handles and contact surfaces dry, clean, and oil-free. Slippery surfaces reduce tool control and can lead to accidents in unexpected situations.

Refrain from any working method that could endanger safety.
Only use attachments and accessories for the work intended for them.
Do not make any modifications to the tool. Ensure a fatigue-free working position.

Remain attentive when working with high concentration.
Do not operate the tool if you are in poor physical condition.
Do not operate the tool under the influence of alcohol.
When using the device on or near live wires, wear suitable personal protective equipment.
Do not touch the power plug or the battery with wet hands.

3 Product Description

1 Counter Blade
2 Cutting Blade
3 Safety Lock for Cutting Head
4 Lash for Carrying Strap
5 Return Button
6 Release Button
7 Lash for Carrying Strap
8 Locking Button Accumulator
9 Type Label
10 Emergency Return
11 LED
12 Cutting head, rotatable 180°

3.1 Intended Use

This Battery-operated hydraulic tool has been designed for cutting Cu- and Al-strands and cable as well as ACSR-cable up to ∅ 54 mm according to the application table (chapter 4.1). For other applications, please contact HOLGER CLASEN. The tool has been designed to be connected to an accumulator according to technical data.

Although this tool has been designed according to the state-of-the-art and recognized safety requirements, its use may constitute a potential threat to the life and limbs of its user or third parties or damage the tool or other material assets. Use or application for purposes other than those intended by the manufacturer will be considered improper. HOLGER CLASEN will not be liable for damage resulting from improper use. The operator works at his own risk.

3.2 Expected misuse

This tool is not suitable for cutting fine/very fine stranded conductors, this will cause the blades to jam.

3.3 Qualification

This tool may only be used by qualified personnel who have read this safety advice and instruction manual.

3.4 Operator Protection

Danger due to chips flying around.
Wear protective goggles.
Standard glasses do not provide sufficient protection and are no proper substitution for safety eyewear.

Danger of drawing in of clothes and hair.
Wear protective clothes.
Loose or baggy clothes increase the risk of catching or winding on moving parts.
- Wear tight-fitting work clothing.
- Do not wear long hair open. Wear it well covered.
- Do not wear rings, chains or other jewellery.

Risk of crushing/sliding.
Wear protective shoes.
Make sure to stand firmly.

3.5 Workplace

Do not use the tool in environments where there is a risk of fire or explosion.
Keep your workplace clean.

Keep children and unauthorized persons away from your work environment.
Ensure that there is sufficient lighting at the workplace.

Before switching on the tool, make sure that no one is endangered by the starting tool.
Protect the tool from moisture, water, extreme heat / cold, chemical solutions and gases.
Do not use the tool, the battery and the charger in the rain or in a wet environment or a wet environment. Do not charge the battery there either.
Protect the battery tool from falls or impacts.

3.6 Temperature Range

The possible working range of the tool is in the temperature range from -20°C to +40°C.

The recommended working range is in the temperature range from -5°C to +40°C. Temperatures between -20°C and -5°C leads to changes in the flow properties of the hydraulic oil.

To ensure unrestricted use, we recommend storing the tool the tool for one hour in a room with a temperature of +10 to +25°C.

3.7 Transport and Storage

Ensure dry storage to protect the tool from rust.
Clean the tool before / after use and before storage.
Secure the contact surfaces of the battery with the cover provided.

If the tool is transported to another factory department or location, make sure that the tool and/or accessories are not damaged. Pack the tool accordingly.

Store the tool properly when not in use.
Store the tool in a place inaccessible to unauthorized persons.

Do not store the tool and battery in a place where the temperature may rise to +40°C or more (in a metal box, in a car in summer, etc.). Overheating may cause damage, smoke generation or ignition.

⚠ **Due to the high energy density of rechargeable batteries, there is a higher risk potential, especially when shipping used rechargeable batteries.**

One of the greatest risk factors when transporting rechargeable batteries or battery-powered devices is the danger of short circuits if the battery terminals come into contact with other rechargeable batteries, metal objects or other conductive material.

If the battery is inserted in the tool, the battery terminals are secured.

If they are stored separately or shipped individually, secure storage must be ensured. A possible short circuit and damage to the connection terminals must be prevented. For this purpose, the battery terminals must be secured with a non-conductive material (e.g. adhesive tape) or the contact protection cap. Batteries must be adequately protected against movement.

On the Makita website you will find recommendations for sending in lithium-ion batteries:

https://www.makitauk.com/data/pam/public/content-pages/support/battery-transportation/mb_36_shipping_lithium_ion_batteries.pdf

Special protective measures must be taken when shipping in airplanes or batteries over 100 Wh.

Notice IATA Packing instruction 965 Part 2 for lithium-ion-batteries. If package/battery is damaged, batteries must be quarantined, inspected and repacked.

Attention: Following the IATA Packing instructions the batteries are delivered on 30 % charge level. Please completely charge the battery before usage with the recommended battery charger.

Follow the Makita charger operating instructions (DC18RC):

https://www.makitauk.com/user-manuals

4 Technical Data

Item	InLineBox-CS6
Cutting Force	120 kN
Opening Width	54 mm
Head	180° rotatable
Battery Voltage	18 V
Weight*	9.7 kg
Dimensions* L x W x H	566 x 92 x 263 mm

* without battery

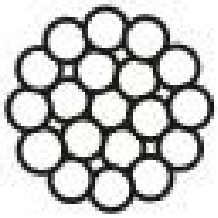
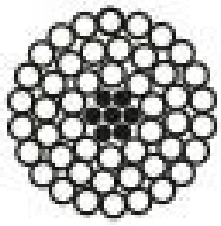
MasterBase technology offers the following battery options,
choose your tool here

Item	Item No.	Suitable for batteries
InLineBox-CS6 Ma	72706000	Makita 18 V Li-Ion
InLineBox-CS6-Set Ma **	72806000	Makita 18 V Li-Ion

****Scope of Delivery Set:**

Battery-operated hydraulic Cutting Tool InLineBox-CS6 Ma (Item No. 72706000),
Lithium-Ion Battery Makita BL1850B, 18 V / 5 Ah (Item No. 79300115),
Battery Charger DC18RC (Item No. 79300120),
Carrying Strap TR-40-2 (Item No. 07755002),
Transportation Case KOFF-K ILB-CS (Item No. 79500115)

4.1 Cutting Range Table

Anwendung ***Application***	**Max. Schneiddurchmesser** ***Max. Cutting Diameter***		
Cu Seil *Cu Strand*	∅ 54 mm		
Al Seil *Al Strand*	∅ 54 mm		
Cu Energiekabel *Cu Energy Cable*	∅ 54 mm		
Al Energiekabel *Al Energy Cable*	∅ 54 mm		
Cu Rundmaterial *Cu Round Material*	∅ 35 mm		
Al Rundmaterial *Al Round Material*	∅ 28 mm		
Al/St-Seil *ACSR*	∅ 54 mm		
Rundstahl *Round Steel*	∅ 22 mm		
Drahtseil *Wire Rope*	6x7: 6x12: 6x19:	∅ 25 mm ∅ 30 mm ∅ 30 mm	
Abspanndraht *Guy Wire*	1x17: 1x19:	∅ 15 mm ∅ 20 mm	
Bewehrungsstahl *Reinforcing Rod*	∅ 19 mm		

5 Commissioning

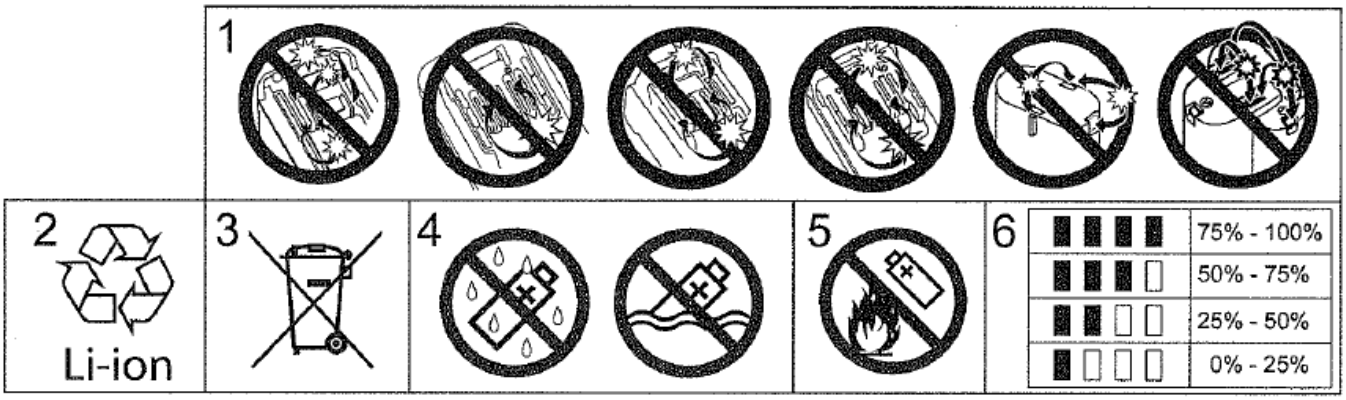
The tool set comes with a Makita battery, 18 V, and a matching Makita charger.
Fully charge the battery before using it for the first time.

Make sure that the accumulator is charged before each use.
The LEDs indicate the battery capacity.
To do this, press the test button on the battery.
Reload if necessary.

Observe the operating instructions for the Makita charger (DC18RC):

https://www.makita.de/bedienungsanleitungen.html

The following information is placed on the battery:



1. Do not short-circuit the battery
2. Always recycle used batteries.
3. Do not dispose of used batteries in household waste.
4. Do not expose the battery to water or rain
5. Do not throw the battery into fire
6. Battery charge level indicator:

■■■■	75 % - 100 %
■■■□	50 % - 75 %
■■□□	25 % - 50 %
■□□□	0 % - 25 %

Depending on the conditions of use and the ambient temperature, the indication may differ slightly from the actual capacity.

For commissioning the tool with other battery systems, please observe the recommendations of this battery manufacturer.

6 Operation

⚠ WARNING

Exposed Cutting Blades.
Danger of hand injuries.
▶ Never reach into the running tool.

Overheating of the motor is possible after continuous operation.
Allow the tool to cool down in good time for a few minutes.

6.1 LED-Workplace Illumination

The LED for working field illumination switches on after the forward or reverse switch is actuated and remains lit until 10 seconds after the switch is released.

⚠ WARNING

Very bright light source.
Danger due to damage to the eyes during prolonged eye contact.
▶ Do not look directly into the LED.

6.2 Inserting / Removing the Battery

The LEDs indicate the battery capacity.
To do this, press the test button on the battery.

Inserting:

Push the battery firmly onto the tool until the locking button engages.
Check that the battery is firmly engaged.

Removing:

Press and hold the locking button.
Pull the battery off the tool.

6.3 Automatic Reverse

Press the forward switch (6) to cut the material.
The tool stops after reaching the maximum force and the cutting blade automatically return to the starting position.
By **pressing the forward button again**, you can interrupt the reverse movement, the cutting blade stop at the **desired position**.

Manual control:

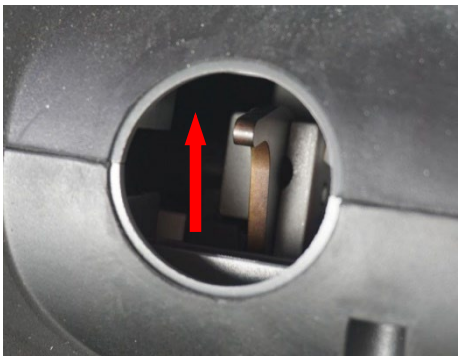
You can interrupt the retraction by **tapping the advance switch again**, the cutting blades stop at the desired position.

The piston can then be retracted by actuating the return button (5).

6.4 Emergency Return

The automatic return is controlled by the electronics. In the event of a failure of the electronics, e.g. if the battery is empty, the flask can be be retracted via the emergency return.

To do this, remove the rubber plug on the underside.



Push the lever in the direction of the arrow.
The piston retracts.

6.5 Valve Safety Lock

For safety purposes, the release button has a safety lock.

It can be activated by pulling it backwards.

To deactivate it, push the safety lock in direction of the arrow.

6.6 Cutting

Check the head and the control buttons for function and damage.
If there is obvious damage, do not put it into operation.
If necessary, release the lock.

Move the cutting blades to their starting position by using the return lever (5).
Press the return switch two or three times before each use.

Open the Cutting Blade:

Pull the safety bolt out of the cutting head, the counter blade folds down.

Position the material to be cut.
Align the cutting head axially to the material to be cut by turning it.

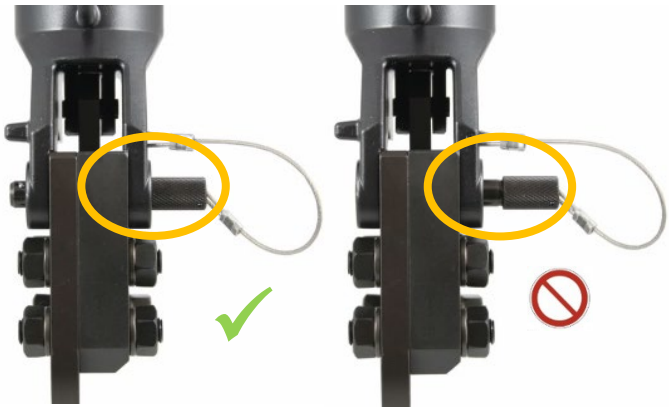
Fold back the counter blade. Insert the locking bolt completely back into the cutting head.

NOTICE

Non-observance of the following advices will lead to damage and even to breakage of the blades.

Locking properly

Make sure that the locking unit is closed completely. Non-observance will lead to deformation and even destruction of the head.



Alignment of the tool to cable:

Position the tool so that it cuts axial to the cable.

Cutting:

Press the release button (6) to cut the cable. Keep the release button pressed until the cable is cut completely.

The tool stops after reaching the maximum force and the cutting blade automatically return to the starting position.

By **pressing the forward switch again**, you can interrupt the reverse movement, the cutting blade stops at the **desired position.**

Remove any chips and metal left on the brush and blades before cutting again.

After use, secure the forward switch with the lever lock. This prevents unintentional start-up, especially during transport.

Remove the battery if necessary.

7 Trouble-shooting

If the tool is colder than -5°C, store it in a room with a temperature of +10 to +25°C for at least one hour to allow the tool to warm up to room temperature again. At temperatures between -20°C and -5°C, the flow properties of the hydraulic oil change.

Error	Cause	Solution
The tool does not work.	The battery is not charged.	Recharge the battery.
	The battery is not inserted correctly.	Insert the battery correctly.
	The contacts between the battery and the tool are dirty.	Clean the contacts.
	Fault in the hydraulic system (e.g. air).	Have the manufacturer inspect the tool.
The blades do not move forward or back.	The blades are dirty.	Remove chips and metal left on the blades.
	The blades and the material to be cut are twisted.	Have the manufacturer inspect the tool.
	Wear of the return spring.	Have the manufacturer inspect the tool.
Material is not cut.	Check the application / the material to be cut.	Wrong application.
	The material to be cut is too cold. *	Warm up the material to be cut.

* At temperatures below +10° C, the cutting properties of electrical conductors change. Cuts may not be possible even if they are within the range of intended use.

8 Maintenance and Service

Task	Period	Maintenance by
Clean and grease the movable parts from dirt to avoid damage of the tool. Do not use chemicals, water or wet clothes.	After each use	User
Inspect the movable parts regularly for damage.	Daily	User
Maintenance of the tool.	Every 12 months (approx. 10.000 work cycles)	HOLGER CLASEN

Disassembly or modification of the tool by unqualified persons could cause accidents. Always allow qualified technicians only or the HOLGER CLASEN Technical Service Center (TSC) to carry out maintenance work. Use original spare parts by HOLGER CLASEN.

Service address:

The TSC will do all required maintenance and repair work for you.

TSC Technik-Service-Center
Alsterdorfer Straße 228
22297 Hamburg, Germany
P. +49 40 511 28-200

service@holger-clasen.de
holger-clasen.de

9 Disposal

The tool must not be disposed of as residual waste because some parts of the tool may cause environmental damage! Improper disposal constitutes a punishable offence according to the Environmental Liability Act!

In accordance with §19 ElektroG, HOLGER CLASEN offers the following options for returning old appliances:

1. send in the old appliance with clear notification for disposal to the following drop-off address: **HOLGER CLASEN GmbH & Co. KG, Alsterdorfer Straße 228, 22297 Hamburg, Germany**.

2. personal delivery of the old appliance to the above address.

3. chargeable commissioning of HOLGER CLASEN GmbH & Co. KG to collect the old appliance. The end user is responsible for the proper packaging of the old appliance.

The owner of the waste equipment is responsible for the disposal of personal data in physical or digital form prior to handover.

The owner of the old appliance is responsible for the non-destructive separation or appropriate packaging of old batteries and accumulators in accordance with Section 10 (1) ElektroG, unless they are enclosed by the old appliance.

The battery, the circuit boards and other components must be disposed of separately in accordance with the environmental standards in force in the European Union or in your country. Send the tool to HOLGER CLASEN for disposal.

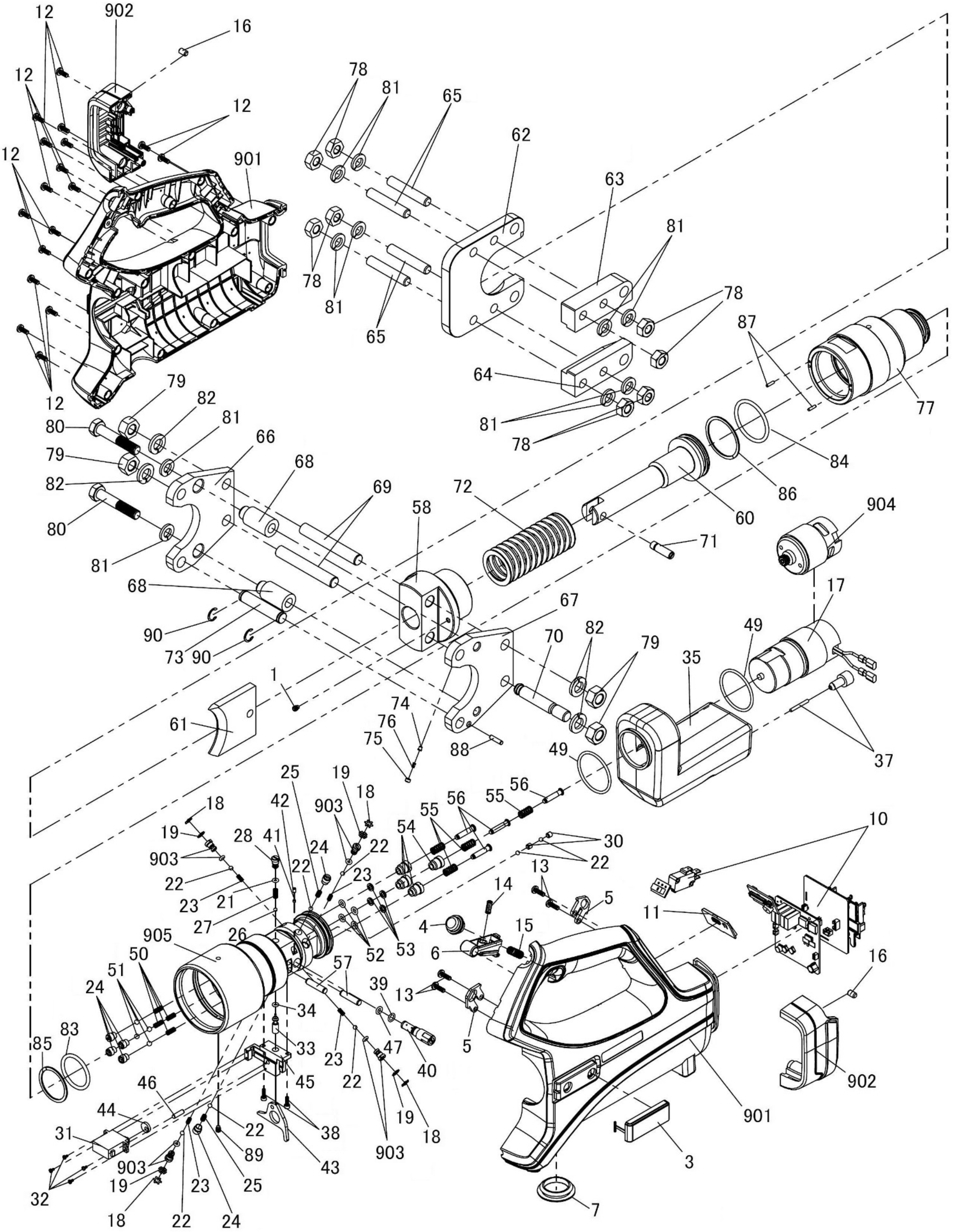
Do not dispose of battery pack together with household waste material! In observance of the European Directive 2006/66/EC, on batteries and accumulators and waste batteries and accumulators and the implementation in accordance with national laws, batteries and battery pack(s) that have reached the end of their life must be collected separately and returned to an environmentally compatible recycling facility.

10 Accessories

Type		Description		Item No.
Case InLine-Box-CS6 Ma	Koff-K ILB-CS	Lightweight Plastic case with compartments for tool, two batteries and battery charger		79500115
Carrying Strap for battery-operated tools	TR-REC	Strap 25 mm wide, 1 snap hook		07542106
	TR-25-2	Strap 25 mm wide, 2 snap hooks		07755001
	TR-40-2	Strap 40 mm wide, 2 snap hooks		07755002
Spare Blades	550A-01	Cutting blade		07448019
	550A-02	Counter blade		07173017
Battery Makita*	BL1850B	Type: Battery Voltage: Capacity: Dimensions: Weight: Charging Time: Charger:	Lithium-Ion (90 Wh) 18 V 5.0 Ah 115 x 75 x 67 mm 0.64 kg 45 min DC18RC	79300115
Battery Charger Makita	DC18RC	Input Voltage: Weight: Dimensions: Charging Time BL1850B (5.0 Ah):	220 – 240 V, 50/60 Hz 0.90 kg 156 x 190 x 84 mm 45 min	79300120
Battery Adapter	HC-ADAP-BO-18V	Holger Clasen 18V Battery-Adapter, suitable for Bosch Battery 18V		79300092
	HC-ADAP-MI-18V	Holger Clasen 18V Battery-Adapter suitable for Milwaukee Battery 18V		79300093
	HC-ADAP-DE-18V	Holger Clasen 18V Battery-Adapter, suitable for Dewalt Battery 18V		79300094

* Optionally, other 18V Makita batteries can be used:
BL1815N, BL1820B, BL1830B, BL1840B, BL1860B

11 Drawing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12 Part List

Position	Item	Description	Pieces
3	07011008	Cover	1
4	07746021	Release Knob	1
5	07045004	Hanger	2
6	07746022	Safety Trigger	1
7	07530009	Rubber plug	1
10	07746023	Switch Unit	1
11	07177003	Case Inlet	1
12	07452573	Screw	17
13	07452394	Screw	4
14	07123660	Spring	1
15	07127001	Holder	1
16	07068001	Bushing	2
17	07037003	Power Unit	1
18	07386008	Ring	4
19	07136004	Filter	4
21	07358698	O-Ring	1
22	07277123	Ball	8
23	07123663	Spring	4
24	07585217	Valve Screw	6
25	07123217	Spring	2
26	07277008	Ball	1
27	07123664	Spring	1
28	07530003	Plug	1
30	07452238	Screw	2
31	07753002	Release Unit	1
32	07452071	Screw	4
33	07055005	Reaction Pin	1
34	07358186	O-Ring	1
35	07351014	Oil Reservoir	1
37	07530109	Plug	1
38	07452053	Screw	2
39	07358496	O-Ring	1
40	07546013	Relief Valve	1
41	07044001	Retainer	1
42	07452788	Screw	1

Position	Item	Description	Pieces
43	07053008	Release Lever	1
44	07324003	Cam	1
45	07212011	Holder	1
46	07524015	Pin	1
47	07358351	O-Ring	1
49	07358009	O-Ring	2
50	07123665	Spring	4
51	07277122	Ball	4
52	07081005	Seal Packing	4
53	07535016	Backup Ring	4
54	07593002	Cylinder Insert	4
55	07123027	Spring	4
56	07371003	Pump Piston	4
57	07524016	Pin	2
58	07652106	Cylinder Head	1
60	07267044	Piston	1
61	07448010	Blade	1
62	07173008	Head Shear	1
63	07170002	Guide Piece A	1
64	07170001	Guide Piece B	1
65	07188101	Bolt	4
66	07274107	Head Plate	1
67	07274106	Head Plate	1
68	07167101	Roller	2
69	07066116	Pin	2
70	07040100	Plug	1
71	07322101	Blade Screw	1
72	07398107	Spring	1
73	07066115	Pin	1
74	07281100	Pin	1
75	07452241	Screw	1
76	07123223	Spring	1
77	07647018	Cylinder	1
78	07329114	Nut	8
79	07329115	Nut	4
80	07452242	Screw	2
81	07131107	Spring Washer	10

Position	Item	Description	Pieces
82	07131105	Spring Washer	4
83	07358210	O-Ring	1
84	07358308	O-Ring	1
85	07535130	Backup Ring	1
86	07535123	Backup Ring	1
87	07476101	Dowel Pin	2
88	07524151	Pin	1
89	07192013	Grub screw	1
90	07472139	Cerclip	2
901	07175040	Housing (L+R)	1
902	07175041	Housing (L+R) Battery slot	1
903	07530007	Suction Plug cpl.	4
904	07656007	Motor	1
905	07648004	Cylinder Group	1

May be subject to changes.

EC Declaration of Conformity

We: **HOLGER CLASEN GmbH & Co. KG**
Alsterdorfer Straße 228
22297 Hamburg, Germany

in accordance with the following Directive(s)

2006/42/EG – The Machinery Directive
2014/30/EU – EMC Directive
2011/65/EU – RoHS Directive

hereby declare that,

Equipment: **Battery-operated hydraulic Cutting Tool**

Type: **InLineBox-CS6**

Serial number: _____

is in conformity with the applicable requirements of the following documents:

Machinery Directive: EN 62841-1:2015; 62841-2-8: 2016

EMC Directive: EMI: EN 61000-6-4: 2007+A1:2011
EMS: EN 61600-6-2: 2005

I hereby confirm that the equipment named above has been designed to comply with the relevant sections of the above referenced specifications. The unit complies with all applicable Essential Requirements of the Directive(s).

Hamburg, 27.02.2020

HOLGER CLASEN GmbH & Co. KG

Lennart Clasen (Managing Director)