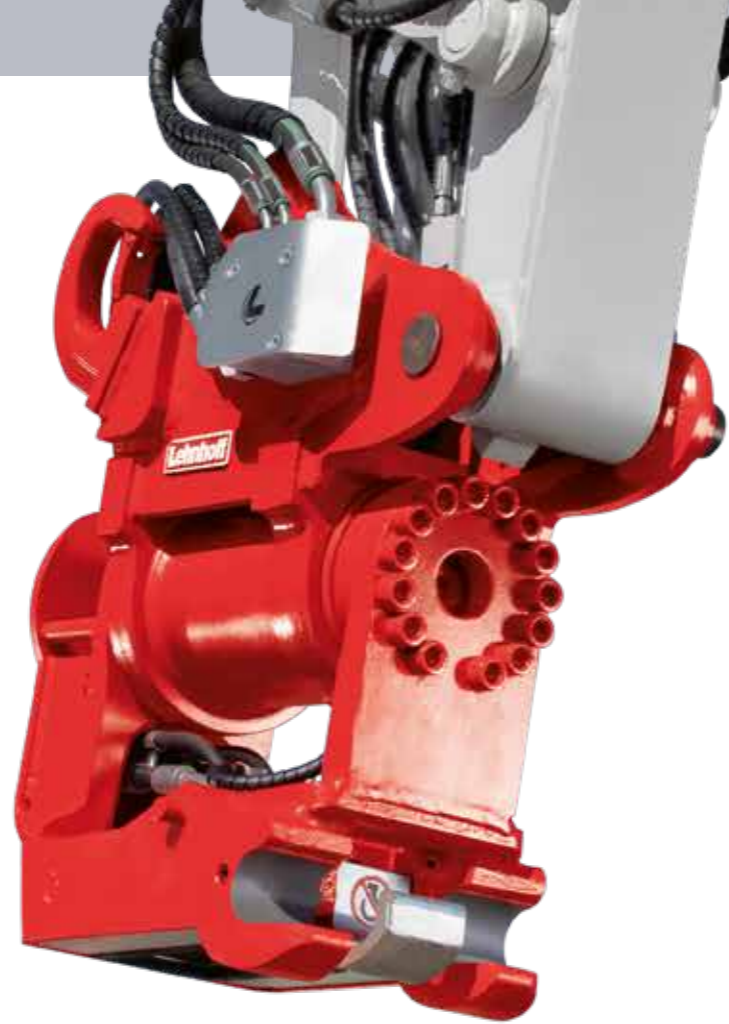


2-12 t

FULLY HYDRAULIC. FULLY AUTOMATIC. FULLY CONVINCING.

fully hydraulic quickcouplers and fitting
attachments for mini- und compact excavators

**A CHANGE WHICH
IS PROFITABLE
WITH EVERY
CHANGEOVER.**



Up to
90%

MACHINE UTILIZATION

due to a variety of possible applications. Tool changes even with short working cycles increase efficiency.

Up to
40%

HIGHER PRODUCTIVITY

due to faster changeover of attachments and a variety of possible applications which lead to faster completions for construction projects and are a timesaver for further projects.

Around
10.000
Euros
of

SAVING

per year a quickcoupler can generate. Instead of 10 minutes for a change of tools the fully hydraulic quickcoupler only needs 20 seconds. Five tool changes a day and 220 working days a year will lead to a saving of 177 working hours. Considering the lowest rate of 60,00€ per hour this saves 10.620€ a year.



HIGHER CHANCES OF ACCEPTANCE FOR A BID

on a public tender because excavators with a wide range of applications are an important criterion. A more efficient use of excavators and staff pledge for a more economical project management. Furthermore, an expansion of your companies service range will boost your efficiency.



PROLONGED MECHANICAL LIFE

thanks to an improvement of care for the machines and applications due to a constantly intended use of tools. Less maintenance and less soiling of the hydraulic system due to sealed locking mechanism.



HIGHEST COMFORT AND SAFETY FOR THE OPERATOR

due to comfortable change of hydraulic tools from the cab which is a relieve in terms of time and also physically. Furthermore, many applications and a reduced work load increase motivation and enjoyment for the operator.

**ALL IN ALL THE BEST
DECISION HERE:
THE FULLY HYDRAULIC
QUICKCOUPLER FROM
LEHNHOFF.**



UP TO 50% FASTER AMORTIZED

thanks to compatibility with components of the Lehnhoff system. Contrary to competitors there is no need for replacement investments which reduces acquisition costs and cuts amortization period in half.

UP TO 4% MORE HYDRAU- LIC PERFORMANCE

The Lehnhoff short stroke valves are optimally designed for maximum oil flow contrary to competitors. Depending on the application there is 4% more performance with lower oil heating.

UP TO 2.200€ FUEL SAVING

Due to higher performance there are up to 5% fuel saving, converted to 10€ per day depending on fuel costs and category compared to the competition.

MINIMAL INSTALLATION EFFORT

Improved by the standard equipped block de-pressurization it is as easy to install as a regular quickcoupler, which saves time and money.

EASIEST MAINTENANCE AND CARE

Replacements of sealing rings and valves can be done directly at the construction site in case of need. Due to a flat surface cleaning is uncomplicated and easy.

MAXIMUM WORKPIECE CAPACITY

Working in perpendicular position with real 2 x 90°- tilting angle involving a hydraulic attachment? This can only be found at Lehnhoff: with a unique combination of power tilt and Lehnhoff quickcoupler.

ULTIMATE WORK SAFETY

Our serial safety standard "double lock" prevents attachments from falling down in case of an incorrect locking. "Double lock" meets all the safety requirements and the extended machine guideline EN 474-1:2006+A6:2019, is Euro Test certified and eligible by the BG BAU.



MORE
INFORMATION

SWITCH TO FULLY HYDRAULIC. BUT NEVER CHANGE THE SYSTEM OF THE MARKET LEADER.

With our fully hydraulic quickcoupler you will not only choose the youngest member but also the unique advantages of the Lehnhoff system.



COMPATIBLE

Based on the 200.000 times best-selling Lehnhoff system.



ECONOMICAL

Further utilization of existing Lehnhoff buckets and adapters and therefore no needs for additional investments when switching to this system.



RELIABLE

100% established system of the quick coupler market leader Lehnhoff.



LEHNHOFF SYSTEM

REALLY QUICK IN JUST 20 SECONDS.

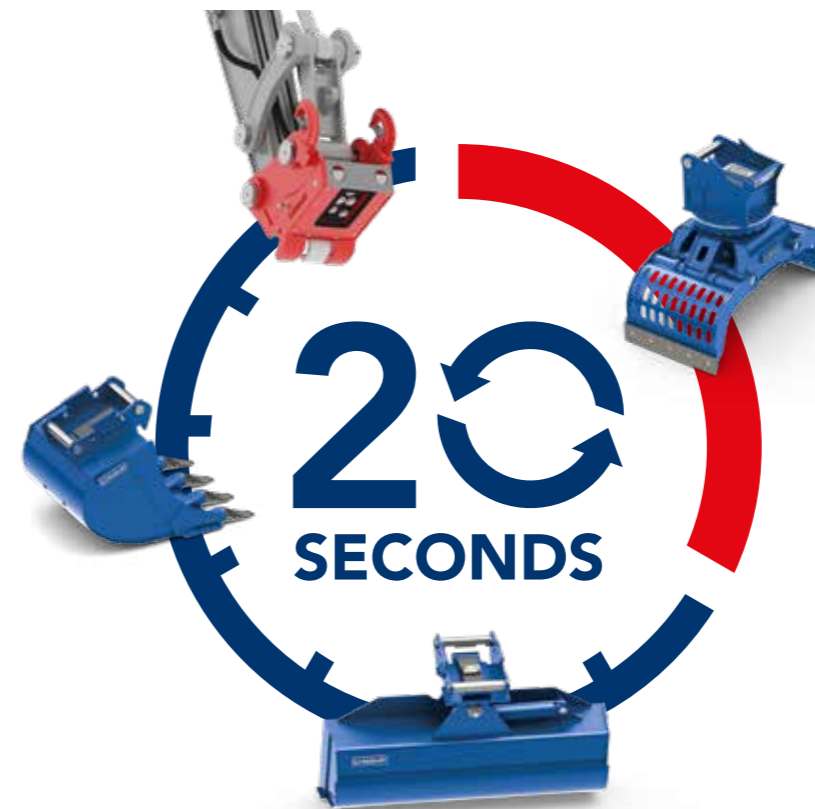
It was never faster and more comfortable to change a fully hydraulic attachments.

Unlatching, latching, locking and connecting of the hydraulic lines is now done by the touch of a button within 20 seconds.

Therefore you need neither a construction worker nor do you have to take matters in your hand or leave the cabin.

Even for short working cycles a tool change is not only economical but moreover it also makes fun.

In addition to that attachments won't be longer misused, which leads to longer durability and boosts the productivity.



VIDEO ATTACHMENT CHANGE

**FULLY VARIABLE:
THE BEST
DECISION OPENS
ALL OPTIONS.**



Lehnhoff system is number one in Germany

You can rent compatible hydraulic attachments at many (dealer) facilities in Germany – from demolition grab to compactor.

Transform your excavator into a multifunctional universal genius. The valve block of the fully hydraulic quickcoupler from Lehnhoff enables to couple all hydraulic attachments. Fast and save from your cabin.



»With HS-V Variolock and the large number of hydraulic add-on equipment, our excavators become all-rounders in road construction and landscaping.«

Roland Wehle
Müller Straßen-Ga-La-Bau GmbH
Horb a. N.
road construction and landscaping


Tilting bucket
2 valves


Sorting grab
4 valves


Hydraulic hammer
2 valves


Backhoe bucket
only valve protection


Rotatable attachment compactor
5 valves


Drum cutter
3 valves


Stump cutter
3 valves


Cobble stone grapple
4 valves

PROVIDES HIGHEST PRESSURE: THE PATENTED SHORT-STROKE VALVES.

The patented short-stroke valves connect safely and leakage-free all attachments with working hydraulic and ensure a maximum oil flow after decoupling.

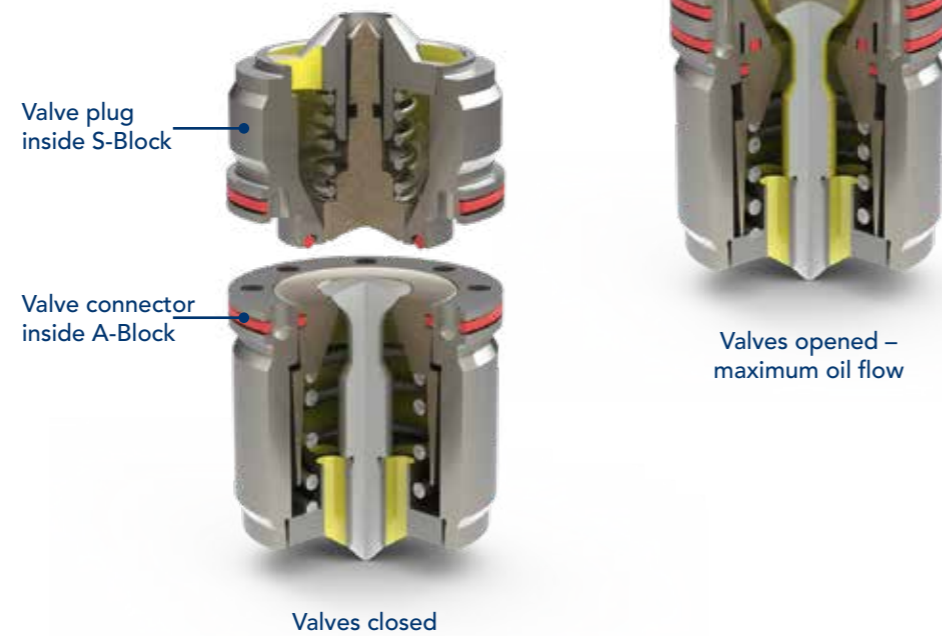
Compared to its competitors the fully hydraulic quickcoupler has up to 4% more performance with less oil heating.

Moreover, fuel consumption is reduced which increases efficiency.

Due to a up to 5% reduced fuel consumption compared to competitors, much money can be saved depending on the ton class.

**Fuel saving per day:
10 EURO x 220 AT**

**Savings per year:
2.200,00 EURO**



FULLY IN LOT: ONLY WITH LEHNHOFF.



Working in full balance with a fully hydraulic tilt quickcoupler?
Only offered by Lehnhoff

With the narrowest integrated overall height tilt motor enables a tilting angle of real 2 x 90°



VIDEO
WORKING
IN THE LOT

SYMLOCK®-READY. DUE TO SYMMETRICAL VALVE GEOMETRY.

Not only existing attachments and adapters are compatible with Lehnhoff's fully hydraulic quickcoupler.

Due to symmetrical valve geometry one can use for example hydraulically powered tilting buckets with symlock-adapter as a front shovel.



FULLY ECONOMICAL.

Invested capital not only should be amortized, at best it should be profitable multiple times. With Lehnhoffs fully hydraulic quickcoupler HS03V and HS08V it will succeed in a twinkling of an eye.

EXCAVATOR SAVINGS

Excavators which are provided with a fully hydraulic quickcoupler will transform a mono-excavator with limited or single use in really multifunctional-excavators.

PERSONNEL SAVINGS

An excavator provided with Lehnhoffs fully hydraulic quickcoupler can be used for significantly more jobs. The personnel saved here can work in different fields of activity.

TIME SAVINGS

Experience indicates: if one can manage a tool change in 20 seconds, it will increase the frequent use of different attachments, which makes working easier and boosts the excavator's productivity. A rate of increase up to 40% is no rarity.




»I am more productive and manage twice twice as many jobs.«

Markus Kocheise
Kocheise Bauunternehmen
Neuenburg
road construction and landscaping

Exemplary calculations have shown, how every tool change shortens amortization period

FULLY ECONOMICAL.

This is how quickly the acquisition investment can pay for itself. (Example calculation).

CALCULATION BASIS

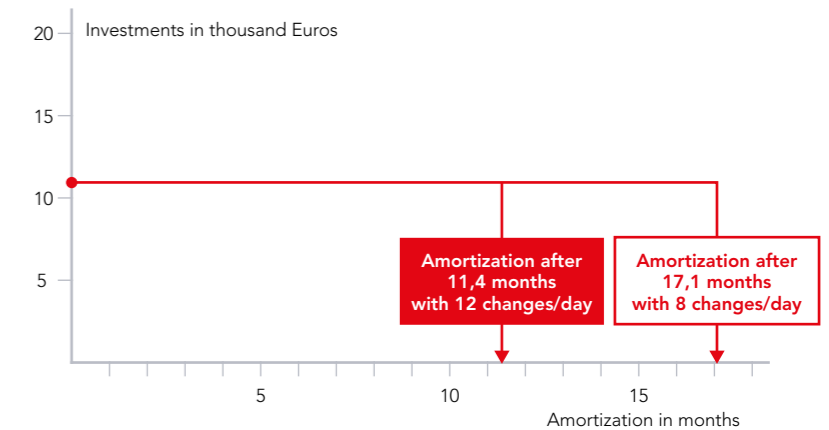
Operating days per year	180
Machine hourly rate	80 Euros
Machine category	9-t-excavator (HS08V, without tilt)

CHANGEOVER TIMES WITH HYDRAULIC ATTACHMENTS

2 lines (z. B. tilting bucket / hydraulic hammer)	4 min
3 lines (z. B. compactor / drum cutter)	6 min
4 lines (z. B. rotational sorting grab)	8 min
5 lines (z. B. rotational compactor)	10 min

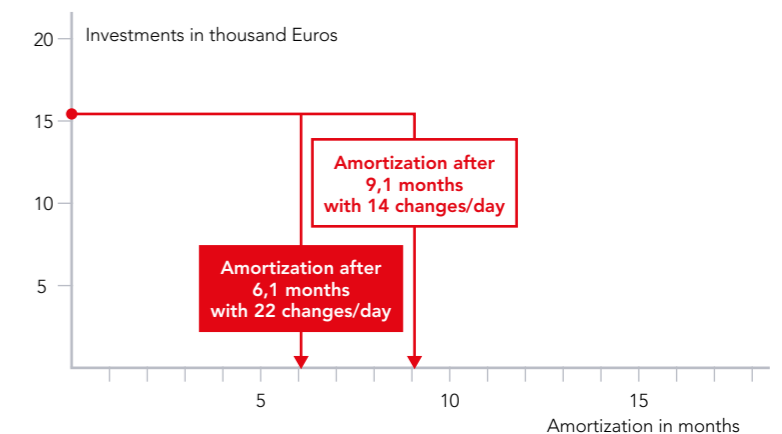
EARTHWORKS

hydraulic attachments in use	changes/day	
tilting bucket	6	8
hydraulic hammer	2	4
Changeovers in total	8	12
Investment	10.880 Euros	



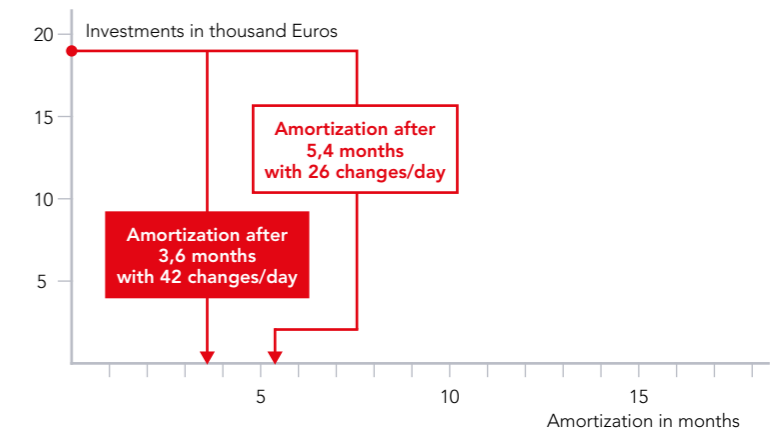
GARDEN LANDSCAPING

hydraulic attachments in use	changes/day	
tilting bucket	6	8
hydraulic hammer	2	4
stone grabber	5	8
drum cutter	1	2
Changeovers in total	14	22
Investment	15.139 Euros	



PIPING CONSTRUCTION

hydraulic attachments in use	changes/day	
tilting bucket	8	12
hydraulic hammer	2	4
sorting grab	8	12
rotational sorting grab	6	10
drum cutter	2	4
Changeovers in total	26	42
Investment	18.009 Euros	





FULLY SAFE. THE NEW SAFETY STANDARD DOUBLE LOCK.

The safety mechanism double lock prevents the attachment from falling in the event of a locking error.

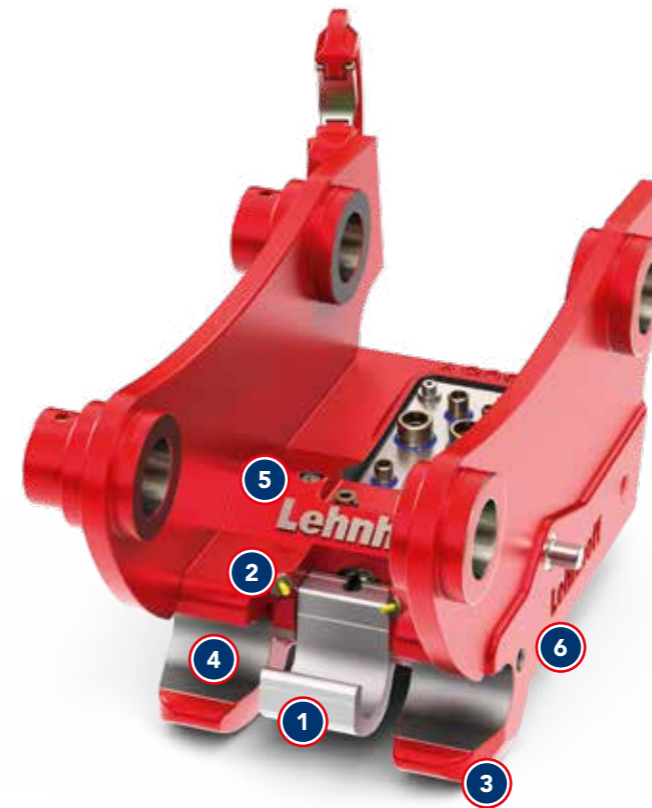
CONVINCING SECURITY FEATURES OF THE CERTIFIED DOUBLE LOCK

- Drop safety device prevents the attachment from falling down in the event of incorrect locking.
- Safety claw positively encloses the pick-up shaft immediately after actuation of the lock and prevents complete release of the attachment in any position.
- New indicator pins provide information on the position of the locking bolts at all times.
- Wear-resistant thanks to robust construction.



VIDEO
DOUBLE
LOCK

THOUGHTFUL OPTIMIZATIONS. THE NEW DOUBLE LOCK SOLUTION.



- 1 Newly developed locking mechanism with safety claw (double lock)
- 2 Optical locking indicator via 2 indicator pins
- 3 Low wear thanks to larger contact surface due to widened pick-up claws
- 4 Easier tool pick-up due to optimized claw geometry
- 5 New: Emergency release
- 6 Compatible with existing Lehnhoff adapters

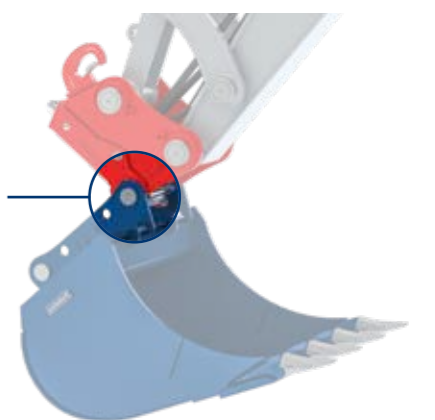


The safety claw, located centrally between the pick-up claws, positively encloses the pick-up shaft immediately after the lock is actuated.



The purely mechanical drop safety device prevents complete release of the attachment in any position in the event of incorrect locking.

New indicator pins provide information about the position of the locking bolts at any time.



- **BG-BAU-eligible**
- **EuroTest-certified**
- **Exceeds all safety standards**
(EN 474, ISO 13031)

FULLY LINED. THE OPTIONAL PREMIUM HOSING.

The optional Premium hosing provides extra protection against external influences while at the same time ensuring maximum freedom of movement.

The particularly compact hosing package includes the deflection blocks and hose holders and offers the optimal plug-and-play hosing for the tilt unit.

The OEM-tubing extends to the connection of the baffle block. In the event of damage, the hose can be replaced quickly and easily.



»The fully hydraulic system from Lehnhoff is very high quality - and that's what you need in the rental business.«

Bernd Waltz
Waltz Baumaschinen GmbH
Wolpertshausen
Construction machinery trade and rental

90% of all attachments on the market are matched to the Lehnhoff System 03/08.

FULLY COMPATIBLE. THE UPGRADE THAT SAVES COSTS.

The fully hydraulic quickcouplers are the latest generation of quickcouplers in the Lehnhoff system. Compatibility results in an attractive cost advantage: 90 % of all attachments on the market are matched to the Lehnhoff system 03/08 and are therefore compatible with the new HS03V and HS08V fully hydraulic quickcouplers.

All types of buckets and attachments with original Lehnhoff adapters without hydraulic function can also continue to be used.

Compared to converting to another quickcoupler system, you save thousands of euros in investment costs.



mechanical quickcoupler









hydraulic quickcoupler



fully hydraulic quickcoupler



other fully hydraulic quickcoupler systems

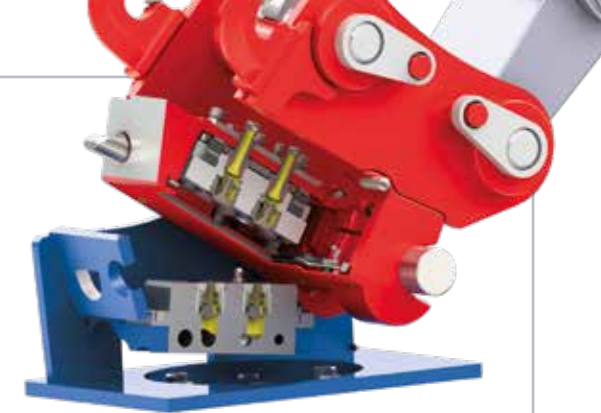
attachment	 <p>all existing fixed attachments fit</p>	<p>all existing fixed attachments fit</p>	<p>new acquisition/adjustment necessary</p>
	 <p>all existing ditch cleaning buckets fit</p>	<p>adapter adjustment possible*</p>	<p>new acquisition/adjustment necessary</p>
	 <p>all existing adapters fit (grab, hydraulic hammer, shear)</p>	<p>only adapters need to be changed*</p>	<p>only adapters need to be changed</p>
excavator		<p>Retrofit piping if necessary:</p> <ul style="list-style-type: none"> Quickcoupler unlock / lock High Flow (Breaker/Compactor) Low Flow (Grab - rotation) Drainline Depressurization unit already included 	<p>Retrofit piping if necessary:</p> <ul style="list-style-type: none"> Quickcoupler unlock / lock High Flow (Breaker/Compactor) Low Flow (Grab - rotation) Drainline Depressurization unit (intervention in excav. hydraulics)
tilt upgrade	<p>existing mechanical or hydraulic tilt quickcoupler</p>  <p>90° tilt</p>	<p>Fully hydraulic update by exchanging QC unit</p>  <p>90° tilt</p>	

*buy-back possible.

FULLY INTEGRATED. THE DEPRESSURIZATION UNIT SAVES COST- AND TIME-CONSUMING INSTALLATION.

In order to ensure permanent functional safety, the block's internal depressurization system automatically depressurizes the working and rotary lines when they are unlocked. This also increases the service life of the valves.

Integration into the valve block saves the costly and time-consuming installation on the excavator. The installation effort thus corresponds to that of a conventional hydraulic quickcoupler.



MAINTENANCE & CARE. SIMPLY ON THE CONSTRUCTION SITE.

When designing the fully hydraulic quickcoupler, Lehnhoff placed great emphasis on the fact that maintenance and servicing can be carried out by the excavator operator himself on the construction site. The only tools required are the optionally available tool and replacement components.

EASIEST CLEANING

The flat surface of the valve block makes cleaning quick and easy cleaning.

REPLACE WEAR PARTS YOURSELF

Sealing rings are subject to wear and can become brittle over time. If necessary, the sealing rings can be replaced directly on the construction site in no time.

VALVE REPLACEMENT IN NO TIME

The same applies to the valves, which can be easily replaced on site with the tool, while the block's internal depressurization prevents excessive oil leakage at the same time.



VIDEO
CLEANING AND
MAINTENANCE

TECHNICAL DATA.

Lehnhoff quickcouplers HS03V and HS08V



LEHNHOFF QUICKCOUPLER HS03V

Tilt	without	PT030	PT050	PT070
excavator class	2–6 t	2–3 t	3–5 t	5–6 t
length ca. (mm)	390	480	540	640
width ca. (mm)	230	250	270	290
height ca. (mm)	320	530	580	600
weight ca. (kg)	320	90	105	150
adapter size	SW03	SW03	SW03	SW03
coupling shaft Ø (mm)	50	50	50	50
tilt angle	–	2 × 90°	2 × 90°	2 × 90°
operating pressure locking (bar)	210	210	210	210
operating pressure unlocking (bar)	50	50	50	50
valves	5 × KV1	5 × KV1	5 × KV1	5 × KV1
oil flow KV1 (l/min)	110	110	110	110
loadhook capacity	3 t	3 t	3 t	3 t
current passthrough	4-pole	4-pole	4-pole	4-pole
safety solution	Lehnhoff Safety Control (LSC) assistance system			



LEHNHOFF QUICKCOUPLER HS08V

Tilt	without	PT070	PT100
excavator class	6–12 t	6–7 t	7–10 t
length ca. (mm)	620	650	720
width ca. (mm)	370	340	390
height ca. (mm)	290	650	710
weight ca. (kg)	90	180	215
adapter size	SW08	SW08	SW08
coupling shaft Ø (mm)	60	60	60
tilt angle	–	2 × 90°	2 × 90°
operating pressure lo-	210	210	210
operating pressure unlo-	50	50	50
valves	3 × KV1, 2 × KV2	3 × KV1, 2 × KV2	3 × KV1, 2 × KV2
oil flow KV1 (l/min)	110	110	110
oil flow KV2 (l/min)	160	160	160
loadhook capacity	5 t	5 t	5 t
current passthrough	7-pole	7-pole	7-pole
safety solution	safety mechanism Double Lock		





60 YEARS LEHNHOFF
30 YEARS LEHNHOFF SYSTEM
200,000 QUICKCOUPLERS SOLD

Lehnhoff is the market leader in many areas, including quickcouplers, where the company is the world's only full-liner from the 1 t mini-excavator to the 130 t hydraulic excavator, the company offers mechanical, hydraulic and fully hydraulic systems.

The unique economic advantage for customers is the compatibility, which allows the continued use of existing attachments from the last 30 years. This form of sustainability is part of our customer promise and at the same time the cornerstone of our philosophy, which also includes the robust steel housing typical for Lehnhoff and the unchanged system that has been patented since the 1990s.

THE HISTORY OF THE LEHNHOFF SYSTEM

After Lehnhoff invented the first tilt bucket in 1968 the company brought another milestone onto the market three decades later. Peter Lehnhoff laid the cornerstone when he asked his design manager to develop a quickcoupler for compact excavators, because he found it too laborious to change equipment when he was redesigning his garden.

In 1992 Lehnhoff launched a complete range of mechanical and hydraulic quickcouplers, ranging from 1 t mini excavators to 40 t hydraulic excavator. The birth of the Lehnhoff system.

Another core competence of Lehnhoff is a meticulously managed database of all excavators on the market, including suspension dimensions. A very fine subdivision of these currently approx. 5,000 excavator types into suspension groups ensures, that the excavator with a quick-change system maintains almost its original bucket tipping in and out angles.

Lehnhoff's database also contains all commercially available attachments with connection dimensions, so that suitable adapters for hammers, grabs etc. can be provided in the shortest possible time.

- 1997** the Lehnhoff system was extended to the excavator class 130 t.
- 2003** the Symlock® adapter was invented, which can also be used to rotate the attachment (bucket) by 180°.
- 2007** Lehnhoff introduced the first fully hydraulic quickcouplers onto the market.
- 2010** Lehnhoff became the only full-liner in the world in the field of quickcouplers.
- 2016** SQ (Symmetrical Quickcoupler) was added, which is based on the international S-standard.
- 2021** around three decades after its introduction, Lehnhoff has now equipped 200,000 excavators with the Lehnhoff system.

COMPATIBLE AND FROM ONE HAND!
THE ATTACHMENTS FOR THE QUICKCOUPLERS HS03V AND HS08V.



With the fully hydraulic quickcouplers from Lehnhoff, compatibility with existing components of the Lehnhoff system is of course remains. Instead of unnecessary investment costs, you only increase productivity. This is only available from Lehnhoff and therefore pays off twice for you. On the following pages you will find the Lehnhoff attachments for the HS03V (excavator class up to 6 t and compatible with SW03 adapter system) and HS08V (excavator class up to 12 t and compatible with SW08 adapter system).

FROM EXCAVATION TO LEVELLING. THE ROBUST AND FLEXIBLE BUCKETS FROM LEHNHOFF



THE DITCH CLEANING BUCKETS MG4, MG6, CG5, CG10

- large tilting angle of $2 \times 45^\circ$
- long base, optimal for profile work
- round sides for perfect digging properties
- blades made of Lehboret 5000 (500 HB)
- 1 hydraulic cylinder, > 5-t-excavator incl. 2 hydraulic cylinders for optimal distribution of forces
- CG-tilting bucket also available with rotary motor (M)
- also available in rigid version
- optionally with fully hydraulic standard or Symlock® adapter



Unique:
Tilt bucket with Symlock®-SW03V adapter enables function in the manner of a side swivel bucket.



Option:
Also available with low-maintenance hydraulic motor.

THE UNIVERSAL TILTING BUCKETS MU4, CU5, CU10

The universal tilt buckets from Lehnhoff for mini and compact excavators are ideal for material excavation as well as slope and levelling work.

- large tilt angle of $2 \times 45^\circ$
- good filling properties and easy emptying due to LH-double-conical design (tilt bucket with deep bucket-like shape)
- blades made of Lehboret 5000 (500 HB)
- smooth and stable bottom (400 HB)
- optionally with fully hydraulic standard or Symlock® adapter
- available with hydraulic cylinder, hydraulic rotary motor or rigid design

GRABS EVEN MORE POWERFULLY. THE SORTING GRAB FROM LEHNHOFF.



Highlight:

Integrated fully hydraulic adapter with internal/protected hose routing: Reduced overall height/weight, protection against damage.

Individual:

Valve assembly as required. Universal adapter (in stock) for fast availability

DEMOLITION AND SORTING GRABS MSG60, CSG100, CSG120 WITH INTEGRATED ADAPTER

The Lehnhoff demolition and sorting grabs are suitable for sorting and loading, for setting stones and for grabbing wood. The very robust and at the same time compact construction, as well as large opening widths and volume, convince with high closing, turning and holding forces.

- endless 360° rotation angle
- robust construction for long service life
- replaceable screw-on blade
- easy to maintain: all lubrication points accessible in one position
- closed grab wings or with bars available on request
- optionally with integrated or screwed fully hydraulic adapter



SCREW ADAPTER FOR ALL FURTHER HYDRAULIC ATTACHMENTS

No matter which attachment of which brand you want to connect to your excavator: Lehnhoff offers screw adapters with matching hole pattern for all attachments. The number of valves is matched to the respective attachment. Unoccupied valve positions are provided with a so-called dummy insert.



VALVE CONFIGURATIONS A-BLOCK

hydraulic
hammer



2 valves

drum cutter /
compactor



3 valves

sorting grab /
shear



4 valves

rotating compactor



5 valves

SHOWING TEETH ON THE CONSTRUCTION SITE.

THE PREMIUM BUCKETS AND SORTING BUCKETS FROM LEHNHOFF.



MTL2 TO MTL6, CTL5 TO CTL12

Like the large buckets from Lehnhoff, the MTL and CTL backhoe buckets for mini and compact excavators meet the highest quality standards and are also suitable for the toughest stakes.

- **NEW:** innovative forged tooth system Lehnhoff GetSharp (MTL3 to MTL6)
- highest quality materials and unique weld seam quality for highest efficiency and durability
- optimal filling and emptying properties enables reduced fuel consumption
- also available as version without teeth with advanced cutting edge
- with Symlock® adapter as standard

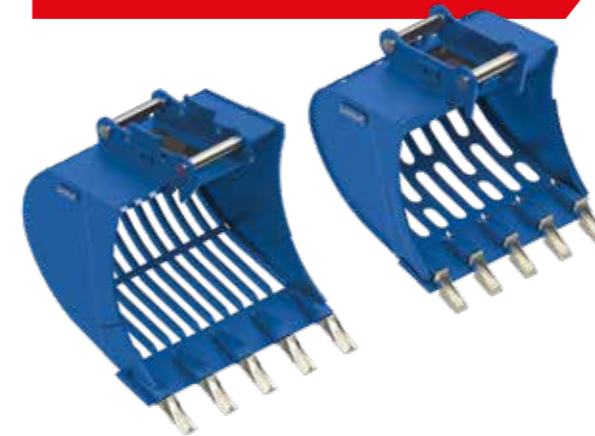
New generation:

With new Lehnhoff premium tooth system GetSharp for 15% better penetration and less wear.



You have the choice:

MSL either with plasma cutted base or solid square bars



SORTING BUCKETS MSL, CSL

For separating coarse and fine material of all kinds. Version MSL for mini-excavators with plasma-fired base, version CSL with base made of solid square bars.

- robust bucket construction in the versions for mini-excavators (MSL) and compact excavators (CSL)
- CSL: base made of solid Rechteckgitterstäben 30 × 20 mm, bar spacing 60 mm
- MSL: optional burnt-out perforated base made of 400 HB steel, hole spacing approx. 50 mm or base made of solid square bars
- with Symlock® adapter as standard

ADDITIONAL VALVE PROTECTION FOR RIGID ATTACHMENTS

All SW03 and SW08 suspension of the rigid Lehnhoff attachments are fully compatible with the fully hydraulic couplers. For the protection of the valves in the HS03V and HS08V quickcouplers, all rigid attachments are supplied with valve protection or simply retrofitted.



SINGLE, DOUBLE, TRIPLE AND QUADRUPLE ON THE GO. THE RIGID ATTACHMENTS FROM LEHNHOFF.



RIPPER TEETH MRZ, CRZ

The bionically optimised ripper teeth from Lehnhoff stand for efficiency and stability when ripping and loosening rock, stone and soil. With welded-on tooth tip and Lehmatic-adapter. Ideal for:

- loosening hard or frozen soils
- demolition work
- loosening of rock and stone
- breaking up road surfaces and concrete slabs
- clearing work

Learned from nature: Bionically optimised construction for particularly high stability (central claw anteater).



CLEARING RAKE MRR, CRR

The Lehnhoff clearing rake was developed for forest and landscape maintenance as well as clearing small rootstocks. Clearing material such as branches, tree tops and small rootstocks are swept up from the ground. The four-pronged clearing rake can be attached to all common mini and midi excavators in no time at all using the Lehnhoff SW attachment. The bionic geometry (ripper tooth-like shape) ensures perfect force distribution and leads to optimal penetration of the soil.

- bionic geometry
- robust design
- Durable - due to perfectly coordinated use of materials
- Symlock® adapter included

The king of rakes: Quadruple sharp and always available from stock.



PALLET FORK MPG, CPG

Enables loads to be picked up on standard pallets due to adjustable forks.

- in various sizes for 1.8 to 2.4 t load capacity
- Lehmatic adapter or Symlock® adapter included

For an extended range of possibilities: With Symlock® adapter can be used rotated e.g. for transport, procedure.





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