

FAG



Lubricators

For grease and oil lubrication

SCHAEFFLER

Foreword

With the automatic lubricators CONCEPT2 and CONCEPT8, it is possible to supply almost all industrial machines and equipment precisely with oil or grease. Due to their versatile programmability and the possibility of constructing comprehensive lubrication systems, there are hardly any limits to their use. The product range is supplemented by manual lubrication tools.

Expanding product range

The product range of lubricators is being steadily expanded by the addition of further articles, appropriate accessories and replacement parts. This makes it possible to keep pace with advancing technical development and other increasing requirements.

Current product information always online

This edition of this publication (TPI 252) describes the status of product information at the time of publication.

Current edition: June 2018.

The publication will be continuously modified and supplemented to reflect the expanding product range. In addition, the addition of further information on the design of lubrication systems is planned.

The current edition of TPI 252 is already available for download at:

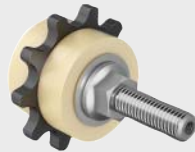
■ www.schaeffler.de/std/1D4F.

Contents

	Page
Tab index	4
Technical principles	
Connection scheme for automatic lubricators	6
System design	8
Automatic lubricators	11
CONCEPT2	14
CONCEPT8	18
Demo case	22
Complete packages.....	24
Accessories for automatic lubricators.....	25
Voltage supply	28
Grease cartridges	30
Splitters, progressive distributors	36
Fittings, Y pieces, check valves.....	42
Hoses, hose cutters	48
Lubrication gears	50
Chain lubrication pinions	58
Lubrication rollers.....	64
Device holders	66
Manual lubrication tools.....	69
Lever grease gun	72
Drum pumps	74
Grease pistols.....	78
Transport aids.....	80
Online and print media	81
Appendix	
Article list	
Customer-specific lubrication gears and chain lubrication pinions (checklist)	



000B2A58



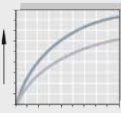
000B2AA1



000B2AD1



000B5772



00015CE8

Technical principles



000B2A6A

Automatic lubricators



000B2AB6

Accessories for automatic lubricators



000B2AE3

Manual lubrication tools

Filter

2 Anzahl Schmierstellen

21 Umgebungsparameter

Online

Offline

Falschwert

Schmierzeit

Speisungsenergie

Regelung der Schmiermenge

Schmiermenge 1

Nachschneidmenge

400

Nachschneidzeit (s)

1

Entfernung der Schmierstelle (m)

MTM1: gewicht, druck

Auf der Schmierstelle

Fluide

Linier

Schneidwerkzeug CONCEPT

Gerade

Gewinkel

28 Temperatur von der Schmierstelle

Produkte

CONCEPT2

Das hier zwei Funktionen verbindet: Es kann mit einem externen oder mit einem integrierten Sensor einen bestimmten Wert messen und steuern, abhängig von dem.

Geräte

Kartrids

Stiftkappe

Schlauchschutzhülle

Anschlußkabel

Zubehör

GO

STOP

CONCEPT8

000B2B13

Online and print media

000B2B25

Appendix

Connection scheme for automatic lubricators

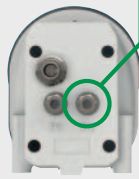
Lubricator

Connection variants

Prefilling



CONCEPT2



2 outlets

Pump body
with 1 outlet



Hose,
direct push fit

②

Expansion to
2 outlets
by **splitter**

Pump body
with 1 outlet



Hose,
direct push fit

CONCEPT8



4 or 8 outlets

Pump body
with 2 outlets



Hose,
direct push fit

Not possible

Pump body
with 2 outlets



Hose,
direct push fit

Reduction to
1 outlet
by **Y piece**

Pump body
with 2 outlets



Hose,
direct push fit

②

Expansion to
3 (max.4) outlets
by **splitter**

Pump body
with 2 outlets



Hose,
direct push fit

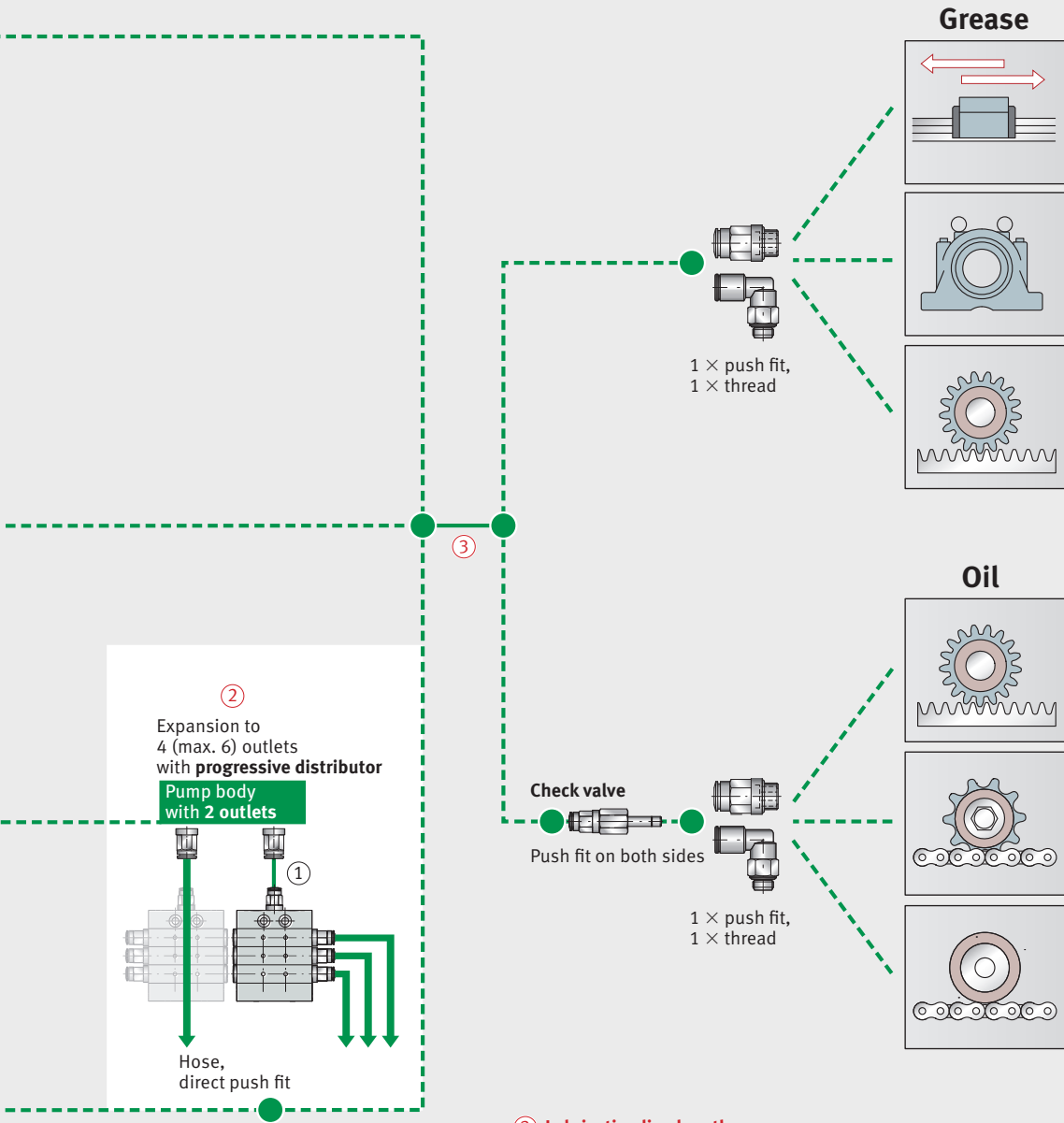
① Hose, max. 0,3 m, direct push fit



Lubrication line

Connection fitting

Lubrication point



② Technical advice necessary

③ Lubrication line length:

- $L_{\max}$ (grease): calculation on following page
- $L_{\max}$ (oil): 100 m

System design

Calculation of lubrication line length for grease lubrication

In design of the lubrication system, the maximum lubrication line length must be observed.

The maximum lubrication line length $L_{\max}$ is dependent in the case of grease lubrication on:

- the delivery pressure of the lubricator
- the grease temperature
- the grease
- the inside diameter of the lubrication line
- the pause times between the pump strokes.

$L_{\max}$ is calculated as follows:

$$L_{\max} = \frac{p_{\max}}{p_l} \cdot K_S \cdot K_P$$

$L_{\max}$ m
Maximum lubrication line length

$p_{\max}$ bar
Delivery pressure of lubricator, see table

p_L bar/m
Pressure loss in lubrication line, *Figure 1*, page 9

K_S – Correction factor for inside diameter of lubrication line, see table, page 10

K_p – Correction factor for pause time between pump strokes, see table, page 10.

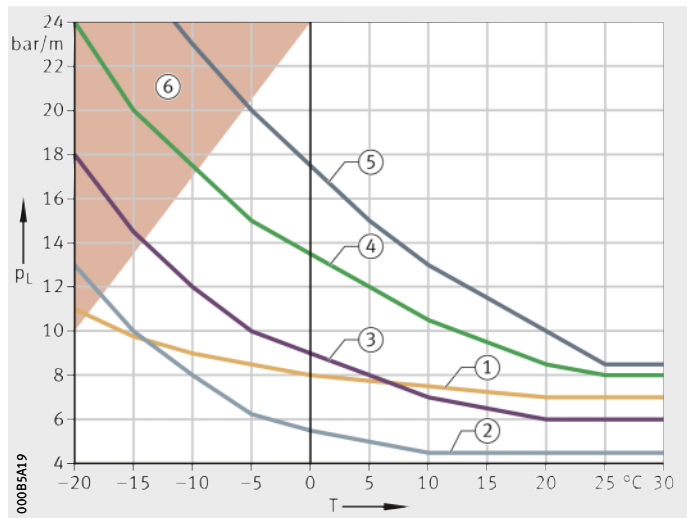
Delivery pressure $p_{\max}$

Lubricator	p _{max} bar
CONCEPT2 (battery)	30
CONCEPT2 (DC 24 V)	50
CONCEPT8 (DC 24 V)	70



- T = grease temperature
 p_L = pressure loss
- ① Grease group 1
 - ② Grease group 2
 - ③ Grease group 3
 - ④ Grease group 4
 - ⑤ Grease group 5
 - ⑥ Technical advice necessary

Figure 1
 Pressure loss p_L
 in lubrication line



Grease groups of Arcanol greases

Grease group	Grease
1	Arcanol FOOD2
	Arcanol MOTION2
	Arcanol SPEED2,6
2	Arcanol LOAD460
	Arcanol TEMP120
3	Arcanol LOAD150
	Arcanol LOAD220
	Arcanol LOAD400
	Arcanol MULTI2
	Arcanol MULTITOP
	Arcanol TEMP110
	Arcanol TEMP200
4	Arcanol CLEAN-M
	Arcanol LOAD1000
	Arcanol MULTI3
	Arcanol TEMP90
5	Arcanol VIB3

The allocation of the grease Arcanol Bio2 to the grease groups was not yet complete at the time of publication. If necessary, please contact Schaeffler.

System design

Correction factor K_S

Inside diameter of lubrication line mm	K_S
5	1
4	0,65

Correction factor K_P

Pause time between 2 pump strokes h	K_P
≥ 3	1
< 3	0,65



The procedure described here for calculating the maximum lubrication line length is only valid for a simple lubrication line without additional components such as splitters, progressive distributors or angled hose connectors.

Lubrication line length for oil lubrication

In oil lubrication, the maximum lubrication line length $L_{\max}$ is:
 $L_{\max} = 100 \text{ m}$

Design example

Initial data:

- lubricator CONCEPT8 (DC 24 V)
- grease temperature = +20 °C
- Arcanol MULTITOP
- inside diameter of hose = 5 mm
- pause time between 2 pump strokes = 5 h.

Calculation of the maximum lubrication line length $L_{\max}$:

- delivery pressure $p_{\max} = 70 \text{ bar}$
- pressure loss $p_L = 6 \text{ bar/m}$
- correction factor $K_S = 1$
- correction factor $K_P = 1$
- maximum lubrication line length $L_{\max} \approx 11,6 \text{ m}$.



Automatic lubricators

CONCEPT2

CONCEPT8

Demo case

Complete packages

Automatic lubricators

CONCEPT2 14

These lubricators to protection class IP54 offer, with their two pump bodies, a high degree of flexibility for the supply of grease or oil as a lubricant.

Lubricant is dispensed by means of an integrated time controller or an external control system. If the machine and the lubricator have a coupled voltage supply, lubrication is only carried out during the machine operating time.

CONCEPT8 18

These lubricators to protection class IP65 offer, with their two or four pump bodies, a high degree of flexibility for the supply of grease or oil as a lubricant.

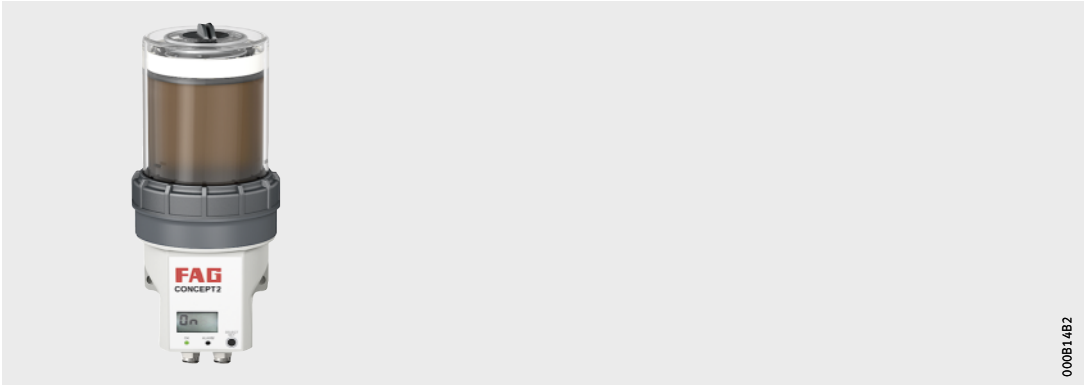
Lubricant is dispensed by means of an integrated time controller or an external control system. If the machine and the lubricator have a coupled voltage supply, lubrication is only carried out during the machine operating time.

Demo case 22

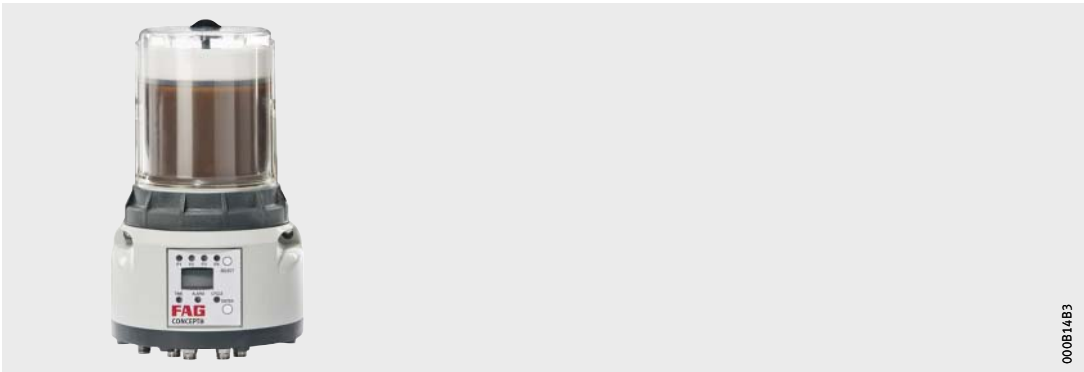
The demo cases are particularly suitable for the External Sales function. Each case contains the essential components of a lubrication system.

Complete packages 24

The complete packages contain a simple starter kit of the components necessary for supplying common applications automatically with lubricant.



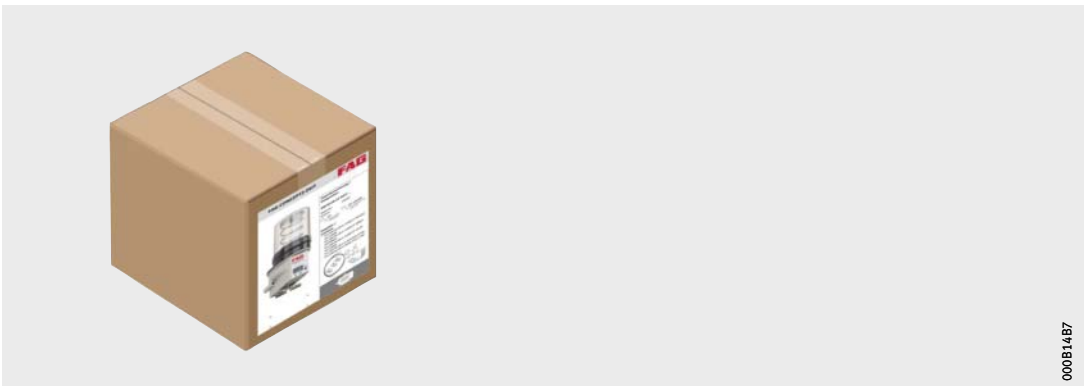
000B1482



000B1483



000B1485



000B1487

CONCEPT2

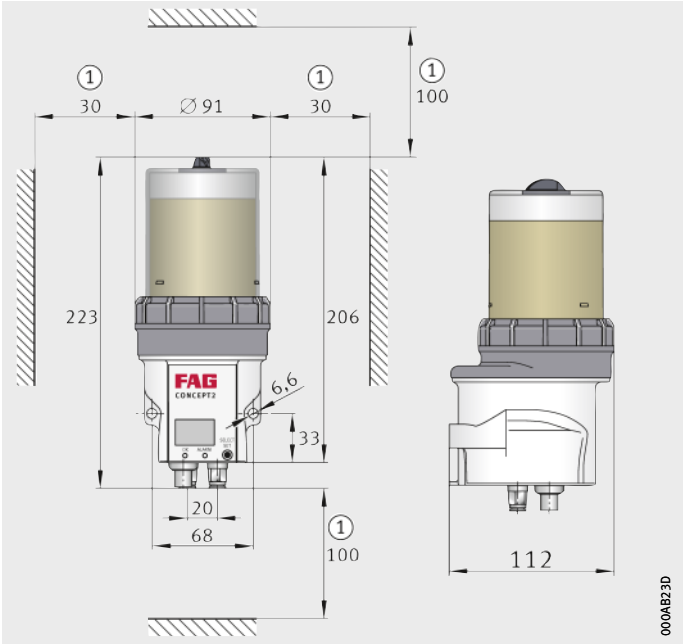
- ① Multi-function interface for voltage supply and I/O communication
- ② Outlets of piston pumps P1 and P2

Figure 1
CONCEPT2-...-24VDC
with multi-function interface



- ① Minimum distances necessary for the mounting and dismounting of the cartridge and hose connectors

Figure 2
Dimensions and
minimum distances



- Characteristics
- automatic, pulse-controlled lubricator for:
 - grease
(Arcanol range up to NLGI 2, other greases by agreement)
 - oil (oil viscosity > 68 cSt)
 - two independently operating piston pumps:
 - metering quantity per lubrication cycle = 0,15 cm³
 - programmable pause times per piston pump:
 - 25 minutes – 925 minutes (internal time control)
 - ≥ 1 minute (external time control via PLC)
 - voltage supply options:
 - internal, 3-V lithium-metal battery, non-rechargeable
(grease version only, no multi-function interface for I/O communication with PLC)
 - external, DC 24 V
 - delivery pressure at room temperature:
 - ≤ 30 bar (internal voltage supply)
 - ≤ 50 bar (external voltage supply)
 - storage volume:
 - 250 cm³, grease cartridge replaceable
 - 300 cm³, oil container non-replaceable
 - output of error messages via display, status LED and multi-function interface:
 - empty level display
 - back pressure too high
 - advance warning at 20% residual fill level
(only via multi-function interface)
 - feedback function for completed lubrication cycle
(only via multi-function interface).



CONCEPT2

Type overview
CONCEPT2

With battery, for grease lubrication with hose diameter 6 mm			
Pump body	Dispensing points	Ordering number	Ordering designation
Quantity	Quantity		
2	2	086872931-0000-10	ARCALUB-C2-2P

Type overview
CONCEPT2-...-24VDC

With connector for DC 24 V, for grease lubrication with hose diameter 6 mm			
Pump body	Dispensing points	Ordering number	Ordering designation
Quantity	Quantity		
2	2	086873105-0000-10	ARCALUB-C2-2P-24VDC

Type overview
CONCEPT2-...-OIL-24VDC

With connector for DC 24 V, for oil lubrication with hose diameter 6 mm			
Pump body	Dispensing points	Ordering number	Ordering designation
Quantity	Quantity		
2	2	092246265-0000-10	ARCALUB-C2-2P-OIL-24VDC

Technical data:
CONCEPT2
CONCEPT2-...-24VDC
CONCEPT2-...-OIL-24VDC

Feature		Value
Dimensions		91 mm×223 mm×112 mm
Mass		≈ 1 kg (without cartridge and lubricant)
Functional principle		Piston pump
Lubricant volume	Grease cartridge	250 cm ³
	Oil	300 cm ³
Metering quantity		0,15 cm ³ (per outlet for one stroke or pulse)
Guaranteed number of lubrication cycles per outlet		50 000 (corresponding to approx. 7 500 cm ³ of lubricant)
Operating pressure	DC 24 V	≤ 50 bar
	Battery	≤ 30 bar
Lubricant	Grease	Arcanol range up to NLGI 2, other greases by agreement
	Oil	> 68 cSt
Operating temperature		−20 °C to +70 °C
Number of outlets		2 (hose connector D = 6 mm)
Number of lubrication points		Depending on hose connector: ■ ≤ 2 (direct) ■ ≤ 4 (with splitters) ■ > 4 (with progressive distributors)¹⁾
Connection		PA hose
Operating voltage		DC 24 V via cable
		3-V lithium-metal battery
Connection plug for multi-function interface		M12×1, 4 pin (only for DC 24 V)
Current consumption	DC 24 V	I _{max} ≤ 250 mA
Mounting position		Vertical
Controller		Integrated (microelectronic)
		External (PLC)
Monitoring	Pressure	Integrated, electronic (measurement of back pressure)
	Fill level	External (PLC)
Error message		Differentiated: empty level, back pressure, internal error (PLC)
		Error code via display
		Optical status display via LED (housing front panel)
Protection class		IP54
Housing material		Polyamide

¹⁾ Technical clarification necessary.



CONCEPT8

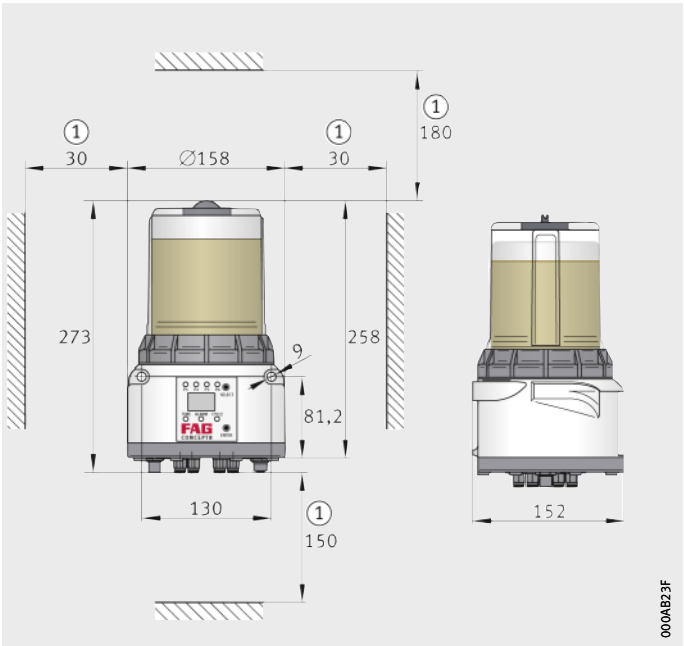
- ① Multi-function interface for voltage supply and I/O interface
- ② Outlets of piston pumps P1 to P4

Figure 1
CONCEPT8
with multi-function interface



- ① Minimum distances necessary for the mounting and dismounting of the cartridge and hose connectors

Figure 2
Dimensions and
minimum distances



- Characteristics
- automatic, pulse-controlled lubricator for:
 - grease
(Arcanol range up to NLGI 3, other greases by agreement)
 - oil (oil viscosity > 68 cSt)
 - independently operating piston pumps each with two outlets:
 - 2 or 4 piston pumps
 - variable metering quantity:
min. 0,15 cm³ per outlet, with 1 lubrication cycle,
max. 7,2 cm³ per outlet, with 96 lubrication cycles;
freely selectable number of lubrication cycles per control
operation; both outlets operated once in each of 2 lubrication
cycles
 - programmable pause times per piston pump:
 - 1 hour – 240 hours (internal time control)
 - ≥ 1 hour (external time control via PLC)
 - voltage supply:
 - external, DC 24 V
 - delivery pressure at room temperature:
 - ≤ 70 bar
 - storage volume:
 - 800 cm³, grease cartridge replaceable
 - 1000 cm³, oil container non-replaceable
 - output of error messages via display, status LED and
multi-function interface:
 - empty level display
 - back pressure too high
 - advance warning at 20% residual fill level
(only via multi-function interface)
 - feedback function for completed lubrication cycle
(only via multi-function interface).



CONCEPT8

Type overview CONCEPT8

With connector for DC 24 V, for grease lubrication with hose diameter 8 mm			
Pump body Quantity	Outlets Quantity	Ordering number	Ordering designation
2	4 ¹⁾	082249156-0000-10	ARCALUB-C8-2P
4	8 ¹⁾	082266646-0000-10	ARCALUB-C8-4P

¹⁾ Adjustment by deactivation of pump bodies and by combination or splitting of outputs.

Type overview CONCEPT8-...-OIL

With connector for DC 24 V, for oil lubrication with hose diameter 6 mm			
Pump body Quantity	Outlets Quantity	Ordering number	Ordering designation
2	4 ¹⁾	083786910-0000-10	ARCALUB-C8-2P-OIL
4	8 ¹⁾	083787062-0000-10	ARCALUB-C8-4P-OIL

¹⁾ Adjustment by deactivation of pump bodies and by combination or splitting of outputs.

Technical data:
CONCEPT8
CONCEPT8-...-OIL

Feature		Value
Dimensions		158 mm×273 mm×152 mm
Mass		≈ 3 kg (without cartridge and lubricant)
Functional principle		Piston pump
Lubricant volume	Grease cartridge	800 cm ³
	Oil	1000 cm ³
Metering quantity		0,15 cm ³ (per outlet for one stroke or pulse)
Guaranteed number of lubrication cycles per outlet		65 000 (corresponding to approx. 9 750 cm ³ of lubricant)
Operating pressure		≦ 70 bar
Lubricant	Grease	Arcanol range up to NLGI 3, other greases by agreement
	Oil	> 68 cSt
Operating temperature		−20 °C to +70 °C
Number of outlets		max. 8 (house connector D = 8 mm)
Number of lubrication points		Depending on hose connector: ■ ≦ 8 (direct) ■ ≦ 16 (with splitters) ■ > 16 (with progressive distributors) ¹⁾
Connection		PA hose
Operating voltage		DC 24 V ± 5% (stabilised)
Connector		M12×1, 4 pin
Current consumption	DC 24 V	I _{max} ≦ 350 mA
Mounting position		Vertical
Controller		Integrated (microelectronic) External (PLC)
Monitoring	Pressure	Integrated, electronic (measurement of back pressure)
	Fill level	Integrated, reed switch
Error message		Differentiated: empty level, back pressure, internal error (PLC)
		Error code via display
		Optical status display via LED (housing front panel)
Protection class		IP65
Housing material		Aluminium (powder coated), polyamide



¹⁾ Technical clarification necessary.

Demo case

Demo case for:
① CONCEPT2
② CONCEPT8



Figure 1
Demo cases

The demo cases are particularly suitable for the External Sales function. Each case contains the essential components of a lubrication system. It can be used to explain the design and function of a lubrication system and to give an impression of the high quality design of all components.

Scope of delivery
Demo case CONCEPT2

- lubricator CONCEPT2-2P-24VDC (angled connector)
- sample lubricant cartridge for grease lubrication
- lubrication gear
- chain lubrication pinion
- mains power pack
- retaining bracket, including support washers
- box of hose connector parts for lubrication line of diameter = 6 mm
- USB card containing installation and user manual.



Scope of delivery
Demo case CONCEPT8

- lubricator CONCEPT8-4P
- sample lubricant cartridge for grease lubrication
- lubrication gear
- chain lubrication pinion
- mains power pack
- retaining bracket, including support washers
- box of hose connector parts for lubrication line of diameter = 8 mm
- USB card containing installation and user manual.

Type overview
Demo case

Type		Ordering number	Ordering designation
Demo case	CONCEPT2	089395433-0000-10	DEMO-ARCALUB-C2-SET
	CONCEPT8	084224878-0000-10	DEMO-ARCALUB-C8-SET

Complete packages

Figure 1
Mounting example
CONCEPT2 EKIT



The complete package EKIT allows the rapid refitting of electric motors to the lubricator CONCEPT2. In addition to the lubricator, it contains all the accessories required for mounting and lubrication. It thus facilitates simple conversion to fully automatic relubrication.

Scope of delivery

- The complete package EKIT comprises:
- lubricator CONCEPT2 (angled connector), voltage supply options:
 - battery operation
 - external, DC 24 V, with mains connection cable (straight plug, no LED, cable length = 10 m)
 - hose of outside diameter = 6 mm, length = 3 m
 - device holder ARCALUB-C2.HOLDER-KIT, see page 66.
The universal locating bracket, when fixed by means of the eye bolt on an electric motor, can be mounted in a 45° or 90° position
 - hose connector parts of angled design, for interchange with existing lubrication nipples:
 - 2 pieces with thread M10×1
 - 2 pieces with thread M8×1
 - 2 pieces with thread G¹/₈.

Type overview
Complete packages

Type	Ordering number	Ordering designation
CONCEPT2 EKIT (battery)	092662269-0000-10	ARCALUB-C2-2P-EKIT
CONCEPT2 EKIT (mains DC 24 V)	092662277-0000-10	ARCALUB-C2-2P-24VDC-EKIT

Note! Grease cartridges must be ordered separately, see page 30.

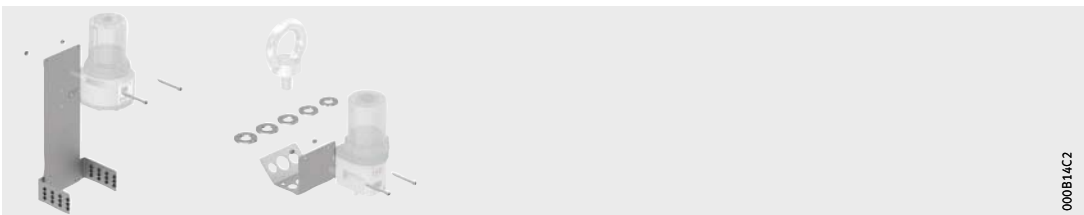
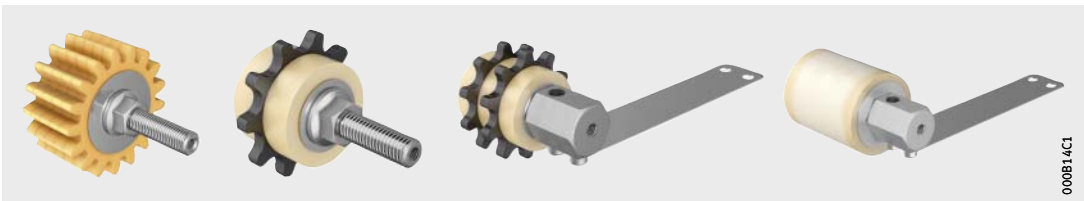
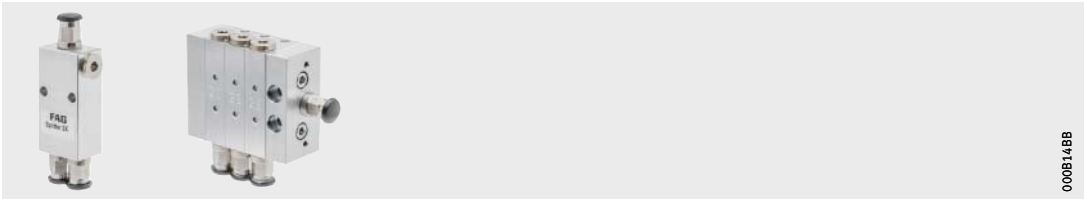
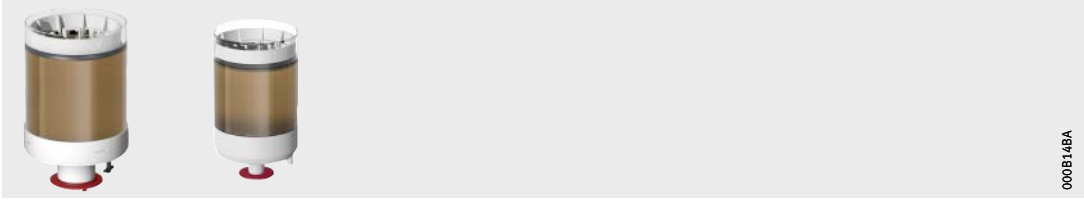


Accessories for automatic lubricators

Voltage supply
Grease cartridges
Splitters, progressive distributors
Fittings, Y pieces, check valves
Hoses, hose cutters
Lubrication gears
Chain lubrication pinions
Lubrication rollers
Device holders

Accessories for automatic lubricators

Voltage supply	28
The lubrication systems can be supplied with voltage either internally via a battery (CONCEPT2 only) or externally via a mains pack (DC 24 V).	
Grease cartridges	30
Based on the Arcanol range, there is a large selection of standard grease cartridges. The selection comprises multi-purpose greases, heavy duty greases, high temperature greases and special greases. By agreement, filling with customer-specific greases is possible.	
Splitters, progressive distributors	36
Splitters and progressive distributors offer the possibility of branching a pump outlet. In this case, lubricant can be distributed in uniform volumes to up to 3 lubrication points.	
Fittings, Y pieces, check valves	42
For the connection of lubrication lines to the lubricator or the lubrication point, there is an extensive range of fittings available.	
Hoses, hose cutters	48
A reliable supply of lubricant can be achieved by means of various hose diameters in graduated lengths as well as special hose cutters.	
Lubrication gears, chain lubrication pinions, lubrication rollers	50
	58
	64
For precise and economical metering of lubricant.	
Device holders	66
Special device holders facilitate the mounting of the lubricators CONCEPT2 and CONCEPT8 directly on the equipment to be lubricated or in its vicinity.	



Voltage supply

Type overview Battery

Only for CONCEPT2		
		
Type	Ordering number	Ordering designation
Battery pack DC 3 V	087314762-0000-10	ARCALUB-C2.BATTERY

Energy supply by a battery is only possible in the case of CONCEPT2.

Type overview Connection cables with plug

For CONCEPT2 and CONCEPT8, 4 ends, for available voltage supply DC 24 V, I/O communication possible			
			
Type	Designation	Ordering number	Ordering designation
A	Plug Cable: L = 10 m	075378361-0000-10	ARCALUB-X.CABLE-M12-10M
B	Plug (LED) Cable: L = 5 m	083788964-0000-10	ARCALUB-X.CABLE-M12X1-5M-LED-S
	Plug (LED) Cable: L = 10 m	083788980-0000-10	ARCALUB-X.CABLE-M12X1-10M-LED-S
C	Plug (LED) Cable: L = 5 m	075592240-0000-10	ARCALUB-X.CABLE-M12-5M-LED
	Plug (LED) Cable: L = 10 m	077879805-0000-10	ARCALUB-X.CABLE-M12-10M-LED

LED signal indication

Signal colour of LED	Description
Green	Voltage supply DC 24 V present
White	Incoming signal; initiation of lubricant dispensing by external controller
Yellow	Outgoing signal; feedback of completed lubricant dispensing to external controller

Type overview
Mains pack

For CONCEPT2 and CONCEPT8,
2 ends, AC 230 V/DC 24 V with connection cable moulded rigidly to plug,
no I/O communication possible



Type	Ordering number	Ordering designation
Plug Cable: AC 240 V, L = 1,8 m DC 24 V, L = 1,8 m	083872507-0000-10	ARCALUB-X.POWER-SUPPLY-UNIT

External voltage supply facilitates a simple solution for preventing overlubrication. If the machine and the lubricator have a coupled voltage supply, lubrication is only carried out during the machine operating time.



Grease cartridges

Grease cartridges for CONCEPT2

The grease cartridges for the lubricator CONCEPT2 have a grease volume of 250 cm³, *Figure 1*.



Figure 1
Grease cartridge for CONCEPT2

Type overview Standard grease cartridges 250 cm³

Grease	Ordering number	Ordering designation
Arcanol CLEAN-M	087334194-0000-10	ARCALUB-C2.LC250-CLEAN-M
Arcanol Food2	087334020-0000-10	ARCALUB-C2.LC250-FOOD2
Arcanol LOAD150	087329077-0000-10	ARCALUB-C2.LC250-LOAD150
Arcanol LOAD220	087329115-0000-10	ARCALUB-C2.LC250-LOAD220
Arcanol LOAD400	087329131-0000-10	ARCALUB-C2.LC250-LOAD400
Arcanol LOAD460	087329140-0000-10	ARCALUB-C2.LC250-LOAD460
Arcanol LOAD1000	087329280-0000-10	ARCALUB-C2.LC250-LOAD1000
Arcanol MULTI2	087328038-0000-10	ARCALUB-C2.LC250-MULTI2
Arcanol MULTITOP	087328810-0000-10	ARCALUB-C2.LC250-MULTITOP
Arcanol MOTION2	087334216-0000-10	ARCALUB-C2.LC250-MOTION2
Arcanol SPEED2,6	087334046-0000-10	ARCALUB-C2.LC250-SPEED2,6
Arcanol TEMP90	087329816-0000-10	ARCALUB-C2.LC250-TEMP90
Arcanol TEMP110	087329840-0000-10	ARCALUB-C2.LC250-TEMP110
Arcanol TEMP120	087329980-0000-10	ARCALUB-C2.LC250-TEMP120
Arcanol TEMP200	087329999-0000-10	ARCALUB-C2.LC250-TEMP200

Further information

Selection of Arcanol greases:
 ■ TPI 168, Rolling Bearing Greases Arcanol.

**Grease cartridges
for CONCEPT8**

The grease cartridges for the lubricator CONCEPT8 have a grease volume of 800 cm³, *Figure 2*.



Figure 2
Grease cartridge
for CONCEPT8

**Type overview
Standard grease cartridges
800 cm³**

Grease	Ordering number	Ordering designation
Arcanol CLEAN-M	083549129-0000-10	ARCALUB-C8.LC800-CLEAN-M
Arcanol Food2	083549064-0000-10	ARCALUB-C8.LC800-FOOD2
Arcanol LOAD150	083532439-0000-10	ARCALUB-C8.LC800-LOAD150
Arcanol LOAD220	083533583-0000-10	ARCALUB-C8.LC800-LOAD220
Arcanol LOAD400	083533761-0000-10	ARCALUB-C8.LC800-LOAD400
Arcanol LOAD460	083533818-0000-10	ARCALUB-C8.LC800-LOAD460
Arcanol LOAD1000	083548343-0000-10	ARCALUB-C8.LC800-LOAD1000
Arcanol MULTI2	083532412-0000-10	ARCALUB-C8.LC800-MULTI2
Arcanol MULTI3	083548289-0000-10	ARCALUB-C8.LC800-MULTI3
Arcanol MULTITOP	082631492-0000-10	ARCALUB-C8.LC800-MULTITOP
Arcanol SPEED2,6	083548629-0000-10	ARCALUB-C8.LC800-SPEED2,6
Arcanol TEMP90	083533630-0000-10	ARCALUB-C8.LC800-TEMP90
Arcanol TEMP110	083548580-0000-10	ARCALUB-C8.LC800-TEMP110
Arcanol TEMP120	083548599-0000-10	ARCALUB-C8.LC800-TEMP120
Arcanol TEMP200	083548602-0000-10	ARCALUB-C8.LC800-TEMP200
Arcanol VIB3	083549099-0000-10	ARCALUB-C8.LC800-VIB3

Further information

Selection of Arcanol greases:
■ TPI 168, Rolling Bearing Greases Arcanol.

Grease cartridges

Customer-specific grease cartridges

By agreement, filling of grease cartridges with customer-specific greases is possible. The preconditions are successful compatibility testing and agreement to a minimum acceptance quantity.

Customer-specific grease cartridge for:
① CONCEPT2
② CONCEPT8

Figure 3
Customer-specific grease cartridges

Type overview Customer-specific grease cartridges



Type	Ordering number	Ordering designation
Cartridge for CONCEPT2 with 250 cm ³	093411448-0000	KFIS.ARCALUB-C2.LC250-CF-REFERENZ
CONCEPT8 with 800 cm ³	093411561-0000	KFIS.ARCALUB-C8.LC800-CF-REFERENZ

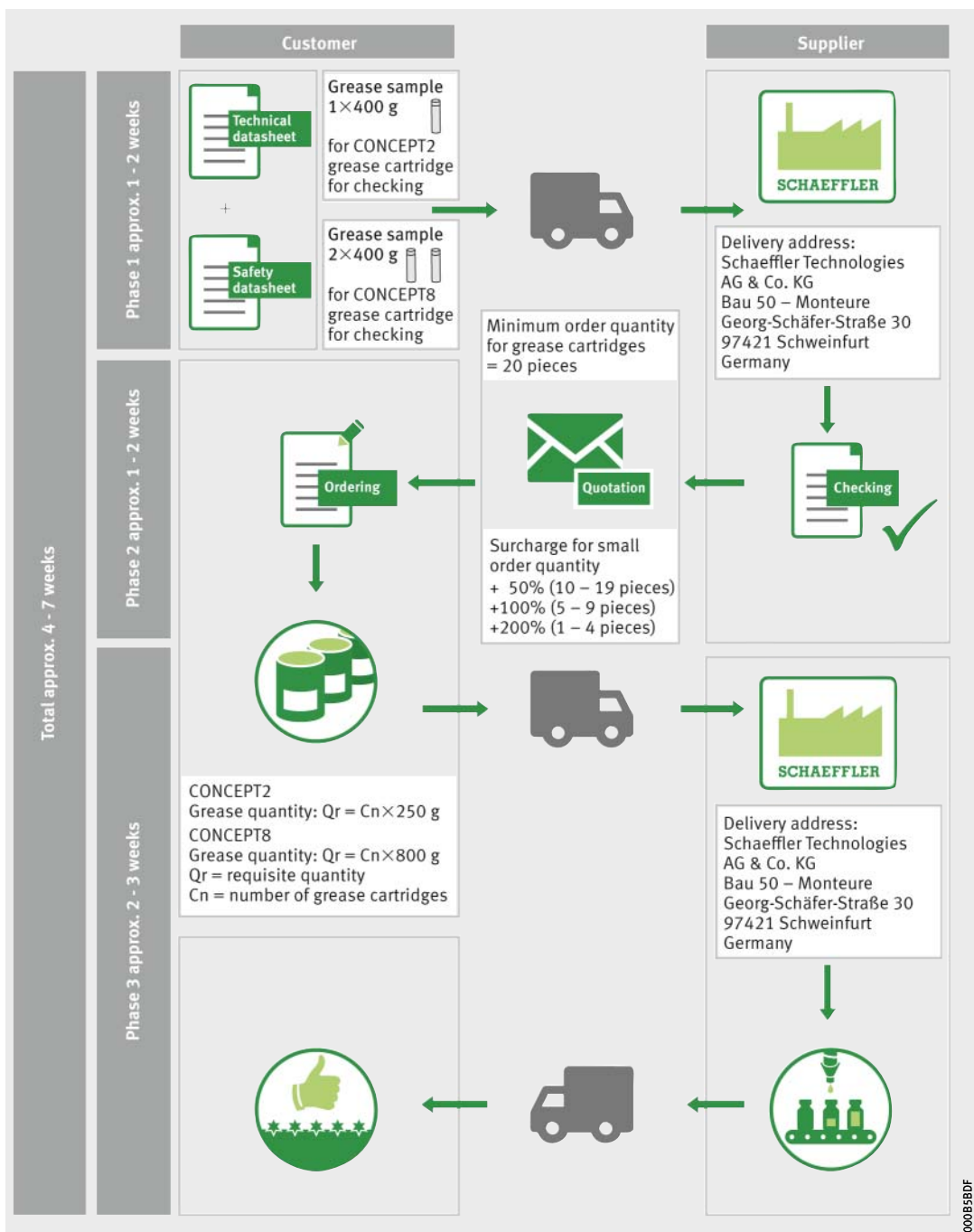


Figure 4
Ordering of customer-specific
grease cartridges

Grease cartridges

Ordering procedure	The ordering of customer-specific grease cartridges is carried out in 3 phases, see <i>Figure 4</i> , page 33:
Phase 1	With his enquiry, the customer sends the following documents and grease samples to Schaeffler: ■ technical datasheet of the grease ■ safety datasheet of the grease ■ grease samples for compatibility testing, quantity required: – 400 g in the case of cartridges for CONCEPT2 – 2×400 g in the case of cartridges for CONCEPT8. Delivery address: ■ Schaeffler Technologies AG & Co. KG Bau 50 – Monteure Georg-Schäfer-Straße 30 97421 Schweinfurt Germany
Phase 2	On the basis of the grease sample, Schaeffler checks whether the grease is suitable for use in the CONCEPT lubrication systems. If the result is positive, Schaeffler prepares a quotation. When preparing the quotation, the quantity is subject to the following: ■ minimum order quantity per cartridge type and grease: – 20 cartridges ■ surcharge when ordering smaller quantities: – +50% for 10 to 19 cartridges – +100% for 5 to 9 cartridges – +200% for 1 to 4 cartridges.
Phase 3	The customer places the order and provides the grease quantity required for filling. Requisite grease quantities: ■ 250 g per cartridge for CONCEPT2 ■ 800 g per cartridge for CONCEPT8. Delivery address: ■ Schaeffler Technologies AG & Co. KG Bau 50 – Monteure Georg-Schäfer-Straße 30 97421 Schweinfurt Germany When the grease is received, Schaeffler fills the cartridges and delivers these to the customer.



Splitters, progressive distributors

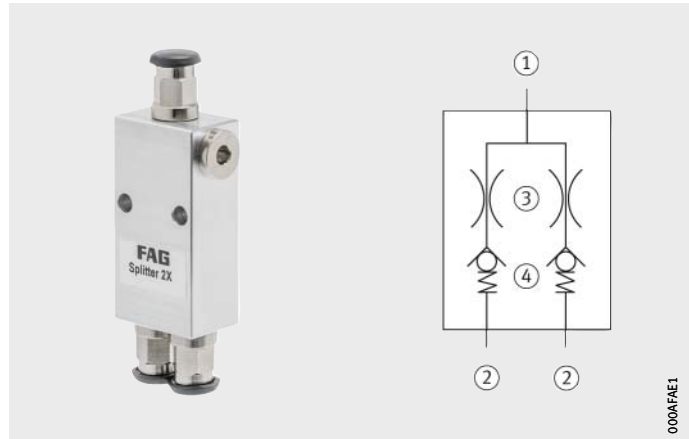
Splitters

Splitters are used to achieve the distribution in uniform volumes of a delivery volume to 2 outlets.

For this purpose, splitters are fitted with chokes that create a pressure differential of approx. 10 bar between the inlet and outlet for the lubricant. Each outlet is provided with a check valve in order to prevent overflow of the lubricant from one outlet to the other, *Figure 1*.

- ① Inlet
- ② Outlet
- ③ Chokes
- ④ Check valves

Figure 1
Splitter with hydraulic schematic



Characteristics

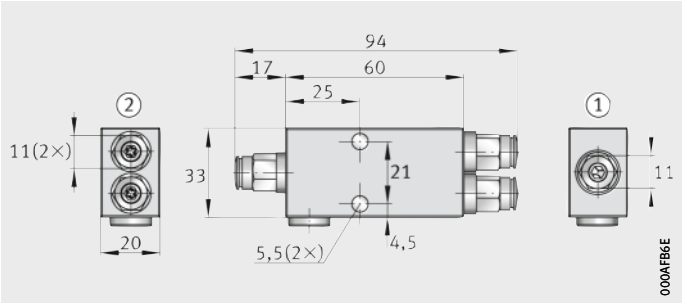
- the supply of lubricant to the connected lubrication points is subject to the following:
 - identical lubricant
 - identical lubricant quantity
 - identical lubrication interval
- requirement for lubrication lines at the inlet:
 - maximum lubrication line length to pump: 300 mm
- requirement for lubrication lines at the outlet:
 - approximately equal lubrication line lengths ($\pm 10\%$ difference)
 - identical line cross-sections
- operating temperature: +10 °C to +60 °C
- lubricant:
 - oils
 - greases up to NLGI 2 (no solid content).



Cascading, in other words the combination of splitters, is not permissible.

- ① Inlet
- ② Outlets

Figure 2
Dimensions



Technical data
Splitters

Feature		Value
Operating pressure	required	up to 10 bar
	max.	100 bar
Metering accuracy with correct operation		±10%
Material	Housing	Aluminium
	Hose connectors	Brass, nickel-plated

Type overview
Splitters

Medium	Hose diameter mm	Ordering number	Ordering designation
Grease	6	081307497-0000-10	ARCALUB-X.SPLITTER-2X-STRAIGHT-GREASE
Oil	6	074969218-0000-10	ARCALUB-X.SPLITTER-2X-STRAIGHT-OIL

Scope of delivery

The splitter is supplied with 3 connection fittings with a thread M10×1 for the hose connection diameter D = 6 mm. For the connection of hoses of D = 8 mm, the corresponding fittings must be ordered separately.



Splitters, progressive distributors

Progressive distributors

In progressive distributors, the lubricant is distributed by the follower piston control of the individual distributor discs consecutively to the lubrication points. Each of the 3 outlets is additionally provided with a check valve in order to prevent overflow of the lubricant from one outlet to another.



Figure 3
Progressive distributors

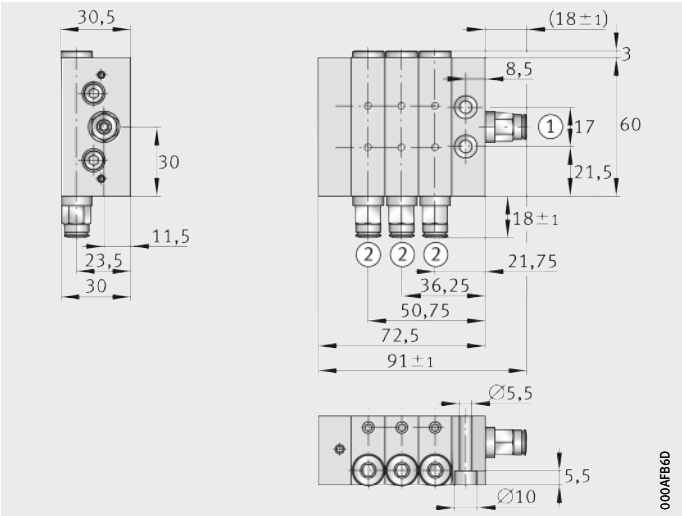
Characteristics

- the supply of lubricant to the connected lubrication points is subject to the following:
 - identical lubricant
 - identical lubricant quantity
 - identical lubrication interval
- requirement for lubrication lines at the inlet:
 - maximum lubrication line length to pump: 300 mm
- requirement for lubrication lines at the outlet:
 - identical line cross-sections
- operating temperature: +10 °C to +60 °C
- lubricant:
 - oils
 - greases up to NLGI 2 (no solid content).



Cascading, in other words the combination of progressive distributors, is not permissible.

The use of progressive distributors is only permissible after technical approval of the complete lubrication concept by Schaeffler.



① Inlet
② Outlet

Figure 4
Dimensions

Technical data Progressive distributors

Feature		Value
Operating pressure	required	up to 10 bar
	max.	100 bar
Metering accuracy with correct operation		± 10%
Material	Housing	Aluminium
	Hose connectors	Brass, nickel-plated

Type overview Progressive distributors

Type	Metering volume cm ³	Ordering number	Ordering designation
TS3-25	0,025	093204060-0000-10	ARCALUB-X.PROGDIV-3X-RIGHT-0.05CCM

Scope of delivery

The progressive distributor is supplied with 4 connection fittings with a thread M10×1 for the hose connection diameter D = 6 mm. For the connection of hoses of D = 8 mm, the corresponding connection fittings must be ordered separately.



Splitters, progressive distributors

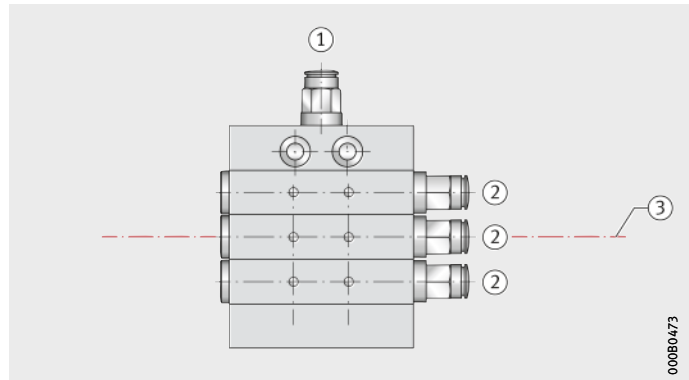
Mounting regulations

For correct function of progressive distributors, the following rules must be observed in mounting:

- The progressive distributor may only be mounted on a flat surface. Otherwise, stresses can lead to jamming of the control pistons.
- In all applications with oil lubrication, the progressive distributor must be mounted such that the control pistons are in a horizontal position, *Figure 5*. Otherwise, gap losses and the influence of gravity can lead to descent of the control pistons.

- ① Inlet
- ② Outlet
- ③ Horizontal position of control pistons

Figure 5
Alignment
of the progressive distributor
in mounting



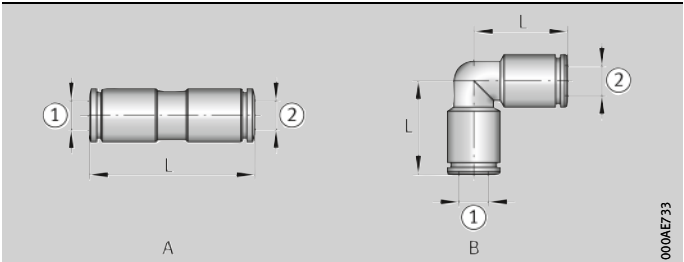
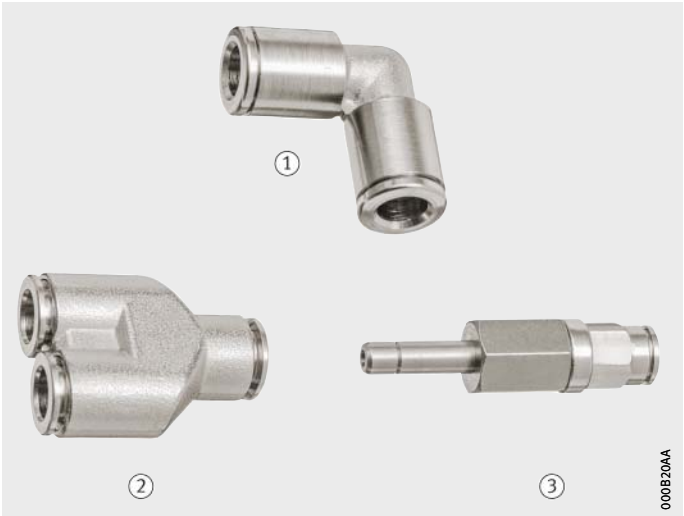


Fittings, Y pieces, check valves

- ① Hose connector
- ② Y piece
- ③ Check valve

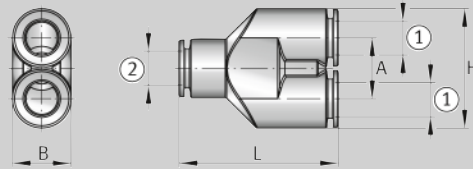
Figure 1
Hose connector,
Y piece and check valve

Type overview
Hose connectors



Type	Hose diameter		Length L mm	Ordering number	Ordering designation
	① mm	② mm			
A	6	4	33	093040717-0000-10	ARCALUB-X.CONNECT-6-4
	6	6	34	083867112-0000-10	ARCALUB-X.CONNECT-6-6
	8	6	39,5	083867279-0000-10	ARCALUB-X.CONNECT-8-6
	8	8	38	083867309-0000-10	ARCALUB-X.CONNECT-8-8
B	6	6	19,5	088902250-0000-10	ARCALUB-X.CONNECT-6-6-W

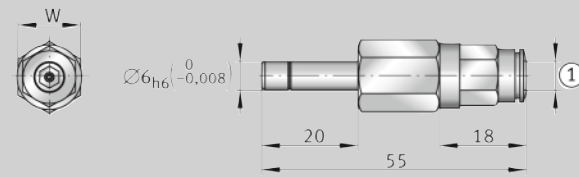
Type overview
Y pieces

							
Hose diameter		Dimensions				Ordering number	Ordering designation
① mm	② mm	L mm	A mm	H mm	B mm		
2×6	6	35	12,5	24,5	12	076693180-0000-10	ARCALUB- X.TUBEFIT-Y-D6
2×8	8	38	14,5	28,5	14	083654640-0000-10	ARCALUB- X.TUBEFIT-Y-D8

000AE734



Type overview
Check valve

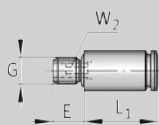
Only suitable for oil			
			
Hose diameter	Width across flats	Ordering number	Ordering designation
① mm	W mm		
6	13	092927122-0000-10	ARCALUB- X.OIL-VALVE-SAT106G

000AE736

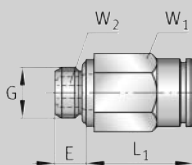
Fittings, Y pieces, check valves

Type overview
Hose connector parts
Type A, B, C

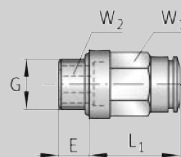
Hose, push fit			
   A B C 000B12C6			
Thread	Hose diameter	Ordering number	Ordering designation
G	mm		
M3×0,8	4	093041390-0000-10	ARCALUB-X.TUBEFIT-M3-SAT034G-S
M5×0,8	6	077937490-0000-10	ARCALUB-X.TUBEFIT-M5-SAT056G
M6×1		075527472-0000-10	ARCALUB-X.TUBEFIT-M6-SAT066G
M8×1		079567428-0000-10	ARCALUB-X.TUBEFIT-M8X1-SAT086G
M10×1		075527626-0000-10	ARCALUB-X.TUBEFIT-M10X1-SAT106G
G1/8		084465905-0000-10	ARCALUB-X.TUBEFIT-G1/8-SAT186G
G1/4		079567606-0000-10	ARCALUB-X.TUBEFIT-G1/4-SAT146G
M8×1	8	083654216-0000-10	ARCALUB-X.TUBEFIT-M8X1-SAT088G
M10×1		083654356-0000-10	ARCALUB-X.TUBEFIT-M10X1-SAT108G
G1/8		083654534-0000-10	ARCALUB-X.TUBEFIT-G1/8-SAT188G
G1/4		083654607-0000-10	ARCALUB-X.TUBEFIT-G1/4-SAT148G



A



B



C

000AE738

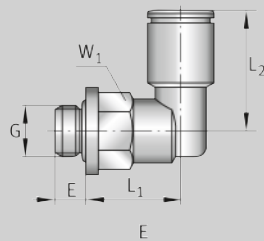
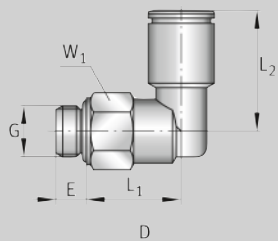
Type	Seal	Width across flats W ₁ mm	Hexagon socket Nominal dimension W ₂ mm	Length		Thread length E mm	Hose Insertion depth mm
				L ₁ mm	L ₂ mm		
A	Flat sealing over O ring	–	1,5	16,5	–	5	15
A	Flat sealing over O ring	–	2,5	18,5	–	4	16
A	Flat sealing over O ring	–	2,5	18,5	–	4	16
B	Metallic sealing over thread	11	4	25,5	–	4	16
B	Metallic sealing over thread	11	4	25,5	–	8	16
C	Flat sealing over O ring	11	4	18	–	5,5	16
C	Flat sealing over O ring	11	4	15,5	–	7	16
B	Flat sealing over O ring	11	4	20,5	–	7	18
B	Flat sealing over O ring	13	5	20,5	–	6	18
B	Flat sealing over O ring	13	5	20,5	–	6	18
C	Flat sealing over O ring	13	6	16,5	–	7	18



Fittings, Y pieces, check valves

Type overview
Hose connector parts
Type D, E

Hose, push fit			
 			
D E 000B12C7			
Thread	Hose diameter	Ordering number	Ordering designation
G	mm		
M5×0,8	6	079567401-0000-10	ARCALUB-X.TUBEFIT-M5-SAT056W
M6×1		075676621-0000-10	ARCALUB-X.TUBEFIT-M6-SAT066W
M8×1		079567584-0000-10	ARCALUB-X.TUBEFIT-M8X1-SAT086W
M10×1		076968553-0000-10	ARCALUB-X.TUBEFIT-M10X1-SAT106W
G1/8		084465964-0000-10	ARCALUB-X.TUBEFIT-G1/8-SAT186W
G1/4		079567622-0000-10	ARCALUB-X.TUBEFIT-G1/4-SAT146W
M8×1	8	083654275-0000-10	ARCALUB-X.TUBEFIT-M8X1-SAT088W
M10×1		083654402-0000-10	ARCALUB-X.TUBEFIT-M10X1-SAT108W
G1/8		083654577-0000-10	ARCALUB-X.TUBEFIT-G1/8-SAT188W
G1/4		083654623-0000-10	ARCALUB-X.TUBEFIT-G1/4-SAT148W



000AE73A

Type	Seal	Width across flats W ₁ mm	Hexagon socket Nominal dimension W ₂ mm	Length		Thread length E mm	Hose Insertion depth mm
				L ₁ mm	L ₂ mm		
D	Flat sealing over O ring	9	–	11	20,5	4	15
D	Flat sealing over O ring	9	–	10,5	21,5	5	16
D	Metallic sealing over thread	9	–	11	21	7	16
D	Flat sealing over O ring	13	–	14	22	6	16
D	Flat sealing over O ring	13	–	14	21	5,5	16
E	Flat sealing over O ring	13	–	16	21	6,5	16
D	Flat sealing over O ring	13	–	14,5	23,5	6	18
D	Flat sealing over O ring	13	–	18,5	23,5	6	18
D	Flat sealing over O ring	13	–	14,5	23,5	5,5	18
E	Flat sealing over O ring	13	–	16,5	23,5	8	18



Hoses, hose cutters

Hoses

Figure 1
Hoses
for oil and grease lubrication



Dimensions and materials

Operating temperature = -20 °C to +80 °C Compressive strength with linear temperature dependence between +20 °C (90 bar) and +80 °C (35 bar)		
		
Diameter D1×D2 mm	Minimum bending radius R _{min} mm	Material
4×2,5	40	PA12
6×3	40	PA12
6×4	35	PA12
8×5	45	PA6.6

Type overview Hoses for grease lubrication

Suitable for drag chain use, unfilled, black			
Cross-section mm	Length L m	Ordering number	Ordering designation
4×2,5	5	093041241-0000-10	ARCALUB-X.HOSE-4×2,5-PA12-5M
	10	093041195-0000-10	ARCALUB-X.HOSE-4×2,5-PA12-10M
6×4	5	076691217-0000-10	ARCALUB-X.HOSE-PA12-5M
	10	076691497-0000-10	ARCALUB-X.HOSE-PA12-10M
	50	085842109-0000-10	ARCALUB-X.HOSE-PA12-50M
8×5	5	083788573-0000-10	ARCALUB-X.HOSE-PA66-5M
	10	083788581-0000-10	ARCALUB-X.HOSE-PA66-10M
	50	083788603-0000-10	ARCALUB-X.HOSE-PA66-50M

Note! Prefilling of the hoses by means of a lever grease gun, see page 72, is recommended. The use of standard grease containers, see table, page 73, gives savings in time and cost compared to filling with the lubricators CONCEPT2 and CONCEPT8.

Type overview
Hoses for oil lubrication

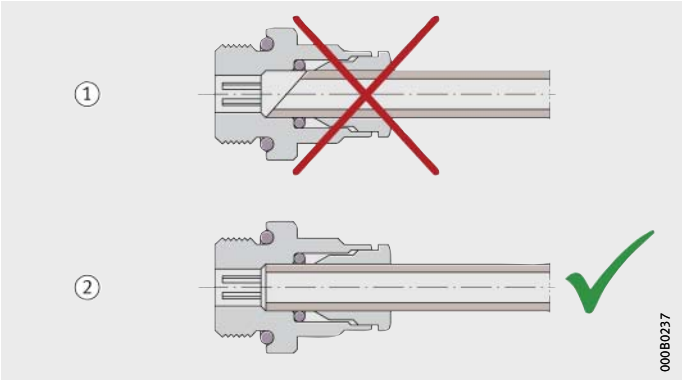
Suitable for drag chain use, unfilled, transparent			
Cross-section mm	Length L m	Ordering number	Ordering designation
6×3	5	075526336-0000-10	ARCALUB-X.HOSE-PA12-CLEAR-5M
	10	083788441-0000-10	ARCALUB-X.HOSE-PA12-CLEAR-10M
	25	075527251-0000-10	ARCALUB-X.HOSE-PA12-CLEAR-25M
	1 000	092515851-0000-10	ARCALUB-X.HOSE-PA12-CLEAR-1000M

Hose cutting tool

The use of a special hose cutter ensures secure and pressure-tight connection of the lubrication line, *Figure 2*.

Type overview
Hose cutter

		
Type	Ordering number	Ordering designation
Hose cutting tool	083788620-0000-10	ARCALUB-X.HOSE-CUTTOOL



- ① Without hose cutter
- ② With hose cutter

Figure 2
Secure connection
by means of hose cutter



Lubrication gears



Figure 1
Lubrication gear,
helical teeth with lubrication hole

Lubrication gears are used for the automatic and continuous relubrication of tooth sets.

The lubrication gear is brought into contact with the tooth set to be lubricated, normally a drive pinion or toothed rack. It transfers the lubricant to the tooth set in contact. There is no transmission of force or torque.

The use of open cell PU foam as a material for lubrication gears ensures optimum supply of lubricant to the tooth set for very long periods. The material used stores the lubricant and dispenses it again in very small metering quantities. This prevents both overlubrication and lubricant starvation.

Characteristics

- lubrication gear made from open cell PU foam
- operating temperature: $-30\text{ }^{\circ}\text{C}$ to $+150\text{ }^{\circ}\text{C}$
- maximum permissible circumferential speed at the outside diameter of the lubrication gear: 5 m/s
- segmented construction
- little installation work required
- lubricant:
 - oils
 - greases up to NLGI 2 (no solid content).

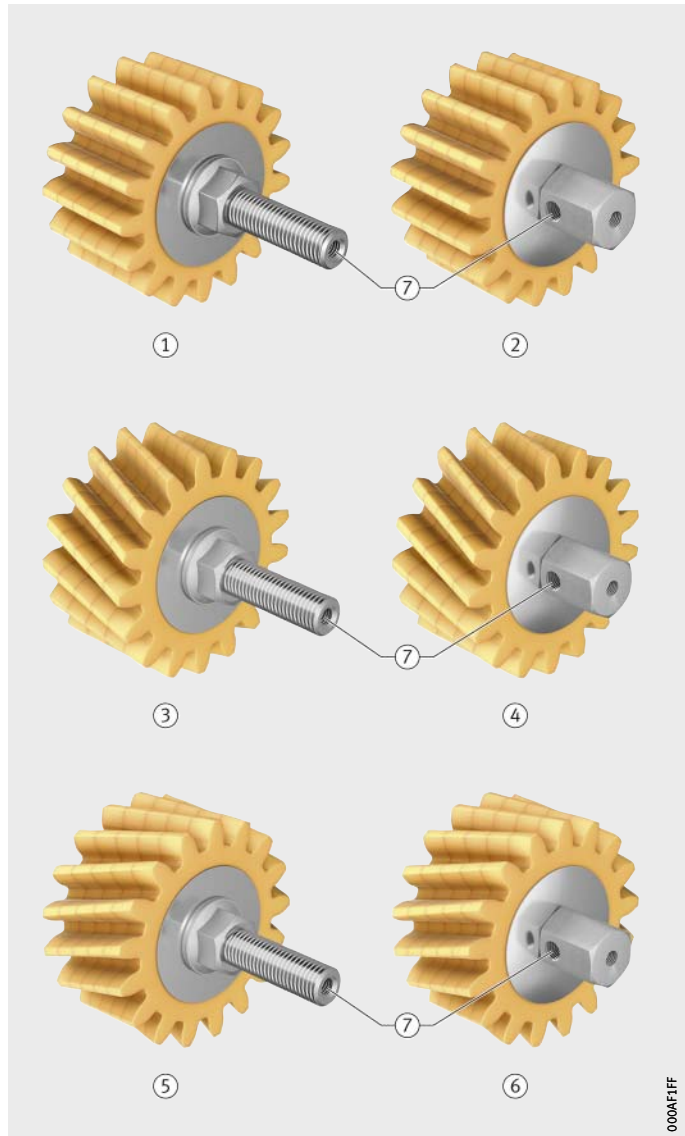
Note!

In selection, it must be decided on the basis of design perspectives whether the lubrication gear is to be arranged on the tooth set of a toothed rack or of a drive pinion.

It should preferably be mounted on a drive pinion, since lubricant distribution is better in this case than with mounting on a toothed rack.

- Straight teeth with:
- ① Axial lubricant feed
 - ② Radial lubricant feed
- Right hand helical teeth with:
- ③ Axial lubricant feed
 - ④ Radial lubricant feed
- Left hand helical teeth with:
- ⑤ Axial lubricant feed
 - ⑥ Radial lubricant feed
- ⑦ Connector for lubricant feed

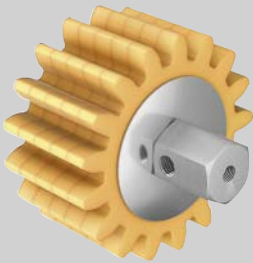
Figure 2
Designs of lubrication gears



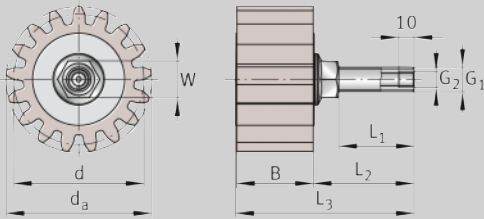
000AF1FF

Lubrication gears

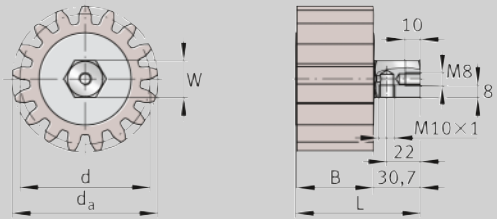
Type overview
Lubrication gears,
straight teeth

Lubricant feed, axial		Lubricant feed, radial
		
A		B
Type	Ordering number	Ordering designation
A	093283016-0000-10	ARCALUB-X.PINION-MD1,5-Z24-B15-G-G
	093283032-0000-10	ARCALUB-X.PINION-MD2,0-Z17-B20-G-G
	093283059-0000-10	ARCALUB-X.PINION-MD3,0-Z17-B30-G-G
	093283075-0000-10	ARCALUB-X.PINION-MD4,0-Z17-B40-G-G
	093283091-0000-10	ARCALUB-X.PINION-MD5,0-Z17-B50-G-G
	093283113-0000-10	ARCALUB-X.PINION-MD6,0-Z17-B60-G-G
	093283130-0000-10	ARCALUB-X.PINION-MD8,0-Z17-B80-G-G
B	093283156-0000-10	ARCALUB-X.PINION-MD10,0-Z17-B100-G-G
	093283024-0000-10	ARCALUB-X.PINION-MD1,5-Z24-B15-G-W
	093283040-0000-10	ARCALUB-X.PINION-MD2,0-Z17-B20-G-W
	093283067-0000-10	ARCALUB-X.PINION-MD3,0-Z17-B30-G-W
	093283083-0000-10	ARCALUB-X.PINION-MD4,0-Z17-B40-G-W
	093283105-0000-10	ARCALUB-X.PINION-MD5,0-Z17-B50-G-W
	093283121-0000-10	ARCALUB-X.PINION-MD6,0-Z17-B60-G-W
	093283148-0000-10	ARCALUB-X.PINION-MD8,0-Z17-B80-G-W
	093283164-0000-10	ARCALUB-X.PINION-MD10,0-Z17-B100-G-W

000B275F



A



B

000B2768

Modulus mm	Teeth Quantity	Pitch circle diameter d mm	Dimensions						Thread		Width across flats W mm	Helix angle °
			d _a mm	B mm	L mm	L ₁ mm	L ₂ mm	L ₃ mm	G ₁	G ₂		
1,5	24	36	39	15	–	34	44,7	60,4	M10	M6	15	0
2	17	34	38	20	–	32	42,5	63,2	M10	M6	15	0
3	17	51	57	30	–	30	40,5	71,2	M10	M6	15	0
4	17	68	76	40	–	30	40,5	81,2	M10	M6	15	0
5	17	85	95	50	–	49	65,7	116,4	M16	M10×1	24	0
6	17	102	114	60	–	49	75,7	126,4	M16	M10×1	24	0
8	17	136	152	80	–	49	95,7	146,4	M16	M10×1	24	0
10	17	170	190	100	–	49	115,7	166,4	M16	M10×1	24	0
1,5	24	36	39	15	46,4	–	–	–	–	–	–	0
2	17	34	38	20	51,4	–	–	–	–	–	–	0
3	17	51	57	30	61,4	–	–	–	–	–	–	0
4	17	68	76	40	71,4	–	–	–	–	–	–	0
5	17	85	95	50	81,4	–	–	–	–	–	–	0
6	17	102	114	60	91,4	–	–	–	–	–	–	0
8	17	136	152	80	111	–	–	–	–	–	–	0
10	17	170	190	100	131	–	–	–	–	–	–	0

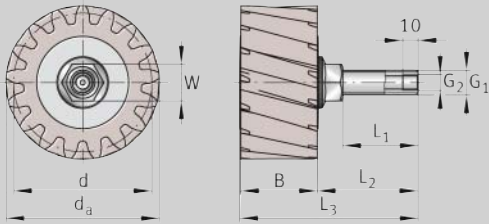


Lubrication gears

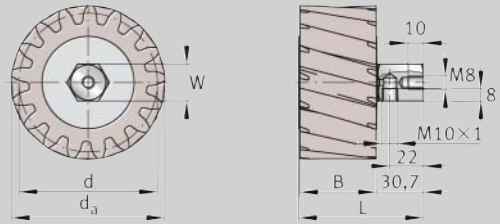
Type overview
Lubrication gears,
right hand helical teeth

Lubricant feed, axial		Lubricant feed, radial
		
A		B
Type	Ordering number	Ordering designation
A	093283172-0000-10	ARCALUB-X.PINION-MD1,5-Z24-B15-SR-G
	093283199-0000-10	ARCALUB-X.PINION-MD2,0-Z17-B20-SR-G
	093283210-0000-10	ARCALUB-X.PINION-MD3,0-Z17-B30-SR-G
	093283237-0000-10	ARCALUB-X.PINION-MD4,0-Z17-B40-SR-G
	093283253-0000-10	ARCALUB-X.PINION-MD5,0-Z17-B50-SR-G
	093283270-0000-10	ARCALUB-X.PINION-MD6,0-Z17-B60-SR-G
	093283296-0000-10	ARCALUB-X.PINION-MD8,0-Z17-B80-SR-G
B	093283318-0000-10	ARCALUB-X.PINION-MD10,0-Z17-B100-SR-G
	093283180-0000-10	ARCALUB-X.PINION-MD1,5-Z24-B15-SR-W
	093283202-0000-10	ARCALUB-X.PINION-MD2,0-Z17-B20-SR-W
	093283229-0000-10	ARCALUB-X.PINION-MD3,0-Z17-B30-SR-W
	093283245-0000-10	ARCALUB-X.PINION-MD4,0-Z17-B40-SR-W
	093283261-0000-10	ARCALUB-X.PINION-MD5,0-Z17-B50-SR-W
	093283288-0000-10	ARCALUB-X.PINION-MD6,0-Z17-B60-SR-W
	093283300-0000-10	ARCALUB-X.PINION-MD8,0-Z17-B80-SR-W
	093283326-0000-10	ARCALUB-X.PINION-MD10,0-Z17-B100-SR-W

000B2771



A



B

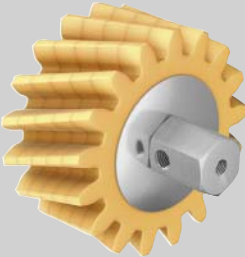
0005277A

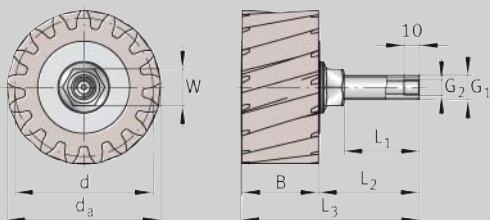
Modulus mm	Teeth Quantity	Pitch circle diameter d mm	Dimensions						Thread		Width across flats W mm	Helix angle °
			d _a mm	B mm	L mm	L ₁ mm	L ₂ mm	L ₃ mm	G ₁	G ₂		
1,5	24	38,2	41,2	15	–	34	44,7	60,4	M10	M6	15	19,53
2	17	36,08	40,1	20	–	32	42,5	63,2	M10	M6	15	19,53
3	17	54,11	60,1	30	–	30	40,5	71,2	M10	M6	15	19,53
4	17	72,15	80,2	40	–	30	40,5	81,2	M10	M6	15	19,53
5	17	90,19	100,2	50	–	49	65,7	116,4	M16	M10×1	24	19,53
6	17	108,23	120,2	60	–	49	75,7	126,4	M16	M10×1	24	19,53
8	17	144,3	160,3	80	–	49	95,7	146,4	M16	M10×1	24	19,53
10	17	180,38	200,4	100	–	49	115,7	166,4	M16	M10×1	24	19,53
1,5	24	38,2	41,2	15	46,4	–	–	–	–	–	–	19,53
2	17	36,08	40,1	20	51,4	–	–	–	–	–	–	19,53
3	17	54,11	60,1	30	61,4	–	–	–	–	–	–	19,53
4	17	72,15	80,2	40	71,4	–	–	–	–	–	–	19,53
5	17	90,19	100,2	50	81,4	–	–	–	–	–	–	19,53
6	17	108,23	120,2	60	91,4	–	–	–	–	–	–	19,53
8	17	144,3	160,3	80	111	–	–	–	–	–	–	19,53
10	17	180,38	200,4	100	131	–	–	–	–	–	–	19,53



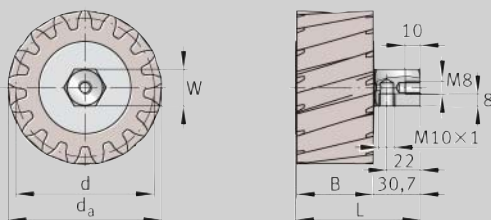
Lubrication gears

Type overview
Lubrication gears,
left hand helical teeth

Lubricant feed, axial		Lubricant feed, radial
		
A		B
Type	Ordering number	Ordering designation
A	093283334-0000-10	ARCALUB-X.PINION-MD1,5-Z24-B15-SL-G
	093283350-0000-10	ARCALUB-X.PINION-MD2,0-Z17-B20-SL-G
	093283377-0000-10	ARCALUB-X.PINION-MD3,0-Z17-B30-SL-G
	093283393-0000-10	ARCALUB-X.PINION-MD4,0-Z17-B40-SL-G
	093283415-0000-10	ARCALUB-X.PINION-MD5,0-Z17-B50-SL-G
	093283431-0000-10	ARCALUB-X.PINION-MD6,0-Z17-B60-SL-G
	093283458-0000-10	ARCALUB-X.PINION-MD8,0-Z17-B80-SL-G
B	093283474-0000-10	ARCALUB-X.PINION-MD10,0-Z17-B100-SL-G
	093283342-0000-10	ARCALUB-X.PINION-MD1,5-Z24-B15-SL-W
	093283369-0000-10	ARCALUB-X.PINION-MD2,0-Z17-B20-SL-W
	093283385-0000-10	ARCALUB-X.PINION-MD3,0-Z17-B30-SL-W
	093283407-0000-10	ARCALUB-X.PINION-MD4,0-Z17-B40-SL-W
	093283423-0000-10	ARCALUB-X.PINION-MD5,0-Z17-B50-SL-W
	093283440-0000-10	ARCALUB-X.PINION-MD6,0-Z17-B60-SL-W
	093283466-0000-10	ARCALUB-X.PINION-MD8,0-Z17-B80-SL-W
	093283482-0000-10	ARCALUB-X.PINION-MD10,0-Z17-B100-SL-W



A



B

000B278C

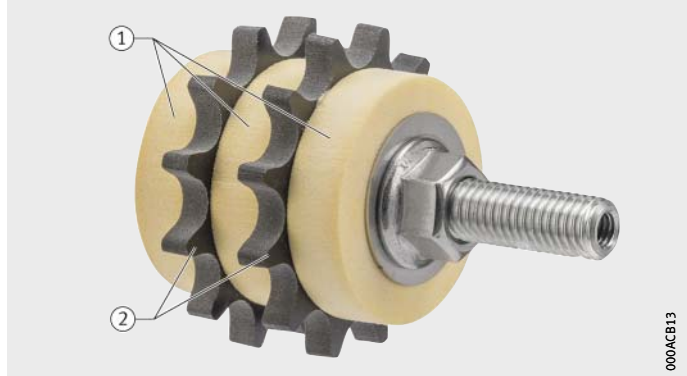
Modulus mm	Teeth Quantity	Pitch circle diameter d mm	Dimensions						Thread		Width across flats W mm	Helix angle °
			d _a mm	B mm	L mm	L ₁ mm	L ₂ mm	L ₃ mm	G ₁	G ₂		
1,5	24	38,2	41,2	15	–	34	44,7	60,4	M10	M6	15	19,53
2	17	36,08	40,1	20	–	32	42,5	63,2	M10	M6	15	19,53
3	17	54,11	60,1	30	–	30	40,5	71,2	M10	M6	15	19,53
4	17	72,15	80,2	40	–	30	40,5	81,2	M10	M6	15	19,53
5	17	90,19	100,2	50	–	49	65,7	116,4	M16	M10×1	24	19,53
6	17	108,23	120,2	60	–	49	75,7	126,4	M16	M10×1	24	19,53
8	17	144,3	160,3	80	–	49	95,7	146,4	M16	M10×1	24	19,53
10	17	180,38	200,4	100	–	49	115,7	166,4	M16	M10×1	24	19,53
1,5	24	38,2	41,2	15	46,4	–	–	–	–	–	–	19,53
2	17	36,08	40,1	20	51,4	–	–	–	–	–	–	19,53
3	17	54,11	60,1	30	61,4	–	–	–	–	–	–	19,53
4	17	72,15	80,2	40	71,4	–	–	–	–	–	–	19,53
5	17	90,19	100,2	50	81,4	–	–	–	–	–	–	19,53
6	17	108,23	120,2	60	91,4	–	–	–	–	–	–	19,53
8	17	144,3	160,3	80	111	–	–	–	–	–	–	19,53
10	17	180,38	200,4	100	131	–	–	–	–	–	–	19,53



Chain lubrication pinions

- ① Rollers made from PU foam
② Chain pinion

Figure 1
Chain lubrication pinion
in duplex design



Chain lubrication pinions are used to supply chains with chain oil according to requirements and fully automatically.

The rollers are made from open cell PU foam and transfer very small quantities of oil to the highest points on the chain links. From there, the oil reaches the spaces between the links and thus to the decisive lubrication points between the pins and sleeves. There is no coating of other surfaces of the chain with oil, which is unnecessary and even damaging.

The chain pinions, made from a special plastic, transmit the force necessary to drive the rollers. Despite the non-uniform surface of the chain links, very quiet running of the chain lubrication pinion can be achieved even at very high speeds.

The contact force of the PU rollers responsible for lubricant transfer to the chain is automatically adjusted to the optimum value since the chain rollers are always at the base of the pinion. This prevents wear of the PU rollers. There is no slippage between the PU rollers and the chain surface.

Characteristics

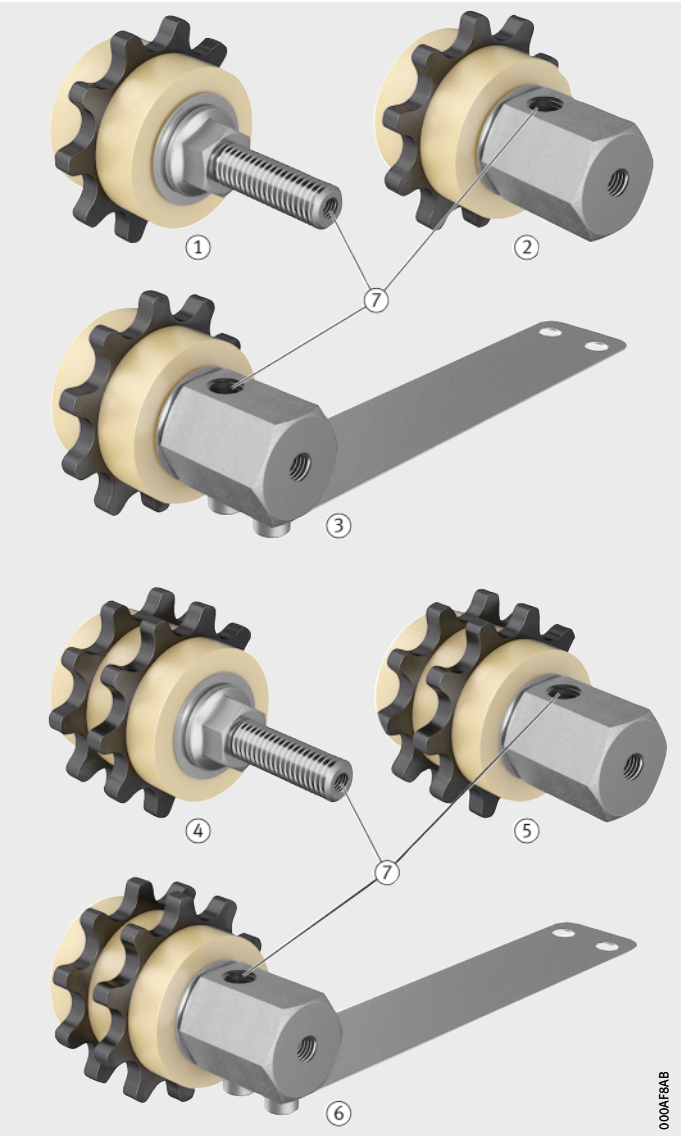
- chain pinion made from plastic
- lubricant application by means of rollers made from open cell PU foam
- operating temperature: $-30\text{ }^{\circ}\text{C}$ to $+150\text{ }^{\circ}\text{C}$
- maximum permissible circumferential speed at the outside diameter of the chain pinion: 7 m/s
- lubricant: oil.

Note!

At very high chain speeds of approx. 2,5 m/s or more, we recommend that the customer fits a cover to give protection against oil flown off by centrifugal force.

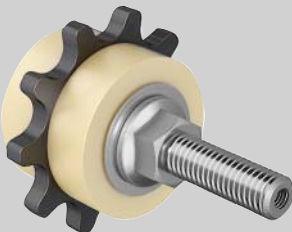
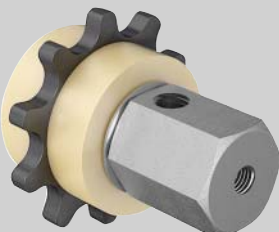
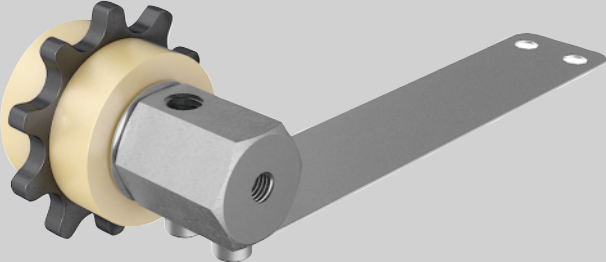
- Simplex design with:
- ① Axial lubricant feed
 - ② Radial lubricant feed
 - ③ Radial lubricant feed and spring plate
- Duplex design with:
- ④ Axial lubricant feed
 - ⑤ Radial lubricant feed
 - ⑥ Radial lubricant feed and spring plate
- ⑦ Connector for lubricant feed

Figure 2
Designs
 of chain lubrication pinions

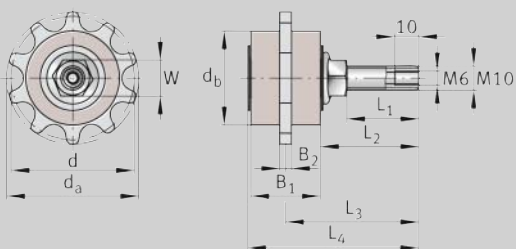


Chain lubrication pinions

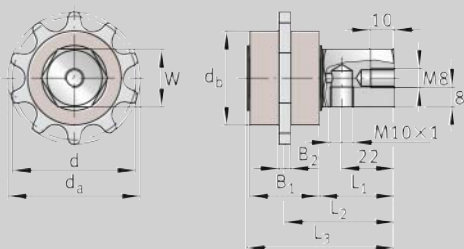
Type overview
Chain lubrication pinions
in simplex design

Lubricant feed, axial		Lubricant feed, radial
		
A		B
		000B2795
Lubricant feed, radial, with spring plate		
		
C		
000AF830		
Type	Ordering number	Ordering designation
A	093283490-0000-10	ARCALUB-X.CHAIN-PINION-08AB1-Z12-G
	093283547-0000-10	ARCALUB-X.CHAIN-PINION-10AB1-Z10-G
	093283601-0000-10	ARCALUB-X.CHAIN-PINION-12B1-Z8-G
	093283652-0000-10	ARCALUB-X.CHAIN-PINION-16B1-Z8-G
B	093283504-0000-10	ARCALUB-X.CHAIN-PINION-08AB1-Z12-W
	093283555-0000-10	ARCALUB-X.CHAIN-PINION-10AB1-Z10-W
	093283610-0000-10	ARCALUB-X.CHAIN-PINION-12B1-Z8-W
	093283660-0000-10	ARCALUB-X.CHAIN-PINION-16B1-Z8-W
C	093283512-0000-10	ARCALUB-X.CHAIN-PINION-08AB1-Z12-WF
	093283563-0000-10	ARCALUB-X.CHAIN-PINION-10AB1-Z10-WF
	093283679-0000-10	ARCALUB-X.CHAIN-PINION-16B1-Z8-WF

1) A DIN 8188 (American design, ANSI: American National Standards Institute)
B DIN 8187 (European design, British Standard).

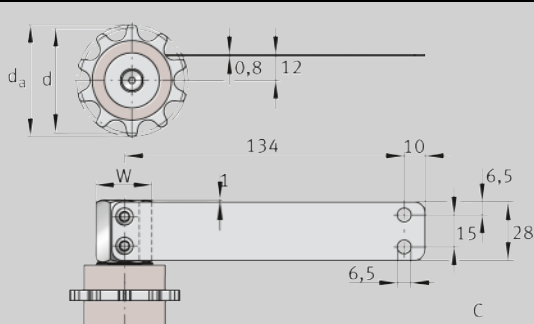


A



B

000B279E



C

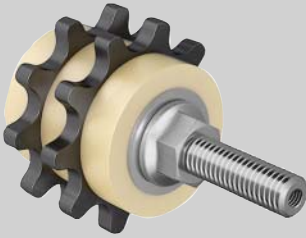
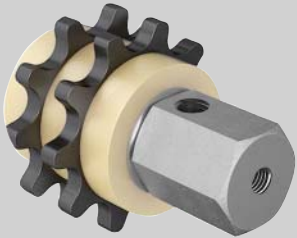
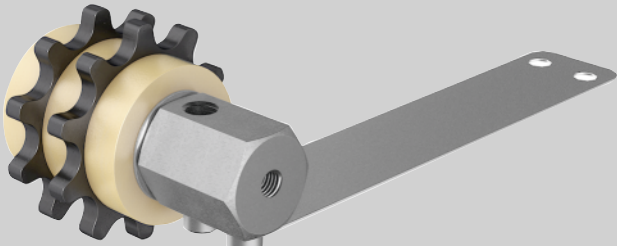
000AEAAA



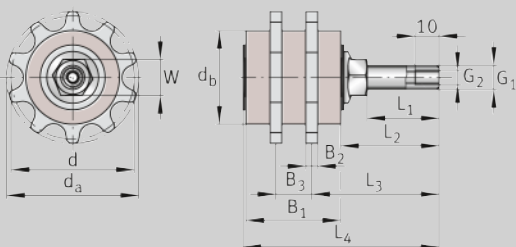
Chain type according to ISO 606 ¹⁾	Teeth Quantity	Pitch circle diameter d mm	Dimensions								Width across flats	
			da mm	db mm	B ₁ mm	B ₂ mm	L ₁ mm	L ₂ mm	L ₃ mm	L ₄ mm	W mm	
08 A/B-1	12	49,07	53	39	29	5	30	41	55,5	71,2	15	
10 A/B-1	10	51,37	55	39	29	5	30	41	55,5	71,2	15	
12 B-1	8	49,78	55	36	29	5	30	41	55,5	71,2	15	
16 B-1	8	66,37	75	48	40	10	30	40,5	40	81,2	15	
08 A/B-1	12	49,07	53	39	29	5	31,2	45,7	61,4	—	24	
10 A/B-1	10	51,37	55	39	29	5	31,2	45,7	61,4	—	24	
12 B-1	8	49,78	55	36	29	5	31,2	45,7	61,4	—	24	
16 B-1	8	66,37	75	48	40	10	30,7	50,7	71,4	—	24	
08 A/B-1	12	49,07	53	39	29	5	31,2	45,7	61,4	—	24	
10 A/B-1	10	51,37	55	39	29	5	31,2	45,7	61,4	—	24	
16 B-1	8	66,37	75	48	40	10	30,7	50,7	71,4	—	24	

Chain lubrication pinions

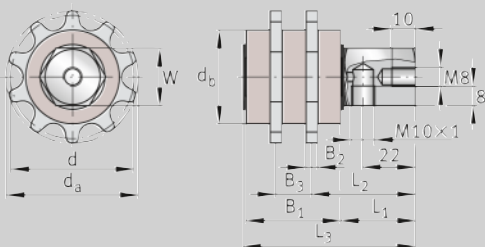
Type overview
Chain lubrication pinions
in duplex design

Lubricant feed, axial		Lubricant feed, radial
		
A		B
		000B27A7
Lubricant feed, radial, with spring plate		
		
C		
000AF85A		
Type	Ordering number	Ordering designation
A	093283520-0000-10	ARCALUB-X.CHAIN-PINION-08AB2-Z12-G
	093283571-0000-10	ARCALUB-X.CHAIN-PINION-10AB2-Z10-G
	093283628-0000-10	ARCALUB-X.CHAIN-PINION-12B2-Z8-G
	093283687-0000-10	ARCALUB-X.CHAIN-PINION-16B2-Z8-G
B	093283539-0000-10	ARCALUB-X.CHAIN-PINION-08AB2-Z12-W
	093283580-0000-10	ARCALUB-X.CHAIN-PINION-10AB2-Z10-W
	093283636-0000-10	ARCALUB-X.CHAIN-PINION-12B2-Z8-W
	093283695-0000-10	ARCALUB-X.CHAIN-PINION-16B2-Z8-W
C	093283598-0000-10	ARCALUB-X.CHAIN-PINION-10AB2-Z10-WF
	093283644-0000-10	ARCALUB-X.CHAIN-PINION-12B2-Z8-WF
	093283709-0000-10	ARCALUB-X.CHAIN-PINION-16B2-Z8-WF

1) A DIN 8188 (American design, ANSI: American National Standards Institute)
B DIN 8187 (European design, British Standard).

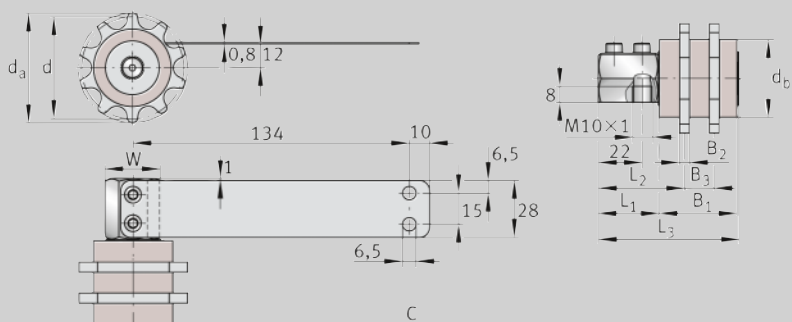


A



B

000B27B0



C

000AF35B



Chain type according to ISO 606 ¹⁾	Teeth	Pitch circle diameter	Dimensions										Thread		Width across flats
			d _a	d _b	B ₁	B ₂	B ₃	L ₁	L ₂	L ₃	L ₄	G ₁	G ₂		
	Quantity	d mm	mm	mm	mm	mm	mm	mm	mm	mm	mm	mm	mm	mm	
08 A/B-2	12	49,07	53	39	29	5	15	30	41	55,5	71,2	M10	M6	15	
10 A/B-2	10	51,37	55	39	29	5	15	30	41	55,5	71,2	M10	M6	15	
12 B-2	8	49,78	55	36	29	5	15	30	41	55,5	71,2	M10	M6	15	
16 B-2	8	66,37	75	48	40	10	30	30	40,5	40	81,2	M16	M10×1	15	
08 A/B-2	12	49,07	53	39	29	5	15	31,2	45,7	61,4	–	–	–	24	
10 A/B-2	10	51,37	55	39	29	5	15	31,2	45,7	61,4	–	–	–	24	
12 B-2	8	49,78	55	36	29	5	15	31,2	45,7	61,4	–	–	–	24	
16 B-2	8	66,37	75	48	40	10	30	30,7	50,7	71,4	–	–	–	24	
10 A/B-2	12	49,07	53	39	29	5	15	31,2	45,7	61,4	–	–	–	24	
12 B-2	10	51,37	55	39	29	5	15	31,2	45,7	61,4	–	–	–	24	
16 B-2	8	66,37	75	48	40	10	30	30,7	50,7	71,4	–	–	–	24	

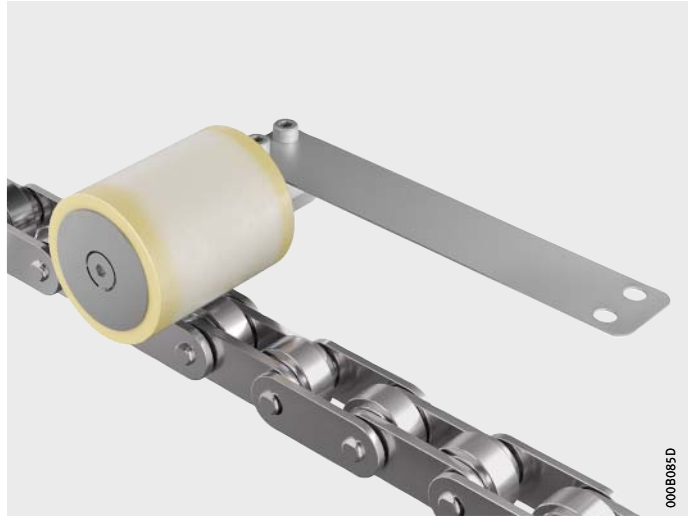
Lubrication rollers

Figure 1
Lubrication roller



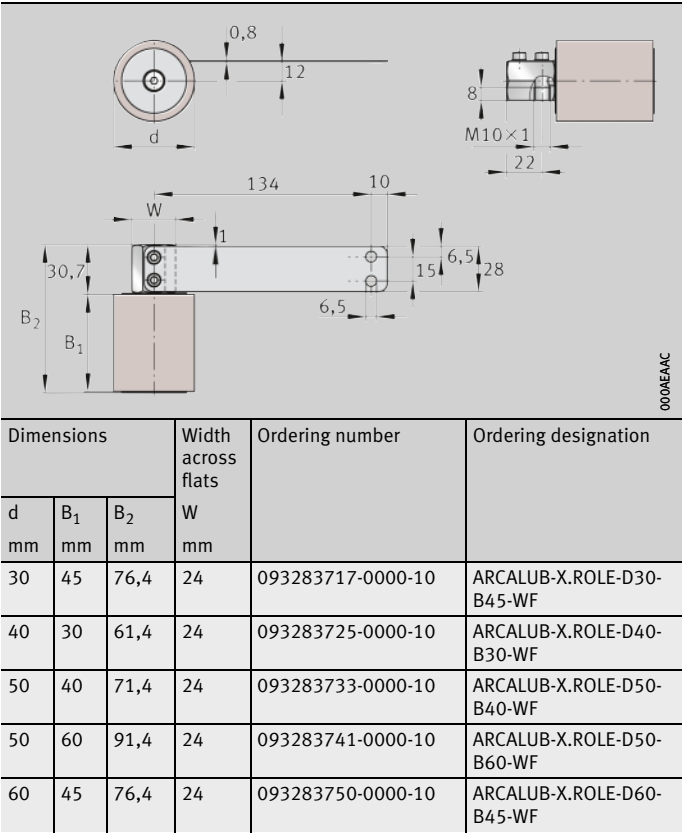
In lubrication rollers, lubricant is applied by means of rollers made from open cell PU foam. All designs are fitted with a spring plate, *Figure 1*.

Figure 2
Lubrication of a roller chain
by means of a lubrication roller



Lubrication rollers are used for the lubrication of raceways, for example on roller chains, *Figure 2*.

Type overview
Lubrication rollers



Device holders

Device holders for:

- ① CONCEPT2
- ② CONCEPT8

Figure 1
Application examples
of device holders



The device holders facilitate the mounting of the lubricators CONCEPT2 and CONCEPT8 directly on the equipment to be lubricated or in its vicinity.

Scope of delivery
Device holders for CONCEPT2

Device holder for CONCEPT2, with mounting material:

- universal locating bracket made from high grade steel
- 5 support washers in different dimensions, for locating the mounting bracket, for example by means of an eye bolt on a electric motor
- 2 socket head screws M6×50 with a retaining nut, for locating the lubricator on the universal locating bracket.

Scope of delivery
Device holders for CONCEPT8

Device holder for CONCEPT8, for the additional location of splitters and progressive distributors, with mounting material:

- mounting baseplate made from high grade steel, including all holes
- 2 brackets made from high grade steel for the fixing of lubrication lines, including hose grommets
- 2 socket head screws M8×80 with a retaining nut, for locating the lubricator on the device holder.

Type overview
Device holders

A

B

00080236

Type		Ordering number	Ordering designation
A	Device holder for CONCEPT2	092435726-0000-10	ARCALUB-C2.HOLDER-KIT
B	Device holder for CONCEPT8	093204094-0000-10	ARCALUB-C8.HOLDER-KIT





Manual lubrication tools

Lever grease gun

Drum pumps

Grease pistols

Transport aids



Manual lubrication tools

Lever grease gun 72

The lever grease gun is suitable for high lubrication pressures. The proven TWIN-LOCK system protects the lever grease gun against wear during continuous operation and prevents the risk of quasi-lubrication to machines and equipment.

Drum pumps 74

Drum pumps are suitable for use as compressed air-driven pumps for delivering large quantities of grease under high pressure over long distances.

Drum pumps can be used either as delivery pumps for individual greasing stations or as a supply pump for central lubrication systems.

When directly inserted in the original container, the drum pumps combine a high delivery rate with low air consumption.

The dust covers and follower plates give stable and centred fixing of the drum pump and optimum emptying of containers.

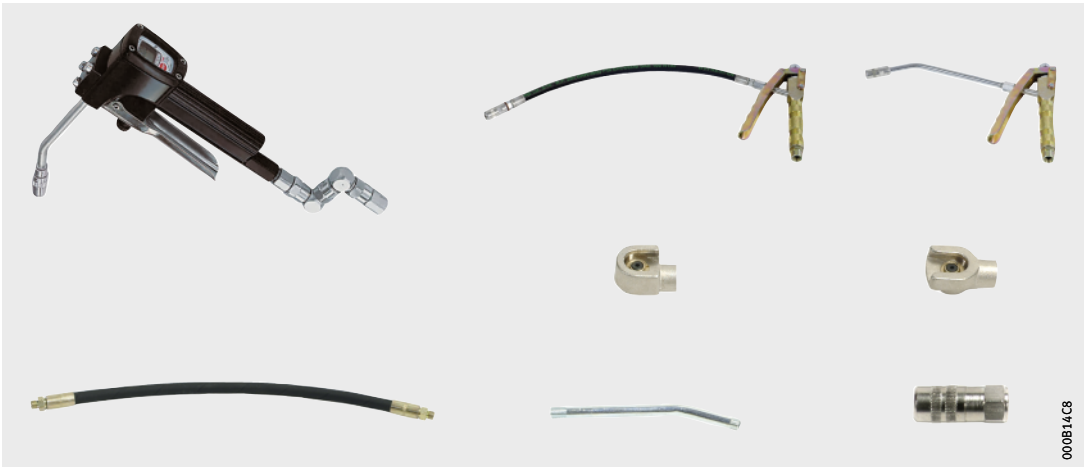
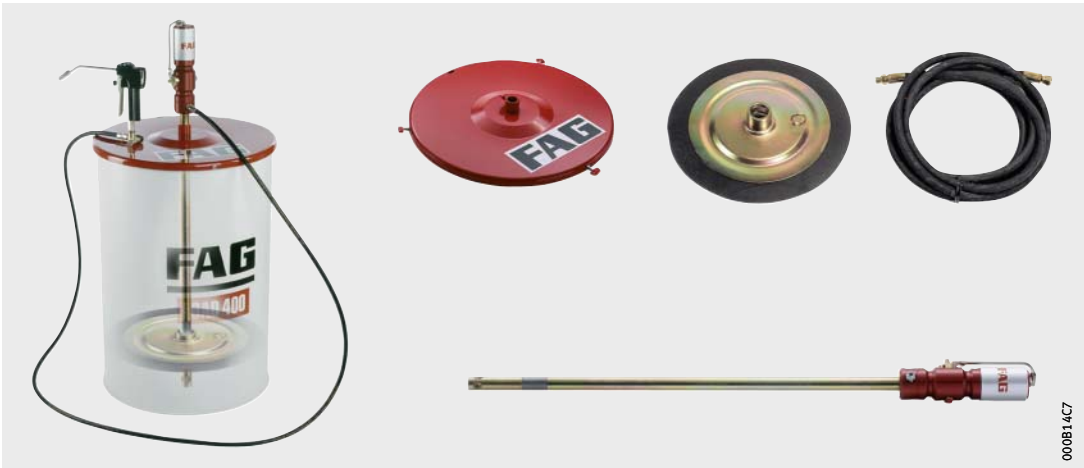
Grease pistols 78

The range of grease pistols extends from simple grease pistols to volumetric metering pistols with flow rate measurement.

In the case of rolling bearings and gearboxes, precise adherence to the specified lubricant quantity is of central importance for the operating life. In precision applications, too much or too little lubricant has been proven to cause bearing damage and the stoppage of entire production lines.

Transport aids 80

Carry grips and trolleys allow the mobile use of drum pumps at any location. Trolleys are available in different designs for different container sizes.



Lever grease gun



Figure 1
Lever grease gun
ARCA-GREASE-GUN

The lever grease gun ARCA-GREASE-GUN can be used to achieve high lubrication pressures.

The proven TWIN-LOCK system protects the piston guide of the lever grease gun against wear during continuous operation and thus prevents the risk of quasi-lubrication to machines and equipment.

The EVER-FLOW system ensures that the lever grease gun functions correctly even with highly viscous grease and very low temperatures. Due to the vacuum created during the pumping operation, even tough biological grease can be delivered easily.

Technical data

Feature		Value
Fill quantity	Grease cartridge	400 g (up to NLGI 3)
	Loose grease	500 cm ³ (up to NLGI 3)
Operating pressure		400 bar
Delivery rate		≈ 1,9 cm ³ /Hub
Pressure pipe	Material	Steel, zinc-coated
	Diameter	56 mm
	Length	296 mm
Threaded connector		G ¹ / ₈

Type overview
Lever grease gun

Type	Ordering number	Ordering designation
Lever grease gun	039064115-0000-10	ARCA-GREASE-GUN

Type overview
Hose with plug-in coupling

Hose including 4 jaw nozzle for taper type lubrication nipples to DIN 71412		
		
Type	Ordering number	Ordering designation
Hose 300 mm	039064123-0000-10	ARCA-GREASE-GUN.HOSE

Type overview
Hose with slide coupling

Hose including slide coupling, type F, for button head lubrication nipples to DIN 3404-16		
		
Type	Ordering number	Ordering designation
Hose 300 mm	039697010-0000-10	ARCA-GREASE-GUN.HOOK-ON-HOSE

Type overview
Arcanol grease cartridges

		
Type	Ordering number	Ordering designation
400-g cartridge containing		
Arcanol CLEAN-M	069429111-0000-10	ARCANOL-CLEAN-M-400G
Arcanol FOOD2	019143648-0000-10	ARCANOL-FOOD2-400G
Arcanol LOAD150	055358152-0000-10	ARCANOL-LOAD150-400G
Arcanol LOAD220	064741028-0000-10	ARCANOL-LOAD220-400G
Arcanol LOAD400	019143818-0000-11	ARCANOL-LOAD400-400G
Arcanol LOAD460	065825144-0000-10	ARCANOL-LOAD460-400G
Arcanol MULTI2	019143893-0000-11	ARCANOL-MULTI2-400G
Arcanol MULTI3	016727355-0000-11	ARCANOL-MULTI3-400G
Arcanol MULTITOP	019144016-0000-11	ARCANOL-MULTITOP-400G
Arcanol SPEED2,6	062447610-0000-10	ARCANOL-SPEED2,6-400G
Arcanol TEMP90	019144172-0000-10	ARCANOL-TEMP90-400G
Arcanol TEMP110	019144075-0000-10	ARCANOL-TEMP110-400G
Arcanol Vib3	055289568-0000-10	ARCANOL-VIB3-400G

Further information

Selection of Arcanol greases, other container sizes:
■ TPI 168, Rolling Bearing Greases Arcanol.



Drum pumps

- ① Drum pump
- ② Dust cover
- ③ Follower piston
- ④ High pressure hose
- ⑤ Metering pistol grease gun

Figure 1
Using the drum pump
ARCA-PUMP-BARREL-180-S



The drum pump ARCA-PUMP-BARREL...-S is suitable for use in hobbocks with a fill quantity of 25 kg or 50 kg as well as for drums with 180 kg.

In the workshop, it can be used for:

- the filling of rolling bearings
- the greasing of gearboxes
- all applications that must be filled repeatedly with different grease quantities.

The drum pump can be fitted either with a simple hand valve or with a metering pistol grease gun, see page 78.

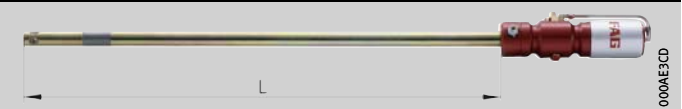
Technical data

Feature		Value
Design		Pneumatic pump
Connectors	Compressed air inlet	G ¹ / ₄ (internal thread)
	Grease outlet	G ¹ / ₄ (external thread)
Suction pipe	Diameter	30 mm
	Length	480 mm, 750 mm, 950 mm
Operating pressure (at 6 bar pneumatic supply pressure)		420 bar
Pneumatic supply pressure	min.	3,5 bar
	max.	8,5 bar
Pressure ratio		70:1
Delivery rate		1 100 cm ³ /min
Maximum air consumption		150 l/min
Maximum consistency class		NLGI 2
Grease temperature (NLGI 2)	min.	+10 °C
	max.	+40 °C
Sound pressure level		76 dB
Mass		5,46 kg, 6,37 kg, 7,1 kg



Drum pumps

Type overview
Drum pump

			
Suitable container	Length L	Ordering number	Ordering designation
kg	mm		
25	480	065139470-0000-10	ARCA-PUMP-BARREL-25-S
50	750	065139542-0000-10	ARCA-PUMP-BARREL-50-S
180	950	065139550-0000-10	ARCA-PUMP-BARREL-180-S

Type overview
Dust cover

Dust cover made from steel, powder coated			
			
Suitable container	Diameter D	Ordering number	Ordering designation
kg	mm		
25	350	065348524-0000-10	ARCA-PUMP-BARREL-25-S.LID
50	420	065349849-0000-10	ARCA-PUMP-BARREL-50-S.LID
180	600	065350863-0000-10	ARCA-PUMP-BARREL-180-S.LID

Type overview
Follower pistons

Follower pistons made from steel, zinc-coated, with rubber seal lip			
			
Suitable container kg	Diameter D mm	Ordering number	Ordering designation
25	340	065349687-0000-10	ARCA-PUMP-BARREL-25-S.FP
50	400	065350685-0000-10	ARCA-PUMP-BARREL-50-S.FP
180	590	065351592-0000-10	ARCA-PUMP-BARREL-180-S.FP

Type overview
High pressure hoses

Nominal pressure = 400 bar, burst pressure = 1 600 bar, connectors G ¹ / ₄ (1× internal thread, 1× external thread)		
		
Length L m	Ordering number	Ordering designation
2	065352270-0000-10	ARCA-PUMP-BARREL.HOSE-2M
3	065352432-0000-10	ARCA-PUMP-BARREL.HOSE-3M
5	065352866-0000-10	ARCA-PUMP-BARREL.HOSE-5M
10	065353153-0000-10	ARCA-PUMP-BARREL.HOSE-10M



Grease pistols

Type overview
Metering pistol grease gun
with digital flow rate measurement

Z type swivel joint G ¹ / ₄ , nozzle tube of length = 150 mm, 4 jaw nozzle		
		
000AE439		
Type	Ordering number	Ordering designation
Metering pistol grease gun	065353269-0000-10	ARCA-PUMP-BARREL.GUN-METER

Technical data
Metering pistol grease gun

Feature	Value
Operating pressure	≤ 550 bar
Delivery rate	≤ 2,5 kg/min
Counting accuracy	± 3%

The metering pistol grease gun with digital flow rate measurement allows precise grease feed into bearing positions and gearboxes. The counter displays the grease quantity with an accuracy of 0,1 g and up to a maximum of 999 g per measurement operation. The grease quantity is measured by volume. Before starting volume application, metering pistol grease guns must be set once with the aid of a precision balance.

Type overview
Grease pistols
without flow rate measurement

Axial swivel joint G ¹ / ₄ , 4 jaw nozzle			
			
A B 000AE549			
Type	Hose length mm	Ordering number	Ordering designation
A	400	065353617-0000-10	ARCA-PUMP-BARREL.GUN-H
B	150	065353323-0000-10	ARCA-PUMP-BARREL.GUN-P

Type overview
Accessories for grease pistols

Suitable for all grease pistols		
Type	Ordering number	Ordering designation
C Hose	077464478-0000-10	ARCA-PUMP-BARREL-S.GUN-HOSE
D Nozzle tube	077464648-0000-10	ARCA-PUMP-BARREL-S.GUN-PIPE
E 4 jaw nozzle	077465130-0000-10	ARCA-PUMP-BARREL-S.FIT-4-JAWS
F Slide coupling	077590465-0000-10	ARCA-PUMP-BARREL-S.FIT-HEX16
G Slide coupling	077590600-0000-10	ARCA-PUMP-BARREL-S.FIT-HEX16P

Technical data
Accessories for grease pistols
Type C, D, E

Feature	Type		
	C Hose	D Nozzle tube	E 4 jaw nozzle
Thread	Both sides M10×1, external thread	Both sides M10×1, external thread	M10×1, Internal thread
Length	400 mm	150 mm	–
Suitable lubrication nipple	–	–	Taper type lubrication nipple

Technical data
Accessories for grease pistols
Type F, G

Feature	Type	
	F Slide coupling	G Slide coupling
Design	for pulling	for insertion
Thread	M10×1, Internal thread	M10×1, Internal thread
Suitable lubrication nipple	Button head lubrication nipple, head diameter = 16 mm	Button head lubrication nipple, head diameter = 16 mm



Transport aids

Type overview Transport aids



Type		Ordering number	Ordering designation
A	Carry grip for drum pumps	065353803-0000-10	ARCA-PUMP-BARREL-S.HANDLE
B	Trolley for containers	077464036-0000-10	ARCA-PUMP-BARREL-25-S.TROLLEY
C	Trolley for drums	074444239-0000-10	ARCA-PUMP-BARREL-50-S.TROLLEY

Technical data Transport aids

Feature	Transport aid		
	Type		
	A	B	C
Transport of	Drum pumps	Containers ¹⁾	Drums ²⁾
Material	Steel, zinc-coated	Steel, powder coated	Steel, powder coated
Dimensions mm	430×190×65	480×500-680×980	545×640×910
Mass kg	0,6	5,9	13,7
Rollers	–	2 pieces, Ø = 150 mm	2 pieces, Ø = 150 mm
Swivel castors	–	–	2 pieces, Ø = 60 mm

¹⁾ Suitable for containers with a mass of 20 kg to 60 kg.
²⁾ Suitable for drums with a diameter up to 410 mm and a mass of 50 kg to 60 kg.



Online and print media

medias

Brochures
User manuals
Presentations
Reference sheets



Online and print media

Overview

medias

medias, the proven selection and information system, presents the INA and FAG catalogue products in electronic format.

At present, Schaeffler is developing an electronic selection wizard for lubricators which will be integrated in **medias**. This will give the customer comprehensive assistance in the configuration of a lubrication system. At the time of issue of this publication, the electronic selection wizard has not yet been completed.

medias: <http://medias.schaeffler.de>

Brochures

Brochures on lubricators and lubrication systems:

- **FCE**,
Rolling Bearing Lubrication Made Easy
- **OFC**,
FAG CONCEPT2 – Two in One
- **WL 80382**,
Compact Small Lubrication System for Grease and Oil
- **FBS**,
Systematic Lubrication

Download at: www.medien.schaeffler.de

Please enter the **short designation** as a search term.

User manuals

User manuals for lubricators and lubrication systems:

- **BA 36**,
Lubrication System FAG CONCEPT8
- **BA 37**,
Lubrication System FAG CONCEPT8-OIL
- **BA 39**,
Lubricators FAG CONCEPT2-1P and FAG CONCEPT2-2P
- **BA 40**,
Lubricators FAG CONCEPT2-1P-24VDC and FAG CONCEPT2-2P-24VDC

Download at: www.medien.schaeffler.de

Please enter the **short designation** as a search term.

Presentations

Presentations on lubricators and lubrication systems:

- FAG CONCEPT2 – Two in One
- FAG CONCEPT8

The presentations can be obtained by agreement.

Reference sheets

Reference sheets for lubricators and lubrication systems:

- **GTS 0113**,
FAG CONCEPT8 Provides Constant Lubrication
- **GTS 0115**,
Effective Lubrication Makes all the Difference
- **GTS 0116**,
Automatic Lubrication of a Large-Size Fan

Download at: www.medien.schaeffler.de

Please enter the **short designation** as a search term.

Filter

2 Auswahl Schmierstoffe

25 Schmierstofftypen ☒ Online ☐ Offline

Schmierstoff

Schmierstoffmenge

Regelung der Schmierstoffe

Produkte

CONCEPT2

Das von zwei getriebenen Ventilen & zwei Ventilen gesteuerte und selbstständig funktionierende System ist für alle Schmierstoffe geeignet, die in der Schmierstoffindustrie, in der Industrie und in der Landwirtschaft eingesetzt werden.

Öl

+

Flüssigkeit

+

Flüssigkeit

+

Flüssigkeit

+

Flüssigkeit

+

Flüssigkeit

+

000803D

Rolling Bearing Lubrication Made Easy
FAG Concept2 Oil

FAG Concept2
Two in one

COMPACT SMALL LUBRICATION SYSTEM FOR GREASE AND OIL

Schwaben mit System
Bestimmte Lösungen für Ihre Anlagentechnik

0008578D

Lubrication System FAG Concept2 OIL
Best manual

Lubrication System FAG Concept2
Best manual

Lubrication System FAG Concept2 1P-24VDC and FAG Concept2 1P-24VDC
Best manual

Lubrication System FAG Concept2 1P and FAG Concept2 1P
Best manual

0008579F

FAG Concept2
Two in one

FAG Concepts

000857A8

Schaeffler Global Technology Solutions

Schaeffler Global Technology Solutions

Schaeffler Global Technology Solutions

000857B1

Schaeffler Technologies

TPI 252 | 83

Article list

Automatic lubricators		
Ordering designation	Ordering number	Page
CONCEPT2		
ARCALUB-C2-2P	086872931-0000-10	16
ARCALUB-C2-2P-24VDC	086873105-0000-10	16
ARCALUB-C2-2P-OIL-24VDC	092246265-0000-10	16
CONCEPT8		
ARCALUB-C8-2P	082249156-0000-10	20
ARCALUB-C8-4P	082266646-0000-10	20
ARCALUB-C8-2P-OIL	083786910-0000-10	20
ARCALUB-C8-4P-OIL	083787062-0000-10	20
Demo case		
DEMO-ARCALUB-C2-SET	089395433-0000-10	23
DEMO-ARCALUB-C8-SET	084224878-0000-10	23
Complete packages		
ARCALUB-C2-2P-EKIT	092662269-0000-10	24
ARCALUB-C2-2P-24VDC-EKIT	092662277-0000-10	24
Accessories for automatic lubricators		
Ordering designation	Ordering number	Page
Voltage supply		
ARCALUB-C2.BATTERY	087314762-0000-10	28
ARCALUB-X.CABLE-M12-10M	075378361-0000-10	28
ARCALUB-X.CABLE-M12X1-5M-LED-S	083788964-0000-10	28
ARCALUB-X.CABLE-M12X1-10M-LED-S	083788980-0000-10	28
ARCALUB-X.CABLE-M12-5M-LED	075592240-0000-10	28
ARCALUB-X.CABLE-M12-10M-LED	077879805-0000-10	28
ARCALUB-X.POWER-SUPPLY-UNIT	083872507-0000-10	29
Grease cartridges		
ARCALUB-C2.LC250-CLEAN-M	087334194-0000-10	30
ARCALUB-C2.LC250-FOOD2	087334020-0000-10	30
ARCALUB-C2.LC250-LOAD150	087329077-0000-10	30
ARCALUB-C2.LC250-LOAD220	087329115-0000-10	30
ARCALUB-C2.LC250-LOAD400	087329131-0000-10	30
ARCALUB-C2.LC250-LOAD460	087329140-0000-10	30
ARCALUB-C2.LC250-LOAD1000	087329280-0000-10	30
ARCALUB-C2.LC250-MULTI2	087328038-0000-10	30
ARCALUB-C2.LC250-MULTITOP	087328810-0000-10	30
ARCALUB-C2.LC250-MOTION2	087334216-0000-10	30
ARCALUB-C2.LC250-SPEED2,6	087334046-0000-10	30
ARCALUB-C2.LC250-TEMP90	087329816-0000-10	30
ARCALUB-C2.LC250-TEMP110	087329840-0000-10	30
ARCALUB-C2.LC250-TEMP120	087329980-0000-10	30
ARCALUB-C2.LC250-TEMP200	087329999-0000-10	30

Accessories for automatic lubricators		
Ordering designation	Ordering number	Page
Grease cartridges		
ARCALUB-C8.LC800-CLEAN-M	083549129-0000-10	31
ARCALUB-C8.LC800-FOOD2	083549064-0000-10	31
ARCALUB-C8.LC800-LOAD150	083532439-0000-10	31
ARCALUB-C8.LC800-LOAD220	083533583-0000-10	31
ARCALUB-C8.LC800-LOAD400	083533761-0000-10	31
ARCALUB-C8.LC800-LOAD460	083533818-0000-10	31
ARCALUB-C8.LC800-LOAD1000	083548343-0000-10	31
ARCALUB-C8.LC800-MULTI2	083532412-0000-10	31
ARCALUB-C8.LC800-MULTI3	083548289-0000-10	31
ARCALUB-C8.LC800-MULTITOP	082631492-0000-10	31
ARCALUB-C8.LC800-SPEED2,6	083548629-0000-10	31
ARCALUB-C8.LC800-TEMP90	083533630-0000-10	31
ARCALUB-C8.LC800-TEMP110	083548580-0000-10	31
ARCALUB-C8.LC800-TEMP120	083548599-0000-10	31
ARCALUB-C8.LC800-TEMP200	083548602-0000-10	31
ARCALUB-C8.LC800-VIB3	083549099-0000-10	31
KFIS.ARCALUB-C2.LC250-CF-REFERENZ	093411448-0000	32
KFIS.ARCALUB-C8.LC800-CF-REFERENZ	093411561-0000	32
Splitters, progressive distributors		
ARCALUB-X.SPLITTER-2X-STRAIGHT-GREASE	081307497-0000-10	37
ARCALUB-X.SPLITTER-2X-STRAIGHT-OIL	074969218-0000-10	37
ARCALUB-X.PROGDIV-3X-RIGHT-0.05CCM	093204060-0000-10	39
Fittings, Y pieces, check valves		
ARCALUB-X.CONNECT-6-4	093040717-0000-10	42
ARCALUB-X.CONNECT-6-6	083867112-0000-10	42
ARCALUB-X.CONNECT-8-6	083867279-0000-10	42
ARCALUB-X.CONNECT-8-8	083867309-0000-10	42
ARCALUB-X.CONNECT-6-6-W	088902250-0000-10	42
ARCALUB-X.TUBEFIT-Y-D6	076693180-0000-10	43
ARCALUB-X.TUBEFIT-Y-D8	083654640-0000-10	43
ARCALUB-X.OIL-VALVE-SAT106G	092927122-0000-10	43
ARCALUB-X.TUBEFIT-M3-SAT034G-S	093041390-0000-10	44
ARCALUB-X.TUBEFIT-M5-SAT056G	077937490-0000-10	44
ARCALUB-X.TUBEFIT-M6-SAT066G	075527472-0000-10	44
ARCALUB-X.TUBEFIT-M8X1-SAT086G	079567428-0000-10	44
ARCALUB-X.TUBEFIT-M10X1-SAT106G	075527626-0000-10	44
ARCALUB-X.TUBEFIT-G1/8-SAT186G	084465905-0000-10	44
ARCALUB-X.TUBEFIT-G1/4-SAT146G	079567606-0000-10	44
ARCALUB-X.TUBEFIT-M8X1-SAT088G	083654216-0000-10	44
ARCALUB-X.TUBEFIT-M10X1-SAT108G	083654356-0000-10	44
ARCALUB-X.TUBEFIT-G1/8-SAT188G	083654534-0000-10	44
ARCALUB-X.TUBEFIT-G1/4-SAT148G	083654607-0000-10	44
ARCALUB-X.TUBEFIT-M5-SAT056W	079567401-0000-10	46
ARCALUB-X.TUBEFIT-M6-SAT066W	075676621-0000-10	46



Article list

Accessories for automatic lubricators		
Ordering designation	Ordering number	Page
Fittings, Y pieces, check valves		
ARCALUB-X.TUBEFIT-M8X1-SAT086W	079567584-0000-10	46
ARCALUB-X.TUBEFIT-M10X1-SAT106W	076968553-0000-10	46
ARCALUB-X.TUBEFIT-G1/8-SAT186W	084465964-0000-10	46
ARCALUB-X.TUBEFIT-G1/4-SAT146W	079567622-0000-10	46
ARCALUB-X.TUBEFIT-M8X1-SAT088W	083654275-0000-10	46
ARCALUB-X.TUBEFIT-M10X1-SAT108W	083654402-0000-10	46
ARCALUB-X.TUBEFIT-G1/8-SAT188W	083654577-0000-10	46
ARCALUB-X.TUBEFIT-G1/4-SAT148W	083654623-0000-10	46
Hoses, hose cutters		
ARCALUB-X.HOSE-4×2,5-PA12-5M	093041241-0000-10	48
ARCALUB-X.HOSE-4×2,5-PA12-10M	093041195-0000-10	48
ARCALUB-X.HOSE-PA12-5M	076691217-0000-10	48
ARCALUB-X.HOSE-PA12-10M	076691497-0000-10	48
ARCALUB-X.HOSE-PA12-50M	085842109-0000-10	48
ARCALUB-X.HOSE-PA66-5M	083788573-0000-10	48
ARCALUB-X.HOSE-PA66-10M	083788581-0000-10	48
ARCALUB-X.HOSE-PA66-50M	083788603-0000-10	48
ARCALUB-X.HOSE-PA12-CLEAR-5M	075526336-0000-10	49
ARCALUB-X.HOSE-PA12-CLEAR-10M	083788441-0000-10	49
ARCALUB-X.HOSE-PA12-CLEAR-25M	075527251-0000-10	49
ARCALUB-X.HOSE-PA12-CLEAR-1000M	092515851-0000-10	49
ARCALUB-X.HOSE-CUTTOOL	083788620-0000-10	49
Lubrication gears		
ARCALUB-X.PINION-MD1,5-Z24-B15-G-G	093283016-0000-10	52
ARCALUB-X.PINION-MD2,0-Z17-B20-G-G	093283032-0000-10	52
ARCALUB-X.PINION-MD3,0-Z17-B30-G-G	093283059-0000-10	52
ARCALUB-X.PINION-MD4,0-Z17-B40-G-G	093283075-0000-10	52
ARCALUB-X.PINION-MD5,0-Z17-B50-G-G	093283091-0000-10	52
ARCALUB-X.PINION-MD6,0-Z17-B60-G-G	093283113-0000-10	52
ARCALUB-X.PINION-MD8,0-Z17-B80-G-G	093283130-0000-10	52
ARCALUB-X.PINION-MD10,0-Z17-B100-G-G	093283156-0000-10	52
ARCALUB-X.PINION-MD1,5-Z24-B15-G-W	093283024-0000-10	52
ARCALUB-X.PINION-MD2,0-Z17-B20-G-W	093283040-0000-10	52
ARCALUB-X.PINION-MD3,0-Z17-B30-G-W	093283067-0000-10	52
ARCALUB-X.PINION-MD4,0-Z17-B40-G-W	093283083-0000-10	52
ARCALUB-X.PINION-MD5,0-Z17-B50-G-W	093283105-0000-10	52
ARCALUB-X.PINION-MD6,0-Z17-B60-G-W	093283121-0000-10	52
ARCALUB-X.PINION-MD8,0-Z17-B80-G-W	093283148-0000-10	52
ARCALUB-X.PINION-MD10,0-Z17-B100-G-W	093283164-0000-10	52
ARCALUB-X.PINION-MD1,5-Z24-B15-SR-G	093283172-0000-10	54
ARCALUB-X.PINION-MD2,0-Z17-B20-SR-G	093283199-0000-10	54
ARCALUB-X.PINION-MD3,0-Z17-B30-SR-G	093283210-0000-10	54
ARCALUB-X.PINION-MD4,0-Z17-B40-SR-G	093283237-0000-10	54
ARCALUB-X.PINION-MD5,0-Z17-B50-SR-G	093283253-0000-10	54
ARCALUB-X.PINION-MD6,0-Z17-B60-SR-G	093283270-0000-10	54

Accessories for automatic lubricators		
Ordering designation	Ordering number	Page
Lubrication gears		
ARCALUB-X.PINION-MD8,0-Z17-B80-SR-G	093283296-0000-10	54
ARCALUB-X.PINION-MD10,0-Z17-B100-SR-G	093283318-0000-10	54
ARCALUB-X.PINION-MD1,5-Z24-B15-SR-W	093283180-0000-10	54
ARCALUB-X.PINION-MD2,0-Z17-B20-SR-W	093283202-0000-10	54
ARCALUB-X.PINION-MD3,0-Z17-B30-SR-W	093283229-0000-10	54
ARCALUB-X.PINION-MD4,0-Z17-B40-SR-W	093283245-0000-10	54
ARCALUB-X.PINION-MD5,0-Z17-B50-SR-W	093283261-0000-10	54
ARCALUB-X.PINION-MD6,0-Z17-B60-SR-W	093283288-0000-10	54
ARCALUB-X.PINION-MD8,0-Z17-B80-SR-W	093283300-0000-10	54
ARCALUB-X.PINION-MD10,0-Z17-B100-SR-W	093283326-0000-10	54
ARCALUB-X.PINION-MD1,5-Z24-B15-SL-G	093283334-0000-10	56
ARCALUB-X.PINION-MD2,0-Z17-B20-SL-G	093283350-0000-10	56
ARCALUB-X.PINION-MD3,0-Z17-B30-SL-G	093283377-0000-10	56
ARCALUB-X.PINION-MD4,0-Z17-B40-SL-G	093283393-0000-10	56
ARCALUB-X.PINION-MD5,0-Z17-B50-SL-G	093283415-0000-10	56
ARCALUB-X.PINION-MD6,0-Z17-B60-SL-G	093283431-0000-10	56
ARCALUB-X.PINION-MD8,0-Z17-B80-SL-G	093283458-0000-10	56
ARCALUB-X.PINION-MD10,0-Z17-B100-SL-G	093283474-0000-10	56
ARCALUB-X.PINION-MD1,5-Z24-B15-SL-W	093283342-0000-10	56
ARCALUB-X.PINION-MD2,0-Z17-B20-SL-W	093283369-0000-10	56
ARCALUB-X.PINION-MD3,0-Z17-B30-SL-W	093283385-0000-10	56
ARCALUB-X.PINION-MD4,0-Z17-B40-SL-W	093283407-0000-10	56
ARCALUB-X.PINION-MD5,0-Z17-B50-SL-W	093283423-0000-10	56
ARCALUB-X.PINION-MD6,0-Z17-B60-SL-W	093283440-0000-10	56
ARCALUB-X.PINION-MD8,0-Z17-B80-SL-W	093283466-0000-10	56
ARCALUB-X.PINION-MD10,0-Z17-B100-SL-W	093283482-0000-10	56
Chain lubrication pinion		
ARCALUB-X.CHAIN-PINION-08AB1-Z12-G	093283490-0000-10	60
ARCALUB-X.CHAIN-PINION-10AB1-Z10-G	093283547-0000-10	60
ARCALUB-X.CHAIN-PINION-12B1-Z8-G	093283601-0000-10	60
ARCALUB-X.CHAIN-PINION-16B1-Z8-G	093283652-0000-10	60
ARCALUB-X.CHAIN-PINION-08AB1-Z12-W	093283504-0000-10	60
ARCALUB-X.CHAIN-PINION-10AB1-Z10-W	093283555-0000-10	60
ARCALUB-X.CHAIN-PINION-12B1-Z8-W	093283610-0000-10	60
ARCALUB-X.CHAIN-PINION-16B1-Z8-W	093283660-0000-10	60
ARCALUB-X.CHAIN-PINION-08AB1-Z12-WF	093283512-0000-10	60
ARCALUB-X.CHAIN-PINION-10AB1-Z10-WF	093283563-0000-10	60
ARCALUB-X.CHAIN-PINION-16B1-Z8-WF	093283679-0000-10	60
ARCALUB-X.CHAIN-PINION-08AB2-Z12-G	093283520-0000-10	62
ARCALUB-X.CHAIN-PINION-10AB2-Z10-G	093283571-0000-10	62
ARCALUB-X.CHAIN-PINION-12B2-Z8-G	093283628-0000-10	62
ARCALUB-X.CHAIN-PINION-16B2-Z8-G	093283687-0000-10	62
ARCALUB-X.CHAIN-PINION-08AB2-Z12-W	093283539-0000-10	62
ARCALUB-X.CHAIN-PINION-10AB2-Z10-W	093283580-0000-10	62



Article list

Accessories for automatic lubricators		
Ordering designation	Ordering number	Page
Chain lubrication pinion		
ARCALUB-X.CHAIN-PINION-12B2-Z8-W	093283636-0000-10	62
ARCALUB-X.CHAIN-PINION-16B2-Z8-W	093283695-0000-10	62
ARCALUB-X.CHAIN-PINION-10AB2-Z10-WF	093283598-0000-10	62
ARCALUB-X.CHAIN-PINION-12B2-Z8-WF	093283644-0000-10	62
ARCALUB-X.CHAIN-PINION-16B2-Z8-WF	093283709-0000-10	62
Lubrication rollers		
ARCALUB-X.ROLE-D30-B45-WF	093283717-0000-10	65
ARCALUB-X.ROLE-D40-B30-WF	093283725-0000-10	65
ARCALUB-X.ROLE-D50-B40-WF	093283733-0000-10	65
ARCALUB-X.ROLE-D50-B60-WF	093283741-0000-10	65
ARCALUB-X.ROLE-D60-B45-WF	093283750-0000-10	65
Device holders		
ARCALUB-C2.HOLDER-KIT	092435726-0000-10	67
ARCALUB-C8.HOLDER-KIT	093204094-0000-10	67
Manual lubrication tools		
Ordering designation	Ordering number	Page
Lever grease gun		
ARCA-GREASE-GUN	039064115-0000-10	72
ARCA-GREASE-GUN.HOSE	039064123-0000-10	73
ARCA-GREASE-GUN.HOOK-ON-HOSE	039697010-0000-10	73
Arcanol grease cartridges		
ARCANOL-CLEAN-M-400G	069429111-0000-10	73
ARCANOL-FOOD2-400G	019143648-0000-10	73
ARCANOL-LOAD150-400G	055358152-0000-10	73
ARCANOL-LOAD220-400G	064741028-0000-10	73
ARCANOL-LOAD400-400G	019143818-0000-11	73
ARCANOL-LOAD460-400G	065825144-0000-10	73
ARCANOL-MULTI2-400G	019143893-0000-11	73
ARCANOL-MULTI3-400G	016727355-0000-11	73
ARCANOL-MULTITOP-400G	019144016-0000-11	73
ARCANOL-SPEED2,6-400G	062447610-0000-10	73
ARCANOL-TEMP90-400G	019144172-0000-10	73
ARCANOL-TEMP110-400G	019144075-0000-10	73
ARCANOL-VIB3-400G	055289568-0000-10	73
Drum pumps		
ARCA-PUMP-BARREL-25-S	065139470-0000-10	76
ARCA-PUMP-BARREL-50-S	065139542-0000-10	76
ARCA-PUMP-BARREL-180-S	065139550-0000-10	76
ARCA-PUMP-BARREL-25-S.LID	065348524-0000-10	76
ARCA-PUMP-BARREL-50-S.LID	065349849-0000-10	76
ARCA-PUMP-BARREL-180-S.LID	065350863-0000-10	76
ARCA-PUMP-BARREL-25-S.FP	065349687-0000-10	77
ARCA-PUMP-BARREL-50-S.FP	065350685-0000-10	77
ARCA-PUMP-BARREL-180-S.FP	065351592-0000-10	77

Manual lubrication tools		
Ordering designation	Ordering number	Page
Drum pumps		
ARCA-PUMP-BARREL.HOSE-2M	065352270-0000-10	77
ARCA-PUMP-BARREL.HOSE-3M	065352432-0000-10	77
ARCA-PUMP-BARREL.HOSE-5M	065352866-0000-10	77
ARCA-PUMP-BARREL.HOSE-10M	065353153-0000-10	77
Grease pistols		
ARCA-PUMP-BARREL.GUN-METER	065353269-0000-10	78
ARCA-PUMP-BARREL.GUN-H	065353617-0000-10	78
ARCA-PUMP-BARREL.GUN-P	065353323-0000-10	78
ARCA-PUMP-BARREL-S.GUN-HOSE	077464478-0000-10	79
ARCA-PUMP-BARREL-S.GUN-PIPE	077464648-0000-10	79
ARCA-PUMP-BARREL-S.FIT-4-JAWS	077465130-0000-10	79
ARCA-PUMP-BARREL-S.FIT-HEX16	0775904650000-10	79
ARCA-PUMP-BARREL-S.FIT-HEX16P	077590600-0000-10	79
Transport aids		
ARCA-PUMP-BARREL-S.HANDLE	065353803-0000-10	80
ARCA-PUMP-BARREL-25-S.TROLLEY	077464036-0000-10	80
ARCA-PUMP-BARREL-50-S.TROLLEY	074444239-0000-10	80



Customer-specific lubrication gears and chain lubrication pinions

Data required for design

Gear, toothed rack

Modulus M

Number of teeth (gear only)

Tooth set width

mm

Tooth set angle

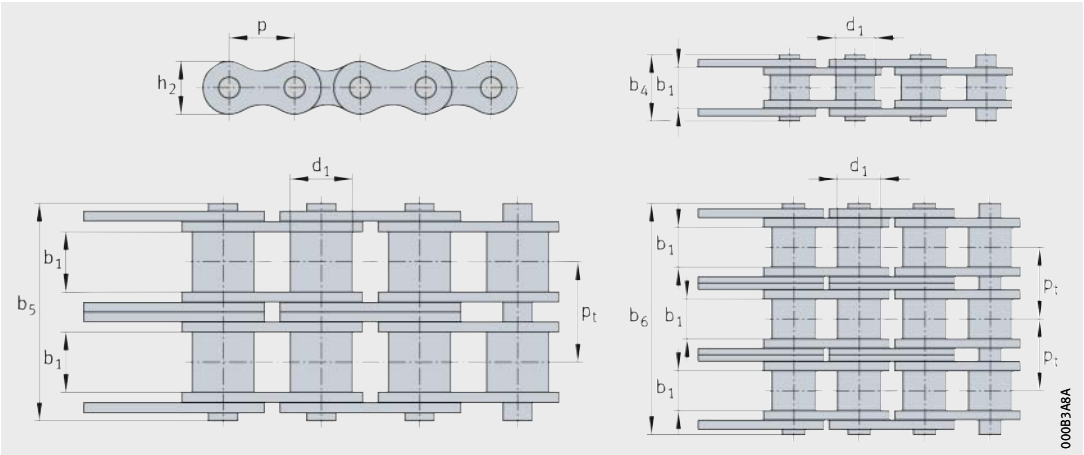
°

left hand = “-”, straight teeth = “ ”, right hand = “+”

Chain

Type

☐ simplex ☐ duplex ☐ triplex



In the case of chains that do not correspond to ISO 606 (DIN 8188, DIN 8187), the additional following data are required:

Roller width b_1

mm

Pin length b_4, b_5, b_6

mm

Roller diameter d_1

mm

Link height h_2

mm

Pitch p

mm

Transverse pitch p_t

mm

Customer-specific lubrication gears and chain lubrication pinions

Lubricant

Type _____

☐ Grease ☐ Oil

The following documents relating to the lubricant have been added to this checklist (necessary for enquiry):

☐ Technical datasheet ☐ Safety datasheet

Available design envelope (L×W×H)

_____ × _____ × _____ mm

Speed

Circumferential speed (gear) _____ m/s

Linear speed (toothed rack, chain) _____ m/s

Operating temperature

from _____ to _____ °C

Ambient conditions

☐ Contamination ☐ Water ☐ Food industry ☐ Outdoor use

Relubrication

Lubrication device (designation) _____

Lubrication demand _____ g

every _____ hours

Other information



**Schaeffler Technologies
AG & Co. KG**

Georg-Schäfer-Straße 30
97421 Schweinfurt
Germany
Internet www.schaeffler.de/en/services
E-mail industrial-services@schaeffler.com

In Germany:

Phone 0180 5003872
Fax 0180 5003873

From other countries:

Phone +49 9721 91-0
Fax +49 9721 91-3435

Every care has been taken to ensure the correctness of the information contained in this publication but no liability can be accepted for any errors or omissions. We reserve the right to make technical changes.

© Schaeffler Technologies AG & Co. KG

Issued: 2018, June

This publication or parts thereof may not be reproduced without our permission.

TPI 252 GB-D