

SKF

SKF Bearing Grease selection guide



This grease selection guide is offered to you by SKF.
It is very easy to use, complete and very practical.

- 1 Basic selection table**
- 2 Advanced selection table**
- 3 Technical specifications**



Basic selection table

(Limited application information)

| Basic bearing grease selection | | |
|--|---------------|---------------------|
| Generally use | LGMT 2 | All-purpose |
| Unless: | | |
| Expected bearing temperature continuously > 100 °C/212 °F | LGHP 2 | High temperature |
| Low ambient -50 °C/-58 °F, expected bearing temperature < 50 °C/122 °F | LGLT 2 | Low temperature |
| Shock loads, heavy loads, vibrations | LGEP 2 | High load |
| Food processing industry | LGFP 2 | Food processing |
| Green biodegradable, demands for low toxicity | LGGB 2 | Green biodegradable |

- Note:**
- For areas with relatively high ambient temperatures, use LGMT 3 instead of LGMT 2
 - For special operating conditions, refer to the range of special SKF bearing greases
 - For bearing temperatures > 200 °C / 392 °F (up to 260 °C / 500 °F) refer to LGET 2



Grease packer LAGP 400



Grease meter LAGM 1000







1077600



Grease gun LAGH 400

Advanced selection table




(More detailed application information)

| Bearing operating parameters | | | |
|---|-----------------------------|---|--------------------|
| Temperature  | | Load  | |
| M = Medium | -30 to 110 °C/-22 to 230 °F | VH = Very high | C/P < 2 |
| H = High | -20 to 130 °C/-4 to 266 °F | H = High | C/P = 2-5 |
| L = Low | -50 to 80 °C/-58 to 176 °F | M = Medium | C/P = 5-10 |
| | | L = Low | C/P > 10 |
| Speed for ball bearings  | | Speed for roller bearings  | |
| EH = Extremely High | n.dm over 700.000 | H = High | n.dm over 150.000 |
| VH = Very High | n.dm up to 700.000 | M = Medium | n.dm up to 150.000 |
| H = High | n.dm up to 500.000 | L = Low | n.dm up to 75.000 |
| M = Medium | n.dm up to 300.000 | VL = Very Low | n.dm below 30.000 |

n.dm = rotational speed, r/min x 0,5 (D+d), mm




Quick bearing grease selection guide

2^A

| Bearing working conditions | | | | |
|--|---|---|--|--------------------|
|  |  |  | Main additional properties | Grease recommended |
| M | M | M | General purpose for small/medium-sized bearings | LGMT 2 |
| M | M | M | General purpose for larger bearings (or high ambient temp.) | LGMT 3 |
| M | M | M | Food compatible | LGFP 2 |
| M | M | M+H | Biodegradable, low toxicity, EP/anti-wear | LGGB 2 |
| M | L | H | EP/anti-wear, good corrosion inhibition | LGEP 2 |
| M | L | H | EP/anti-wear, good low temperature performance, anti-brinelling | LGWM 1 |
| M | L | H | EP/anti-wear, severe vibrations, anti-brinelling, water resistance | LGHB 2 |
| M | VL | VH | Excellent EP/anti-wear (solid additives), high viscosity | LGEM 2 |

Quick bearing grease selection guide

2^A

| Bearing working conditions | | | | Grease recommended |
|---|---|---|--|--------------------|
|  |  |  | Main additional properties | |
| M | VL | VH | Excellent EP/anti-wear (solid additives), extremely high viscosity | LGEV 2 |
| M | VL | VH | Extremely good EP, anti-brinelling, water resistance | LGHB 2 |
| L | EH | L | Quiet running, very low start-up temperature | LGLT 2 |
| L+M | EH | M | EP/anti-wear, very low start-up temperature | LGLC 2 |
| M+H | M+H | M | Excellent corrosion protection, water resistance, long grease life | LGHP 2 |
| H | L+M | H | Extremely good EP, anti-brinelling, water resistance | LGHB 2 |
| H | L+M | M+H | EP/anti-wear, leakage resistant, water resistance | LGWA 2 |

Note: - For bearing temperatures > 200 °C / 392 °F (up to 260 °C / 500 °F) refer to LGET 2

Grease filler pumps, manual and air-driven grease pumps



LAGF 18 / LAGF 50



LAGG 18M



LAGG 18AE



LAGG 50AE



LAGG 180AE



LAGT 180

Technical specifications

3

| | Description | Temperature range | Thickener/ base oil | Base oil viscosity (*1) | Available pack sizes |
|---------------------------------|---------------------------------------|--------------------------|---|----------------------------|---|
| Standard bearing greases | | | | | |
| LGMT 2 | All purpose industrial and automotive | -30/120 °C -22/250 °F | Lithium soap/ mineral oil | 110 | 35, 200 g, 420 ml, 1, 5, 18, 50, 180 kg |
| LGMT 3 | All purpose industrial and automotive | -30/120 °C -22/250 °F | Lithium soap/ mineral oil | 120-130 | 420 ml, 1, 5, 18, 50, 180 kg |
| LGEP 2 | Extreme pressure | -20/110 °C -4/230 °F | Lithium soap/ mineral oil | 200 | 420 ml, 1, 5, 18, 50, 180 kg |
| LGLT 2 | Low temperature | -55/110 °C -65/230 °F | Lithium soap/ di-ester oil | 15 | 25, 200 g, 1, 180 kg |
| LGHP 2 | High performance polyurea grease | -40/150 °C -40/300 °F | Di-urea/ mineral oil | 96 | 420 ml, 1, 5, 18, 50, 180 kg, SYSTEM 24 |
| LGFP 2 | Food compatible | -20/110 °C -4/230 °F | Aluminium complex/ medical white oil | 130 | 420 ml, 1, 18, 180 kg, SYSTEM 24 |

(*1) mm^2/s at 40 °C/104 °F = cSt.

Technical specifications

| | Description | Temperature range | Thickener/ base oil | Base oil viscosity (*1) | Available pack sizes |
|--------------------------------|---|-------------------------------|--|----------------------------|---|
| Special bearing greases | | | | | |
| LGGB 2 | Green biodegradable low toxicity | -40/120 °C (*2) -40/250 °F | Lithium-calcium soap/synthetic ester oil | 110 | 420 ml, 5, 18, 180 kg, SYSTEM 24 |
| LGLC 2 | Low temperature high speed | -40/120 °C -40/250 °F | Calcium complex soap/ester- mineral oil | 24 | 200 g, 1, 180 kg |
| LGWA 2 | Wide temperature (*3) | -30/140 °C -22/284 °F | Lithium complex soap/mineral oil | 185 | 35, 200 g, 420 ml, 1, 5, 50, 180 kg SYSTEM 24 |
| LGHB 2 | EP high viscosity high temperature (*4) | -20/150 °C -4/300 °F | Complex calcium sulphonate/ mineral oil | 400-450 | 420 ml, 5, 18, 50, 180 kg, SYSTEM 24 |

(*1) mm^2/s at 40 °C/104 °F = cSt.

(*2) For continuous operation: max. temperatures 90 °C/194 °F

(*3) LGWA 2 can withstand peak temperatures of 220 °C/428 °F

(*4) LGHB 2 can withstand peak temperatures of 200 °C/392 °F

Technical specifications

3

| | Description | Temperature range | Thickener/ base oil | Base oil viscosity (*1) | Available pack sizes |
|--------------------------------|--|--------------------------|---|----------------------------|---------------------------------------|
| Special bearing greases | | | | | |
| LGET 2 | Extreme temperature | -40/260 °C -40/500 °F | PTFE/Synthetic (fluorinated polyether) | 400 | 50 g (25 ml) syringe |
| LGEM 2 | High viscosity plus solid lubricants | -20/120 °C -4/250 °F | Lithium soap/ mineral oil | 500 | 420 ml, 5, 18, 180 kg SYSTEM 24 |
| LGEV 2 | Extremely high viscosity with solid lubricants | -10/120 °C 14/250 °F | Lithium-calcium soap/mineral oil | 1.020 | 35 g, 420 ml, 5, 18, 50, 180 kg |
| LGWM 1 | Extreme pressure low temperature | -30/110 °C -22/230 °F | Lithium soap/ mineral oil | 200 | 420 ml, 5, 50, 180 kg |

(*1) mm^2/s at $40\text{ }^\circ\text{C}/104\text{ }^\circ\text{F} = \text{cSt}$.

Automatic lubricators



SYSTEM MultiPoint



SYSTEM 24

In line with our policy of continuous development of our products we reserve the right to alter any part of the above specification without prior notice.

SKF Maintenance Products

© Copyright SKF 2003/04

www.mapro.skf.com
www.skf.com/mount



MP3406E