

Hydrostatic drive for excellent drive comfort and productivity

Low fuel consumption

Excellent stability during travel due to extremely low centre of gravity and high pivot steer axle

Driver assistance systems (optional)

Ergonomic and easily adjustable operators environment

Driver orientated workplace



DFG/TFG 425s/430s/435s

Diesel and LPG counterbalanced trucks with hydrostatic drive (2,500/3,000/3,500 kg)

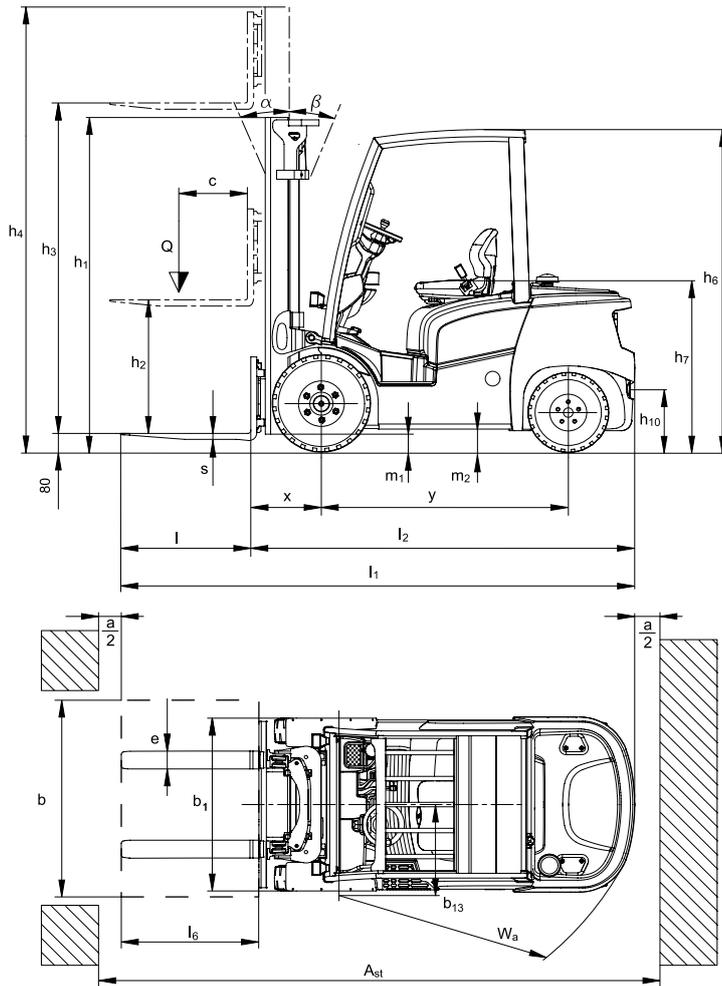
Our diesel and LPG fork lift trucks with hydrostatic drive offer outstanding throughput, particularly when reversing (e.g. during loading of HGVs). This is where their strengths truly come into play: Rapid acceleration, fast reversing and precise travel. With five operating programs, the performance characteristics can be optimally adapted to the requirements of numerous applications.

State-of-the-art engines from the automotive industry feature impressive electronic control units. They allow for precise operation and optimum productivity combined with low fuel consumption. All the engines are characterised by low emissions, falling significantly below the strict EU directives. The diesel truck is fitted with a diesel particle filter as standard. A closed-loop 3-way catalytic converter is available as an option for the LPG trucks.

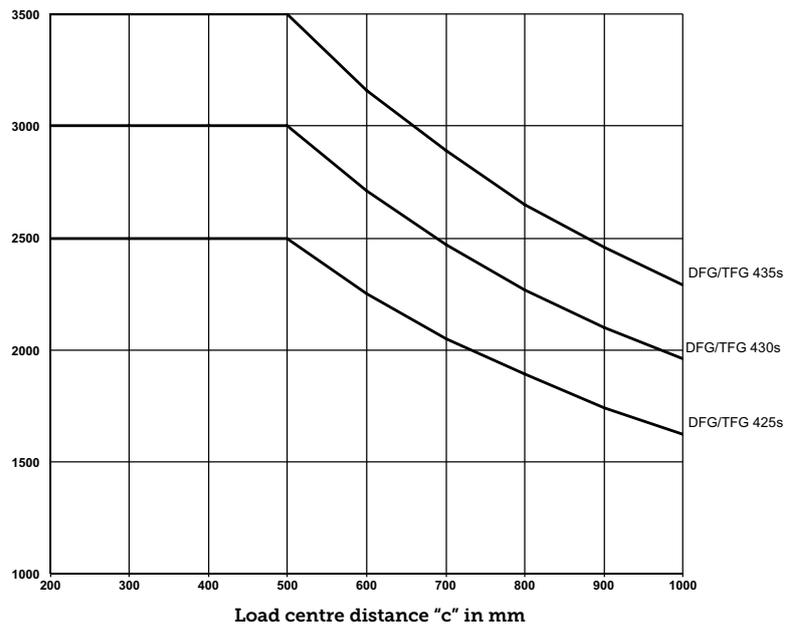
The generously dimensioned workstation is optimally designed with the operator in mind. The infinitely adjustable steering column with memory function and the integral armrest allows full adjustment to suit all operator sizes. The single-point adjustment via two adjustable axes enables the primary controls to be quickly and intuitively adjusted. This ensures safety, protects health and enables the operator to concentrate fully on their work whilst being in a relaxed & stress-free environment.

The laminated safety glass roof panel offers protection from the weather and falling items. The increased amount of light in the cab creates a pleasant working atmosphere contributing to faster and safer stacking and retrieval. These are the best requirements for ensuring maximum productivity throughout the shift.

DFG/TFG 425s/430s/435s



Capacity (kg)



DFG/TFG 425s/430s/435s

Standard mast designs DFG 425s/DFG 430s/DFG 435s/TFG 425s/TFG 430s/TFG 435s											
	Lift h_3	Lowered mast height h_1			Free lift h_2			Extended mast height h_4			Mast tilt forward / back α/β (°)
	(mm)	(mm)			(mm)			(mm)			
		DFG 425s / TFG 425s	DFG 430s / TFG 430s	DFG 435s / TFG 435s	DFG 425s / TFG 425s	DFG 430s / TFG 430s	DFG 435s / TFG 435s	DFG 425s / TFG 425s	DFG 430s / TFG 430s	DFG 435s / TFG 435s	
Duplex ZT	2900	2121	2125	2205	150	150	150	3494	3662	3693	6/6
	3100	2221	2225	2305	150	150	150	3694	3862	3893	6/8
	3300	2321	2325	2405	150	150	150	3894	4062	4093	6/8
	3500	2421	2425	2505	150	150	150	4094	4262	4293	6/8
	3700	2521	2525	2605	150	150	150	4294	4462	4493	6/8
	4000	2671	2675	2755	150	150	150	4594	4762	4793	6/8
	4300	2871	2875	2955	150	150	150	4894	5062	5093	6/8
	4500	2971	2975	3055	150	150	150	5094	5262	5293	6/8
	4700	3075	3075	3155	150	150	150	5350	5460	5490	6/6
	5000	3225	3225	3305	150	150	150	5650	5760	5790	6/6
	5500	3525	3525	3605	150	150	150	6200	6260	6290	6/6
5800	3675	3675	3755	150	150	150	6500	6560	6590	6/6	
6000	3775	3775	3855	150	150	150	6700	6760	6790	6/6	
Duplex ZZ	3100	2186	2190	2270	1606	1451	1501	3672	3842	3873	6/8
	3300	2286	2290	2370	1706	1551	1601	3872	4042	4073	6/8
	3500	2386	2390	2470	1806	1651	1701	4072	4242	4273	6/8
	3700	2486	2490	2570	1906	1751	1801	4272	4442	4473	6/8
	4000	2636	2640	2720	2056	1901	1951	4572	4742	4773	6/8
Triplex DZ	4400	2086	2090	2170	1512	1351	1401	4972	5142	5173	6/8
	4700	2186	2190	2270	1612	1451	1501	5272	5442	5473	6/8
	5000	2277	2290	2370	1714	1551	1601	5563	5742	5773	6/6
	5500	2477	2490	2570	1914	1751	1801	6063	6242	6273	6/6
	6000	2677	2690	2770	2114	1951	2001	6563	6742	6773	6/6
	6500	2877	2890	2970	2314	2151	2201	7063	7242	7273	6/6
	7000	3077	3090	3170	2514	2351	2401	7563	7742	7770	6/6
7500	3277	3290	3370	2714	2551	2601	8063	8240	8273	6/6	

Technical data in line with VDI 2198

			Jungheinrich			
			DFG 425s	DFG 430s	DFG 435s	
Identification	1.1	Manufacturer (abbreviation)		Jungheinrich		
	1.2	Model		DFG 425s	DFG 430s	DFG 435s
	1.3	Drive		Diesel		
	1.4	Manual, pedestrian, stand-on, seated, order picker operation		seat		
	1.5	Load capacity/rated load	Q t	2.5	3	3.5
	1.6	Load centre distance	c mm	500		
	1.8	Load distance	x mm	473 ¹⁾	493 ²⁾	498 ²⁾
	1.9	Wheelbase	y mm	1,750	1,820	1,880
	Weights	2.1	Service weight	kg	3,960	4,440
2.2		Axle load with load front/rear	kg	5,630 / 830	6,520 / 920	7,305 / 1,005
2.3		Axle load without load front/rear	kg	1,740 / 2,220	1,909 / 2,530	1,975 / 2,896
Wheels / frame	3.1	Tyres		SE		
	3.2	Tyre size, front	mm	7.00-12	27x10-12	27x10-12
	3.3	Tyre size, rear	mm	6.50-10		
	3.5	Wheels, number front/rear (x = driven wheels)		2x/2		
	3.6	Tread width, front	b ₁₀ mm	1,000	1,060	1,060
	3.7	Tread width, rear	b ₁₁ mm	942		
	Basic dimensions	4.1	Tilt of mast/fork carriage forward/backward	α/β °	6/8	
4.2		Mast height (lowered)	h ₁ mm	2,321	2,325	2,405
4.3		Free lift	h ₂ mm	150		
4.4		Lift	h ₃ mm	3,300		
4.5		Extended mast height	h ₄ mm	3,894	4,062	4,093
4.7		Height of overhead guard	h ₆ mm	2,220	2,238	2,238
4.8		Seat height/stand height	h ₇ mm	1,058	1,076	1,076
4.12		Coupling height	h ₁₀ mm	377	387	387
4.19		Overall length	l ₁ mm	3,763	3,873	3,963
4.20		Length to face of forks	l ₂ mm	2,613	2,723	2,813
4.21		Overall width	b ₁ /b ₂ mm	1,184	1,320	1,320
4.22		Fork dimensions	s/e/l mm	40 / 120 / 1,150	45 / 125 / 1,150	50 / 125 / 1,150
4.23		Fork carriage ISO 2328, class/type A, B		2A	3A	3A
4.24		Fork carriage width	b ₃ mm	1,120		
4.31		Floor clearance with load under mast	m ₁ mm	112	118	147
4.32		Ground clearance, centre of wheelbase	m ₂ mm	130	148	148
4.33		Aisle width for pallets 1000 x 1200 sideways	Ast mm	3,958	4,075	4,153
4.34	Aisle width for pallets 800 x 1200 lengthways	Ast mm	4,158	4,275	4,353	
4.35	Turning radius	W _a mm	2,285	2,377	2,455	
4.36	Smallest pivot point distance	b ₁₃ mm	640			
Performance data	5.1	Travel speed, laden/unladen	km/h	19.6 / 19.6	20.8 / 20.8	20.8 / 20.8
	5.2	Lift speed, laden/unladen	m/s	0.56 / 0.56	0.56 / 0.56	0.48 / 0.48
	5.3	Lowering speed, laden/unladen	m/s	0.56 / 0.56		
	5.5	Drawbar pull w. / w.o. load	N	19,160	18,100	18,100
	5.7	Gradeability laden/unladen	%	27	24	21
	5.9.2	Acceleration laden/unladen to 15 m	S	4.9 / 4.4	5.4 / 4.6	5.7 / 4.7
	5.10	Service brake		hydrostatic		
5.11	Parking brake		Automatic parking brake			
Combustion engine	7.1	Engine manufacturer / type		VW 2.0 CR / CPYB (IIIB)		
	7.2	Engine output according to ISO 1585	kW	44		
	7.3	Rated revolutions per minute	/min	2,700		
	7.4	No. of cylinders		4		
	7.4.1	Cubic capacity	cm ³	1,968		
	7.5.1	Fuel consumption acc. to VDI cycle	l/h	3	3.2	3.4
Misc.	8.1	Type of drive control		hydrostatic		
	8.2	Working pressure for attachments	bar	215		
	8.3	Oil flow for attachments	l/min	32		
	8.4	Sound pressure level at operator's ear as per EN 12053	dB (A)	75		
	8.5	Trailer coupling, model/type DIN		DIN 15170 type H		

¹⁾ +12 mm with integrated sideshift

²⁾ +15 mm with integrated sideshift

Technical data in line with VDI 2198

			Jungheinrich			
			TFG 425s	TFG 430s	TFG 435s	
Identification	1.1	Manufacturer (abbreviation)		Jungheinrich		
	1.2	Model		TFG 425s	TFG 430s	
	1.3	Drive		LPG		
	1.4	Manual, pedestrian, stand-on, seated, order picker operation		seat		
	1.5	Load capacity/rated load	Q t	2.5	3	3.5
	1.6	Load centre distance	c mm	500		
	1.8	Load distance	x mm	473 ¹⁾	493 ²⁾	498 ²⁾
	1.9	Wheelbase	y mm	1,750	1,820	1,880
	Weights	2.1	Service weight	kg	3,960	4,440
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	5.2	Lift speed, laden/unladen	m/s	0.56 / 0.56	0.56 / 0.56	0.48 / 0.48
	5.3	Lowering speed, laden/unladen	m/s	0.56 / 0.56		
	5.5	Drawbar pull w. / w.o. load	N	19,160	18,100	18,100
	5.7	Gradeability laden/unladen	%	27	24	21
	5.9.2	Acceleration laden/unladen to 15 m	S	5.7 / 5	5.9 / 5.1	6.1 / 5.2
	5.10	Service brake		hydrostatic		
	5.11	Parking brake		Automatic parking brake		
Combustion engine	7.1	Engine manufacturer / type		VW / BEF		
	7.2	Engine output according to ISO 1585	kW	38		
	7.3	Rated revolutions per minute	/min	2,700		
	7.4	No. of cylinders		4		
	7.4.1	Cubic capacity	cm ³	1,980		
	7.5	Fuel consumption acc. to VDI cycle	kg/h	2.6	2.7	2.9
	Misc.	8.1	Type of drive control		hydrostatic	
8.2		Working pressure for attachments	bar	215		
8.3		Oil flow for attachments	l/min	32		
8.4		Sound pressure level at operator's ear as per EN 12053	dB (A)	75		
8.5		Trailer coupling, model/type DIN		DIN 15170 type H		

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²⁾ +15 mm with integrated sideshift

DFG/TFG 425s/430s/435s



Operator-oriented workstation

The ergonomics of the generously configured operator's workstation guarantee relaxed, fatigue-free work:

- Comfortable and safe access and exit thanks to a large entry step easily visible from above.
- Height and rake adjustable, slim steering column with memory function for maximum knee and legroom: The steering column can be tilted forward simply by pulling on the steering wheel lever.
- Excellent all-round visibility thanks to special roof and panel design as well as unobstructed roof window made from laminated safety glass.
- Clear view of the load thanks to optimised chain and hose configuration.
- Compact nested profile package with outstanding visibility.
- Particularly comfortable operation due to the integration of all controls into the armrest which moves with the operator.
- Operator-oriented storage concept for intuitive operation.
- High-resolution, contrast-rich colour TFT display with self-explanatory symbols.
- USB power supply port for e.g. MP3 players.

- Limited vibrations experienced by the operator as the cab is not directly connected to the frame (floating cab).

Ergonomic and easily adjustable operator's environment

- A choice of five parametrised travel programs.
- Stepless single-point adjustment of the armrest in two axis directions.
- Large armrest with adjustable tilt, available in different upholstery fabrics and with a spacious storage compartment.
- A choice of three different controls.
- Single or double pedal operation.
- Adjustable lever and axis assignment of the controls.

Benefit from the advantages



Maximum throughput



Workstation is comfortable and helps to maximise productivity



VW engines with low energy consumption



Outstanding all-round visibility

Performance and drive characteristics

A hydrostatic drive gives you the best energy efficiency coupled with maximum throughput – particularly when reversing:

- Stepless power transmission and high starting torques.
- Electronic control for precise adjustment of drive and hydraulic functions.
- The five electronically selectable operating/travel programs ensure optimum performance parameters for every application.
- Automatic increase in rpm during lifting and lowering.
- Very precise control of travel speed – the truck is very responsive.
- Low maintenance costs due to direct drive without wearing parts, such as clutch, differential and gears.
- Hydrostatic steering ensures steering is effortless and very precise.

Safety

Outstanding travel dynamics and performance levels require a high level of safety. Our hydrostatic drive trucks already offer you a comprehensive safety package as standard:

- Deactivation of the hydraulic functions if seat is unoccupied.

- No uncontrolled roll-back on ramps or inclines due to the automatic parking brake, even with the engine switched off.
- Excellent stability due to extremely low inherent centre of gravity and high pivot steer axle in the newest generation.
- Damping on mast and tilt cylinders for increased handling safety.

A range of additional operator assistance options provides even more safety for the operator, truck and load:

- Access Control: The access control system allows operation of the fork lift only if the 'seat occupied' and belt lock detection systems have been activated in turn.
- Drive Control: The speed control which automatically reduces the speed of travel when cornering and from a defined lift height.
- Lift Control (includes Drive Control): Automatically reduces the tilt speed of the mast from a defined lift height. Tilt angle shown on separate display.

Hydraulics

A variable displacement pump for the operating hydraulics optimises efficiency with the appropriate supply of oil. The high-performance filter system

ensures cleaner oil and a long service life for all components:

- Full-flow hydraulic oil filtration with combined suction and return filtering for maximum oil purity.
- Hydraulic tank integrated in frame.
- Ventilation of hydraulic tank via filter.
- Pressure relief valves protect against excess pressure and overloading.

Brakes

The hydrostatic drive allows completely wearfree braking:

- Frequent brake pedal operation is no longer necessary.
- Parking brake: Sprung-loaded laminated oil immersed parking brake as a maintenance-free, enclosed system.

Intelligent controls and electronics

- Software and hardware for controls developed and produced in-house.
- Sensitive adjustment of hydraulic functions via electromagnetic valves.
- Splash-proof electronic drive and hydraulic controls in CAN-Bus design.

Engines

- State-of-the-art engines with performance figures falling far within the strict statutory limit values.
- Powerful yet low-consumption engines.

Jungheinrich Aktiengesellschaft

Friedrich-Ebert-Damm 129
D-22047 Hamburg
Telephone +49 40 6948-0
Telefax +49 40 6948-1777

info@jungheinrich.com
www.jungheinrich.com

The German production facilities in Norderstedt, Moosburg and Landsberg are certified. **ISO 9001**
ISO 14001

Jungheinrich fork lift trucks meet European safety requirements.



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