



**Innovative Machine**  
**INOMA**

*I.C. Engine-Powered Forklift Trucks  
1.5-1.8 ton  
(Counter-Balanced Type)*

**SPECIFICATIONS**

# STANDARD SPECIFICATIONS

Characteristics	1		Manufacturer		TCM			
	2		Model		FG15C13	FG15T13		
Dimensions	3		Load Capacity		kg	1500		
	4		Load Center		mm	500		
	5		Power Type			Gasoline		
	6		Operator Position			Seated		
	7		Tire Type		Front / Rear	Pneumatic		
	8		Wheels (x = driven)		Front / Rear	2X / 2		
	9		Maximum Fork Height		mm	3000		
	10		Free Lift		mm	155		
	13		Fork Size		L × W × T	920 × 100 × 35		
			Fork Spread (Outside)		Max. / Min.	920 / 200		
	14		Tilt Angle		Fwd / Bwd	6 / 12		
	15		Length to Fork Face		mm	2245		
	16		Overall Width		mm	1070		
	17		Mast Height Fork Lowered		mm	1995		
	18		Mast Height Fork Raised		mm	4030		
	19		Overhead Guard Height(EXB,EXK)		mm	2070		
			Overhead Guard Height(EXC,EXE,EXN)		mm	2130		
	20		Operator's Seat Height		mm	1015		
	21		Turning Radius (Outside)		mm	1980		
	22		Load Distance (Centerline of front axle to front face of forks)		mm	395		
			Rear Overhang		mm	425		
	23		Basic Right Angle Stacking Aisle Width (Add load length and clearance)		mm	3685		
	Performance	24		Travel, Max. (Fwd. / Rvs.)		Full Load	km/h	14.0 / 14.0
				No Load	km/h	14.5 / 14.5		
25		Speeds		Lifting	Full Load	mm/sec	590	
				No Load	mm/sec	670		
26				Lowering	Full Load	mm/sec	450	
				No Load	mm/sec	550		
28		Max. Drawbar Pull		Full Load	kN	9.3	14.5	
				No Load	kN	6.9		
30		Max. Gradeability*		Full Load	%	24	29	
				No Load	%	18		
Weight	32		Total Weight		kg	2510		
	33		Weight Distribution		Full Load	Front	kg	3510
						Rear	kg	500
	34				No Load	Front	kg	1070
						Rear	kg	1440
Chassis & Wheels	35		Tires		Number	Front / Rear	2 / 2	
	36				Size	Front	6.50-10-10PR	
	37					Rear	5.00-8-8PR	
	38		Wheelbase		mm	1425		
	39		Tread		Front	mm	890	
					Rear	mm	920	
			Backrest Height		mm	1045		
			Overhead Guard Clearance		mm	1035		
			Counterweight Height		mm	1110		
			Drawbar Pin Center Height		mm	495		
		Step Height/Floor Height		mm	420 / 650			
Engine & Transmission	40		Underclearance		Min. with Load	mm	100	
					Center of Wheelbase	mm	110	
	42		Brake		Service (Foot)		Hydraulic-Foot pedal	
	43				Parking		Mechanical-Hand lever	
	45		Battery		Voltage / Capacity (5HR)	V/AH	12 / 28	
	49				Make / Model		NISSAN K15	
	50				Rated Horsepower / r.p.m.	kW	25.0 / 2400	
	51				Rated Torque/r.p.m.	N-m	110.2 / 1600	
	52		Internal Combustion Engine		Number of Cylinder		4	
					Piston Displacement	cc	1486	
					Alternator output	kW/Amp	0.60 / 50	
					Fuel Tank Capacity Type	liter	50	
55		Transmission		Type		Manual	Power-shift	
				Stage	Fwd.-Rvs.	2-2	1-1	
57		Operating Pressure		For Attachments	MPa (psi)	17.7		

NOTE : \* Computed values.

TCM					
FG18C13	FG18T13	FHG15C3	FHG15T3	FHG18C3	FHG18T3
1750		1500		1750	
500		500		500	
Gasoline		Gasoline		Gasoline	
Seated		Seated		Seated	
Pneumatic		Pneumatic		Pneumatic	
2X / 2		2X / 2		2X / 2	
3000		3000		3000	
155		155		155	
920 X 100 X 35		920 X 100 X 35		920 X 100 X 35	
920 / 200		920 / 200		920 / 200	
6 / 12		6 / 12		6 / 12	
2275		2245		2275	
1100		1070		1100	
1995		1995		1995	
4030		4030		4030	
2070		2070		2070	
2130		2130		2130	
1015		1045		1045	
2010		1980		2010	
395		395		395	
455		425		455	
3715		3685		3715	
14.0 / 14.0		18.5 / 18.5	19.0 / 19.0	18.5 / 18.5	19.0 / 19.0
14.5 / 14.5		19.0 / 19.0	19.5 / 19.5	19.0 / 19.0	19.5 / 19.5
590		600		600	
670		680		680	
450		450		450	
550		550		550	
9.3	14.5	12.7	15.7	12.7	15.7
6.9		6.9		6.9	
20	24	25	33	22	31
18		18		18	
2670		2510		2670	
3880		3510		3880	
540		500		540	
1030		1070		1030	
1640		1440		1640	
2 / 2		2 / 2		2 / 2	
6.50-10-10PR		6.50-10-10PR		6.50-10-10PR	
5.00-8-8PR		5.00-8-8PR		5.00-8-8PR	
1425		1425		1425	
920		890		920	
920		920		920	
1045		1045		1045	
1035		1005		1005	
1110		1110		1110	
495		495		495	
420 / 650		420 / 650		420 / 650	
100		100		100	
110		110		110	
Hydraulic-Foot pedal		Hydraulic-Foot pedal		Hydraulic-Foot pedal	
Mechanical-Hand lever		Mechanical-Hand lever		Mechanical-Hand lever	
12 / 28		12 / 28		12 / 28	
NISSAN K15		NISSAN K21		NISSAN K21	
25.0 / 2400		34.6 / 2250		34.6 / 2250	
110.2 / 1600		153.5 / 1600		153.5 / 1600	
4		4		4	
1486		2065		2065	
0.60 / 50		0.60 / 50		0.60 / 50	
50		50		50	
Manual	Power-shift	Manual	Power-shift	Manual	Power-shift
2-2	1-1	2-2	1-1	2-2	1-1
17.7		17.7		17.7	

# STANDARD SPECIFICATIONS

Characteristics				TCM			
				FD15C13	FD15T13		
1	Manufacturer						
2	Model						
3	Load Capacity	kg		1500			
4	Load Center	mm		500			
5	Power Type			Diesel			
6	Operator Position			Seated			
7	Tire Type	Front / Rear		Pneumatic			
8	Wheels (x = driven)	Front / Rear		2X / 2			
9	Maximum Fork Height	mm		3000			
10	Free Lift	mm		155			
13	Fork Size	L X W X T		920 X 100 X 35			
	Fork Spread (Outside)	Max. / Min.		920 / 200			
14	Tilt Angle	Fwd / Bwd		6 / 12			
15	Length to Fork Face	mm		2245			
16	Overall Width	mm		1070			
17	Mast Height Fork Lowered	mm		1995			
18	Mast Height Fork Raised	mm		4030			
19	Overhead Guard Height(EXB,EXK)	mm		2070			
	Overhead Guard Height(EXC,EXE,EXN)	mm		2130			
20	Operator's Seat Height	mm		1015			
21	Turning Radius (Outside)	mm		1980			
22	Load Distance (Centerline of front axle to front face of forks)	mm		395			
	Rear Overhang	mm		425			
23	Basic Right Angle Stacking Aisle Width (Add load length and clearance)	mm		3685			
Performance	24	Travel, Max. (Fwd. / Rvs.)	Full Load	km/h	13.5 / 13.5		
			No Load	km/h	14.0 / 14.0		
		25	Lifting	Full Load	mm/sec	530	
				No Load	mm/sec	600	
		26	Lowering	Full Load	mm/sec	450	
				No Load	mm/sec	550	
28	Max. Drawbar Pull	Full Load	kN	8.8	13.7		
		No Load	kN	6.9			
30	Max. Gradeability*	Full Load	%	22	24		
		No Load	%	19			
Weight	32	Total Weight		kg	2540		
		33	Full Load	Front	kg	3530	
				Rear	kg	510	
		34	No Load	Front	kg	1090	
Rear	kg			1450			
Chassis & Wheels	35	Tires	Number	Front / Rear	2 / 2		
			Size	Front	6.50-10-10PR		
				Rear	5.00-8-8PR		
38	Wheelbase	mm		1425			
39	Tread	Front	mm	890			
		Rear	mm	920			
	Backrest Height	mm		1045			
	Overhead Guard Clearance	mm		1035			
	Counterweight Height	mm		1110			
	Drawbar Pin Center Height	mm		495			
	Step Height/Floor Height	mm		420 / 650			
40	Underclearance	Min. with Load	mm	100			
		Center of Wheelbase	mm	110			
42	Brake	Service (Foot)	Hydraulic-Foot pedal				
		Parking	Mechanical-Hand lever				
45	Battery	Voltage / Capacity (5HR)	V/AH	12 / 52			
49	Internal Combustion Engine	Make / Model	KUBOTA D1503				
50		Rated Horsepower / r.p.m.	kW	21.3 / 2500			
51		Rated Torque/r.p.m.	N-m	98 / 1600			
		Number of Cylinder	3				
52		Piston Displacement	cc	1499			
		Alternator output	kW/Amp	0.54 / 45			
	Fuel Tank Capacity Type	liter	50				
55	Transmission	Type	Manual		Power-shift		
		Stage	Fwd.-Rvs.	2-2	1-1		
57	Operating Pressure	For Attachments	MPa (psi)	17.7			

NOTE : \* Computed values.

TCM					
FD18C13	FD18T13	FHD15C3	FHD15T3	FHD18C3	FHD18T3
1750		1500		1750	
500		500		500	
Diesel		Diesel		Diesel	
Seated		Seated		Seated	
Pneumatic		Pneumatic		Pneumatic	
2X / 2		2X / 2		2X / 2	
3000		3000		3000	
155		155		155	
920 × 100 × 35		920 × 100 × 35		920 × 100 × 35	
920 / 200		920 / 200		920 / 200	
6 / 12		6 / 12		6 / 12	
2275		2245		2275	
1100		1070		1100	
1995		1995		1995	
4030		4030		4030	
2070		2070		2070	
2130		2130		2130	
1015		1045		1045	
2010		1980		2010	
395		395		395	
455		425		455	
3715		3685		3715	
13.5 / 13.5		18.5 / 18.5	19.0 / 19.0	18.5 / 18.5	19.0 / 19.0
14.0 / 14.0		19.0 / 19.0	19.5 / 19.5	19.0 / 19.0	19.5 / 19.5
530		620		620	
600		680		680	
450		450		450	
550		550		550	
8.8	13.7	14.7	18.6	14.7	18.6
6.9		6.9		6.9	
20	21	25	33	22	31
16		18		17	
2700		2620		2780	
3900		3550		3910	
550		570		620	
1050		1110		1060	
1650		1510		1720	
2 / 2		2 / 2		2 / 2	
6.50-10-10PR		6.50-10-10PR		6.50-10-10PR	
5.00-8-8PR		5.00-8-8PR		5.00-8-8PR	
1425		1425		1425	
920		890		920	
920		920		920	
1045		1045		1045	
1035		1005		1005	
1110		1110		1110	
495		495		495	
420 / 650		420 / 650		420 / 650	
100		100		100	
110		110		110	
Hydraulic-Foot pedal		Hydraulic-Foot pedal		Hydraulic-Foot pedal	
Mechanical-Hand lever		Mechanical-Hand lever		Mechanical-Hand lever	
12 / 52		12 / 64		12 / 64	
KUBOTA D1503		NISSAN DIESEL TD27-II		NISSAN DIESEL TD27-II	
21.3 / 2500		42.0 / 2400		42.0 / 2400	
98 / 1600		170 / 2300		170 / 2300	
3		4		4	
1499		2663		2663	
0.54 / 45		0.72 / 60		0.72 / 60	
50		50		50	
Manual	Power-shift	Manual	Power-shift	Manual	Power-shift
2-2	1-1	2-2	1-1	2-2	1-1
17.7		17.7		17.7	

**Wide View Mast VM**

Mast Model	Rated Capacity at 500mm load center (kg)				Max. Fork Height	Overall Mast Height		Tilting Angle F/B	(1) Service weight(kg)					
	FG / D15T13		FG / D18T13			(1)Lowered	(2)Raised with Backrest		FG15T3 FG15C3			FG18T3 FG18C3		
	PNEUMATIC	UNIQUE(SE)	PNEUMATIC	UNIQUE(SE)					S	DD	SDD	S	DD	SDD
VM250	1500	1500	1750	1750	2500	1745	3530	6-10	2475	2505	2585	2635	2650	2730
VM270	1500	1500	1750	1750	2700	1845	3730	6-10	2490	2520	2600	2650	2665	2745
VM300	1500	1500	1750	1750	3000	1995	4030	6-12	2510	2540	2620	2670	2685	2765
VM330	1500	1500	1750	1750	3300	2145	4330	6-12	2525	2555	2635	2685	2700	2780
VM350	1500	1500	1750	1750	3500	2245	4530	6-12	2540	2570	2650	2700	2715	2795
VM375	1500	1500	1750	1750	3750	2370	4780	6-6 *6-12	2555	2585	2665	2715	2730	2810
VM400	1500	1500	1650 *1750	1650 *1750	4000	2545	5030	6-6 *6-12	2595	2625	2705	2755	2770	2850
VM425	1400 *1500	1400 *1500	1500 *1750	1500 *1750	4250	2670	5280	6-6 *6-12	2615	2645	2725	2775	2790	2870
VM450	1400	1400	1500 *1650	1500 *1650	4500	2795	5530	6-6 *6-12	2625	2655	2735	2785	2800	2880
VM475	1000 *1350	1300 *1350	1000 *1500	1300 *1500	4750	2920	5780	6-6 *6-6	2640	2670	2750	2800	2815	2895
VM500	1000 *1350	1200 *1350	1000 *1500	1200 *1500	5000	3045	6030	6-6 *6-6	2660	2690	2770	2820	2835	2915
VM550	*1100	*1100	*1300	*1300	5500	3345	6530	*3-6	2715	2745	2825	2875	2890	2970
VM600	*800	*800	*1000	*1000	6000	3595	7030	*3-6	2745	2775	2855	2905	2920	3000

NOTE : (1) Weight for diesel model: +30kg

**Wide View Full Free 2-Stage Mast VFM**

Mast Model	Rated Capacity at 500mm load center (kg)				Max. Fork Height	Overall Mast Height		Free lift with Backrest	Tilting Angle F/B	(3) Service weight(kg)					
	FG / D15T13		FG / D18T13			(1)Lowered	(2)Raised with Backrest			FG15T3 FG15C3			FG18T3 FG18C3		
	PNEUMATIC	UNIQUE(SE)	PNEUMATIC	UNIQUE(SE)						S	DD	SDD	S	DD	SDD
VFM250	1500	1500	1750	1750	2500	1745	3530	740	6-10	2510	2540	2620	2670	2685	2765
VFM270	1500	1500	1750	1750	2700	1845	3730	840	6-10	2525	2555	2635	2685	2700	2780
VFM300	1500	1500	1750	1750	3000	1995	4030	990	6-12	2545	2575	2655	2705	2720	2800
VFM330	1500	1500	1750	1750	3300	2145	4330	1140	6-12	2565	2595	2675	2725	2740	2820
VFM350	1500	1500	1750	1750	3500	2245	4530	1240	6-12	2575	2605	2685	2735	2750	2830
VFM375	1500	1500	1750	1750	3750	2370	4780	1365	6-6 *6-12	2590	2620	2700	2750	2765	2845
VFM400	1500	1500	1650 *1750	1650 *1750	4000	2545	5030	1540	6-6 *6-12	2640	2670	2750	2800	2815	2895
VFM425	1400 *1500	1400 *1500	1500 *1750	1500 *1750	4250	2670	5280	1665	6-6 *6-12	2660	2690	2770	2820	2835	2915
VFM450	1400	1400	1500 *1650	1500 *1650	4500	2795	5530	1790	6-6 *6-12	2675	2705	2785	2835	2850	2930
VFM475	1000 *1350	1300 *1350	1000 *1500	1300 *1500	4750	2920	5780	1915	6-6 *6-6	2690	2720	2800	2850	2865	2945
VFM500	1000 *1350	1200 *1350	1000 *1500	1200 *1500	5000	3045	6030	2040	6-6 *6-6	2705	2735	2815	2865	2880	2960
VFM550	*1100	*1100	*1300	*1300	5500	3345	6530	2340	*3-6	2765	2795	2875	2925	2940	3020
VFM600	*800	*800	*1000	*1000	6000	3595	7030	2590	*3-6	2800	2830	2910	2960	2975	3055

NOTE : (1) For height without backrest: -470mm  
 (2) For free lift without backrest: +470mm  
 Weight for without backrest: -20kg  
 (3) Weight for diesel model: +30kg

**Wide View Full Free 3-Stage Mast VFHM**

Mast Model	Rated Capacity at 500mm load center (kg)				Max. Fork Height	Overall Mast Height		(2)Free lift with Backrest	Tilting Angle F/B	(3) Service weight(kg)					
	FG / D15T13		FG / D18T13			(1)Lowered	(2)Raised with Backrest			FG15T3 FG15C3			FG18T3 FG18C3		
	PNEUMATIC	UNIQUE(SE)	PNEUMATIC	UNIQUE(SE)						S	DD	SDD	S	DD	SDD
VFHM360	1400	1400	1600	1600	3600	1745	4630	740	6-6	2635	2665	2745	2795	2810	2890
VFHM400	1400	1400	1600	1600	4000	1870	5030	865	6-6	2660	2690	2770	2820	2835	2915
VFHM435	1350 *1400	1400 *1400	1550 *1600	1600 *1600	4350	1995	5380	990	6-6 *6-6	2685	2715	2795	2845	2860	2940
VFHM480	1300 *1350	1350 *1350	1400 *1550	1450 *1550	4800	2145	5830	1140	6-6 *6-6	2710	2740	2820	2870	2885	2965
VFHM500	1100 *1300	1300 *1300	1150 *1500	1350 *1500	5000	2245	6030	1240	6-6 *6-6	2730	2760	2840	2890	2905	2985
VFHM540	850 *1250	1100 *1250	900 *1400	1100 *1400	5400	2370	6430	1365	3-6 *3-6	2750	2780	2860	2910	2925	3005
VFHM600	550 *1100	750 *1100	550 *1250	750 *1250	6000	2595	7030	1590	3-6 *3-6	2815	2845	2925	2975	2990	3070
VFHM650	*950	*950	*1100	*1100	6500	2810	7530	1805	*3-3	2860	2890	2970	3020	3035	3115
VFHM700	*750	*750	*750	*750	7000	3030	8030	2025	*3-3	2900	2930	3010	3060	3075	3155

NOTE : (1) For height without backrest: -505mm  
 (2) For free lift without backrest: +500mm  
 Weight for without backrest: -20kg  
 (3) Weight for diesel model: +30kg

**NOTE :**

Rated capacity with (\*): Shows capacity with front dual tires.  
 Service weight of VM/VFM550-600 and of VFHM650-700 represents the weight of vehicles equipped with "special dual tires".  
 Lifting speed with VFM/VFHM mast: with VFM FG 470mm/s with load, 550mm/s without load.  
 FD 420mm/s with load, 490mm/s without load.  
 with VFHM FG 530mm/s with load, 610mm/s without load.  
 FD 480mm/s with load, 540mm/s without load.  
 Lowering speed with VFM/VFHM mast: 420mm/s with load, 370mm/s without load.  
 Overall vehicle length with VFM mast: +10mm longer than of standard model with VM mast.  
 with VFHM mast: +25mm longer than of standard model with VM mast.

## Wide View Mast

### Wide View Mast VM

Mast Model	Rated Capacity at 500mm load center (kg)				Max. Fork Height mm	Overall Mast Height		Tilting Angle F/B deg	(1) Service weight(kg)					
	FHG15T3 / FHD15T3Z		FHG18T3 / FHD18T3Z			(1)Lowered	(2)Raised with Backrest		FHG15T3 FHG15C3			FHG18T3 FHG18C3		
	FHG15C3 / FHD15C3Z		FHG18C3 / FHD18C3Z						S	DD	SDD	S	DD	SDD
	PNEUMATIC	UNIQUE(SE)	PNEUMATIC	UNIQUE(SE)		mm	mm		mm	deg	S	DD	SDD	S
VM250	1500	1500	1750	1750	2500	1745	3530	6-10	2475	2505	2585	2635	2650	2730
VM270	1500	1500	1750	1750	2700	1845	3730	6-10	2490	2520	2600	2650	2665	2745
VM300	1500	1500	1750	1750	3000	1995	4030	6-12	2510	2540	2620	2670	2685	2765
VM330	1500	1500	1750	1750	3300	2145	4330	6-12	2525	2555	2635	2685	2700	2780
VM350	1500	1500	1750	1750	3500	2245	4530	6-12	2540	2570	2650	2700	2715	2795
VM375	1500	1500	1750	1750	3750	2370	4780	6-6 *6-12	2555	2585	2665	2715	2730	2810
VM400	1500	1500	1650 *1750	1650 *1750	4000	2545	5030	6-6 *6-12	2595	2625	2705	2755	2770	2850
VM425	1400 *1500	1400 *1500	1500 *1750	1500 *1750	4250	2670	5280	6-6 *6-12	2615	2645	2725	2775	2790	2870
VM450	1400	1400	1500 *1650	1500 *1650	4500	2795	5530	6-6 *6-12	2625	2655	2735	2785	2800	2880
VM475	1000 *1350	1300 *1350	1000 *1500	1300 *1500	4750	2920	5780	6-6 *6-6	2640	2670	2750	2800	2815	2895
VM500	1000 *1350	1200 *1350	1000 *1500	1200 *1500	5000	3045	6030	6-6 *6-6	2660	2690	2770	2820	2835	2915
VM550	*1100	*1100	*1300	*1300	5500	3345	6530	*3-6	2715	2745	2825	2875	2890	2970
VM600	*800	*800	*1000	*1000	6000	3595	7030	*3-6	2745	2775	2855	2905	2920	3000

NOTE : (1) Weight for diesel model: +110kg(TD27)

### Wide View Full Free 2-Stage Mast VFM

Mast Model	Rated Capacity at 500mm load center (kg)				Max. Fork Height mm	Overall Mast Height		Free lift with Backrest mm	Tilting Angle F/B deg	(3) Service weight(kg)					
	FHG15T3 / FHD15T3Z		FHG18T3 / FHD18T3Z			(1)Lowered	(2)Raised with Backrest			FHG15T3 FHG15C3			FHG18T3 FHG18C3		
	FHG15C3 / FHD15C3Z		FHG18C3 / FHD18C3Z							S	DD	SDD	S	DD	SDD
	PNEUMATIC	UNIQUE(SE)	PNEUMATIC	UNIQUE(SE)		mm	mm			mm	mm	deg	S	DD	SDD
VFM250	1500	1500	1750	1750	2500	1745	3530	740	6-10	2510	2540	2620	2670	2685	2765
VFM270	1500	1500	1750	1750	2700	1845	3730	840	6-10	2525	2555	2635	2685	2700	2780
VFM300	1500	1500	1750	1750	3000	1995	4030	990	6-12	2545	2575	2655	2705	2720	2800
VFM330	1500	1500	1750	1750	3300	2145	4330	1140	6-12	2565	2595	2675	2725	2740	2820
VFM350	1500	1500	1750	1750	3500	2245	4530	1240	6-12	2575	2605	2685	2735	2750	2830
VFM375	1500	1500	1750	1750	3750	2370	4780	1365	6-6 *6-12	2590	2620	2700	2750	2765	2845
VFM400	1500	1500	1650 *1750	1650 *1750	4000	2545	5030	1540	6-6 *6-12	2640	2670	2750	2800	2815	2895
VFM425	1400 *1500	1400 *1500	1500 *1750	1500 *1750	4250	2670	5280	1665	6-6 *6-12	2660	2690	2770	2820	2835	2915
VFM450	1400	1400	1500 *1650	1500 *1650	4500	2795	5530	1790	6-6 *6-12	2675	2705	2785	2835	2850	2930
VFM475	1000 *1350	1300 *1350	1000 *1500	1300 *1500	4750	2920	5780	1915	6-6 *6-6	2690	2720	2800	2850	2865	2945
VFM500	1000 *1350	1200 *1350	1000 *1500	1200 *1500	5000	3045	6030	2040	6-6 *6-6	2705	2735	2815	2865	2880	2960
VFM550	*1100	*1100	*1300	*1300	5500	3345	6530	2340	*3-6	2765	2795	2875	2925	2940	3020
VFM600	*800	*800	*1000	*1000	6000	3595	7030	2590	*3-6	2800	2830	2910	2960	2975	3055

NOTE : (1) For height without backrest: -470mm

(2) For free lift without backrest: +470mm

Weight for without backrest: -20kg

(3) Weight for diesel model: +110kg(TD27)

### Wide View Full Free 3-Stage Mast VFHM

Mast Model	Rated Capacity at 500mm load center (kg)				Max. Fork Height mm	Overall Mast Height		(2)Free lift with Backrest mm	Tilting Angle F/B deg	(3) Service weight(kg)					
	FHG15T3 / FHD15T3Z		FHG18T3 / FHD18T3Z			(1)Lowered	(2)Raised with Backrest			FHG15T3 FHG15C3			FHG18T3 FHG18C3		
	FHG15C3 / FHD15C3Z		FHG18C3 / FHD18C3Z							S	DD	SDD	S	DD	SDD
	PNEUMATIC	UNIQUE(SE)	PNEUMATIC	UNIQUE(SE)		mm	mm			mm	mm	deg	S	DD	SDD
VFHM360	1400	1400	1600	1600	3600	1745	4630	740	6-6	2635	2665	2745	2795	2810	2890
VFHM400	1400	1400	1600	1600	4000	1870	5030	865	6-6	2660	2690	2770	2820	2835	2915
VFHM435	1350 *1400	1400 *1400	1550 *1600	1600 *1600	4350	1995	5380	990	6-6 *6-6	2685	2715	2795	2845	2860	2940
VFHM480	1300 *1350	1350 *1350	1400 *1550	1450 *1550	4800	2145	5830	1140	6-6 *6-6	2710	2740	2820	2870	2885	2965
VFHM500	1100 *1300	1300 *1300	1150 *1500	1350 *1500	5000	2245	6030	1240	6-6 *6-6	2730	2760	2840	2890	2905	2985
VFHM540	850 *1250	1100 *1250	900 *1400	1100 *1400	5400	2370	6430	1365	3-6 *3-6	2750	2780	2860	2910	2925	3005
VFHM600	550 *1100	750 *1100	550 *1250	750 *1250	6000	2595	7030	1590	3-6 *3-6	2815	2845	2925	2975	2990	3070
VFHM650	*950	*950	*1100	*1100	6500	2810	7530	1805	*3-3	2860	2890	2970	3020	3035	3115
VFHM700	*750	*750	*750	*750	7000	3030	8030	2025	*3-3	2900	2930	3010	3060	3075	3155

NOTE : (1) For height without backrest: -505mm

(2) For free lift without backrest: +500mm

Weight for without backrest: -20kg

(3) Weight for diesel model: +110kg(TD27)

#### NOTE :

Rated capacity with (\*): Shows capacity with front dual tires.

Service weight of VM/VFM550-600 and of VFHM650-700 represents the weight of vehicles equipped with "special dual tires".

Lifting speed with VFM/VFHM mast: with VFM FHG 480mm/s with load. 560mm/s without load.

FHD 510mm/s with load. 540mm/s without load.

with VFHM FHG 540mm/s with load. 620mm/s without load.

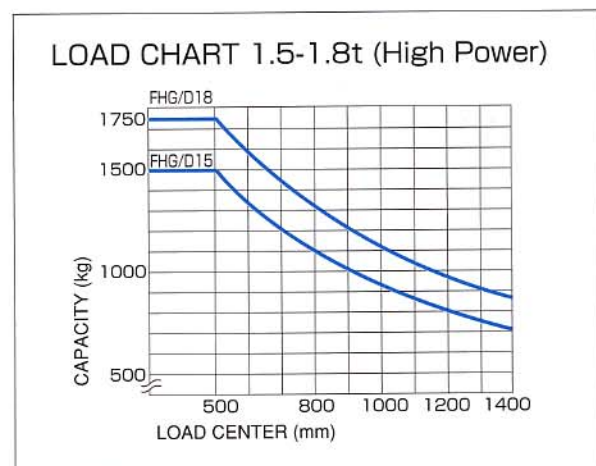
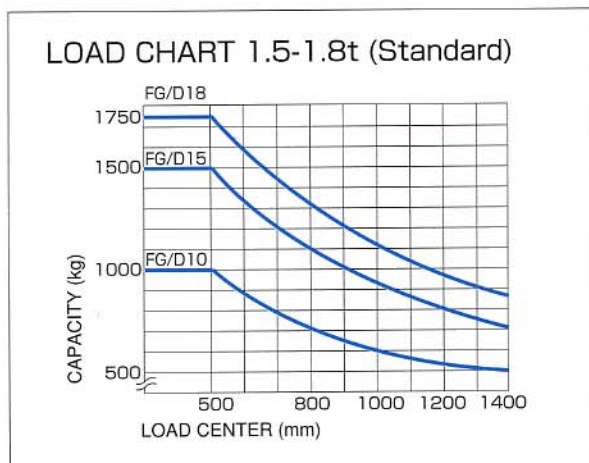
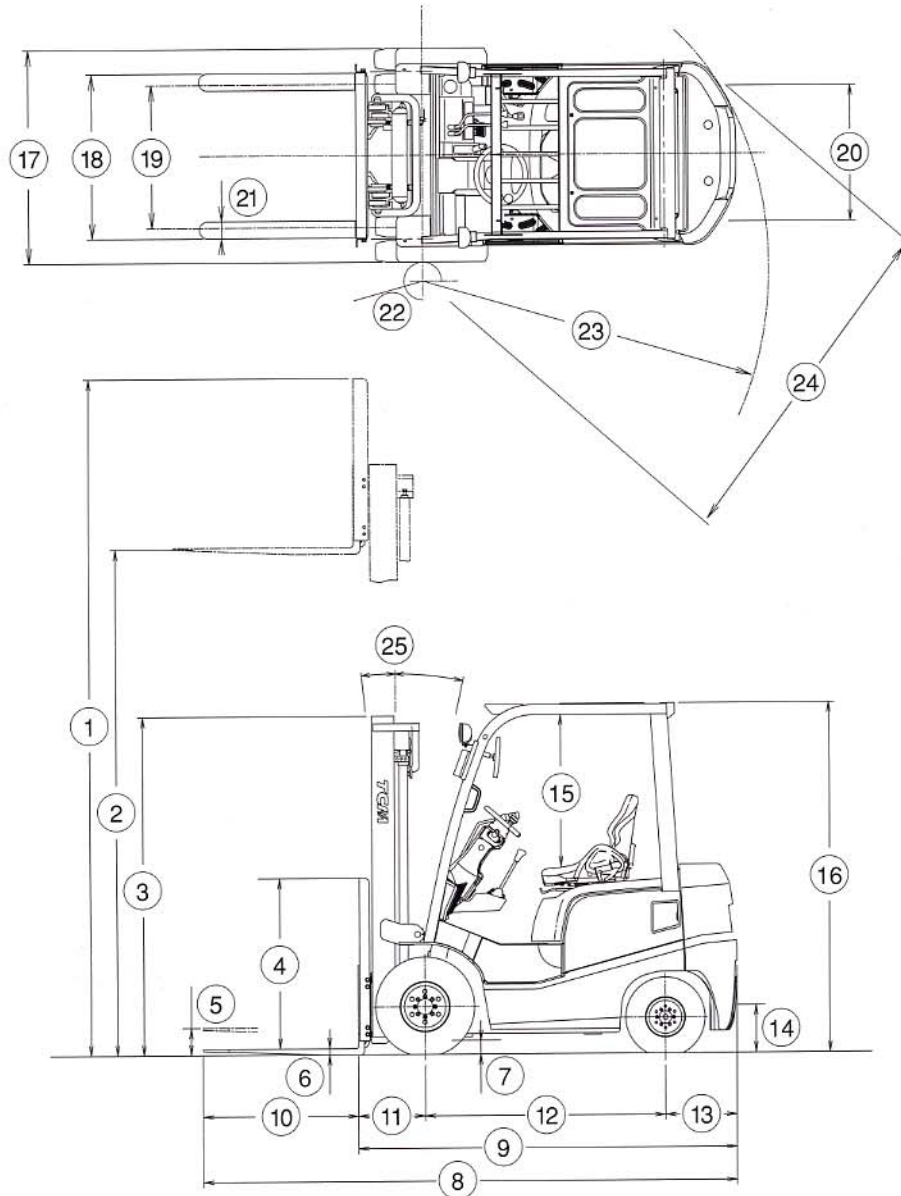
FHD 560mm/s with load. 600mm/s without load.

Lowering speed with VFM/VFHM mast: 420mm/s with load. 370mm/s without load.

Overall vehicle length with VFM mast: +10mm longer than of standard model with VM mast.

with VFHM mast: +25mm longer than of standard model with VM mast.

GROUND CLEARANCE	FD / FG15	FHD / FHG15
	FD / FG18	FHD / FHG18
	mm	mm
Mast	110	110
Frame	105	105
Front axle	125	125
Rear axle	125	125
Counter weight	135	135





## STANDARD DIMENSIONS

### STANDARD DIMENSIONS

Model	FD / FG15 FHD / FHG15	FD / FG18 FHD / FHG18
	mm	mm
① Overall height, fork raised(with backrest)	4030	
② Maximum fork height	3000	
③ Mast height, fork lowered	1995	
④ Backrest height	1000	
⑤ Free lift	155	
⑥ Fork thickness	35	
⑦ Minimum ground clearance	105	
⑧ Overall length(with forks)	3165	3195
⑨ Length to fork face	2245	2275
⑩ Fork length	920	
⑪ Load distance	395	
⑫ Wheelbase	1425	
⑬ Rear overhang	425	455
⑭ Drawbar Pin Center Height	495	
⑮ Overhead guard clearance(from face of seat)**	FD / FG15·18=1035	FHD / FHG15·18=1005
⑯ Overall height(overhead guard)**	2070	
⑰ Overall width	1070	1100
⑱ Fork spread(outside)	200 - 920	
⑲ Tread (front)	890	920
⑳ Tread (rear)	920	
㉑ Fork width	100	
㉒ Inside turning radius	110	95
㉓ Outside turning radius	1980	2010
㉔ Minimum intersecting aisle	1780	1800
㉕ Tilt angles(forward-backward)	6° - 12°	

NOTE : \*\*European(EXE) and Scandinavian (EXN) export trucks: +60mm

### DIMENSIONS WITH FRONT DUAL DRIVE WHEELS (option)

Model	FD / FG15 FHD / FHG15	FD / FG18 FHD / FHG18
	mm	mm
<b>Tire size (front dual Type: DD)</b>	<b>4 x 4.50-12-8PR JL</b>	
⑰ Overall width	1255	
⑲ Tread (front)	980	
㉒ Inside turning radius	90	
㉓ Outside turning radius	2020	2050
㉔ Minimum intersecting aisle	1840	1860
<b>Tire size (front dual Type: SDD)</b>	<b>4 x 6.50 -10-10PR JL</b>	
⑰ Overall width	1512	
⑲ Tread (front)	1110	
㉒ Inside turning radius	90	
㉓ Outside turning radius	2095	2120
㉔ Minimum intersecting aisle	1940	1960

## STANDARD EQUIPMENT AND ACCESSORIES

### [Equipment]

- Adjustable ORS seat with belt
- Asbestos-free brake shoe material
- Cylinder type bonnet latch with locking function
- Donaldson dry type cyclopac air-cleaner
- Drawbar device
- Durable overhead guard with resin screen
- Engine auto glow system (Diesel)
- Engine idle-up device (Gasoline)
- Flow control valve
- Fuel water sedimenter (Diesel)
- Full hydrostatic power steering
- Full transistorized ignition (Gasoline)
- Hydraulic oil dipstick
- ITA Class II carriage
- J-lug pneumatic industrial tires
- Lift circuit cut-off valve
- Load backrest
- Radiator coolant reservoir
- Return hydraulic filter
- Suction hydraulic strainer
- Tilt lock valve
- Transmission oil dipstick (power shift T/M)
- Transmission oil filter (power shift T/M)
- Wide view two stage mast(VM300)
- 2-spool control valve with pressure relief
- 920mm forks

### [Controls]

- Electric shift control lever (power shift T/M)
- Lift and tilt levers
- Multi-function switch lever with self-cancelling mechanism (Lighting & turn-signal)
- Neutral safety mechanism
- Parking brake lever with inter-lock
- Tilt adjustable steering post

### [Accessories]

- Access-assisted hand grip
- Back-up buzzer
- Back-up lights
- Deluxe floor mat
- Detachable and portable glove box
- Electric horn
- Front combination lights (turn signal, clearance)
- Head lights - traffic purpose
- High-mounted rear combination lights
- Operator tool kit
- Pen/ Cup holder
- Side view mirrors

### [Instruments and Switch]

- Charge indicator
- Engine oil pressure warning indicator
- Fuel gauge
- Fuel water sedimenter indicator (Diesel)
- Glow indicator (Diesel)
- Hourmeter
- Ignition key engine stop (Diesel)
- Neutral safety switch
- Water temperature gauge

## OPTIONAL LOADING ATTACHMENT

- Alternative fork lengths
- Alternative lengths fork extension sleeve
- Bale clamp
- Carton clamp
- Crane arm
- Drum clamp
- Fork clamp
- Fork positioner hydraulic type (Integral)
- High, wide type load backrest
- Hinged forks/ bucket
- Load push-pull
- Load stabilizer
- Ram attachment
- Rotating forks (Hook-on/ Integral type)
- Rotating paper roll clamp (Hook-on/ Integral type)
- Side-shifter (Hook-on/ Integral)
- Sleeve-in hook
- Wide type fork carriage
- Wide view full free 2-stage (VFM) mast
- Wide view full free 3-stage (VFHM) mast

## OPTIONAL EQUIPMENT AND ACCESSORIES

### [Equipment]

- Air Boss tires (TRA)
- Auxiliary hydraulic valve modules (max. 5spool)
- Central greasing system (CL)
- Color tire (white, green)
- Dual element aircleaner (ADE)
- Exhaust purify catalytic muffler (EPM)
- Fingertip hydraulic valve control (max. 4spool)(FIT)
- Fishery industry package (FC)
- Front dual drive wheels (DD/ SDD)
- Full open cabine (AW 061)
- Head light guard (HLG)
- Heater (HR)
- Interlock system (travel & load/unload)(SIL)
- Lift lock mechanism (VLL)
- LPG exclusive/ Dual fuel (LPG - Gasoline) package
- Overhead exhaust system (TUE)
- Overhead guard/ High profile 2130mm (HGH060)
- Overhead guard/ Low profile 1995mm (HGL)
- Plate fin type radiator (RAD PF)
- Pre-cleaner engine air intake (CAK B)
- Radiator dust screen (fine, medium mesh)(DSR)
- Smoke reduction/spark arrester muffler (Diesel)(CBM)
- Steering knob auto-return mechanism (SRS)
- Unique cushion tires (SE)

### [Accessories]

- Custom paint-work
- Fire extinguisher (FE)
- Rear working light (RWL)
- Rotating warning light (RLY/RLR)
- Tilt cylinder boots (TLB)

### [Instruments and Switch]

- Ammeter (AM)
- O.K. monitor (fuel level, battery electrolyte level, coolant level, parking brake, air-cleaner, seat-belt)
- Speedometer (SM)
- Torque converter oil pressure gauge (TPM)
- Torque converter oil temperature gauge (power shift T/M)

Others on request

## NOTE :

- Meets following major standards and code:  
ISO 1074 Counter Balanced Lift Trucks, Stability & Safety Test (Int'l)  
ISO 3691 Powered industrial trucks - safety code  
JIS D6001 Industrial Lift Trucks (Japan)  
JIS D6011 Stability & Safety Test (Japan)
- Overhead guard meets ISO 6055, JIS 6021
- In conformity with provision of the Machinery Directive 98/37/EC, as amended, and with National implementing legislation:  
(European and Scandinavian export trucks)
- Specifications are subject to change without notice and its may vary depending on markets.  
Please consult your TCM representative for details.

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