

VELIA ES (1.2 - 2.5 TONS)

LOW LEVEL ORDER PICKERS



OPB20N2X

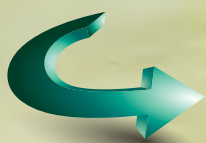
OPB20N2

OPB20N2P

OPB12N2(F)(P)/OPB20-25N2(X)(P) Series

WHEN
RELIABILITY IS
EVERYTHING...

EMPOWER YOUR OPERATOR... TRANSFORM YOUR OPERATIONS



SMALL TURNING CIRCLE



STEERING SYSTEM

- **Small turning circle** together with responsive steering and compact chassis allows exceptional manoeuvrability.
- **Advanced electric steering** allows precise control at speed, with automatic speed reduction in curves and automatic drive wheel centering.
- **100° steering angle** ensures exceptional manoeuvrability – even in tight spaces.

BRAKES

- **Regenerative braking** with no drive wheel jamming or brake wear gives effective control and excellent energy efficiency.
- **Anti-lock brakes** ensure safe stopping – even on slippery surfaces – for ultimate safety.

Energy Efficiency at the top of its class

*It is 14% more efficient than its
closest competitor – meaning you
can work as leanly as possible.*



DRIVE

- **Class-leading energy efficiency** (14% lower than nearest competitor) ensures running costs are kept to a minimum.
- **Powerful drive motor** provides excellent traction and adjustable acceleration, deceleration and brake force, for smooth, quiet, controlled operation, extended shift length and lower maintenance requirements.
- **Sensitive Drive System (SDS)** senses faster or slower operator control movements and adjusts truck performance accordingly, contributing to safety and driver performance.
- **Adaptive steering system** ensures truck performance matches operator needs – whether travelling in reverse or at speed – for calm, smooth and precise operations.

ELECTRICAL AND CONTROL SYSTEMS

- **Full electronic steering** with no steering wheel kickback gives precise control for optimum productivity, efficiency and safety.

WORK WITH GREATER PRODUCTIVITY



FORKS

- **Bevelled easy-entry forks** offer effortless pallet entry: reducing time and risk of pallet damage for increased efficiency.
- **Choice of long forks** ensures scissor lift models can carry up to four rollcages at once for increased efficiency (X models only).

FRAME AND BODY

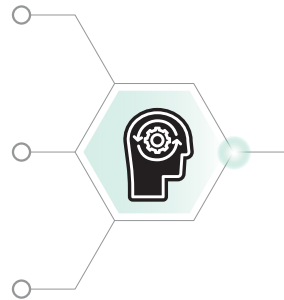
- **Robust design** benefits from extensive testing – including safety certification – for lower service costs and enhanced safety.
- **Class-leading lift height** – up to 220 mm – offers high ground clearance for easy and safe handling on loading docks and ramps (Standard models).

Operator Environment and Controls

Flying start technology shortens acceleration time for ultimate picking productivity.

Next generation Maxius steering wheel absorbs vibrations and shocks to ensure class-leading ergonomics.

Optional clear colour display alerts operators and service engineers to potential problems: avoiding damage, while enhancing safety and encouraging good maintenance.



Easy-access platform features low step height and chamfered edges – minimising trip hazards for easy on/off access.

Rising operator platform lifts to 855 mm for picking heights of up to 2.5 m – minimising stretching and straining for operators (P models only).

Perfectly-angled footrest ensures optimal positioning of foot and ankle for drivers of all heights.



Super-grip floor is non-slip ensuring operators are safe, for confident operations.

Triple-suspension floating floor with sideways dampening and advanced cushioning, reduces microvibrations for exceptional operator comfort.

SPECIFICATIONS

CHARACTERISTICS					
1	Manufacturer		Mitsubishi Forklift Trucks	Mitsubishi Forklift Trucks	Mitsubishi Forklift Trucks
2	Manufacturer's model designation		OPB20N2	OPB25N2	OPB20N2P
3	Power source		Battery	Battery	Battery
4	Operator type		Stand-on	Stand-on	Stand-on
5	Load capacity	Q kg	2000	2500	2000
6	Load center distance	c mm	600	600	600
7	Load wheel axle to fork face (forks lowered)	x mm	960	960	960
8	Wheelbase	y mm	2054 ⁵⁾	2054 ⁵⁾	2054 ⁵⁾
WEIGHT					
9	Truck weight without load, with maximum battery weight	kg	1079 ¹⁾	1079 ¹⁾	1215 ¹⁾
10	Axle loadings with nominal load & maximum battery weight, drive / load side	kg	1082 / 1997	1178 / 2401	1130 / 2085
11	Axle loadings without load & with maximum battery weight, drive / load side	kg	829 / 250	829 / 250	913 / 302
WHEELS, DRIVE TRAIN					
12	Tyres: PT = Power Thane, Vul = Vulkollan, P = Polyurethane, N = Nylon, R = Rubber drive / load side		Vul / Vul	Vul / Vul	Vul / Vul
13	Tyre dimensions, drive side	mm	ø250	ø250	ø250
14	Tyre dimensions, load side	mm	ø85	ø85	ø85
15	Castor wheel dimensions (diameter x width)	mm	ø180 x 65	ø180 x 65	ø180 x 65
16	Number of wheels, load / drive side (x = driven)		4 / 1x1	4 / 1x1	4 / 1x1
17	Track width (center of tyres), drive side	b10 mm	494	494	494
18	Track width (center of tyres), load side	b11 mm	365	365	365
DIMENSIONS					
19	Height with mast lowered	h1 mm	1173	1173	1394 / 2244
20	Lift height	h3 mm	135	135	135
21	Height with mast extended	h4 mm	-	-	-
22	Seat- or stand height	h7 mm	123	123	150
23	Platform height, raised	h12 mm	-	-	1000
24	Fork height, fully lowered	h13 mm	85	85	85
25	Overall length	l1 mm	2421 ⁵⁾	2421 ⁵⁾	2421 ⁵⁾
26	Length to fork face	l2 mm	1271 ⁵⁾	1271 ⁵⁾	1271 ⁵⁾
27	Overall width	b1/b2 mm	800	800	800
28	Fork dimensions (thickness, width, length)	s/e/l mm	60 / 175 / 900-3600	60 / 175 / 900-3600	60 / 175 / 900-3600
29	Outside width over forks (minimum / maximum)	b5 mm	480 / 660	480 / 660	480 / 660
30	Ground clearance at center of wheelbase, (forks lowered)	m2 mm	25	25	25
31	Working aisle width (Ast) with 800 x 1200 mm pallets, load lengthwise	Ast mm	2898 ⁵⁾	2898 ⁵⁾	2898 ⁵⁾
32	Turning radius	Wa mm	2231 ⁵⁾	2231 ⁵⁾	2231 ⁵⁾
PERFORMANCE					
33	Travel speed, with / without load	km/h	9.0 / 9.0 (opt 9 / 13)	9.0 / 13.0	9.0 / 9.0 (opt 9 / 13)
34	Lifting speed, with / without load	m/s	0.04 / 0.05	0.03 / 0.05	0.04 / 0.05
35	Lowering speed, with / without load	m/s	0.05 / 0.03	0.05 / 0.03	0.05 / 0.03
36	Gradeability, with / without load	%	7 / 15	7 / 15	7 / 15
37	Service brake		Electric	Electric	Electric
ELECTRIC MOTORS					
38	Drive motor capacity (60 min. short duty)	kW	2.6	2.6	2.6
39	Lift motor output at 15% duty factor	kW	1.2	1.2	2.2
40	Battery voltage/capacity at 5-hour discharge	V/Ah	24 / 465-620	24 / 465-620	24 / 465-620
41	Battery weight	kg	366-493	366-493	366-493
42	Energy consumption according to EN 16796	kWh/h	0.37	0.4	0.37
MISCELLANEOUS					
43	Type of drive control		Stepless	Stepless	Stepless
44	Level of noise at the ear level of the driver according to EN 12 053:2001 and EN ISO 4871 in work LpAZ	dB(A)	62 ³⁾	62 ³⁾	62 ³⁾
45	Level of noise at the ear level of the driver according to EN 12 053:2001 and EN ISO 4871, drive/lift/idle LpAZ	dB(A)	73 / 62 / - ³⁾	73 / 62 / - ³⁾	73 / 62 / - ³⁾
46	Whole-body vibration (EN 13 059:2002)		0.6	0.6	0.6
47	Hand-arm vibration (EN 13 059:2002)		<2.5	<2.5	<2.5

Continuing improvement may lead to changes in these specifications.

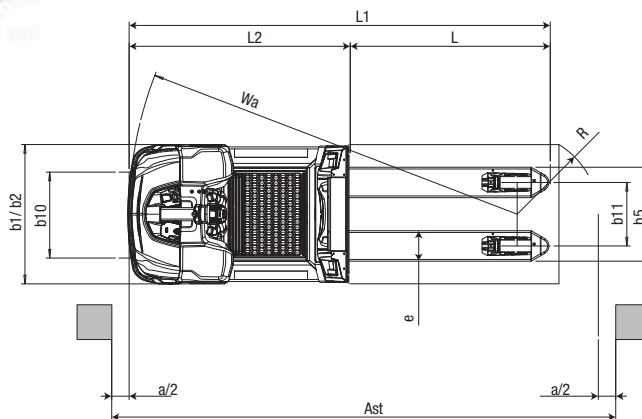
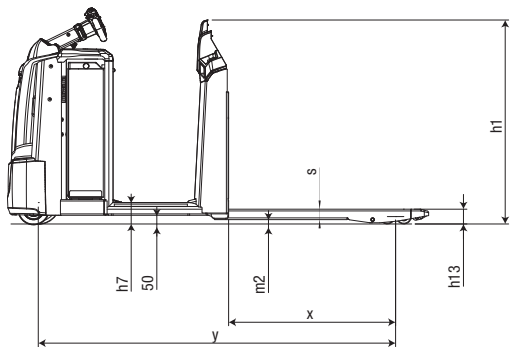
- 1) Forks 540 x 1150, battery 620 Ah
- 2) Forks 540 x 1150/ lift 1200mm, battery 620 Ah
- 3) Inaccuracy of 4 dB(A)
- 4) Fork carriage length 2375 mm
- 5) With 620Ah battery + 100mm

- Ast = $Wa - x + l6 + 200$
 Ast = Working aisle width
 Wa = Turning radius
 a = Safety clearance = 2×100 mm
 $R = \sqrt{(l6 + x)^2 + (b12 / 2)^2}$
 l6 = Pallet length (800 or 1000 mm)
 b12 = Pallet width (1200 mm)

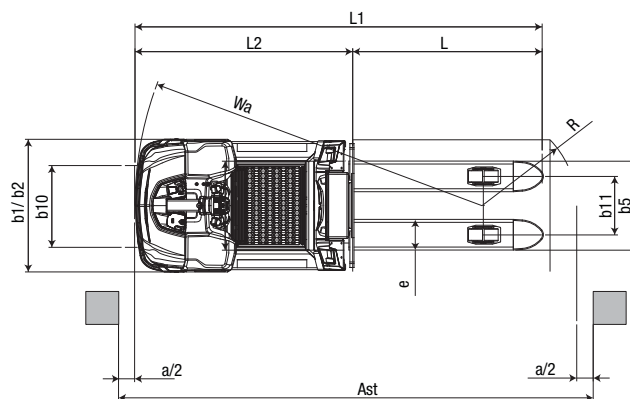
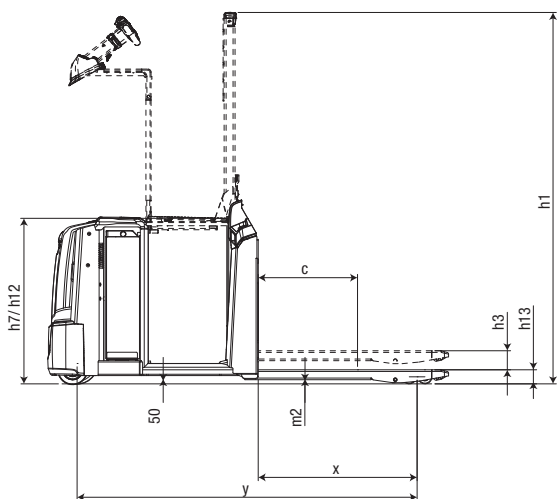
Mitsubishi Forklift Trucks
OPB25N2P
Battery
Stand-on
2500
600
960
2054 ⁵⁾
1215 ¹⁾
1223 / 2492
913 / 302
Vul/ Vul
ø250
ø85
ø180 × 65
4 / 1x1
494
365
1394 / 2244
135
-
150
1000
85
2421 ⁵⁾
1271 ⁵⁾
800
60 / 175 / 900-3600
480 / 660
25
2898 ⁵⁾
2231 ⁵⁾
9.0 / 13.0
0.03 / 0.05
0.05 / 0.03
7 / 15
Electric
2.6
2.2
24 / 465-620
366-493
0.4
Stepless
62 ³⁾
73 / 62 / - ³⁾
0.6
<2.5



OPB20N2 / 25N2 STANDARD MODEL



OPB20N2P / 25N2P RISING PLATFORM MODEL



SPECIFICATIONS

CHARACTERISTICS					
1	Manufacturer		Mitsubishi Forklift Trucks	Mitsubishi Forklift Trucks	Mitsubishi Forklift Trucks
2	Manufacturer's model designation		OPB20N2X	OPB20N2XP	OPB12N2F
3	Power source		Battery	Battery	Battery
4	Operator type		Stand-on	Stand-on	Stand-on
5	Load capacity	Q kg	2000	2000	1200
6	Load center distance	c mm	1200	1200	600
7	Load wheel axle to fork face (forks lowered)	x mm	1480	1480	785
8	Wheelbase	y mm	2640 ⁵⁾	2640 ⁵⁾	1929 ⁵⁾
WEIGHT					
9	Truck weight without load, with maximum battery weight	kg	1333 ¹⁾	1469 ¹⁾	1220 ²⁾
10	Axle loadings with nominal load & maximum battery weight, drive / load side	kg	1135 / 2220	1230 / 2261	972 / 1448
11	Axle loadings without load & with maximum battery weight, drive / load side	kg	929 / 404	1024 / 445	853 / 367
WHEELS, DRIVE TRAIN					
12	Tyres: PT = Power Thane, Vul = Vulkollan, P = Polyurethane, N = Nylon, R = Rubber drive / load side		Vul / Vul	Vul / Vul	Vul / Vul
13	Tyre dimensions, drive side	mm	ø250	ø250	ø250
14	Tyre dimensions, load side	mm	ø85	ø85	ø85
15	Castor wheel dimensions (diameter x width)	mm	ø180 × 65	ø180 × 65	ø180 × 65
16	Number of wheels, load / drive side (x = driven)		4 / 1x1	4 / 1x1	4 / 1x1
17	Track width (center of tyres), drive side	b10 mm	494	494	494
18	Track width (center of tyres), load side	b11 mm	326 / 356	326 / 356	355
DIMENSIONS					
19	Height with mast lowered	h1 mm	1173	1394 / 2244	1173
20	Lift height	h3 mm	765	765	765 / 1115
21	Height with mast extended	h4 mm	1305	1305	1275 / 1625
22	Seat- or stand height	h7 mm	123	150	123
23	Platform height, raised	h12 mm	-	1000	-
24	Fork height, fully lowered	h13 mm	90	90	85
25	Overall length	l1 mm	3728 ^{4) 5)}	3728 ^{4) 5)}	2471 ⁵⁾
26	Length to fork face	l2 mm	1353 ^{4) 5)}	1353 ^{4) 5)}	1321 ⁵⁾
27	Overall width	b1/b2 mm	800	800	800
28	Fork dimensions (thickness, width, length)	s/e/l mm	70 / 194 / 2375, 2850	70 / 194 / 2375, 2850	56 / 186 / 950-1450
29	Outside width over forks (minimum / maximum)	b5 mm	520 / 550	520 / 550	540 / 570
30	Ground clearance at center of wheelbase, (forks lowered)	m2 mm	20	20	25
31	Working aisle width (Ast) with 800 x 1200 mm pallets, load lengthwise	Ast mm	4074 ^{4) 5)}	4074 ^{4) 5)}	2881 ⁵⁾
32	Turning radius	Wa mm	2833 ⁵⁾	2833 ⁵⁾	2106 ⁵⁾
PERFORMANCE					
33	Travel speed, with / without load	km/h	9.0 / 13.0	9.0 / 13.0	9.0 / 9.0 (opt 9 / 13)
34	Lifting speed, with / without load	m/s	0.10 / 0.23	0.10 / 0.23	0.20 / 0.41
35	Lowering speed, with / without load	m/s	0.17 / 0.23	0.17 / 0.23	0.30 / 0.36
36	Gradeability, with / without load	%	7 / 15	7 / 15	7 / 15
37	Service brake		Electric	Electric	Electric
ELECTRIC MOTORS					
38	Drive motor capacity (60 min. short duty)	kW	2.6	2.6	2.6
39	Lift motor output at 15% duty factor	kW	2.2	2.2	2.2
40	Battery voltage/capacity at 5-hour discharge	V/Ah	24 / 465-620	24 / 465-620	24 / 465-620
41	Battery weight	kg	366-493	366-493	366-493
42	Energy consumption according to EN 16796	kWh/h	0.44	0.44	0.37
MISCELLANEOUS					
43	Type of drive control		Stepless	Stepless	Stepless
44	Level of noise at the ear level of the driver according to EN 12 053:2001 and EN ISO 4871 in work LpAZ	dB(A)	62 ³⁾	62 ³⁾	62 ³⁾
45	Level of noise at the ear level of the driver according to EN 12 053:2001 and EN ISO 4871, drive/lift/idle LpAZ	dB(A)	73 / 62 / - ³⁾	73 / 62 / - ³⁾	73 / 62 / - ³⁾
46	Whole-body vibration (EN 13 059:2002)		0.7	0.7	0.6
47	Hand-arm vibration (EN 13 059:2002)				<2.5

Continuing improvement may lead to changes in these specifications.

- 1) Forks 540 × 1150, battery 620 Ah
- 2) Forks 540 × 1150/ lift 1200mm, battery 620 Ah
- 3) Inaccuracy of 4 dB(A)
- 4) Fork carriage length 2375 mm
- 5) With 620Ah battery + 100mm

- Ast = $Wa - x + l6 + 200$
 Ast = Working aisle width
 Wa = Turning radius
 a = Safety clearance = 2×100 mm
 $R = \sqrt{(l6 + x)^2 + (b12 / 2)^2}$
 l6 = Pallet length (800 or 1000 mm)
 b12 = Pallet width (1200 mm)

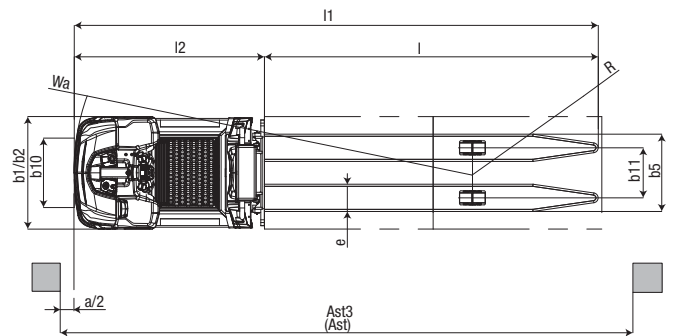
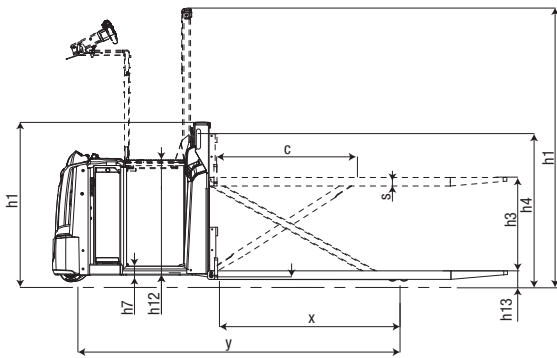
Mitsubishi Forklift Trucks
OPB12N2FP
Battery
Stand-on
1200
600
785
1929 ⁵⁾
1356 ²⁾
1059 / 1497
940 / 416
Vul / Vul
ø250
ø85
ø180 × 65
4 / 1x1
494
355
1394 / 2244
765 / 1115
1275 / 1625
150
1000
85
2471 ⁵⁾
1321 ⁵⁾
800
56 / 186 / 950-1450
540 / 570
25
2881 ⁵⁾
2106 ⁵⁾
9.0 / 9.0 (opt 9 / 13)
0.20 / 0.41
0.30 / 0.36
7 / 15
Electric
2.6
2.2
24 / 465-620
366-493
0.37
Stepless
62 ³⁾
73 / 62 / - ³⁾
0.6
<2.5



OPB20N2XP
SCISSOR LIFT FORKS AND
RISING PLATFORM MODEL



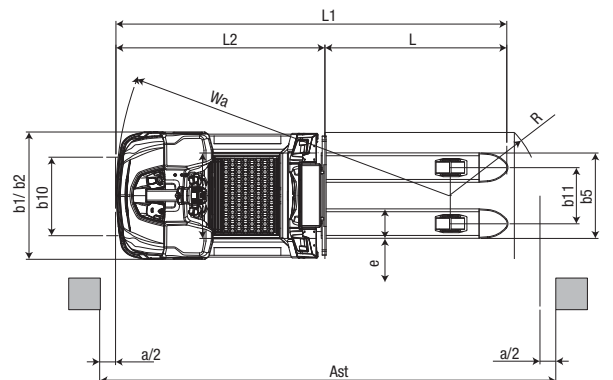
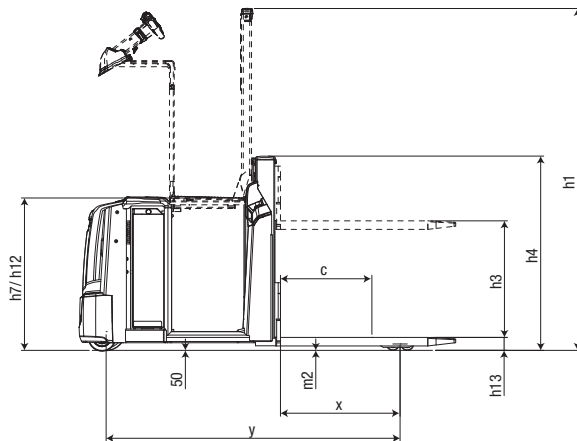
OPB20N2X
SCISSOR LIFT FORKS MODEL



OPB12N2F
RISING FORKS MODEL



OPB12N2FP
RISING FORKS AND
RISING PLATFORM MODEL



STANDARD EQUIPMENT & OPTIONS

● = Standard ▲ = Option



Multifunctional steering wheel with optional color display.



Optional walk beside drive button and buttons for lift or lower in backrest.



Fire extinguisher.



Optional blue point safety light.

	OPB20N2
GENERAL	
Multifunctional steering wheel (electric 200°)	●
Power ON/OFF by Key switch	●
Hourmeter & BDI	●
ECO/PRO mode	●
Drive speed reduction in curves	●
Maximum drive speed adjusted according to load weight	●
Floor mat acting as dead man's pedal	●
Crane battery change	●
Polyurethane wheels	●
Tandem load wheels polyurethane	●
Suspended operator's platform	●
Simultaneously driving and lifting the forks	●
Hill hold	●
Automatic parking brake	●
Lifting driver's platform, h=1000 mm (OPB20N2/25N2P, 20N2XP, 12N2FP)	—
Lift height (h3 + h13) 220 mm (OPB20N2/25N2, OPB12N2FP)	●
Lift height (h3 + h13) 850 mm (OPB12N2F, OPB12N2FP)	—
Lift height (h3 + h13) 855 mm (OPB20N2X/25N2XP)	—
Simultaneous driving and lifting the driver's platform	—
Drive speed reduction when platform raised (4 km/h)	—
Drive speed reduction when forks raised (lift height > 300 mm)	—
ENVIRONMENT	
Cold store design, 0°C to -35°C	▲
DRIVE AND LIFT CONTROLS	
Walk beside drive button in backrest, FWD/BWD	▲
Buttons for lift / lower on sides of backrest	▲
SAFETY	
Blue point safety light towards driving direction (forks trailing)	▲
Driving light towards driving direction (forks trailing)	▲
Warning strobe, yellow	▲
Drive alarm (programmable)	▲
Fire extinguisher	▲
WHEEL OPTIONS	
Polyurethane traction and load wheels	●
Power friction traction wheel	▲
OUTLOOK	
Special RAL color on front machinery steel cover	▲
OTHER OPTIONS	
High drive speed 13 km/h (without load)	▲
PIN code access with BDI display	▲
PIN code access with color display	▲
Color display without PIN code access	▲
Walk beside drive button in backrest, FWD / BWD	▲
Buttons for lift/lower on sides of backrest	▲
Accessory rail in front	▲
Picking tray, for OPB20/25N2P, OPBN2XP & OPB12N2FP models only. Max 50kg	—
Scanner holder	▲
Equipment holder (RAM mountings)	▲
Wrapping holder	▲
Load backrest	▲
Rear grab handle on backrest	▲
Foot switch for lowering the driver's platform	—
Sideways battery change	▲
Clipboard, A4	▲
Front storage boxes	▲
Storage folder on bottom of the platform	▲
Entry and exit rollers for crosswise pallet handling	▲
Back cushion, tiltable to seat position for back & feet rest. Adjustable in height.	▲
Power supply, 12 V	▲
Power supply, USB 5 V	▲
Heavy duty front nylon strip covered bumper	▲
Raised front guard plate	▲

Like any product bearing the "MITSUBISHI" name our materials handling equipment benefits from the tremendous heritage, huge resources and cutting-edge technology of one of the world's largest corporations – Mitsubishi Heavy Industries Group.

Engineering spacecraft, jet planes, power plants and more, MHI specialises in those technologies where performance, dependability and superiority decide your success or failure...

So when we promise you quality, reliability and value for money, you know it's a guarantee we have the power to deliver.

That's why every model in our award-winning and comprehensive range of lift trucks and warehouse equipment is built to a high specification – to ensure it keeps working for you. Day after day. Year after year. Whatever the job. Whatever the conditions.

YOU'LL NEVER WORK ALONE

As your local authorised dealer, we are here to keep your trucks working – through our extensive experience, our technical excellence and our commitment to customer care.

We are your local experts, backed by efficient channels to the entire organisation of Mitsubishi Forklift Trucks.

No matter where you are, we are close by – with the capability to meet your needs.

Discover how Mitsubishi Forklift Trucks give you more from your local authorised dealer or when you visit our website www.mitforklift.com.sg

Performance specifications may vary depending on standard manufacturing tolerances, vehicle condition, types of tyres, floor or surface conditions, applications or operating environment. Trucks may be shown with non-standard options. Specific performance requirements and locally available configurations should be discussed with your distributor of Mitsubishi forklift trucks. We follow a policy of continual product improvement. For this reason, some materials, options and specifications could change without notice.

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