# movexx smart electric tugs



# TT1000-T M100

Introducing the TT1000-T by Movexx - a ground breaking electric tug for material handling. Continuously improved in design and technique, the TT1000-T excels in efficiency, power, and manoeuvrability. Ideal for tight spaces and heavy loads, it enhances productivity in warehouses and production facilities. Its advanced technology and ergonomic design set a new standard in intra logistic material handling, boosting reliability and efficiency.

#### Performance

The Movexx TT1000-T electric tug stands as a paragon of performance in the realm of material handling, offering a potent blend of power, efficiency, and precision. Engineered for the most demanding industrial applications, the TT1000-T excels in various aspects that contribute to its outstanding performance. The TT1000-T is the ideal smart electric tug to enhance worker efficiency and alleviate physical strain. It effortlessly moves carts and trolleys weighing up to 1,000 kg (2,200 lbs).

#### **Comfort**

The TT1000-T comes with a Lithium battery as standard. It is compact and interchangeable and can be easily recharged via the external charger at any convenient power socket for optimal operating time. All controls are located on the ergonomically designed tiller head. The double butterfly levers for travel control and the button for the (optional) clamping hook can be easily operated with both hands which ensures precise operation. The spring-loaded hook makes connecting the machine extremely quick and easy.

#### Safety

TT1000-T electric tug prioritizes safety in every aspect, ensuring a secure work environment. With advanced features like emergency braking systems, a safety reverse switch, and a Drive Control Lever, it protects operators and bystanders alike. Its stability makes it reliable for challenging outdoor environments, prevents risks and enhances operational security.

#### Reliability

The Movexx TT1000-T electric tug is synonymous with reliability, making it a market leader in dependable material handling solutions. Engineered with precision and durability in mind, it stands out as a robust and trustworthy option for various industrial applications. Equipped with a powerful electric drive system, the TT1000-T delivers consistent and efficient performance, effortlessly handling heavy loads while maintaining traction and control in challenging conditions. Combining robust construction, powerful performance, and innovative features, this tug is a testament to Movexx's dedication to providing equipment businesses can trust for their daily operations.







# STANDARD / OPTIONAL EQUIPMENT

#### **STANDARD**

- 4 km/h travel speed
- Automatic parking brake
- Full rubber drive wheels
- LiFePO<sub>4</sub> battery 24V, 20Ah
- Safety reverse switch on tiller head
- High-precision digital battery indication

#### **OPTIONAL**

- Strobe light
- Horn (87 or 103 dB)
- Ignition lock
- Hour counter
- Non-marking drive wheels
- Foam-filled drive wheels
- Electric clamping hook
- Lift system stroke 100mm (4 in.)
- LiFePO<sub>4</sub> battery 24V, 20Ah
- Remote control up to 50m (165 ft.)



- Metal components are made from double coated steel;
- Robust metal cover protects drive system and components;
- The adjustable tillerhead ensures the operator is at a safe yet comfortable distance from the tug.

### **Braking system**

**Features** 

- Direct forceful braking by reversing traction switch;
- Smooth braking by releasing Drive Control Lever;
- Immediate full braking by pressing the emergency stop;
- Directly reversing drive direction by hitting the safety reverse switch.

#### **Battery**

- 20Ah lithium LiFePO $_4$  battery with integrated battery management system;
- Ensures precise battery indication and optimal running time;
- Interchangeable battery. (1 extra battery can ensure 24-7 operation)

#### **External charger**

- Optimized charging process for maximum energy efficiency and lower energy costs;
- High performance: optimal use of battery capacity;
- Easy plug connection and fast charging. Input: 100-240Vac. Output: 25.6Vdc, 10A.

#### **Controls & Display**

- Multiple control switches grouped on ergonomic tiller head;
- DCL; Drive Control Lever usable for left and right-handed;
- Safety reverse switch on top of tiller head for optimal operator safety;
- Reliable and precise battery indicator.





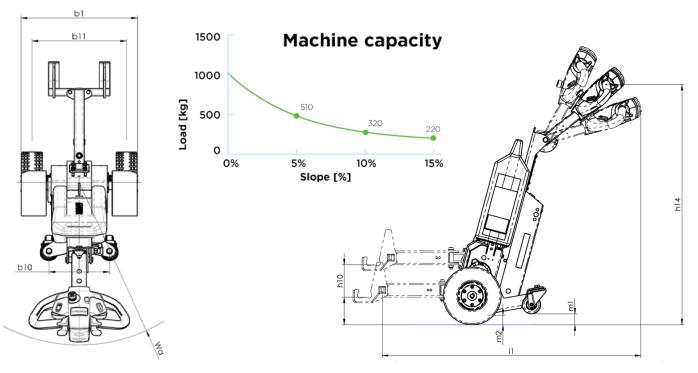
# **TECHNICAL DATA TT1000-T M100**

According to VDI 2198 in Metric units.

ķ	1.1	Manufacturer			Movexx International B.V.
Characteristics	1.2	Manufacturer's type designation			TT1000-T M100
	1.3	Drive			Electric with LiFePO <sub>4</sub> battery
	1.4	Operator type			Tilting
	1.5*	Rated capacity/rated load*		Q [t]	1
	1.7**	Rated drawbar pull**		F [N]	345
¥	2.1	Weight incl. battery		kg	55
	2.3	Axle loading, without load	front/rear	kg	-/67
Tyres/Chassis	3.1	Tyres	front/rear		Solid Rubber
	3.3	Tyres size	rear	mm	250x84
	3.4	Auxiliary wheel size		mm	80x35
	3.5	Wheels, number $(x = driven)$	front/rear		-/x2
	3.6	Tread	front/rear	b <sub>10</sub> /b <sub>11</sub> [mm]	248/358
Dimensions	4.9	Tiller height	min-max	h <sub>14</sub> [mm]	926/1038/1155
	4.12	Tow coupling height	min-max	h <sub>10</sub> [mm]	120-260
	4.19	Overall length		I <sub>1</sub> [mm]	1117
	4.21	Overall width		b <sub>1</sub> [mm]	442
Ĕ	4.31	Ground clearance, auxiliary wheel		m <sub>1</sub> [mm]	45
Δ	4.32	Ground clearance, center of wheel base		m <sub>2</sub> [mm]	41
	4.35	Turning radius		Wa [mm]	665
	5.1	Travel speeds forwards	with/without load	km/h	4/4
ø	5.1.1	Travel speed backwards	with/without load	km/h	4/4
Performance	5.5**	Max drawbar pull (S2 = 60 min)	with load	N	345
	5.6**	Max drawbar pull (S2 = 5 min)	with load	N	690
	5.8*	Maximum slope (5 min)	with/without load	%	0/15
	5.9	Acceleration	with/without load	S	7/6
	5.10	Service brake			Electromagnetic
Drive	6.1	Drive motor output (S2 = 60 min)		kW	0.3
	6.4	Battery voltage/nominal capacity		V/Ah	24/20
	6.5	Battery weight		kg	8.4
Other	8.1	Type of drive unit			DC
	10.7	Sound level at operator's ear		dB(A)	<65

<sup>\*</sup> The maximum payload is affected by the type of slope, operating time and floor type. See the graphic below for an indication of the allowable slope to load ratio (depending on slope surface/wheel type/machine weight).

 $<sup>^{***}\,\</sup>mbox{All}$  values in this table have a tolerance of +/- 5%.



<sup>\*\*</sup> The maximum drawbar load on the hook [N] is determined by the engine power of the machine but is affected by the type of wheels of the machine and of the towed trolley/load, the type of surface and the drivable weight of the machine.

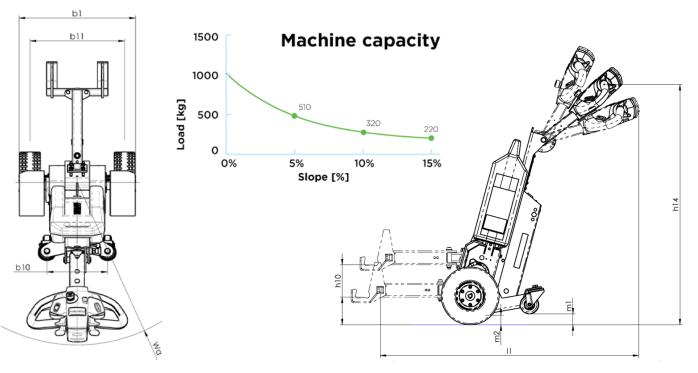
# **TECHNICAL DATA TT1000-T M100**

According to VDI 2198 in Imperial units.

Characteristics	1.1	Manufacturer			Movexx International B.V.
	1.2	Manufacturer's type designation			TT1000-T M100
	1.3	Drive			Electric with LiFePO₄ battery
	1.4	Operator type			Tilting
	1.5*	Rated capacity/rated load		Q [tn(US)]	1
	1.7**	Rated drawbar pull		F [lbf]	78
¥	2.1	Weight incl. battery		lb	121
	2.3	Axle loading, with load	front/rear	lb	-/148
Tyres/Chassis	3.1	Tyres	front/rear		Solid Rubber
	3.3	Tyres size	rear	in	9.8x3.3
	3.4	Auxiliary wheel size		in	3.2x1.4
	3.5	Wheels, number $(x = driven)$	front/rear		-/x2
	3.6	Tread	front/rear	$b_{10}/b_{11}$ [in]	9.5/14
Dimensions	4.9	Tiller height	min-max	h <sub>14</sub> [in]	36.5/41/45.5
	4.12	Tow coupling height	min-max	h <sub>10</sub> [in]	4.5-10.5
	4.19	Overall length		l <sub>1</sub> [in]	44
	4.21	Overall width		b <sub>1</sub> [in]	17.5
	4.31	Ground clearance, auxiliary wheel		m₁ [in]	1.8
	4.32	Ground clearance, center of wheel base		m <sub>2</sub> [in]	1.6
	4.35	Turning radius		Wa [in]	26
Performance	5.1	Travel speeds forwards	with/without load	mph	2.5/2.5
	5.1.1	Travel speed backwards	with/without load	mph	2.5/2.5
	5.5**	Max drawbar pull (S2 = 60 min)	with load	lbf	78
	5.6**	Max drawbar pull (S2 = 5 min)	with load	lbf	155
	5.8*	Maximum slope (5 min)	with/without load		0/15
	5.9	Acceleration	with/without load		7/6
	5.10	Service brake			Electromagnetic
Drive	6.1	Drive motor output (S2 = 60 min)		hp	0.4
	6.4	Battery voltage/nominal capacity			24/20
	6.5	Battery weight +/- 5%		lb	18.5
Other	8.1	Type of drive unit			DC
	10.7	Sound level at operator's ear		dB(A)	<65

<sup>\*</sup> The maximum payload is affected by the type of slope, operating time and floor type. See the graphic below for an indication of the allowable slope to load ratio (depending on slope surface/wheel type/machine weight).

<sup>\*\*\*</sup> All values in this table have a tolerance of +/- 5%.



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