



VACUUM TILTERS

T-series



1-30 tons



Modular vacuum tilters Aerolift T-series

- handling of precast concrete
- lifting & 90°/180° tilting in one movement
- handling capacity: 1–30 tons
- single or double hook attachment
- power supply: 400V AC
- safe handling
- easy to operate
- easy to maintain
- fast & efficient operation

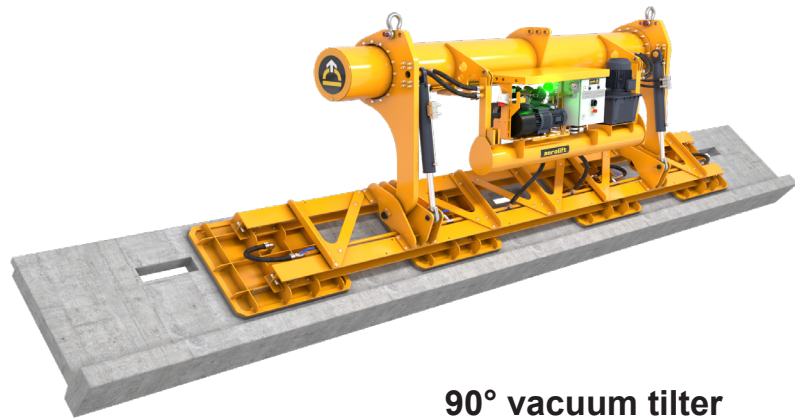
CONTENTS

Aerolift T-series	04
Specifications	06
Safety	10
Ease of use	12
Maintenance	14
Precast concrete	16
Tunnelling	18
About Aerolift	20
Other solutions	22
Agents	24
Inquiry checklist	25

AEROLIFT T-SERIES

We design, manufacture, and supply industrial lifting solutions that can handle loads ranging from 1 to 200 tons. As businesses often have specific needs, most of our machines are custom-made. By offering modular vacuum lifters we fulfill the need for an affordable handling solution for common applications.

Within the standard T-series vacuum tilters, we offer configurable modules. This allows us to deliver high quality in a shorter time and at a lower price. However, a hybrid solution — a combination of configurable and customized — is also possible.



90° vacuum tilter



180° vacuum tilters



Key benefits

Aerolift T-series vacuum tilters offer several benefits:

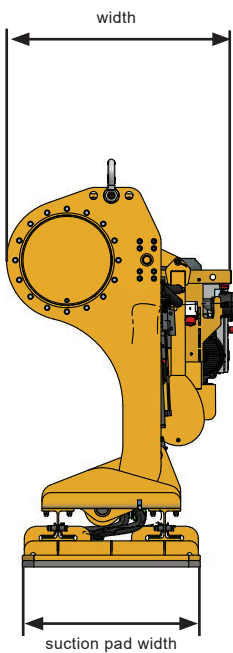
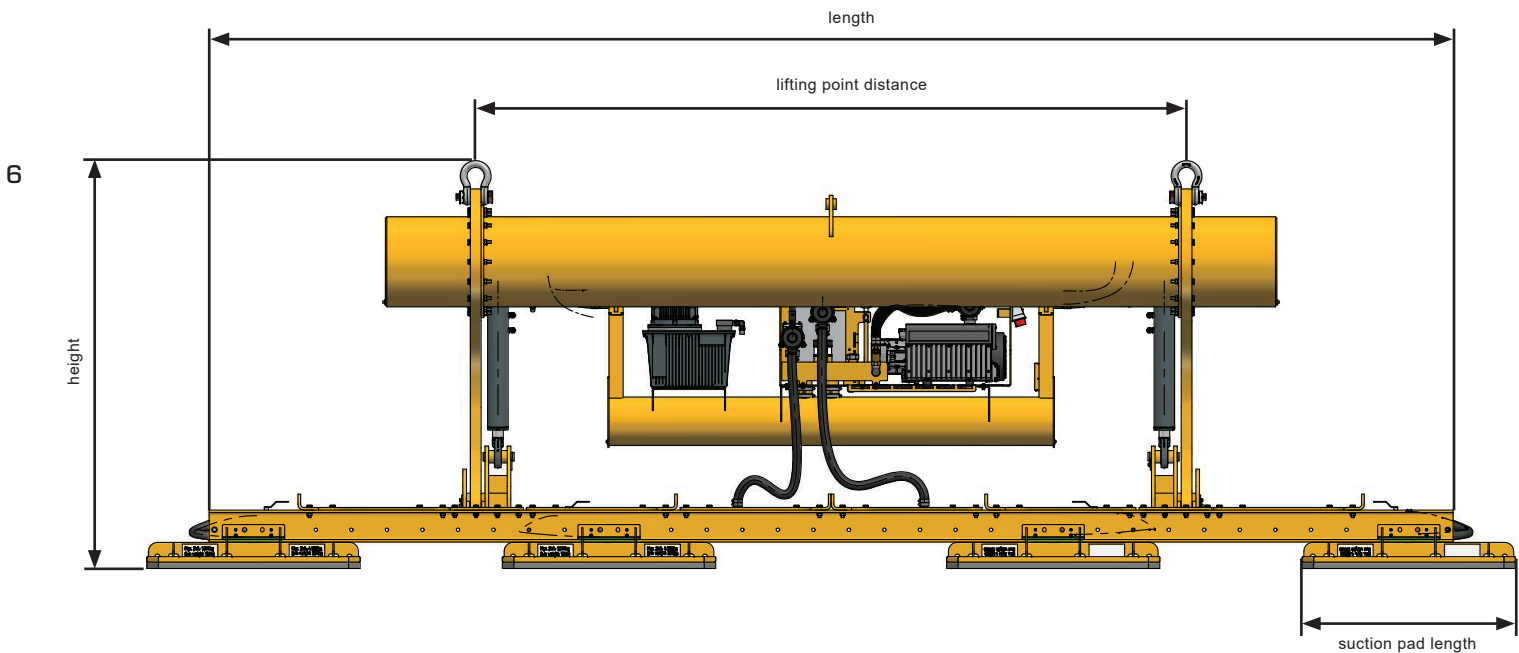
- **Preventing product damage** as the product surface stays intact due to soft rubber
- **Simplified handling & expense reduction** as no extra handling gear is necessary
- **Streamlined operations** due to quick suction and release within seconds
- **Enhanced safety** compared to conventional lifting gear as it can be controlled remotely
- **Energy-efficient operation** due to optimized power usage
- **Good return on investment** through increased productivity and reduced operational expenses

90° VACUUM TILTERS SPECIFICATIONS

Aerolift 90° vacuum tilters are specifically designed to handle precast concrete products and tunnel segments weighing from 1 to 30 tons.

They combine demoulding, transporting, and 90–degree tilting in a single, efficient movement.

These machines are designed for use with any type of crane.



Machine specifications

Working Load Limit (WLL)	1–30 tons
Max. demoulding force	1.5xWLL
Tilting angle	90°
Length	2–15 m
Width	1–4 m
Height (without additional chain slings)	1–4 m
Total weight (incl. suction pads)	500–15.000 kg

Suction pad specifications

Length	500–3000 mm
Width	500–3000 mm

Default specifications

Working range vacuum	80–100%
Power range (400V AC 50Hz (3P + PE))*	2–25 kW
Acceleration during lifting or lowering	max. 1 m/s ²
Ambient temperature*	-20 °C to +40 °C
Altitude, at sea level*	up to 200 m
Applied standard	EN13155
Certification	CE-certified
Safety factor	2

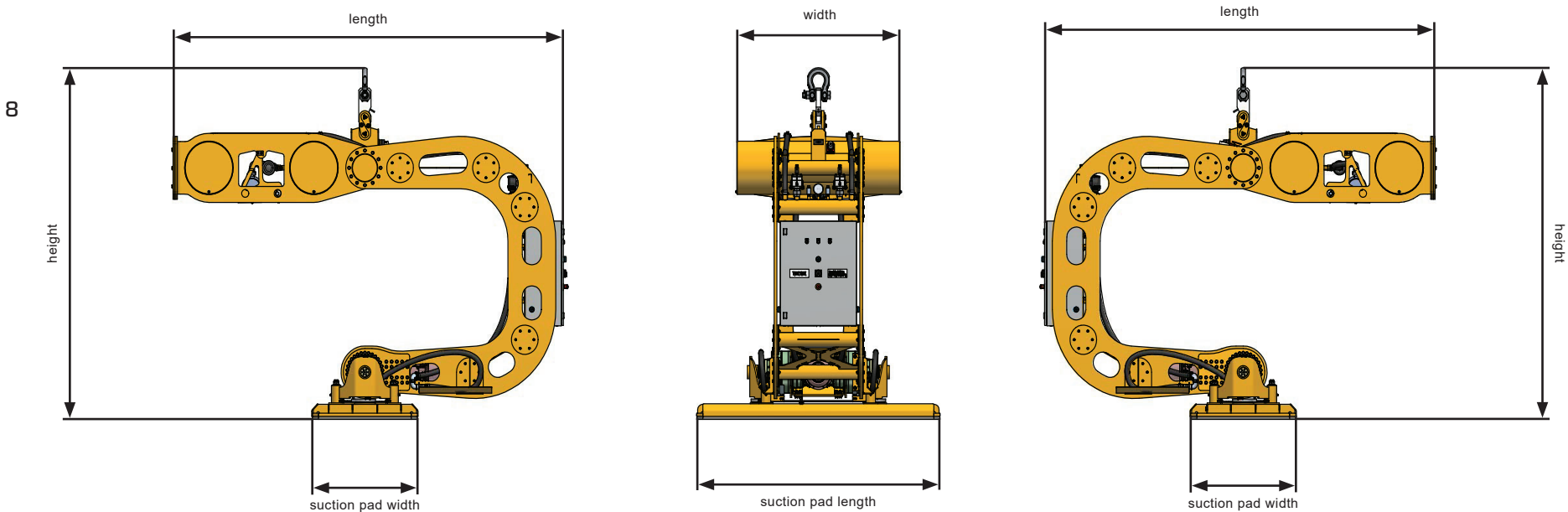
* Other specifications possible. Contact Aerolift Industrials B.V. for more information.

180° VACUUM TILTERS SPECIFICATIONS

Aerolift 180° vacuum tilters are specifically designed to handle precast concrete products and tunnel segments weighing from 1 to 30 tons.

They combine demoulding, transporting, and 180–degree tilting in a single, efficient movement.

These machines are designed for use with any type of crane.



Machine specifications

Working Load Limit (WLL)	1–30 tons
Max. demoulding force	1.5xWLL
Tilting angle	180°
Length	2–4 m
Width	1–4 m
Height (without additional chain slings)	1–5 m
Total weight (incl. suction pads)	500–8000 kg

Suction pad specifications

Length	500–4000 mm
Width	500–3000 mm

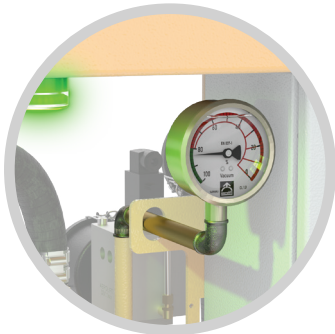
Default specifications

Working range vacuum	80–100%
Power range (400V AC 50Hz (3P + PE))*	2–25 kW
Acceleration during lifting or lowering	max. 1 m/s ²
Ambient temperature*	-20 °C to +40 °C
Altitude, at sea level*	up to 200 m
Standard	EN13155
Certification	CE-certified
Safety factor	2

* Other specifications possible. Contact Aerolift Industrials B.V. for more information.

FOCUS ON SAFETY

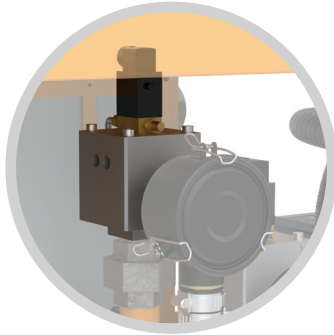
Standard features



The **vacuum gauge** and **safety lights** indicate when it is safe to lift. If there is not enough vacuum, the red light warns the operator. At the same time, an acoustic signal urges the operator to lower the load. The alarm system includes battery backup in case of a power outage.



To prevent accidental release, the operator has to push **two buttons** at the same time to release the load.



The **valve** requires a positive signal to change its status. In case of a power failure, it maintains its position.

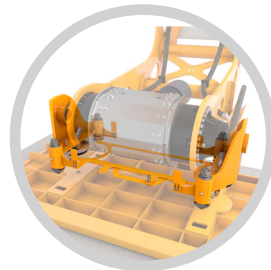


If the power fails, the load remains attached for at least 20 minutes thanks to the buffer tank. This exceeds the minimum safety standards required to take appropriate measures.

Optional features



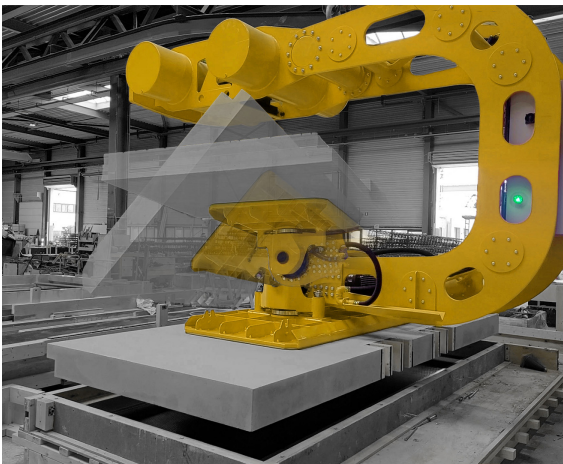
OPTION
The **safe release system** disables the release buttons during lifting. Release is only possible when the load is lowered.



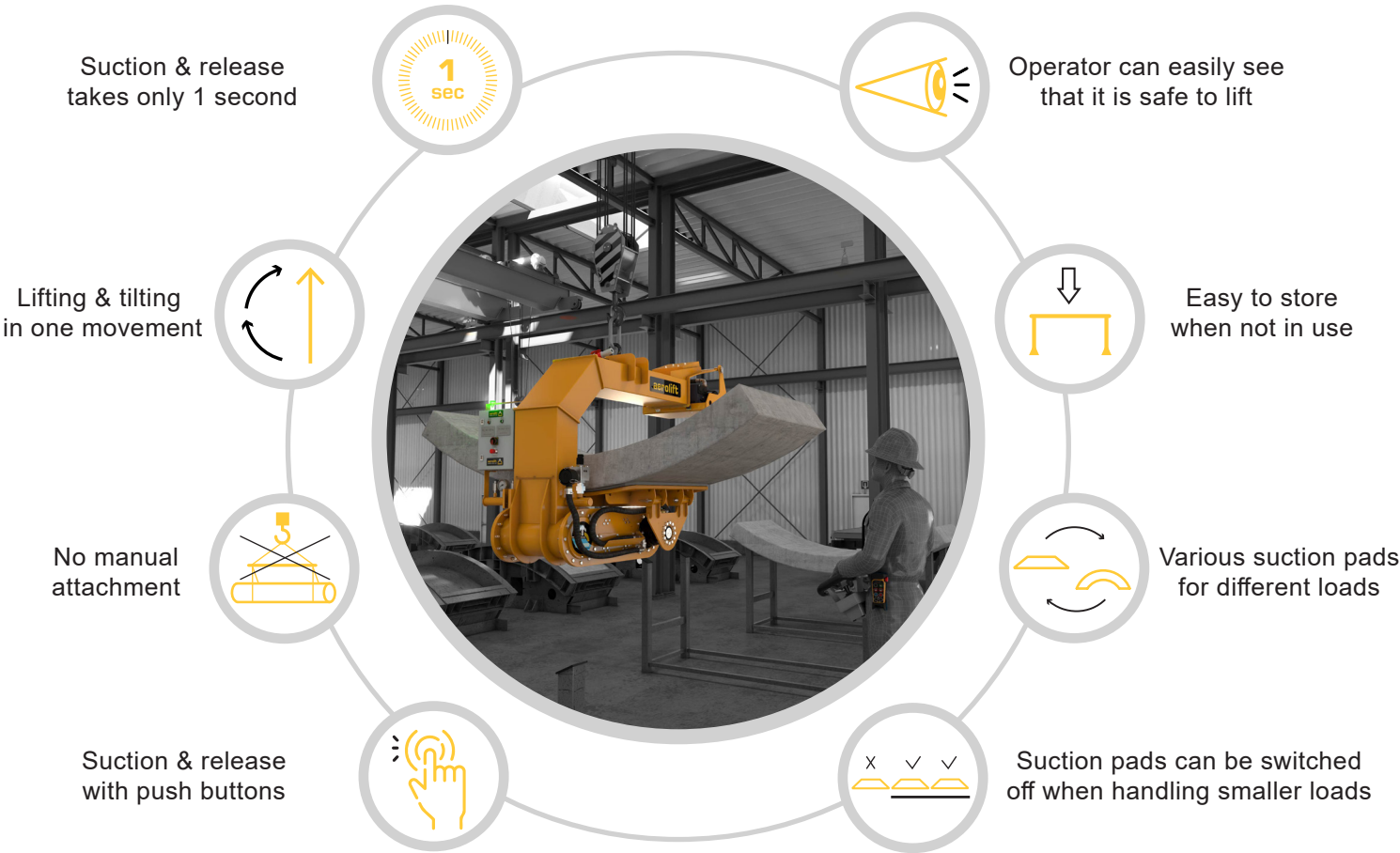
OPTION
Quick exchange coupler for fast and easy suction pad exchange

FOCUS ON EASE OF USE

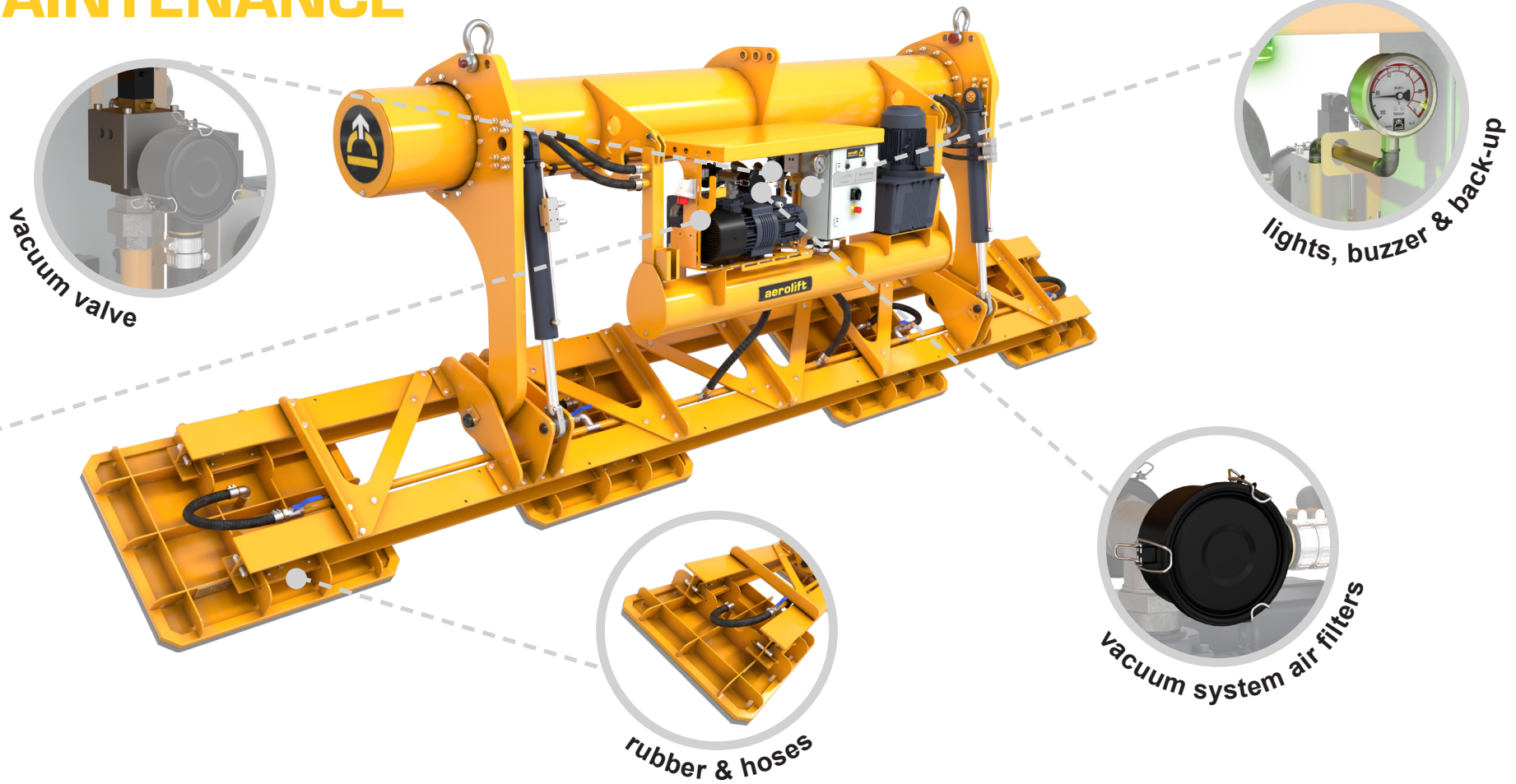
Operating our vacuum tilters relies on user-friendly features and doesn't require extensive technical knowledge. The remote control of the vacuum tilter has an intuitive button layout. A quick set-up process of the vacuum system allows to start working with minimal waiting time. In addition, our vacuum tank ensures no interruptions between the release and pick-up of the next load by maintaining the safe vacuum level between the cycles. If necessary, suction pads can be easily exchanged to fit the size, type or shape of the load. Aerolift can optionally provide a short training, ensuring that operators can confidently and efficiently perform a range of tasks, such as lifting, moving, and positioning of the load.



Compared to conventional methods, vacuum lifting requires no manual handling as no slings have to be attached. Fewer personnel will be able to handle demoulding in less time, resulting in a significant decrease in labor costs. There will also be less, if any, demoulding damage, since anchors won't break out and the cast won't touch the ground or mould edge.



FOCUS ON MAINTENANCE



Maintenance-oriented design
Our lifting devices are designed with maintenance simplicity in mind. Components like pump, filters, and valve have sufficient surrounding space for easy access.

Quality components that outperform
We've developed our own key components, such as rubber seals, hoses, vacuum meters and valves to guarantee optimal quality and safety.

Clear maintenance documentation
We provide detailed checklists for all maintenance procedures with comprehensive instructions in the manual. Daily maintenance items are conveniently listed on a sticker applied to the machine.

Simple daily checks
Daily inspections are primarily visual and can be completed in just few minutes.

Global component availability
We select components from suppliers with world-wide coverage, ensuring quick responses to any issues that may arise.

Worldwide service
We offer prompt, worldwide service through various communication channels, including WhatsApp, Telegram and WeChat.

FOCUS ON PRECAST CONCRETE

Who typically uses T-series vacuum tilters?

- precast concrete manufacturers
- construction companies
- infrastructure contractors

What types of products can be handled?

- any products with air-tight top side
- broom-finished concrete

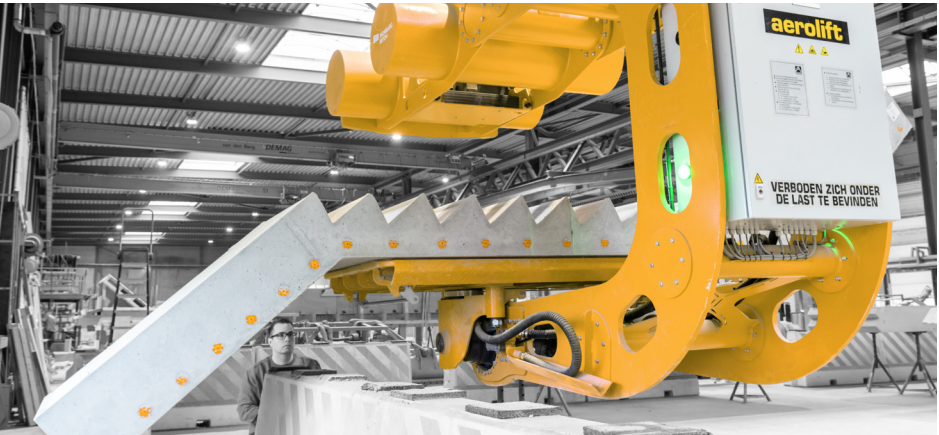
What tasks do T-series vacuum tilters perform?

- demoulding
- lifting & tilting
- internal transport
- installation



The cycle time has greatly reduced. Demoulding is much faster and there is almost no demoulding damage to the mould or the element. We can now manage with 1 FTE fewer.

FRANK VAN DER DRIFT
Director at Mombarg Beton



MAIN ADVANTAGES

1. Earlier demoulding is possible due to the divided surface pressure of the suction pads.
2. Less chance of cracks due to equal load distribution.
3. No lifting anchors are required, eliminating the need for anchor removal.
4. No demoulding damage to the element or the expensive mould.
5. Demoulding, transporting, and tilting in a single, efficient movement.

FOCUS ON TUNNELLING

Who typically uses T-series vacuum tilters?

- precast concrete manufacturers
- construction companies
- infrastructure contractors

What types of products can be handled?

- any products with airtight surface
- tunnel segments
- precast arches

What tasks do T-series vacuum tilters perform?

- demoulding
- lifting & tilting
- internal transport
- installation

T-series vacuum tilters enable faster demoulding, which can be performed by a single operator. No one needs to be close to the load to put or remove lifting gear.



MAIN ADVANTAGES

1. Earlier demoulding is possible due to the divided surface pressure of the suction pads.
2. Less chance of cracks due to equal load distribution.
3. No lifting anchors are required, eliminating the need for anchor removal.
4. No demoulding damage to the element or the expensive mould.
5. Demoulding, transporting, and tilting in a single, efficient movement.



ABOUT AEROLIFT

We support companies by providing safe solutions for the efficient handling of heavy loads. Our vacuum lifters, vacuum tilters, and mechanical grippers can handle loads ranging from 1 to 200 tons.

Today Aerolift machines can be found all over the world facilitating the handling of concrete, metal, pipes, paper, wind turbine blades, etc. in production, construction, and logistics. And we keep expanding our range.

More and more industries discover how vacuum technology can optimise their operations.

At our core is solution-oriented thinking and innovation. Complete engineering is done at our headquarters in Barneveld, the Netherlands. Our engineers are dedicated to creating the best possible solution to meet your unique needs. Manufacturing, whether at our facilities in the Netherlands

or in China, ensures we deliver high-quality machines that last for many years. For optimal operation, we provide service and maintenance.

To build stronger relationships with our customers, we collaborate with various companies who act as our agents. In China, we have a sister company — BAS Co. Ltd, which handles marketing and sales for the Asian market.



ROBERT LEMM
CEO

It is our experience, high-quality engineering and manufacturing that customers value the most.

Why choose us?



We are comitted to **quality**.



We stand for **safety**.



Our **expertise and experience** ensure smart lifting solutions.



Our **engineering** makes the difference.



We have our **own production** facilities to ensure quality and empower development.



OTHER SOLUTIONS

EU-series

Aerolift standard vacuum lifters designed to handle precast concrete, sheet metal and pipes ranging from 1 to 6 tons. Ideal for lifting and transporting of small loads.



Mechanical grippers

Aerolift mechanical solutions designed to handle products weighing from 1 to 200 tons when vacuum is not feasible or advisable. Ideal for lifting and transporting.



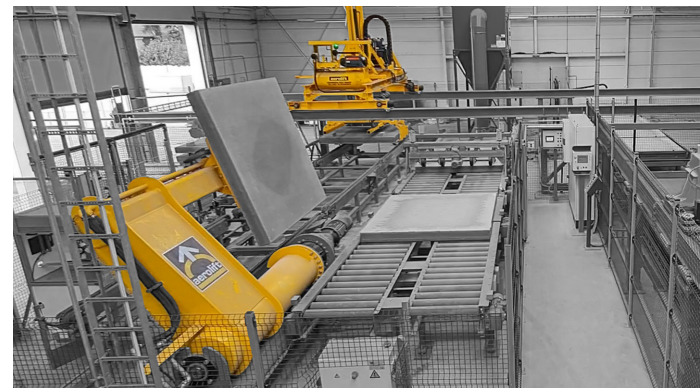
ES-series

Aerolift standard vacuum lifters designed to handle precast concrete, sheet metal and pipes ranging from 1 to 30 tons. Ideal for lifting and transporting.



Custom solutions

Aerolift customized lifting solutions are tailor-made equipment engineered to meet specific lifting requirements that cannot be addressed by standard lifting attachments.



AGENTS

We value your experience as a customer, so we collaborate with various companies to meet local needs effectively. Our agents possess an in-depth knowledge of their respective markets and play a crucial role in executing targeted local marketing strategies. Their native language communication skills ensure seamless communication. To view a list of our agents, visit aerolift.nl or scan the QR code.



INQUIRY CHECKLIST

Interested how our lifting solutions can help you optimise your material handling?

Send your non-binding inquiry to sales@aerolift.nl. Please include all essential information for prompt processing of your request. Below are several questions that can guide you in providing the necessary details. If you are looking for a fully customised solution, your needs will be different. Just drop us a line and we'll take it from there.

1.	What kind of crane is used? Please specify type (1 or 2 hooks) and lifting capacity.
2.	Is there any power supply available for the vacuum lifter (400V AC 3ph+PE)?
3.	What is the intended usage of the machine?
4.	Is the material precast concrete? Please specify if it is not porous (aerated concrete).
5.	What kind of elements (staircases, wall panels, balconies, tunnel segments, etc) do you need to handle?
6.	What are the dimensions? Please specify minimum and maximum thickness, length and width of the product(s). Please add drawings.
7.	What is the total maximum weight per element?
8.	Is there 90- or 180-degree tilting required?

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