

MORPHEMATIC



Ergotrics

INFLATABLES FOR HEALTHCARE

from



Easy, hygienic & ergonomic lateral positioning in bed



MORPHEMATIC

Caregivers often face the demanding task of repositioning 24/7 in bed care individuals to support hygiene, comfort, and prevent complications like bedsore or respiratory issues. This repetitive work is time-consuming and physically straining—especially for those caring alone. Independent body pressure-mapping tests show that the system delivers equal or better pressure distribution properties compared to a conventional anti-decubitus (pressure-ulcer prevention) air mattress. The Morphematic by Ergotrics simplifies this process, allowing a single caregiver to reposition any 24/7 in bed care persons in under a minute.

Using air pressure in tubes rather than fixed angles, it provides smooth, customisable adjustments suited to each patient's needs. Compatible with various mattress sizes, **the system features intuitive controls, a quiet pump, and a memory function for automatic alternating tilts.** A **CPR deflation mode** ensures emergency readiness, and the **3D pressure-mapped mattress** is washable at 90°C and easy to store. Designed to promote both caregiver ease and patient dignity, the Morphematic is a practical, affordable solution for hospitals, care facilities, and home use.

AWARDS FROM:

ERASMUS MC AND YES! DELFT HEALTH CARE PROGRAM
NAEP 2026 INNOVATIVE PRODUCT SHOWCASE AWARD
OT SHOW 2025 BEST INNOVATIVE PRODUCT

Benefits for 24/7 in bed care persons and caregiver



REDUCTION OF BACK PAIN FOR CAREGIVER

Reduce physical strain by using **air pump and remote control** instead of manual labor. With the Morphematic at maximum, one can wash and care the user without lifting or manual handling.



TIME SAVING AND AUTOMATIC

Reposition in less than a minute. Simple and fast. Can possibly be done by residents themselves by using a remote control, or on **time cycles** automatically.



STABLE POSITION AS AND WHEN YOU WISH

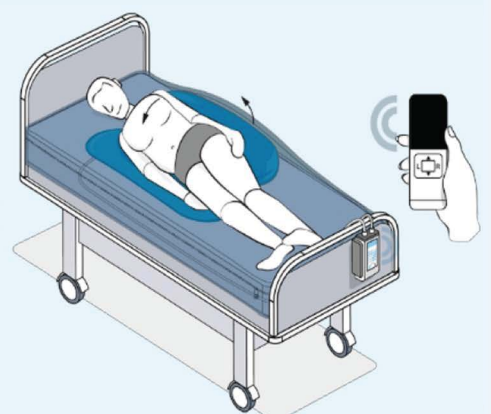
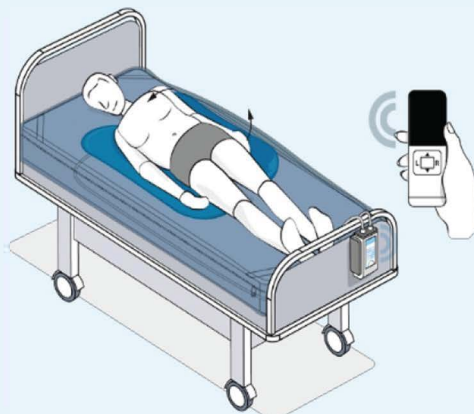
Avoid pillows that slide away. Morphematic offers stable positioning. Both the resident and the caregiver can decide at what angle and how often per day the resident change sides.

Avoid residents sliding. Morphematic offers stable upright sitting in bed as it cocoons the users.

90 degree wash/wipeable
205 kg safe working load (swl)

Mattress topper
45 degree tilt

How to automatically reposition patients.

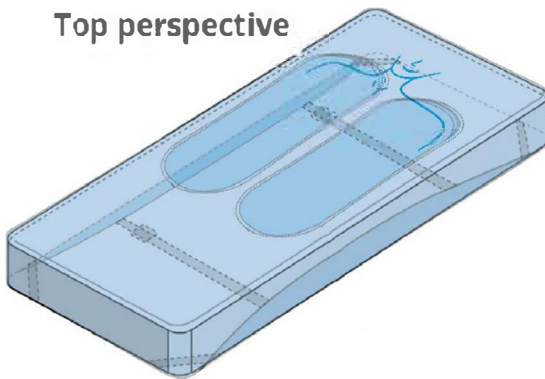


The science behind lateral turning therapy

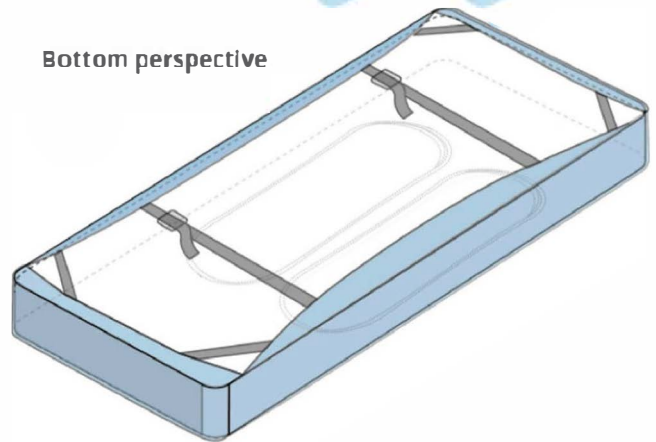
"Routinely positioning patients prophylactically promotes comfort, prevents the formation of pressure ulcers and may reduce the incidence of deep vein thrombosis, pulmonary embolism, atelectasis and pneumonia."

- Hewitt 201

Top perspective



Bottom perspective

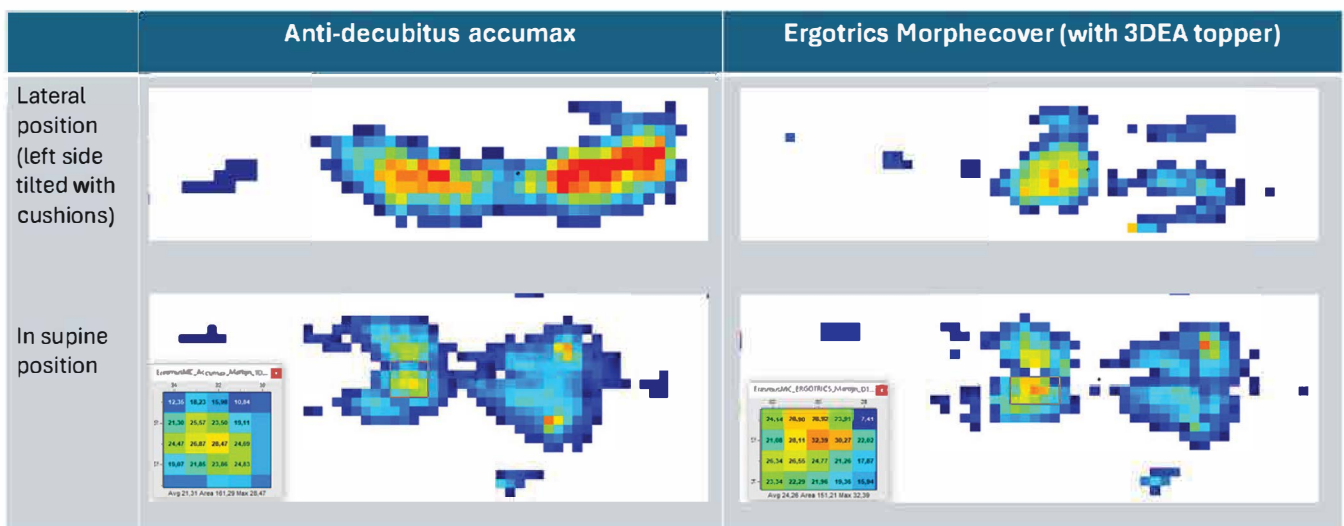


- There is no need to switch to a specialist mattress, as the Morphematic BPM-tested. This approach offers a cost-effective solution. The Morphomatic is also proven to prevent pressure ulcers with users stating "the device is easy to handle"
- Unlike other systems, there are no restrictions on angles or tilt elevation. The design is flexible and adaptable to enhance user comfort, with a maximum tilt of 45°.

Pressure point distribution comparison at

ErasmusMC

Erasmus

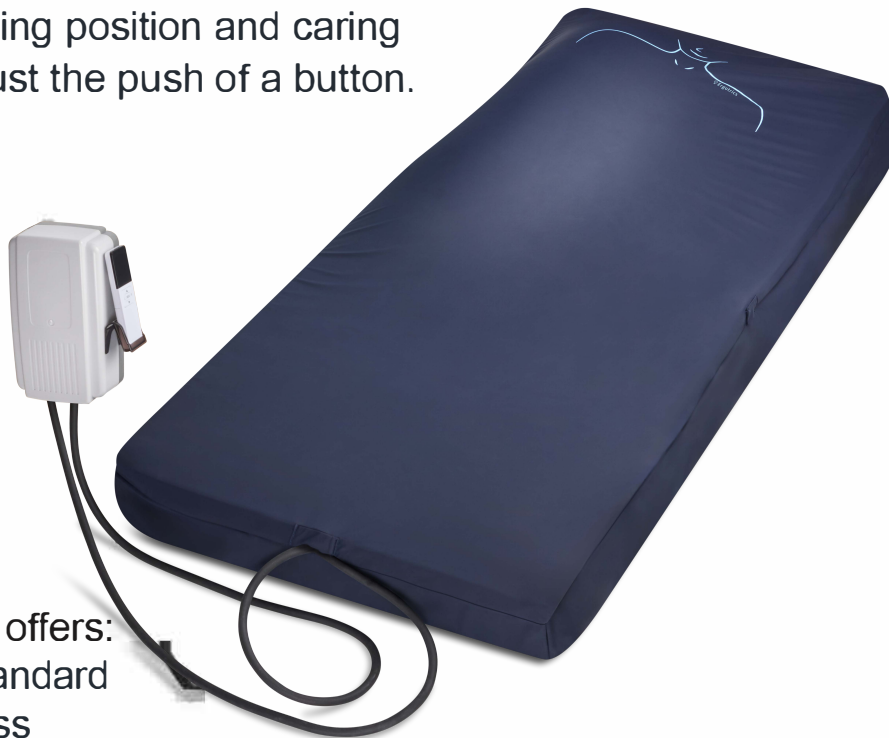


Conclusion of both studies: The Ergotrics Morphcover has the same or better pressure distribution properties as the anti-decubitus mattress

LATERAL PATIENT TURNING SYSTEM FOR SINGLE-HANDED CARE OF 24/7 IN BED CARE PERSONS

The Morphematic is a mattress cover with two alternating **inflatable air compartments** that **automatically tilt** 24/7 in bed care user up to 205 kg on the left and right side.

This allows changing position and caring for the user with just the push of a button.



The Morphematic offers:

- Perfect fit on standard bed and mattress
- Biocompatible cover: **safe for the skin**
- 100% hygienic: **machine washable** at 90°C.
- Suitable for dynamic **Air Flow mattresses.**
- Modular design with service **for spare parts.**
 - Includes topper of 4 cm:
 - **foam or 3D** compresses down to 2 cm
 - **internal 3D mattress** moulding and moving for user

