



**Y O M P E R +**

**User Manual**

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# 1 Introduction

## Indications

The Yomper is exclusively designed to provide assistance for manual wheelchairs, giving people with reduced mobility the possibility of moving around while reducing effort, for a user weight ranging from 14 to 150kg. Its use is exclusively reserved for people capable of physically and mentally using a manual wheelchair (moving forward, maneuvering, and braking), alone or accompanied by a third person taking charge of powered assistance.

The Yomper can also be used in push assistance mode for a for an accompanying person by using an optional device for a third party. The accompanying person must be physically and mentally capable of maneuvering (forward, backward, turning, braking) the manual wheelchair with a person seated in the wheelchair.

The Yomper must be installed on a compatible manual wheelchair. See «Wheelchair compatibility» in Technical data, page 26 of the manual.

The Yomper must be installed by a professional. It is that person's responsibility to ensure the user's ability to safely operate the Yomper.

## Contre-indications

Improper use of the Yomper or the wheelchair to which it is attached, depending on the surface, climate, traffic conditions, may present a potential danger and cause damage to the wheelchair, the Yomper or the user. The Yomper should be handled and used according to the following recommendations:

The user is physically and mentally able to use a wheelchair and the Yomper in all conditions and situations

The user has understood and read the entire instruction manual

No technical changes have been made to the equipment

The user should take the time to learn the performance of the Yomper by using it in a secure area free from any danger. The user should become familiar with the feeling of pushing, braking, acceleration and maximum speed of the equipment before venturing outdoors where risky situations can arise. Users are strongly advised not to use the Yomper outdoors until they are comfortable indoors. If a malfunction appears, stop using the Yomper and contact the technical service department of your supplier/dealer. Any use that does not comply with the instructions in the manual, or with the recommendations of your supplier/dealer, or with the technical limits defined by your supplier of the Yomper or the wheelchair is considered to be misuse of the Yomper.

ACEKARE is not responsible for any property damage or bodily injury that may occur as a result of improper use of the Yomper or, failure to follow the instructions in the user guide.

If you have any problems understanding the warnings and instructions in this manual, please contact your distributor or local supplier/dealer.

## Precautions for use

All the precautions for use specified by the supplier of your wheelchair must be followed and added to the recommendations defined in this manual. Failure to follow these recommendations could cause serious injury or death.

- Handling or use of the Yomper by anyone who has not been instructed in this manual may cause bodily harm.
- You should familiarize yourself with the performance of the Yomper before regular use. Drive outdoors only when you have complete control over handling the system, without colliding with walls or any other object.
- The addition of the Yomper to the manual wheelchair gives different sensations. Take the time to familiarize yourself with these new sensations.
- The operating methods of the Yomper are unique for each user depending on that user's function and their level of disability.



**Use of an anti-tip device is MANDATORY with a Yomper. This will allow you not to tip back.**

- The specificities given by the supplier of the wheelchair may be slightly affected with the addition of the Yomper.
- Do not take an escalator or mechanical curb with your Yomper. You risk serious injury.
- Do not lean back to reach for objects, this could cause your chair to tip over.
- The wheelchair's center of gravity may be affected by the addition of the Yomper.
- Do not lean forward or change your seat to reach something in front of you, the chair could tip forward or onto its side.
- Make sure the battery is charged before use.
- Always switch off the EasyGo box when stopped in order to prevent the wheelchair from accidentally starting up.
- The Yomper is not intended for use in heavy rain, snow, on wet or frozen surfaces which could cause malfunction or damage. Do not use it under these conditions or on these surfaces.

- Do not use the Yomper on rough terrain, slippery surfaces, extreme slopes, or unstable ground. This may cause injury or damage to the Yomper and void the warranty.
- Be very careful when using the Yomper in confined areas. Reduce speed to reduce risk of damage or injury.
- The 'outdoor' mode is not intended for indoor use. Be careful when using this mode.
- To climb or descend hills, refer to the instructions and specifications given by the manufacturer of your wheelchair.
- Driving over sidewalks or obstacles can tip your chair over and cause serious injury. Switch off the Yomper when driving in these situations. If you have any doubts about getting over an obstacle, ALWAYS ask for help. Be aware of your personal abilities and limitations. Develop your abilities only with the help of a third person.
- When crossing roads, intersections, level crossings or when traveling on slopes, be accompanied for safety reasons.
- Be careful when making a transfer. Every precaution should be taken to reduce the distance during the transfer and to be sure that the wheel lock is operational to prevent the wheels from moving. Always switch off the EasyGo box or the Yomper and detach it if necessary, during the transfer.
- The Yomper is not intended for climbing steps or sidewalks. Do this only when absolutely necessary and ask for help. Turn off your Yomper.
- Do not attempt to attach the Yomper to a wheelchair that does not meet the "Wheelchair Compatibility" dimensions on the specification sheet on page 26 of this manual.
- Any modification to the Yomper will void the warranty and may create a safety risk.

## 1. Special conditions of use

**Use on a steep slope :** you have to lean forward so as not to tip back.

**Mounting/Descending a Curb :** you must stop the Yomper (press the main button) before going up or down a curb.

**Use in 2-wheel mode :** you must stop the Yomper (press the main button) before operating on 2 wheels. Without it, you risk tipping backwards when the Yomper's motor hits the ground.

**Off-road use :** the Yomper may help you travel off-road. It may propel you slowly but allow forward travel regardless of the terrain.

**However, we recommend that you be very careful when using the Yomper off-road.** Indeed, few manual wheelchairs are suitable for off-road use, especially those with smaller caster wheels at the front. Your caster wheels may become stuck on uneven ground causing you to tip over, especially when powered by the Yomper.

### Electromagnetic interference (EMI)

Interference comes from radio sources, for example: radio / TV transmitters, cell phones, walkie talkies etc. There are many sources of EMI in your environment, some are preventable, others will not be visible. Electronic systems such as the Yomper are sensitive to strong EMI, + or -. These interferences can cause the Yomper to activate unintentionally or cause damage to the control system, potentially causing breakdowns and costly repairs.

Every electric wheelchair or system of this type can withstand EMI to a certain point, also known as the level of 'immunity'. The higher the level of immunity, the lower the risk of EMI. An immunity level of 20V / m provides sufficient protection for everyday sources. The Yomper has been tested and resists up to 20V / m.

Even if it is equipped with a sufficient protection system, any modification of the wheelchair or the addition of accessories may affect this immunity. Parts from other suppliers have unknown properties and their interaction with the Yomper has not been tested.

The electromagnetic energy becomes more intense as you get closer to the source. It is therefore recommended not to use the Yomper near radio sources. We can distinguish 3 categories of EMI :

- Long-distance transmitters: sources for radios, commercial radio, antennas of TV station towers and amateur radios..
- Medium-range mobile transmitters: sources of radios, including radios used by emergency vehicles, tractors, taxis..
- Mobile transmitters: the waves are very weak: walkie talkies, CBs, mobile phones and other personal means of communication.

Cordless phones, MP3 or CD players, TV or AM / FM radios are safe.

If the Yomper turns on unintentionally, turn off the system and report the incident to Acekare Technical Service (indicate any source of EMI that was nearby when the incident occurred).



## List of components


Aluminum housing .....	1
24V 250W brushless motor.....	2
Electronic controller.....	3
Power button (on / off).....	4
Carrying handle.....	5
Release handle.....	6
Third person connector.....	7
Battery charging socket.....	8
Battery gauge.....	9
Battery access cover.....	10
Battery charger.....	11
220V mains socket (may be different depending on your country).....	12
Charging connector.....	13

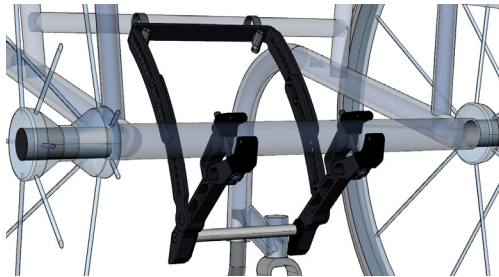
## EasyGo control box

Main button (on / off).....	14
Speeds	
(+/- according to parameters).....	15/16
OLED screen.....	17
Speed Level / Modes .....	18
On / off button .....	19
Micro USB charging socket.....	20
USB charging cord.....	21
Single support boitier.....	22
Third person controller (option).....	23

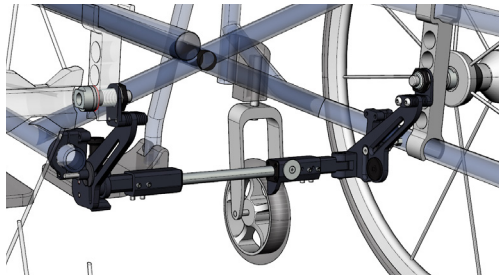
## 2. installation

### Installing the Yomper mounting bracket

 The installation must be carried out by your medical equipment dealer.



Example of mounting bracket for rigid wheelchair frame

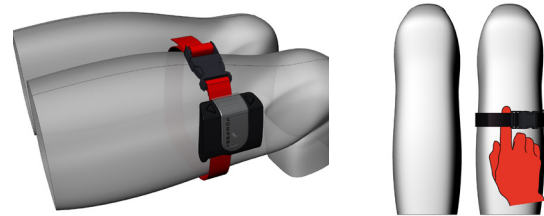


Example of mounting bracket for foldable wheelchair frame

• For the installation of the various mounting brackets, refer to the assembly guides supplied with each

### Installing the EasyGo control box

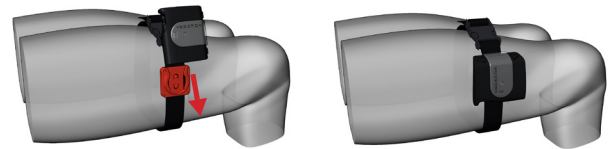
#### • On the leg



Check the direction of the strap. Clip and turn the strap so that the housing mounting bracket is correctly positioned



Do not tighten the strap too tight, so as not to hinder your blood circulation, a finger must be able to pass between the strap and your leg.



Position the control box, snap in and turn.

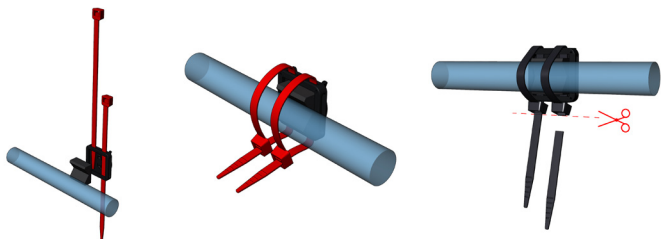
#### • On the wheelchair frame

Position the opening up.

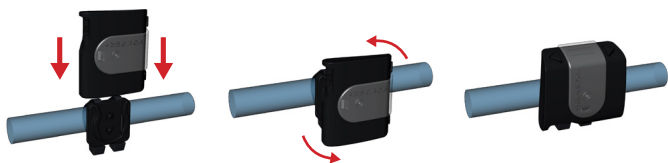
Use the plastic clamps provided as well as the rubber «blocker»







Tighten on the tube and cut the excess collar.



Snap in and turn the control box to lock.

### 3. Commissioning

#### Power on

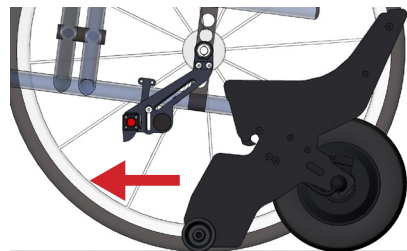
Check that the EasyGo box is in the off position (screen off, LEDs off)



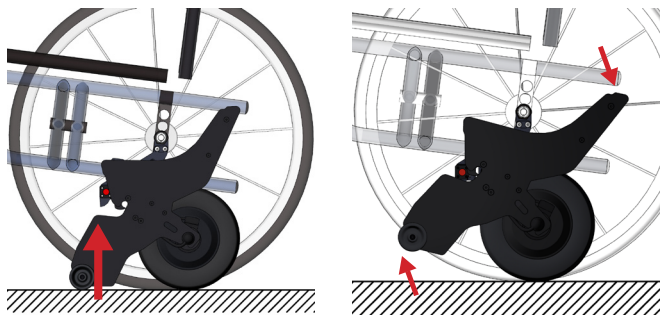
Press the POWER button (4) on the Yomper. A flashing LED tells you that the Yomper is waiting for its connection to the control box.

#### Install the Yomper

Place the Yomper on the floor behind the wheelchair and roll it forward as indicated by the arrow.



The front casters provide stability when setting up.

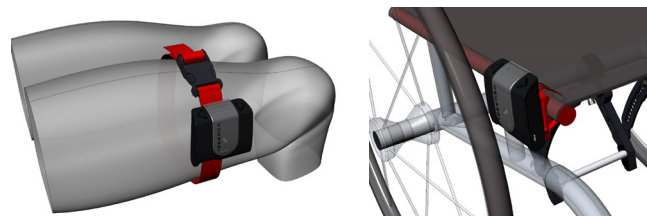


When the forward edge of the Yomper housing touches the mounting bar, push the handle down to slide the Yomper onto the mounting bar.  
During this operation, keep the release handle open.



**!** Once in place, check that the Yomper is properly engaged.

### Install the EasyGo control box



Install the EasyGo box on its mounting bracket :

- on your thigh
  - or on the wheelchair frame
- (See installation procedures page 8)

### Connect the EasyGo control box to the Yomper



To turn on the control box, push the ON / OFF button (19).  
During the connection phase, LEDs 1, 3 and 5 light up.

Once the connection is established, the LED strip changes to flashing green at 1st speed (indoor mode).



The LED of the EasyGo box flashes. The Power button on the Yomper no longer flashes, meaning you are ready to use the Yomper.

**Controls and modes**



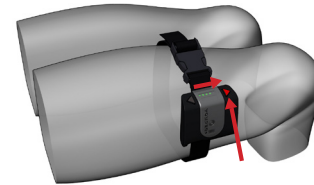
**Start :** Press the main button on the control box twice, the Yomper will instantly start at speed 1 (the LED will no longer flash).



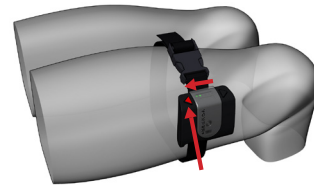
**Stop :** Press the main button once, the Yomper motor stops. The LED flashes green.



the user must brake the wheelchair. The Yomper drive wheel does not have a brake. When the motor stops, it goes into freewheel mode. You can change the speed while driving or while at a standstill.



**Accelerate :** Press the arrow **furthest** from you to **increase** speed.



**Slow down :** Tap the arrow **closest** to you to **decrease** speed.

The LEDs show you the speed level (5 Maximum).



Starting at speed 2 or 3 is also possible to facilitate hill starting of the Yomper.

*(later versions than Yomper + 2.7.0).*

The actual speed at which the Yomper propels you depends on:

- The selected speed (from 1 to 5),
- From current mode (indoor, green LED strip, outdoor, red LED strip),
- The settings programmed for the Yomper

**INDOOR**



In indoor mode, **you can also use the pushrims to brake when wishing to stop the Yomper motor.**

**OUTDOOR**



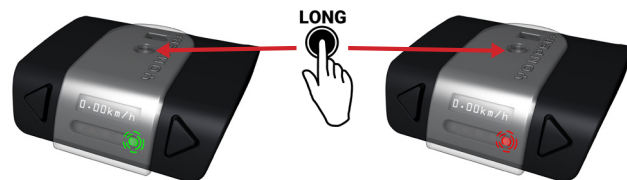
**In outdoor mode, the Yomper motor will only stop by pressing the main button.**

**To change mode** (indoor, outdoor), press the main button for more than 2 seconds: the LED strip changes color

You were in indoor mode (GREEN), you switch to outdoor mode (RED)

You were in outdoor mode (RED), you switch to indoor mode (GREEN)

Your actual speed will automatically revert to level 1 (the lowest)



After use turn off the control box using the ON / OFF button. The Yomper goes into standby mode, its Power button flashes quickly.



You can



leave the Yomper in standby mode. However, it is recommended to physically turn it off every evening.



**It is advisable to switch off your control box as soon as you are no longer using the Yomper. The system is then safe, and cannot inadvertently start.**

## Recharge the batteries

A battery indicator is located on the back of the Yomper. Press the button on the gauge to see the charge level of the Yomper battery.



The battery Indicator has 4 levels providing an approximate indication of the battery charge level

■ ■ ■ ■	.....100 à 75%
■ ■ ■ □	.....75 à 50%
■ ■ □ □	.....50 à 25%
■ □ □ □	.....Less than 25%

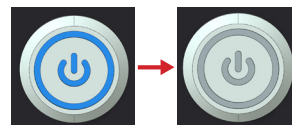
You can also know the charge level of the Yomper battery with the control box (see chapter 4 Functions and settings page 15).

**WARNING:** Switch off the Yomper using the button provided for this purpose (cf §2)



**The drive unit must be deactivated before starting to charge. If the drive unit is on the wheelchair when charging, the wheelchair must be secured with its parking brakes to prevent uncontrolled movement!**

**To charge :** Turn off the Yomper using the Power button. Connect the charger to an electrical outlet



Connect the charger to the battery as shown below.



When charging, the charger indicator light is **RED** then it turns **GREEN** once the battery is charged.



Charged battery



Battery charging

To **fully charge** the battery (if it was completely empty), charging time will be :

**About 4h for the 24V 160Wh battery**

**About 6 hours for the 24V 240Wh battery**

**! Never charge batteries in the presence of or near flammable liquids or gases.**

· In the unlikely event of a battery overheating or catching fire, it should not come into contact with water or other liquids. The only useful extinguishing agent recommended by battery manufacturers is sand or a Class D extinguisher.

· Never charge in rooms where moisture could condense on the components of the Yomper and its battery.

· Never charge the batteries at temperatures below 0 ° C or above 40 ° C.

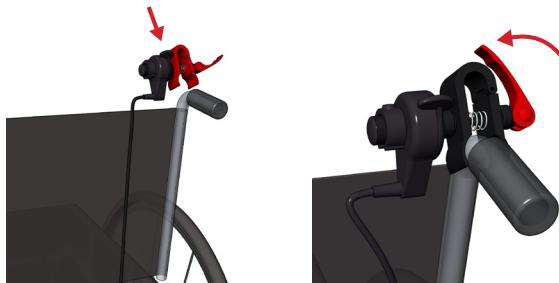
**! To charge the EasyGo box, the Easy-Go box must be in the ON position.**  
**Use a micro USB cable to charge the Easy-Go box.**



A charge indicator appears on the screen of the EasyGo box

**! Switch off your Yomper to avoid inadvertent start-up.**

## Use by a third person control (option)



**!** To avoid any mishandling, we recommend connecting the third-person controller after securing the Yomper to the wheelchair.

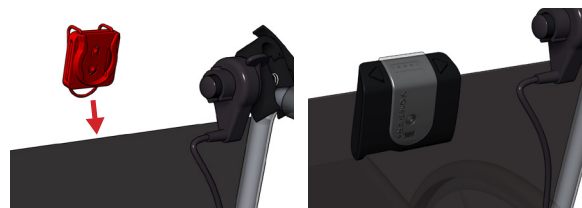
Place the third person controller on the wheelchair push handle. Connect the third-person controller cable to the back of the Yomper



Position the control box at the backrest, using the clip.



When connected, the third person controller takes control of the control box for speed metering.



The maximum limits of the third-person drive correspond to the speed selected on the control box.

**If you do not want to use the control box**, plug in the third person controller directly to the back of the Yomper. The Yomper power button will flash. You can then use the third-person controller alone. Speed will be limited to 6 km / h max.

**!** To avoid malfunction, be careful to leave free the passage of the third person controller cable. The cable must be easily removable, it must not be twisted in the tubing of the wheelchair or Yomper.

## 4. Functions and settings

### EasyGo control box display

By default, the screen can display :



The speed of the Yomper



The battery level of the Yomper (YP)



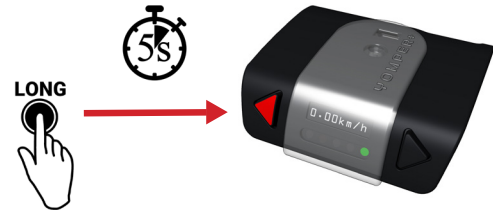
The battery level of the EasyGo box (BTN)

To choose one of these displays, Yomper stopped, LED flashing, long press one of the arrow buttons.

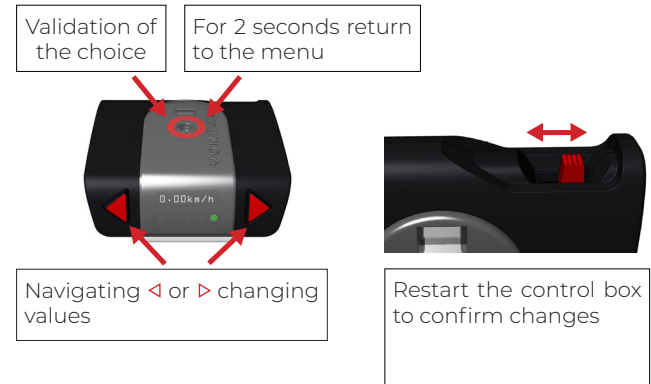
### Settings menu

To change the setting, the Yomper main power must be switched off.

With the EasyGo control box switched on, access to the menu is made by a long press for more than 5 seconds on the arrow button furthest from you.



The menu works as follows :





## The menus :

**Scan :** pairing of the EasyGo box with a Yomper drive unit.

**Inside speed :** choice of 5 internal speeds, within the limit of the ceiling set by a healthcare professional.

**Outside speed :** choice of 5 outside speeds, within the limit of the ceiling set by a healthcare professional.

**Acceleration :** choice of the acceleration level (1 to 5, 5 being the strong-est acceleration).

**Resistance :** choice of resistance force to stop the wheelchair in indoor mode (1 to 5, 5 being the strongest resistance).

**Side button :** choice of left or right direction for placement on the wheelchair (reverses the «**<**» and «**>**» buttons and the display direction of the LED strip.

**Default display :** choice of the default display.

**Data :** displays the data stored in the Yomper (total number of kilometers traveled, indoor / outdoor use time, number of uses, number of Amp hours consumed by the battery since purchase).

## Operation :

- o Press «**<**» or «**>**» to change menu
- o Enter the menu via the main button.
- o o Select the Function to modify, modify the value with «**<**» or «**>**», confirm your choice with the main button.
- o Restart the control box to take into account the value changes.

## Example : Changing speed 2, in indoor mode

- o Turn on the control box.
- o Press «**>**» for more than 5s to enter the general menu.
- o Press «**>**» to select the menu «**Inside speed**».  
Press the main button to validate your choice.
- o Press «**>**» to display : «**Inside Speed, 2=XX**»
- o Press the main button to enter the speed modification
- o  
Press «**<**» or «**>**» to change the value
- o Press the main button to confirm and save your choice
- o  
Press the main button for 2s => restart the control box
- o

## SCAN : Pairing

When using an EasyGo box for the first time, you must pair it with the Yomper.

Take the Yomper certificate of conformity.

- o Turn on the Yomper
- o Turn on the EasyGo control box
- o In the menu, select SCAN, validate with the main button
- o Then press the main button again to start the scan
- o **The Yomper's Mac address** appears on the screen, check that it corresponds with that of your Yomper with your certificate of conformity (use the «**<**» **>**» to select the correct Mac address) and validate with the main button.
- o Restart the control box

## 5. Maintenance

### Audits and review period

Regularly check the tightness of the various mechanical parts of the mounting bracket.

Check the condition of your tires twice a year.

Regularly ensure inflation to 2 bars.

Once a year, have your dealer check the correct performance of the various mechanical elements, the drive nuts must be tightened at **25 Nm**.

### Cleaning

The Yomper is cleaned with a damp cloth.

If water gets into the drive unit or control unit, it can destroy them.

Never clean these components under running water or with a high-pressure cleaner.

Never clean these components with running water. Make sure that liquids and moisture never get into the components or with a high-pressure cleaner!

Cleaning therefore requires special care. Observe the following instructions in particular :

- All cleaning should only be done with a cloth very lightly moistened with water
- Do not use any abrasive or aggressive cleaning product for cleaning.

- Never clean under running water with, for example a garden hose or a high-pressure cleaner.

Water could enter the electronic system and cause irreversible damage. The Acekare company declines all responsibility for damage or consequential damage due to water.

Such cases exclude any recourse to the guarantee.

**WARNING : Do not use detergents or flammable or corrosive products.**

### Transport

For transport, the Yomper and the EasyGo box must be re-moved from the wheelchair and stored in a safe place (preferably used the transport case and the case of the control box). Whether fitted to the wheelchair or kept separately - in both cases the Yomper and the EasyGo controller box must be switched off.

### Materials and protection

All of the materials used are corrosion resistant and resistant to disinfectants: aluminum frames; zinc-plated steel and stainless-steel screws; plastics.

## Storage

If your wheelchair, and therefore the Yomper, is to be stored for an extended period (eg several months), the following points must be observed :

- Store your wheelchair according to the manufacturer's instructions.
- Protect the components of the Yomper with films to protect them from moisture.
- Store the wheelchair and all Yomper components in a dry place.
- Take care to prevent any penetration and deposit of moisture on the wheelchair or the components of the Yomper.
- Make sure that the wheelchair and the Yomper are not exposed to long-term sunlight (e.g. through a window).
- Make sure that no unauthorized person, especially children, can access this room without supervision.
- Observe the storage instructions for the battery pack.
- Before returning to service, the wheelchair and the Yomper components must be cleaned.
- In the event of a return to service, check whether maintenance is necessary and, if so, organize its execution.
- Recharge to around 80% and turn off the Yomper and the EasyGo box
- In the event of prolonged storage, recharge the battery once a month.

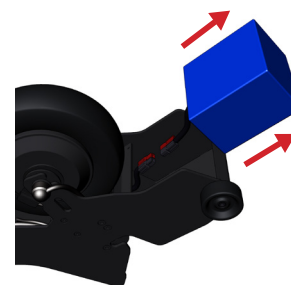
## Battery maintenance

The Yomper and the EasyGo box are equipped with Lithium batteries, without memory effect. You can recharge them as often as you want without affecting their lifespan.

They do not require any maintenance.

## Battery removal

Yomper off, turn the Yomper over, and unscrew the 4 cover screws.



Release the battery to access the plugs.  
Remove the lock from the plugs and disconnect them.

## Reuse

If necessary, the Yomper can be completely disassembled (mounting bracket included) from the manual wheelchair, returning that wheelchair to its original condition. Yomper can then be installed again on any other compatible wheelchair.

Your Yomper can be reused simply and economically. Before each reuse, maintenance of the Yomper must be carried out. The fasteners and adapter pins with which the Yomper components are mounted on your wheelchair can be easily and quickly removed from your old wheelchair and reassembled on a new wheelchair by an authorized dealer or Acekare representative. In addition to the cleaning instructions given in chapter 12.3, before reuse, all plastic parts of the Yomper components accessible from the outside must be disinfected. Use a cleaning agent for wiping disinfection in accordance with the manufacturer's instructions.

## Disposal

This device, its batteries and accessories are long-life products.

However, components may contain substances harmful to the environment if disposed of in places (e.g., landfills) which are not provided for this purpose according to legislation currently in force in a corresponding country.

The symbol of the «crossed-out dustbin» (in accordance with the DEEE directive) is on this product to remind you of the recycling obligation.

Respect the environment and take this product at the end of its useful life at your local recycling center.

Please inform yourself about the legislation currently in force in your country regarding waste disposal given that DEEE directive for this product is not applied in all countries.

The Yomper can also be collected by Acekare Company or Acekare dealers for disposal in accordance with the law and the environment.



## 6. Problem solving

Before contacting your dealer, check the following points :

Failure	Solution
Yomper drive unit power indicator light does not illuminate (blue)	<p>Check that a light appears after pressing the button on the front of the drive unit</p> <p>Check the battery gauge and recharge your Yomper if indicator shows low battery.</p> <p>Visually check, without disassembling anything, the condition of the electrical cables and the Yomper.</p>
Yomper does not accept charging when the charger is plugged Into the Yomper Drive unit and electrical power outlet.	<p>Check the operation of your power outlet.</p> <p>Check that this is the correct charger.</p> <p>Check that the charger turns from green to red when charging.</p> <p>Check the condition of the charging socket on the Yomper.</p> <p>Check the gauge before charging, and after charging after 2 hours to be sure the charge level has changed after charging time elapses.</p>
EasyGo box does not turn on	<p>Push the button towards ON (The switch must be pushed towards the center of the EasyGo controller).</p> <p>Charge the EasyGo box. (You have to wait 10 minutes before charging will occur).</p>
EasyGo box does not take charge	<p>Check that the box is in the ON position. Charge the EasyGo box. (You have to wait 10 minutes before charging will occur).</p>

Failure	Solution
The Yomper stalls	<p>This can happen if the slope is too steep, or the chair is too heavy, or if wheelchair tires are deflated. You may have to manually assist the Yomper or adjust speeds when travelling up a steep slope. This is a safety measure to avoid engine overheating.</p> <p>When your battery is low (&lt;20%), it can also happen that the Yomper «stalls» during intense effort. After a few seconds you will be able to set-off again. We recommend that you assist the Yomper on steep slopes. You will be able to use the Yomper without assist on flatter surfaces.</p> <p>We recommend that you recharge your battery.</p> <p>If you have many routes requiring constant effort from the Yomper, or in case of heavy user weight, we recommend the optional battery (higher amp-hours) which will be more efficient over time.</p> <p>In indoor mode (green LED), too much resistance stops the motor (similar to using your hands to brake via the handrails). Switch to outdoor mode or increase the resistance.</p>
The Yomper does not stop	<p>In indoor mode, this can happen if the resistance level is set too high.</p> <p>In the parameter setting, reduce the resistance</p> <p>If pressing the main button on EasyGo does not turn off Drive unit power, switch off the Yomper and the EasyGo controller box and contact your dealer immediately.</p>

Failure	Solution
The Yomper accelerates for no reason	<p>If you are in a highly electrically disturbed environment (high power medical imaging, etc.), close to an electromagnetic source, turn off the Yomper.</p> <p>The Yomper is CEM certified, which means it is immune for use in a common environment.</p>
Power loss	<p>Power will depend on several parameters :</p> <ul style="list-style-type: none"> <li>• The total weight of the loaded wheelchair,</li> <li>• Significant elevation changes during your trip,</li> <li>• Frequency of shutdowns followed by restarts,</li> <li>• Outside temperature (batteries do not perform as well in cold environments and can lose up to 40% of their performance below 5 ° C).</li> <li>• Tire pressure</li> </ul> <p>Storing the battery in poor conditions (see Storage p.18) can considerably reduce the life and power output of your battery.</p> <p>If you experience a loss of power under normal conditions of use, contact your reseller.</p> <p>The average battery life is 3 to 5 years depending on use.</p>
The Yomper detaches from the mounting bar bracket	<p>Once in place, check that the system is securely locked by pulling on the Yomper.</p> <p>Visually verify that the locking hooks retract and snap back into place on the mounting bar when pressing the Yomper release lever.</p>

<b>Failure</b>	<b>Solution</b>
The mounting bracket comes off the chair or makes a noise	Check the correct tightening of the components. Contact your dealer.
When crossing 2 wheels, the Yomper wheel passes in front of the wheelchair wheels and prevents you from returning to a seated position.	The Yomper stopper is not installed correctly. Contact your dealer immediately.
The bottom of the Yomper rubs when crossing	The mounting bar is too low. Contact your dealer to raise the Yomper mounting bar so that it is located between 19 and 21cm. above the floor/ground.



## 7. Warranty

### Included in the warranty

Included in the warranty	Warranty period (from date of purchase)
Frame, Motor, Electronics and accessories, Battery	2 years

The expected service life of the complete product is (not including consumables) 5 years from the date of sale.

To be able to benefit from the guarantee of new products, it is imperative to keep your purchase invoice of the product. This invoice is necessary for any incident opening with ACEKARE's after-sales service during the warranty period, otherwise all repair costs will be invoiced.

ACEKARE will repair or replace equipment free of charge, parts covered by warranty after verification by a representative authorized by ACEKARE **and if the latter has noted defects in materials and / or workmanship.** Shipping costs of returning the equipment remain the responsibility of the buyer.

For any repairs beyond the warranty period, material costs and transportation costs will be charged and will be the responsibility of the purchaser

## Warranty exclusions

The warranty exclusions extend to the following :

- wearing parts such as tires, bearings, casters, straps ...
  - components damaged by negligence, accident, abuse, overload, commercial use, improper operation, improper maintenance or improper storage
  - circumstances beyond the control of ACEKARE
  - modifications and / or repairs carried out without the written consent of ACEKARE
  - faults due to natural wear and tear, improper operation, in particular faults due to non-compliance with these operating instructions, accidents, damage caused by negligence, the effects of fire and water, cases of force majeure and other causes which are not within the sphere of influence of the Acekare company
  - Maintenance work due to daily use (e.g. changing tires).
  - Checking the device without finding any faults.
  - Other components and products used with the Yomper (manual wheelchair in particular)
- If the serial number on the frame is not original or has been altered , or does not match that on the warranty card or if the serial number on the warranty card is altered, the warranty will be void.
- The warranty is transferable from person to person. As a distributor, our responsibility is to repair or replace damaged parts.

To the extent permitted by law, this warranty instruction supersedes all other warranties; such as writing, oral, expressive or implied warranties, including warranties of merchantability or any particular purpose application, in the event of a conflict between the same, this warranty instruction shall prevail.

## Disclaimer

ACEKARE declines all responsibility for any bodily injury or material damage as a result of incorrect or dangerous use of this manual wheelchair drive system.

If you have any questions about the Yomper and its safe operation, please do not hesitate to contact your dealer

## 8. Technical data

Mileage battery : from **23 to 35 km** depending on the battery

Maximum speed (flat surface) : **10 km/h**

Maximum speed (inclined plane 3%) : **4 km/h**

Engine power : **250 W**

Motor voltage : **24 V**

Operating temperature : **-25°C à +50°C**

Theoretical consumption in a straight line : **5,9 Wh/km**

Theoretical consumption in maneuver : **22,5 Wh/km**

Total weight : **5,8 kg** (battery 160wh),  
**6,2 kg** (battery 240wh)

**Note :** These values were measured with a 100kg passenger. Battery life and speed may vary depending on conditions of use.

### Engine Block

Overall length : **391 mm**

Overall width : **164 mm**

Overall height : **335 mm**

Weight : **4,9 kg**

Wheel diameter : **8 inch** (203mm)

## Battery

Battery Type :	<b>Lithium-ion</b>
Nominal voltage :	<b>24 V</b>
Minimum voltage (uncharged) :	<b>19 V</b>
Maximum voltage (charged) :	<b>29,4 V</b>
Overall dimensions :	length <b>101mm</b> X width <b>101mm</b> X height <b>70mm</b>
Weight :	<b>0,9 kg</b> for 160wh battery, <b>1,25 kg</b> for 240wh battery
User weight :	<b>150 kg maximum</b>

## Compatibility









### Fixed rigid frame wheelchair

Manual wheelchair wheel diameter :	<b>24,25,26 inch</b>
Camber bar diameter :	<b>15 to 40 mm</b>
Diameter of the bar under the seat :	<b>22 to 59 mm</b>

### Folding frame wheelchair

Wheel diameter manual wheelchair :	<b>22,24,25,26 inch</b>
Seat width :	<b>32 cm to 55 cm wide</b>

## List of symbols and descriptions :

Symbol	Symbol Title	Symbol Description
	Catalog number	Indicates the manufacturer's catalog reference in order to identify formally the medical device.
	Date of manufacture	Indicates the date on which the medical device was manufactured
	Lot code	Indicates the manufacturer's batch code in order to formally identify the batch.
	Serial number	Indicates the manufacturer's serial number in order to formally identify a specific medical device
	Maker	Indicates the manufacturer of the MD, as defined in EU regulation (2017/745)
	Temperature limit	Indicates the minimum and maximum temperatures to which the medical device can be safely exposed.
	Consult the instructions for use	Indicates to the user that it is necessary to consult the instructions for use
	Electronic waste	

# acekare

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