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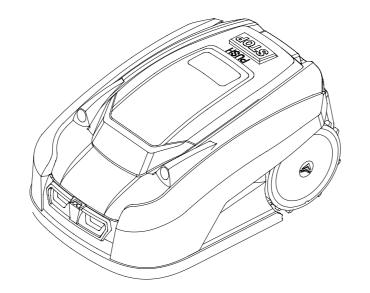




myRobotcenter



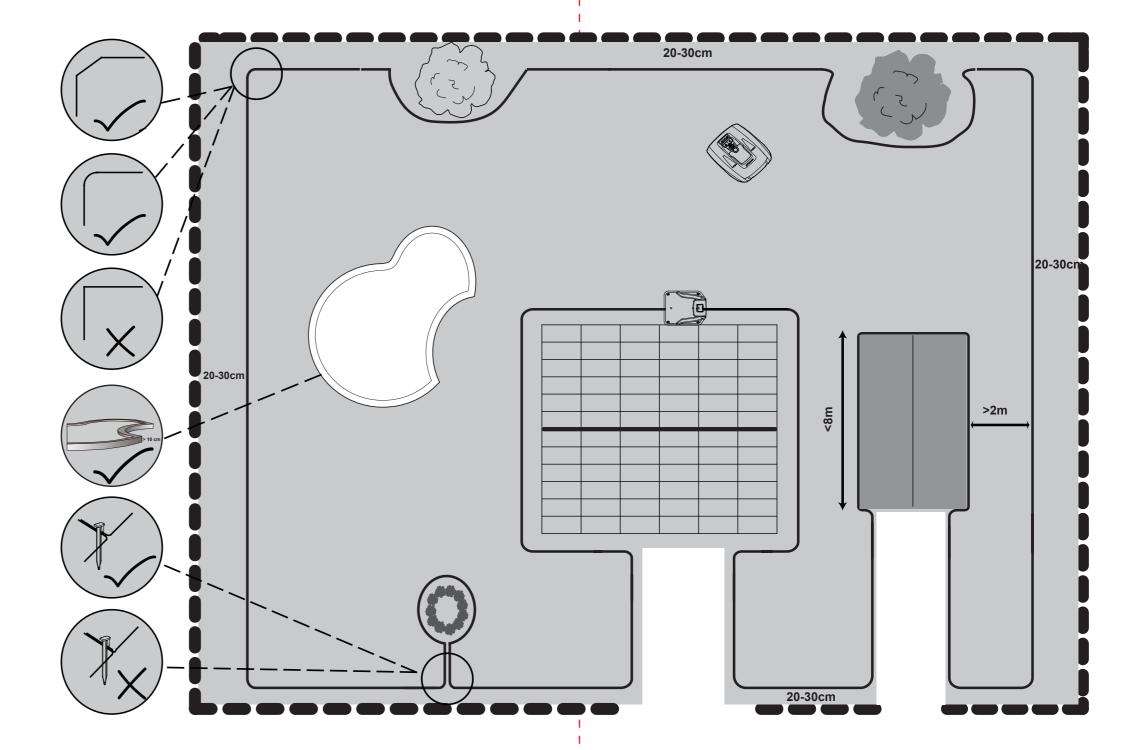




# LUV600Ri LUV1000Ri



- ROBOTIC MOWER Installation Guide
- MÄHROBOTER Installationsanleitung
- ROBOT-TONDEUSE
  Guide d'installation
- ROBOTMAAIER
  Gebruiksaanwijzing
- ROBOSEKAČKA Průvodce instalací
- ROBOT KOSZĄCY Instrukcja instalacji

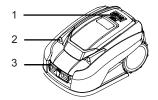


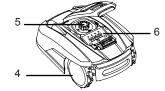
# **CONTENT**

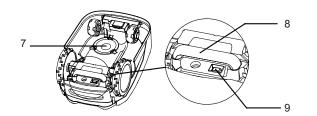
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# **Description of product**

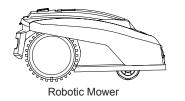
- 1. STOP button
- 2. Ultrasonic sensor
- 3. Charging inlet
- 4. Rear wheel
- 5. Height adjustment dial
- 6. Control panel
- 7. Blade plate
- 8. Carry handle
- 9. Power switch button

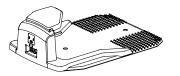






# Parts included within this box





Docking station









Spare blades





Connectors

Extension cord Switching Power Supply













Boundary wire

## Installation

#### **Installation Guide**

This chapter explains how to install the Robotic Mower. Please read this fully before you start the installation.

## Before you begin

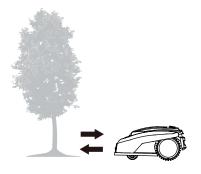
We recommend creating a sketch of the lawned area you plan to mow on paper before you begin installation. Make sure you include all obstacles, such as bushes, flower beds, and paving. This will give you a visual representation of how to correctly place the boundary wire around your garden perimeter. Make sure you have a hammer, wire cutters, pliers or scissors to hand.

## **Avoiding Obstacles**

The Robotic Mower is equipped with ultrasonic sensors. These will detect any rigid and fixed obstacles higher than 100mm, such as walls, fences, and garden furniture. When triggered, the Robotic Mower will stop, reverse backwards and then continue mowing in a different direction. Make sure you lay the boundary wire correctly to ensure the machine avoids obstacles.

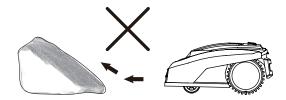
#### **Trees**

The Robotic Mower treats trees as common obstacles, however if the tree roots are exposed and lower than 100mm they will need to be excluded from the mowing area with the boundary wire. This is to avoid damaging the root, blades, or rear wheels.



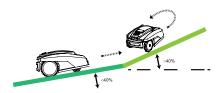
#### **Stones**

We recommend clearing the lawn of small (less than 100mm high) rocks and stones and any stones with a round or sloped edge. The Robotic Mower might try and climb such rocks instead of recognising them as a barrier. A Robotic Mower getting stuck on such a stone requires user intervention to restart mowing. Contact with stones can result in damage to the blades.



### **Slopes**

The Robotic Mower can navigate slopes up to a maximum of 40% incline or decline.



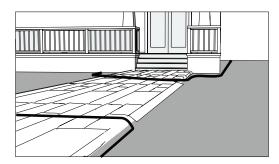
### **Paths, Driveways and Roads**

If you have an elevated driveway or walk way which crosses through your lawn, you will need to exclude this from the cutting area. Remember to allow a safety distance of 40cm between the elevated area and the boundary wire.



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If the driveway and lawn are at the same level, feel free to use the boundary wire to create a corridor. This allows your Robotic Mower to cross the driveway and reach the opposite lawn.



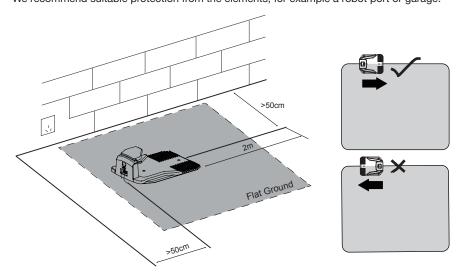
#### **Uneven lawn surfaces**

Your docking station will need a permanent connection to mains power, so make sure you place it in the nearest location possible.

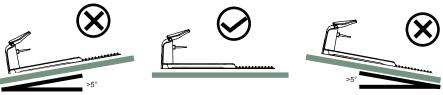
## Placing the docking station

Locate the best position for your docking station. Be aware that it needs a permanent connection to the mains, so take into account the location of the nearest power outlet.

To ensure the Robotic Mower can return to the docking station smoothly, leave 2m of straight wire to the front of the docking station and 50cm to the side facing the cutting area. Use a shaded location for the docking station, as a lower temperature while charging is beneficial to the battery. Important: Place the docking station on an even, flat surface away from ponds, pools or stairs. We recommend suitable protection from the elements, for example a robot port or garage.



Do not place the docking station too close to a slope, such as at the top of a hill or the bottom of a furrow. Avoid left and right inclination in excess of 5 degrees.

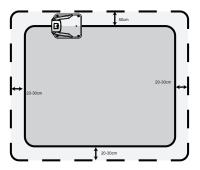


If your lawn has a soft or uneven surface, we recommend fortifying the area around the docking station with a grass protection mesh. Otherwise, the repeated stress of the rear wheels can damage the turf.

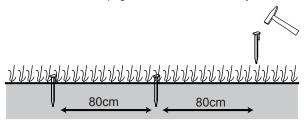
Once the position of the docking station is confirmed and mains electrical connection is laid out, please do not connect to main power yet. Finish all boundary layout work before connecting the docking station to the power supply.

### Pegging your boundary wire

We strongly recommend mowing the lawn to 60mm or less before laying out the boundary wire. Burying the boundary wire is entirely optional. Still, the closer to the ground you lay out the boundary wire, the lower the chance of tripping over it or damaging it when mowing the lawn. Use the ruler (included on the packaging) to ensure the required 20-30cm distance between wire and obstacles.



The recommended distance between two pegs is about 80 cm in straight lines, and less in tight curves. Note that the pegs' hook and wire slit always faces the outside of the boundary.

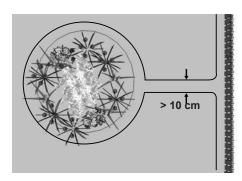


When initially placing the pegs, do not drive them fully into the ground. Use a light hammer to drive them in a little bit. Also locate the fixing pegs and lay each one on the lawn at approximately the correct distance from lawn edges (20-30cm) and obstacles.

#### **Flowerbeds**

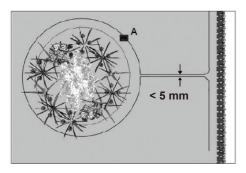
Use the boundary wire to exclude any flowerbeds from the cutting area. There are two options for the two lengths of boundary wire running between the flowerbed and the outer boundary:

1) Keep the distance between the parallel wires above 10cm. This way, the Robotic Mower will recognise the boundary wire as an ordinary obstacle. When cutting, it will "bounce" off it as expected. When following the boundary wire back to the docking station, it will take the detour around the flower bed.



2) Alternatively, keep the distance between the two parallel wires below 5mm. Do not cross the wires - see below. This way, the Robotic Mower will not recognise the wires and travel across them unhindered. This option requires placing an obstacle on the boundary wire around the flowerbed. Place the obstacle, e. g. a large rock or pole, near position A indicated on the below illustration. The obstacle must be surrounded by a flat area of about 1m x 1m, without any slopes. This obstacle will allow the machine to exit the circle.

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#### **Ponds and Pools**

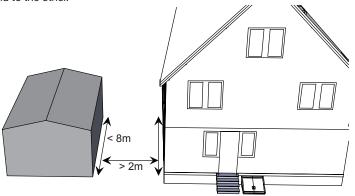
While the Robotic Mower is protected against rain and spray water, being submerged is likely to cause severe damage to the electronic parts.

Therefore, it is imperative to exclude any open water sources from the cutting area. For added safety, we recommend placing a fence around any water.

## **Boundary Corridors**

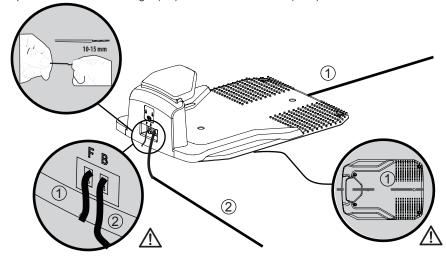
If you have created a boundary corridor inside your working area, the corridor should be at least 2 m wide and a max length of 8 m.

If a corridor is too narrow or too long, the Robotic Mower might not be able to navigate it from one end to the other.



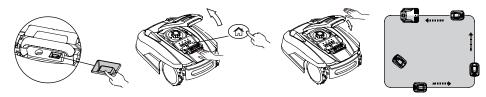
## Connect the docking station to the boundary wire

Run the boundary wire underneath the front of the docking station and connect the end of the wire to the left (black) connector marked 'F' (front). After you have placed the wire around the garden then place the other end into right (red) connector marked "B" (back).



Once the blue LED confirms all is OK, test the Robotic Mower's function. Check the LED regularly to ensure fixing the boundary wire has not affected the connection and signal shows S1 on the charging satation. Then place the Robotic Mower in the working area, a few metres beside the docking station. Set the main power switch to "ON".

Press the buttons  ${f STOP}$  and  ${f CP}$ , a few seconds later, the Robotic Mower should automatically return to the docking station by locating and following the boundary wire in anti-clockwise direction. If Robotic Mower fails to dock correctly, move the docking station to a more suitable position.

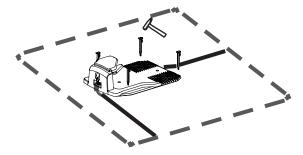


Once the device has docked, the symbol will start flashing. This indicates that the battery is charging correctly.

After initial installation, the Robotic Mower will remain in the docking station until the battery is fully charged.

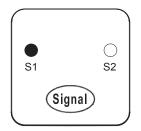
Successful docking and charging indicates that you have found a suitable position for the docking station. You should now start fixing pegs into ground fully.

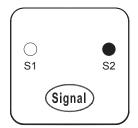
Take care not to damage or kink the surplus wire stored under the docking station.



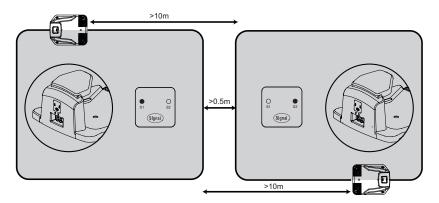
## **Signal selection**

There are two signals which can be selected, S1(blue indicator) and S2(red indicator). Make sure your Robotic Mower and docking station are using the same signal.





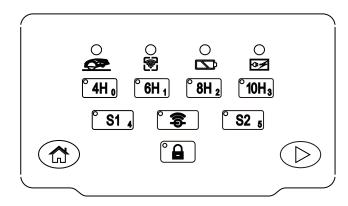
If your neighbour is using the same robotic mower, will need to keep a distance of 0.5m between you and your neighbour's boundary wires to prevent the two devices interfering with each other. Ensure to position your docking station at least 10m away from your neighbour's boundary wires and that both products are using different signals. Please refer to section "Signal setting" in order to select signal S1 or S2 for your installation.



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# **Operation**

## **Control panel**



## **Indicator meaning**



Will flash when lifted or climbing an obstacle.



Will flash when no signal received from boundary wire.



Will flash when battery is low.



Will flash when charging in the docking station.

## **Physical button**

LED indicator will show under the working time button that has been selected. Robotic Mower will go back to docking station when the selected time is over.











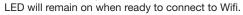
LED will show when signal S1 is selected.



LED will show when signal S2 is selected.



LED will flash slowly when there is no Wifi connection



LED will flash quickly when successfully connected to Wifi.



LED will show when pressed and will lock the control panel.

## Start mowing

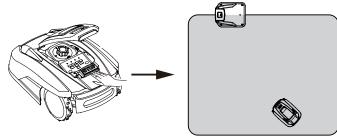


Press start button and close the top cover, Robotic Mower will start to work after after you hear a long beep.

## **Return to docking station**



## **Emergency Stop**



Press STOP button to break the mower at any time.

#### **Halt the PIN Code**

- Switch OFF the mains power switch.
- Press and hold the lock button 🖺.
- Hold down the lock button while switching ON the main power switch. After about 6 seconds, all LEDs on the control panel will start flashing quickly.
- Release the lock button Page 1
- Within 6 seconds, enter your new PIN-Code.



The Robotic Mower will confirm the changed PIN with a single beep.

All LEDs will turn off and the Robotic Mower will reboot. The LED of lock button will flash, confirming that the reboot is complete. The Robotic Mower can now be unlocked with the new PIN.

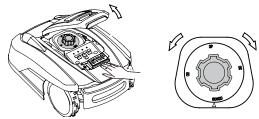
#### NOTE!

If you do not remember your PIN code, please set a new PIN as described above. It is not possible to reset the device to the default PIN code of "4x PIN code of

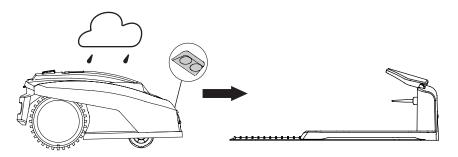
## **Cutting height adjustment**

Cutting height can be adjusted by rotarting the height adjustment dial. Cutting heights range from 20 - 60mm.

To get the best cutting performance from the Robotic Mower and to avoid any damage, it is advised that you use a lawnmower or grass trimmer to cut the lawn to 60mm or below before using the Robotic Mower.



## **Rain Sensor**



## **Technical Data**

| Model                                   | LUV600Ri             | LUV1000Ri            |
|---|----------------------|----------------------|
| Max cutting area                        | 600 m <sup>2</sup>   | 1000 m <sup>2</sup>  |
| Battery pack                            | 28V/2000mAh          | 28V/2850mAh          |
|   | Input: 100-240V AC,  | Input: 100-240V AC,  |
| Switching power supply                  | 50/60Hz, 56W         | 50/60Hz, 56W         |
|   | Output:32VDC, CC1.5A | Output:32VDC, CC1.5A |
| Mowing time on one charge               | 60 min               | 80 min               |
| Rated voltage                           | 28 V                 | 28 V                 |
| Rated power                             | 50 W                 | 50 W                 |
| No load speed                           | 3500/min             | 3500/min             |
| Cutting width                           | 18 cm                | 18 cm                |
| Cutting height                          | Approx               | Approx               |
|   | 20-60 mm             | 20-60 mm             |
| Charging time                           | 60 min               | 90 min               |
| Weight                                  | 8.5 Kg               | 8.5 Kg               |
| Measured sound pressure L <sub>pa</sub> | 53 dB, K=3 dB        |                      |
| Measured power pressure Lwa             | 64dB, K=3 dB         |                      |
| Degree of protection:                   |                      |                      |
| Robotic Mower                           | IP24                 | IP24                 |
| Switching power supply                  | IP67, Plug IP44      | IP67, Plug IP44      |
| Spare parts                             |                      |                      |
| Spare Blades                            | 6 Pcs                | 9 Pcs                |
| Boundary pegs                           | 150 Pcs              | 220 Pcs              |
| Boundary wire                           | 120 m                | 200 m                |
| Connectors                              | 3 Pcs                | 3 Pcs                |

## **Maintenance and storage**

Maintenance works that have not been instructed within the manual should only be carried out by a recommended servicing agency. Only use original parts.

#### Maintenance

Check and clean your Robotic Mower Regularly. Preferably use a dry brush, damp cloth or a sharpened wooden piece to remove any debris which may be stuck.

Do not clean with a hose or the high pressure water flow from a pressure washer as this may cause damage. Replace worn parts as necessary.

## **Winter Storage**

During winter, keep your mower, docking station and power supply in a dry place.

We recommend a shed, garage or preferably store it indoors.

Prepare your device for winter storage as follows:

- 1. Fully recharge the battery.
- 2. Set the mains power switch to "OFF".
- 3. Thoroughly clean your Robotic Mower.
- 4. Unplug the power supply from the mains outlet.
- 5. Disconnect the power supply from the docking station.
- Disconnect the boundary wire from the docking station. Lift up the docking station and clean.
   The boundary wire can remain outside. However, it is imperative to protect the wire against corrosion. We recommend a water-free grease or suitable sealing tape.

If available, repack the product in the original packaging.

Alternatively, our service centre offers a winter service for your device. This will include a check-up of all parts and - if available - a software upgrade.

## **Preparing for spring**

After winter storage, please clean the charging contacts on both the Robotic Mower and the docking station.

Use a fine abrasion paper or a brass brush; this will help to achieve the best charging efficiency and avoid any charging interference.

## Cleaning the mower body

As your Robotic Mower is battery powered you need take care when cleaning. Remove rough dirt with a soft brush. Use a manual water spray with mild household detergent for intensive cleaning. Wipe off any residue after cleaning with a damp cloth.

## Cleaning the underside

Ensure the main power switch is in OFF position. Wearing protective gloves, turn the Robotic Mower onto its side to expose its underside. Clean the blade disc and frame using a soft brush or damp cloth. Rotate the blade disc to make sure that it can move freely, check that the blades can turn on their pivots and that there is no grass is obstructing them.



## Clean the contact pins and the charging strips

Using wire wool, metal cleaner or very fine grade emery paper, clean the contact pins and the charging strips on your mower and docking station. Remove any debris, leaves, or grass clippings around the contact pins and charging strips to ensure efficient charging.

## Reversing or replacing the blades



#### WARNING!

Ensure the Robotic Mower is completely shut off before cleaning, adjusting or replacing the blades. Always wear protective gloves.



#### WARNING!

To ensure maximum cutting efficiency and safety, always use recommended replacement blades and blade mounting parts when replacing.

Your Robotic Mower has three blades, fixed to the blades disk.

Unless damaged by hard obstacles, these blades can last for up to five months of everyday use. Weekly inspection of the blades and the fixing screws is advised. Note that the blades are double-edged. When the first side becomes blunt, loosen the fixing screw and the blade upside down and re-fix. Check that the blade can move freely.

A set of spare blades is included with the Robotic Mower. More blades can be purchased via our customer support team or our website www.yardforce.eu.

To ensure you get the best performance from your machine, always replace all three blades at the same time. Only use spare parts recommended by manufacturer.

## Spare parts list

Call the customer support team if you want to order below spare parts.









Boundary pegs Spare b

Boundary wire connectors

Boundary wire

## **Software Update**

Should your machine need a software update, contact our customer support team for more information.

# **Troubleshooting**

## **Robotic Mower cannot dock with docking station**

- Check that the boundary wire in front and underneath the charger is in a straight line.
- Check that the docking station's position is suitable as explained in this manual.

## Robotic Mower runs in circles while mowing or while following boundary wire back to docking station.

- Verify that no power cable runs parallel and in close proximity the boundary wire. If necessary, reposition the boundary wire.
- Check if a front wheel is stuck.
- If a neighbor has a similar Robotic Mower, the signals may interfere. Try setting your docking station and Robotic Mower to the alternative boundary signal.
- Driving motor may be damaged, please contact our customer support team.

## The Robotic Mower is noisy.

- Inspect the blade fixing screws; tighten if necessary.
- Inspect the blades for damage; replace if necessary.
- Grass may be too high. Try increasing the cutting height, or mow the lawn with an ordinary lawnmower first.
- Cutting motor failure, please call our customer support team.

## Mower remains at or returns to docking station when pressing START **button**

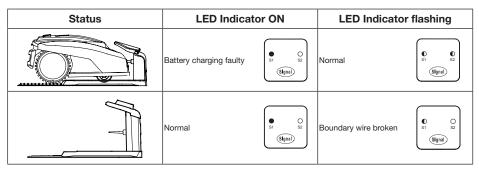
- Check if the mower has already completed the programmed working time for that day.
- Battery is low, give the Robotic Mower time to charge and try again.

## LED signal indicator on docking station









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