GUARDIAN-i
BY MONARCH TRACKING

INSTALLATION GUIDE

GUARDIAN-I

1. PRESENTATION

2. INSTALLATION

3. PROGRAMMING AND SETTINGS

4. SECURITY

5. VALIDATION

* The table of contents and icons in this manual are interactive, by clicking on them you will be directed to the chosen location automatically.

1. PRESENTATION

**CONGRATULATIONS! YOU HAVE ACQUIRED A HIGH-QUALITY PRODUCT THAT, FROM NOW ON, WILL PROVIDE YOU WITH MAXIMUM ANTI-THEFT SECURITY FOR YOUR VEHICLE AND ALLOW YOU TO MAKE IMPROVEMENTS BY ADJUSTING IT ACCORDING TO YOUR DRIVING PREFERENCES.
IT CAN BE OPERATED THROUGH THE GUARDIAN-I APP. YOU CAN ALSO USE THE ECO MODE, WHICH HELPS REDUCE FUEL CONSUMPTION. IT CAN BE MANUALLY OPERATED THROUGH THE GUARDIAN-I APP OR CONTROLLED VIA 4 INPUTS ACTIVATED BY AN EXTERNAL DEVICE, SUCH AS A TRACKER.**
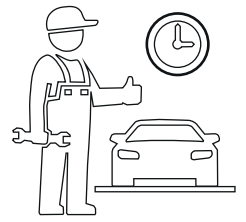
Please read the entire installation manual carefully, paying special attention to the sections with the icons below, as they contain essential installation tips.

ATTENTION, TIPS AND CAUTIONS	TECHNICAL SUPPORT: JUST CLICK TO START THE SERVICE	INSTALLATION TIME: THE AVERAGE INSTALLATION TIME IS AROUND 30 MINUTES

We recommend that the installation of the products be carried out only by an **experienced, qualified, and certified professional who has all the necessary tools to properly install our products**

1.1 FUNCTIONS

1.1.1 ECO MODE: The ECO mode features an acceleration map with 9 levels for adjusting the negative acceleration gain. The higher the adjustment level in ECO mode, the greater the reduction in acceleration response and fuel consumption, while maintaining smooth drivability. If the user demands high acceleration in ECO mode, the vehicle will, for safety reasons, respond with the original acceleration in this condition. This mode is ideal for taxi drivers, app-based drivers, fleet operators, and users who wish to drive in a way that saves fuel when there is no need for a more dynamic acceleration response.

1.1.2 ORIGINAL MODE: To return to the vehicle's original acceleration mode, simply press the OFF button as indicated in the image below. The GUARDIAN-i can be activated and deactivated, and the acceleration maps and levels can be selected at any time; however, avoid making adjustments while the accelerator pedal is engaged.

1.1.3 VALET MODE: This function allows you to limit the vehicle's acceleration to 50%, 40%, 30%, 20%, or 15% of the vehicle's original acceleration. It is recommended for situations such as lending the vehicle to (valet) parking attendants, workshops, driving lessons for beginners, or other scenarios where limiting the vehicle's acceleration is desired. To activate the function, simply press and hold the VALET button for 2 seconds, and to deactivate, press any other button on the main screen.

1.1.4 LOCK MODE: This function is an anti-theft protection for the vehicle that, once activated, will block the operation of the electronic accelerator. To activate the function, simply press and hold the LOCK button in the app for 2 seconds, then confirm by pressing OK (two-level activation for safety). To the pedal lock, just open the app and connect the smartphone to the GUARDIAN-i, which will automatically return to the last selected mode, or press any other button on the main screen if already connected. This function is recommended for use whenever you park the vehicle in public areas and should never be activated while the vehicle is in motion.

1.1.7 AUTO LOCK - SMARTPHONE: This function is designed to allow the automatic locking and unlocking of the vehicle's accelerator pedal, ensuring anti-theft protection. Once the AUTO LOCK function is activated through the Smartphone app, every time the vehicle is started, the GUARDIAN-i will

activate the automatic pedal lock and will search for paired smartphones. Upon detecting the presence of a paired smartphone, the pedal will be immediately unlocked. If the smartphone is not detected, the vehicle's acceleration will remain fully locked, and the LOCK mode will be activated. On Android systems, the automatic unlock occurs even when the app is running in the background or closed. On iOS systems, the automatic unlock happens only when the app is open in the background. If the app is brought to the foreground, the pedal will also be automatically unlocked. After turning on the vehicle's ignition and unlocking the pedal, the pedal will not be locked again in that ignition cycle, even if the smartphone battery runs out. On Apple devices, the iOS operating system may close and deactivate the GUARDIAN-i app automatically due to battery management. In such cases, it will be necessary to open the app again to restore functionality to the GUARDIAN-i app and the function.

On some smartphones, if they are turned off, it may be necessary to turn the Bluetooth module off and on again for the AUTO LOCK pedal deactivation function to resume working. This function can be found in the app under MENU/AUTO LOCK/SMARTPHONE.

1.1.8 AUTO LOCK – MAGIC KEY: The Bluetooth control MAGIC KEY is not included with the product, and once acquired, registered, and the function activated in the app, it serves as a presence key within the vehicle's protection system. Up to 4 MAGIC KEYs can be registered per GUARDIAN-i, which helps prevent theft, armed robbery, or enhance fleet management security. It operates in exactly the same way as the AUTO LOCK function via the smartphone, locking and unlocking the pedal after the vehicle is started. The only difference is that after starting the vehicle and unlocking the pedal, if the presence of the MAGIC KEY is no longer detected by the GUARDIAN-i, the vehicle will activate the pedal lock according to the MAGIC KEY's lock settings. It is possible to configure the type of lock: TOTAL (complete pedal lock) or PARTIAL (maintains a minimal acceleration on the pedal). The activation time for the start of the progressive lock can be programmed from 1 to 20 minutes. Once the programmed time has elapsed, the lock protocol begins, where the progressive lock system will start by limiting acceleration to 50%, reducing by 10% every 10 seconds until the progressive lock protocol is complete, which can be either TOTAL or PARTIAL, depending on the configuration. The presence detection of the MAGIC KEY by the GUARDIAN-i is only possible with the GUARDIAN-i app in the background or closed (disconnected from the module). When the product is paired in the foreground, the lock due to Magic Key distance will not be activated. After 6 seconds of no detection of the GUARDIAN-i with the Magic Key, the GUARDIAN-i app will request the entry of the biometric data or pairing password to unlock the accelerator pedal via the smartphone app.

By default, the permission to disable the AUTO LOCK function using the smartphone's biometric data/password or the registered pairing password (it is recommended to change the original pairing password for security - see item 3.11) is enabled.

If you choose to acquire the Magic Key, please refer to its installation manual for more details. This function is located in the app under MENU/AUTO LOCK/MAGIC KEY.

1.2 CHARACTERISTICS

- It can be installed in any vehicle with an electronic accelerator, with manual or automatic gearbox and with any type of fuel. From light vehicles, pick-ups, SUVs, vans, trucks, motorcycles, etc;

- Its installation is carried out using the original connectors located on the vehicle's electronic accelerator, in a super quick and simple way, maintaining all the vehicle's originality and warranty;

- GUARDIAN-i always stores the last acceleration level configured in each map and every time the vehicle is started it will load the last operating mode. You won't lose your settings if you change the battery;

- Exclusive GUARDIAN-i APP to control all functions from your smartphone;

- **On iOS system and some versions of Android, when the Smartphone is turned off and on or restarted, it is necessary to open the GUARDIAN-i again in order for it to work again via the Auto Lock – Smartphone function.**

1.3 TECHNICAL SPECIFICATIONS

- Operating current: 19mA
- Input voltage: 3V3 / 5V

1.4 APPLICATION

Vehicles with electronic accelerator, manual or automatic gearboxes and any type of fuel.
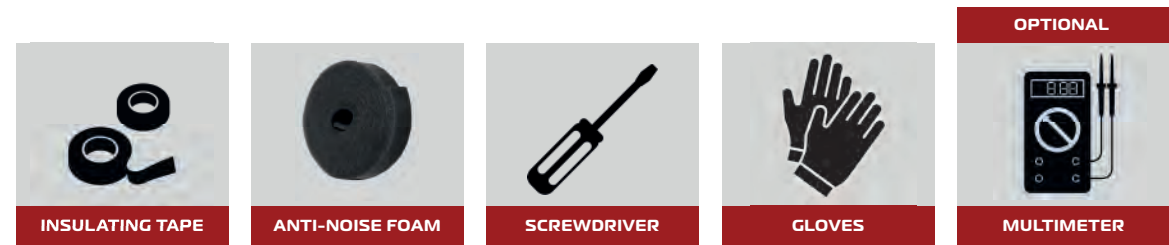
1.5 PACKAGE CONTENTS

- Electronic Module;
- Plug and play Main Harness;
- Nylon tie.

2. INSTALLATION

2.1 NECESSARY TOOLS

| INSULATING TAPE | ANTI-NOISE FOAM | SCREWDRIVER | GLOVES | OPTIONAL — MULTIMETER |

* The above tools and parts are not included with the product.

2.2 PINOUT

4-WAY CONNECTOR   8-WAY MINIFIT CONNECTOR

8-WAY MINIFIT CONNECTOR

PIN	FUNCTION	WIRE COLOR	
1	POSITION SENSOR TPS1 - OUT		YELLOW/BLACK
2	POSITION SENSOR TPS1 - IN		YELLOW
3	POSITION SENSOR TPS2 - OUT		GREEN/BLACK
4	POSITION SENSOR TPS2 - IN		GREEN
5	(-) / GROUND		BLACK
6	POWER SUPPLY 3V3 / 5V		ORANGE
7	INPUT 2- LOCK AUTOMATIC		BROWN
8	INPUT 1 - LOCK MANUAL		WHITE/BLACK

JS 4-WAY CONNECTOR

PIN	FUNCTION	WIRE COLOR	
1	OUTPUT 1 - PEDAL LOCK INDICATOR		PURPLE
2	OUTPUT 2 - PEDAL TRAVEL LIMIT INDICATOR		ORANGE
3	INPUT 3 - ECO MODE LEVEL 9		YELLOW
4	INPUT 4 - VALET MODE 50%		PINK

2.3 ELECTRICAL INSTALLATION DIAGRAM

PURPLE
(OUTPUT 1)

PEDAL LOCK
INDICATOR

ORANGE
(OUTPUT 2)

INDICATOR
LIMIT PEDAL

YELLOW
(INPUT 3)

ECO MODE LEVEL 9

PINK
(INPUT 4)

VALET MODE 50%

YELLOW
(POSITION SENSOR TPS1 - IN)

GREEN
(POSITION SENSOR TPS2 - IN)

ORANGE
(3V3 / 5V POWER SUPPLY)

WHITE/BLACK
(INPUT 1)

LOCK MANUAL

BROWN
(INPUT 2)

LOCK AUTOMATIC

BLACK
(NEGATIVE GROUND)

GREEN/BLACK
(POSITION SENSOR TPS2 - OUT)

YELLOW/BLACK
POSITION SENSOR TPS1 - OUT

MALE CONNECTOR
GUARDIAN-i

FEMALE CONNECTOR
GUARDIAN-i

GUARDIAN-i

3. PROGRAMMING AND SETTINGS

3.1 DOWNLOAD

The app for this product is called GUARDIAN-i APP and can be downloaded for free from the Play Store or the Apple Store. The GUARDIAN-i APP allows you to control all the GUARDIAN-i functions, available for Android and iOS. To use this app, see the instructions and video tutorials available on the app.
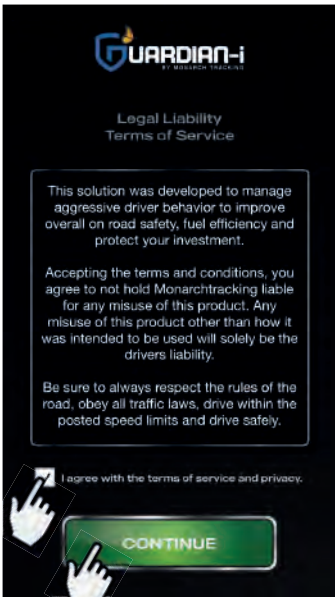
3.2 INITIAL SETTINGS

Turn on the vehicle's switched key so that the **GUARDIAN-i** is switched on together, then open the **GUARDIAN-i APP** to carry out the following pairing, configuration and programming steps:

| 1st Step	2nd Step	3rd Step
Choose your language and click **CONTINUE**	Accept the terms of use and click **CONTINUE**	Accept the terms of use and click **CONTINUE**

For better operation and performance of the GUARDIAN-i APP on ANDROID devices, periodically clean out the temporary files (caches) that accumulate as the APP is used, simply by going to the device's storage settings.

3.3 SMARTPHONE PAIRING

To pair the GUARDIAN-i product with your ANDROID or iOS smartphone, you must first activate the device's BLUETOOTH module as shown below:
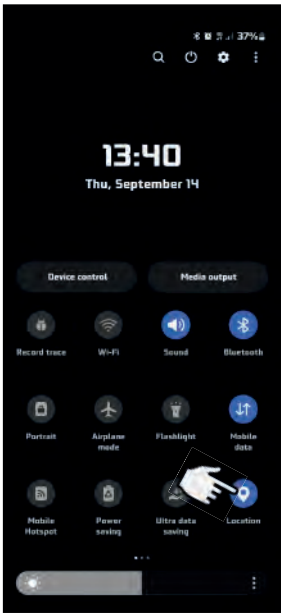**Note: Before performing the first pairing turn off and turn on the BLUETOOTH again.**
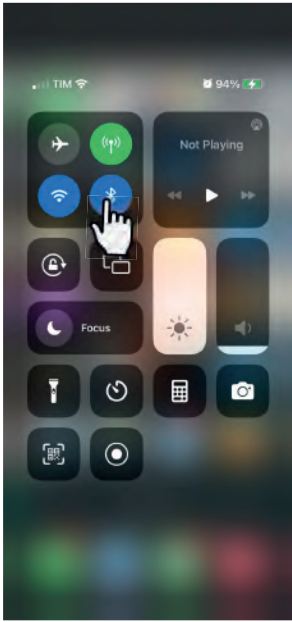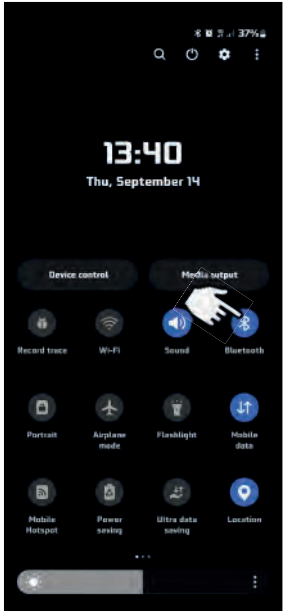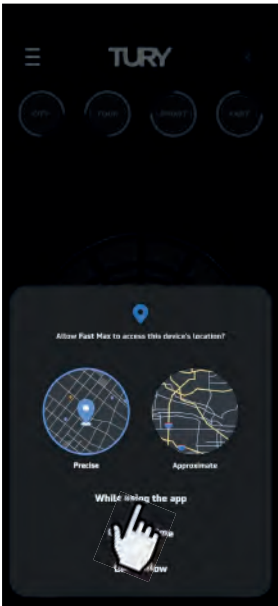

| iOS | Android |

Only on the ANDROID system is it necessary to activate and enable the device's LOCATION system according to the procedures below:

Activate location   While using the App   Activate permission

To perform the first pairing, use the original product password "5020". Follow the steps below:

1º Enter the pairing screen and the devices will be found automatically. Enter the correct pairing password for the desired device;

2º Click on the button for the device you want to pair.

Note: If you enter the incorrect password or enter it without entering any password, you will leave the pairing screen and return with the message "INCORRECT PASSWORD". If this happens, enter the correct password and click on the device button again.

1st Step

Locating the nearest GUARDIAN-i device   Click on the button on the device

In addition to the video on pairing and programming the pedal, we have made available other videos on how to use all the features of the GUARDIAN-i through the GUARDIAN-i APP.

> ⚠️ We recommend that after the first pairing or afterwards, you change this original password for security purposes in MENU/SETTINGS/USERS AND PASSWORD to prevent anyone from pairing without your permission. Only previously paired smartphones will be able to use the GUARDIAN APP and access its functions.

3.4 ACCELERATOR PEDAL PROGRAMMING

After completing the installation and the initial pairing with the Smartphone using the password, the GUARDIAN-i APP will automatically open the screen to program the accelerator pedal. It is mandatory to program the pedal before using the product in any other operating mode for proper functioning. The pedal programming can be accessed in the GUARDIAN-i APP under MENU/PEDAL PROGRAMMING. The pedal programming should be done only once and can be performed with the ignition key on and the engine either off or running, as there will be no acceleration during the programming process (except for GUARDIAN-i 5.4).
Watch the video to program the accelerator pedal and follow the instructions below: NEVER CHANGE THE MAPS WITH THE ENGINE ON BEFORE PROGRAMMING THE PEDAL
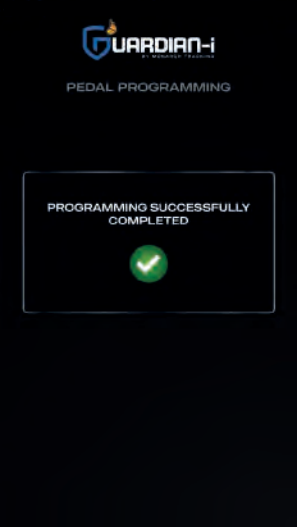
1st Step	2nd Step	3rd Step	
Click on YES	Click on START	Press the accelerator pedal all the way down and hold.	Programming completed

> ⚠️ It is mandatory to program the pedal before using the product in any operating mode for proper functioning. If you wish to program the pedal after pairing, go to MENU / PEDAL PROGRAMMING in the GUARDIAN-i APP and follow the procedures above. The pedal programming should be done only once and can be performed with the ignition key on and the engine either off or running, with no engine acceleration during the programming

3.5 USER CONTROL AND PASSWORD PAIRING

Now see another advantage of your GUARDIAN-i product: in addition to full control over paired users, you will also have control to change the pairing password, all through the App. Please note that the maximum limit is 4 users. To edit or delete a user, open the GUARDIAN-i APP and click on MENU/USERS/PASSWORD. After viewing the registered users, click on the user you wish to edit or delete and confirm as shown below:

1st Step	2nd Step	3rd Step	4th Step
Click on MENU	Click on USERS/ PASSWORD	Click on the desired user	Select EDIT or DELETE

After confirming the deletion of your user, the next time you open the GUARDIAN-i APP, you will need to pair again. To change the pairing password, simply click on the current password, enter the new 4-digit password, and confirm by pressing the ENTER button as indicated below.

1st Step	2nd Step	3rd Step	

Click on the password	Enter the new password	Click on the ENTER button	Password changed

3.6 SELECTION OF THE ORIGINAL MODE

Once the installation, pairing, and pedal programming of the GUARDIAN-i are completed, it is ready to be used. To select the ORIGINAL mode, simply click the button as indicated below.
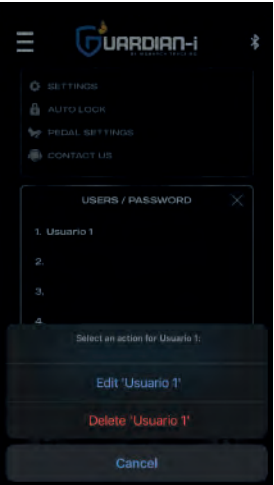

Selecting ORIGINAL mode

3.7 SELECTION OF THE ECO MODE

The ECO mode features an acceleration map with 9 levels for adjusting the negative acceleration gain. The higher the ECO mode adjustment level, the greater the reduction in acceleration response and vehicle fuel consumption, while still maintaining good drivability. If the user demands high acceleration in ECO mode, for safety reasons, the vehicle will respond with the original acceleration in this condition. This mode is ideal for taxi drivers, rideshare drivers, fleet operators, and users who wish to drive with a focus on fuel economy when a more dynamic acceleration response is not required. To select ECO mode, simply click the button as indicated below.

Selecting ECO mode	Deactivating ECO mode

Choose the acceleration level of ECO mode between 1 and 9 according to your power and fuel consumption needs.

1º Click directly on the desired level or click on the last active level;

Slide to the desired level;

2º Release to update the new setting.

1st Step	2nd Step	3rd Step
Click on the current level	**Slide to the desired level**	**Release your finger to update the new setting**

⚠️ The higher the adjustment level of ECO mode, the greater the reduction in the vehicle's acceleration response and fuel consumption. In this economy mode, if the user requires maximum acceleration (higher torque), the economy mode is temporarily deactivated during this need.

3.8 SELECTION OF THE VALET MODE

This function allows you to limit the vehicle's acceleration to 50%, 40%, 30%, 20%, or 15% of the vehicle's original acceleration. It is recommended for situations such as vehicle loans at valet parking, workshops, driving lessons for beginners, and other occasions where limiting the vehicle's acceleration is desired. To activate the function, press and hold the VALET button for 2 seconds, and to deactivate it, simply click any other button on the main screen.

1º Open the GUARDIAN-i APP and on the main screen, press the letter P (VALET) for 2 seconds;

2º Click ACTIVATE.

3º To DEACTIVATE, simply click one of the buttons (OFF, LOCK, or ECO).

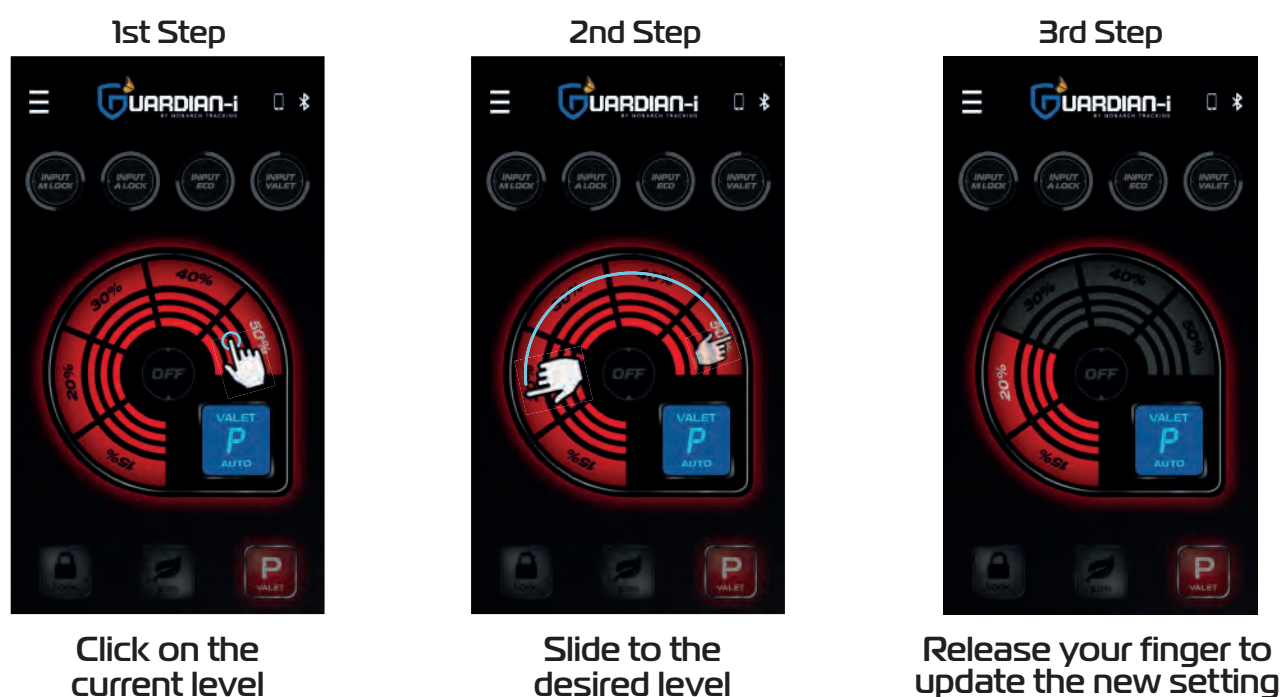| 1st Step	2nd Step		3rd Step
Press for 2 seconds	**Click activate**	**Function activated**	**Deactivating VALET mode**

Choose the maximum acceleration level (between 15% and 50%) according to your needs or parking location, as the acceleration response may vary depending on the power of each engine.

1° Click directly on the desired level or click on the last active level;

2° Slide to the desired level;

3° Release to update the new setting.

1st Step	2nd Step	3rd Step

| Click on the current level | Slide to the desired level | Release your finger to update the new setting |

If the AUTOLOCK SMARTPHONE function is enabled, after activating the VALET function, this feature will be disabled until leaving the VALET function, and the automatic pedal lock will not occur after turning on the ignition key while using the VALET function.

If the AUTOLOCK MAGIC KEY function is enabled, after activating the VALET function, this feature will be disabled until leaving the VALET function, and the automatic pedal lock will not occur after turning on the ignition key while using the VALET function. However, the valet driver will have only 10 minutes of tolerance to park the vehicle. If this time elapses while the vehicle is still in motion, the GUARDIAN-i will initiate progressive locking until the vehicle's acceleration is completely cut off, in case the MAGIC KEY or Smartphone is not detected.
If this occurs, only the detection of the MAGIC KEY or Smartphone will unlock the vehicle. It is important to note that this time will always be reset (renewed) if the vehicle is turned off before the completion of the 10 minutes of tolerance.

> ⚠️ It is possible to manually deactivate the VALET function:
> It can be deactivated using the rescue time function. Turn on the vehicle's ignition key without starting the engine, and do not move the accelerator pedal until the rescue time set in the GUARDIAN-i APP is completed.
> This time can be configured through the GUARDIAN-i APP (see 3.12).
> To prevent the smartphone from running out of battery while the VALET function is activated, we recommend keeping a smartphone charger available in the vehicle.

3.9 SELECTION OF THE LOCK MODE

This function is an anti-theft protection for the vehicle that, once activated, will block the operation of the electronic accelerator. To activate the function, simply press and hold the LOCK button on the app for 2 seconds, then confirm by pressing OK (two-level activation for safety). To remove the pedal lock, open the app and connect the smartphone to the GUARDIAN-i, which will automatically return to the last selected mode, or click any other button on the main screen if already connected. It is recommended to use this function whenever parking the vehicle on public roads and should never be activated while the vehicle is in motion.

To manually activate the LOCK function, follow the steps below:
   1º Open the GUARDIAN-i APP and, on the main screen, press and hold the LOCK button for 2 seconds;
   2º Click on "Activate";
   3º Click on the "DISABLED" button to activate the RESCUE SYSTEM function, and to deactivate, simply click on the "ACTIVATED" button;
   4º Click the up arrow to increase the rescue time, or click the down arrow to decrease the rescue time;
   5º Read all the recommendations and warnings, then click "OK" to close, and the function will be activated;
   6º If the LOCK function is manually activated, to unlock it, simply open the GUARDIAN-i APP, which will automatically return to the last selected mode, or click any other button on the main screen.

Increase
time

Reduce
time

**Press for
2 seconds
on LOCK**

**Click on
activate**

**Click to activate the
rescue function**

**Setting the
rescue time**

5th Step   6th Step

Function activated

**Desativating or
LOCK mode**

3.10 AUTO LOCK - SMARTPHONE

This function is designed to enable the automatic locking and unlocking of the vehicle's accelerator pedal, ensuring anti-theft protection. Once the Smartphone AUTO LOCK function is activated in the app, every time the vehicle is started, the GUARDIAN-i will activate the automatic pedal lock and search for paired smartphones. Once the presence of a registered smartphone is detected, the pedal will be immediately unlocked. If the smartphone is not detected, the vehicle's acceleration will remain fully locked, and the LOCK mode will remain activated.

On Android devices, the automatic unlock occurs even when the app is in the background or closed. On iOS devices, automatic unlocking occurs only when the app is open in the background. If the app is brought to the foreground, the pedal will also be unlocked. After turning on the vehicle's ignition and the pedal being unlocked, it will not be locked again during that ignition cycle, even if the smartphone battery is depleted. On Apple devices, the iOS operating system often closes and deactivates the GUARDIAN-i APP automatically, even when it is in the background, due to battery management. In these cases, it will be necessary to open the app again for the GUARDIAN-i APP and the function to resume operation.

On some smartphones, when they are powered off, it may be necessary to turn the Bluetooth module off and on again for the AUTO LOCK pedal deactivation function to work properly. The LOCK function can be deactivated by opening the app and entering the 4-digit pairing password, as indicated by the button on the AUTO LOCK SMARTPHONE screen. This function is located in the app under MENU/AUTO LOCK/SMARTPHONE, and to activate it, follow the procedures below:

1º Open the FAST MAX APP and, on the main screen, press the MENU button in the top-left corner;

2º Choose the AUTO LOCK option;

3º Select the SMARTPHONE option;
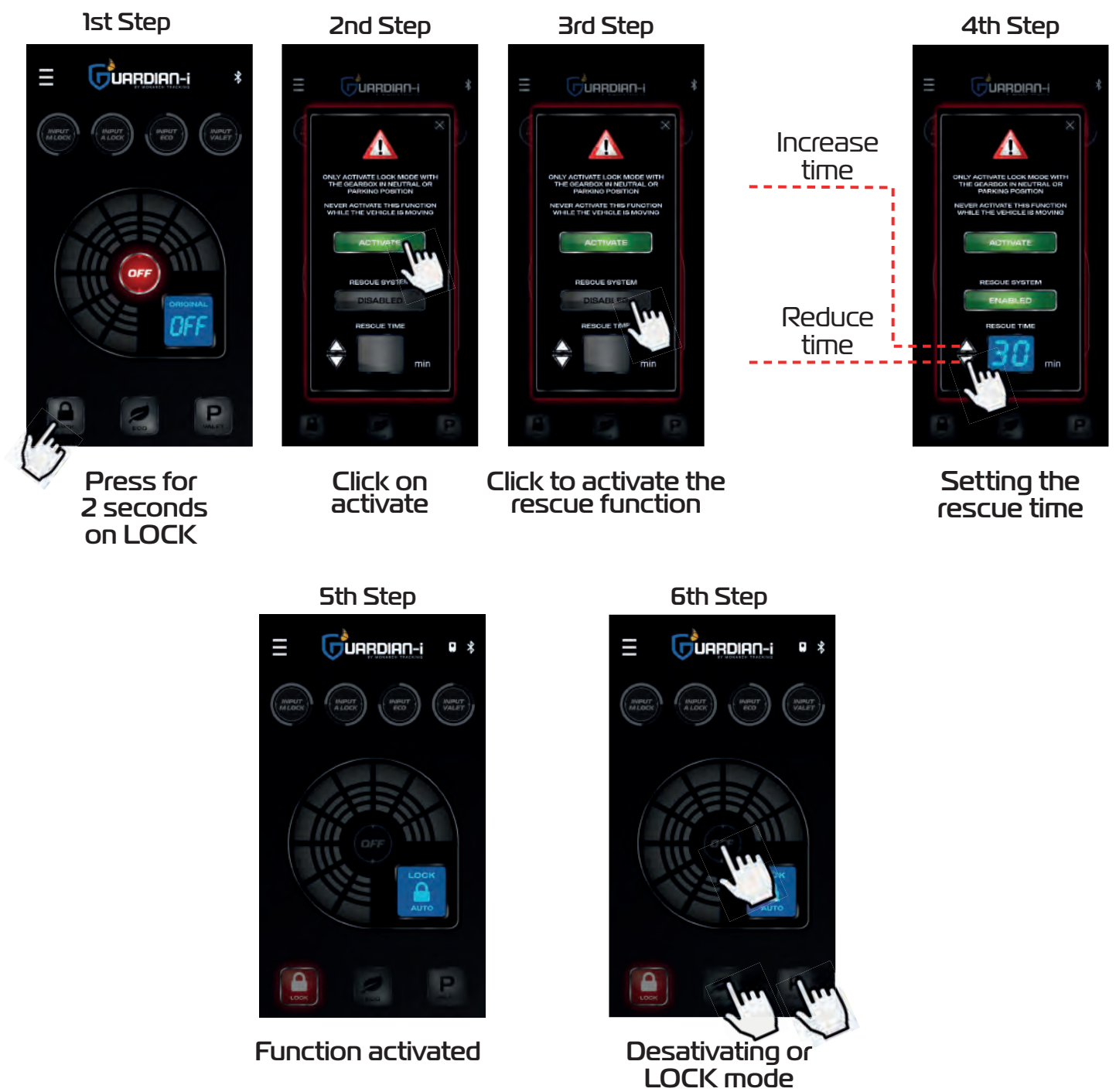
4º Click on the "DISABLED" button to activate the AUTO LOCK function, and to deactivate, simply click on the "ACTIVATED" button;

5º Read all the recommendations and warnings, then click the "X" to close, and the function will be activated;

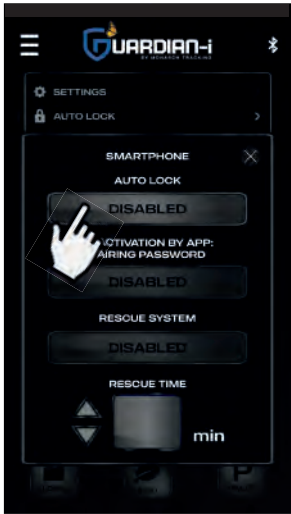6º Click to enable unlocking with the pairing password.

1st Step	2nd Step	3rd Step

Click on MENU	Click on AUTO LOCK	Click on SMARTPHONE

4th Step	5th Step	
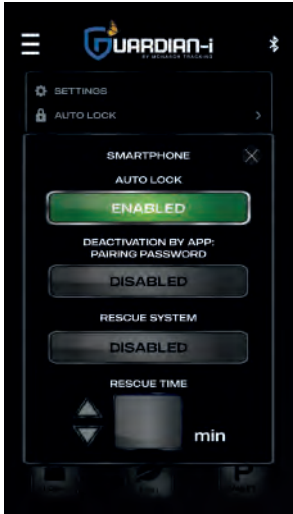
Click to activate the function	Read all the recommendations	Function activated

6th Step
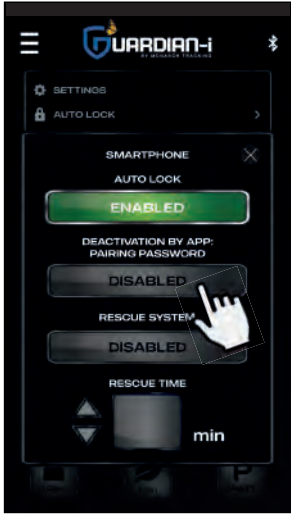
Click to activate pairing password unlock	Function activated
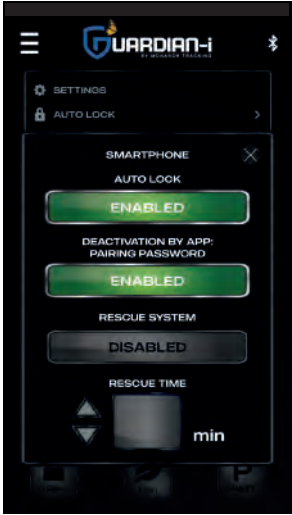
> ⚠️ After turning off the ignition key, the system will keep the pedal powered for a few seconds or minutes, depending on the vehicle type and model. If the user returns to the vehicle before the pedal power is turned off, the AUTO LOCK system will not be able to activate the pedal lock in this case. The pedal lock will only be activated after a new ignition cycle.
> On Apple devices, the iOS operating system often closes and deactivates the GUARDIAN-i APP automatically, even when it is in the background, due to battery management. In such cases, it will be necessary to click to open the app again for the GUARDIAN-i APP and the function to resume working.

The rescue time was developed to allow exiting the LOCK and VALET modes without using the GUARDIAN-i APP in cases of smartphone loss or damage.

To activate the rescue function, it is necessary to turn on the ignition key only and wait for the configured time without touching the accelerator pedal. After the programmed time in the app has passed, the product will unlock the pedal, exiting the LOCK or VALET mode, and return to the ORIGINAL acceleration mode.

If any acceleration occurs within the rescue time window, this function will be canceled for that ignition cycle. If the AUTO LOCK SMARTPHONE or MAGIC KEY functions are activated, the pedal will be unlocked via the rescue function only in the next cycle, meaning the vehicle must be turned off and on again (respecting the time for the pedal power to be cut off). The rescue time can be configured from 1 to 60 minutes, following the procedure below:

7º Click on the "DISABLED" button to activate the RESCUE SYSTEM function, and to deactivate, simply click on the "ACTIVATED" button;

8º Click the up arrow to increase the rescue time, or click the down arrow to decrease the rescue time;

7th Step

Click to activate
the function

8th Step

Increase
time

Reduce
time

Setting the
rescue time

> It is possible to manually deactivate the **LOCK** and **VALET** functions:
> You can deactivate them using the rescue time function. Turn on the vehicle's ignition key without starting the engine, and do not move the accelerator pedal until the rescue time set in the **GUARDIAN-i APP** is completed.
> This time can be configured through the **GUARDIAN-i APP** (see 3.12).
> To avoid the situation of a smartphone battery drain while the **AUTO LOCK SMARTPHONE** function is activated, we recommend keeping a smartphone charger available in the vehicle.

3.11 AUTO LOCK - MAGIC KEY *(NOT INCLUDED IN THE PRODUCT)*

The Magic Key Bluetooth control is not included in the product. Once purchased, registered, and the function activated in the app, it serves as a presence key in the vehicle's protection system. Up to 4 Magic Keys can be registered per GUARDIAN-i and it helps prevent theft, armed robbery, or enhances security in fleet management. It operates exactly the same way as the AUTO LOCK function via Smartphone, with the locking and unlocking of the pedal after the vehicle is started. The only difference is that, after the vehicle is started and the pedal is unlocked, if the presence of the Magic Key is no longer detected by the GUARDIAN-i, the vehicle will activate the pedal lock according to the Magic Key's lock settings.

It is possible to configure the type of lock: TOTAL (complete pedal lock) or PARTIAL (maintains minimal acceleration on the pedal).

The time to activate the start of progressive locking can be set from 1 to 20 minutes. After the programmed time has passed, the configured locking protocol will begin, where the progressive locking system will start by limiting acceleration to 50%. Every 10 seconds, it will reduce by 10% until the progressive locking protocol is completed, which can be TOTAL or PARTIAL depending on the configuration.

The detection of the Magic Key presence by the GUARDIAN-i is only possible with the GUARDIAN-i APP in the background or closed (disconnected from the module), with the product paired in the foreground. The lock by Magic Key distance will not occur in this case.

After 6 seconds of not detecting the GUARDIAN-i with the Magic Key, the GUARDIAN-i APP will request the input of the biometrics/pairing password to unlock the accelerator pedal through the app on the smartphone.

By default, the option to disable the AUTO LOCK function using the smartphone's biometrics/password or the registered pairing password is ENABLED (we recommend changing the original pairing password for security—see item 3.5).

If you choose to acquire the Magic Key, please refer to its installation manual for more details. This function is located in the app under MENU/AUTO LOCK/MAGIC KEY and is part of the manufacturer's international patent application. Below is an example of activating the AUTO LOCK - MAGIC KEY function, registering the controls, and configuring the time for activating the progressive lock by distance:

1º Open the GUARDIAN-i APP and on the main screen, press the MENU button located at the upper left side;

2º Select the AUTO LOCK option;

3º Choose the MAGIC KEY option;

4º Click the "+" button to register a new Magic Key control;

Note: The AUTO LOCK - MAGIC KEY function can only be activated after registering the correct ID of the MAGIC KEY control. If the ID is not registered or an incorrect ID is registered, it will not be possible to activate the function. To activate the function, both the MAGIC KEY and the GUARDIAN-i must be powered on.

5º Enter the 6-digit code located on the back of the control as shown in the image below (and click OK only on iOS);

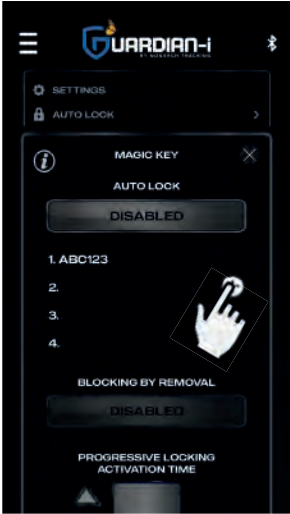| 1st Step	2nd Step	3rd step	4th Step	5th Step

Click on MENU	Click em AUTO LOCK	Click em MAGIC KEY	Click on the + button	Enter the 6-digit ID (Click OK on iOS)

The Auto Lock - Magic Key function will only be permanently activated if the GUARDIAN-i detects the Magic Key at least once. From that point onward, the function will be enabled, meaning that even if the user registers a valid ID and the GUARDIAN-i fails to detect it, the function will remain inactive until the detection occurs.

The detection of the Magic Key control by the GUARDIAN-i is only possible when the GUARDIAN-i APP is running in the background or closed (disconnected from the module), with the product paired in the foreground. If the GUARDIAN-i APP is in the foreground, the Magic Key will not be identified. Whenever the AUTO LOCK - MAGIC KEY function is activated and the GUARDIAN-i APP is placed in the background, the module will automatically disconnect from the app to detect the presence of the Magic Key and ensure security functions.

6º Click ENTER to confirm the registration;

7º Click the DISABLED button to activate the function;

8º Read all the recommendations and warnings, click the "X" to close, and the function will be activated.
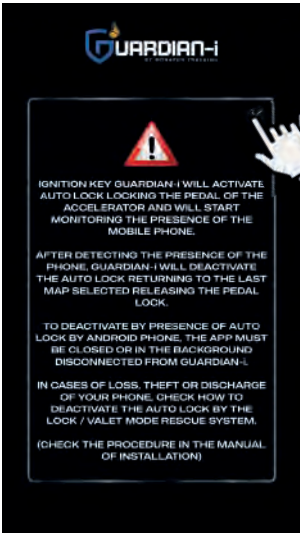
6th Step		7th Step

Click on the ENTER button	Magic Key registered	Click to activate the function

Read all the recommendations

Function activated

Magic Key
back side

ID: 0A563E
OP: 031114

ID code
Magic Key
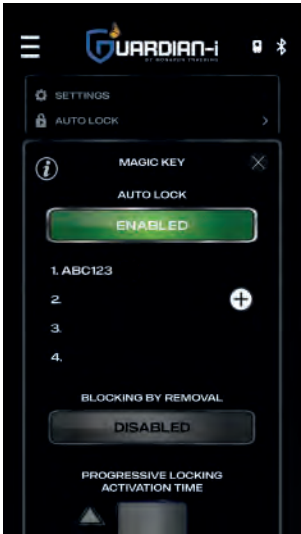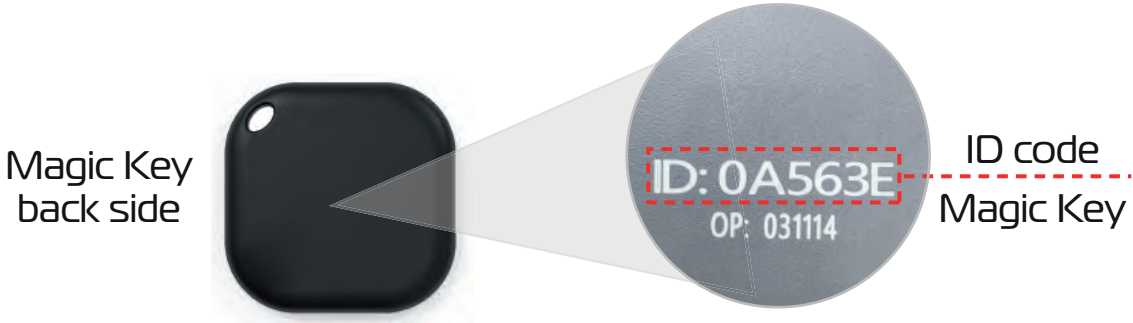
9º Click the DISABLED button to activate the DISTANCE LOCK function, and to deactivate it, simply click the ENABLED button;

10º Set the time to initiate the distance lock by clicking up or down;

11º Configure the type of lock: FULL LOCK (complete lock of the pedal) or PARTIAL LOCK (maintains a minimal acceleration on the pedal);
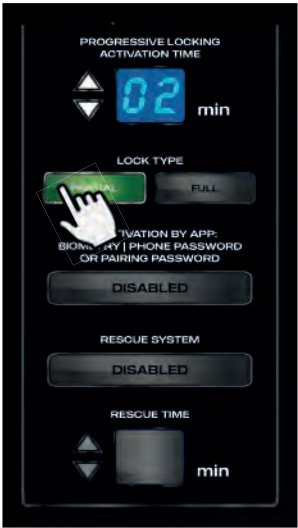
9th Step	10th Step	11th Step

Increase time

Reduce time
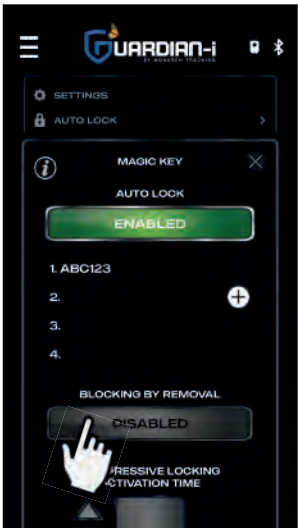
Click to activate the function
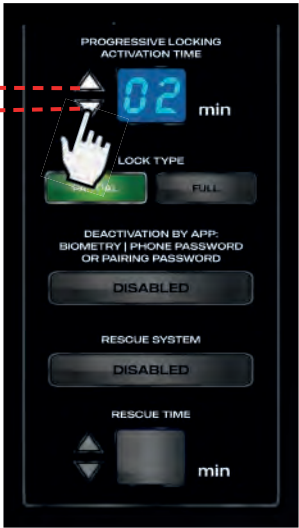
Setting the lock activation time

Choose the type of the lock

There are two ways to unlock the AUTO LOCK via MAGIC KEY using the Smartphone-GUARDIAN-i APP: by not using or by using the smartphone's biometric/password or a 4-digit pairing password for added security, which is enabled by default.

If this function is disabled, when accessing the GUARDIAN-i APP, the pedal will automatically unlock, returning to the last mode used.

If the biometric/password unlocking function is enabled and the FAST MAX has been without detecting the presence of the MAGIC KEY for more than 6 seconds, when accessing the GUARDIAN-i APP, the password/biometric will be requested to unlock the pedal.

To configure and enable the function to deactivate the AUTO LOCK via the GUARDIAN-i APP with biometric/password or pairing password, simply follow the steps below (we recommend changing the original pairing password for security - See item 3.5).

12º Click the DISABLED button for "deactivation via app: biometric | smartphone password or pairing password";

After the activation of the LOCK or during the distance lock phase, if the biometric | smartphone password or pairing password unlocking is enabled, when opening the GUARDIAN-i APP, it will be necessary to insert the biometric | smartphone password or enter the pairing password..

14º Turn the vehicle off and on to restart the GUARDIAN-i, open the GUARDIAN-i APP, and enter the biometric | smartphone password to unlock the pedal and access the GUARDIAN-i APP, or click CANCEL to proceed to the next screen and enter the pairing password;;

Note: Only on Android smartphones is it necessary to click CANCEL. For iOS smartphones, after 3 incorrect biometric attempts, the screen to enter the pairing password will appear automatically.

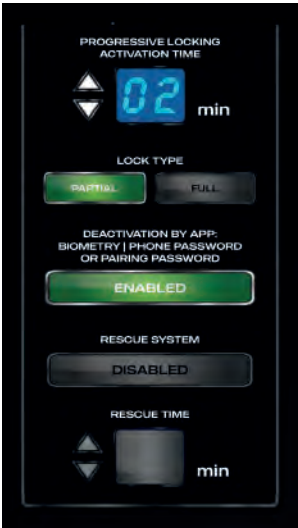15º Enter the pairing password to unlock the pedal;

16º Click ENTER to confirm the pedal unlocking and access to the GUARDIAN-i APP;

Note: If an incorrect password is entered, there are only 3 attempts to enter the correct password and unlock the pedal, or the keyboard will be locked as described in step 17.

12th Step
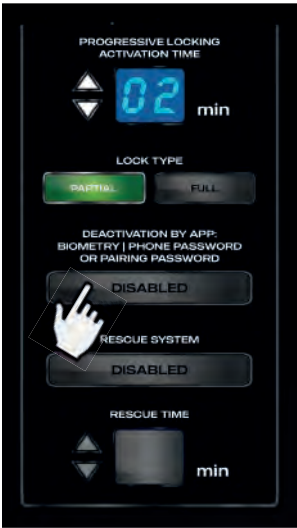
Click to activate
the function

Function
activated

13º Click the DISABLED button to activate the RESCUE SYSTEM function, and to deactivate it, simply click the ENABLED button;

14º Click the upward arrow to increase the rescue time, or click the downward arrow to decrease the rescue time;

13th Step

Click to activate
the function

### 14th Step

Increase time

Reduce time

Setting the
rescue time

17

3.12 GUARDIAN-I TRACKER INTERFACE SYSTEM

INPUT 1 – MANUAL LOCK:
After receiving a negative signal on the MANUAL LOCK input, the progressive lock will start immediately until the pedal is fully locked. After 40 minutes with the pedal locked, the progressive locking process will restart, repeating this process as long as the ignition key is turned on.
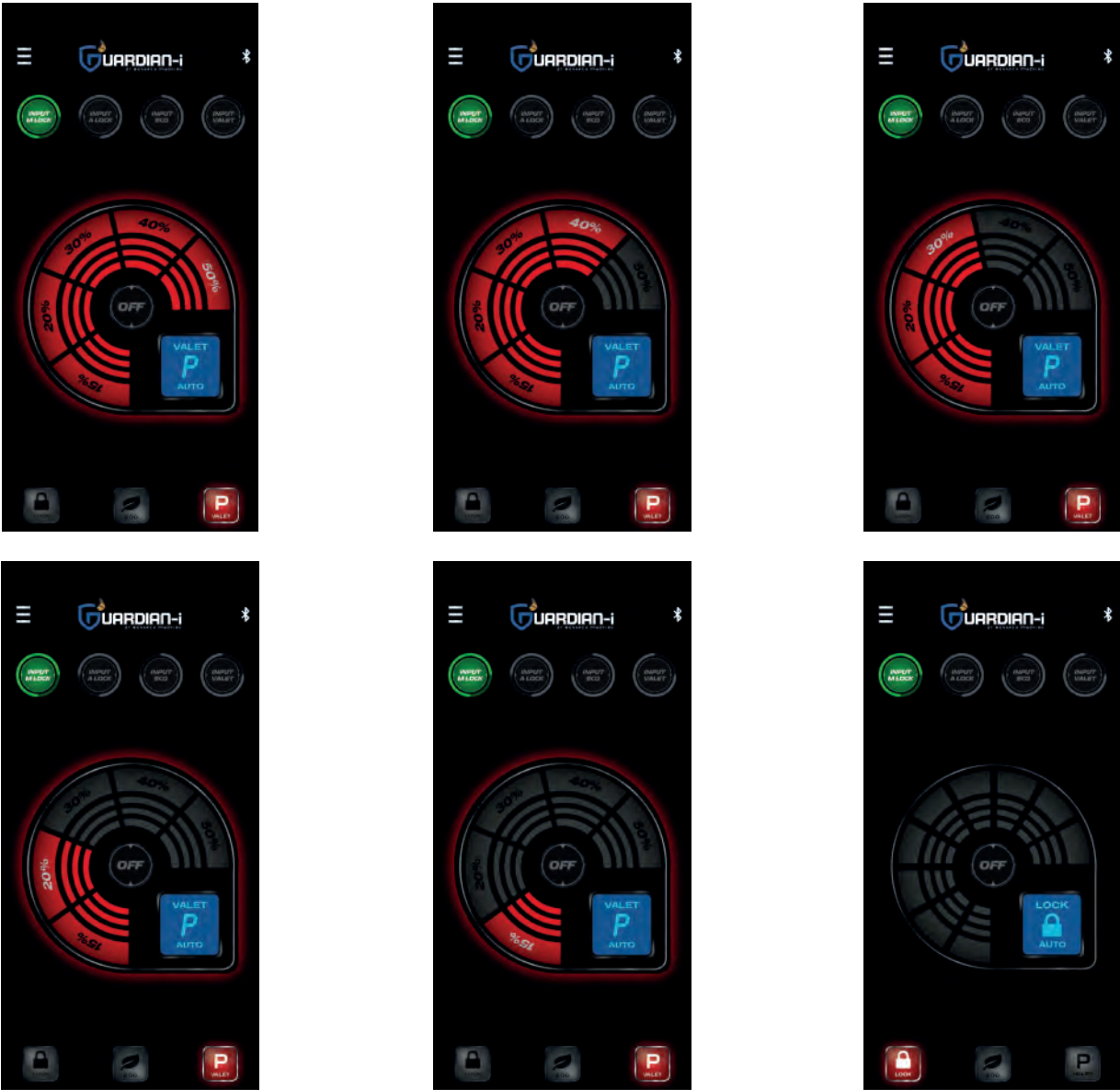
INPUT 2 – AUTOMATIC LOCK:
After receiving a negative signal on the AUTOMATIC LOCK input, a 5-minute timer will begin before the progressive locking process starts, continuing until the pedal is fully locked. After 40 minutes with the pedal locked, the progressive locking process will restart, repeating this cycle as long as the ignition key remains on.
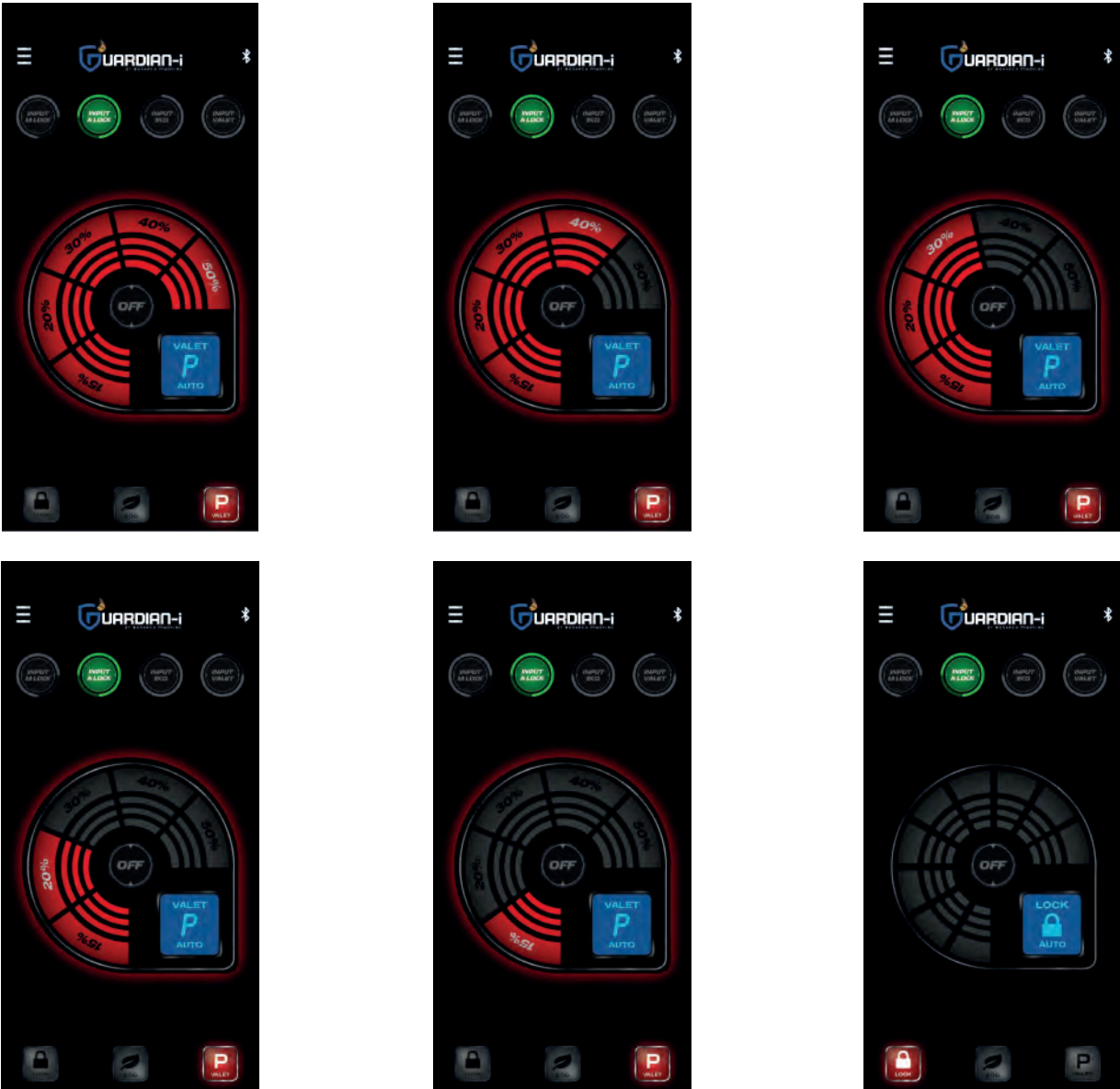
INPUT 3 - ECO MODE LEVEL 9

After receiving a negative signal on the ECO MODE input, the ECO MODE will be activated at level 9.

INPUT 4 - VALET MODE LEVEL 50%

After receiving a negative signal on the VALET MODE input, the VALET MODE will be activated at 50% level.

> If any of the inputs is deactivated, the GUARDIAN-i module will revert to the map previously manually selected by the user.
> If any input is activated, the GUARDIAN-i APP will disable all manual activation functions of the GUARDIAN-i APP.
> The LOCK MANUAL and AUTOMATIC LOCK inputs will take priority over the other inputs for the ECO and VALET modes. The LOCK MANUAL input has priority over the AUTOMATIC LOCK input.

NEGATIVE OUTPUT FOR PEDAL LOCK INDICATION

Whenever the LOCK MANUAL or AUTOMATIC LOCK inputs are activated and the pedal is fully locked, this output will be activated with a negative signal (0V level). This output will be deactivated whenever the lock is removed.

NEGATIVE OUTPUT FOR PEDAL AT END OF TRAVEL INDICATION

Whenever the pedal is kept accelerated at more than 90% for more than 1.5 seconds, this output will be activated with a negative signal (0V level), and a message will appear on the GUARDIAN-i APP as shown below. If the accelerator pedal's position returns to a level below 90%, the output will be deactivated
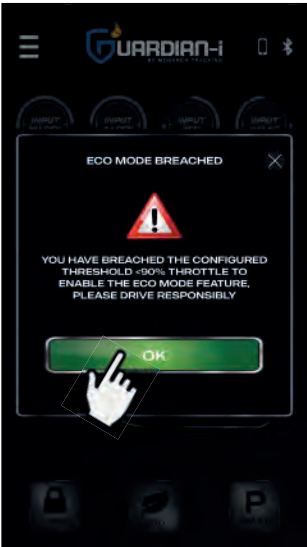
4. SEGURITY

4.1 TECHNOLOGY

- The GUARDIAN-i module uses Bluetooth 5.2 technology.
- This product is free from electromagnetic interference and can be used anywhere.
- It is not affected by, nor does it generate, radiation that could affect human health or other equipment.
- When the app is placed in the background on your Smartphone (sleep mode), it runs in the background. Even in this condition, there is communication with the GUARDIAN-i, and the app continues executing any task to ensure safety, while also ensuring that the GUARDIAN-i APP does not consume the battery of your Smartphone.
- It comes with a 2-year warranty against manufacturing defects, as per the attached certificate.
- To prevent accidents and traffic fines, never use the app while driving.

 # 5. VALIDATION

1º ECO FUNCTION – With the vehicle on, activate the function and check if there is a loss of power in the vehicle's acceleration below the original power (economy).

2º MANUAL LOCK FUNCTION – With the function activated, start the vehicle and check if the accelerator becomes inactive.

3º AUTO LOCK SMARTPHONE FUNCTION – With the function activated, start the vehicle and check if the accelerator becomes inactive when the smartphone is turned off or moved away from the vehicle.

4º VALET FUNCTION – With the function activated, check if there is a loss of power in the vehicle's acceleration by varying the acceleration limits.

FC	**FCC ID: 2BQ6N001**
	This device complies with Part 15 of FCC Rules. Operation is subject to the following two conditions: (1) this device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions:

(1) this device may not cause harmful interference, and

(2) this device must accept any interference received, including interference that may cause undesired operation.

Changes or modifications not expressly approved by Monarch Tracking LLC could void the user's authority to operate the equipment.

Note: This equipment has been tested and found to comply with the limits for a Class A digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference when the equipment is operated in a commercial environment.

This equipment generates, uses, and can radiate radio frequency energy and, if not installed and used in accordance with the instruction manual, may cause harmful interference to radio communications.

Operation of this equipment in a residential area is likely to cause harmful interference, in which case the user will be required to correct the interference at his own expense.

5.1 TROUBLESHOOT

SYMPTOM	POSSIBLE CAUSE	SOLUTION
Connector with difficulty in fitting.	Malfunction of the product.	Check if the connection is correct, ensure that the terminals are not bent or loose, and verify if the connector latch is fully locked.
The product does not function and illuminates the malfunction lights on the vehicle's dashboard.	The original wiring harness was disconnected with the accelerator pedal still powered, failure in the wiring connection, or the harness is incorrectly applied for the vehicle model.	Check if the wiring harness is properly connected and ensure there are no bent pins or misplaced terminals in the connectors. In many vehicles, turning the engine off and on a few times will cause the malfunction light to turn off automatically. It may occasionally be necessary to use an automotive scanner compatible with the vehicle.
The vehicle accelerates by itself when starting in LOCK mode.	Pedal programming not performed.	Perform the accelerator pedal programming (see 3.4).
Loss or limitation of acceleration after the installation of the GUARDIAN-i.	Failure in the wiring connection, harness incorrectly applied for the vehicle model, interference caused by a high-power radio transmitter near the product.	Check if the wiring harness is properly connected and ensure there are no bent pins or misplaced terminals in the connectors. This issue may disappear when the engine is turned off and on. Verify if the PARKING mode is activated with acceleration limitation.
Failure in the connection between the GUARDIAN-i APP and the GUARDIAN-i module.	Bluetooth turned off. Location system of the ANDROID Smartphone deactivated and without permission. The pairing procedure was not performed correctly (see 3.3).	Turn on the Smartphone's Bluetooth. On Android, enable and allow the Smartphone's location. Try to pair again, following the procedure indicated in the videos.
Unable to complete the accelerator pedal programming.	Failure in the wiring connection, harness incorrectly applied for the vehicle model.	Check if the wiring harness is properly connected and ensure there are no bent pins or misplaced terminals in the connectors.

If you have not been able to complete the installation successfully and have any questions or difficulties, please contact our technical support.

Just click on the WhatsApp icon on the side and you will be assisted or:

USA:
Phone: (956) 712-8933
E-mail: support@monarchtracking.com

Click to chat

• We recommend always using solder and insulating tape on electrical cable splices;

• Always pass and fix the GUARDIAN-i harness together with the vehicle's original electrical harness, covering the module and GUARDIAN-i harness with foam to avoid noise;

• Make sure that the end position of the GUARDIAN-i electronic module is protected from water. (insul-film, rain or during cleaning);

• The colors of the original vehicle wires and their functions and locations as indicated in this manual may vary. Therefore, before performing any wire installations without GUARDIAN-i harness connectors, we recommend the use of appropriate measuring instruments to confirm these signals. The use of test leads, test lamps and other methods can cause serious damage to the vehicle's electrical and electronic system, use a voltmeter or multimeter.
GUARDIAN-i is not responsible for damage to the vehicle's electrical system caused by faulty installation;

• Always before you define that the module is defective, contact our technical support because we can still help and solve the installation.