# **USER MANUAL**

# **Harmony FE**

ED35100C



## Terrý Lifts ◆ THE ONE TO TRUST ◆

DESIGNED & MANUFACTURED IN BRITAIN

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## INTRODUCTION



Thank you for choosing the Harmony FE lift, designed and manufactured in the U.K. using the latest technology by Terry Group Ltd.

We want you to get the most out of your Harmony FE lift and to help in this aim we have produced this booklet on operation and maintenance of the equipment, which we hope you will find helpful.

It is hoped that any queries you may have during day to day operation will be answered in this manual, but if you do have any problems, technical assistance is only a phone call away.

We hope our product gives you many years of reliable service.

**Dave Allen** 

**Managing Director** 

## ABOUT THE HARMONY FE LIFT

The Harmony FE Homelift is designed for use by persons with impaired mobility travelling between fixed floor levels in private dwellings.

The lift is capable of transporting two people, one of whom could be a wheelchair user.

The lift is designed to operate without a lift shaft and is provided with an automatic infill panel which makes the ceiling aperture safe when the lift is at the lower level.

A telephone is supplied in the car for emergency communication.

A half hour fire rating is provided as standard while the lift is at the upper or lower level. The lift car panels are made from powder coated steel which can easily be cleaned using normal household cleaners. Internal upholstery can also be cleaned in the same way.

A smoke detection system has been installed on your lift. It has been designed to provide adherence to British Standard BS5900 2012 Section 9.13 "Behaviour of homelift in the event of fire".

## **GENERAL DO'S AND DONT'S**

Below are the key safety measures for lift operation to ensure safe usage and prevent potential hazards.

- Never switch off the power supply to the lift, even when you go away. The lift control circuits
  are fed by a battery, which must be kept on constant charge.
- The lift should always be returned to the lower level when not in use. If it is left upstairs for
  prolonged periods, it will occasionally re-level itself depending on conditions. The lift must be
  left at the lower level if the mains is turned off.
- If your lift is fitted with a manual door always close it after use. Powered door units have a self closer. Do not pull or push the automatic door.
- Never allow children to play in, under or around the lift. If children are in the house, isolate
  the lift using the optional remote control fob.
- Ensure that the area under the lift is kept clear. The underpan surface is fitted with sensors, which automatically stop the lift if it strikes an object.
- Always keep your emergency door release key and key fob in the lift or in a safe place near the lift
- Do not place any object on the aperture infill or stand on it when the lift is in operation.
   Ensure that as far as practical, the area around the travelling infill panel is clear of persons (particularly children) when the lift is being operated. This is to ensure there is no danger of them falling into the car when the lift is in use. The infill panel is fitted with sensors that automatically stop the lift if the infill panel is obstructed.
- Always treat your lift with respect that should be shown to electrical and mechanical equipment.
- Safety related components should only be adjusted and reset by a competent person.
- Do be aware some lift systems generate varying magnetic fields. Pacemaker users should seek expert guidance before using it to ensure safety.

## LIFT CONTROLS



#### Car light intensity control

On one of the call stations, by pressing and holding the 'stop' and 'down buttons, the light intensity will reduce. By pressing holding the stop and up buttons, the light intensity will increase. When the desired level is reached, release the buttons.



#### Car light timer

To vary the length of time the car light stays on after operating the lift, press and hold the 'stop', 'up' and 'door buttons', the light timer will then sequence through the light-on times and respond with a series of beeps. Each beep represents five minutes in time. When the desired time is reached release the buttons.



#### **Call stations**

The call stations and the optional remote isolate fob are fully integrated units with internal batteries. The batteries can be changed by the user with a Philips screwdriver on the back of each unit.

CR2450 (550 mAh minimum) are approved for use with these device.



#### Optional remote isolate fob

The lift can be isolated by using the optional remote control fob. When the lift is isolated none of the control stations will function. The call and control stations can only be activated by using the remote fob. When the lift is activated, the coloured indicator lights in the car will illuminate.

The lights in the car will switch on automatically when any call or control button is pressed and will automatically turn off after the pre-set time. (See 'Car light timer' above).

### **OPERATING THE LIFT**

There are two wall mounted call stations, one at each level and a similar control station fitted in the lift car. The call stations connect to the lift via Bluetooth technology.

#### **General operation**

Call the lift by pressing the 'UP' or 'DOWN' button on either call station and wait for it to stop. To open the door, press and release the 'DOOR' button, alternately, press the door button located on side of carriage. Press and release 'UP' or 'DOWN' button on the control station for the lift to travel uninterrupted to the next floor. If the lift does not start, check that the door is properly closed and try again.

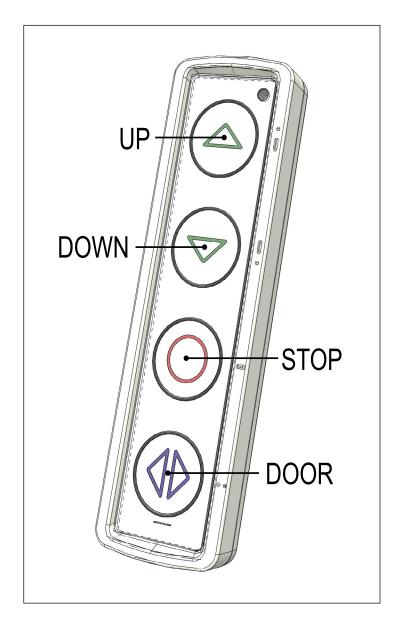
Always close the door after using the lift, and leave the lift downstairs whenever possible.

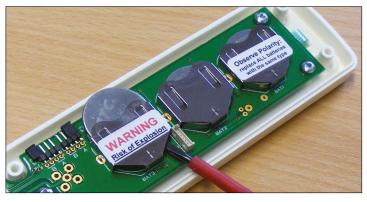


### **Changing batteries**

It is critical that all three batteries are replaced with NEW ones of the same type, manufacture and age, that they are fitted at the same time and that they are correctly oriented. We recommend they are replaced every 12 months.

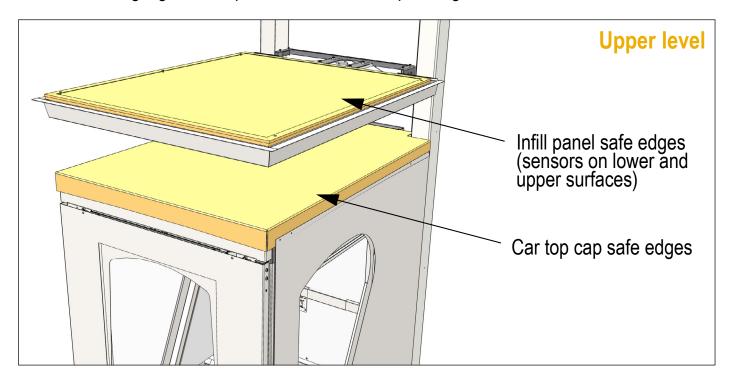
Slide the unit off the wall bracket and remove the four screws in the back with a posi-drive screwdriver. Using a screw driver, gently push the batteries out a short way, and then pull using fingers.

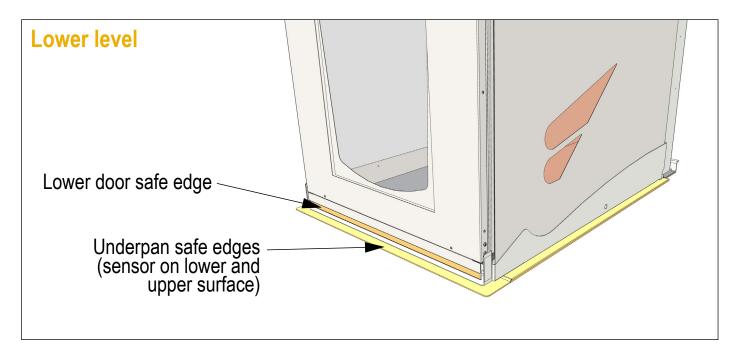




## **LIFT SAFETY SURFACES**

The diagrams below illustrate the positions of the sensors on the lift which are designed to prevent injury or damage in case the carriage's movement is obstructed. Any pressure on the surfaces highlighted will prevent the lift from operating.





## SAFETY SURFACE CHECKS

As a precautionary measure we advise the following periodic (weekly) checks of the safety features built into your Harmony FE lift. These checks should be carried out with the lift unoccupied.

#### Car upper safety surfaces

With the lift at lower level, press the 'UP' button on the wall station, when lift starts to ascend press downwards on the car top cap safe edge, the lift should stop. Repeat operation on opposite side of lift.

#### Car underpan safety surfaces

At lower level with the lift at approximately eye level press the 'DOWN' button on wall station, when lift starts to descend press upwards on the carriage underpan, the lift should stop. Repeat operation on opposite side of lift.

#### Upper level infill panel safety surfaces

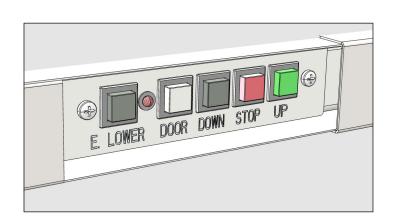
From the upper level, call the lift by pressing the 'UP' button, when lift starts to ascend through the aperture, press downwards on the infill panel safe edge, the lift should stop. Repeat operation on opposite side of lift.

Note: If any of the above checks fail, the lift must not be used and advice sought from Terry Group Ltd on 01565 752 800.

### **EMERGENCY PROCEDURES**

### **Emergency controls**

In the event that the normal controls fail to work, emergency controls can be found on the middle back panel, remove the small central cover to reveal the button. control panel.



### **Emergency battery lowering**

In the unlikely event that the lift stops responding normally to the control station, the lift can be lowered from inside the carriage. This allows the lift to move downwards while the trapdoor, underpan, and lower door safety surfaces remain operational.

This emergency battery lowering procedure should never be used if the lift is at the upper level.

- Press and hold the 'E.LOWER' button. The lift will move in the downward direction.
- When at the bottom level, press the door button to open the door.
- If the door does not unlock, follow the Emergency door release procedure Page 10.



## Important

- During Emergency Manual Lowering Page 09, the normal safety features will not function, so the lift will not stop if a person, pet or object is under the lift.
- The exact lowering procedure must be observed in each case, because the normal safety features will not function during manual lowering.
- The emergency lowering procedures should never be used if the lift is fully up or no one is trapped in it.
- The emergency lowering procedures should also never be used as the normal down travel function until an engineer attends.

## **EMERGENCY PROCEDURES**

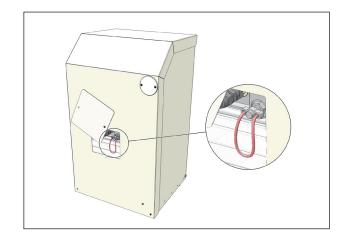
### **Emergency manual lowering**

If the lift has stopped mid-level and the customer is unable to get the lift up or down, then the only time it should be lowered by the emergency valve is if:

- There is a 2nd person around the lift area at the lower level to ensure that nothing goes under the lift during the lowering by the first person.
- OR the person lowering the lift has sight of the area under the lift.

#### Person 'A'

- Ensure the lift door is fully closed.
- Turn off the mains supply to the lift.
- Locate the hydraulic power unit (normally outside the property). Using the Torx driver supplied, swivel the small metal cover plate on the front face of the housing.
- The red cord revealed in the access hole now needs to be pulled continuously to lower the lift car slowly.



- After 5 seconds release the cord and check with Person 'B' that the aperture infill panel is
  following the carriage. If so, resume pulling the cord as before.
- Once the lift is at the lower level, turn the mains supply back on and secure the metal cover plate.

#### Person 'B'

- Remain in the house by the lift and communicate with Person 'A' to ensure the safe lowering of the lift.
- Ensure that no object, person or pet are in the path of the lift travel.
- Confirm that the aperture infill panel follows the lift during descent and locates fully in the floor to guard against the possibility of anyone falling down the lift way.

## **EMERGENCY PROCEDURES**

### **Emergency door release**

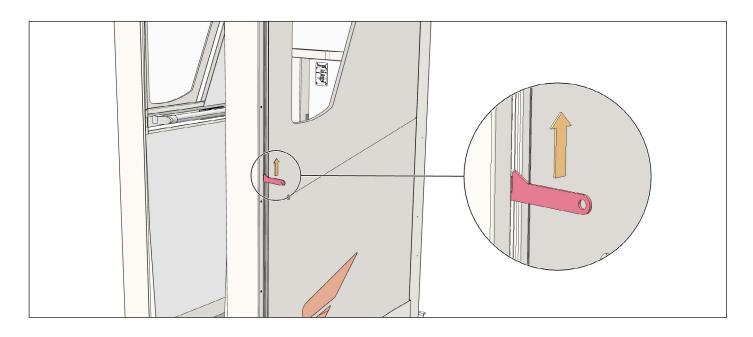


### Warning

**Risk of falling:** Emergency unlocking must only be undertaken when the lift is at the upper or lower landing level.

#### Ensure the lift is at a landing level.

- If it is not, ask the occupant to lower the lift. It is possible to emergency lower the lift from inside the car see **Emergency battery lowering Page 08.**
- If this is not possible, for emergency lowering from outside the car, refer to Emergency manual lowering Page 09.
- When the lift is at a landing level:
- Find the red emergency unlocking key which came with this user manual.
- Insert the key just below the lock bar and move it upwards.
- Pull open the door. The door drive mechanism has been designed to allow the door to be pulled open by hand.



### **SMOKE ALARMS**

A smoke detection system has been installed on your lift. It has been designed to provide adherence to British Standard BS5900 2012 Section 9.13 'Behaviour of homelift in the event of fire'.

The system utilises two smoke alarms, one upper level, one lower level, which are wirelessly connected to the main circuit board on the lift.

The smoke alarms contain an integral battery with a 10 year life-span. This is not replaceable.

#### Radio smoke alarm operation

When installed on a Harmony FE lift, the smoke alarm system will cause the lift to deactivate safely once the alarm is triggered. When the lift is deactivated, the door will continue to operate as normal.

#### When the lift is stationary at either level

If smoke is detected, the alarm will sound. After a period of time, all other smoke alarms connected to the system will then start to sound and the lift deactivates.

#### When the lift is travelling between levels

If smoke is detected, the alarm will sound. After a period of time, all other smoke alarms connected to the system will then start to sound.

The lift will continue to its requested level, it will remain possible (until that level is reached) to change the direction of the lift.

Once at the desired level, the lift will deactivate.

#### **Reactivation of lift**

The lift will automatically reactivate when the smoke alarm no longer detects smoke and a period of two minutes has expired.

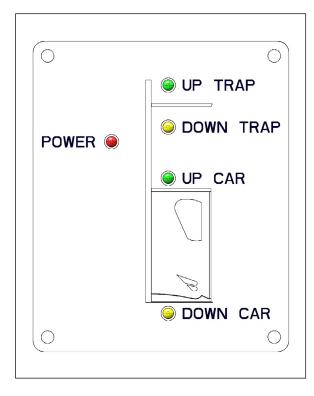
#### Silencing the smoke alarms

The alarms can be silenced by pressing the mute button on the sensor that initiated the alarm. The initiating sensor can be identified by a red light flashing every second.

When the alarms are deactivated, the lift will automatically reactivate when a period of two minutes has expired. If the source of the smoke alarm is not removed, the smoke alarms will begin to sound again and the lift will be disabled.

## **FAULT FINDING**

The most likely causes of your lift failing to operate are the door not being fully closed, lack of mains power supply, or something obstructing the car's travel. To assist in identifying the cause, the car is fitted with a simple system of coloured LED indicator lights on the rear panel.



#### **UP TRAP** (green light)

Infill panel safe edge OK. Will be off when descending.

#### **DOWN TRAP** (yellow light).

Infill panel safe edge OK. Will be off when ascending.

#### **UP CAR** (green light)

Car safe edge OK. Will be off when descending.

### **DOWN CAR** (yellow light).

Car safe edge OK. Will be off when ascending and when at lower level.

#### **POWER - BATTERY WARNING (red light)**

This is normally off, but may be on during operation. This is OK providing it extinguishes eventually when lift is at either level. If it fails to extinguish it indicates a low battery warning.

## **FAULT FINDING**

### Lift malfunction

Fault	Indication	Cause	Remedy
Lift will not travel in either direction	No lights on car panel	Door not shut or remote fob off	Press door button. Enable fob
Lift will not go up	One green off on car panel	Car safe edge obstruction	Remove obstruction or free safe edge
	Both greens off on car panel	Infill panel obstructed on upper surface	Remove obstruction from upper surface
Lift will not go down	One yellow off on car panel	Car underpan obstruction	Remove obstruction from beneath surface
	Both yellow off on car panel	Infill panel obstructed on lower surface	Remove obstruction from lower surface

### **Handset malfunction**

Indication	Cause	Remedy
Single short beep on lift car every 2 minutes	<u> </u>	Replace all 3 CR2450 batteries in handset

## **FAULT FINDING**

## **Smoke alarm malfunction**

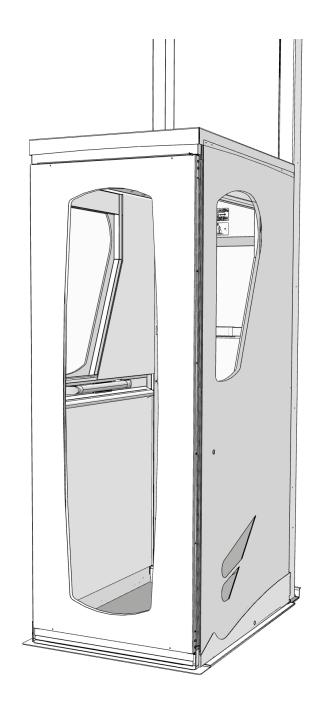
Indication	Cause	Remedy
Smoke alarm green light flashes once every minute.	System functioning correctly. (Quiescent mode)	No action necessary.
Smoke alarm sounds 3 beeps approximately every 4 seconds with flashing red light repeating.	Smoke alarm has been activated.	Your homelift is interlinked to this alarm signal and will terminate at next landing level if in use. If parked will not operate until two minutes after alarm signal has stopped.
Smoke alarm beeps once	Battery low.	Call engineer.
every minute accompanied with a single flash of the red		Do not ignore the low battery alarm.
light.		If you have called engineer and the beep is a nuisance, press test button to silence the low battery alarm for 10 hours.
Smoke alarm beeps once every 10 seconds.	Unit malfunction.	Call engineer.
Smoke alarm will not sound when test button pressed.	Unit malfunction.	Call engineer.
Smoke alarm test button light either constantly illuminated or constantly off.	Unit malfunction.	Call engineer.

## **MAINTENANCE AND SERVICING**

Provided the operating instructions are observed the lift will give many years of trouble free service. Dependent on frequency of use, this lift should be serviced at least every 12 months. This service should be conducted by competent persons trained in servicing and repair of the product. Terry Group Ltd. can quote for servicing on request.

Note: Servicing should only be conducted by an approved service engineer.

If in any doubt about the operation of the lift please contact the installation company for advice.



## **SERVICE HISTORY**

## Service history record

An entry should be added to the following table every time the lift is serviced.

Date	Engineer	Company	Comments

For general servicing enquiries, please call 01565 752 800.

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## LIFT SPECIFICATION

Name and address of manufacturer	Terry Group Ltd. Unit 1 Longridge Trading Estate, Knutsford, Cheshire, England WA16 8PR
Lift serial No.	
Year of manufacture	
Safe working load	325 kg
Maximum travel	3.6 metres
Duty cycle	10 cycles per hour with max load
Average noise level	65 Dba
Power supply	Dedicated 240V ~ 50/60Hz single phase supply
Control voltage	12V DC
Hydraulic pump power consumption	750W maximum
Hydraulic oil grade	T22
Hydraulic pump enclosure	IP54
Design standards	BS 5900:2012 and 2006/42/EC Machinery Directive
Fire specification	Half hour fire integrity through aperture, assessed by Warrington Fire Research Centre.

# Terrý Lifts

Our policy is one of continuous product development and the Company reserves the right to change specification without notice.

### LIFT DISASSEMBLY/SAFE DISPOSAL

This lift must be disassembled by a competent person who has been fully trained in the installation of this lift and is qualified to provide safe disconnection of the lift to the mains terminal.

### **Batteries & Printed Circuit Boards (PCB)**

The batteries and PCB's within this product should not be disposed of with other household waste at the end of their working life. Where batteries are marked with the chemical symbols Hg, Cd or Pb, it indicates that the battery contains mercury, cadmium or lead above the reference levels in EC Directive 2006/66. If batteries are not properly disposed of, these substances can cause harm to human health or the environment.

Batteries and PCB's that are no longer required for this lift, at the end of their working life, can be returned either to an approved waste disposal facility or to Terry Group Ltd for safe disposal.

#### Oil

Oil from this lift should be disposed of via an authorised waste disposal contractor, to an approved waste disposal facility.



### **Declaration of Conformity**



Machinery Description: HARMONY FE LIFT / STRATUM FE LIFT

This lift was manufactured by Terry Group Ltd., who declare that this lift fulfils all the relevant provisions of the following Directives:

2014/30/EU Electromagnetic Compatibility Directive

2006/42/EC Machinery Directive

This lift also fulfils all the relevant provisions of the following Standards:

BSEN 12015:2014 Electromagnetic compatibility. Product family standard for lifts,

escalators and moving walks. Emission.

BSEN 12016:2013 Electromagnetic compatibility. Product family standard for lifts,

escalators and moving walks. Immunity.

BS 5900:2012 Powered homelifts with partially enclosed carriers and no

liftway enclosures - Specification

This Declaration of Conformity covers all Harmony FE and Stratum FE lifts manufactured since Jan 2021 with a serial number starting R.

Person authorised to compile Technical File: Peter Morrey, Terry Group Ltd., Longridge Trading Est, Knutsford, Cheshire, WA16 8PR.

EC examination carried out by: Bureau Veritas, 8, cours du Triangle 92800 Puteaux, Paris, France

Approved Body Reference Number: 2681

EC examination certificate number: 2681/5589/760/10/21/0264

This declaration was completed at Terry Group Ltd., Longridge Trading Estate, Knutsford,

Cheshire, WA16 8PR in November 2021

This compliance is only valid if the installation test Certificate has been completed and signed by a competent lift engineer trained to install this product to the latest installation instructions.

TERRY GROUP Ltd.

D.C. Allen

Managing Director



#### **Terry Group Ltd.**

1 Longridge Trading Estate Knutsford, Cheshire, WA16 8PR

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