## CONTENTS

| 1.  | PREFACE .......................................................... | 3 |
| 2.  | SAFETY NOTICE .................................................. | 3 |
|     | 2.1 Before Driving | |
|     | 2.2 While Driving | |
|     | 2.3 Labeling | |
| 3.  | PARTS INTRODUCTION ............................................. | 6 |
|     | Parts Description | |
| 4.  | OPERATION ........................................................ | 7 |
|     | 4.1 How to Operate Your Scooter | |
|     | 4.2 How to Set to Freewheel Mode | |
|     | 4.3 Tiller Adjustment | |
| 5.  | BATTERIES & CHARGER ............................................. | 13 |
|     | 5.1 Charging the Battery Pack | |
|     | 5.2 Charger | |
|     | 5.3 Battery | |
| 6.  | INSPECTION AND MAINTENANCE .................................. | 15 |
|     | 6.1 Daily Checks | |
|     | 6.2 Regular Check Record | |
|     | 6.3 Battery, Circuit Breaker and Tyres | |
|     | 6.4 Maintenance | |
|     | 6.5 Storage | |
| 7.  | BASIC TROUBLESHOOTING ....................................... | 17 |
| 8.  | SPECIFICATION .................................................. | 19 |
| 9.  | WARRANTY ........................................................ | 20 |
| 10. | SAFE DRIVING TIPS FOR SCOOTER USERS ...................... | 21 |
1. PREFACE
Please read this owner’s manual before using the scooter. Improper use of the scooter could result in harm, injury or traffic accidents.
This owner’s manual includes operating instructions for every aspect of the scooter, assembly instructions, as well as guidelines and suggestions for safe use.
This owner’s manual is written only for the TGA Eclipse.
The symbols used in this manual are explained below. Read carefully, especially the parts marked with these symbols:

<table>
<thead>
<tr>
<th>Symbol</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>!</td>
<td>Warning</td>
</tr>
<tr>
<td>?</td>
<td>Caution</td>
</tr>
<tr>
<td>⚪</td>
<td>Suggestion</td>
</tr>
</tbody>
</table>

Improper usage could lead to serious injury
Improper usage could lead to injury and/or damage to you scooter.
Follow these instructions to keep the status of the scooter working well and ease your operation.

Please keep this manual in a safe place for future reference.
If someone else uses the scooter, please be sure to provide the instruction manual for reference.
As designs change, some illustrations and pictures in the manual may not correspond to the scooter that you purchased. TGA reserve the right to make design modifications without prior notification.

2. SAFETY NOTICE

2.1 BEFORE DRIVING
The user should be familiar with the operation of this scooter before driving, therefore, keep these safety notices in mind.

The same traffic rules for pedestrians apply to the use of this scooter
For your safety and that of others, please abide by the rules that apply to pedestrians.

1. Ride on the pavement, park way or pedestrian areas. Only ride your scooter on the road when crossing or if there are no existing pavements.
2. At the end of a pavement, be aware of traffic on the road.
3. Be extremely cautious when driving your scooter around heavy traffic and busy pedestrian areas.
4. Do not drive your scooter after taking alcohol, when feeling tired or on medication
5. Do not drive your scooter at night.
6. Always follow pedestrian traffic lights.

Practice operating your scooter
Until you are familiar with the operation of your scooter, please practice in a wide and open area, like a park. To prevent the possibility of falling off your scooter while driving, be aware of your motion and exercise extreme caution when accelerating, stopping, turning, reversing and moving up-and-down slopes.
1. Please set the speed dial to the lowest speed setting during initial practice.
2. Be sure someone is accompanying you and watches for traffic when driving for the first time.
3. Be sure you are able to control and operate your scooter safely and confidently before changing to a higher speed.

The TGA Eclipse is strictly limited to one passenger only:
Do not carry any passengers on your scooter - Including children

Do not use this scooter to carry or transport goods of excessive weight:
The maximum weight to be carried is (including goods) 113kg/250lbs.
Maximum loading weight for the basket is 3kg/6lbs.

2.2 WHILE DRIVING
Please carry out daily inspections. Refer to page 15 of “DAILY CHECKING”.

Do not stretch your body out of the scooter
Such action may cause you to lose your balance or be injured.
Pay attention to loose clothing, it could get tangled in the wheels.

Exercise extreme caution in the following circumstances and do not use your scooter where conditions are too dangerous:
Uneven or loose terrain – for example mud, loose gravel, bumpy, narrow, snow covered, or a canal or waterway near by.
Avoid holes where your wheels may get stuck.
Do not drive at night and or during unfavorable weather conditions
Do not make sudden turns.
Do not ride on an escalator.

Mobile Phones and other electrical equipment:
Do not use a mobile phone or other wireless communication device while driving but it is always useful to carry one with you incase of emergency.
Do not charge a mobile phone or other electrical devices from your scooter.

Ramps, inclines and drops:
Be careful while driving up a steep ramp or slope. Refer to page 19 CLIMBING ANGLE in 8. SPECIFICATION
When climbing up an inclined road please drive slowly and carefully.
When going down an incline never reverse your scooter, set the speed dial to a low speed setting.
Do not drive through any holes in the road. Refer to page 19 MAX. GROUND CLEARANCE
Avoid all water deeper than surface water.
Please drive slowly when driving on roads with drops or dips.
Do not make sudden turns when driving on gravel roads or ramps.
WARNING! Do not set the scooter in freewheel mode when driving on an incline or decline.

Maximum User Weight Limit
Refer to page 19 MAX. LOAD WEIGHT in section 8. Over loading your scooter will lead to damage to your scooter or a malfunction and is a safety hazard. The warranty does not cover over-loading damage.

2.3 LABELING
Please read all the labeling on the scooter before driving it. For your future reference, do not remove them.

WARNING!
1. Do not operate the scooter unless the tiller (handlebar column) is up and the retaining handwheel is tightened and locked in place
2. Do not lean against or pull forward on the handle bar while mounting or dismounting from the scooter. Serious harm or injury may occur. Rotate the seat and mount and dismount in a controlled manner.
3. The manufacturer disclaims responsibilities for any personal injury or property damage which may occur as a result of improper and unsafe use of its products.

IMPORTANT NOTICE
1. Make sure the speed control lever is not engaged before turning on your scooter.
2. In order to avoid injury or damage to the scooter the driver should not lean against or pull on the speed control lever while going up or down an incline.
3. PARTS INTRODUCTION

1. Control panel
2. Basket
3. Tiller adjustment handwheel
4. Lifting handle
5. Removable flip-up arm rest
6. Detachable swivel seat with folding backrest
7. Connecting device
8. Battery pack
9. Charging socket
10. Tiller lock
11. Battery gauge
12. Horn button
13. Speed dial
14. Speed control levers
15. Diagnostic & on/off light
16. Key switch
17. Freewheel mode lever
18. Anti-tip wheels
4. OPERATION

4.1 HOW TO OPERATE YOUR SCOOTER

Power switch

Turn the key switch to power ON or OFF
ON : Power is turned on
OFF : Power is turned off

Forward, Reverse, and Braking

1. Push the RH speed control lever forward with your right thumb and the scooter will move forward.
2. Push the LH speed control lever forward with your left thumb and the scooter will move backward.
3. The horn will beep when the scooter is in reverse.
4. Release the speed control lever while in either forward or reverse direction, the electromagnetic brake in the motor will be activated and the scooter stops.
5. Your scooter can be converted to allow for predominantly left hand drive. If this has been done, ignore points 1 & 2 above, your left thumb will control forward movement and right thumb reverse movement.

Horn Button

The warning horn will be activated when you push the horn button, release the button and the horn will stop.

Braking

Electro-magnetic brake: Release the throttle lever completely, the electro-magnetic brake will be activated.

WARNING! Never try to drive, or even sit on your vehicle while it is in “freewheel”. The electronic brake will be disengaged and the vehicle could run away with you.

Seat

The seat can be turned 90 degrees. Pull swivel seat lever to rotate the seat.
The seat has 4 height adjustments.
After adjusting the height to the desired seat position, secure the locking pin.

CAUTION! Ensure the seat is locked in the forward/straight ahead position before driving.
Tiller lock

The scooter has a tiller lock function, press and twist the tiller lock button to lock the tiller, see Fig. 4.1.1. Twist the button anti-clockwise to unlock the tiller, see Fig. 4.1.2. This is only to be used when the scooter is dismantled, either for transportation, or storage.

![Fig. 4.1.1 Locking mode](image1) ![Fig. 4.1.2 Unlocking mode](image2)

**CAUTION!** Never drive the scooter with the tiller in the locked position.

Parts

You can disassemble the scooter into five pieces: the seat, the front section, the basket, the battery pack, and the rear section.

1. Place the scooter in an area where you have sufficient space to move the parts around. You may need assistance to lift some of the scooter components.
2. See “Specifications” for individual component weights.
3. No tools are required to disassemble or assemble your scooter. Always disassemble or assemble your scooter on a level, dry surface with sufficient space for you to work and move around your scooter. Keep in mind that the disassembled sections of the scooter take up more floor space than the assembled scooter.
CAUTION!
Lifting weight beyond your physical capability may result in personal injury.
Ask for assistance when necessary while disassembling or assembling your scooter.

Disassemble:
1. Turn the key switch to “OFF”.
2. Turn the tiller lock to locked position.
3. The tiller can then be laid flat by releasing the handwheel and folding the tiller down (See Fig. 4.1.3).
4. Ensure the free wheel mode lever is in the drive position.
5. Pull upward on the swivel-release lever to remove the seat from seat post.
6. Pick up the battery pack and remove it from the scooter. (See Fig. 4.1.3)
7. After pulling the connecting device upward, pull the front section forward. (Fig. 4.1.4 and Fig. 4.1.5)

ASSEMBLY
Note: Raise the tiller before reassembling the scooter.
1. Ensure the freewheel mode lever is in the drive position.
2. Set the rear section in the up position and make sure the hook for the front section is connected to the axle of the rear section. (See Fig 4.1.6)
3. Put down the front and rear sections until the scooter is level. (See Fig 4.1.7)
4. Set down the battery pack on the scooter, and make sure it is in the correct position.
5. Set down the seat on the seat post until the swivel lock engages and you hear a click.
6. Turn key switch to “ON”, make sure battery gauge has sufficient power.
Caution: Ensure all pieces are engaged and fitted together properly and fully.

Caution: Turn off the key switch of your scooter and remove key to prevent accident before disassembly or assembly.

Caution: Take great care and exercise caution to avoid finger entrapment while assembling.

Caution: Ensure all parts are fully and correctly fitted together before driving.

**Battery Gauge**

When the key is switched “ON”, the battery gauge will display the battery power capacity by indicating red, yellow and green areas respectively.

Green area indicates a full charge from the battery. Red area indicates low power. The remaining power indicated by the battery gauge will be varied by the actual driving time and how you drive. Repeated starting, stopping or climbing will consume the power more quickly.

<table>
<thead>
<tr>
<th><strong>SUGGESTION</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>1. It is recommended that you charge the battery immediately when the battery gauge is in the red area.</td>
</tr>
<tr>
<td>2. After charging or replacing a new battery, drive the scooter for 2-3 minutes to make sure the battery capacity is enough.</td>
</tr>
<tr>
<td>3. In the Winter the battery may take longer to charge and the distance you can travel may also be reduced</td>
</tr>
<tr>
<td>4. When driving on an incline, the battery gauge light might move from green to red, this is normal, please do not worry.</td>
</tr>
<tr>
<td>5. Even if the battery is used properly, it is natural that the battery capability will decay as time passes, which results in a shortening of travel distance compared to a brand new battery. Therefore, when you find the travel distance is about only 50% of a brand new battery’s traveling distance, it is time for a replacement. Please go to your dealer and ask for replacement. If you continue to use the old battery when its lifetime is ending, it could lead to a decrease in travel distance.</td>
</tr>
</tbody>
</table>

Travel distances will be shortened when driving frequently on an incline or slope, as this leads to a larger consumption of the power.
4.2 HOW TO SET THE FREE WHEEL MODE

Drive Mode: Push the free wheel mode lever on the scooter towards the rear of the scooter, and the scooter will be driven by the motor.

Free wheel Mode (Fig 4.2.2): Push the free wheel mode lever on the scooter forwards towards the front of the scooter and the scooter can be pushed manually.

Fig 4.2.1 Drive Mode

Fig 4.2.2 Freewheel Mode

4.3 TILLER ADJUSTMENT

The Tiller can be adjusted by the following steps.

1. Turn the handwheel anti-clockwise to loosen (Fig 4.3.1).
2. Adjust the tiller angle to the desired position; turn the handwheel clockwise to tighten.

Driving your Scooter

1. Ensure the seat is installed properly and locked in the straight ahead position.
2. Ensure the tiller is in a comfortable position and secured by the handwheel as described above.
3. Ensure the electromagnetic brake is in drive mode as described above.
4. Ensure the speed control lever is not accidentally being depressed and turn the key switch to “ON”.
5. Check battery gauge to see whether there is enough power for your journey. If you have doubts about the remaining power, please charge the battery before departure.
6. Set to a safe speed on the speed dial.
7. Be aware of traffic and pedestrians and make sure it is safe before setting off.
**CAUTION!**

1. Do not push both right hand & left hand side speed control levers together, this may lead to a loss of control of your scooter.
2. Do not set to the highest speed in enclosed areas.
3. Do not adjust the speed dial while driving, the sudden change in speed may endanger you and cause your scooter to malfunction.
4. Do not place magnetic devices near the area of the operation handle, this could affect the safe operation of your scooter.
5. While reversing the scooter, be aware of people or objects behind you.

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**About driving speed**

The speed scale is printed on the speed dial label, ranging from 1 to 10. Scale “10” means maximum speed; please refer to page “MAX. SPEED” in section 8.

<table>
<thead>
<tr>
<th>Speed Scale</th>
<th>Circumstances for Recommended speed</th>
</tr>
</thead>
<tbody>
<tr>
<td>1-3</td>
<td>Speed equivalent to walking slowly</td>
</tr>
<tr>
<td></td>
<td>♦ Use when negotiating a difficult incline or decline</td>
</tr>
<tr>
<td></td>
<td>♦ Use when driving indoors or in a narrow space</td>
</tr>
<tr>
<td>4-6</td>
<td>Speed equivalent to walking normally</td>
</tr>
<tr>
<td></td>
<td>♦ Use when driving outdoors on flat ground</td>
</tr>
<tr>
<td>Over 7</td>
<td>Speed equivalent to walking quickly</td>
</tr>
<tr>
<td></td>
<td>♦ Use when driving in an open space without hazards</td>
</tr>
</tbody>
</table>

**Stopping**

1. Release the speed control lever completely and the scooter will naturally brake and stop.
2. Turn the key switch to OFF. Then pull out the key (only after stopping).

**CAUTION!**

The stopping distance will vary according to your speed, user weight and gradient, please begin braking as early as possible.

While parking your scooter, be sure to park on a flat ground and then turn the power to “OFF”.
5. BATTERIES & CHARGER

There are two battery options on the Eclipse, the standard which has 12A/H batteries and the heavy duty which has 21A/H batteries, giving a longer range. All of the references relate to both battery sizes and the only difference physically is that the Heavy Duty battery pack is slightly larger and slightly heavier.

5.1 CHARGING THE BATTERY PACK

Be sure to follow the procedures shown below accordingly.

1. Turn the scooter key switch to “OFF”.
2. Open the charging socket cap on the scooter’s cover then connect the charger’s plug to the charging socket.
3. Connect the charger cord to the power outlet.
4. The charger’s LED light will be orange at the beginning of a charge. The charging duration is at least 6 - 8 hours but this will vary based on the status of the battery and factors such as temperature.
5. The orange LED will turn to green when the charging is complete.
6. Disconnect the cord and remove the round plug from the charge socket.

1 SUGGESTION

1. Do not disconnect the charger cord if the charging is not complete. The battery life will be shortened if the battery is repeatedly used without being fully charged. Therefore, be sure to charge the battery fully every time.
2. Continue to charge until the green LED light is on. NEVER stop charging before it is complete.
3. Disconnect the power cord when charging is complete.
4. If your scooter is left unused for a long period of time, it should be charged at least every 3 months to keep the battery at full status.
5. Charging time will be affected by the ambient temperature so it takes longer in the wintertime.

CAUTION!

Please follow the rules below to avoid accidents while charging.

1. Please only use the charger supplied and charge the battery completely every time. The battery might be damaged if you use a charger which is not compatible.
2. Never disassemble or modify the charger.
3. Do not charge in a space that is directly exposed to the sunlight. Do not charge in a space where it is humid or under rainfall and morning dew.
4. Do not cover the scooter with any waterproof cloth or other objects while charging.
5. Do not charge in temperatures less than -10° or higher than +50°, the charger may not work properly and the battery may be damaged.
**WARNING!**

1. Keep away from flammable objects while charging.
2. Do not smoke while charging. Always charge your battery in a well-ventilated space.
3. Never connect or disconnect the plug or cord with wet hands.

---

5.2 CHARGER

The charger’s red LED will be ON when you plug it into the power outlet. The orange LED will change to green when the charging is complete.

5.3 BATTERY

Do not expose the battery to temperatures below -10° or above 50° when charging or storing the scooter. Exceeding the specified temperature ranges can lead to freezing or over heating of the battery. This will possibly damage the batteries and shorten their lifetime.

The battery type used on your scooter is sealed and maintenance-free.

---

SUGGESTION

1. Do not use the battery to charge any other equipment.
2. Battery capability will vary with outside conditions; the driving distances will be shorter in the winter.
3. If the scooter is not to be used for a long time please charge the battery every three months and always charge fully before putting into storage.
4. There are two batteries within the battery pack, always replace both batteries at the same time, with batteries of the same make and specification.
5. For the best results and to prolong battery life, try to run the battery down by at least 50% before recharging and in addition it always best to go through a complete charge cycle each time.
6. For the best results your batteries really need to be cycled for their first 10-15 charges. This means run them down as much as you safely can in use and then give them a full charge. They will not work at their best until this process has been carried out. You will find that the distance that your Eclipse can travel will gradually increase over the first few weeks of use as the batteries reach their optimum efficiency after approximately 12 cycles of discharge and recharge.
6. INSPECTION AND MAINTENANCE

6.1 DAILY CHECKS
Check the following items before driving. If you find anything abnormal, go or call your authorised TGA dealer for further inspection before using it.

<table>
<thead>
<tr>
<th>Item</th>
<th>Inspection Content</th>
</tr>
</thead>
<tbody>
<tr>
<td>Handle bar</td>
<td>Is it tight?</td>
</tr>
<tr>
<td></td>
<td>Can it be turned left or right smoothly?</td>
</tr>
<tr>
<td>Speed Dial</td>
<td>Can it be adjusted freely and function well?</td>
</tr>
<tr>
<td>Speed Control Lever</td>
<td>Does the scooter move when the lever is engaged?</td>
</tr>
<tr>
<td></td>
<td>Does the scooter stop when the lever is released completely?</td>
</tr>
<tr>
<td>Motor</td>
<td>Is there any abnormal noise from the motor?</td>
</tr>
<tr>
<td></td>
<td>Does the electromagnetic brake work properly?</td>
</tr>
<tr>
<td>Freewheel Mode Lever</td>
<td>Does the free wheel mode lever work properly?</td>
</tr>
<tr>
<td>Battery Gauge</td>
<td>Does the gauge move to green when switched “ON” after a full charge?</td>
</tr>
<tr>
<td></td>
<td>Is the remaining power enough for your trip?</td>
</tr>
<tr>
<td>Horn Button</td>
<td>Does the horn work?</td>
</tr>
<tr>
<td>Seat</td>
<td>Is the seat on properly?</td>
</tr>
<tr>
<td></td>
<td>Can the seat be turned smoothly?</td>
</tr>
<tr>
<td>Tyres</td>
<td>Are there any cracks or other damage to the tyres?</td>
</tr>
<tr>
<td></td>
<td>Check the tread on the tyres.</td>
</tr>
<tr>
<td>Other</td>
<td>Is there any abnormal noise?</td>
</tr>
<tr>
<td></td>
<td>Is there an oil leakage from the transmission box?</td>
</tr>
</tbody>
</table>

6.2 REGULAR CHECK RECORD
To make sure your scooter is in good condition, go to your dealer regularly for maintenance and keep a record. It is always wise to have your machine serviced at least once a year.

⚠️ SUGGESTION
Even if you don't use the scooter for a long time, the scooter should still be maintained regularly.
6.3 BATTERY, CIRCUIT BREAKER AND TYRES

Battery
Refer to section 5 “BATTERIES AND CHARGER”.

Fuse
There are two fuses on your scooter. One is located inside the operation panel; another is on the battery pack.

SUGGESTION
Ask for help from your dealer for inspecting or replacing the fuse, (since battery pack has to be disassembled first for replacement of fuse).

Circuit Breaker
There is one button for the circuit breaker (located on the Battery pack), if the power switch is “ON” and the battery gauge does not move, it is possible an electric current has overloaded the scooter, reset the circuit breaker by pressing the button. If it will not reset, leave it for a few minutes and try again. Never hold the button in or use any other means to hold it in. If it will not reset, contact your TGA dealer.

Tyres
The condition of the tyres depends on how you drive and use your scooter.

Inspecting Tyre Tread
Please check the tread depth regularly. Replace the tyres when the tread depth is less than 0.5 mm.
Regularly inspect your scooter’s tyres for signs of wear.

6.4 MAINTENANCE

CAUTION!
When the tread depth is below 0.5mm, it can easily lead to loss of grip, making braking distances longer. Replace tyres as soon as necessary.

1. You must maintain and clean the scooter frequently.
2. Do not use water, oil or other chemical solutions to clean your scooter. Be sure NOT to spray the scooter with the water hose to prevent damaging the electronic components and printed circuit board. Please clean the scooter by wiping it with either a dry or moist cloth.
3. Please take the scooter to an authorised dealer for repairs and adjustments. Improper adjustments could lead to accidents and scooter malfunction.
4. Please use moderate or mild detergent to clean the scooter and only a soft cloth to wipe it over with.

CAUTION!
When conducting maintenance of your scooter, please turn the key switch “OFF” and remove the charger cord.

6.5 STORAGE
Make sure the scooter is stored under the following conditions:
Make sure the seat is set in the straight ahead locked position
Make sure the key switch is turned to “OFF” and the key removed.
SUGGESTION

Please store the scooter in a location where it is out of direct sunlight, rain, or moisture. When storing for long periods of time, please charge the battery every 3 months. For further details, contact your dealer.

7. BASIC TROUBLESHOOTING

This table is only a guide to aid you in getting your scooter operating, should you have any problems. If you are unable to get your scooter operating, please contact your Authorized Service Centre.

Table 1 Basic troubleshooting

<table>
<thead>
<tr>
<th>Symptom</th>
<th>Possible Cause</th>
<th>Solution</th>
</tr>
</thead>
<tbody>
<tr>
<td>Scooter does not move</td>
<td>1. Key switch is not “ON”</td>
<td>1. Turn key switch to &quot;ON&quot;</td>
</tr>
<tr>
<td></td>
<td>2. Main circuit breaker tripped</td>
<td>2. Reset circuit breaker in battery pack area</td>
</tr>
<tr>
<td></td>
<td>3. Brake release lever in ‘Freewheel Mode’</td>
<td>3. Place lever to ‘Drive Mode’</td>
</tr>
<tr>
<td></td>
<td>4. Charger connected to scooter</td>
<td>4. Disconnect charger</td>
</tr>
<tr>
<td></td>
<td>5. Battery power low</td>
<td>5. Recharge battery</td>
</tr>
<tr>
<td></td>
<td>6. Scooter shuts down to conserve battery</td>
<td>6. Turn key switch “OFF”, then “ON”</td>
</tr>
<tr>
<td></td>
<td>7. Controller error</td>
<td>7. Check diagnostic light for Flash Code (See Table 2 to get solution)</td>
</tr>
<tr>
<td>Scooter feels wobbly when driven</td>
<td>1. Seat is loose</td>
<td>1. Check seat for loose hardware or damage. Ensure seat is in locked position.</td>
</tr>
<tr>
<td></td>
<td>2. Bearing in tiller worn</td>
<td>2. Replace bearings</td>
</tr>
<tr>
<td>Range less than expected</td>
<td>1. Charging too infrequently</td>
<td>1. Charge scooter more often</td>
</tr>
<tr>
<td></td>
<td>2. Defective or worn out battery</td>
<td>2. Load test batteries. If necessary replace.</td>
</tr>
<tr>
<td></td>
<td>3. Cold weather reduces battery life</td>
<td>3. Allow batteries to reach room temperature and then fully recharge</td>
</tr>
<tr>
<td></td>
<td>4. Defective charger</td>
<td>4. Contact your Authorised Service Centre</td>
</tr>
<tr>
<td>Erratic behavior when speed control lever operated</td>
<td>1. Faulty speed control</td>
<td>1. Contact your Authorised Service Centre</td>
</tr>
<tr>
<td>Brake squeals</td>
<td>1. Dirt in brake pad</td>
<td>1. Clean Brake - Contact dealer.</td>
</tr>
<tr>
<td>Brake release lever sticks</td>
<td>1. Rust and corrosion</td>
<td>1. Spray ball detent area with lubrication oil.</td>
</tr>
<tr>
<td>Stiff steering</td>
<td>1. Possible grime build-up</td>
<td>2. Lubricate freewheel lever.</td>
</tr>
<tr>
<td></td>
<td></td>
<td>1. Lubricate rod end joints.</td>
</tr>
</tbody>
</table>
Table 2: Scooter Controller Internal diagnostics
The diagnostic flash codes for your scooter are designed to help you perform basic troubleshooting quickly and easily. A diagnostic flash code flashes from the diagnostic light in the event one of the conditions listed below develops.

<table>
<thead>
<tr>
<th>Number of Flashes</th>
<th>Possible</th>
<th>Solution</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>The battery needs charging or there is a bad connection to the battery.</td>
<td>Check the connections to the battery. If the connections are good, try charging the battery.</td>
</tr>
<tr>
<td>2</td>
<td>There is a bad connection to the motor.</td>
<td>Check all connections between the motor and the controller.</td>
</tr>
<tr>
<td>3</td>
<td>The motor has a short circuit to a battery connection.</td>
<td>Please contact your Authorized Service Center.</td>
</tr>
<tr>
<td>4</td>
<td>Not available</td>
<td></td>
</tr>
<tr>
<td>5</td>
<td>Not available</td>
<td></td>
</tr>
<tr>
<td>6</td>
<td>The controller is being inhibited from driving.</td>
<td>Check the battery charger connector. Remove the battery charger from the scooter.</td>
</tr>
<tr>
<td>7</td>
<td>A speed control lever fault is indicated.</td>
<td>Make sure that the speed control lever is in the rest position before switching on the scooter.</td>
</tr>
<tr>
<td>8</td>
<td>A controller fault is indicated.</td>
<td>Make sure that all connections are secure.</td>
</tr>
<tr>
<td>9</td>
<td>The parking brake has a bad connection.</td>
<td>Check the parking brake and motor connections. Make sure the controller connections are secure.</td>
</tr>
<tr>
<td>10</td>
<td>Excessive voltage has been applied to the controller.</td>
<td>Check the battery connections. This is usually caused by a poor battery connection.</td>
</tr>
</tbody>
</table>

If you are in any doubt about carrying out any of the previous suggestions please contact your dealer or TGA.
## 8. Specification

<table>
<thead>
<tr>
<th>Specification</th>
<th>Details</th>
</tr>
</thead>
<tbody>
<tr>
<td>Overall length</td>
<td>1000mm /39&quot;</td>
</tr>
<tr>
<td>Overall width</td>
<td>480mm/19&quot;</td>
</tr>
<tr>
<td>Overall height</td>
<td>900mm/35.4&quot;</td>
</tr>
<tr>
<td>Total: Weight with battery</td>
<td>50kg/110lbs</td>
</tr>
<tr>
<td>Total: Weight without battery</td>
<td>42kg/92lbs</td>
</tr>
<tr>
<td>Min. turning radius</td>
<td>1150mm/45&quot;</td>
</tr>
<tr>
<td>Drive motor</td>
<td>24V/270W/4700rpm</td>
</tr>
<tr>
<td>Battery</td>
<td>DC12Vx12AHx2 or Heavy Duty DC12Vx21A/Hx2</td>
</tr>
<tr>
<td>Charger</td>
<td>24V 1.8A</td>
</tr>
<tr>
<td>Front Tyre</td>
<td>190x50mm/7.5&quot;x2&quot; solid pu tire</td>
</tr>
<tr>
<td>Rear Tyre</td>
<td>215x72mm/8.5&quot;x2.8&quot; solid pu tire</td>
</tr>
<tr>
<td>Driving System</td>
<td>Direct drive to the rear wheel</td>
</tr>
<tr>
<td>Brake System</td>
<td>Automatic Electromagnetic brake</td>
</tr>
<tr>
<td>Control Method</td>
<td>By throttle lever; Dynamic R-series 50A</td>
</tr>
<tr>
<td>Speed (Maximum)</td>
<td>6.4kph/4mph</td>
</tr>
<tr>
<td>Climbing angle</td>
<td>12°-250lb</td>
</tr>
<tr>
<td>Range (Approx)</td>
<td>15 km/9.5miles or Heavy Duty 22km/14miles</td>
</tr>
<tr>
<td>Ground clearance</td>
<td>75mm/3&quot;</td>
</tr>
<tr>
<td>Weight Capacity</td>
<td>113kg/250lb</td>
</tr>
</tbody>
</table>

TGA reserve the right to modify the specification if necessary without prior notification. The final specification is subject to the individual scooter you purchase from your dealer.

**Note:** Maximum driving distance is based on the conditions of ambient temperature at 20°, a 165lb driver and a brand-new fully charged battery.
9. WARRANTY
This is to certify that your TGA product is warranted by TGA for a period of twelve months from the date of purchase subject to the following conditions:

1. This warranty is extended only to the original purchaser/user of the TGA product identified by the product serial number located on the frame. This warranty is not transferable.
2. TGA will repair or replace free of charge any part found upon inspection by an authorised representative of TGA to be defective in material and/or workmanship.
3. If a defect or fault is discovered, the dealer from where the product was purchased should be notified immediately.

Warranty Exclusions
- Tyres and the rear anti-tip wheels (these are normal wear components and replacement is not warranted)
- TGA will not be responsible for defects caused by abuse in return transit, vandalism, misuse, abuse, accident, negligence, alteration or misuse caused by non-observance of instructions set out in the Operators Manual
- This warranty does not cover commercial or rental use of the Eclipse or any use other than normal.
- Upholstery and seating (these are normal wear components and replacement is not warranted)
- Returns are only accepted when the product is shipped in the original carton with original protective packing materials installed.
- Returned goods to be sent to TGA carriage paid. If a successful warranty claim is found TGA will pay return carriage.

There is no other express warranty. Any and all other implied warranties are excluded. Your rights as a consumer are not affected.

Service Information: Only genuine TGA Spares should be used.
An authorised TGA dealer will service your Eclipse under the terms of the above stated warranty. Servicing dealership personnel are trained professionals. They should be able to answer any question you may have. If you encounter a problem that a dealer does not solve to your satisfaction, please discuss it with the dealership's management. The Service Manager or General Manager can help. Almost all problems can be solved in this way. If you are dissatisfied with the decision made by the dealership's management, contact:
10. SAFE DRIVING TIPS FOR SCOOTER USERS

Scooters fall into two categories, Class 2 which is essentially a 4mph pavement vehicle and can only legally be used on the road when either crossing over or because there are no footpaths. A Class 3 vehicle is capable of 4 and up to 8 mph and provided it is fitted with front and rear lights, flashing indicators, horn and rear view mirror it is legal for use on the road. It can also be used on the footpaths but must not exceed 4 mph. Class 2 & 3 vehicles must not be driven on Dual Carriageways, Motorways, Bus Lanes or Cycle Tracks. Your Eclipse is a class 2 vehicle capable of 4mph.

INSURANCE - There is no legal requirement for insurance but it is a very good idea to have cover for fire and theft, accidental and malicious damage, and also third party damages. Just phone Karen at TGA (01787 882244) and she will talk you through it.

BREAKDOWN & GET YOU HOME SERVICE - Again a very good idea and can take a load of worry off your mind. Just talk to Karen.

MOBILE PHONE - An essential item if you are out there alone. You never know, breakdown, accident, health - communication is a must. Please take notice of laws regarding the use of mobile phones when driving.

CARRYING LOADS
Do not overload. It may make the vehicle unstable and reduce its range. Place heavy loads inboard – in the middle – not behind the back wheel which can lighten the steering or can cause the front end to lift off the road on a bump, and not at the front which might make steering heavy.

WATCH YOUR BRAKES
Never try to drive, or even sit on your vehicle while it is in “free wheel”. The electronic brake will be out of action and the vehicle could run away with you.

MAINTENANCE
Do carry out the checks listed in this manual regularly and also have the machine serviced at least once a year.

TYRES
Regularly check condition and replace when they become worn.

SENSIBLE GUIDELINES FOR SAFETY
When using the footpath – Just because you are on the footpath or pedestrian precinct does not make you a pedestrian. If you are on a motorized vehicle you are no longer a pedestrian. So take care.

Remember pedestrians always have right of way! - Many people on foot will be kind and helpful to the drivers of a wheelchair or scooter, but not everyone!

In a crowded precinct, market area, or footpath - It is your responsibility to ensure you do not run into anyone or do any harm with your vehicle. While many people will make way for you, you cannot expect everyone to do so. Some will appear to not even realize you are there. They will climb round and even over your vehicle rather than allow you room to move. Also be very aware of people’s feet.

When climbing or descending kerbs – Always approach at right angles, with your front wheels straight on to the kerb. Do not climb or descend kerbs higher than the manufacturer recommends. Move carefully, to avoid traumatic bumps – to yourself or the vehicle.
Watch out for:

- **Children** – They may well run in front of you without warning. You may only be moving very slowly, but you could still injure a child.

- **Elderly People** – They may be unable to quickly move aside to let you pass. Give way to them.

- **Disabled people on foot** – They too may be unable to dodge you.

- **People with visual problems or impaired hearing** – Give them space and time.

- **Other motorised vehicle users** – You may be doing all the right things. This does not guarantee they will do likewise.

When you need help:

You may need to ask people to open doors for you. Most people are willing to help, if asked politely. Don’t struggle to do the impossible, or even the very difficult things when there are people around who would help if asked.

Driving inside shops and buildings – This is where you have the advantage over car users! Not many supermarkets would welcome a car driving round their store. But most bigger shops and even some quite small ones, are accessible to wheelchairs and scooters. Once inside the store it is your responsibility to drive slowly and safely and not damage the fittings or the stock, or hurt other shoppers or store workers. You may need to ask for help. Again in most cases people are willing if asked properly. Don’t risk pulling down a whole display to reach the top shelf. ASK FOR HELP.

Speed in shops and buildings – Reduce it! – It is a good idea to set the speed control to a lower level to avoid any accident. Be especially careful if you need to reverse, that your way is clear of shop fittings and people. Three wheeled scooters with their maneuverability and lightness of steering are more suited to shopping.

On the Road – Remember you are not driving a car, but a very small and slow vehicle, which is therefore more vulnerable.

If it is possible, use the footpath. It is wise to avoid using roads, particularly busy ones.

WHEN DRIVING YOUR VEHICLE ON THE ROAD:

Remember although this is legal for all Class 3 vehicles it is not always safe or sensible to do so. You are responsible for your own safety and that of other road users. The normal rules of the road apply and you must observe the law about:

- **Driving on the left side of the road.** Never drive against the traffic.

- **One way streets** – Never drive against the traffic.

- **Giving way where cars would give way** (details in the Highway Code).

- **Obeying traffic lights and all other road signals and instructions**.

- **Giving way to pedestrians on crossings.**
But always remember your vehicle is not a car and is small and vulnerable – If you need to turn right across traffic, try to get on to the footpath before the turn and then use a safe pedestrian crossing or traffic light control crossing. Only try to turn right if you are completely sure it is safe to do so. Do not rely only on your mirror. It may give a false impression of distance. Always give clear indication of intention to turn left or right.

**Remember** – the car you can see when you look behind may appear a long way away, but it is almost certainly moving faster than you are, often deceptively so. It could well be upon you before you complete your maneuver. And it may not be able to stop in time.

**When passing a parked vehicle** – take great care you are not moving into the path of a faster moving vehicle coming behind you, or towards you. Always signal your intention to pull out.

In the event of a difficult or dangerous situation – Use your hazard lights – But do not drive with them on unnecessarily.