# L4NDICE

E7/E9
90 Series Elliptical
Owner's Manual



**Part Number: 95001-7** 

# **Important Safety Instructions**

Read all instructions before using the Elliptical.

**Note:** This product is intended for both Commercial and Home use.

**▲** DANGER

To reduce the risk of electric shock: always unplug the elliptical from the electrical outlet immediately after using and before cleaning.

**AWARNING** 

Risk of personal injury. Keep children under the age of 13 away from the machine.

**AWARNING** 

To reduce the risk of burns, fire, electric shock or injury to persons:

- An appliance should never be left unattended when plugged in. Unplug from outlet when not in use, and before putting on or taking off parts.
- Close supervision is necessary when the elliptical is used by or near children or persons with disabilities.
- Use the elliptical only for its intended use as described in this manual. Do not use attachments not recommended by Landice.
- Never operate elliptical if it has a damaged cord or plug, if it is not working properly, or if it has been damaged. Call your dealer or certified service provider immediately for examination and repair.
- Keep the power cord away from heated surfaces. Be sure the cord has plenty of slack and cannot be pinched under the elliptical.
- Do not carry the appliance by the power cord or use the power cord as a handle.
- Never drop or insert objects into any opening on the elliptical. Be sure no objects are near or beneath the elliptical.
- Never operate the product with the air openings blocked. Keep the air openings free of lint, hair and the like.
- Do not operate outdoors.
- Do not operate where aerosol (spray) products are being used or where oxygen is being administered.
- To disconnect, turn all controls to the off position, then remove the plug from the outlet.

#### SAVE THESE INSTRUCTIONS

# **▲** DANGER

Pour réduire le risque d'électrocution : toujours débrancher le elliptique de la prise électrique immédiatement après son utilisation et avant de le nettoyer.

# **AAVERTISSEMENT**

Risque de blessure personnelle. Garder les enfants de moins de 13 ans loin de la machine.

# **AAVERTISSEMENT**

Pour réduire le risque de brûlure, d'incendie, d'électrocution ou de blessure corporelle :

- Un appareil électrique ne doit jamais être laissé sans surveillance lorsqu'il est branché. Débranchez-le lorsque vous ne l'utilisez pas et avant d'y installer ou d'en retirer des éléments.
- Une surveillance étroite est nécessaire lorsque le elliptique est utilisé par des enfants, des personnes invalides ou handicapées ou à leur proximité.
- N'utilisez le elliptique que dans le cadre prévu et décrit dans ce manuel. N'utilisez aucune pièce supplémentaire non recommandée par Landice.
- N'utilisez jamais le elliptique si son câble ou sa fiche électrique est abîmé(e), ne fonctionne pas correctement ou a été endommagé(e). Appelez immédiatement votre distributeur ou prestataire de services certifié pour qu'il l'examine et le répare.
- Tenez le câble électrique éloigné des surfaces chauffées. Assurez-vous que le câble ait suffisamment de mou et ne puisse pas se coincer sous le elliptique lorsqu'il s'élève ou s'abaisse.
- Ne transportez pas l'appareil par le cordon d'alimentation et n'utilisez pas le cordon d'alimentation comme poignée.
- Ne faites pas tomber et n'insérez pas d'objet dans une quelconque ouverture du elliptique. Assurezvous qu'aucun objet ne se trouve à proximité ou sous la courroie lorsque vous utilisez le elliptique.
- N'utilisez jamais le elliptique si les ouvertures d'aération du capot de moteur sont obstruées. Ne laissez pas de peluches, cheveux, poussières ou débris bloquer les ouvertures d'aération.
- N'utilisez pas le elliptique en extérieur.
- N'utilisez pas le elliptique lorsque des produits aérosols (sprays) sont utilisés ou lorsque de l'oxygène est administré.
- Pour déconnecter, appuyez deux fois sur STOP, retirez la clé d'arrêt d'urgence puis débranchez la prise du secteur.

# **AWARNING**

# Failure to observe the following warning statements can result in serious injury!

- Do not use this product without first consulting your doctor if you suffer from any illness, condition, or disability that affects your ability to run, walk or exercise.
- Do not use this product without supervision present if you are suffering from any illness, condition, or disability which affects your ability to run, walk or exercise. Failure to do so can result in serious injury should you fall while the elliptical is in motion.
- Failure to leave ample clearance around the elliptical could cause you to be trapped between the mechanism and a wall, resulting in serious injury. Allow a minimum clearance of 6 inches (15.5 cm) on each side of the elliptical. Allow a minimum clearance of 1 foot (30.5 cm) at the rear of the elliptical.
- Familiarize yourself with this manual. Be sure you understand the operation of the elliptical before use.
- Always follow basic safety precautions when using an electrical appliance.

# **▲**WARNING

Heart rate monitoring systems may be inaccurate. Over exercising may result in serious injury or death. If you feel faint stop exercising immediately.

# **A**AVERTISSEMENT

Les systèmes de surveillance de la fréquence cardiaque peuvent être inexacts. L'exercice excessif peut entraîner des blessures graves ou la mort. Si vous vous sentez faible, arrêtez de vous entraîner immédiatement.

# **AWARNING**

This product contains chemicals known to the state of California to cause cancer and birth defects or other reproductive harm.

# **AAVERTISSEMENT**

Ce produit contient des produits chimiques reconnus par l'état de Californie comme pouvant causer le cancer, des anomalies congénitales ou d'autres troubles de la reproduction.

#### SAVE THESE INSTRUCTIONS

# **AAVERTISSEMENT**

# Le non-respect des avertissements qui suivent peut entraîner de graves blessures !

- N'utilisez pas ce produit avant d'avoir consulté votre médecin si vous souffrez de tout problème de santé, maladie ou handicap pouvant affecter votre capacité à courir, marcher ou faire de l'exercice.
- N'utilisez pas ce produit sans surveillance si vous souffrez de tout problème de santé, maladie ou handicap pouvant affecter votre capacité à courir, marcher ou faire de l'exercice. Le non-respect de ces recommandations peut entraîner des blessures graves si vous chutez lorsque le elliptique est en mouvement.
- Le fait de ne pas laisser suffisamment d'espace dégagé autour du elliptique peut avoir comme conséquence, en cas de chute, que vous soyez immobilisé entre le elliptique et un mur, la courroie en mouvement pouvant causer des brûlures ou autres blessures. Laissez un espace dégagé d'au minimum 15.5 cm de chaque côté du elliptique. Laissez un espace dégagé d'au minimum 30.5 cm à l'arrière du elliptique.
- Prenez connaissance du présent manuel. Veillez à bien comprendre le fonctionnement du tableau de commandes de votre tapis roulant avant de l'utiliser.
- Prenez toujours les précautions de sécurité de base lorsque vous utilisez un appareil électrique.

# **AWARNING**

Connect elliptical to a properly grounded, dedicated electrical outlet only. See the following Grounding Instructions.

# **AAVERTISSEMENT**

Ne branchez le tapis roulant que sur une prise électrique raccordée à la terre et exclusivement dédiée au tapis roulant. Voir les instructions de mise à la terre qui suivent.

# **Grounding Instructions**

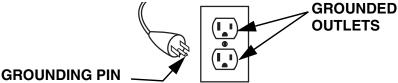
This product must be grounded. If it should malfunction or break down, grounding provides a path of least resistance for electric current to reduce the risk of electric shock. This product is equipped with a cord having an equipment grounding conductor and a grounding plug. The plug must be plugged into an outlet that is properly installed and grounded in accordance with all local codes and ordinances.

**▲** DANGER

Improper connection of the equipment-grounding conductor can result in a risk of electric shock. Check with a qualified electrician/service technician if you are in doubt as to whether the product is properly grounded. Do not modify the plug provided with the product. If it will not fit the outlet, have a proper outlet installed by a qualified electrician.

## 110-250 (50/60Hz) Ellipticals

This elliptical is configured to operate between 110-250 VAC (50/60 Hz) circuits. The internal transformer will automatically adjust to any circuit configuration within these parameters. This product is for use on a nominal 120-volt circuit and has a grounding plug that looks like the plug illustrated in the figure below. Make sure the product is connected to an outlet having the same configuration as the plug. No adapter should be used with this product nor should a means for grounding be added to the product.



Ellipticals marked 200-250 VAC are intended for use on a circuit having a nominal rating more than 120V and are factory equipped with a specific cord and plug to permit connection to a proper electric circuit. Make sure the product is connected to an outlet having the same configuration as the plug. Do not use an adapter with this product. If the product must be reconnected for use on a different type of electric circuit, qualified service personnel should make the reconnection.

# **Grounding Instructions**

Ce produit doit être mis à la terre. En cas de dysfonctionnement ou de panne, la mise à la terre offre une voie de moindre résistance au courant électrique, ce qui réduit de risque d'électrocution. Le tapis roulant est équipé d'un câble électrique muni d'un fil conducteur de mise à la terre et d'une fiche de mise à la terre. Cette fiche doit être branchée sur une prise adaptée, correctement installée et raccordée à la terre conformément à tous les codes et règlements locaux.

# **▲** DANGER

Un mauvais raccordement à l'équipement de mise à la terre vous expose à un risque d'électrocution. Renseignez-vous auprès d'un électricien/ technicien de service qualifié en cas de doute sur la mise à la terre correcte du tapis roulant. Ne modifiez pas la fiche fournie avec le tapis roulant: si elle ne convient pas à la prise, faites installer une prise adaptée par un électricien qualifié.

Les elliptiques sur lesquels est inscrit 200-240 CA (VAC) sont destinés à une utilisation à une tension nominale supérieure à 220 V et équipés en série d'un câble électrique et d'une fiche spécifiques pour permettre le branchement sur une prise adaptée. Si le produit doit être configuré pour une utilisation sur un type de circuit électrique différent, il convient de faire appel à du personnel de service qualifié pour installer le bon raccordement.

# **Using the Control Panel**

See page 31 for complete instructions.



A quick start guide for using the elliptical console controls is provided in the following table.

# **Elliptical Controls: Quick Start Guide**

**To start the elliptical:** Press **START** to power up elliptical. All displays light and the starting effort level is set to Level 1.

**To turn off the elliptical:** Press **STOP** once to pause the elliptical. Press **STOP** twice to power down the elliptical. The elliptical will shut off and all current statistical information will be cleared.

**To view your speed in different units:** Press the **SPEED (+ / -)** to select MPH, Km/hr, or Revolutions per Minute.

# To change effort level:

Press and hold **EFFORT (+)** key to increase effort. Pressing for more than 2 seconds raises effort faster. Release key when desired effort is shown on EFFORT display.

Press and hold **EFFORT** (–) key to reduce effort. Pressing for more than 2 seconds reduces effort faster. Release key when desired effort is shown in the EFFORT display.

# To view different screens during workout:

Use the arrow keys at any time to choose the display screen that best suits your workout.

# **Switching English/Metric Display Units**

The display shows English units (mph for speed, lb for weight) by default. To change to metric units (kilometers per hour for speed and kilograms for weight):

- Ensure the elliptical is plugged in and powered off.
- Press START then hold 3 and 9 simultaneously during the boot-up screen, then release all. Use the + or – keys to move up and down the list and select Toggle Units, then press START to select the setting. Press STOP to save and exit.

Repeat the same steps to return the display to English units if desired.

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# 1. Introduction

Landice has placed over 100,000 treadmills, ellipticals and bikes in the harshest commercial environments around the world, where our fitness equipment has proven its strength and durability. Landice products are designed by a world-class development team whose innovation defines the leading edge of high-end fitness.

# 1.1. Before You Begin

Please do the following before you start to exercise on your elliptical:

- Familiarize yourself with this manual. Look it over carefully.
   Be sure you understand the control panel operation before using the elliptical.
- Register your elliptical. Landice backs your elliptical with a strong warranty. For the factory to respond if your elliptical has a problem, we need your warranty information on file. Register online at the link below. http://www.landice.com/support/product-registration
- Ensure that a suitable electrical outlet is available:
  - · Standard: 120VAC/15 amp dedicated circuit
  - Optional: 220VAC/15 amp dedicated circuit
- Select the proper location. The elliptical should be installed in a climate-controlled room. See "Installation" on page 19.
- Familiarize yourself with the features of the elliptical, shown in the following figures.

Figure 1-1. Features and Controls



**Table 1-1 Features and Controls** 

Item	Description
Control Panel	Provides workout displays and controls.
USB Port	Provides a charging port for devices up to 600mA and also allows Landice Service Provider to update software.
Accessory Tray (2)	Provides accessory storage.
Pulse Grips (2)	Detects pulse when hands are placed on the grips, allowing elliptical to calculate and display heart rate.
Bottle Holder (2)	Hold bottles/cups.

# 1.2. Heart Rate Monitoring

This section provides basic concepts of heart rate monitoring so you can better understand how to use it to reach the fitness level you desire.

# 1.2.1. What is exercise intensity?

Exercise intensity is simply a measure of how hard you are working at a given time during exercise. The ACSM, the world's leading medical and scientific authority on sports medicine and fitness, recommends that every individual involved in an exercise program know how hard his/her body is working during exercise.

Your heart provides key information for determining how intensely you are working during exercise. Your heart rate (how many times your heart beats per minute) is really an efficiency rating for your entire body. The number of times your heart beats during each minute of exercise is a measurement of the intensity of the exercise. If your heart rate is low, exercise intensity is low; if your heart rate is high, your exercise intensity is high.

#### 1.2.2. What is maximum heart rate?

Maximum Heart Rate (MHR) is the maximum attainable heart rate your body can reach before total exhaustion. True maximum heart rate is measured during a fatigue or "stress" test. This test must be done in a clinical setting and is not practical or accessible for most people.

**AWARNING** 

The use of this formula assumes no underlying heart or respiratory disease or other condition, which could be adversely affected by exercise. Consult your doctor before using this chart!

**AAVERTISSEMENT** 

L'utilisation de cet équipement implique l'absence de maladie cardiaque ou respiratoire ou autre problème de santé susceptible d'être affecté par l'exercice physique. Consultez votre médecin avant d'utiliser cet équipement!

Your maximum heart rate can be established with a high degree of accuracy using the following simple formula:

Estimated Maximum Heart Rate = 220 minus your age.

If John is 35 years old, what is his estimated maximum heart rate?

John's estimated maximum heart rate is: 220 - 35 = 185

185 beats per minute is the estimated maximum number of times John's heart can beat before his body would fatigue or "max out." This number is extremely helpful because it indicates the absolute highest exercise intensity John can handle before his body wears out. The ACSM says that during exercise, John should keep his heart rate below his maximum so that he will not become exhausted and have to quit. In fact, the ACSM gives John a specific percentage range of his maximum heart rate to exercise in, known as his Target Heart Rate Zone (THRZ).

# 1.2.3. Why should I monitor exercise intensity?

Your heart is the most important muscle in your body and, like all muscles, must be exercised regularly to remain strong and efficient. According to fitness experts, exercise is more effective when you work out in a specific heart rate range or zone. This is referred to as your Target Heart Rate Zone (THRZ) and is reflected by the number of heart beats per minute. This zone can vary greatly depending on your age, fitness level and various other factors. If your heart rate is too low during exercise, your body reaps little or no benefit. This means you're not likely to see the results you want, like weight loss or increased endurance. If your heart rate is too high during exercise, you may tire too quickly, become fatigued or even run the risk of injury.

Monitoring exercise intensity helps you to stay at a level of exercise that allows you to accomplish your goals. In fact, the ACSM recommends that, in order to get the most benefit from your cardiovascular exercise, you should work within your THRZ for at least 20 to 60 minutes per workout, 3 to 5 times per week. Knowing your exercise intensity (THRZ) will allow you to work at the right level of exercise to accomplish this.

# 1.2.4. How do I determine my Target Heart Rate Zone?

Your THRZ represents the minimum and maximum number of times your heart should beat in one minute of exercise. The ACSM recommends that all individuals should work within a Target Heart Rate Zone of 60% to 85% of Maximum Heart Rate. This means that your heart rate during exercise should not fall below 60% or rise above 85% of your maximum heart rate. Let's look at John from our earlier example. John is 35 years old, so his estimated maximum heart rate is 220 minus 35, or 185 beats per minute (bpm). The ACSM recommendation is that John should exercise between 60% and 85% of 185 beats per minute to stay in his THRZ. Let's determine John's THRZ:

- John's estimated maximum heart rate: 185 bpm
- Lower target limit: 185 (MHR) X 0.6 111 bpm
- Upper target limit: 185 (MHR) X 0.85 157 bpm
- John's target heart rate zone: 111-157 bpm

111-157 beats per minute is the range or zone for John's heart rate during exercise in order to achieve his goals. If John is a beginning exerciser, he'll want to stay at the low end of his

#### Introduction

THRZ. If John is a more advanced exerciser, he may want to work at the higher end of his THRZ to challenge himself more. The following list shows the different intensity levels within a target heart rate zone:

Beginner: 60% of MHR

Weight Loss: 75% of MHR

Aerobic: 85% of MHR

### 1.3. Heart Rate Monitors

Heart rate monitors are built into the elliptical's pulse grips, and a wireless chest strap monitor is also available on residential models.

Exercising too hard can put you at a risk for injury. A heart rate monitor reminds you of the safe and effective heart rate intensity at which you should exercise and warns you if your workouts go too far.

If you want to reach your exercise goals, it's important to stay in your THRZ during workouts. A heart rate monitor provides a reminder of the intensity and quality of each workout session.

Landice heart rate monitors are used to monitor your level of exercise intensity during workouts. Pulse meters have a high margin for error. Manual pulse measurements during exercise can result in errors as high as ±15 beats per minute, with the risk of potential error increasing as heart rate increases.

# 1.3.1. Wireless Chest Strap Monitoring System

# Note: The wireless chest strap is only available on residential elliptical models.

The Wireless Chest Strap transmitter works best against bare skin because sweat (salt water) is an electrical conductor. If you are having trouble getting an accurate pulse reading, try moistening the electrodes on the chest transmitter with water.

Figure 1-2. Wireless Chest Strap Transmitter



Center the transmitter on the chest as high under the pectoral muscles (breasts) as possible. Tighten the strap so that the belt is as tight as possible without being uncomfortable.

## 1.3.2. Contact Heart Rate Monitoring System

The Contact Heart Rate Monitoring System is designed for slower speeds because the Contact Heart Rate Monitoring System requires your arms to remain stationary. We recommend using the pulse grips at speeds less than 4 mph (6.4 km/h).

The Contact Heart Rate Monitoring System can be used in place of the wireless chest strap to perform any of the following functions:

- Monitor your Time in Zone
- · Heart Rate Control (HRC) program adjustment
- · Help you maintain your Target Pulse

# To use the Contact Heart Rate Monitoring System:

- 1. Switch to any screen that shows Pulse.
- Grab the hand grips. When you place your hands on the grips the display flashes. The pulse will "beat" briefly and then display your heart rate. Your heart rate will be continuously monitored while your hands remain on the grips.

The HRC programs make effort level adjustments to maintain your target heart rate while your hands remain on the grips. If you remove your hands the HRC programs will not change the effort level until you place your hands on the grips.

Note: If you are wearing the wireless chest strap, the heart rate from the pulse grips overrides the wireless signal from the chest strap while your hands are on the pulse grips. When you release the grips, the elliptical uses the wireless chest strap signal for pulse calculation.

# 1.4. Elliptical Program Capabilities

The elliptical has the following capabilities:

- **Built-in Programs:** You enter the program's maximum time and effort. See page 36.
- Specific Goal Programs: The numeric keypad is used to enter Time Goal, Distance Goal, and Calorie Goal. See page 41.
- Heart Rate Control (HRC) Programs: The heart rate program will automatically vary the effort based upon your target heart rate. This target training maximizes your workout performance while minimizing your workout time. See page 42.
- User-Defined Programs: A User-Defined Program looks and runs exactly like a Built-In Program. The primary difference between Built-In and User-Defined Programs is customization. User-Defined Programs allow you to manually edit individual segments. See page 39.
- **Fitness Tests:** The Fitness Tests will measure your fitness level based on your age, gender, and performance. Your Fitness level is calculated using different protocols. See "Fitness Testing" on page 47.

# 2. Installation

# 2.1. Tools Required

Hardware kit contains most of the tools required to complete elliptical installation. The following is a list of what is included and what is required:

#### Included:

- Cross tip screw driver, #6 Allen key wrench (combination)
- #5 Allen Key Wrench
- #8 Allen Key Wrench
- #10 Allen Key Wrench

#### Required:

- 3/8 Drive Socket Wrench
- 3/8 Drive Socket Extension (3" long)
- 3/8 Drive 10MM Standard Socket
- 3/8 Drive 13MM Standard Socket
- 3/8 Drive 16MM Standard Socket
- 3/8 Drive 19MM Standard Socket
- 19MM Open End Combination Wrench
- Soft Face Mallet
- Utility Razor Knife

# 2.2. Unpacking

Unpacking and installation of the elliptical should be done by a qualified technician. The packaged elliptical is very heavy and weighs 530 lbs, packaged.



To avoid injury, use caution when moving and lifting the elliptical during unpacking and assembly.



To avoid damaging the elliptical, DO NOT cut through the center of the box.

## Installation

Note: Move the shipping crate/pallet to location of final assembly. Allow 3-5 feet working space to safely remove box and pallet.

# 2.3. Assembly

**AWARNING** 

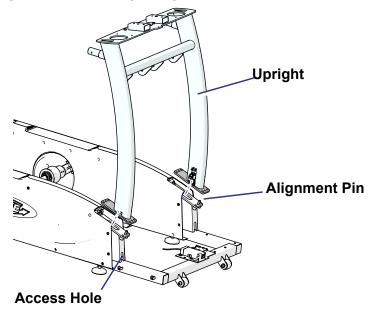
Failure to leave ample clearance around the elliptical could result in the user becoming trapped between the elliptical and the wall resulting in serious injury.

**▲**WARNING

Do not plug elliptical into a surge suppressor or GFI outlet.

1. While lowering upright onto elliptical frame alignment pins, be sure to route the harness guide wire (found in the right leg tube) out through the lower access hole on frame.

Figure 2-1. Installing Upright onto Frame Mounts



2. Loosely attach upright mounting hardware consisting of (8) M10x40 hex head bolts, (8) M10 flat washers and (8) M10 spring lock washers.

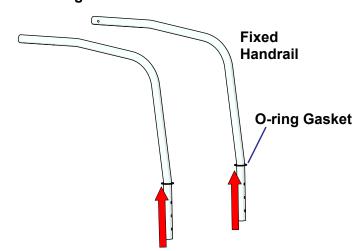
M10x40
Hex Head Bolt
M10 Spring Washer

M10 Flat Washer

Figure 2-2. Installing Upright Mounting Hardware

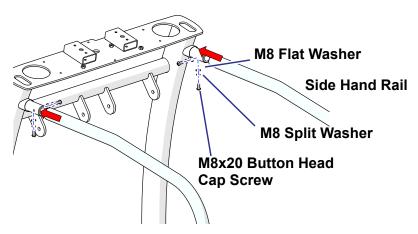
3. Slide flat rubber 2.5" O-ring gasket found in hardware kit onto fixed handrail.

Figure 2-3. O-ring Gaskets



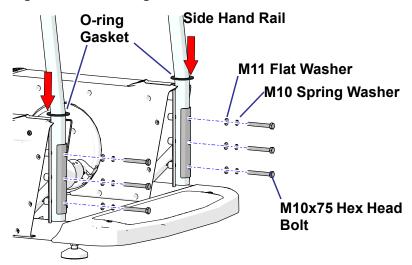
4. Attach side hand rails onto upright mounting points, hand tighten upper hardware consisting of (4) M8x20 button head cap screws, (4) M8 spring washers, and (4) M8 flat washers. Repeat step with opposite side.

Figure 2-4. Attaching Side Rails



5. Secure lower portion of side hand rail with (3) M10x75 hex head bolts, (3) M11 flat washers and (3) M10 spring washers. Firmly tighten hardware. Repeat step with opposite side. Return to steps 2 and 3, firmly tighten hardware.

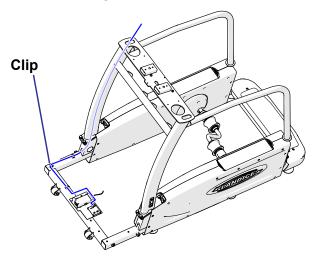
Figure 2-5. Securing Lower Side Hand Rail



6. Slide O-ring gaskets down onto side shroud plastics. O-ring is used to conceal gaps between handrail and surrounding plastic shrouds.

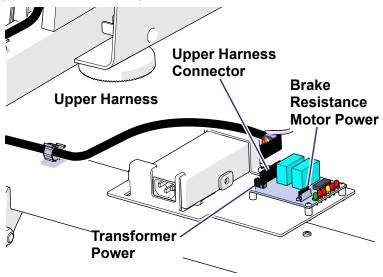
7. Attach male end of console power harness to harness guide wire (found in right upright leg tube). Carefully route harness out through access hole at bottom of the frame.

Figure 2-6. Routing Console Power Harness



8. Route harness along base frame perimeter, locking in place with attached harness clips. Connect to green power supply board.

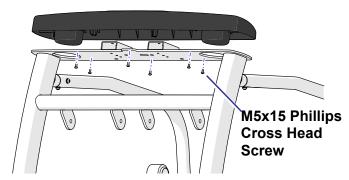
Figure 2-7. Connecting Harness



9. Install cup holder assembly over upright mounting plate. Ensure main harness is routed to center of console access hole. Secure with (6) M5x15 Phillips cross head screws to underside of mounting plate.

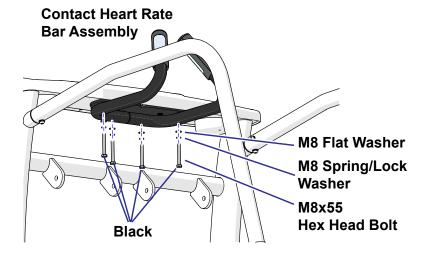
Figure 2-8. Installing Cup Holder Assembly

# **Cup Holder Assembly**



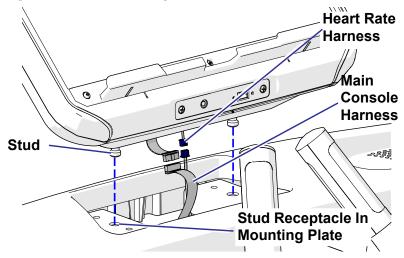
10. Attach contact heart rate bar assembly to bottom of upright mounting plate. Feed wires up through mounting plate, care should be taken to ensure wires are not pinched between mounting plate and CHR bar once installed. Secure with (4) M8x55 Black Hex Head Bolts, (4) M8 Black Spring/Lock Washers, and (4) M8 Black Flat Washers.

Figure 2-9. Attaching Contact Heart Rate Bar Assembly



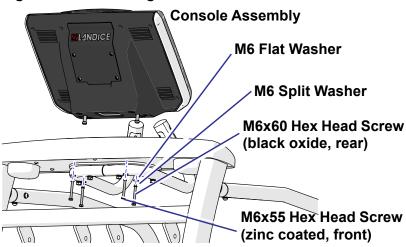
11. Connect main console harness to keyed connector routed through upright assembly. Connect keyed contact heart rate harness to wires from console. Route wires away from both raised surfaces on mounting plate.

Figure 2-10. Connecting Console Harness



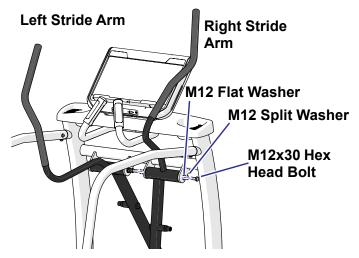
12. Attach console to upright mounting plate: hold console securely in place with one hand and attach to underside of mounting plate using (2) M6x60 black hex head bolts, black flat and spring washers (rear) and (2) M6x55 zinc hex head bolts, zinc flat and spring washers (front).

Figure 2-11. Attaching Console



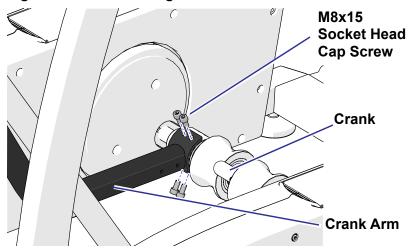
13. Install left and right vertical stride arms using (4) M12x30 Hex Bolts, (4) M12 spring washers, and (4) M12 flat washers. Tighten bolts simultaneously until fully secured.

Figure 2-12. Installing Stride Arms



14. Connect lower crank arm (labeled L and R) onto crank bearing assembly. Attach with (4) M8x15 socket head cap screws, leave hardware loose.

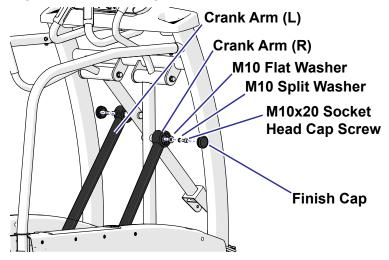
Figure 2-13. Connecting Lower Crank Arm



15. Install upper crank arm into vertical arm mounting stud with (1) M10x20 socket head cap screw and (1) M10.5 flat

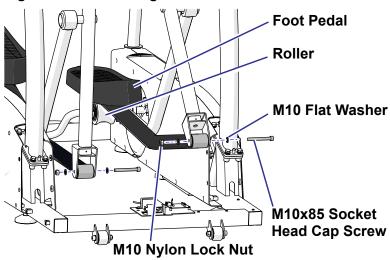
washer. Firmly tighten hardware, install plastic finish cap. Repeat for opposite side. Return to lower crank arm hardware and tighten securely.

Figure 2-14. Installing Upper Crank Arm



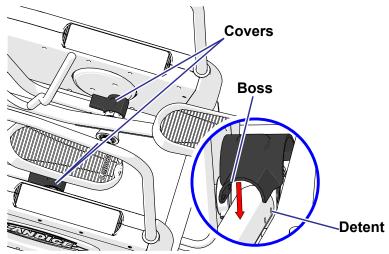
16. Attach foot pedal tubes to bottom of vertical stride arm with (1) M10x85 socket head cap screw, M10 flat washer and M10 nylon lock nut. Firmly tighten hardware. Repeat step with opposite side.

Figure 2-15. Attaching Foot Pedal Tubes



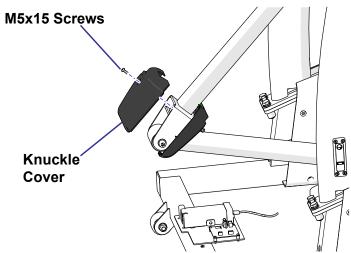
17. Install lower crank arm bearing cover. Firmly press cover downward over tube until locked in place. Repeat step with opposite side.

Figure 2-16. Installing Arm Covers



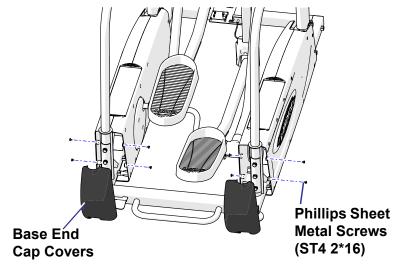
18. Install vertical stride arm/pedal arm covers with (2) M5x15 cross head screws. Repeat step with opposite side.

Figure 2-17. Stride Arm Knuckle Covers



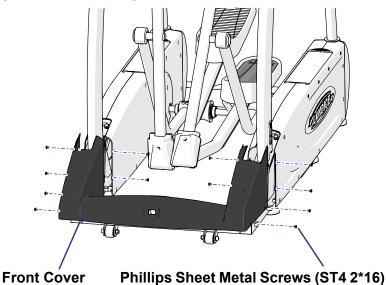
19. Install base end cap covers with (4) Phillips sheet metal screws (ST4 2\*16). Repeat step with opposite side.

Figure 2-18. Installing Base End Cap Covers



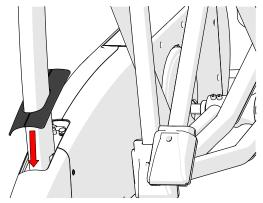
20. Install front cover using (12) Phillips Sheet Metal Screws (ST4 2\*16).

Figure 2-19. Installing Front Cover



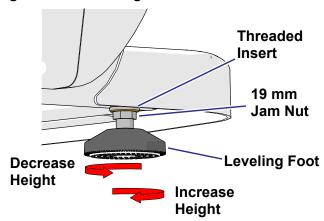
21. Slide Upright plastic mounting covers down on top of shroud/front cover. Adjust covers to ensure they are flush with surrounding surfaces.

Figure 2-20. Installing Upright Mounting Covers



- 22. Install rear step with (2) M6x25 cross head machine screws.
- 23. Verify stability of equipment, adjust leveling feet as required using a 19MM open end wrench.

Figure 2-21. Leveling Feet



24. Plug the elliptical power cord into a dedicated power outlet. Ensure that the power cord has plenty of slack and will not be pinched beneath the elliptical.

# 3. Operation: Landice Achieve Control Panel

# 3.1. Landice Achieve Control Panel



**Table 3-1 Landice Achieve Control Panel Functions** 

Function	Description
EFFORT	Displays the effort setting of the elliptical.
SPEED	To view your speed in different units: Press SPEED +/- to select MPH, Km/hr, or Revolutions per Minute.
START	Press <b>START</b> to power up elliptical. All displays light and the starting effort level is set to Level 1. The <b>START</b> button will also take the elliptical out of pause mode.
STOP	Press <b>STOP</b> once to pause the elliptical or twice to turn it off. The statistical information is cleared when the elliptical is turned off.
MANUAL MODE	To manually control the effort of the elliptical, press the button below the word <b>MANUAL</b> .

# Operation: Landice Achieve Control Panel

**Table 3-1 Landice Achieve Control Panel Functions (Continued)** 

Function	Description	
PROGRAMS	To use the built-in and user-defined workout programs: Press the button below the word PROGRAMS at any time to display the programs selection screen. Use arrow to scroll through the built-in and user-defined program previews and select the desired program by pressing ENTER. You are then prompted to enter the program's specific parameters (Maximum Effort, Time, etc.). Use the numeric keypad or the arrow to select the desired values. Press START to begin the program.	
HEARTRATE PROGRAMS	To use the Heart Rate Controlled programs: Press the button below HEARTRATE PROGRAMS at any time. Choose either a built-in or user-defined heart rate program. Heart Rate Control programs automatically adjust effort in order to maintain a constant heart rate.	
PLUS KEY	Press and hold the <b>(+)</b> to increase effort or change the speed readout. Pressing for longer than 2 seconds causes the effort to increase at a faster rate. Release the key when the display shows desired effort or speed readout.	
MINUS KEY	Press and hold to the <b>(-)</b> to decrease effort or change the speed readout. Pressing for longer than 2 seconds causes the effort to decrease at a faster rate. Release the key when the display indicates desired effort or speed readout.	
ARROW KEYS	The buttons below the left and right arrows move between display sections or to set values.	
EXPRESS 1	This key, in conjunction with the numeric keypad, allow you to directly enter a target effort without using the +/- keys. Press <b>EXPRESS 1</b> , then enter the desired value using the numeric keypad. Then press <b>ENTER</b> or wait 3 seconds for the elliptical to adjust to the new settings.	
EXPRESS 2	Select MPH, Km/hr, or Revolutions per Minute by pressing <b>EXPRESS 2</b> .	
The numeric keypad is used to change effort with the <b>EXPRESS 1</b> input key, enter user settings, and configure programs.		
1 2	3 4 5 6 7 8 9 0	

#### 3.2. **Display Features**

The screens on the right are the options available for displaying workout information. Table 3-2 provides information about the available options.

To toggle between these screens during your workout, press the arrow keys.

To customize the information displayed on the Personalized Stats screen, press the button under CUSTOMIZE DISPLAY to edit. Use the arrows to toggle through the options and press **ENTER** to confirm your selections.

To modify the HIIT sprint and recovery effort values on the HIIT Screen, press and hold the button below the item you would like to edit for 5 seconds. A popup window will appear. Use the arrow keys or numeric keypad to select your desired number.

Note: The custom Personalized Statistic and HIIT Screen layouts are permanently stored for each client. Guest Mode resets to Time. **Distance and Pace** each time you turn on the elliptical.



AUTHORITA CON 7:40 2.40 122 133 Track Screen

NDICE ATTACH 122 0:03 74 6:07 517 1.98 7.34







**Heart Rate Screen** 

**HIIT Screen** 

# Operation: Landice Achieve Control Panel

**Table 3-2 Display Features** 

FEATURE	DESCRIPTION
EFFORT	20 levels, select using <b>EFFORT +/-</b> keys
SPEED*	Displayed in MPH, Km/Hr or Revolutions per Minute, select using <b>SPEED +/–</b> keys.
TIME	Time logged on elliptical displayed as "Minutes: Seconds"
DISTANCE*	Miles logged on elliptical (kilometers when in metric)
CALORIES	Total calories burned based on user weight
CAL/HR	Rate in calories/hour based on user weight
PACE*	Time to complete 1 mile (1 kilometer when in metric)
METS	Current MET level, based on user weight / effort level/ speed. One MET is defined as the energy consumed at rest by the average adult.
LAP (PROGRESS)	A 1/4 mile (400 meter in metric) lap counter.
LAP (COUNTER)	Number of laps completed.
PULSE	Displays current heart rate.
TIME IN ZONE	Time spent in target zone. The zone is $\pm$ 8 beats from target heart rate.
IN ZONE	User's heart rate is within 8 beats of the target heart rate.
OUT OF ZONE	User's heart rate is outside zone (more than 8 beats above or below target heart rate).
ABOVE MAX	User's heart rate is above the maximum desirable heart rate.
MAX	Maximum allowable heart rate to remain in zone
TARGET HR	Target heart rate (user-defined in Heart Rate Status screen)

Table 3-2 Display Features (Continued)

FEATURE	DESCRIPTION
MIN	Minimum allowable heart rate to remain in zone
BELOW MIN	User is below minimum allowable heart rate in zone
TIME	The total time of the user's workout

<sup>\*</sup> Speed and distance are calculated using an advanced metabolic running equivalent algorithm. Your pedal speed and effort level will yield a "running" speed with the equivalent energy consuming intensity.

# 3.3. Using the Landice Achieve Elliptical

# Note: Client Profiles are available on residential ellipticals only.

The elliptical can be used immediately as the Guest user or as a default Client. The elliptical's CLIENT LOGIN feature allows 4 different users to separately log cumulative statistics from workout to workout. On residential models, client statistics (total miles, hours, calories, weight, laps, and average HR, Mets, pace, lap time, miles per hour and calories per hour) are stored.

Personalized Statistic and HIIT screens are permanently stored for each client. If you are logged in as a Guest, screens reset to default values.

- 1. Make sure you have read and understand this owner's manual before beginning.
- 2. Plug the elliptical power cord into its outlet.
- 3. Press **START**. The power-up screen is displayed.
- The CLIENT LOGIN screen is displayed. Client login is only available on residential models.
- 5. Use the designated button below the arrows to select a Client. If a Client is not selected the user will then be registered as a GUEST.



# **Operation: Landice Achieve Control Panel**

- 6. **To enter client weight or reset totals:** From Client Statistics screen, enter weight by using the numeric keypad or select the **Reset Client Statistics** button to zero out your information.
- 7. Enter your weight using the numeric keypad or arrows. Press **ENTER** or wait 3 seconds to advance to the first of the motivational screens.
- 8. The elliptical is now ready to use. You can vary the speed readout or effort, if desired, by using the SPEED (+/–) and effort (+/–) keys or EXPRESS 1 and EXPRESS 2 keys.

# 3.4. Using the Built-in Programs

# 3.4.1. Description

The Built-in Programs differ in effort. Each lets you select a maximum effort and time (10 to 99 minutes). (Intervals Program requires a minimum speed and effort and the HIIT programs have a fixed time.) The elliptical will not go above the maximum number unless manually overridden. Each program has 20 segments of equal time, beginning with 3 warm-up segments and ending with 2 cool-down segments. For example, a 40-minute program contains 20 2-minute segments.

**Table 3-3 Landice Achieve Built-In Programs** 

Screen	Program Description
PROGRAM 1 FAT BURN	<b>FAT BURN:</b> This program features two peaks along with gradual changes in effort. The overall goal is to raise heart rate, maintain the raised heart rate for most of the workout, then gradually bring heart rate down during the last 3 cool down segments.
PROGRAM 2 INTERMEDIATE	INTERMEDIATE: The overall goal of this program is to vary your heart rate by increasing and lowering the effort several times, providing you with a challenging cardiovascular workout.

**Table 3-3 Landice Achieve Built-In Programs (Continued)** 

Screen	Program Description
PROGRAM 3 ADVANCED	ADVANCED: The overall goal of this program is to raise your heart rate with high effort levels for an advanced cardiovascular workout.
PROGRAM 4 INTERVALS	INTERVALS: The overall goal is to vary your workout load, taking you from peak level to recovery 8 times throughout the workout.
PROGRAM 5 ENDURO	<b>ENDURO:</b> This program features a maximum effort. The overall goal is to increase intensity toward a peak without recovery until the cooldown.
PROGRAM 6 SUMMIT	<b>SUMMIT:</b> This program allows the user to input their maximum effort. The goal is to gradually work your way up to maximum effort with a steady decline.
PROGRAM 7 HILLS	<b>HILLS:</b> This program features a maximum effort with four series of hills. The goal is to increase your cardiovascular while using effort.
PROGRAM 8 CHALLENGER	CHALLENGER: This program is designed to increase your cardiovascular by reaching maximum effort several times throughout the program.  Maximum effort is set by the user during program set-up.
HIIT 20 MINUTE PROGRAM	HIIT20 and HIIT30: These programs feature 8 sprint phases alternated with 7 recovery segments. Please note the maximum effort for the sprint phases will differ between the two
HIIT 30 MINUTE PROGRAM	programs due to the length of the sprint segment. The overall goal of these programs is to provide a combination of very high-intensity bursts of cardio exercise followed by longer periods of recovery.

## 3.4.2. Running a Built-In Program

- 1. Start a workout as outlined in "Using the Landice Achieve Elliptical" on page 35.
- 2. Press **PROGRAMS** to display the Programs selection screen.
- 3. Select a built-in program by using the arrow buttons to scroll through the list, then press **ENTER**. You are prompted to enter the following program parameters:
  - Maximum Effort: This scales the effort curve to the maximum effort entered.
  - **Program Time:** Sets the total length of time you want the program to run. HIIT Programs have a fixed time.
  - Minimum Effort: INTERVALS and HIIT programs only.
- 4. Enter the Maximum Effort using the numeric keypad or the arrows to select a value, then press **ENTER** or wait 3 seconds.
- Enter Program Time using the numeric keypad or the arrow keys, then press ENTER or wait 3 seconds. The time should be at least 10 minutes and not more than 99 minutes.
- 6. Press **START** to begin your workout. The Program Progress Detail screen displays your current segment effort and remaining time.
- 7. To view other segments, select the "View Other Segments" button. Use the "look back and/or look forward" keys to move left or right. To exit, press **DONE**.
- 8. Press the buttons below the arrow keys at any time to view any of the other motivational screens during your program, including the Program Profile screen to see a program overview. When viewing a motivational screen other than the Program Progress Detail screen during a segment change, the display temporarily shows the Program Progress Detail screen then returns to the original screen. During a segment change, the effort will flash if there is a change in either.

## 3.5. Landice Achieve User Programs

Landice Achieve ellipticals can store up to 6 individual, modifiable user-defined program profiles.

A user-defined program looks and runs exactly like a built-in program, but it can be customized to suit the user. Unlike the built-in programs, user-defined programs allow editing of individual segments as well as the number of segments.

- 1. Press the button below PROGRAMS to display the Programs selection screen.
- Scroll through the program options by pressing PROGRAMS or use the arrow keys. When USER PROGRAM PREVIEW is shown, press ENTER.
- 3. Press **ENTER** or wait 3 seconds. The screen displays PRESS START TO BEGIN OR EDIT TO SET UP.
- 4. Press **EDIT**. EDIT MODE requires a time for segment 1 (area in bold).



Note: Press SWITCH FOCUS to toggle between effort and time values for the current segment. To change segments, press NEXT SEGMENT or PREVIOUS SEGMENT. You can change segments in either the forward or reverse direction.

- 5. Use the numeric keypad to change the value and press **SWITCH FOCUS**. Continue to another segment by pressing the next or previous segment keys.
- If you want a program to have less than 20 segments, create the last segment with 0 in the time field. The time reads END. The program ends when it reaches this segment.
- 7. When you finish editing your User-Defined Program, you can begin your program by pressing **START** or **DONE**.

Note: If you attempt to advance the cursor past the 20th segment, you are prompted with PRESS START TO BEGIN OR EDIT TO SET UP.

#### 3.5.1. Learn Mode

When you run a User-Defined Program and the effort is adjusted, the elliptical saves the last change to the current segment.

Note: Learn Mode allows you to adjust existing segments in your user program, but you cannot add segments to it in Learn Mode.

- 1. Start a workout, then press **PROGRAMS** to display the Programs selection screen.
- Scroll through the program options by pressing PROGRAMS or use the arrow keys. When the USER PROGRAM PREVIEW you desire is shown, press ENTER.
- 3. Press **START** to begin your program. When you begin, the Program Progress Detail screen is displayed. The effort values of your current segment are displayed in the center. To change the effort of your current segment, press the **EFFORT** (+/-) keys. The modified segment is stored with these new settings for the next time you run this program.

## 3.6. Specific Goal Programs

The Landice Achieve Elliptical provides Specific Goal programs. Whether you want to go for a 3-mile run, burn 1,000 calories, or simply exercise for 15 minutes, the Goal Progress screen accurately assesses your progress with a variety of statistics. During these programs you retain full manual control.

- 1. Start a workout as outlined in "Using the Landice Achieve Elliptical" on page 35.
- 2. Press the arrow button under Programs to display the Programs selection screen and select the goal program that you want to run:
  - For TIME GOAL PROGRAM, set a Program Time Goal using the numeric keypad or the arrow keys. Enter a time from 10 to 99 minutes, then press ENTER or wait 3 seconds.



DISTANCE GOAL PROGRAM

- For DISTANCE GOAL PROGRAM, set a Program Distance Goal using the numeric keypad or arrow keys. Enter a distance from
  - keys. Enter a distance from 0.1 to 99.9 miles (km in metric), then press **ENTER** or wait 3 seconds.
- For CALORIE GOAL PROGRAM, set a Program Calorie Goal using the numeric keypad or arrow keys. Enter a calorie goal



- from 10 to 9,999 calories, then press **ENTER** or wait 3 seconds.
- Press START to begin.
   The Goal Progress screen shows your Specific Goal (Time, Distance or Calorie), counting down (noted by a negative sign).
- 4. Press the arrows at any time to view any of the other screens during your program.

## 3.7. Heart Rate Control Programs

Landice Achieve ellipticals offer Heart Rate Control (HRC) programs that display your heart rate and automatically vary elliptical effort. HRC training allows you to maximize your workout performance while minimizing your workout time.

You must use the Pulse Grips or the Wireless Chest Strap (residential models only) to detect your heart rate during the HRC programs.

There are 2 different 20-segment HRC programs:

- HRC varies elliptical effort to keep your heart rate near the target heart rate for the entire workout.
- Interval HRC targets different heart rates. It alternates between the target and 80% of the target.

**Table 3-4 Heart Rate Control Programs** 

Sogmont	Stago	% of Target Heart Rate			
Segment	Stage	HRC	Interval HRC		
1	Warm Up	70	70		
2	Warm Up	80	80		
3	Warm Up	90	90		
4-18	Training	100	Alternating 80 & 100		
19	Cool Down	90	90		
20	Cool Down	80	80		

## 3.7.1. Built-in HRC Programs

- If using a Landice Achieve elliptical, press the button under **HEART RATE PROGRAMS.** Press ENTER while the HR Control program is displayed.
- 2. Use the numeric keypad or arrow keys to select your maximum effort. Press **ENTER** or wait 3 seconds

**ENTER MAXIMUM EFFORT** Use arrow keys below or numeric keypad

- 3. Use the numeric keypad or arrow keys to enter your target pulse. The elliptical will vary the effort to help you reach this heart rate. Press **ENTER** or wait 3 seconds.
- 4. The display prompts you to set a Program Time using the numeric keypad or center arrow. For HRC. enter a time between 20-99 minutes. This will scale the 20 segments of the program equally throughout your selected time. Press ENTER or wait 3 seconds.

**ENTER TARGET PULSE** 125 Use arrow keys below or numeric keypad



5. Press **START** to begin.

## 3.7.2. User-Defined Heart Rate Programs

The User-Defined Heart Rate Monitoring (HRC) programs are designed to allow you to set the target heart rate for up to 20 program segments.

To customize a User-Defined HRC Program during your workout, adjust your Target Heart Rate in the Heart Rate Status screen by selecting **Change TRG HRT** button. Any Target Heart Rate changes you make during your workout will be saved in that User-Defined HRC Program.

If you want to edit your User-Defined HRC Program before your workout, follow these steps:

- To select a user HRC program to edit, press the button under HEART RATE PROGRAMS. To scroll through the programs, either continue pressing HEART RATE PROGRAMS or use the arrow keys. Select a User-Defined HEART RATE Program to edit by pressing ENTER.
- Select your maximum effort using the numeric keypad or arrow keys and press ENTER, or wait 3 seconds.



- The display prompts PRESS START TO BEGIN OR EDIT TO SET UP. Press START to run the program or press EDIT to enter editing mode and make changes if desired.
- To change segments, press PREVIOUS or NEXT SEGMENT buttons. You can change segments in either the forward or reverse direction.
- 5. The first display in EDIT MODE requires you to change the time for segment 1 (area in bold). Use the keypad to change the segment time length and press SWITCH FOCUS to change the target heart rate.



 If you want a program to have fewer than 20 segments, create the last segment with 0 in the time field and press **DONE**. The time reads END. The program ends when it reaches this segment.



- 7. Use the **SWITCH FOCUS** button to toggle between Target Heart Rate and Time values within a segment. Continue to program subsequent segments by using the Previous and Next Segment buttons to move from segment to segment.
- 8. When you finish editing your User-Defined HRC Program, press **DONE** to save the program or **START** to begin.
- If you attempt to advance the cursor past the 20th segment, you are prompted with PRESS START TO BEGIN OR EDIT TO SET UP.

Note: To adjust the program's target heart rate during your workout, from the Heart Rate Status screen, select the CHANGE TRG HRT button.

Note: See page 69 for Instructions on the Fitness Tests.

0	peration:	Landice A	Achieve	<b>Control Panel</b>	

# 4. Fitness Testing

## 4.1. Introduction

The Landice Achieve Elliptical has built-in tests that measure fitness level based on your age, gender, and performance. Two different fitness test protocols are available.

A person's fitness level can be measured by the amount of oxygen their body can consume while exercising at maximum capacity. The maximum amount of oxygen (in milliliters) an individual can use in one minute per kilogram of body weight is referred to as  $VO_2$  Max.

When you perform one of the fitness tests described in this section, the elliptical calculates approximate  $VO_2$  Max and provides a fitness evaluation.

Note: Scores may vary due to line voltages, component tolerances, and individual capabilities. For a more accurate VO<sub>2</sub> Max calculation, take the average of the Balke and Firefighter Fitness Test scores.

## 4.2. Army 2 Mile Fitness Test

This is a hands-free, complete as fast as you can fitness assessment run. Fitness Protocols come equipped with Automatic Transmission software. As you pedal faster to increase your speed, the elliptical automatically increases the effort level, yielding a faster "running" (MPH) speed. Vice versa, when you slow down, the elliptical automatically decreases effort level, yielding a slower "running" (MPH) speed. Upon completion you will receive an assessment score (0-100).

To run the test:

- Press the button under PROGRAMS to view the programs selection screen. To scroll through the programs, either continue to press PROGRAMS or use the arrow keys.
- 2. Select the Army 2 Mile Fitness Test by pressing **ENTER**.
- 3. Enter your age (10 to 99) using the keypad or the arrow keys, then press **ENTER** or wait 3 seconds.

## Fitness Testing

- 4. Enter your gender using the center arrow to toggle to MALE or FEMALE. Press **ENTER** or wait 3 seconds.
- 5. Press **START** to begin.
- Complete the 2-mile run as quickly as possible by increasing your pedaling speed. To stop the test at any time, press PAUSE, STOP, MANUAL, HEART RATE PROGRAMS or PROGRAMS.

When you begin, the Goal Progress screen shows your Specific Goal (Army 2 Mile Run), Time Remaining, Projected Score and other statistics. The Distance counts down (noted by negative sign).

When the test is complete, a US Army assessment rating between 0-100 is displayed, based on your time, age and gender.

Table 4-1 U.S. Army Fitness Assessment Ratings

Score	Rating
85-100	Excellent
70-84	Good
32-69	Average
17-31	Fair
0-16	Low

## 4.3. Balke Fitness Test

Note: You must hold onto the pulse grips or wear the wireless chest strap for the entire test. If the elliptical loses the heart rate signal for more than 30 seconds the test is terminated.

This is a heart rate controlled, walking pace, variable effort fitness test. The test increases in difficulty to raise your heart rate. Upon reaching your Target Heart Rate, the test ends and the elliptical calculates your fitness assessment. Parameters

cannot be modified. Your age determines the test's target heart rate and the scaling of the fitness assessment.

#### Test Parameters:

- Maximum Speed: 55 rpm
- Maximum Heart Rate: 80% of Maximum Heart Rate (See Heart Rate Monitoring sections).

#### To run the test:

- Press HEART RATE PROGRAMS to view the HRC programs selection screen. To scroll through the programs, either continue to press HEART RATE PROGRAMS or use the arrow keys. Select the Balke Fitness Test by pressing ENTER.
- 2. Use the keypad or arrow to enter your age (10 to 99), then press **ENTER** or wait 3 seconds.
- 3. Enter your gender using the center arrow to toggle to MALE or FEMALE. Press **ENTER** or wait 3 seconds.

Note: The calculated target heart rate displayed before you start the test is derived from statistical heart rate capacity averages. (See "Heart Rate Monitoring" on page 13.) If you are uncomfortable with the target heart rate displayed or feel discomfort during the fitness test, stop the test.

4. Press **START** to begin the test.

This automated test increases in difficulty from segment to segment until you reach the target heart rate. When you reach the target heart rate a 30-second countdown follows and ends the test. Any key presses during the test (other than ENTER) will end the test.

When you begin, the Heart Rate Status screen shows your Target Pulse, Time, Heart Rate Status and Time in Zone.

Upon completion the elliptical displays your  $VO_2$  Max score and fitness assessment based on your performance. Use the tables below to interpret your score based on your age and gender.

Table 4-2 Men: VO<sub>2</sub> Max

Age							Rating	
<20	20 20-29 30-39 40-49 50-59 60-69 >69							
>65	>62	>58	>54	>52	>50	>48	Superior	
57-65	54-62	50-58	46-54	44-52	42-50	40-48	Excellent	
47-56	44-53	40-49	37-45	35-43	32-41	30-39	Good	
37-46	35-43	32-39	28-36	26-34	24-31	22-29	Average	
<37	<35	<32	<28	<26	<24	<22	Low	

Table 4-3 Women: VO<sub>2</sub> Max

Age						Rating		
<20	<20 20-29 30-39 40-49 50-59 60-69 >69							
>62	>58	>54	>51	>47	>44	>42	Superior	
54-62	50-58	46-54	43-51	39-47	36-44	34-42	Excellent	
42-53	39-38	35-45	32-42	29-38	25-35	23-33	Good	
34-41	32-38	29-34	25-31	22-28	19-24	15-22	Average	
<34	<352	<29	<25	<22	<19	<15	Low	

## 4.4. Firefighter (Gerkin) Fitness Test

Note: You must wear the wireless chest strap or hold onto the grips during the entire test. If the elliptical loses the heart rate signal for more than 30 seconds the test is terminated.

This test requires the Wireless Chest Strap. It is a heart rate controlled test with variable effort. The test increases in difficulty to raise your heart rate. When you reach your target heart rate, the test ends and the elliptical calculates a fitness level based on your performance. Your age determines the

test's target heart rate and the scaling of the fitness assessment.

#### **Test Parameters**

- Maximum Speed: 60 rpm
- Maximum Heart Rate: 85% of Maximum Heart Rate (See Heart Rate Monitoring sections).

#### To run the test:

- Press **HEART RATE PROGRAMS** to view the HRC programs screen.
- 2. Scroll through the programs using the arrow keys or by continuing to press **HEART RATE PROGRAMS**.
- 3. Press ENTER to select the Firefighter Fitness Test.
- 4. When prompted, use the keypad or arrow keys to enter your age (10 to 99), then press **ENTER** or wait 3 seconds.
- Enter your gender by using the arrow keys to toggle between MALE and FEMALE. Press ENTER or wait 3 seconds.

Note: The calculated target heart rate is displayed before you start the test. This heart rate is derived from statistical heart rate capacity averages (see Heart Rate Monitoring Section) If you are uncomfortable with the target heart rate displayed or feel discomfort during the fitness test, stop the test.

6. Press START to begin.

Note: This test increases in difficulty until you reach the target heart rate, then a 30-second countdown follows and ends the test.

To stop the test at any time, press any key other than ENTER.

Upon completion the elliptical displays a VO<sub>2</sub> Max score and fitness assessment based on your performance compared to the general population.

# Fitness Testing

**Table 4-4 Firefighter Fitness Test Score** 

VO2 Max	Rating
>59	Superior
50-58	Excellent
40-49	Good
32-39	Average
<32	Low

## 5. Maintenance and Troubleshooting

## 5.1. Cleaning

It is recommended to clean the console and screen after each workout.

**General:** Vacuum around and under the elliptical at least once a month. Wipe any sweat from the elliptical after each workout.

Console and Display Screen: Wipe exposed console surfaces with a microfiber cloth, dampened with a mixture of 3 parts water to 1 part Simple Green® cleaner. www.simplegreen.com

## **Touch Screen Cleaning**

**ACAUTION** 

Do not use abrasive cloths, such as rags or paper towels. They can spread lint and/or damage the screen.

**▲**CAUTION

Avoid cleaning products that may cause discoloration, such as rubbing alcohol, bleach or ammonia-based cleaners.

- 1. Turn your fitness equipment off.
- IMPORTANT: Avoid getting any cleaning liquids in the console or other parts. Spray/dampen a microfiber cloth with the cleaner and be sure to wring out any excess liquid prior to cleaning the screen.
- 3. Wipe the surface of the monitor gently in small circles, and then allow it to dry.

**Wireless Chest Strap:** The transmitter activates when the belt is moist. To conserve battery life, wipe the electrodes dry after each use. Clean monthly with mild soap and water and wipe dry.

**ACAUTION** 

To avoid damaging the electrodes, do not use abrasives to clean the chest strap. Do not bend or stretch the electrode strips, especially when storing the chest strap.

## Maintenance and Troubleshooting

## **▲**WARNING

Lethal voltages and moving parts capable of causing serious injury are exposed when the motor cover is removed. Under no circumstances should the motor cover be removed except by a Landice factory-authorized technician.

## **AAVERTISSEMENT**

Des tensions létales et des pièces mobiles susceptibles de causer des blessures graves sont exposées lorsque le capot du moteur est enlevé. En aucun cas, le capot du moteur ne doit être enlevé, sauf par un technicien habilité par usine de Landice.

## 5.2. Self-Diagnostics

The Elliptical is equipped with onboard self-diagnostics. If the elliptical experiences any errors during operation, it will display an error message. You can run self-diagnostics to get further



information on the error by pressing **ENTER**.

To manually enter self-diagnostics mode, with the elliptical off, press the **CENTER ARROWS** and **START** at the same time.

When you choose the option to enter diagnostics you will be prompted with a warning screen. After reading it, straddle the elliptical by stepping on the traction strips on the sides of the running surface and press **ENTER**.

The elliptical will systematically test all of the individual components of the elliptical. During some of the tests, you will be prompted with simple "Yes or No" questions to assist with the diagnosis. Answer the questions using the



LEFT ARROW for NO and the RIGHT ARROW for YES when prompted.

When Self-Diagnostics has completed all tests, the screen displays one of two messages along the bottom: NO ERRORS DETECTED, or ERROR DETECTED, CONTACT SERVICE PROVIDER. Contact your Dealer or go to www.landice.com and click on Service Locator to find a provider in your area.

### 5.3. Hidden Menus

The Hidden Menus provide access to control the settings listed below. To view the Hidden Menus, press **START** then hold **3** and **9** simultaneously during the boot up screen, then release all.

Use the + or - keys to move up and down the list. Then press the **START** button to select setting. Press **STOP** to save and exit the Hidden Menus section.

- Error Logs: Records the number of times a specific error code occurs.
- NV Init Boot: Manufacturer's use ONLY
- **Diagnostics**: Provide technicians the ability to test buttons and calibrate. Press and hold STOP to exit diagnostic mode.
- Reprogram Firmware: Manufacturer's use ONLY
- Self-Diagnostics: Runs an automatic test of specific components to assist service technicians with diagnostics.
- Toggle Lockout Mode: Enables or disables use of a code to operate the elliptical. When Lockout Mode is enabled it provides the ability to set a personalized four-digit code to use the elliptical. If the code is forgotten, 9010 will grant access.
- **Toggle Units:** Allows the measurement of units to switch between English and Metric.
- **Toggle Beeper:** Enables or disables the ability to control the beeping sound.
- **Toggle Client Mode:** Provides the ability to show four Clients on the home screen. This feature is for residential use only.



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