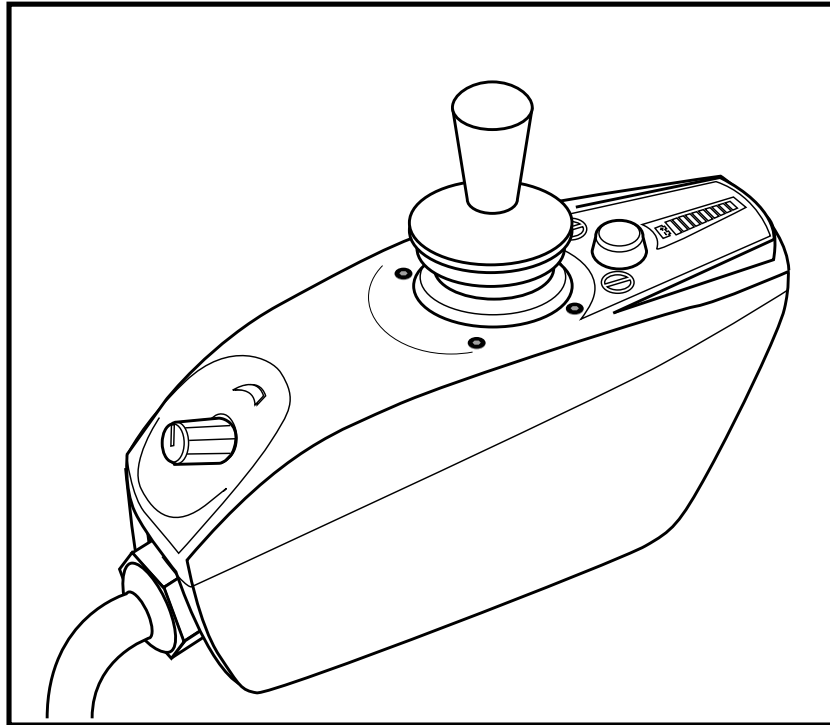


BASIC OPERATION INSTRUCTIONS

PilotTM Controller

ACN# 088 609 661



Pride
Mobility Products Corp.

INFORMATION LABELING

The symbols below are used throughout this owner's manual and on the power chair to identify warnings and important information. It is very important for you to read them and understand them completely.



WARNING! Indicates a potentially hazardous condition/situation. Failure to follow designated procedures can cause either personal injury, component damage, or malfunction. On the product, this icon is represented as a black symbol on yellow triangle with black border.



MANDATORY! These actions should be performed as specified. Failure to perform mandatory actions can cause personal injury and/or equipment damage. On the product, this icon is represented as a white symbol on a blue dot with a white border.



PROHIBITED! These actions are prohibited. These actions should not be performed at any time or in any circumstances. Performing a prohibited action can cause injury to personnel and/or damage to equipment. On the product, this icon is represented as a black symbol with a red circle and a red slash.



Read and follow the information in the owner's manual.



Avoid exposure to rain, snow, ice, salt, or standing water whenever possible. Maintain and store in a clean and dry condition.



Disposal and recycling - Contact your authorized Pride Provider for information on proper disposal and recycling of your Pride product and its packaging.

Copyright © 2006
Pride Mobility Products Corporation
INFMANU1764/Rev C/November 06

TABLE OF CONTENTS

INTRODUCTION	4
PILOT CONTROLLER	6
PRECAUTIONARY GUIDELINES	6
OPERATING THE PILOT CONTROLLER	10
3-PIN OFF-BOARD CHARGER/PROGRAMMING SOCKET .	12
9-PIN CONTROLLER CONNECTOR	12
3-PIN ONBOARD CHARGER (OBC) CONNECTOR	12
SLEEP MODE	13
THERMAL ROLLBACK	13
FAULT CODES	13
CARE AND MAINTENANCE	14
WARRANTY	14

INTRODUCTION

WELCOME to Pride Mobility Products Corporation (Pride). The product you have purchased combines state-of-the-art components with **safety**, comfort, and styling in mind. We are confident that the design features will provide you with the conveniences you expect during your daily activities. Understanding how to **safely** operate and care for this product should bring you years of trouble free operations and service.

Read and follow all instructions, warnings, and notes in this manual and all other accompanying literature before attempting to operate this product for the first time. In addition, your **safety** depends upon you, as well as your provider, caretaker, or healthcare professional in using good judgement.

This manual is to be used in addition to the power base owner's manual that came with your power chair. If there is any information in this manual which you do not understand, or if you require additional assistance for setup or operation, please contact your authorized Pride Provider. **Failure to follow the instructions, warnings, and notes in this manual and those located on your Pride product can result in personal injury and/or product damage and will void Pride's product warranty.**

PURCHASER'S AGREEMENT

By accepting delivery of this product, you promise that you will not change, alter, or modify this product or remove or render inoperable or unsafe any guards, shields, or other safety features of this product; fail, refuse, or neglect to install any retrofit kits from time to time provided by Pride to enhance or preserve the safe use of this product.

INFORMATION EXCHANGE

We want to hear your questions, comments, and suggestions about this manual. We would also like to hear about the safety and reliability of your new Pride product, and about the service you received from your authorized Pride Provider. Please notify us of any change of address, so we can keep you apprised of important information about safety, new products, and new options that can increase your ability to use and enjoy your Pride product.

NOTE: If you ever lose or misplace your product registration card or your copy of this manual, contact us and we will be glad to send you a new one immediately.

My authorized Pride Provider Is:

Name: _____

Address: _____

Phone Number: _____

Purchase Date: _____

PILOT CONTROLLER

The Pilot Controller is a fully-programmable electronic controller system that allows you to operate your power chair. It is designed to allow the user to have complete control over chair movement and speed.

The controller has been pre-programmed to meet a typical user's needs. The program is set using either a personal computer with software provided by the controller manufacturer or with a hand-held programmer, also provided by the controller manufacturer.



WARNING! The controller program can affect speed, acceleration, deceleration, dynamic stability, and braking. If it is programmed incorrectly or outside of the safe limits as determined by your healthcare professional, it can create a dangerous situation. Only the power chair manufacturer, an authorized representative of the manufacturer, or a trained service technician should program the controller.

PRECAUTIONARY GUIDELINES

Before operating the Pilot Controller, please read the following. These guidelines are provided for your benefit and will aid you in the safe operation of the controller system.

- Turn off the power to the controller when transferring to or from your power chair.
- Follow all of the procedures and heed the warnings as explained in your power chair owner's manual.

Failure to heed the above warnings can result in personal injury and/or equipment damage.

Electromagnetic and Radio Frequency Interference (EMI/RFI)



WARNING! Laboratory tests have shown that electromagnetic and radio frequency waves can have an adverse affect on the performance of electrically-powered mobility vehicles.

Electromagnetic and Radio Frequency Interference can come from sources such as cellular phones, mobile two-way radios (such as walkie-talkies), radio stations, TV stations, amateur radio (HAM) transmitters, wireless computer links, microwave signals, paging transmitters, and medium-range mobile transceivers used by emergency vehicles. In some cases, these waves can cause unintended movement or damage to the control system. Every electrically-powered mobility vehicle has an immunity (or resistance) to EMI. The higher the immunity level, the greater the protection against EMI. This product has been tested and has passed at an immunity level of 20 V/m.

WARNING! Be aware that cell phones, two-way radios, laptops, and other types of radio transmitters may cause unintended movement of your electrically-powered mobility vehicle due to EMI. Exercise caution when using any of these items while operating your mobility vehicle and avoid coming into close proximity of radio and TV stations.



WARNING! The addition of accessories or components to the electrically-powered mobility vehicle can increase the susceptibility of the vehicle to EMI. Do not modify your power chair in any way not authorized by Pride.

WARNING! The electrically-powered mobility vehicle itself can disturb the performance of other electrical devices located nearby, such as alarm systems.

NOTE: For further information on EMI/RFI, go to the Resource Center on www.pridemobility.com. If unintended motion or brake release occurs, turn your controller off as soon as it is safe to do so. Contact Pride or your authorized Pride Provider to report the incident.

Pilot Controller Features

Figure 1 provides information on the Pilot components and connections. Use this diagram to familiarize yourself with the function and location of each component before using the Pilot Controller.

The following functions are available with the Pilot Controller:

- Joystick Control
The joystick is used to control the direction and speed of the power chair.

- Speed Adjustment
The user can increase or decrease the maximum speed of the power chair.

- Sleep Mode
This feature is designed to preserve battery charge, and can be disabled through programming.

- Thermal Rollback
This is a safety feature designed to prevent the power chair from overheating and causing damage to the motors or controller.

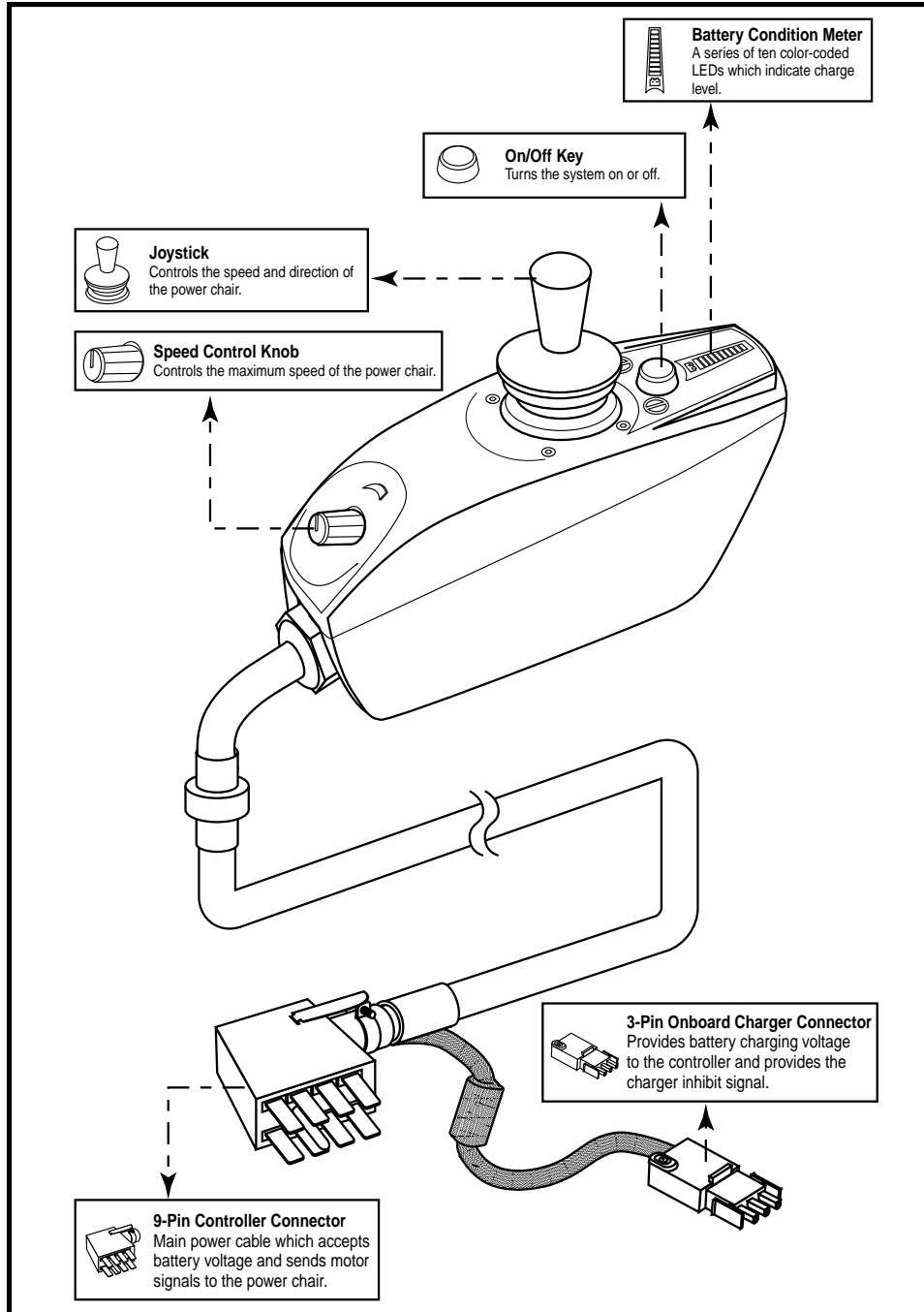


Figure 1. Pilot Components and Connections

OPERATING THE PILOT CONTROLLER

The Pilot Controller is used to operate your power chair and all of its components.

The Pilot controller consists of (see figure 2):

1. joystick
2. display pad
3. speed control knob
4. 3-pin off-board charger/programming socket
5. 9-pin controller connector
6. 3-pin onboard charger (OBC) connector

Joystick Control

The joystick controls the direction and speed of your power chair. When you move the joystick from the neutral (center) position, the electromagnetic brakes release and allow your power chair to move. The farther you push the joystick from its neutral position, the faster your power chair moves. When you release the joystick and allow it to return to the neutral position, you engage the electromagnetic brakes. This causes your power chair to decelerate and come to a complete stop.

Display Pad

The display pad is located directly in front of the joystick. See figures 1 and 2.

On/Off Key

This is a green button located in front of the joystick. It turns the system on and off.



WARNING! Unless faced with an emergency situation, do not use the on/off key to stop the chair. This will cause the power chair to stop abruptly.

WARNING! Always turn the power off when you are stationary to prevent unexpected movement.

Battery Condition Meter

The battery condition meter is located in front of the joystick. This is a 10-segment illuminated display that indicates that the Pilot is powered on and also gives the battery status, the Pilot status, and the electrical system status.

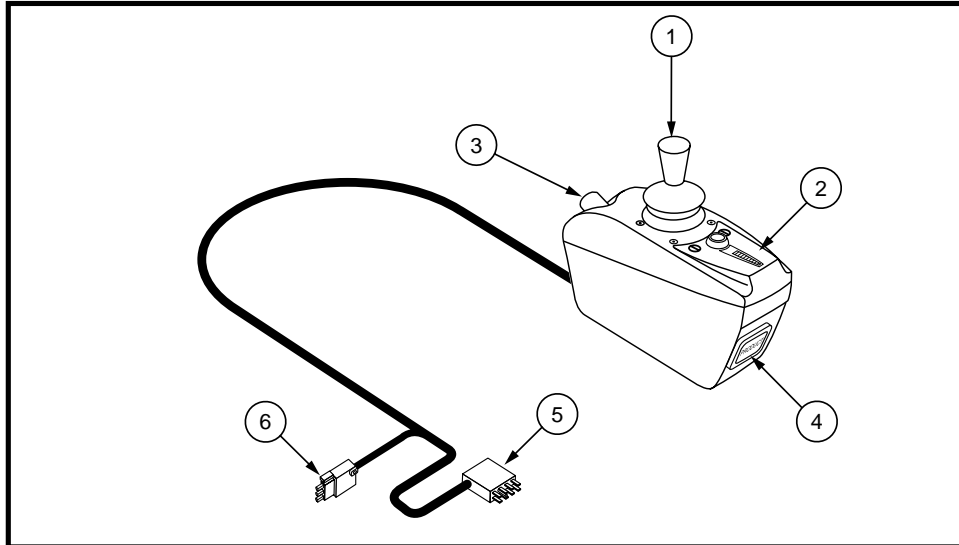


Figure 2. Pilot Controller

- **Red, yellow, and green lights lit:** Batteries charged; Pilot and electrical system OK.
- **Red and yellow lights lit:** Charge batteries if possible; Pilot and electrical system OK.
- **Red lights only lit or slow flash:** Charge batteries as soon as possible; Pilot and electrical system OK.
- **Rapid flash of lights:** The Pilot has detected a problem in the electrical system and power chair drive operation is inhibited. Refer to “Fault Codes.”
- **Ripple up and down of lights:** The joystick was not in the neutral position when the controller was turned on. If you get “ripple up and down of lights,” turn off the controller, allow the joystick to return to the neutral position, then turn on the controller.

NOTE: If you still get “ripple up and down of lights,” contact your authorized Pride Provider.

NOTE: When the batteries approach a discharged state, one or two red lights will begin to slowly flash, reminding you the batteries need to be charged immediately!

Speed Control Knob

Sets the maximum speed of the power chair: clockwise to increase, counterclockwise to decrease.

NOTE: *We recommend that the first few times you operate your power chair, you turn the speed control knob to the slowest setting (fully counterclockwise) until you become familiar with your new power chair.*

3-PIN OFF-BOARD CHARGER/ PROGRAMMING SOCKET

You may use an off-board charger to charge your power chair batteries through the 3-pin socket located on the front of the Pilot. See figure 3. If you use an off-board charger, the charger current should not exceed 8 amps. Contact your authorized Pride Provider for more information.

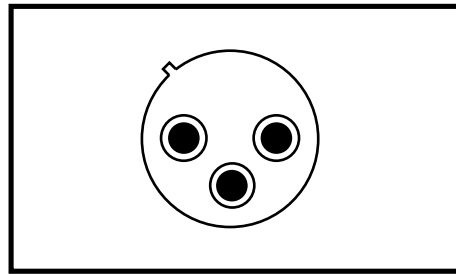


Figure 3. 3-pin Off-Board Charger Socket



WARNING! Only chargers with Neutrik NC3MX plugs should be connected to the off-board charger/programming socket. See your authorized Pride Provider for more information.

NOTE: *Changes to the programming can only be made by an authorized Pride Provider.*

9-PIN CONTROLLER CONNECTOR

This connects the Pilot to the power chair's batteries, motors, and motor brakes.

3-PIN ONBOARD CHARGER (OBC) CONNECTOR

This connects the Pilot to the onboard battery charger. This connection provides an inhibit that disables the Pilot when the battery charger is on. The 3-pin OBC connector is coded with colored dots. The dots are positioned so that you align the flat side of the male connector with the flat side of the female connector before making the connection. Refer to your power chair owner's manual for exact location.



WARNING! Failure to properly align the connectors can result in damage to the Pilot, the charger harness, and the connectors.

SLEEP MODE

Your Pilot controller has a sleep mode feature. Sleep mode is a built-in circuit that automatically shuts off the main power if the joystick is powered on and not moved in any direction for a period of time predetermined by the controller program. The battery condition meter lights on the keypad indicate sleep mode by blinking once every five seconds. To restore power and continue, push the on/off key twice.

THERMAL ROLLBACK

The Pilot controller is equipped with a thermal rollback circuit. This circuit monitors the temperature of the controller, which roughly translates to motor temperature. In the event that the Pilot controller becomes excessively hot, motor current (amperage) is reduced. For every degree above normal temperature, the motor current limit is reduced proportionally. This reduces “power,” which could also reduce power chair speed, allowing the electrical components and motors to cool down. When the temperature returns to a safe level, your power chair resumes its normal operation.



WARNING! Under strenuous driving conditions, it is possible for the bottom and side case temperature of the Pilot to exceed 105° F/40.5° C. DO NOT touch the side or bottom of the Pilot case under these circumstances.

FAULT CODES

In addition to indicating the current state of battery charge, the battery condition meter can also indicate possible problems with your power chair. The battery condition meter has ten lights. The lights provide information by the number of lights that are flashing. If any of the meter lights are flashing rapidly, the controller may be indicating a fault. For instance, if the first light is flashing rapidly, the battery voltage is nearly depleted. The following is a list of the possible faults signified by the rapidly flashing meter lights. If you receive any of these fault codes or if you experience any other problems, contact your authorized Pride Provider.

Flashing Lights	Diagnosis and Solution
1	The batteries need charging or there is a bad connection to the batteries. Check the connections to the batteries. If the connections are good, try charging the batteries.
2	The left motor has a bad connection. Check the left motor connection.
3	The left motor has a short circuit to another connection. Contact your authorized Pride Provider.
4	The right motor has a bad connection. Check right motor connection.
5	The right motor has a short circuit to another connection. Contact your authorized Pride Provider.
6	The power chair is being inhibited by the off-board battery charger. Disconnect the off-board battery charger.
7	A joystick fault is indicated. Make sure that the joystick is in the neutral (center) position before turning on the controller.
8	A controller system fault is indicated. Make sure that all connections are secure and the batteries are fully charged.
9	The parking brakes have a bad connection. Check the parking brake and motor connections. Make sure the controller connections are secure.
10	There is high battery voltage in the system. Measure the battery voltage. If it exceeds 30VDC, replace the charger.

CARE AND MAINTENANCE

Refer to your power chair owner's manual for proper cleaning and disposal instructions.

WARRANTY

For two (2) years from the date of purchase, Pride will repair or replace at our option to the original purchaser, free of charge, the controller or any of its components found upon examination by an authorized representative of Pride to be defective in material and/or workmanship.

NOTES



Pride Mobility Products Corporation

182 Susquehanna Avenue
Exeter, PA 18643-2694
USA

Pride Mobility Products Company

380 Vansickle Road Unit 350
St. Catharines, Ontario L2R 6P7
Canada

Pride Mobility Products Ltd.

Unit 106, Heyford Park Camp Road
Upper Heyford, Oxfordshire OX25 5HA

Pride Mobility Products Australia Pty. Ltd.

21 Healey Road
Dandenong, 3175
Victoria, Australia

Pride Mobility Products Italia S.r.l.

Via del Progresso - ang. Via del Lavoro
Loc. Prato della Corte
00065-Fiano Romano (RM)

Pride Mobility Products Europe B.V.

Tijnmuiden 28
1046 AL Amsterdam
The Netherlands

www.pridemobility.com www.prideservice.com www.quantumrehab.com

* I N F M A N U 1 7 6 4 *