

# Installing a Personal Viewing System (PVS)

Including Models with Personal Entertainment Player (PEP)



**PRECOR**<sup>®</sup>



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Including Models with Personal Entertainment Player (PEP)

**PRECOR®**

# Edition Information

INSTALLING A PERSONAL VIEWING SYSTEM (PVS),  
INCLUDING MODELS WITH PERSONAL ENTERTAINMENT  
PLAYER (PEP)

P/N 301068-710 rev G

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# Important Safety Instructions

## Safety Precautions

**Important:** Save these instructions for future reference.

Read all instructions in the documentation provided with your exercise equipment, including all assembly guides, user guides, and owner's manuals, before installation of this device.

**Note:** This product is intended for commercial use.

Always follow basic safety precautions when using this equipment to reduce the chance of injury, fire, or damage. Other sections in this manual provide more details of safety features. Be sure to read these sections and observe all safety notices. These precautions include the following:

- Read all instructions in this guide before installing and using the equipment and follow any labels on the equipment.
- Make sure all users see a physician for a complete physical examination before they begin any fitness program, particularly if they have high blood pressure, high cholesterol or heart disease; have a family history of any of the preceding conditions; are over the age of 45; smoke; are obese; have not exercised regularly in the past year; or are taking any medication.

French equivalent of the above notice, for Canadian markets: *Il est conseillé aux utilisateurs de subir un examen médical complet avant d'entreprendre tout programme d'exercice, en particulier s'ils souffrent d'hypertension artérielle, ou de cardiopathie ou ont un taux de cholestérol élevé, s'ils ont des antécédents familiaux des précédentes maladies, s'ils ont plus de 45 ans, s'ils fument, s'ils sont obèses, s'ils n'ont pas fait d'exercices réguliers au cours de l'année précédente ou s'ils prennent des médicaments. Si vous avez des étourdissements ou des faiblesses, arrêtez les exercices immédiatement.*

- Do not allow children, or people unfamiliar with the operation of this equipment, on or near it. Do not leave children unsupervised around the equipment.
- Make sure all users wear proper exercise clothing and shoes for their workouts and avoid loose or dangling clothing. Users should not wear shoes with heels or leather soles, and they should check the soles of their shoes to remove any dirt and embedded stones. They should also tie long hair back.
- Never leave the equipment unattended when it is plugged in. Unplug the equipment from its power source when it is not in use, before cleaning it, and before providing authorized service.

**Note:** The optional power adapter is considered a power source for self-powered equipment.

- Use the power adapter provided with the equipment. Plug the power adapter into an appropriate, grounded power outlet as marked on the equipment.
- Care should be taken when mounting or dismounting the equipment.
- For Treadmills: Do not use typing or web surfing features while walking at speeds that exceed a **slow and relaxed leisurely pace**. Always stabilize yourself by holding a stationary handle bar while using typing or web surfing features.
- For AMT and EFX: Always stabilize yourself by holding a stationary handle bar while using typing or web surfing features.
- Read, understand, and test the emergency stop procedures before use.
- Keep the power cord or optional power adapter and plug away from heated surfaces.
- Route power cables so that they are not walked on, pinched, or damaged by items placed upon or against them, including the equipment itself.
- Ensure the equipment has adequate ventilation. Do not place anything on top of or over the equipment. Do not use on a cushioned surface that could block the ventilation opening.
- Assemble and operate the equipment on a solid, level surface.



- **SPACING**—The below minimum spacing recommendations are based on a combination of the ASTM (U.S.) voluntary standards and EN (European) regulations as of October 1, 2012, for access, passage around, and emergency dismount:
  - **Treadmills**—a minimum of 0.5 m (19.7 in.) on each side of the treadmill and 2 m (78 in.) behind the machine.
  - **Cardio equipment other than treadmills**—a minimum of 0.5 m (19.7 in.) on at least one side, and 0.5 m (19.7 in.) behind or in front the machine.

**Careful consideration should be given to the requirements of the Americans with Disabilities Act (ADA), US Code 28 CFR** (see Section 305). ASTM standards are voluntary and may not reflect current industry standards. The actual area for access, passage around, and emergency dismount is the responsibility of the facility. The facility should consider the total space requirements for training on each unit, voluntary and industry standards, and any local, state, and federal regulations. Standards and regulations are subject to change at any time.

**Important:** *These spacing recommendations should be used when positioning equipment away from sources of heat, such as radiators, heat registers, and stoves. Avoid temperature extremes.*

- Keep equipment away from water and moisture. Avoid dropping anything on or spilling anything inside the equipment to prevent electric shock or damage to the electronics.
- When using the treadmill, always attach the safety clip to your clothing before beginning your workout. Failure to use the safety clip may pose a greater risk of injury in the event of a fall.
- Keep in mind that heart rate monitors are not medical devices. Various factors, including the user's movement, may affect the accuracy of the heart rate readings. The heart rate monitors are intended only as exercise aids in determining heart rate trends in general.
- Do not operate electrically powered equipment in damp or wet locations.
- Never operate this equipment if it has a damaged cord or plug, if it is not working properly, or if it has been dropped, damaged, or exposed to water. Call for service immediately if any of these conditions exist.

- Maintain the equipment to keep it in good working condition, as described in the *Maintenance* section of the owner's manual. Inspect the equipment for incorrect, worn, or loose components, and then correct, replace or tighten prior to use.
- If you plan to move the equipment, obtain help and use proper lifting techniques.
- Equipment Weight Restrictions: Do not use the treadmill if you weigh more than 500 pounds (225 kg). If you weigh more than 350 pounds (160 kg), do not run on the treadmill. For all other fitness equipment, the weight limit is 350 pounds (160 kg).
- Use the equipment only for its intended purpose as described in this manual. Do not use accessory attachments that are not recommended by Precor. Such attachments may cause injuries.
- Do not operate the equipment where aerosol (spray) products are being used or where oxygen is being administered.
- Do not use outdoors.
- Do not attempt to service the equipment yourself, except to follow the maintenance instructions in the owner's manual.
- Never drop or insert objects into any opening. Keep hands away from moving parts.
- Do not set anything on the stationary handrails, handlebars, control console, or covers. Place liquids, magazines, and books in the appropriate receptacles.
- Do not lean on or pull on the console at any time.



**CAUTION: DO NOT remove the cover, or you may risk injury due to electric shock. Read the assembly and maintenance guide before operating. There are no user-serviceable parts inside. Contact Customer Support if the equipment needs servicing. For use with single phase AC power only.**

## Hazardous Materials and Proper Disposal

The batteries within self-powered equipment contain materials that are considered hazardous to the environment. Federal law requires proper disposal of these batteries.

If you plan to dispose of your equipment, contact Precor Commercial Products Customer Support for information regarding battery removal. Refer to *Obtaining Service*.

## Product Recycling and Disposal

This equipment must be recycled or discarded according to applicable local and national regulations.

Product labels, in accordance with European Directive 2002/96/EC concerning waste electrical and electronic equipment (WEEE), determine the framework for the return and recycling of used equipment as applicable throughout the European Union. The WEEE label indicates that the product is not to be thrown away, but rather reclaimed upon end of life per this Directive.

In accordance with the European WEEE Directive, electrical and electronic equipment (EEE) is to be collected separately and to be reused, recycled, or recovered at end of life. Users of EEE with the WEEE label per Annex IV of the WEEE Directive must not dispose of end of life EEE as unsorted municipal waste, but use the collection framework available to customers for the return, recycling, and recovery of WEEE. Customer participation is important to minimize any potential effects of EEE on the environment and human health due to the potential presence of hazardous substances in EEE. For proper collection and treatment, refer to *Obtaining Service*.

## Safety Approvals for Cardiovascular Equipment

Precor equipment has been tested and found to comply with the following applicable safety standards.

Cardiovascular Type Equipment:

- CAN/CSA, IEC, EN 60335-1 (Household and similar electrical appliances - Safety)
- EN 957 (Stationary training equipment, class S/B compliant equipment)

PVS and P80 Regulatory Notice

This Precor equipment has been tested and found to comply with the following applicable safety standards.

- CAN/CSA, UL, IEC, EN 60065 (Audio, video and similar electronic apparatus - Safety)

## Radio Frequency Interference (RFI)

This Precor exercise equipment conforms to the following national standards defining acceptable limits for radio frequency interference (RFI).

Federal Communications Commission, Part 15

This equipment has been tested and found to comply with the limits for a Class A digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a commercial installation. The equipment generates, uses, and can radiate radio frequency energy and, if not installed and used in accordance with the owner's manual instructions, may cause harmful interference to radio communications.

**WARNING** Per FCC rules, changes or modifications not expressly approved by Precor could void the user's authority to operate the equipment.

## Industry Canada

This Class A digital apparatus complies with Canadian ICES-003.

*Cet appareil numérique de la classe A est conforme à la norme NMB-003 du Canada.*

**ATTENTION: Haute Tension**  
**Débranchez avant de réparer**

## European Applications

CE compliance is claimed to the following directives:

- 2004/108/EC EMC Directive
- 2006/95/EC LVD Directive
- 2002/95/EC RoHS Directive

Directive compliance has been verified to the following standards:

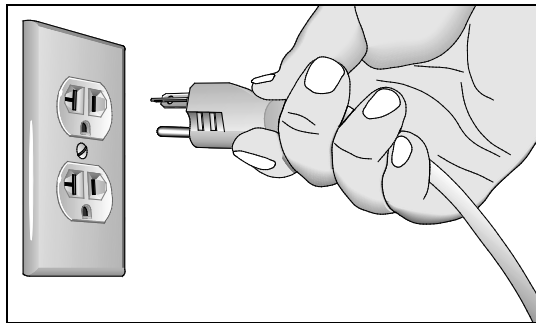
- EN 55022
- EN 55024
- EN 60335-1
- EN 60065 (P80 and PVS)

## Electrical Recommendations: 120 V and 240 V Treadmills

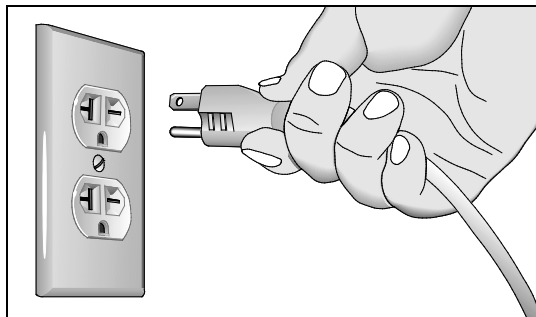
**Note:** This is a recommendation only. NEC (National Electric Code) guidelines or local region electric codes must be followed.

You should have received a power cable that meets your local electrical code requirements along with the equipment. Precor treadmills must be connected to a 20 amp individual branch circuit that can be shared only with one PVS. If you need additional help with the power connections contact your Precor authorized dealer.

**Important:** An individual branch circuit provides a hot conductor and neutral conductor to a receptacle. The conductors must not be looped, "daisy-chained", or connected to any other conductors. The circuit must be grounded according to NEC guidelines or local region electric codes.



**Figure 1: North American 120-volt, 20-amp power receptacle**



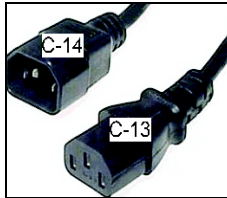
**Figure 2: North American 240-volt, 20-amp power receptacle**

## Electrical Recommendations: All Equipment Excluding Treadmills

**Note:** This is a recommendation only. NEC (National Electric Code) guidelines or local region electric codes must be followed.

For equipment fitted with a P80 console or Personal Viewing System (PVS) screen a separate power connection is required. For a 20 amp branch circuit up to 10 screens can be connected. If the branch circuit has any other devices plugged into the circuit, then the number of screens must be reduced by the wattage of the other devices.

**Note:** The typical splitter power cords that have IEC-320 C13 and C14 plugs have a recommended maximum capacity of five screens.



**Figure 3: IEC-320 C13 and C14 plugs**

## Obtaining Service

Do not attempt to service the equipment except for maintenance tasks. If any items are missing, contact your dealer. For more information regarding customer support numbers or a list of Precor authorized service centers, visit the Precor web site at <http://www.precor.com>.





# Table of Contents

<b>Important Safety Instructions .....</b>	<b>5</b>
Safety Precautions.....	5
Hazardous Materials and Proper Disposal.....	9
Product Recycling and Disposal .....	9
Safety Approvals for Cardiovascular Equipment .....	10
Radio Frequency Interference (RFI).....	10
Industry Canada.....	11
European Applications .....	11
Electrical Recommendations:	
120 V and 240 V Treadmills.....	12
Electrical Recommendations:	
All Equipment Excluding Treadmills.....	13
Obtaining Service.....	13
<b>Beginning the Assembly.....</b>	<b>17</b>
Rewiring the Equipment (Treadmill).....	18
Rewiring the Equipment (EFX).....	20
Rewiring the Equipment (Recumbent Bike) .....	22
Rewiring the Equipment (Upright Bike).....	23
Rewiring the Equipment (Climber) .....	26
Rewiring the Equipment (AMT) .....	27
<b>Beginning the Assembly.....</b>	<b>33</b>
Installation Requirements.....	33
Hardware Kit (not to scale) .....	34
Beginning the Assembly of the PVS .....	36
Attaching the Ground Wire .....	37
Attaching the Audio Headphone Cable.....	38
Installing the Headphone Jack .....	40
Continuing the PVS Assembly .....	41
Setting the Default TV Standard (PEP-Equipped Models Only).....	44

- Routing the Cables from the Console to the PVS..... 47**
  - Grounding the Interface Board  
(PEP-Equipped Models Only) ..... 48
  - Routing the RCA Audio/Video and  
Communication Cables ..... 49
  - Installing the iPod / iPhone Interface Cable  
(PEP-Equipped Models Only) ..... 50
  - Installing the Power and Television Cables..... 51
  - Gathering and Tying the Cables.....53
  
- Reattaching the Covers ..... 55**
  
- Setting Up the PVS (US Models) ..... 57**
  - Viewing the System Settings ..... 58
  - Configuring the Lock ..... 62
  
- Setting Up the PVS (EU Models)..... 65**
  - Viewing the System Settings ..... 66
  
- About the Personal Entertainment Player (PEP)..... 69**
  - Using the PVS and the PEP ..... 70
  
- Troubleshooting the PVS ..... 73**
  
- Maintenance..... 77**
  - Cleaning the PVS Screen.....77
  
- Limited Warranty for Precor Entertainment Products ..... 79**

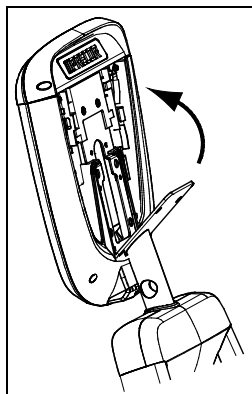
# Beginning the Assembly

**DANGER** Disconnect all electrical power before performing any of the following procedures. Do not attempt to reconnect power until all assembly procedures are complete and the console is properly installed.

Before attaching a PVS to a piece of equipment, you must install a new PVS television cable (coaxial with F connectors) and PVS power cable.

Useful tips for rewiring all equipment:

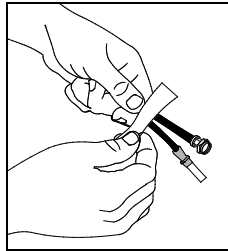
- Use the cable retaining features when available to keep the cords from interfering with the machinery.
- Tilt the console forward and rest it on the console mount so that the notch on the bottom of its back plate rests on the rectangular hook at the bottom of the console mount.



**Figure 4: Tilting console forward on console mount hook**

- Leave about two feet (60 cm) of cables hanging out of the upper portion of the equipment so it can be threaded to the PVS.

- Tape the ends of the cables together (the female coaxial connection to the power cable), to make it easier to feed the cables through the equipment.

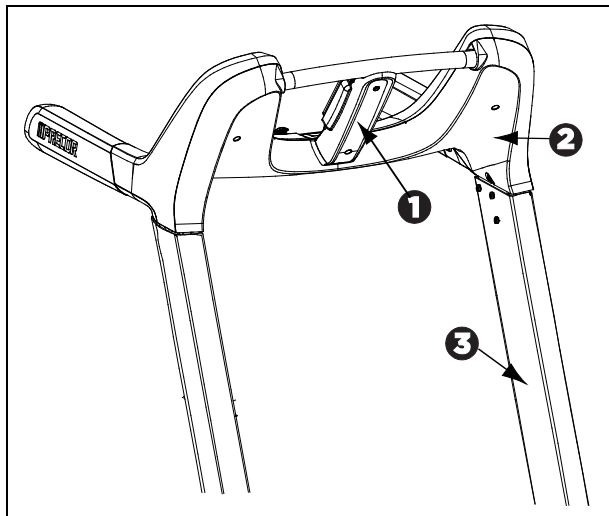


**Figure 5: Taping cables together**

## Rewiring the Equipment (Treadmill)

For this procedure, you will need the following new cables:

- PVS television cable (coaxial with F connectors)
- PVS power cable



**Figure 6: Location of treadmill access covers**

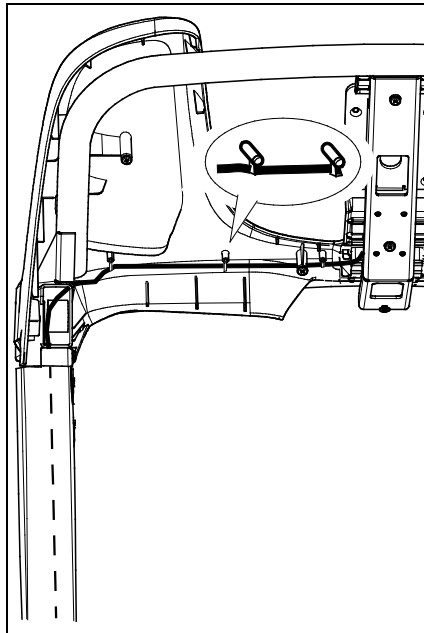
**Table 1. Access covers for the treadmill**

Access Cover	Description
<b>1</b>	Center column cover
<b>2</b>	Rear cover
<b>3</b>	Upright support

**To thread the alternate cables through the equipment:**

1. Remove the center column cover.
2. Remove the seven screws on the back of the console fairing.
3. Remove the rear cover.
4. Thread the PVS power cable and the PVS TV cable from the console mount down through the cable retainers in the center column, then through the wire retainers between the center column and the left upright support, and finally through the upright support.
5. Extend any excess cable out through the bottom of the upright support.

**Note:** These cables are routed through the same path (including cable retainers) as the communication cable.



**Figure 7: Location of wire retainers**

6. Verify that the rear sections of the center column cover (the two smaller pieces that face the user) are in place, then install the console.
7. Route cables up into the PVS as defined in the section Attaching the PVS to the Console, later in this document.

**Note:** Feed excess cable out of the upright support.

8. Replace the rear cover and the center column cover.

**Important:** Do not pinch the cables when reinstalling the plastic covers.

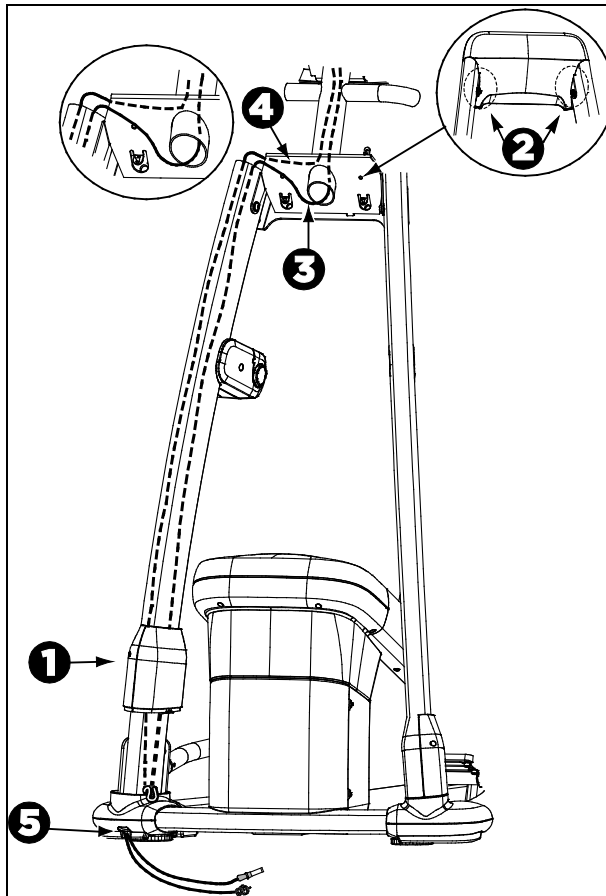
## Rewiring the Equipment (EFX)

For this procedure, you will need the following new cables:

- PVS television cable (coaxial with F connectors)
- PVS power cable

Refer to the following diagram and table for instructions on how to thread the new cables through the EFX.

**Note:** Routing the cable around the triangular structure instead of through it, can cause the surface of the cable's insulation layer to press against the edge of the left upright support. Such pressure can lead to wear and result in the eventual failure of the cable. To prevent this, check the upper end of the left upright support for sharp edges or burrs. Cover any such edges you find with vinyl electrical tape before you finish installing the cables.



**Figure 8: Wire path through EFX**

**Table 2. Threading the alternate cables through the equipment**

<b>Step</b>	<b>Procedure</b>
<b>1</b>	Remove the two Phillips-head screws that secure the upper boot.  Slide the upper boot along the upright support and tape it into place.
<b>2</b>	Remove the screws that secure the top cover.
<b>3</b>	Thread the television cable (coaxial with F connectors) straight down through the column, and then wrap it around the triangular structure and into the left upright support.
<b>4</b>	Thread the power cable through the column and the triangular structure, and into the left upright support.  <b>Note:</b> This cable does <b>not</b> thread through the bottom of the column.
<b>5</b>	Continue to feed both cables down through the upright support following the same route as the existing RJ45 cable.  Pull the cables out the opening at the base of the unit.

## Rewiring the Equipment (Recumbent Bike)

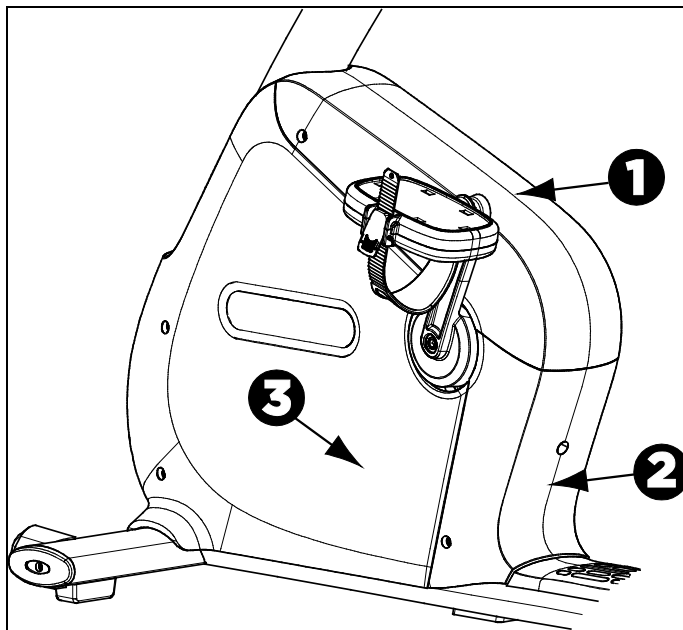
For this procedure, you will need the following new cables:

- PVS television cable (coaxial with F connectors)
- PVS power cable

### To remove the access covers:

1. Remove the top and end covers.
2. Remove one of the side covers.

**Note:** It does not make a difference which side cover you remove.



**Figure 9: Identifying access covers**

**Table 3. Access covers**

Access Cover	Description
<b>1</b>	Top cover
<b>2</b>	End cover
<b>3</b>	Side cover



## Threading the Alternate Cables

The power cable and television cable can be threaded together or separately.

### **To thread the alternate cables through the equipment:**

1. Remove the four screws holding the console in place and set them aside for later use.
2. Remove the rear cover from the console, setting any screws aside for reinstallation later.
3. Rest the console on the console mount so that the notch on the bottom of the console's back plate rests on the rectangular hook at the bottom of the console mount.
4. Feed the cables down the mast.
5. Slide the jack panel out of its mounting in the remaining side cover.
6. Remove the CAT5 (Ethernet) coupler from the square opening in the jack panel.
7. Feed the cables through the square opening in the jack panel using the communication cable's wire retaining feature, then slide the jack panel back into its mounting.
8. Route the upper ends of the cables through the console, then reinstall the rear console cover using the screws you set aside in step 2.
9. Attach the console using the four screws you set aside in step 1.
10. Route the cables to the PVS as defined in the later section, *Attaching the PVS to the Console*.
11. Reattach covers in reverse order: the side cover, then the end cover, then the top cover.

## Rewiring the Equipment (Upright Bike)

For this procedure, you will need the following new cables:

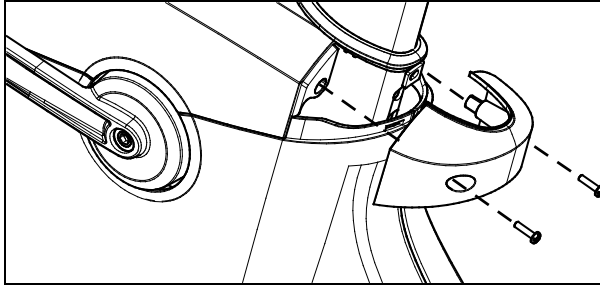
- PVS television cable (coaxial with F connectors)
- PVS power cable

**Note:** You need to remove only one side of the side access covers to thread the cables.

### **To remove the access covers:**

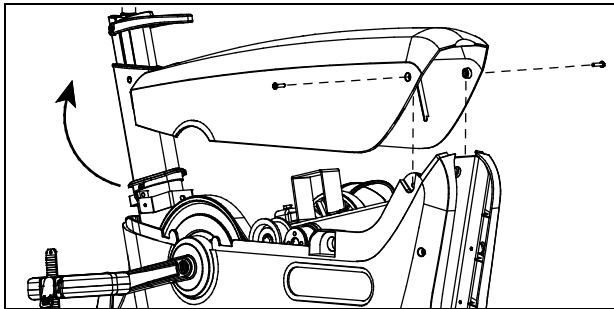
1. Remove the plastic grommet just above the upright rear cover.

- Using a #2 Phillips screwdriver, remove the two #10 x 1-inch self-tapping screws holding the rear cover in place. Pull the upright rear cover back to remove it, then set it aside.



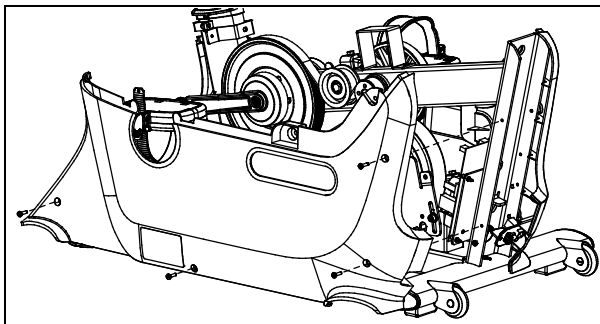
**Figure 10: Rear cover removal**

- Remove the two #10 x 1-inch self-tapping screws holding the top cover in place. Slide the rubber seal up and then lift off the cover.



**Figure 11: Top cover removal**

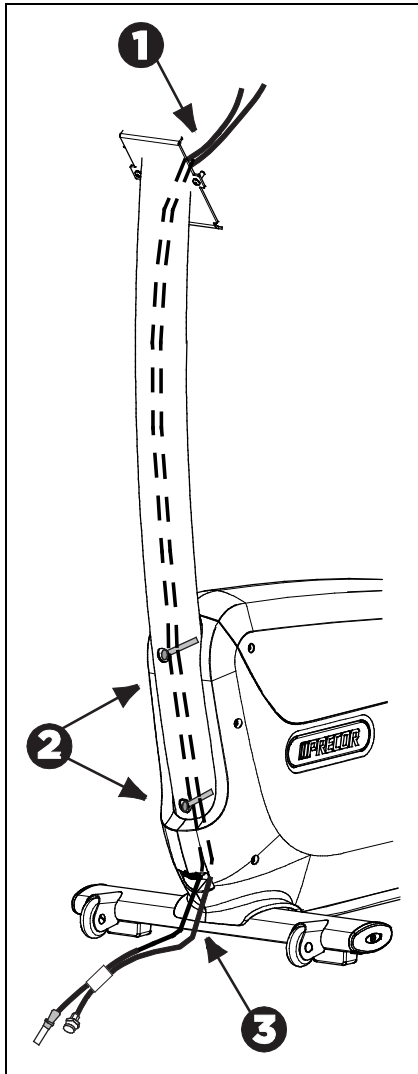
- Remove the four #10 x 1-inch self-tapping screws holding the left side cover in place, then pull the cover away from the body assembly. Guide the cover around the pedal crank, then remove it and set it aside.



**Figure 12: Side cover removal**

### Threading the Alternate Cables

Complete the following steps to feed the PVS cables through the upright bike mast and body.



**Figure 13: Threading the cables for the upright bike**

**Table 4. Threading the cables**

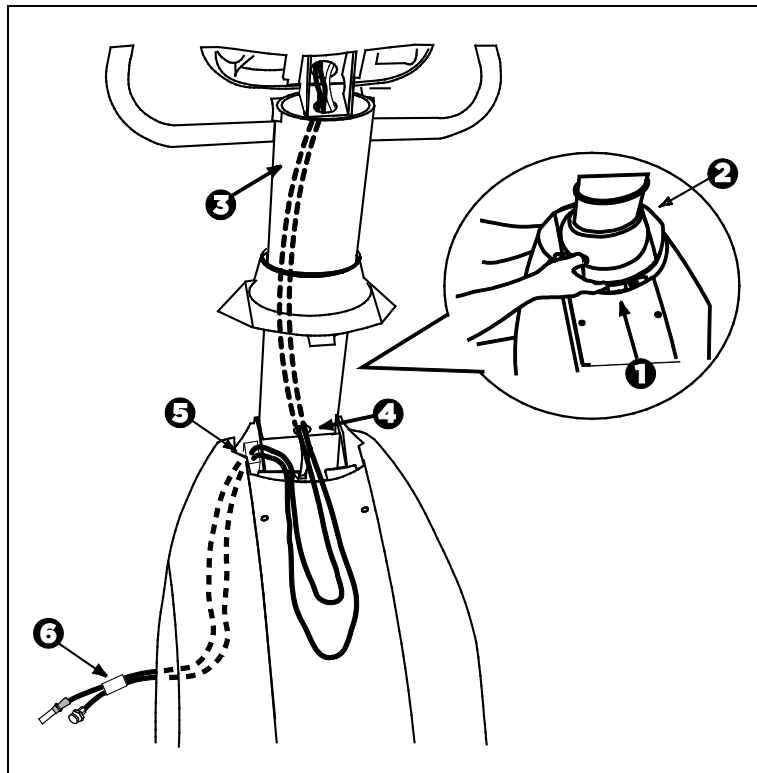
Step	Procedure
<b>1</b>	Thread the cables through the center column at the front of the equipment.
<b>2</b>	The cables may need to be wiggled or re-threaded when you reach bolts that hold the center column in place.

Step	Procedure
<b>3</b>	<p>Guide the ends of each cable through the gap at the bottom of the center column. Remove the CAT5 (Ethernet) coupler from the square hole in the jack panel, then feed the cables through the hole.</p> <p><b>Important:</b> The cables must be secured in the cable retainers along the frame (with the communications cable) and then exit the square hole in the jack panel. You may need to slide out the jack panel to remove the CAT5 coupler and feed the cables through the hole. If so, return the jack panel to its previous position when you are finished.</p>
<b>4</b>	<p>After you install the PVS power cable and television cable, reattach the access covers.</p>

## Rewiring the Equipment (Climber)

For this procedure, you will need the following new cables:

- PVS television cable (coaxial with F connectors)
- PVS power cable



**Figure 14: Rewiring the climber**

**Table 5. Rewiring the climber**

Step	Procedure
1	Push the rear tab in on the plastic top cover to unlock it before lifting it. You may need to detach the rubber grommet from the plastic top cover before sliding both along the upright support.
2	Slide the rubber grommet and the plastic top cover along the upright support to expose the hole that the existing RJ45 cable threads through.
3	Thread the taped cable ends through the top of the display console and continue to feed the taped cable ends through the neck tube. Continue to feed the taped cables down through the upright support, following the same route as the existing RJ45 cable.
4	<p>Pull the taped cables out of the hole at the base of the upright.</p> <p><b>Note:</b> You may need to use needle nose pliers to gently pull the cable connectors out the small opening.</p>
5	<p>Thread the taped cables and its connectors into the internal upright frame tube and out onto the floor.</p> <p><b>Important:</b> <i>Precor recommends that you have an assistant tip the unit on its side. Do not attempt to tip the equipment without assistance. Slightly tipping the unit, with assistance, makes it easier to gain access to the cables.</i></p>
6	Pull the taped cables out from the base of the unit and replace access covers.

## Rewiring the Equipment (AMT)

For this procedure, you will need the following new cables:

- PVS television cable (coaxial with F connectors)
- PVS power cable

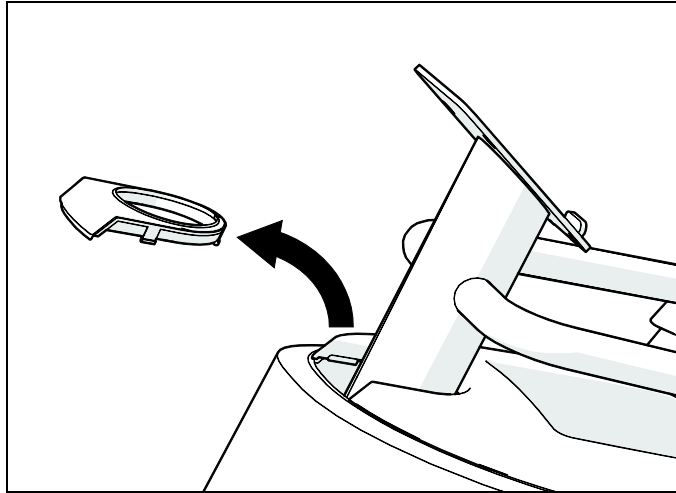
Removing the front and side access covers provides sufficient space to install the console cables.

**Note:** If you are installing a P10 or P30 console without a Personal Video System (PVS) or other accessory cap, you do not need to remove any access covers. Continue with the next section of the manual.

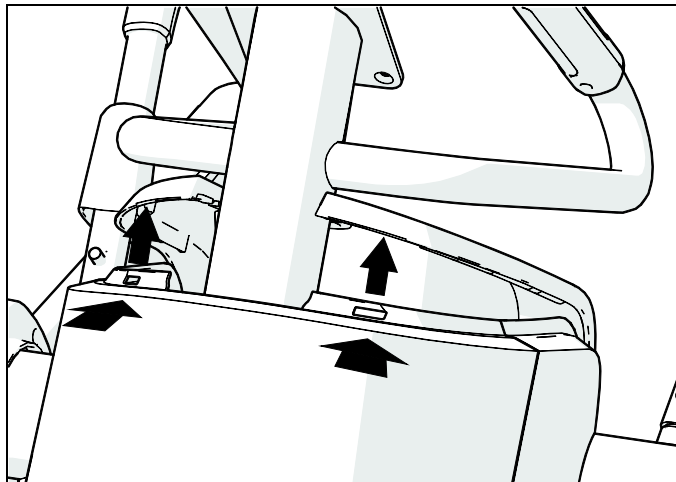
**Important:** *Before continuing with the following procedure, be sure to remove any ties or other materials that hold the side arms in place before the supports are installed. Set aside all covers and fasteners that you remove in this procedure for later use.*

**To remove the access covers:**

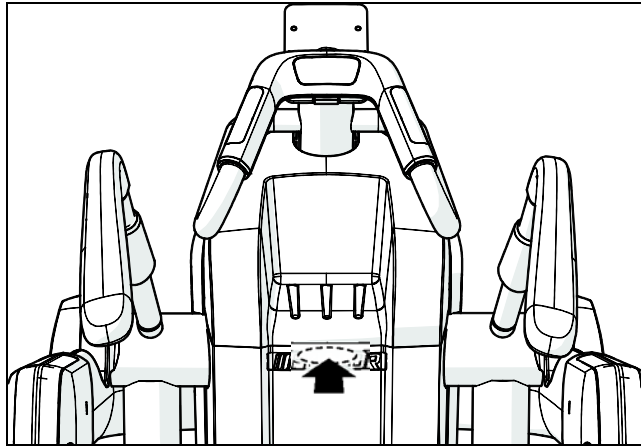
1. Lift the moisture seal upward and remove it from the center support.

**Figure 15: Moisture seal removal**

2. Extend a finger through the moisture seal opening and under the front edge of the top cover on one side. While pressing upward on the top cover, use the heel of your hand to tap gently below its front edge and release it. Repeat this step to release the other side of the top cover.

**Figure 16: Top cover removal**

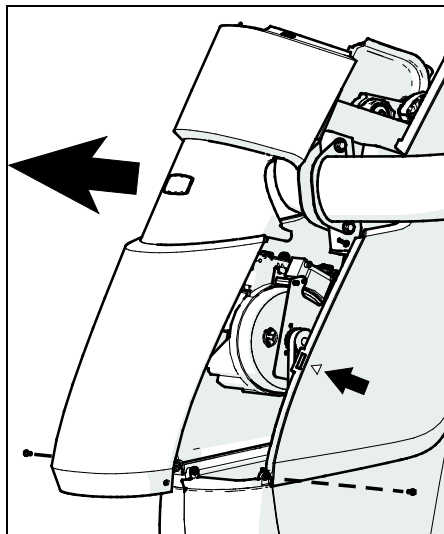
3. While holding the front edge of the top cover up, use the heel of your other hand to tap gently just below the cover's back edge. Lift the cover up and out of the way.



**Figure 17: Releasing the back of the top cover**

4. Remove the two #10 x  $\frac{3}{4}$ -inch screws at the bottom corners of the front cover assembly.
5. Gently press in on each of the side covers, just behind the front edge and about 8½ inches from the bottom, while pulling the front cover assembly forward to disengage it.

**Note:** Each side cover has a small triangular mark to show you where to press.



**Figure 18: Front cover assembly removal**

6. Move the front cover assembly forward and slightly upward to remove it.

## Threading the Alternate Cables

Precor recommends threading new cables from the top down, to take advantage of gravity. A fish tape (a thin metal strip with a hook or clasp on one end, available from professional hardware vendors) can be helpful during this procedure.

### To thread the alternate cables through the equipment:

1. Select the PVS power cable and the television cable.
2. Thread the cables through the center column at the front of the equipment.
3. Guide the ends of each cable through the gap at the bottom of the center column.
4. Remove the CAT5 (Ethernet) coupler from the square opening in the jack panel, then feed the cables through the opening.

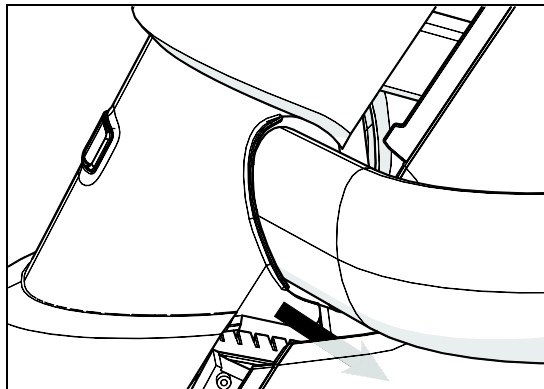
**Important:** *The cables must be secured in the cable retainers attached to the frame, along with the communications cable. They must then pass through the square opening in the jack panel.*

## Replacing Access Covers

For this procedure, you will need the covers you removed earlier, as well as the fasteners you removed with them.

### To replace the access covers:

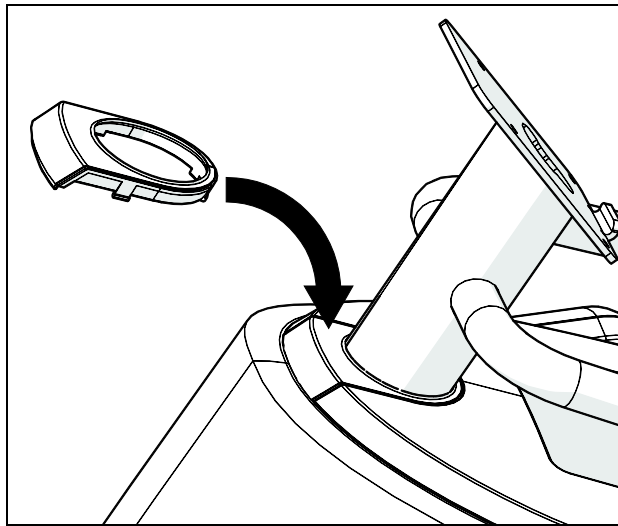
1. Guide the arm openings in the front cover around the arms of the AMT, taking care that the tabs at the bottom corners of both openings are inside the two side covers, then guide the front cover into place until the latches on the side covers click into place.



**Figure 19: Front cover positioning**



2. Reattach the two #10 x  $\frac{3}{4}$ -inch screws at the bottom corners of the front cover. Tighten the screws completely.  
**Important:** In the following step, do not apply excessive force to seat the cover.
3. Position the rear edge of the top cover so that the clips on the top and back covers are engaged securely.
4. Gently snap the front edge of the top cover into place, using the heel of your hand if necessary.
5. Wrap the moisture seal around the center column below the heart rate sensor grips, then fit it into the top cover. Make sure that the surfaces and edges of the moisture seal are flush with those on the top cover.



**Figure 20: Moisture seal positioning**



## Beginning the Assembly

To assemble the equipment, you will need to attach the PVS to the console and route several cables.

**Important:** Assemble the equipment according to the guidelines in this manual to ensure that you do not void the Precor Limited Warranty. Any damage caused during installation is not covered by the Precor Limited Warranty.

### Installation Requirements


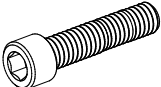
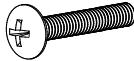

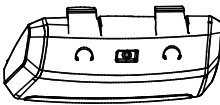
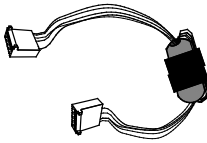
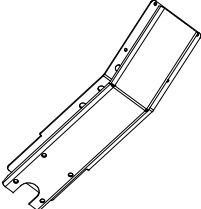

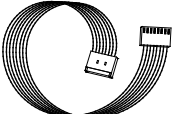
Prior to assembly, make sure you have the required tools and hardware. You will need the following tools to perform this assembly:

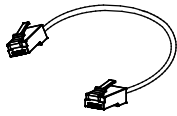



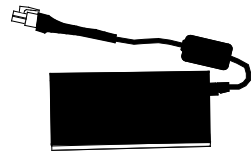

- Phillips screwdriver
- $\frac{3}{16}$ -inch socket head screwdriver
- Set of metric hex wrenches
- Set of SAE hex wrenches
- Hex-drive torque wrench with #2 Phillips screwdriver bit

## Hardware Kit (not to scale)

The hardware kit shipped with this equipment contains the fasteners and other hardware components shown in the following table. If the equipment includes a Personal Entertainment Player (PEP), or standard controller, both **sold separately**, then there will be additional components included in those kits.

Before you begin assembly, make sure that your hardware kit is complete. If not, please contact Precor Customer Support.

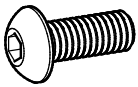
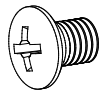
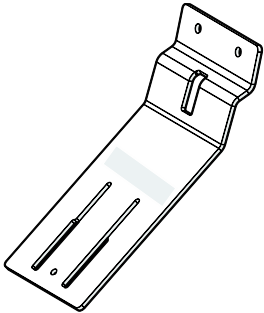
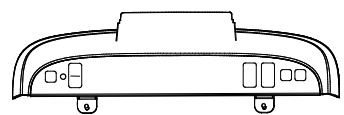
Hardware	Hardware Name	Quantity
	Buttonhead screws M4 x 10mm	4
	Sockethead screws 1/4-inch x 5/8-inch	4
	Phillips-head screws #8 x 3/8	5
	Plastic back for controller assembly	1
	Headphone plug assembly	1
	Headphone cable with ferrite bead <b>Note:</b> Ferrite not required for all models.	1
	Mounting bracket	1
	Tie wraps	4
	8-pin communication cable	1

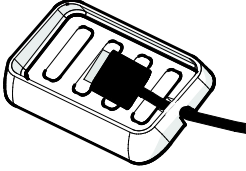

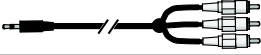

Hardware	Hardware Name	Quantity
	RJ-45 PVS control cable	1
	Coaxial television cable	1
	Headphone plug grounding cable	1
	2.5 mm hex wrench	1
	AC power supply	1
	AC power cord (based on region)	1

Additional Controller Kits (Sold Separately)

PEP Controller Kit

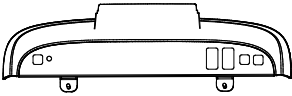

A PEP controller kit contains the following components:

Hardware	Hardware Name	Quantity
	Buttonhead screws, M4 x 10mm	3
	Phillips-head screw, M4 x 6mm	1
	iPod®/iPhone® tray bracket	1
	Front Controller Assembly for PEP	1

Hardware	Hardware Name	Quantity
	iPod/iPhone tray and cable	1
	Dual DC power cable	1
	RCA audio/video cable	1
	Grounding cable for PEP circuit board	1

Standard Controller Kit

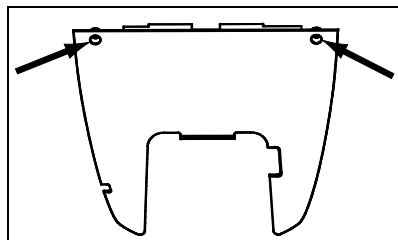
A Standard controller kit contains the following components:

Hardware	Hardware Name	Quantity
	Front Controller Assembly	1
	DC Power Cable	1

## Beginning the Assembly of the PVS

Perform the assembly steps in the order presented. As you remove the screws, set them aside in a safe place. You will need them again later to complete the assembly.

To begin assembly, remove the two screws that secure the back cover to the console.



**Figure 21: Screw locations for back cover of console**

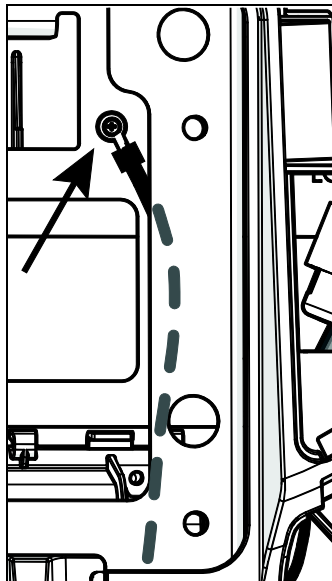
## Attaching the Ground Wire

The ground wire protects the PVS from electrostatic discharge. Failure to properly ground the unit can limit the life expectancy of the PVS.

**Important:** Do not skip this procedure. The ground wire must be securely connected to the circuit board to prevent damage to the PVS.

### To attach and route the ground wire:

1. Locate the threaded hole under the mounting plate.



**Figure 22: Location of threaded hole and ground wire route**

2. Attach the ground wire to the threaded hole on the console bracket using a #8 x 32-inch screw.
3. Route the ground wire down to the headphone jack along the right side of the equipment controls as shown in the preceding figure.

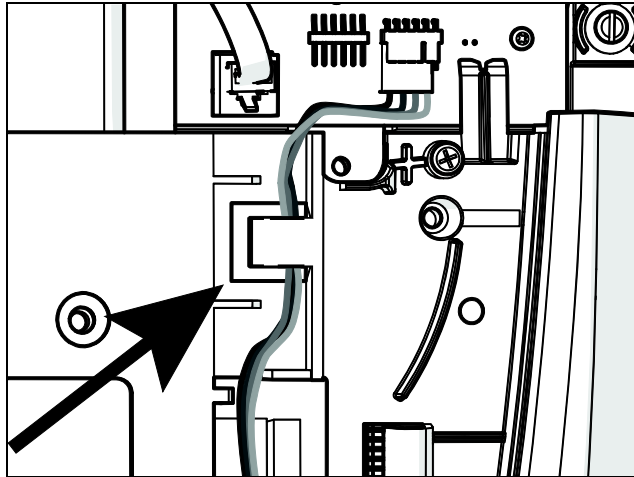
## Attaching the Audio Headphone Cable

The headphone audio cable is fitted with a ferrite bead to decrease interference from other sources. The ferrite bead is wrapped in foam tape to protect it from vibration.

### To route the headphone audio cable:

1. Attach the connector at the upper end of the cable to the five-contact strip connector on the PVS controller circuit board. This connector is keyed, so you can attach it only one way.
2. Route the cable under the cable clip as shown in the following figure.

**Note:** The lower end of the cable has shrink wrap on the wire.

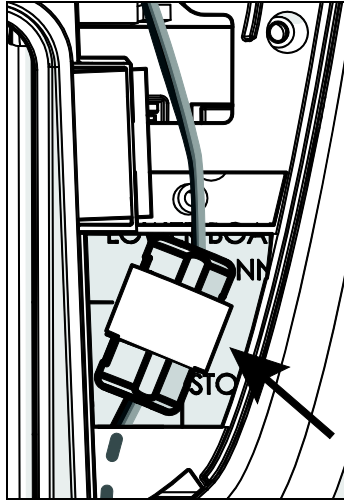


**Figure 23:** Location of cable clip



3. Tuck the ferrite bead into the pocket just under the serial number label on the right side of the console.

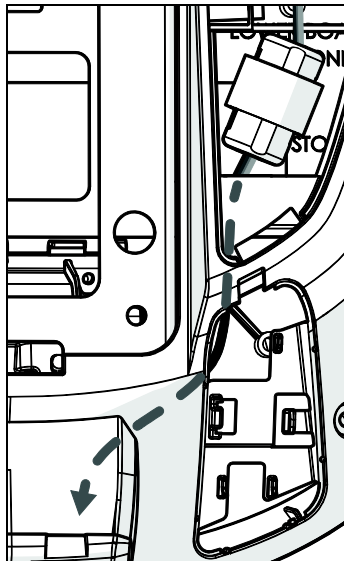
**Note:** The ferrite is not required for all models. If your kit did not include a ferrite, please skip to step 4.



**Figure 24: Proper positioning of ferrite bead**

4. Route the audio cable along the right side of the equipment controls and through the hole at the bottom of the console.

**Note:** The shrink wrapped end of the cable should be routed to the bottom of the cable.



**Figure 25: Routing the audio cable to the bottom of the console**

## Installing the Headphone Jack

Use the following instructions to replace the blank headphone jack with the functional headphone plug assembly included in your hardware kit.

**Important:** Do not stretch, crimp, or damage the cable. Cables damaged by improper installation will not be covered by the Limited Warranty.

### To replace the blank headphone jack:

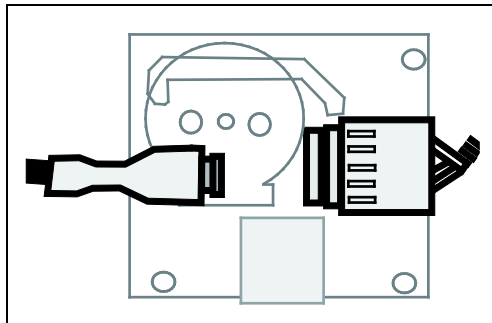
1. Remove the headphone plug assembly from the packaging.
2. Insert a 3.5 mm headphone plug into the headphone cap jack and press the headphone jack down firmly.

**Note:** You can discard the headphone cap after you remove it.

3. Pull the audio cable and grounding wire through the hole at the bottom of the console.

**Important:** For consoles with moving machine controls, carefully route the cables away from moving parts so they do not become trapped in the controls.

4. Unsnap the circuit board inside the new headphone jack assembly. Connect the audio plug and the grounding cable to the circuit board.



**Figure 26: Connecting the audio plug and grounding cable**

5. Insert the headphone jack on the circuit board into the hole in the front of the headphone jack assembly.
6. Push the circuit board downward until it snaps into place.

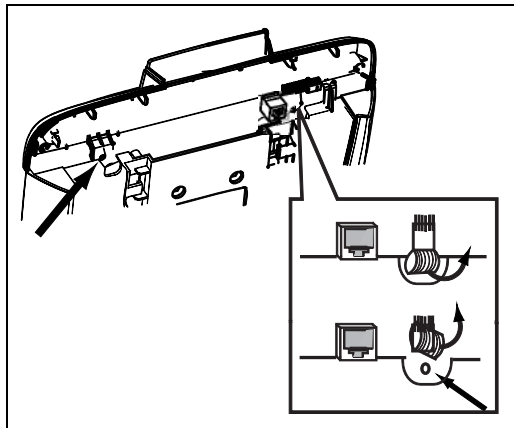
## Continuing the PVS Assembly

### To continue the PVS assembly:

1. Secure the console to the equipment using the four  $\frac{1}{4}$  - 20 x  $\frac{5}{8}$  hex drive screws.
2. Use the two #8 x  $\frac{3}{8}$ -inch screws that came with the hardware kit to secure the front controller cover to the console. These screws are accessible from the back or inside of the front controller cover.

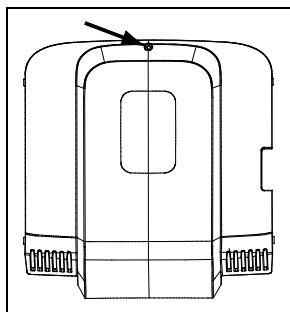
**Note:** One screw hole is hidden under the key panel ribbon.

**Important:** Do not damage the key panel ribbon. When you lift it out of the way, be careful not to flex or crimp it.



**Figure 27: Locating the hidden screw hole**

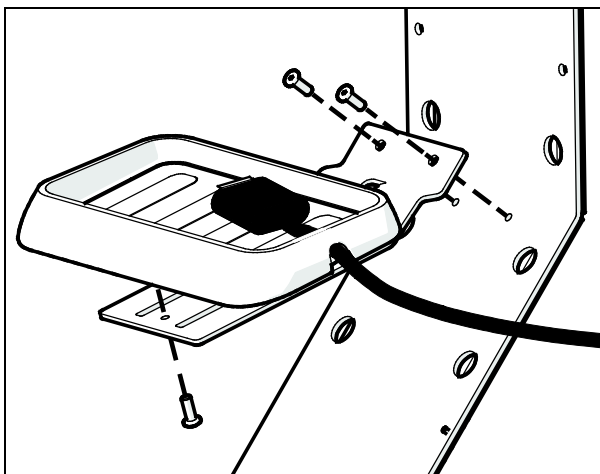
3. Remove the screw at the top of the PVS back cover. Grasp the cover at the bottom and gently pull it loose.



**Figure 28: Screw location for back cover of PVS**

**Note:** If the PVS you are installing does **not** include a Personal Entertainment Player (PEP), skip the following two steps.

4. If the PVS you are installing is equipped with a PEP, insert the two tabs on the bottom of the iPod/iPhone tray into the slots on the tray bracket. Secure the tray to the bracket using one M4 x 6mm buttonhead screw, then secure the bracket to the PVS mounting bracket using two M4 x 10mm buttonhead screws.



**Figure 29: Installing the iPod / iPhone tray and bracket**

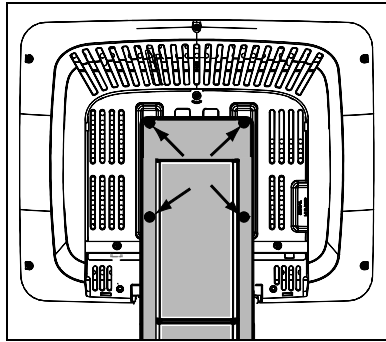
5. If the PVS you are installing is equipped with a PEP, attach the RCA audio/video cable to the three RCA jacks at the lower right on the back of the PVS screen, being careful to match the color of each RCA plug on the cable to the corresponding jack.

**Table 6. Audio/video connectors**

Plug/jack color	Signal type
Yellow	Analog composite video
Red	Analog stereo audio, right channel
White	Analog stereo audio, left channel

6. Attach the communication cable to the modular socket at the lower left on the back of the PVS screen.

7. Fit the mounting bracket against the back of the PVS and secure it using four M4 x 10 mm buttonhead screws. Torque the screws to 19 lb-in.



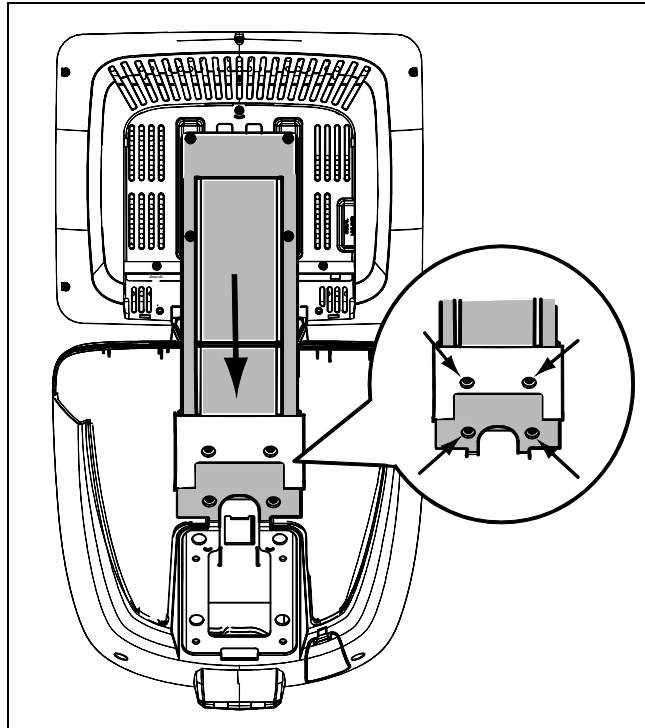
**Figure 30: Attaching the mounting bracket to the PVS**

8. Slide the bottom of the mounting bracket into the slot on the back of the console.
9. Route the communication cable so that it runs from the lower left back corner of the PVS screen to the right edge of the bracket. Position the cable so that it is not pinched when you secure the mounting bracket.
10. If the RCA audio/video cable is installed, route it so that it runs from the lower right back corner of the PVS screen to the left edge of the bracket.

**Important:** The RCA audio/video cable should be positioned behind the communication cable, and both should be arranged so that they are not pinched when you secure the mounting bracket in the following step.

11. Secure the mounting bracket using the four socket head screws ( $\frac{1}{4}$  - 20 x  $\frac{5}{8}$ ) included in the hardware kit. Torque to 66 lb-in.

**Important:** To avoid damage to the console, make sure it is securely before assembling the PVS.



**Figure 31: Attaching the PVS bracket to the console**

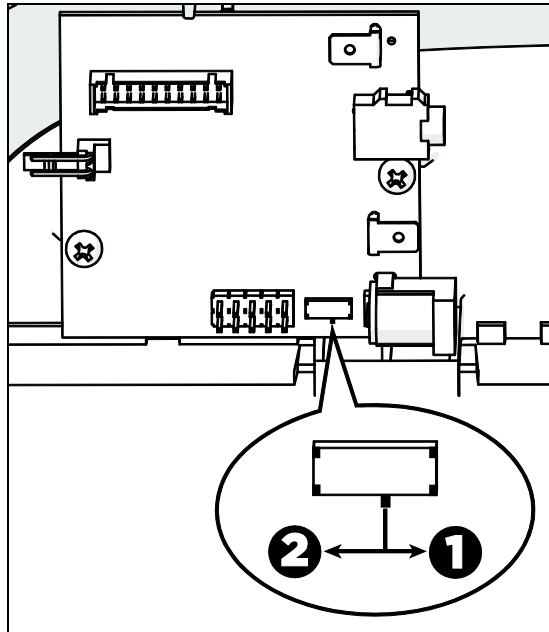
## Setting the Default TV Standard (PEP-Equipped Models Only)

The PEP circuit board includes a small switch that sets the default television standard for playback of iPod and iPhone analog video clips. This standard is also set within each iPod and iPhone device, and the PEP adjusts automatically to each device when it is connected. However, the correct default setting ensures that video display transitions between different sources occur as smoothly as possible.

**Note:** In most cases, this setting is made before the PEP is shipped. However, we recommend that you verify it before completing installation.

**To set the default TV standard:**

1. Locate switch S1 on the PEP circuit board, as shown in the following figure.

**Figure 32: TV standard selection**

2. Position the switch to set the appropriate TV standard for your location.

*To select ...                      Move the switch to position ...*

NTSC                                      **1**

PAL                                         **2**

**Note:** iPod and iPhone devices do not support SECAM directly.





## Routing the Cables from the Console to the PVS

For the PVS to function correctly, the following cables must be routed and attached:

- Power cable
- Headphone cable and jack
- Headphone ground cable
- Television cable
- Communication cable

In addition, if the PVS is equipped with a Personal Entertainment Player (PEP), the following cables must be routed and attached:

- Chassis ground wire
- RCA audio/video cable
- iPod/iPhone interface cable
- Dual DC power cable

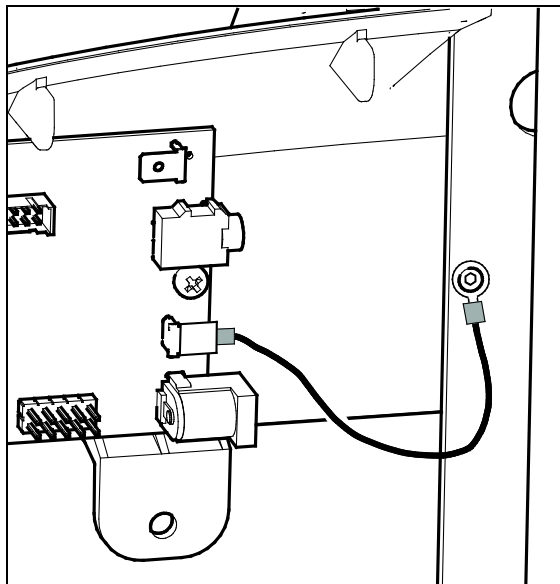
The following figures and procedures describe how to route the cables from the console to the PVS.

**Important:** *You must route the cables in the order presented, and then group and secure them as described, to allow the PVS cover panels to close properly.*

## Grounding the Interface Board (PEP-Equipped Models Only)

The PEP includes a small interface circuit board, which is mounted inside the cap. To ensure that the PEP functions correctly and safely, you must ground the board by connecting a chassis ground wire between it and the PVS mounting bracket.

The following figure shows the connection points for the grounding cable.



**Figure 33: Grounding the PEP interface board**

### To ground the interface board:

1. Attach the ring lug on the grounding cable to the PVS mounting bracket using an M4 x 10mm buttonhead screw.
2. Slide the quick-connect terminal on the other end of the grounding cable onto the lower quick-connect terminal on the interface board.

**Note:** When you connect the chassis grounding cable, be sure to attach it to the lower quick-connect terminal on the interface board. The upper terminal is needed for grounding the iPod/iPhone interface cable (and any devices connected to it). Also, to avoid damage to the quick-connect terminal, do not bend it.

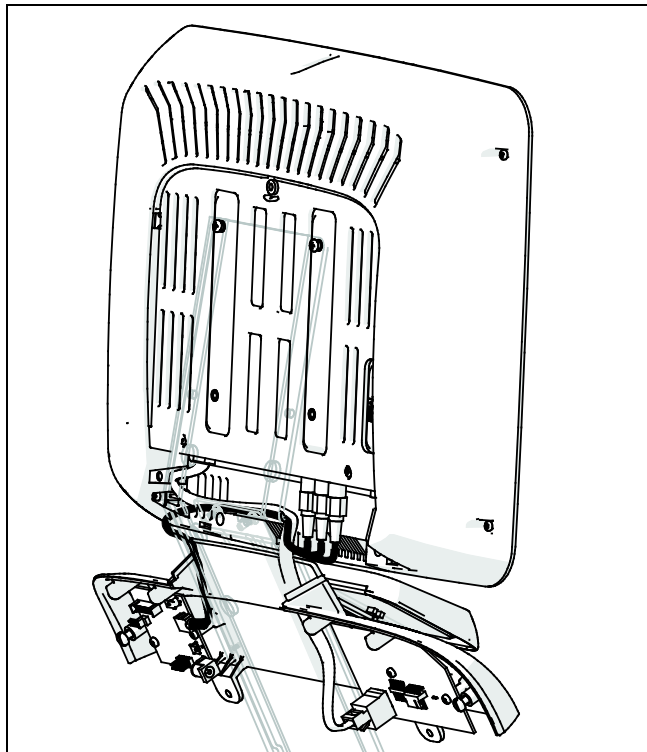
## Routing the RCA Audio/Video and Communication Cables

Connect the lower ends of the RCA audio/video and communication cables to the PEP and PVS controller circuit boards.

**Note:** If your PVS does not include a PEP, skip step 2.

### To connect the cables:

1. Connect the communication cable to the modular jack on the screen and the PVS controller circuit board.
2. Connect the 1/8-inch jack on the end of the RCA audio video cable on the right-hand edge of the PEP interface board.



**Figure 34: Threading the communication and RCA audio/video cables**

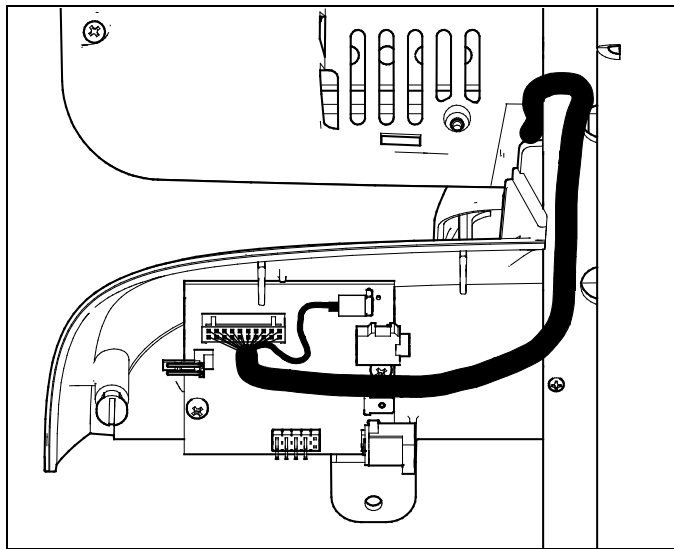
## Installing the iPod / iPhone Interface Cable (PEP-Equipped Models Only)

The iPod/iPhone interface cable passes through the neck of the controller enclosure and under the PVS screen.

### To install the interface cable:

1. Pass the cable through the gap between the bottom of the PVS screen and the neck of the cap assembly, as shown in the following figure. Be sure to leave enough cable to pass along the channel in the neck to a point just below the angle in the neck.

**Important:** Leave all extra cable outside the PVS enclosure to make connecting iPod and iPhone devices as easy as possible.



**Figure 35: Connecting the iPod/iPhone interface cable**

2. Attach the grounding tab on the cable to the quick-disconnect terminal at the upper right-hand corner of the PEP interface board.

**Note:** To avoid damage to the quick-disconnect terminal, **do not** bend it.

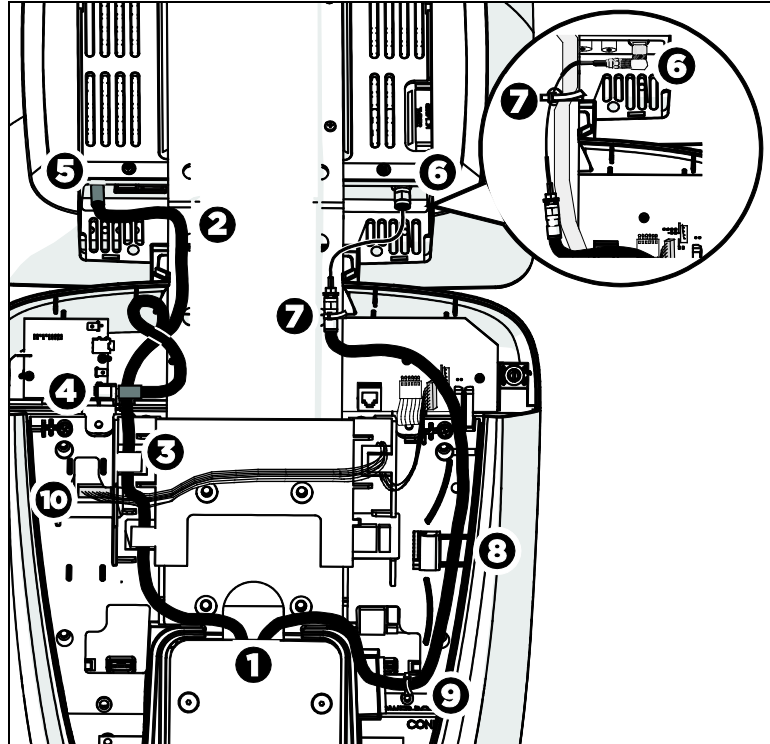
3. Attach the 20-pin connector on the cable to the corresponding connector on the interface board.

**Note:** The 20-pin connectors are keyed to fit together in the correct orientation only. **Do not** force the connectors together.

## Installing the Power and Television Cables

Connect the PVS power cable and the coaxial television cable as described in the following steps.

**Important:** Before you begin, make sure there is enough length of each cable in the console area to permit routing both cables through the paths shown.



**Figure 36: Routing the power and TV cables (with EU setup callout)**

**Table 7. Threading the power and television cables through the console**

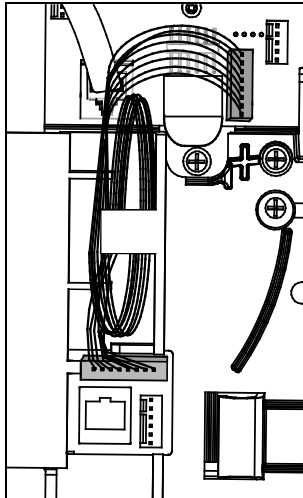
Step	Procedure
<b>1</b>	Pull enough of each cable out of the console mount to be routed according to these steps.
<b>2</b>	Route one of the branches of the power cable along the recess in the PVS mounting bracket, through the neck of the cap, and up to a point just below the angle in the bracket.
<b>3</b>	Press the power cable into the left-hand cable channel. Slide the cable underneath the two retaining tabs in the channel.

Step	Procedure
4	(PEP-equipped models only) Connect the other branch of the power cable to the power jack of the PEP interface board.
5	Connect the end of the cable to the screen power jack.
6	<p><b>Important:</b> In this step, do <b>not</b> overtighten the connectors. Finger-tighten them until they are snug, then use a torque wrench to tighten the connectors to 30 inch-pounds.</p> <p><b>For US:</b> Connect the television cable to the narrow adapter cable attached to the PVS screen. Using two <math>\frac{7}{16}</math>-inch open-end wrenches, tighten the connectors carefully.</p> <p>Position the connectors just above the neck of the controller enclosure, leaving an S-shaped curve in the narrow adapter cable as shown in the preceding diagram.</p> <p><b>For EU:</b> Connect the television cable as shown in the figure call-out.</p>
7	<p><b>For US:</b> Route the television cable along the recess in the PVS mounting bracket, through the neck of the controller enclosure and into the enclosure itself. Use a plastic tie to secure the connector to the lowest anchor point on the right-hand side of the bracket.</p> <p><b>Note:</b> Before you insert the plastic tie into the anchor point, bend it in the middle to allow you to grab the end of the tie after you pass it through the anchor point.</p> <p><b>For EU:</b> Secure the communication cable and television cable together using a plastic tie as shown in the figure call-out.</p>
8	Route the television cable around the right edge of the console enclosure.
9	Route the cable around the top right corner of the console mount, then press the television cable into the gap between the console mount and the lower right socket head screw securing the PVS mounting bracket to the console. Use a tie wrap to secure the cable to the plastic crossmember of the console.
10	<p>Connect the 8-pin communication cable from the console to the cap.</p> <p><b>Note:</b> Wrap excess cable around a retaining tab as shown in the preceding figure.</p>

### Television Cable Routing for the P10 Console

Route the 8-pin communication cable for the P10 console according to the following figure.

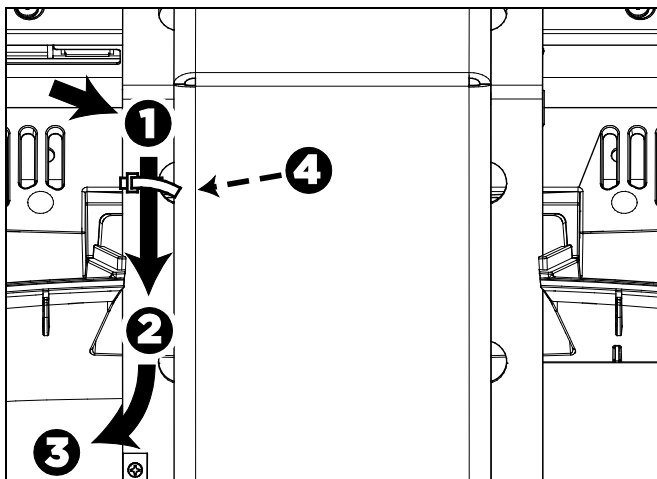
**Note:** Wrap excess cable around the retaining tab.



**Figure 37: Communication cable route for P10 console**

### Gathering and Tying the Cables

Once all the cables are connected, you must position the left-hand group of cables correctly so that the covers will fit into place. The following figure shows the appropriate positioning.



**Figure 38: Routing cables between the PVS screen and cap**

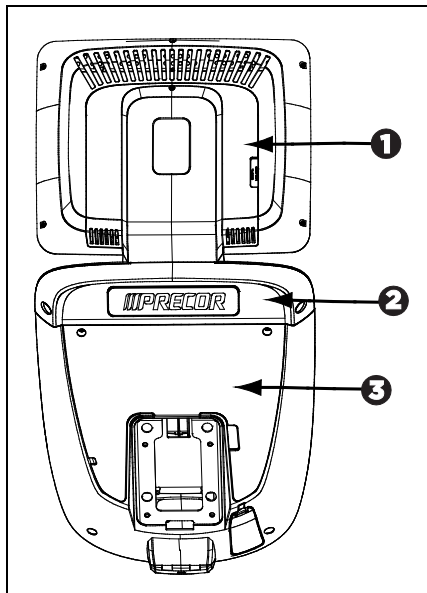
**Table 8. Positioning cables between the PVS screen and cap**

<b>Step</b>	<b>Procedure</b>
<b>1</b>	Press the cables into the side channels in the PVS mounting bracket. The resulting bend in each cable should be between the angle in the bracket and the first set of anchor points (openings) below that angle.
<b>2</b>	Keep all cables in the mounting bracket side channels until they have passed through the neck.
<b>3</b>	Route cables below the neck so that none of them protrudes from the console enclosure.
<b>4</b>	Use a plastic tie to secure the left-hand group of cables. Attach this tie at the first anchor point below the angle in the PVS mounting bracket.



## Reattaching the Covers

After the cables have been routed, attach the back covers to the PVS and console. Once this is complete, you can turn on the power and begin using the equipment.



**Figure 39: Reattaching the covers**

Number	Procedure
<b>1</b>	Reattach the back access cover of the PVS, using the screw that you removed with the cover.
<b>2</b>	Attach the back controller cover using two #8 x $\frac{3}{8}$ -inch Phillips-head screws.
<b>3</b>	Reattach the rear access cover on the console using the screws that you removed with the cover.



# Setting Up the PVS (US Models)

The keys on the console cap are labeled for users, but they have different functions for administrators setting up the PVS. Use the procedures in this chapter to set up US models of the PVS. For European models, please refer to *Setting Up the PVS (EU Models)*.



Number	Key Name	Function During System Setup
<b>1</b>	Power On/Off	Selects a category
<b>2</b>	Power Light	Red light = PVS Off Blue light = PVS On
<b>3</b>	Source (PEP only)	Switches between media player and TV audio
<b>4</b>	Channel Up/Down	Moves from one category to another or from one subcategory to another
<b>5</b>	Volume Up/Down	Changes a value in a subcategory
<b>6</b>	Mute	Moves up a menu level
<b>7</b>	Closed Caption	Turns the closed caption feature on or off

## Viewing the System Settings

**Important:** *The information provided in this section is intended for system administrators and registered service technicians. Please do not share it with equipment users or non-administrative staff.*

Use the System setting mode to configure equipment settings in ways that benefit your users and your facility. Because a special code is required to gain access to these settings, only equipment administrators and registered service technicians can see them. Changes made to these settings are stored in the equipment, allowing them to persist after a loss of power.

The System Settings categories are:

- Channel
- Picture
- Audio
- Time (no function in current release)
- Setup
- Lock

### **To view the System settings on the setup menu:**

1. Press **Power On/Off** to turn on the PVS.

The power light is blue when the PVS is on.

Hold the **Channel Down** key, the **Volume Up** key, and the **Power On/Off** key at the same time for three seconds.

The System settings menu should appear and the power light should flash red and blue, indicating that you are in the System setting mode.

**Note:** If you do not press a button within 15 seconds, the PVS screen returns to the normal viewing mode.

While you are in the System setting mode, use the keys on the console cap to navigate through the setup menus and make selections as discussed earlier in this chapter.

## Configuring the Channel Settings

Use the Channel settings to manage your TV channel list.

**Table 9. Channel settings**

Setting	Purpose
Auto Tuning	Searches for all available analog and digital stations.
Manual Tuning	No function in current release.
Channel Edit	Adds or deletes a channel to the channel list.
DTV SNR	Displays the signal strength for the digital TV signals.

You can manually add or delete specific TV channels from the channel list.

### To delete or add channels:

1. On the System Settings menu, press **Power On/Off** to select **Channel**.
2. Press **Channel Down** to highlight **Channel Edit**, then press **Power On/Off** to select the subcategory.
3. Press **Power On/Off** to add or delete a channel.
4. Press **Volume Up/Down** to move through the signal formats.

## Configuring the Picture Settings

Use the Picture settings to change the television (TV) appearance.

**Table 10. Picture settings**

Setting	Values	Default Value
Color Temperature	Cool Medium Warm	Cool
Picture Mode	Vivid Standard Cinema Sport Game	Vivid
Backlight	0 - 100	100
Contrast	0 - 100	100
Brightness	0 - 100	50
Sharpness	0 - 100	70
Color	0 - 100	70
Tint	R50 - G50	0 (middle)

## Configuring the Audio

Use the Audio settings to adjust the sound setup for the PVS.

**Table 11. Audio settings**

Setting	Values	Default Value
Sound Mode	Standard Music Cinema Sport Game	Standard
Balance	L50 - R50	0 (middle)
Treble	0-100	35
Bass	0-100	56
Reset	N/A	N/A

## Configuring the PVS Setup Menu

Configure the detailed subcategories under each setting to create default settings that benefit your users. The categories are:

- Caption
- Auto Caption
- Aspect Ratio
- Headphone Auto Power
- Auto Power
- Input Source
- Factory Reset

**Table 12. Setup settings**

Setting	Purpose	Values	Default Value
Caption	Specifies which Closed Caption or teletext channel should be displayed.	On Off	Off
Auto Caption	See topics below table for more detail.	On Off	Off
Aspect Ratio	Changes the aspect ratio for PVS.	Set by Program Full 16:09 Zoom1 Zoom2	Full
Headphone Auto Power	See topics below table for more detail.	On Off	On
Auto Power	If power to the PVS is interrupted while this setting is On, the PVS activates itself automatically and returns to the last selected channel when power is restored.	On Off	Off
Input Source	Choose settings for TV or video.	TV AV	TV
Factory Reset	Returns all System settings to their default settings.	N/A	N/A

## Auto Caption

When this setting is **On** and Closed Captioning is active, connecting a set of headphones removes the caption text from the screen. The caption text returns when the headphones are disconnected.

**Note:** This setting does not work unless the Caption setting is set to a valid caption channel or text channel. Note also that Closed Captioning is provided as part of the TV programming and is not included in some programs.

## Hp (Headphone) AutoPower

When the Headphone (Hp) Autopower setting is **On**, the PVS activates itself automatically when the user plugs in a pair of headphones. When the setting is **Off**, the user must turn on the PVS screen by pressing **Power On/Off**. Depending on how heavily the equipment is used, this feature can conserve power and prolong the life of the PVS screen.

**Note:** If this feature is active, it overrides all other headphone detection features.

## Configuring the Lock

Use the settings in the Lock menu to block the display of television programs that are not appropriate for your facility. You must enter the default password (**0 0 0 0**) to use this menu.

### To enter the password:

1. Press the **Channel Up/Down** keys to select the first digit.
2. Press the **Power On/Off** key to enter the digit.
3. Repeat steps 1 and 2 to select and enter the remaining three digits.

**Table 13. Lock settings**

Setting	Purpose	Values	Default Value
Lock	Activates the Lock feature and optionally specifies a preset permission level.	Off On	Off



Setting	Purpose	Values	Default Value
Set Password	Provides the ability to modify the Lock password. <b>Important:</b> You <b>must</b> enter the new password in both fields to put it into effect.	New Confirm	0000
Movie Rating	Specifies the minimum MPAA (Motion Picture Association of America) rating that Parental Control blocks.	Blocking Off X NC-17 R PG-13 PG G	Blocking Off
TV Rating - Children	Controls the types of TV programming available for children.	Age: Blocking Off TV-Y7 TV-Y Fantasy Violence: Blocking Off TV-Y7-FV	Blocking Off     Blocking Off
TV Rating General	Controls the types of TV programming available for all TV viewers.	Age: Blocking Off TV-MA TV-14 TV-PG TV-G	Blocking Off



## Setting Up the PVS (EU Models)

The keys on the console cap are labeled for users, but they have different functions for administrators setting up the PVS. Use the procedures in this chapter to set up EU models of the PVS. For US models, please refer to *Setting Up the PVS (US Models)*.



Number	Key Name	Function During System Setup
<b>1</b>	Power On/Off	Selects a category
<b>2</b>	Power Light	Red light = PVS Off Blue light = PVS On
<b>3</b>	Source (PEP only)	Switches between media player and TV audio
<b>4</b>	Channel Up/Down	Moves from one category to another or from one subcategory to another
<b>5</b>	Volume Up/Down	Changes a value in a subcategory
<b>6</b>	Mute	Moves up a menu level
<b>7</b>	Closed Caption	This is not a functioning feature in the EU model.

## Viewing the System Settings

**Important:** *The information provided in this section is intended for system administrators and registered service technicians. Please do not share it with equipment users or non-administrative staff.*

Use the System setting mode to configure equipment settings in ways that benefit your users and your facility. Because a special code is required to gain access to these settings, only equipment administrators and registered service technicians can see them. Changes made to these settings are stored in the equipment, allowing them to persist after a loss of power.

The System Settings categories are:

- Setup
- Picture
- Audio
- Option
- Time

### **To view the System settings menu:**

1. Press **Power On/Off** to turn on the PVS.  
The power light is blue when the PVS is on.
2. Hold the **Channel Down** key, the **Volume Up** key, and the **Power On/Off** key at the same time for three seconds.  
The System settings menu should appear and the power light should flash red and blue, indicating that you are in the System setting mode.

**Note:** If you do not press a button within 15 seconds, the PVS screen returns to the normal viewing mode.

While you are in the System setting mode, use the keys on the console cap to navigate through the setup menus and make selections as discussed earlier in this chapter.

## Setup

Use the Channel settings to manage your TV channel list.

**Table 14. Channel settings**

Setting	Purpose
Auto Tuning	Select Yes, No, or SECAM L Search. Use the Search option to search for all available stations based on your signal format.
Manual Tuning	Add channels to your channel list.
Programme Edit	Add or skip channels on the channel list. <b>Note:</b> Skipped channel names appear in blue on the channel list and are not available to the TV viewer.
Input Source	Choose TV or VIDEO setting.
Reset	Return all system settings to their default settings.

## Picture

Use the Picture settings to change the television (TV) appearance.

**Table 15. Picture settings**

Setting	Values
Picture Mode	Standard Cinema Sport Game
Picture Setup	Contrast Brightness Sharpness Color

## Audio

Use the Audio settings to adjust the sound setup for the PVS.

**Table 16. Audio settings**

Setting	Values
Audio Volume	Off On
Balance	L50 - R50
Sound Mode	Standard Music Cinema Sport Game
Equalizer	200Hz 500Hz 7.5KHz

## Option

Use the Options settings to adjust the language setup for the PVS.

**Table 17. Picture settings**

Setting	Purpose
Menu Language	Select a language for the Setup menu.
Audio Language	Select a language for the audio.
Subtitle Language	Select a language for subtitles.
Country	Select your country code.

## Time

Use the Time settings to set the internal clock in the PVS and other time-related items.

**Table 18. Time settings**

Setting	Purpose
Clock	Select the date, time, and time zone for your facility.
Off Time	Select a time for the PVS to turn off (optional).
Sleep Timer	Use this setting to turn on a Sleep Timer. Select a value between 10 minutes and 240 minutes after which, the PVS will turn off (optional).

## About the Personal Entertainment Player (PEP)

The Personal Entertainment Player (PEP) option for the PVS allows your members to integrate their iPod and iPhone mobile digital devices with the exercise equipment and the PVS during their workouts. While your members are using the PEP, they can do the following things:

- Listen to their music collections
- Use the PVS screen to watch their video clips
- Recharge their devices

The following table lists the iPod and iPhone models that the PEP supports, and shows what kinds of information the PEP can exchange with each model.

**Table 19. iPod mobile digital devices supported by the PEP**

Device Model	Audio output	Audio and video
iPhone 4S, iPhone 4, or iPhone 3GS	x	x
iPod touch® (2nd, 3rd, and 4th generation)	x	x
iPod nano® (6th generation)	x	
iPod nano® (4th and 5th generation)	x	x

## Using the PVS and the PEP

The following procedures discuss how to use the Personal Viewing System (PVS) and its Personal Entertainment Player (PEP) option. Refer to them to help clarify PVS and PEP operation for your members as needed.

### To watch TV:

1. If necessary, press the **Power On / Off** key.
2. Plug your headphones into the headphone jack on the exercise equipment.
3. Use the PVS controls to adjust playback.

<i>If you want to ...</i>	<i>Use ...</i>
Adjust the volume	The <b>Volume Up</b> and <b>Volume Down</b> keys
Mute the sound	The <b>Mute</b> key
Change channels	The <b>Channel Up</b> and <b>Channel Down</b> keys
Switch between TV and an iPod or iPhone device	The <b>Source</b> key

### To use your iPod or iPhone mobile digital device with the PEP:

1. If necessary, press the **Power On / Off** key.
2. Plug the iPod connector into your iPod or iPhone device.
 

**Important:** *If the connector does not make proper contact when you first plug it in, your device may display a diagnostic message that it will not work with the attached accessory. If this happens, unplug the connector, wait two seconds, and try again.*

*The PEP charges the device while it is connected. If the device does not have enough battery power left to support playback, your music or video will begin to play after the batteries in the device are sufficiently charged.*
3. Plug your headphones into the headphone jack on the device.
4. Select the song, playlist, or video segment you want to play, then press the **Play** button on the device.



5. During your workout, use the device controls and the PVS controls together to adjust playback.

<i>If you want to ...</i>	<i>Use ...</i>	<i>On ...</i>
Adjust the volume	The <b>Volume Up</b> and <b>Volume Down</b> buttons	The device
Skip to the previous (or next) track or video segment	The track controls	The device
Pause playback	The <b>Pause</b> button	The device
Resume playback	The <b>Play</b> button	The device
Switch between the device and a TV channel	The <b>Source</b> key on the PVS	The PVS

**Note:** While you are working out, keep your iPod or iPhone device resting flat in the tray on the PVS. This protects the device from vibration and movement.

You can also connect your headphones to the headphone jack on the console during your workout. If you choose to do so, use the **Volume Up**, **Volume Down**, and **Mute** keys on the PVS to adjust the volume.



# Troubleshooting the PVS

Use this section to troubleshoot issues with PVS functionality.

**Table 20. Troubleshooting**

<b>Issue</b>	<b>What to Do</b>
No power	<ul style="list-style-type: none"><li>• Make sure the power light is lit on the console cap.</li><li>• Check the power adapter to see if the green power light is lit.</li><li>• If the Automatic Power On/Off feature is enabled, connect headphones to the jack.</li></ul>
No Closed Captioning	<ul style="list-style-type: none"><li>• Make sure Caption is <b>On</b> under the Caption feature in the System settings.</li><li>• Closed Captioning may not be available on the current channel. Check a different channel to see whether Closed Captioning works properly there.</li></ul>
Closed Captioning is delayed or garbled	<ul style="list-style-type: none"><li>• Keep in mind that a short delay between audible dialogue and closed captioning is common in live broadcasts.</li><li>• If reception or signal strength is poor, it can cause caption text to appear incorrectly. Check a different channel to see whether Closed Captioning works properly there.</li></ul>

<b>Issue</b>	<b>What to Do</b>
No picture	<ul style="list-style-type: none"> <li>• Make sure the PVS screen is fully plugged into a power outlet.</li> <li>• Push the <b>Power On/Off</b> key.</li> <li>• Try a different channel to rule out problems with the channel provider.</li> <li>• Turn the PVS screen off, and then turn it back on after one minute.</li> </ul>
Poor picture (across all channels and other sources)	<ul style="list-style-type: none"> <li>• Adjust controls such as Brightness, Color, and Sharpness under the Picture settings.</li> </ul>
No audio	<ul style="list-style-type: none"> <li>• Increase the audio level with the Volume Up key.</li> <li>• Test the headphone jack and replace it if necessary.</li> <li>• Make sure you are not in programming mode.</li> </ul>
Poor audio	<ul style="list-style-type: none"> <li>• Re-insert the plug into the headphone jack.</li> <li>• Try moving the plug in the jack to see if the sound improves.</li> <li>• Replace the headphone jack if necessary.</li> </ul>
Bars on screen	<ul style="list-style-type: none"> <li>• Try a different channel to rule out problems with the channel provider.</li> <li>• Make sure the thin coaxial cable is securely to the connector on the back of the PVS.</li> <li>• Make sure the main television cable is securely connected to the thin coaxial cable.</li> <li>• Check for sources of local electromagnetic interference.</li> </ul>

Issue	What to Do
Poor TV reception	<ul style="list-style-type: none"> <li>• Adjust Sharpness under the Picture settings.</li> <li>• Try a different channel to rule out problems with the channel provider.</li> <li>• Make sure the thin coaxial cable is securely to the connector on the back of the PVS.</li> <li>• Make sure the main television cable is securely connected to the thin coaxial cable.</li> <li>• Check for sources of local electromagnetic interference.</li> </ul>
Ghost images in picture	<ul style="list-style-type: none"> <li>• Try a different channel to rule out problems with the channel provider.</li> <li>• Make sure the thin coaxial cable is securely to the connector on the back of the PVS.</li> <li>• Make sure the main television cable is securely connected to the thin coaxial cable.</li> <li>• Check for sources of local electromagnetic interference.</li> </ul>

Issue	What to Do
<p>iPod or iPhone content cannot be heard or viewed through the PVS (PEP-equipped models only)</p>	<ul style="list-style-type: none"> <li>• Check that the connection between the iPod or iPhone device and the PVS is secure. If a protective cover is installed on the device, remove the cover and reconnect the device.</li> </ul> <p><b>Note:</b> You must remove the back cover of the console cap to perform the following tasks.</p> <ul style="list-style-type: none"> <li>• Verify that the green LED on the iPod interface board lights up when an iPod or iPhone device is connected to the PEP. If not, verify that the power cable is securely connected to the iPod interface board.</li> <li>• Check to make sure that the iPod/iPhone interface cable is securely connected, properly grounded, and not worn or damaged.</li> <li>• If the green LED lights up, verify that the two-wire cable between the two circuit boards in the cap is intact and is connected properly.</li> </ul>
<p>Users can select the iPod or iPhone device for viewing, but no video from the device appears on the screen (PEP-equipped models only)</p>	<ul style="list-style-type: none"> <li>• Check that the connection between the iPod or iPhone device and the PVS is secure. If a protective cover is installed on the device, remove the cover and reconnect the device.</li> </ul> <p><b>Note:</b> You must remove the back cover of the console cap to perform the following tasks.</p> <ul style="list-style-type: none"> <li>• Check both ends of the RCA audio/video cable. Make sure they are connected properly and securely.</li> <li>• Check to make sure that the iPod/iPhone interface cable is securely connected, properly grounded, and not worn or damaged.</li> </ul>

# Maintenance

To keep the equipment functioning properly, perform the minor maintenance tasks in this section at the intervals suggested. Failure to maintain the equipment as described in this section could void the Precor Limited Warranty.

**DANGER** To reduce the risk of electrical shock, always disconnect the equipment from its power source before cleaning it or performing any maintenance tasks. If the equipment uses an optional power adapter, disconnect the adapter.

## Cleaning the PVS Screen

Precor recommends that you clean the PVS at least one time per day.

### **To remove dust and dirt from the PVS:**

- Use a clean, soft, lint-free cloth moistened with isopropyl alcohol solution to remove dust, dirt, and fingerprints from the screen surface. The alcohol solution may range in strength from a 1:1 solution (total concentration between 45% and 50%) to a typical full-strength solution (normally 91% to 99%). You may also use commercially available isopropyl alcohol solutions within this range, or flat-screen cleaning wipes moistened with isopropyl alcohol.

- Wipe all other exposed surfaces with a soft cloth that you have moistened with a mixture of mild soap and water. Precor recommends a solution of 30 parts of water to 1 part of Simple Green® (for more information, visit [www.simplegreen.com](http://www.simplegreen.com)).

**Important:** *Do not use any acidic cleaners. Doing so will weaken paint, powder coatings, and other surface finishes and will void the Precor Limited Warranty. Never pour water or spray liquids directly onto the screen.*

Avoid using any corrosive chemicals on the console or screen.

Always clean the screen with a pre-moistened wipe or cloth. To prevent drips from seeping into the screen or console enclosure, **never spray cleaning liquid directly onto the screen.**

Apply cleaners with a soft, lint-free cloth. Avoid using gritty cloths.



## Limited Warranty for Precor Entertainment Products

PLEASE READ THESE WARRANTY TERMS AND CONDITIONS CAREFULLY BEFORE USING YOUR PRECOR PRODUCT. BY USING THE EQUIPMENT, YOU ARE CONSENTING TO BE BOUND BY THE FOLLOWING WARRANTY TERMS AND CONDITIONS.

### Limited Warranty.

Precor Incorporated ("Precor") warrants all new Precor products to be free from defects in materials and manufacture for the warranty periods set forth below. The warranty periods commence on the invoice date of the original purchase. This warranty applies only against defects discovered within the warranty period and extends only to the original purchaser of the product. Parts repaired or replaced under the terms of this warranty will be warranted for the remainder of the original warranty period only. To claim under this warranty, the buyer must notify Precor or your authorized Precor dealer within 30 days after the date of discovery of any nonconformity and make the affected product available for inspection by Precor or its service representative. Precor product deemed defective by a Precor representative, will be issued a return authorization number. **Precor will not accept returns without a return authorization number.** Precor reserves the right, at their option, to repair or replace the product after verification of defect. Product that fails after the warranty period expires will be repaired or replaced at the current part and labor pricing after authorization from the customer. Repairs are warranted for 90 days.

Precor's obligations under this warranty are limited as set forth below.

Warranty Periods and Coverage.

Cardio Theater Transmitters <i>xTV-T Wireless or Wired Floor Models</i> <i>xTVFM system transmitter</i>	3 Years	Parts & Labor
Cardio Theater Non-integrated Receivers <i>xTV-R Wireless or Wired Upper Models</i> <i>xTVFM system receiver</i>	1 Year	Parts & Labor
Cardio Theater 15" Non-integrated PVS and Controller	1 Year	Parts & Labor
Precor Experience Series Integrated 12" and 15" Screens	2 Years	Parts & Labor
Precor Experience Series Integrated Receiver	2 Years	Parts & Labor
Headphone Jack, USB Port, and iPod® Connector	90 Days	Parts Only

Conditions and Restrictions.

**This warranty is valid only in accordance with the conditions set forth below:**

The warranty applies to the Precor product only while

- It remains in the possession of the original purchaser and proof of purchase is demonstrated,
- It has not been subjected to accident, misuse, abuse, improper service, or mechanical, electrical or non-Precor modification.
- Claims are made within the warranty period.

This warranty does not cover damage or product failure caused by electrical wiring not in compliance with electrical codes or Precor owner’s manual specifications, or failure to provide reasonable and necessary maintenance as outlined in the owner’s manual.

Precor does not pay for labor outside of the United States and Canada.

Warranties outside the United States and Canada may vary. Please contact your local Dealer for details.

**This Limited Warranty shall not apply to:**

1. Software version upgrades.
2. Normal wear and tear, consumables and cosmetic items, including, but not limited to the following: labels.
3. Repairs performed on Precor products missing a serial number or with a serial tag that has been altered or defaced.
4. Service calls to correct installation of the product or instruct owners on how to use the product.
5. Pickup and delivery involved with repairs.
6. Any labor costs incurred beyond the applicable labor warranty period.
7. The user is cautioned that changes or modifications not expressly approved by the manufacturer of the product could void the user’s authority to operate the product.





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Installing a PVS 301068-710 rev G  
Warranty 301650-101  
June 2013