

Lambda 265, 365 and 465 Manual Magnetic Stirrer Assembly Installation Instructions

This instruction sheet describes the installation of this accessory which is used with the Lambda 265, 365 and 465 Spectrophotometer.

NOTE: *Read these instructions before you install this accessory.*

Contacting PerkinElmer

Supplies, replacement parts, and accessories can be ordered directly from PerkinElmer, using the part numbers.

See our website:

<http://perkinelmer.com>

PerkinElmer's catalog service offers a full selection of high-quality supplies.

To place an order for supplies and many replacement parts, request a free catalog, or ask for information:

If you are located within the U.S., call toll free 1-800-762-4000, 8 a.m. to 8 p.m. EST. Your order will be shipped promptly, usually within 24 hours.

If you are located outside of the U.S., call your local PerkinElmer sales or service office.

Features

- Easy to install
- Single-hand operation by just turning the adjustment wheel
- Stirring bar rotating evenly at variable speed
- Vertical mixing
- Ideal for small to medium stirring volumes of low-viscosity liquids
- Only one channel stirring available



Figure 1 Magnetic Stirrer Control Unit [P/N: N4101015]



PerkinElmer, 710 Bridgeport Avenue,
Shelton, CT 06484-4794, U.S.A

Produced in the USA.

Dimensions and Specifications

Physical Characteristic	Specification
Dimensions (mm)	65 (W) x 50 (D) x 45(H)
Weight (g)	79
Speed (rpm)	120 ~ 1,200
Stirring Power (W)	10
Operating Condition	0~40℃, 80% Humidity
Power	AC 100-240 V / 50-60 Hz / 0.4 A

Description

Configuration of the Magnetic Stirrer Assembly

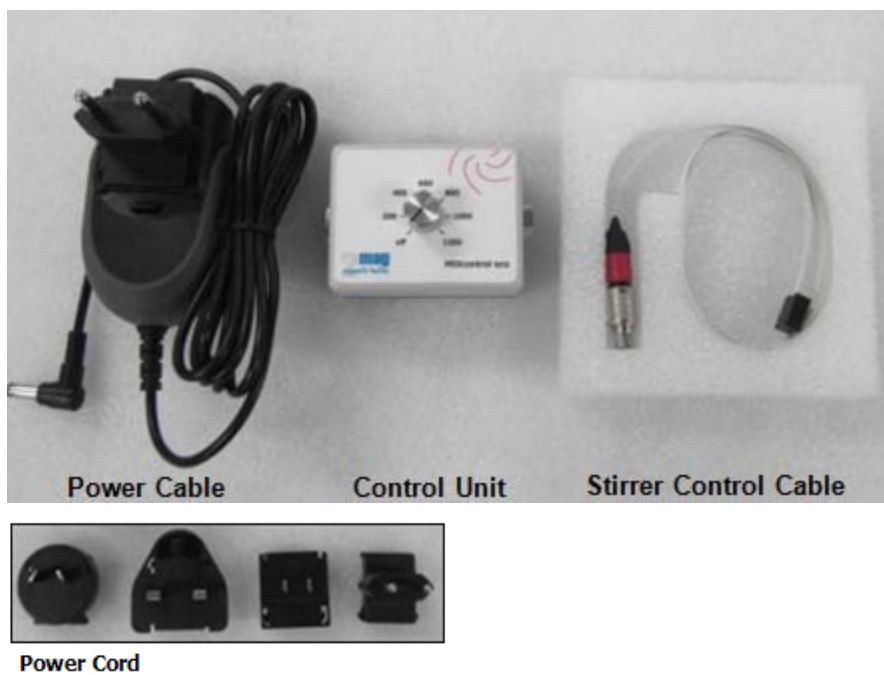
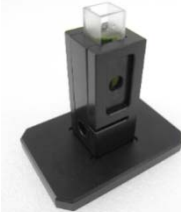






Figure 2 Configuration


Compatible Lambda 265 Cell Holders to Magnetic Stirrer Assembly

Accessory	Drawing
Single Cell Holder	
Water Jacketed Single Cell Holder	

Compatible Lambda 365 Cell Holders to Magnetic Stirrer Assembly

Accessory	Drawing
Single Cell Holder	
Water Jacketed Single Cell Holder	
Micro Cell Holder	

Compatible Lambda 465 Cell Holders to Magnetic Stirrer Assembly

Accessory	Drawing
Single Cell Holder (Upon request)	
Water Jacketed Single Cell Holder (Upon request)	
8 Cell Water Jacketed Cell Changer	
Water Jacketed Automatic Referencing Stage	

- Where, the cell holder will be modified to be connected with the magnetic stirrer only upon request.

Lambda 265 Installation

CAUTION *Make sure the instrument is turned off while installing this accessory.*
ATTENTION *Assurez-vous que l'instrument est éteint lors de l'installation de cet accessoire.*

1. Connect the plug of the power cable to the power input socket of the control unit.



Figure 3 Connecting the power cable

2. Connect the stirrer control cable to the 4-pin socket of the control unit.



Figure 4 Connecting the stirrer control cable

3. Using the M3 wrench, remove the screw in the single cell holder and disassemble the holder.



Figure 5 Removing the screw

4. Insert the stirrer head of the stirrer control cable into the single cell holder.



Figure 6 Inserting the stirrer head

5. Assemble the single cell holder with the stirrer head inserted, and tighten the screw using the M3 wrench.



Figure 7 Assembling the single cell holder

Lambda 365 Installation

CAUTION *Make sure the instrument is turned off while installing this accessory.*
ATTENTION *Assurez-vous que l'instrument est éteint lors de l'installation de cet accessoire.*

Connect to Single Cell Holder

1. Connect the plug of the power cable to the power input socket of the control unit.



Figure 8 Connecting the plug

2. Connect the stirrer control cable to the 4-pin socket of the control unit.



Figure 9 Connecting the stirrer control cable

- Using the M3 wrench, remove the screw in the single cell holder and disassemble the holder.



Figure 10 Removing the screw

- Insert the stirrer head of the stirrer control cable into the single cell holder.



Figure 11 Inserting the stirrer head

- Assemble the single cell holder with the stirrer head inserted, and tighten the screw using the M3 wrench.



Figure 12 Assembling the single cell holder

Connect to the Water Jacketed Single Cell Holder

1. Connect the plug of the power cable to the power input socket of the control unit.



Figure 13 Connecting the plug

2. Connect the stirrer control cable to the 4-pin socket of the control unit.



Figure 14 Connecting the stirrer control cable

3. Using the M3 wrench, remove the screw in the water jacketed single cell holder and disassemble the holder.



Figure 15 Removing the screw

4. Insert the stirrer head of the stirrer control cable into the water jacketed single cell holder.

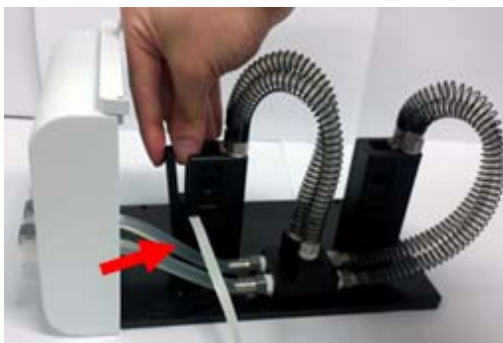


Figure 16 Inserting the stirrer head

5. Assemble the water jacketed single cell holder with the stirrer head inserted, and tighten the screw using the M3 wrench.
6. Using the screw driver remove the M2.5 Phillips round head screw with washer (M3*10L) and detach the Stirrer cable fixing block from the front cover as marked with the red box in the picture below. Take out the connecting port of the stirrer cable through the hole of the fixing block.



Figure 17 Detaching the Stirrer cable fixing block

7. After arranging the stirrer cable neatly, assemble the stirrer cable fixing block in the front cover using screw driver. Be careful that the stirrer cable does not block the light beam path to the cell holder.



Figure 18 Assembling the Stirrer cable fixing block

Connect to the Micro Cell Holder

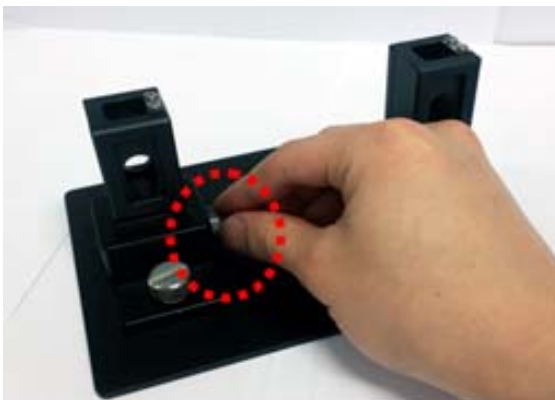
1. Connect the plug of the power cable to the power input socket of the control unit.

**Figure 19 Connecting the plug of the power cable**

2. Connect the stirrer control cable to the 4-pin socket of the control unit.

**Figure 20 Connecting the stirrer control cable**

3. Loosen the top-to-bottom adjustment knob by hand.

**Figure 21 Loosen the top-to-bottom adjustment knob**

- Using the M3 wrench, remove the screw in the micro cell holder and disassemble the holder.

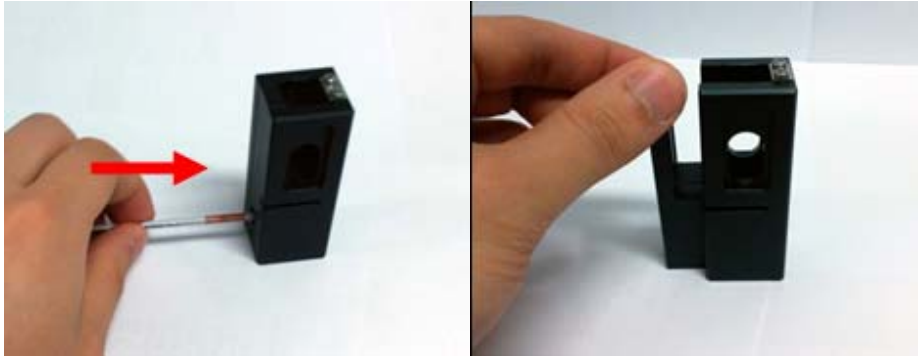


Figure 22 Removing the screw

- Insert the stirrer head of the stirrer control cable into the micro cell holder.



Figure 23 Inserting the stirrer head

- Tighten the screw using the M3 wrench and reassemble the micro cell holder to the base plate. Be careful that the stirrer cable does not block the light beam path to the cell holder.



Figure 24 Tightening the screw

Lambda 465 Installation

CAUTION *Make sure the instrument is turned off while installing this accessory.*
ATTENTION *Assurez-vous que l'instrument est éteint lors de l'installation de cet accessoire.*

Connect to the Single/ Water Jacketed Single Cell Holder

1. Connect the plug of the power cable to the power input socket of the control unit.



Figure 25 Connecting the plug of the power cable

2. Connect the stirrer control cable to the 4-pin socket of the control unit.



Figure 26 Connecting the stirrer control cable

- Using the M3 wrench, remove the screw in the single cell holder and disassemble the holder.



Figure 27 Removing the screw

- Insert the stirrer head of the stirrer control cable into the single cell holder.



Figure 28 Inserting the stirrer

- Assemble the single cell holder with the stirrer head inserted, and tighten the screw using the M3 wrench.

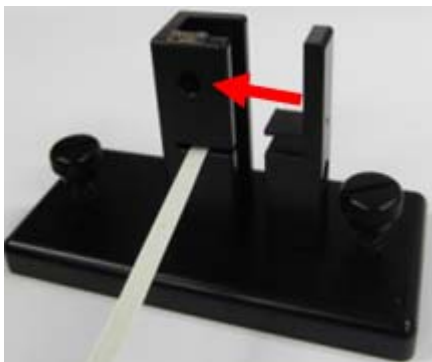


Figure 29 Tightening the screw

Connect to the 8 Cell Water Jacketed Cell Change

1. Connect the plug of the power cable to the power input socket of the control unit.



Figure 30 Connecting the plug of the power cable

2. Connect the stirrer control cable to the 4-pin socket of the control unit.



Figure 31 Connecting the stirrer control cable

3. Using the M4 wrench, remove the screw of the 8 cell water jacketed cell changer and disassemble the stirrer mount.



Figure 32 Removing the screw

4. Place the magnetic stirrer head on the stirrer mount of the 8 cell water jacketed cell changer.



Figure 33 Placing the magnetic stirrer head on the stirrer mount

5. Fix the stirrer mount to the 8 cell water jacketed cell changer and tighten the screw using the M4 wrench.

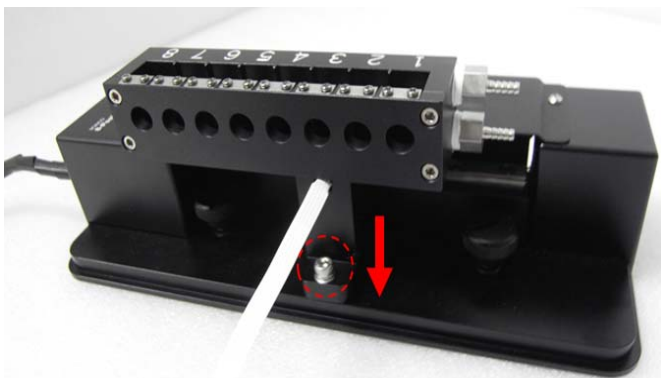


Figure 34 Fixing the stirrer mount

Connect to the Water Jacketed Automatic Referencing Stage

1. Connect the plug of the power cable with the power input socket of the control unit.



Figure 35 Connecting the plug of the power cable

2. Connect the stirrer control cable to the 4-pin socket of the control unit.



Figure 36 Connecting the stirrer control cable

3. Using the M4 wrench, remove the screw of the water jacketed automatic referencing stage and disassemble the stirrer mount.



Figure 37 Removing the screw

4. Place the magnetic stirrer head on the stirrer mount of the water jacketed automatic referencing stage.



Figure 38 Placing the magnetic stirrer head on the stirrer mount

5. Fix the stirrer mount to the water jacketed referencing stage and tighten the screw using the M4 wrench.

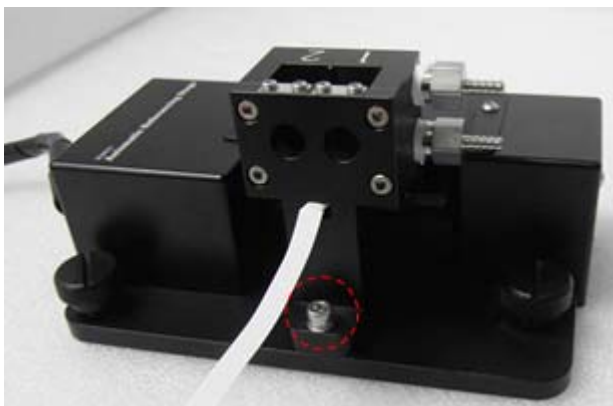


Figure 39 Fixing the stirrer mount

Troubleshooting

When a magnetic bar does not move

1. Check whether the control unit is powered on.
2. Check the connection status between the control unit and the stirrer control cable.
3. Check whether the rotating speed (rpm) is properly set in the control unit.

When a Magnetic Bar always rotates irregularly

It is unavoidable that magnetic bars are aged with time, for example through sterilization, at excessive temperatures, or mechanical stress (such as when you drop it).

1. Replace the magnetic bar with a new one.