

GE Monogram®

Installation

Instructions

36" Island  
Vent Hood

*Model*

*ZV850*



Before you begin – Read these instructions completely and carefully.

IMPORTANT – Save these instructions for local inspector’s use.

IMPORTANT – OBSERVE ALL GOVERNING CODES AND ORDINANCES.

Note to Installer – Be sure to leave these instructions with the Consumer.

Note to Consumer – Keep these instructions with your Owner’s Manual for future reference.

**WARNING: This appliance must be properly grounded. See “Electrical Supply,” page 5.**

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If you have a question concerning the installation of this product, call the GE Answer Center® Consumer Information Service at 800.626.2000, 24 hours a day, 7 days a week.

If you received a damaged vent hood, you should immediately contact your dealer or builder.

**For Monogram local service in your area, 1.800.444.1845.**

**For Monogram service in Canada, call 1.888.880.3030.**

**For Monogram Parts and Accessories, call 1.800.626.2002.**

**CAUTION!**

Due to the weight and size of this vent hood and to reduce the risk of personal injury or damage to the product, **TWO PEOPLE ARE REQUIRED FOR PROPER INSTALLATION.**

Proper installation is the responsibility of the installer. Product failure due to improper installation is not covered under the GE Appliance Warranty. See the Owner’s Manual for warranty information.

**WARNING:**

To reduce the risk of fire or electrical shock, do not use this hood with any external solid-state speed control device. Any such alteration from original factory wiring could result in damage to the unit and/or create an electrical safety hazard.

To reduce the risk of fire and to properly exhaust air, be sure to duct air outdoors. Do not vent exhaust air into spaces within walls or ceilings or into attics, crawl spaces or garages.

**WARNING: TO REDUCE THE RISK OF FIRE, USE ONLY METAL DUCTWORK.**

**TO REDUCE THE RISK OF FIRE, ELECTRICAL SHOCK OR INJURY TO PERSONS, OBSERVE THE FOLLOWING:**

A. Use this unit only in the manner intended by the manufacturer. If you have any questions, contact the manufacturer.

B. Before servicing or cleaning unit, switch power off at the service panel and lock service panel to prevent power from being switched on accidentally. If the service panel cannot be locked, fasten a tag or prominent warning label to the panel.

For general ventilating use only. Do not use to exhaust hazardous or explosive materials or vapors.

Structural framing, installation work and electrical wiring must be done by qualified person(s), in accordance with all applicable codes and standards including fire-rated construction.

Sufficient air is needed for proper combustion and exhausting of gases through the flue (chimney) of fuel burning equipment to prevent back drafting. Follow the heating equipment manufacturer’s guidelines and safety standards such as those published by the National Fire Protection Association (NFPA), and the American Society for Heating, Refrigeration and Air Conditioning Engineers (ASHRAE), and the local code authorities.

Local codes vary. Installation electrical connections and grounding must comply with applicable codes. In the absence of local codes, the vent should be installed in accordance with National Electrical Code ANSI/NFPA 70-1990 or latest edition.

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*Contents*

Model Available .....	3	Step 3, Check Installation Hardware .....	9
Required Accessory .....	3	Step 4, Mount Template .....	10
Recirculating Operation .....	3	Step 5, Install Support Frame .....	10
Product Dimensions .....	3	Step 6, Secure Wiring .....	11
Using Duct Cover Accessories .....	4	Step 7, Size and Install Ductwork.....	11
<b>Installation Preparation</b>		Step 8, Install Decorative Duct Covers .....	12
Tools and Materials Required .....	5	Step 9, Install Hood .....	13
Power Supply .....	5	Step 10, Connect Electrical .....	13
Duct Fittings .....	6	Step 11, Slide Duct Cover Down,	
Step 1, Advance Planning .....	7, 8	Install Side Utility Bars .....	14
<b>Installation</b>		Step 12, Install Filters .....	15
Step 2, Remove the Packaging .....	9	Step 13, Finalize Installation .....	15

# Design Information

## 36" Island Vent Hood

### Model Available

Model ZV850 This vent hood is designed to be used in vented ceiling mounted installations.

**NOTE:** Accessories to meet proper ceiling height are required to complete the installation.

### Required Accessory

ZX858 – For 8 ft. ceiling height. This kit includes decorative duct covers and support frames to reach an 8 ft ceiling height.  
 ZX859 – For 9 ft. ceiling height. This kit includes decorative duct covers and support frames to reach an 9 ft ceiling height.

ZX8510 – For 10 ft. ceiling height. This kit includes decorative duct covers and support frames to reach a 10 ft. ceiling height. Order the required accessory at the same time as the vent hood and have on site before installation.

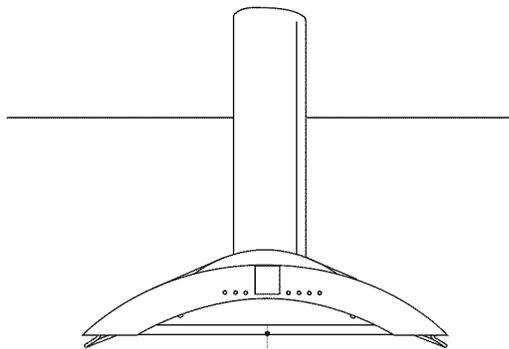
### Recirculating Operation

This hood may be installed for recirculating operation. One of the following kits is required and must be ordered with the hood.  
 ZXR858 – For 8 ft. ceiling height.  
 ZXR859 – For 9 ft. ceiling height.  
 ZXR8510 – For 10 ft. ceiling height.

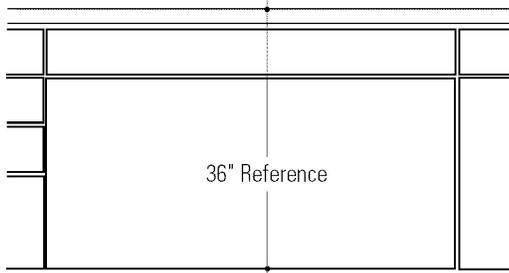
Both the hood and accessory must be on site at the time of installation. Follow the installation instructions packed with the accessory to complete the installation.

### Product Dimensions

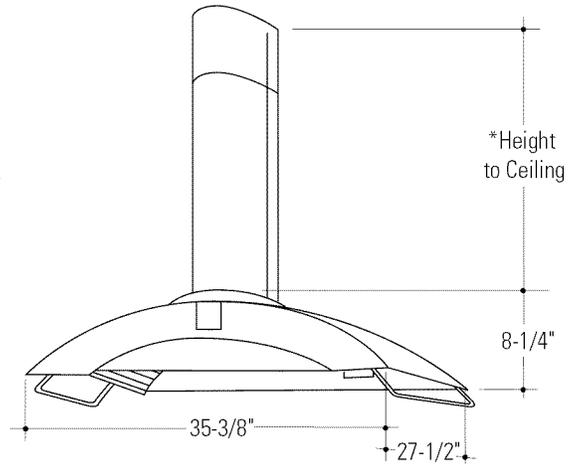
The vent hood must be installed 24" min. and 30" max. above the cooking surface. 25-1/2" is recommended for best venting performance and to insure that the duct cover meets the ceiling. The cooking surface should be at least 36" above the floor. Installation will be easier if the vent hood is installed before the cooktop and countertop is installed.



\*25-1/2" Recommended



36" Reference



\*26-1/4" for 8 ft. Ceiling  
 Using ZX858 Accessory  
 38-1/8" for 9 ft. Ceiling  
 Using ZX859 Accessory  
 50-1/8" for 10 ft. Ceiling  
 Using ZX8510 Accessory

\* The distance between the cooking surface and the bottom of the hood must be at least 24" and up to 30". The 25-1/2" recommended installation height, above the standard 36" countertop, will insure duct cover fit to the ceiling.

# Design Information

## 36" Island Vent Hood

### Using Duct Cover Accessories

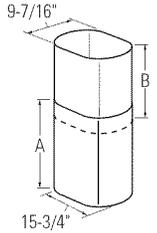
A duct cover accessory is required for all ceiling heights. Use this chart to determine the correct Duct Cover Accessory for 8 ft. to 10 ft. ceilings that must be ordered with the hood.

**ZV850SB Installation Heights**

Actual Ceiling Height	* Possible Hood Installation Height	Duct Cover Accessory
7' 11"	24-1/2"	ACCESSORY ZX858SB
8' 0"	25-1/2"	
8' 1"	25-1/2" to 26-1/2"	ACCESSORY ZX859SB
8' 2"	25-1/2" to 27-1/2"	
8' 3"	25-1/2" to 28-1/2"	
8' 4"	25-1/2" to 29-1/2"	
8' 5"	30" max.	
8' 6"	30" max.	
8' 7"	30" max.	
8' 8"	30" max.	
8' 9"	30" max.	
8' 10"	30" max.	
8' 11"	30" max.	
9' 0"	30" max.	ACCESSORY ZX8510SB
9' 1"	30" max.	
9' 2"	30" max.	
9' 3"	30" max.	
9' 4"	30" max.	
9' 5"	30" max.	
9' 6"	30" max.	
9' 7"	30" max.	
9' 8"	30" max.	
9' 9"	30" max.	
9' 10"	30" max.	
9' 11"	30" max.	
10' 0"	30" max.	

**ZV850 Duct Cover Dimensions**

Vented Installation	A	B
ZX858SB	14-3/16"	15-3/16"
ZX859SB	20-1/2"	22-1/2"
ZX8510SB	26"	27-1/2"



\* Based on 36" countertop height.

# Installation Preparation

## 36" Island Vent Hood

### Tools and Materials Required (not supplied)

- Tape measure
- Knife
- Spirit level
- Wire cutter
- Wire stripper
- Wire nuts
- Electric drill and 5/32" bit
- Phillips screwdriver
- Flat blade screwdriver
- Hammer
- Pliers
- 10 mm Hex wrench/socket
- Safety glasses
- Tape to mount template
- Gloves to protect against sharp edges
- 120V 60Hz, 15 or 20 Amp, 2 wire with ground. Properly grounded branch circuit.
- Strain relief for junction box cover.
- Plumb
- Center punch

### Power Supply

IMPORTANT - (Please read carefully)

 **WARNING** FOR PERSONAL SAFETY, THIS APPLIANCE MUST BE PROPERLY GROUNDED.

Remove house fuse or open circuit breaker before beginning installation.

Do not use an extension cord or adapter plug with this appliance. Follow National Electrical Code or prevailing local codes and ordinances.

### Grounding Instructions

The grounding conductor must be connected to a ground metal, permanent wiring system, or an equipment-grounding terminal or lead on the hood.

### Electrical supply

This vent hood must be supplied with 120V, 60Hz, and connected to an individual, properly grounded branch circuit, and protected by a 15 or 20 amp circuit breaker or time delay fuse.

- Wiring must be 2 wire with ground.
- If the electrical supply does not meet the above requirements, call a licensed electrician before proceeding.
- Route house wiring in the ceiling, as close to the installation location as possible. Allow an additional 3 feet length from ceiling joists to reach the junction box on the hood.
- Connect the wiring to the house wiring in accordance with local codes.

 **WARNING** **Warning:** The improper connection of the equipment-grounding conductor can result in a risk of electric shock. Check with a qualified electrician or service representative if you are in doubt whether the appliance is properly grounded.

# Installation Preparation

## 36" Island Vent Hood

### Duct fittings

**This Hood Must Use 6" Round Duct It Can Transition to 3-1/4" x 10" or 3-1/4" x 12" Duct**

Use this chart to compute maximum permissible lengths for duct runs to outdoors.

**Note:** Do not exceed maximum permissible equivalent lengths!

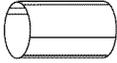
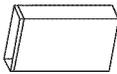
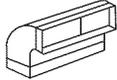
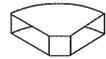
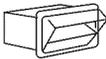
**Maximum duct length: 100 foot for range hoods.**

#### Flexible ducting:

If flexible metal ducting is used, all the equivalent feet values in the table should be doubled. The flexible metal duct should be straight and smooth and extended as much as possible.

Do NOT use flexible plastic ducting.

**Note:** Any home ventilation system, such as a ventilation hood, may interrupt the proper flow of combustion air and exhaust required by fireplaces, gas furnaces, gas water heaters and other naturally vented systems. To minimize the chance of interruption of such naturally vented systems, follow the heating equipment manufacturer's guidelines and safety standards such as those published by NFPA and ASHRAE.

Duct Piece	Dimensions	Equivalent Length*	Quantity Used	Total Equivalent Length
	Round, straight	1 ft. (per foot length)		
	3-1/4" x 10" straight	1 ft. (per foot length)		
	90° elbow	12 ft.		
	45° elbow	7 ft.		
	3-1/4" x 10" 90° elbow	14 ft.		
	3-1/4" x 12" 90° elbow	10 ft.		
	3-1/4" x 10" 45° elbow	8 ft.		
	3-1/4" x 12" 45° elbow	6 ft.		
	3-1/4" x 10" 90° flat elbow	33 ft.		
	3-1/4" x 12" 90° flat elbow	24 ft.		
	6" round to rectangular	2 ft.		
	Rectangular to 6" round	2 ft.		
	3-1/4" x 10" 6" round to rectangular transition 90° elbow	4 ft.		
	3-1/4" x 12" 6" round to rectangular transition 90° elbow	4 ft.		
	3-1/4" x 10" Rectangular to 6" round transition 90° elbow	4 ft.		
	3-1/4" x 12" Rectangular to 6" round transition 90° elbow	4 ft.		
	Round wall cap with damper	24 ft.		
	3-1/4" x 10" Rectangular wall cap with damper	24 ft.		
	3-1/4" x 12" Rectangular wall cap with damper	18 ft.		
	Round roof cap	33 ft.		

\*Actual length of straight duct plus duct fitting equivalent. Equivalent length of duct pieces are based on actual tests conducted by GE Evaluation Engineering and reflect requirements for good venting performance with any ventilation hood.

Total Duct Run \_\_\_\_\_

# Installation Preparation

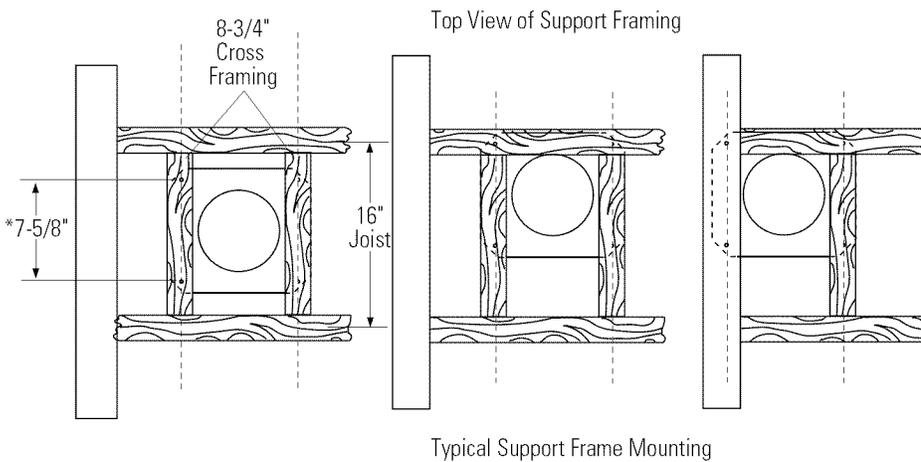
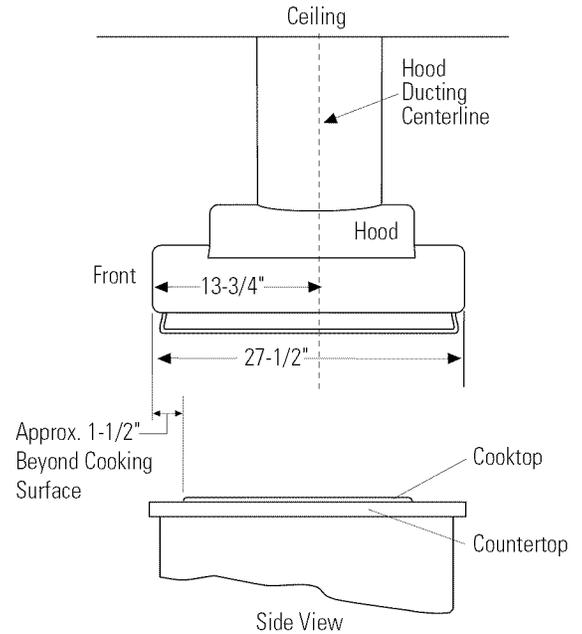
36" Island Vent Hood

## Step 1 Advance Planning

### Plan the location

Determine the exact location of the vent hood.

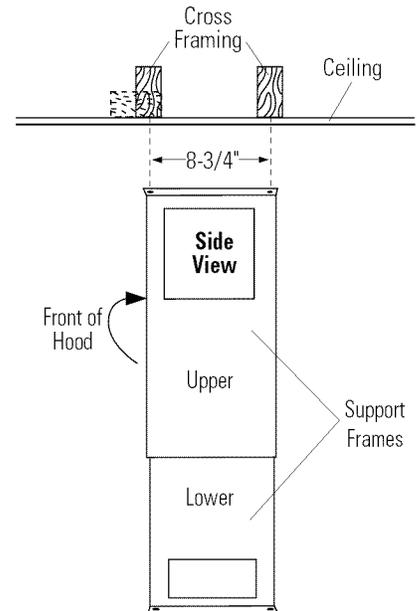
- Use a plumb to check location to be sure countertop/cooktop location below the hood will align exactly.
- The hood should project forward 1-1/2" beyond the front edge of the cooking appliance. See illustration.
- Observe the recommended 25-1/2" space between the cooking surface and bottom of hood.



\*The framing should be spaced 8-3/4" on the sides and 7-5/8" at the front from centerline to centerline to accept mounting screws in the vent support frame.

### Ceiling support structure

- At the hood location, install 2 x 4 cross framing between ceiling joists as shown.
- The 2 x 4 cross framing can be installed standing or flat, depending on duct run. See illustration of ductwork, page 8.

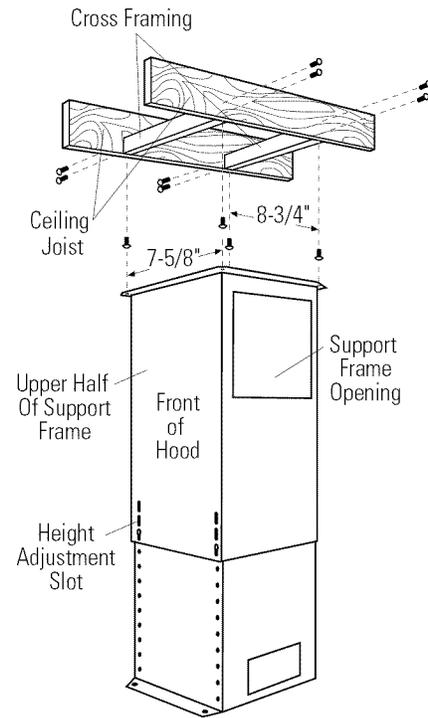


**Note:** The cross framing must be spaced 8-3/4" on the side from centerline to centerline in order to accept the hood mounting screws.

### Step 1 Advance Planning (continued)

- Arrange cross framing in the ceiling to suit the existing structure. See examples.
- Secure each 2 x 4 block with at least four (4), #10 wood screws, 3" long (minimum size screws, not supplied). Use 8 wood screws total for the two supports.
- **The cross framing must be accurately aligned to assure correct positioning of the hood.**
- **The cross framing must be level in all directions.** Check with a spirit level and adjust if necessary.

**IMPORTANT:** The ceiling structure must be capable of supporting the weight of the hood (approximately 100 pounds) and any inadvertent user contact loads. It is recommended that the hood support frame be supported by a minimum of 2 x 4 cross framing.

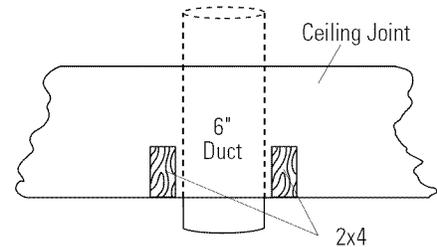


### Ductwork

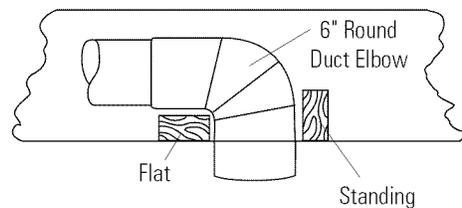
- Use the shortest and straightest duct route possible. For satisfactory performance, duct run should not exceed 100 feet equivalent length for any duct configuration.
- Refer to "Duct Fittings" chart to compute the maximum permissible length for duct runs to the outdoors.
- This vent hood must use 6" round duct. The 6" round duct can transition to 3-1/4" x 10" or 3-1/4" x 12".
- Install the house ductwork to run horizontally between ceiling joists or straight up through the roof.

### Finish the Ceiling

Finish the ceiling surface. Be sure to mark location of the ceiling joists and cross framing. Check to be sure that ceiling is level, use shims if necessary.



Vent Straight Up Through The Ceiling



Vent Between Ceiling Joists

# Installation

36" Island Vent Hood

## Step 2

Remove the Packaging

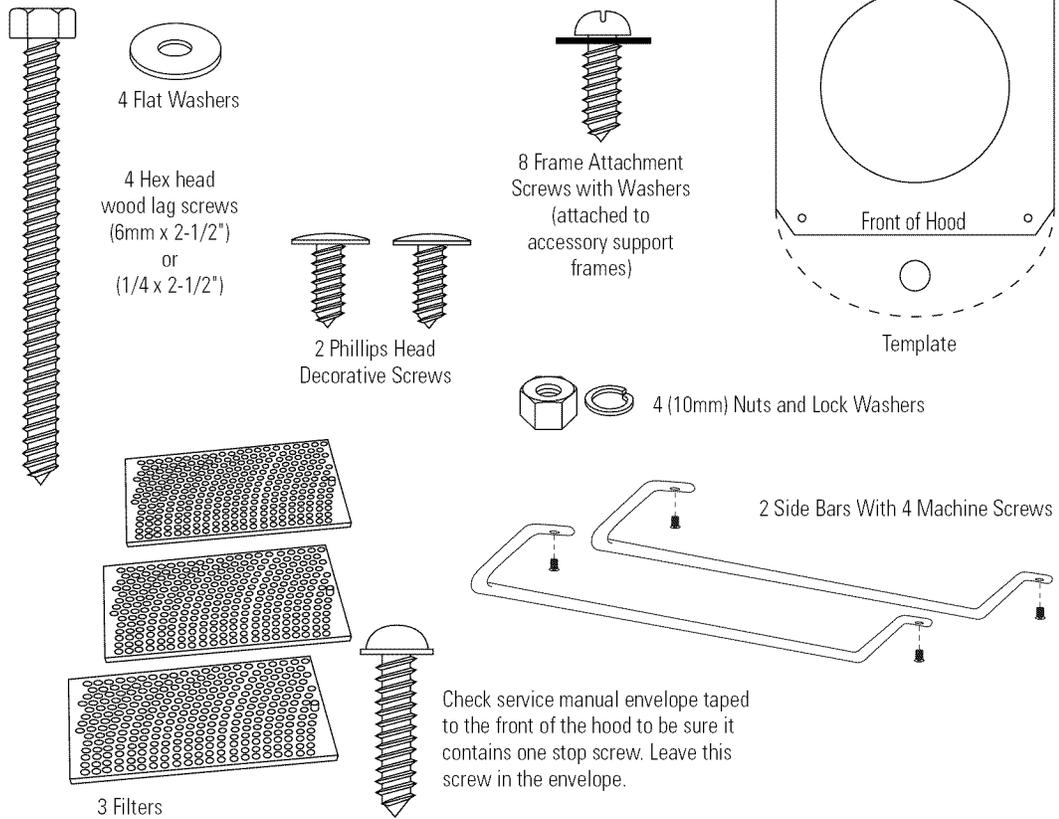
The vent hood is packed separately from the required accessory ZX858, ZX859 or ZX8510.

- Remove the frame, cover, parts box, side bars and packaging.
- Remove junction box cover.
- Install strain relief onto junction box cover.

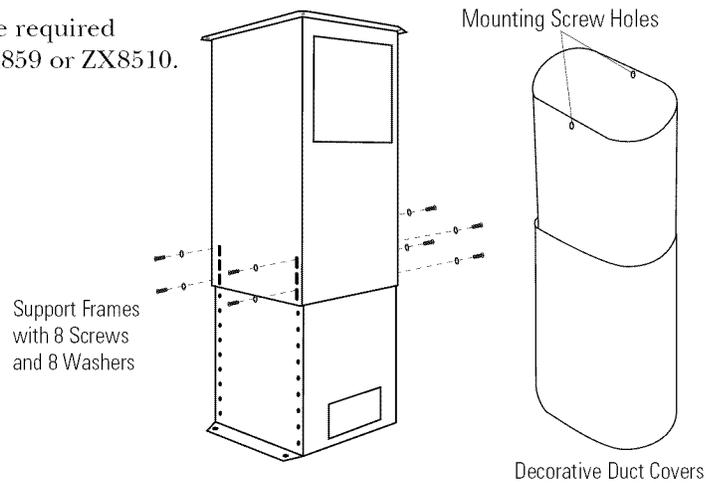
## Step 3

Check Installation Hardware

Locate the hardware accessory box packed with the hood and check contents.



Check contents of the required accessory, ZX858, ZX859 or ZX8510.

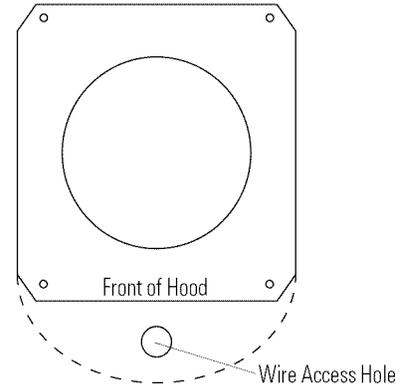


# Installation

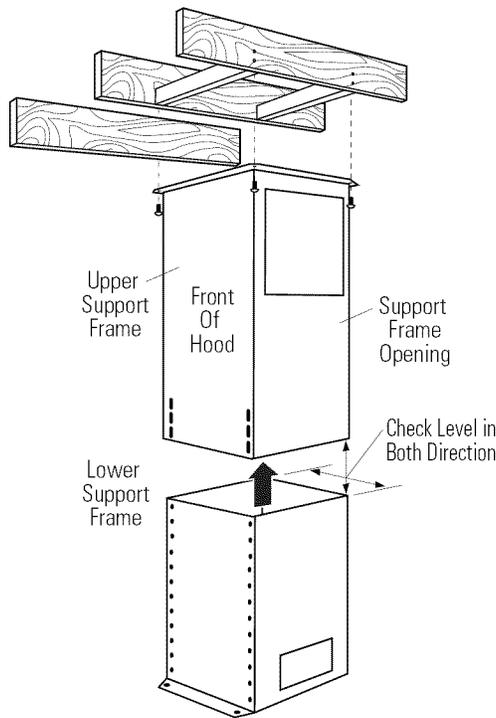
## 36" Island Vent Hood

### Step 4 Mount Template

- Align the template with the marks on the ceiling and tape in place.
  - Be sure the template is oriented correctly, with the front of the hood.
- Use a plumb to be sure the mounting holes will provide parallel alignment with the countertop below.
- Center punch all hole locations.
- Drill pilot holes in the 4 screw locations. Use a 5/32" bit and drill approximately 1-1/2" deep.
- Cut the 6-1/4" dia. duct opening and approx. 1" dia. wire access hole.

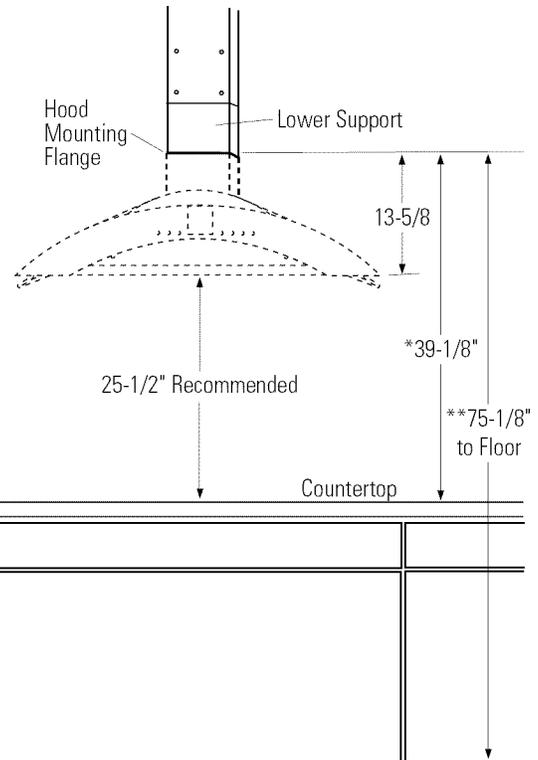


### Step 5 Install Support Frame



#### Install upper support frame

- Secure the upper support frame to the ceiling joists and/or cross framing with the 4 screws provided. For maximum rigidity and strength, the screws must be driven into the center of the joists and/or cross framing.
- Check to be sure the support frame is level, vertically and horizontally.



**\*Note:** 39-1/8" to top of hood flange can be increased up to 42" max.

**\*\*75-1/8" min. to floor, 77-7/8" max.**

#### Install lower support frame

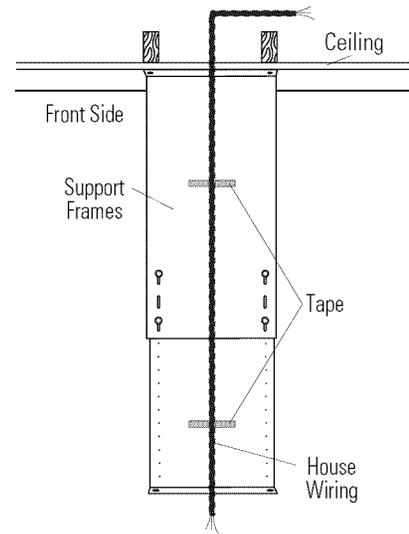
- Insert lower support frame (from required accessory ZX858, ZX859 or ZX8510) into the upper support frame and loosely secure with 8 screws and washers (4 on front and 4 on back sides).
- Adjust the lower support frame up or down to the desired height above the countertop. Tighten screws.

**Important:** Again, check to be sure the support is level in both directions. There is no way to level the hood after the hood is secured to the frame.

Step **6**  
Secure  
Wiring

### Wiring

- Route house wiring through the ceiling hole and pull a length to reach the hood junction box, approximately 6" below the support.
- Tape the wire to the front of the frame support to prevent damage during installation and service.



Step **7**  
Size And  
Install  
Ductwork

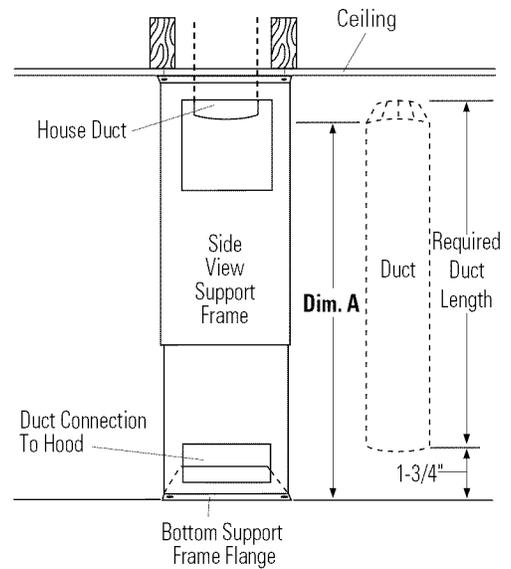
### To Find Required Duct Length:

- Measure from house duct flange to bottom of support frame. (Dimension A)
  - Add at least 1" to Dim. A for duct overlap at the top.
  - Subtract 1-3/4" for hood insertion into the bottom of the frame to determine required duct length.

- Cut the 6" duct to required length.

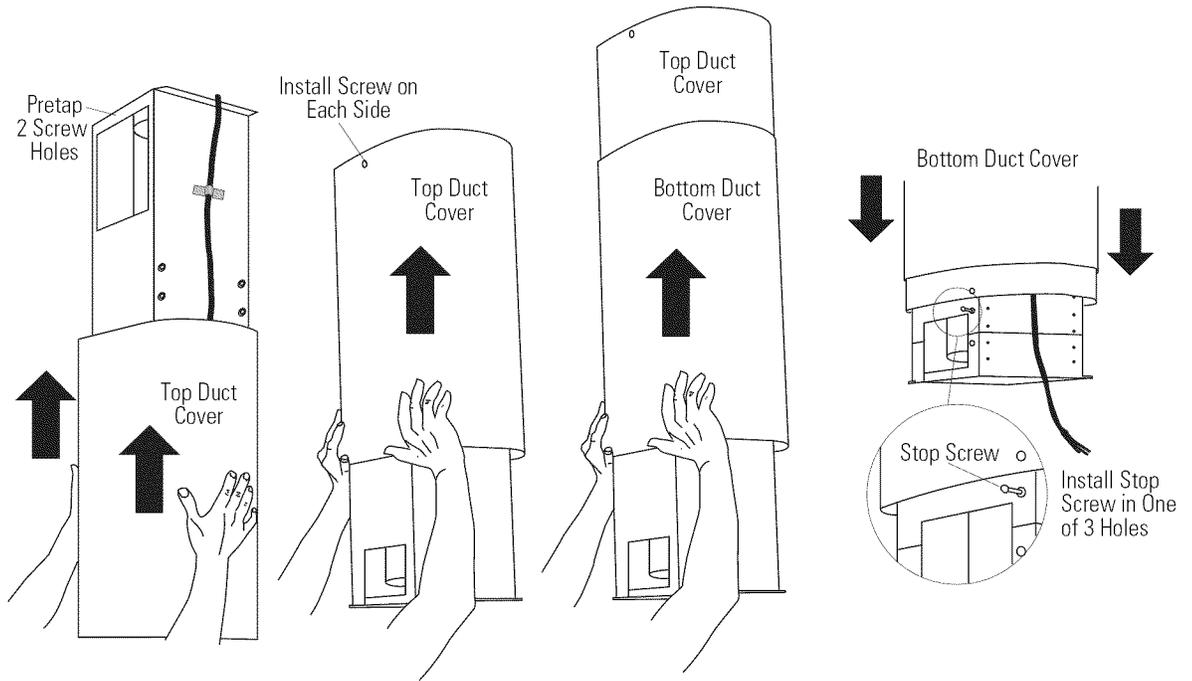
**Note:** The bottom of the duct must be external (female) connection to the top of the hood. The bottom end should be flared slightly, to facilitate installation of the hood.

- Install duct up through support frames and attach to house ducting with sheet metal screws.
- Seal the connection with duct tape.



## Step 8

### Install Decorative Duct Covers



- Pretap or drive decorative screw into the screw holes on the support frame. This will make screw installation easier.
- Separate the two decorative duct covers.
- Select the inside (top) cover, which has two screw holes in the top.
- Slide the decorative duct cover over the support frame and push to the ceiling.
- Attach to the hood support at the top with 2 supplied decorative screws.

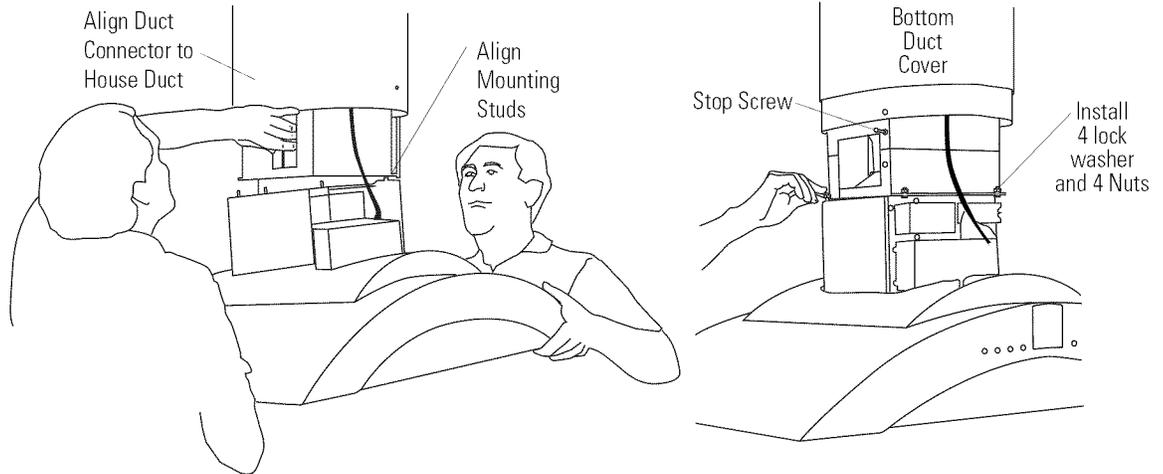
- Locate the stop screw in the envelope taped to the front of the hood. Set aside.
- Slide the bottom decorative duct over the installed top duct and push up past the stop screw hole location.
- Install the supplied temporary stop screw in one of 3 holes in the support frame or the top duct cover to prevent the bottom decorative duct cover from sliding down.

**CAUTION** The stop screw must be installed. Failure to do so could result in personal injury or damage to the duct cover.

# Installation

## 36" Island Vent Hood

### Step 9 Install Hood



**Note: TWO PEOPLE ARE REQUIRED TO COMPLETE THIS INSTALLATION!**

- Lift the hood up to the support frame. Carefully align the hood mounting studs into the support frame holes, and at the same time, guide the hood duct connector into the house duct.
- Install 4 nuts and lock washers to the mounting studs. Tighten with a 10mm wrench.

- Check hood level in both directions.
  - Check to be sure that the duct is positioned over the hood connector.
  - Seal the duct connection with duct tape.
- Note:** Do not drive screws through lower duct connection. Doing so will prevent proper damper operation.

### Step 10 Connect Electrical

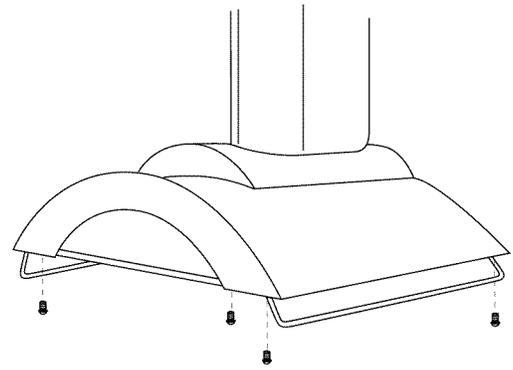
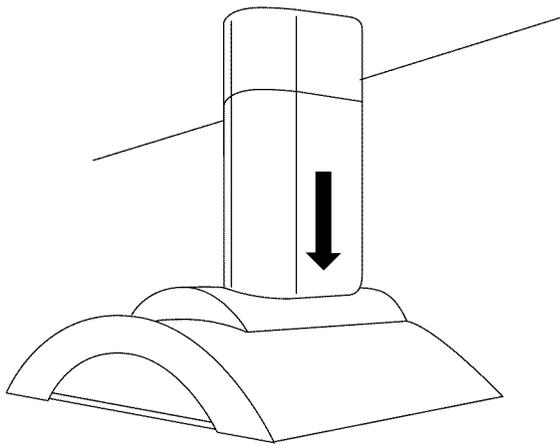
**Verify that power is turned off at the source.**



**WARNING**  
If house wiring is not 2-wire with a ground wire, a ground must be provided by the installer. When house wiring is aluminum, be sure to use U.L. approved anti-oxidant compound and aluminum-to-copper connectors.

- Install strain relief into the knockout of the junction box cover.
- Insert house wiring through strain relief and tighten.
- Connect white leads to branch circuit white lead.
- Connect black leads to branch circuit black lead.
- Connect green/yellow leads to branch circuit green or bare ground lead.
- Secure all connections with wire nuts on each electrical connector.
- Push wires into junction box and replace cover. Be sure wires are not pinched.

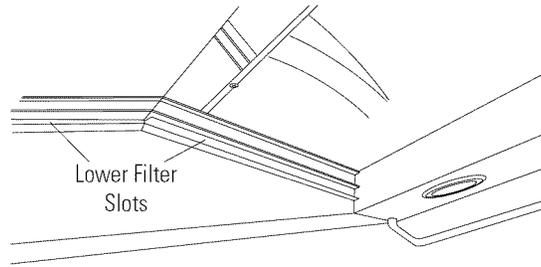
Step **11**  
*Slide Duct  
Cover Down,  
Install Side  
Utility Bars*



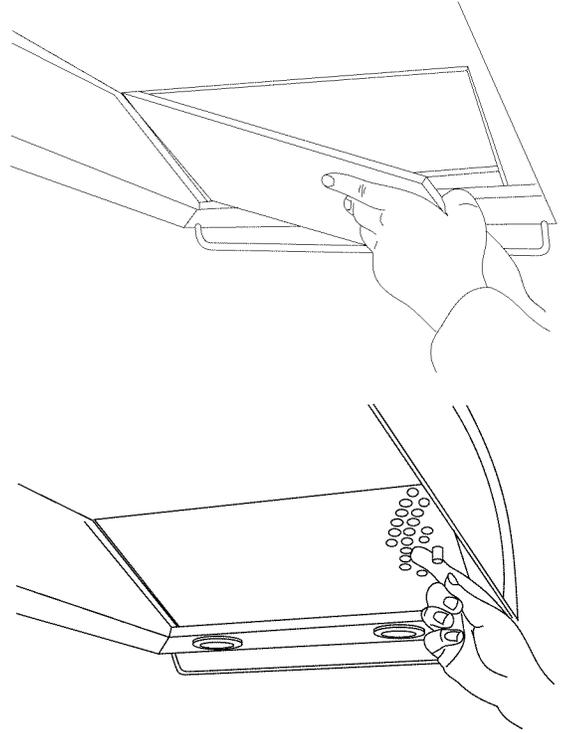
- Hold the decorative duct cover and remove the temporary stop screw. Return the screw to the service manual envelope for future use.
- Slide the lower duct cover down onto the hood.
- Install the side utility bars with screws as shown.

## Step 12

Install Filters



- Remove protective film on filters.
- Tip the filter into the **lower slots** at the rear of the opening. Lift the filter and pull the knob forward until the filter rests on the slots.
- To remove the filters, grasp the knob, push the filter towards the rear and tilt downwards.



## Step 13

Finalize Installation

- Remove the protective film covering the control panel on the front face of the hood, and any other packaging materials.
- Check all 4 lamps to assure tightness in sockets.
- Refer to the Owner's Manual for operating instructions.



**Monogram.**<sup>®</sup>

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GE Appliances  
General Electric Company  
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**NOTE:** While performing installations described in this book, safety glasses or goggles should be worn.

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**NOTE:** Product improvement is a continuing endeavor at General Electric. Therefore, materials, appearance and specifications are subject to change without notice.

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