# **INSTALLATION GUIDE**

**Downdraft Ventilation** 



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Features and specifications are subject to change at any time without notice. Visit wolfappliance.com/specs for the most up-to-date information.

Throughout this guide, dimensions in parentheses are millimeters unless otherwise specified.

## Important Note

To ensure the safe and efficient use of Wolf equipment, please take note of the following types of highlighted information throughout this guide:

IMPORTANT NOTE highlights information that is especially important.

CAUTION signals a situation where minor injury or product damage may occur if instructions are not followed.

WARNING states a hazard that may cause serious injury or death if precautions are not followed.



#### **Downdraft Installation**

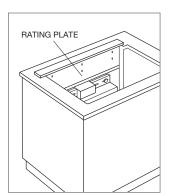
**IMPORTANT NOTE:** This installation must be completed by a qualified installer or Wolf authorized service center technician.

Read this entire installation guide prior to installation and save for the local inspector's reference. The homeowner should keep this installation guide for future reference.

Any questions or problems regarding the installation should be directed to your dealer or Wolf Appliance, Inc. at 800-332-9513. You can also visit our website, wolfappliance.com.

This appliance must be installed in accordance with National Electrical Codes, as well as all state, municipal and local codes. The correct voltage, frequency and amperage must be supplied to the appliance from a dedicated, grounded circuit which is protected by a properly sized circuit breaker or time delay fuse. The proper voltage, frequency, and amperage ratings are listed on the product rating plate.

Record the model and serial numbers before installing the downdraft ventilation system. Both numbers are listed on the rating plate, located above the blower housing on the front side of the downdraft, below the countertop. Refer to the illustration below.



Location of rating plate.

Wolf Downdraft

Model Number

Serial Number

### Before You Start

- Proper installation is the responsibility of the installer.
   Product failure due to improper installation is not covered under the Wolf warranty. Refer to the downdraft ventilation use & care guide for warranty details, or visit our website, wolfappliance.com.
- Check with local utilities for electrical codes that apply in your area. Local codes vary. Installation, electrical connections and grounding must comply with applicable codes. In the absence of local codes, this appliance should be installed in accordance with National Electrical Code ANSI/NFPA 70-1990 or latest edition.
- This appliance must be properly grounded. Refer to electrical requirements on page 8.
- Make sure you have the tools and materials necessary for proper installation.
- Any required service must be performed by a Wolf authorized service center.

#### Installation Considerations

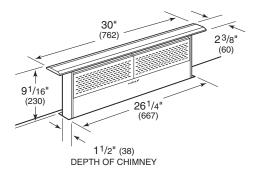
Wolf downdraft systems can be used with all Wolf induction, electric and gas cooktops, except unframed models. Wolf downdraft systems cannot be used with the steamer or fryer module and are not recommended for use with the electric grill module. A downdraft can also be used with sealed burner rangetop models SRT304 and SRT366. An accessory trim kit is necessary for this installation. Contact your authorized Wolf dealer for details.

Wolf downdraft ventilation systems can be mounted in an island, peninsula or standard wall location.

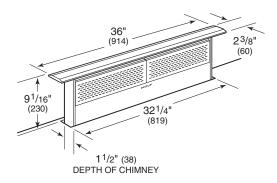
Wolf downdraft model DD30 will fit most 30" (762) wide cabinets, model DD36 will fit most 36" (914) wide cabinets and model DD45 will fit most 45<sup>1</sup>/<sub>2</sub>" (1156) wide cabinets. It is recommended that oversized cabinets be used for easier installation. The cabinet back may need to be removed.

## **Overall Dimensions**

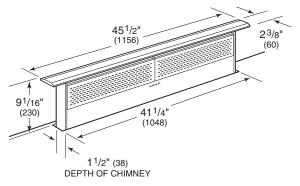
## MODELS DD30I AND DD30R



## MODELS DD36I AND DD36R



## MODELS DD45I AND DD45R



### Installation Specifications

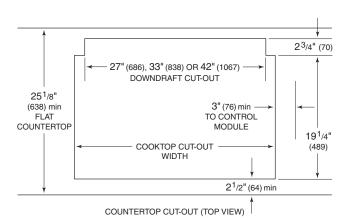
For installation of a downdraft system with a cooktop, refer to the cooktop installation guide for exact cooktop dimensions, countertop cut-out and cabinet requirements. The depth of the cooktop will affect the location of the downdraft in the countertop.

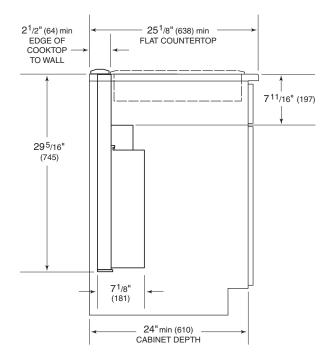
IMPORTANT NOTE: To install a downdraft system and a Wolf cooktop, you must allow for a minimum 25<sup>1</sup>/8" (638) flat counter space from front to back. A countertop with a raised lip or backsplash may not allow enough space for proper installation. 2<sup>3</sup>/8" (60) of flat countertop is required behind the cooktop and 1<sup>3</sup>/4" (44) is necessary between the back edge of the cooktop and inside of cabinet back.

Refer to the illustrations for specifications for a downdraft model DD30, DD36 or DD45 installed with a Wolf 30" (762) or 36" (914) cooktop or combination of cooktop and/or integrated modules.

If downdraft model DD30 is installed in combination with two integrated modules, an integrated support bracket for downdraft ventilation is required. The support bracket is not required for model DD45. Contact your authorized Wolf dealer for details. To obtain local dealer information, visit the find a showroom section of our website, wolfappliance.com.

#### INSTALLATION WITH COOKTOP





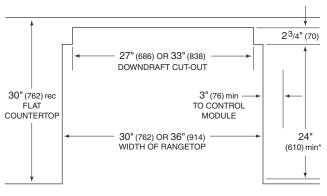
## Installation Specifications

For installation of a downdraft with a sealed burner rangetop, refer to the sealed burner rangetop installation guide for rangetop dimensions, rough opening and cabinet requirements.

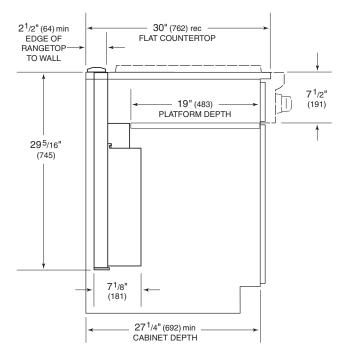
Refer to the illustrations for specifications for a downdraft model DD30 or DD36 installed with a Wolf sealed burner rangetop model SRT304 or SRT366.

For installation of a downdraft with a sealed burner rangetop, an accessory trim kit is required. Contact your authorized Wolf dealer for details. To obtain local dealer information, visit the find a showroom section of our website, wolfappliance.com.

### INSTALLATION WITH SEALED BURNER RANGETOP



COUNTERTOP CUT-OUT (TOP VIEW)



\*Additional depth may be required if rangetop is to be installed flush with cabinet face

### **Electrical Requirements**

Wolf downdraft ventilation systems require a separate, grounded 120 V AC, 60 Hz power supply. The service should have its own 15 amp circuit breaker, and a grounded 3-prong receptacle should be located within reach of the 2<sup>1</sup>/<sub>2</sub>' (.8 m) power cord. The specific location of the outlet is not critical, as long as it is within reach of the power cord that is located mid-way, top and bottom, on the right side of the downdraft. Certain installations may require that the electrical supply be placed in an adjacent cabinet.

IMPORTANT NOTE: If model DD30 is to be installed in a 30" (762) wide cabinet, model DD36 in a 36" (914) wide cabinet or model DD45 in a 45<sup>1</sup>/<sub>2</sub>" (1156) wide cabinet, the electrical outlet cannot be located on the back wall of the cabinet. The outlet can be placed in an adjacent cabinet within reach of the power cord. An access hole for the power cord must be drilled in the cabinet wall.

**IMPORTANT NOTE:** A ground fault circuit interrupter (GFCI) is not recommended and may cause interruption of operation.

You must follow all National Electrical Code regulations. In addition, be aware of local codes and ordinances when installing your service.

#### **A** CAUTION

The electrical outlet must be checked by a qualified electrician to be sure that it is wired with the correct polarity. Verify that the outlet provides 120 V AC and is properly grounded.

### **A** CAUTION

Do not use an extension cord or two-prong adapter. Electrical ground is required on this appliance. Do not remove the power supply cord ground prong.

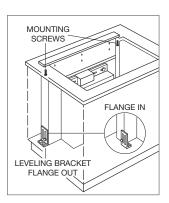
#### **Downdraft Installation**

#### CONTERTOP CUT-OUT

- Position the cooktop cut-out so that it is far enough forward in the countertop for the downdraft to fit behind it.
- Set the cooktop in place and slide it as far forward as possible. Center and square the cooktop with edges of countertop.
- Place the plastic template included with the downdraft against the back flange of the cooktop and centered.
   Trace around the template to mark the downdraft opening.
- Remove the cooktop from the countertop cut-out.
- Cut the downdraft opening. Be careful not to chip the edges of the countertop.

#### INSTALL THE DOWNDRAFT

- Set the downdraft into the opening. Extend the leveling brackets to the floor of the cabinet so the downdraft sits straight. Note that the leveling brackets can be removed and reattached in a different position. The flange of the leveling bracket may have to face inward in tight cabinet installations. Refer to the illustration below.
- Secure the downdraft to the countertop by holding the downdraft against the back of the countertop cut-out and tightening the two mounting screws (one on each end of the unit) on the underside of the countertop.
- Screw the leveling brackets to the bottom of the cabinet. Tighten the screws holding the leveling brackets to unit on each side.



Downdraft leveling brackets.

Downdraft Installation 10

#### Control Module

#### **AWARNING**

To reduce the risk of burns or ignition of clothing by reaching across the cooktop, the control module must be mounted at least 4" (102) from an element or burner.

**IMPORTANT NOTE:** The downdraft must be used with a Wolf-approved control module and top cover.

The 2<sup>3</sup>/<sub>8</sub>" (60) x 6<sup>5</sup>/<sub>8</sub>" (168) remote-mounted control module and stainless steel top cover are included with the downdraft. Also included are mounting brackets, an RJ45 connector and mounting hardware.

The remote-mounted control module can be positioned horizontally or vertically and located anywhere within 10' (3 m) of the downdraft assembly and a minimum of 4" (102) from the outer edge of any element or burner.

**IMPORTANT NOTE:** Do not position the control module where it will be in the way of cooking, where hot pans may be placed or where hot liquids could be spilled on the controls.

You will be required to drill three holes and connect the control module to the downdraft assembly using the cable provided. A 1" (25) diameter hole for the RJ45 connector cable will be centered horizontally and vertically on the back of the control module. Two 1/4" (6) diameter holes for the mounting screws will be located 2" (51) from the center of the RJ45 connector cable hole.

#### CONTROL MODULE INSTALLATION

- Mark the center of the control module on the counter top. Measure 2" (51) up (or left) and 2" (51) down (or right) to locate holes for the mounting screws.
- Carefully drill the three holes through the countertop.
   Be careful not to damage or chip the countertop surface while drilling.
- Check the countertop thickness. Set the control
  module in place and make sure the threaded studs are
  long enough to allow the nylon thumbnuts to fully
  engage. Thicker countertops may require that the holes
  be partially counter-sunk from below.
- Apply a bead of caulk all the way around the underside of the control module to prevent liquids from reaching the electrical connection or dripping through the holes in the countertop. Position the control module.
- From below the countertop, thread the two nylon thumbnuts onto the studs of the control module and hand tighten.

### CONTROL MODULE CONNECTION

- Connect the RJ45 connector cable to the back side of the remote-mounted control module.
- Connect the other end of the cable to the electrical connection located on the right side of downdraft assembly. Make sure that all connections are tight.
- Refer to the illustration placed on the front of the downdraft for the correct orientation of the RJ45 connector during installation into the downdraft assembly.

#### **Blower Considerations**

Downdraft models DD30I, DD36I and DD45I include a 500 CFM internal blower. In-line and remote blower assemblies are available for models DD30R, DD36R and DD45R through your authorized Wolf dealer. For local dealer information, visit the showroom locator section of our website, wolfappliance.com.

Blower options vary with the cooking surface, the volume of air that needs to be moved and the length of the duct run. A straight, short duct run with a limited number of elbows and transitions will allow the downdraft to perform most efficiently. A remote-mounted blower will minimize the amount of blower noise, but will not eliminate the noise completely.

Refer to ventilation recommendations in the Wolf design guide found on our website, wolfappliance.com.

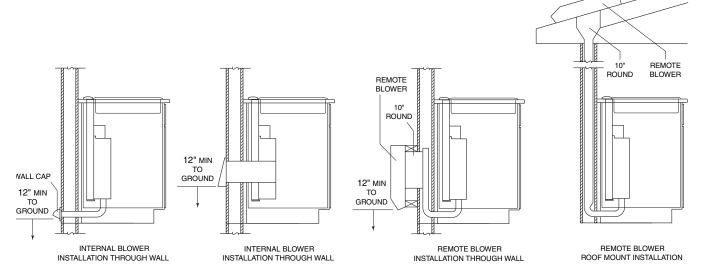
## **Ducting Considerations**

**IMPORTANT NOTE:** Consult a qualified HVAC professional for specific installation and ducting applications.

Downdraft models with an internal blower have a  $3^{1}/4^{\circ}$  (83) x 10° (254) duct and remote blower models have a  $3^{1}/4^{\circ}$  (83) x 14° (356) duct. Each can be transitioned to 8° (203) or 10° (254) round ductwork. All downdrafts have an adjustable discharge.

For best performance, 10" (254) round ductwork is recommended. The downdraft will operate most efficiently when the ductwork does not exceed 40' (12 m) in length.

Choose the ducting option that allows the shortest length of ductwork and a minimum number of elbows and transitions. Check the location of floor joists, wall studs, electrical wiring and plumbing for possible interference with the ductwork. Refer to the illustrations below for ducting options.



Internal blower ducting options.

Remote blower ducting options.

Downdraft Installation 12

#### **Ductwork Installation**

#### **A WARNING**

To reduce the risk of fire, use only metal ductwork.

**IMPORTANT NOTE:** Wolf downdraft ventilation systems must be vented to the outside.

**IMPORTANT NOTE:** Before cutting the hole in the cabinet for ductwork, check for interference with floor joists, wall studs, electrical wiring, plumbing and other obstacles.

- Cut the hole in the cabinet as well as holes in wall or floor as necessary for the ductwork.
- Mount the roof or wall cap and work back towards the cabinet, attaching all ductwork, elbows and transitions as previously planned. Tape all ductwork connections to make them secure and air tight.
- Connect the ductwork and transition (if required) to the downdraft. If necessary, loosen the nuts and screws that hold the blower in place, and slide the blower left or right to align with the ductwork. Retighten the screws and nuts. Refer to blower discharge adjustment on the following page.

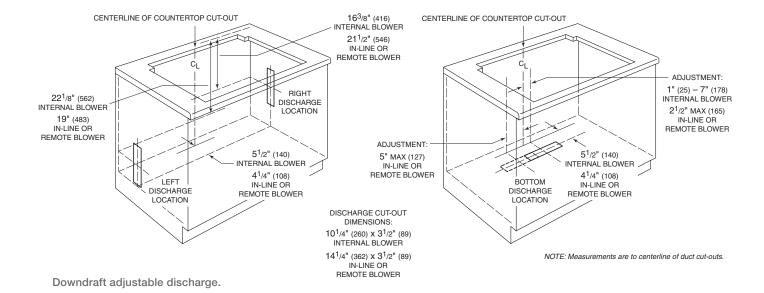
For installations where the ductwork is riveted to the unit, a  $3^{1}/4^{\circ}$  (83) x 10° (254) collar is provided for models with an internal blower and a  $3^{1}/4^{\circ}$  (83) x 14° (356) collar is provided for models with a remote blower. This will allow the blower to be removed and replaced easily for service without disturbing the ductwork.

**IMPORTANT NOTE:** Use duct tape to seal the connection between the blower outlet and ductwork. Support the weight of the ductwork as necessary to ensure sealed joints.

## Adjustable Discharge

Wolf downdraft systems have an adjustable discharge that will allow you to negotiate ducting around floor joists and other obstacles.

Three different discharge locations are available with sideto-side adjustment for accurate alignment of ductwork. Refer to the illustration below for the discharge location and adjustment that best suits your installation.



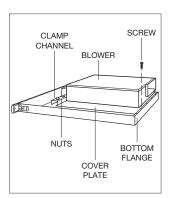
### Blower Discharge Adjustment

### DOWN DISCHARGE ADJUSTMENT

Adjusting the down discharge left or right will keep the blower discharge in the down position but allows some side-to-side adjustment.

Follow these steps if the position of the blower discharge needs to be moved left or right so that ductwork does not interfere with floor joists, plumbing or wiring below the downdraft assembly. Refer to the illustration below.

- Place the downdraft assembly on its back on a flat work surface.
- Loosen the 4 nuts and 2 clamp channels.
- Slide the blower to the desired position.
- Use the supplied cover plate to close any open space.
- Tighten nuts to secure the top of blower and use sheet metal screws through the bottom flange to secure the bottom of the blower.



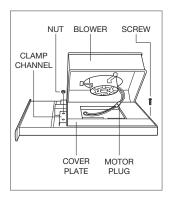
Down discharge adjustment.

#### LEFT OR RIGHT SIDE DISCHARGE

Substituting down discharge with left or right discharge will switch the blower discharge from the down position to the left or right of downdraft assembly.

Follow these steps if it is necessary to rotate the blower to the left or right discharge location. Refer to the illustration below

- Place the downdraft assembly on its back on a flat work surface.
- Remove the 4 nuts and 2 clamp channels.
- Carefully lift the blower and disconnect the motor plug if necessary. Reposition the blower for left or right side discharge and reconnect the motor plug.
- Use the supplied cover plate to close any open space.
- Replace the clamp channels and use the nuts to secure the blower in the new position.
- Use sheet metal screws through the bottom flange to secure the bottom of the blower.



Left or right side discharge.

Downdraft Installation 14

## Wiring Connections

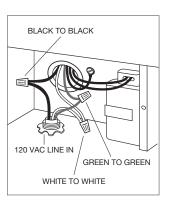
### INTERNAL BLOWER

- Mount a standard 120 V AC electrical box, with 3-pronged grounded receptacle, inside the cabinet or adjacent cabinet. Make sure it is located within reach of the 2<sup>1</sup>/<sub>2</sub>' (.8 m) power cord.
- Run the appropriate power cable into the cabinet and connect it to electrical box and outlet.
- Plug the downdraft power cord into the outlet.

#### REMOTE BLOWER

**IMPORTANT NOTE:** For mounting and installation of the remote blower, refer to the installation instructions for your specific blower.

- Mount a standard 120 V AC electrical box, with 3-pronged grounded receptacle, inside the cabinet or adjacent cabinet. Make sure it is located within reach of the 2<sup>1</sup>/<sub>2</sub>' (.8 m) power cord.
- Run the appropriate power cable into the cabinet and connect it to electrical box and outlet.
- The remote blower may not exceed a 6.0 amp rating.
- Run 2-wire plus ground power cable from the remote blower to the electrical box on the remote blower adapter plate.
- Connect the downdraft wiring to the power cable from the remote blower. Wire black to black, white to white and green to green or bare wire. Refer to the illustration below.
- Replace the electrical box cover.
- Plug the downdraft power cord into the outlet.



Remote blower wiring.

### **Troubleshooting**

**IMPORTANT NOTE:** If the downdraft ventilation system does not operate properly, follow these troubleshooting steps:

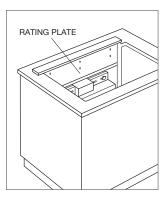
- · Verify that power is being supplied to the downdraft.
- Check electrical connections to ensure that the installation has been completed correctly.
- Refer to the troubleshooting guide in the Wolf downdraft ventilation use & care guide.
- If the downdraft still does not work, contact a Wolf authorized service center. Do not attempt to repair the downdraft yourself. Wolf is not responsible for service required to correct a faulty installation.

#### Service Information

If service is necessary, maintain the quality built into your gas range by calling a Wolf authorized service center.

To obtain the name and number of a Wolf authorized service center, check the contact & support section of our website, wolfappliance.com or call Wolf customer service at 800-332-9513.

When calling for service, you will need the model and serial numbers of the downdraft. This information is found on the product rating plate, located above the blower housing on the front side of the downdraft, below the countertop. Refer to the illustration below.



Location of rating plate.





