



HOODS, GREASE REMOVAL DEVICES, AND EXHAUST DUCT SYSTEMS

LOSS CONTROL BULLETIN

grinnellmutual.com

Cooking equipment that produces smoke or grease-laden vapors must be equipped with an exhaust system. The most common type of cooking equipment that meets this requirement includes deep-fat fryers, grills, electric and gas stoves, and surface burners. Pizza ovens do not meet this requirement and do not require an exhaust system.

Hoods, grease removal devices, and exhaust duct systems shall have a clearance of at least 18 inches from combustible materials, including structural building members. Clearances may be reduced when combustible material is protected as follows:

- 9-inch clearance if 0.013-inch (28 gauge) sheet metal is used spaced on 1-inch non-combustible spacers
- 3-inch clearance if 0.027-inch (22 gauge) sheet metal is used on 1-inch mineral wool bats or ceramic fiber blanket reinforced with wire mesh or equivalent spaced on 1-inch non-combustible spacers

HOODS

All seams, joints, and penetrations of the hood enclosure shall have a liquid-tight continuous external weld to the hoods lower outermost perimeter. Internal welds must be formed smooth or ground smooth so they don't trap grease and are easily cleanable.

Wall-mounted hood assemblies shall be mounted tight against the wall so grease vapor does not get between the wall and the hood assembly.

Hoods and their exhaust air volumes shall be sized and configured to provide for the capture and removal of grease-laden vapors. Performance tests should be conducted to

determine that exhaust air volume is adequate.

Lighting units in hoods are allowed if they are listed for that purpose. All lighting units in the hood should be globed.

GREASE REMOVAL DEVICES

Listed grease filters, listed baffles, or other listed grease removal devices for use with commercial cooking equipment shall be used. Mesh filters shall not be used.

The distance from the grease removal device and the cooking surface shall be as great as possible but should not be less than 18 inches.

Grease filters shall be listed and constructed of steel or other listed material. They should be of rigid construction. They must be arranged so that all exhaust air will pass through the filter. The filters must be easily accessible and removable so they can be cleaned regularly.

EXHAUST DUCT SYSTEMS

Exhaust systems shall be operated whenever cooking equipment is turned on.

Ducts shall not pass through fire walls. All ducts shall lead, as directly possible, to the exterior of the building. Ductwork cannot terminate within an exterior frame wall. The system shall not be interconnected with any other building ventilation or exhaust system. Access panels should not be obstructed for any reason.

Ductwork shall be provided with adequate openings so that cleaning can be conducted. Openings shall be protected with

HOODS, GREASE REMOVAL DEVICES, AND EXHAUST DUCT SYSTEMS

LOSS CONTROL BULLETIN

grinnellmutual.com

access panels that are the same material and thickness of the duct and must be grease-tight.

In all buildings where vertical fire barriers are penetrated or that are more than one story in height; or in one-story buildings where the roof-ceiling assembly is required to have a fire resistance rating, the duct shall be enclosed in a continuous enclosure.

Buildings less than four stories in height shall have an enclosure with a minimum one-hour fire resistance rating. Buildings more than four stories in height shall have an enclosure with a minimum two-hour fire resistance rating.

Enclosures of combustible construction shall have a minimum clearance of at least 18 inches from the exhaust duct or fan. Non-combustible or limited combustible enclosures shall have a minimum clearance of at least 6 inches.

The exhaust system shall terminate outside the building with a fan or duct or through the roof or to the roof from outside.

Rooftop terminations shall be a minimum of 10 feet from adjacent buildings, property lines, and air intakes. They shall be a minimum of 5 feet of horizontal clearance from the outlet to any combustible structure. Where the fan attaches to the ductwork, there shall be a minimum 18-inch clearance from the ductwork to the roof surface. The fan shall discharge a minimum 40 inches from the roof surface.

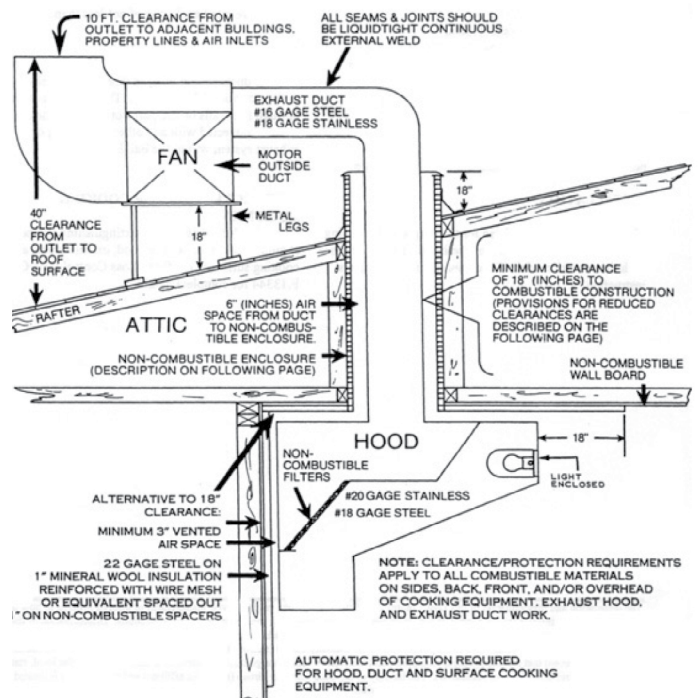
Wall terminations must be through a non-combustible wall with a minimum 10 feet from adjacent buildings, property lines, electrical equipment or lines, air intakes, or operable door or window at

or below the plane of termination. The exhaust flow must be directed perpendicularly outward from the wall or upward.

Wiring systems of any type shall not be installed in ducts. Motors or lights may be permitted if they are specifically listed for that purpose.

MAINTENANCE

The hood and exhaust duct system should be cleaned at least semi-annually by a licensed contractor. Flammable solvents or cleaners should not be used. Records of this cleaning must be maintained. These records must include the name of the company and person performing the work and the date.



PREVENTION IS EVERYONE'S BUSINESS. TRUST IN TOMORROW.® CONTACT YOUR AGENT TODAY TO LEARN ABOUT OUR LOSS PREVENTION PROGRAMS.

This bulletin has been prepared as an underwriting reference for members of Grinnell Mutual Reinsurance Company and does not signify approval or disapproval by the Company of any product or device. Please do not copy or reproduce any portion of this bulletin without the written permission of Grinnell Mutual Reinsurance Company. The information included in this publication and program was obtained from sources believed to be reliable, however Grinnell Mutual makes no guarantee of results and assumes no liability in connection with its use. It is the user's responsibility to comply with any applicable regulations or laws. Information obtained from or via Grinnell Mutual should not be used as the basis for legal advice, but should be confirmed with alternative sources. Grinnell Mutual Reinsurance Company, Grinnell Mutual, and coordinating logos or marks are registered trademarks of Grinnell Mutual Reinsurance Company. © Grinnell Mutual Reinsurance Company, 2017.

AUTO | HOME | FARM | BUSINESS

GRINNELL
MUTUAL

LCB 14 (8-17)