Natural Gas and Cooking: Safety Facts and Tips

When you think of using your stove top safely, you probably think about methods to prevent fires and burns — and those are important considerations! However, did you know that another crucial part of cooking safety is related to ventilation provided by your hood vent? That's right! Because all cooking — no matter what type of stove you have (natural gas, propane or electric) — creates airborne emissions from the cooking process. Therefore, it is important to use your hood fan to remove airborne emissions from the home.

Let's clear the air on stove safety, with some facts and tips¹:

According to Health Canada (the national authority on indoor air emissions and human health), all cooking creates airborne emissions and particulate matter (PM), whatever the fuel or technology used. Ventilation is the easiest and most effective way to best mitigate any emissions concerns related to cooking.

PM are small particles of cooked food, fat, or oil that may become airborne when you fry, deep-fry, roast, broil, sauté, toast, bake, or burn food. Microwaving, boiling or steaming your food produces fewer particles, but can still produce moisture. Use a hood vent to reduce the risk of mold when boiling or steaming your food.



Ideally, **install a range hood** that covers all stove burners and vents to the outside of the building. Range hoods and all cooking equipment should be **inspected and maintained annually**, to maximize the energy efficiency of your appliances.



A properly installed vented range hood is effective in reducing indoor concentrations of PM, nitrogen dioxide and other emissions from any type of cooking. Run the range hood exhaust on high (approximately 300 cubic feet/minute) during cooking, and even after cooking, to reduce exposure to cooking-related pollutants by more than 80% and remove residual heat from the cooking process out of the home.

Put it on the back burner! Cooking on the back burner and using the range hood



on the highest setting will help lower humidity and reduce PM.

Consider using a heat recovery ventilator (HRV) that continuously replaces stale indoor air with outside air. For more information on HRVs, refer to Natural Resources Canada's website.

If your range hood does not vent to the outside, it is useful to also **open windows** in order to allow proper ventilation.

If your stove is not functioning properly, call a licensed professional to ensure repairs are done properly and safely.

All stoves and range hoods are built and installed to standards set by the Canadian Standards Association (CSA/ANSI Z21.1-2018/CSA 1.1-2018, *Household cooking gas appliances*). We recommend Canadians follow health guidelines developed by federal authorities, which in the case of indoor air quality and health is Health Canada. Please refer to their <u>fact sheet</u> on cooking and indoor air quality for more information. We also recommend if referring to third party studies, one should assess who has contributed to the research, and review the methodologies used by the researchers to understand if the results are fact-based, peer-reviewed and unbiased.

We hope this information is helpful and if you have comments or questions, please contact us at info@cga.ca.

