

HQS Field Guide

Part E, Exhibit 2

This field guide provides guidance on completion of inspection forms for the Adelaide Building. Although this document has been designed to minimize the amount of ambiguity and subjectivity in the application of the requirements, there will be situations where the professional judgments of the inspector will be necessary to differentiate between a pass or fail condition.

1. Page 1, Inspection Type

- ✓ Check the type of inspection to be conducted
- ✓ Unit Inspection
 - Input the Unit Number
 - Input the Inspection Date
- ✓ Building Inspection – input the Inspection Date

2. Page 1, Inspection Results

This section is completed after the inspection form has been filled in. Check if the Housing Quality Standard Inspection is a Pass, Fail or Inconclusive.

Pass: Pass the inspection when it meets the minimum housing quality standards. Any additional conditions described in the right hand column of the form should serve to (a) establish the precondition, (b) indicate possible additional areas to negotiate with the owner, and (c) aid in assessing the reasonableness of the rent.

Fail: If there are any checks under the column headed “Fail” the unit/building fails the minimum housing quality standards. Discuss with the owner the repairs necessary to bring the unit up to the standard. When a fail item is passed, complete the “Date Approved” space on the right side of each page. Fail items

must be corrected in order to pass the inspection.

Inconclusive: If there are areas unable to be inspected, obtain additional information necessary for a decision (question owner or tenant as indicated in the item instructions given in this checklist). Inconclusive items must be finalized in order to pass the inspection.

For each item listed below, circle whether it is a “Pass” or “Fail”. See sections below for standards.

- ✓ Smoke Detector
- ✓ Carbon Monoxide Detector
- ✓ Fire Extinguisher

Print the inspector’s name.

2.1 Smoke Detector

At least one battery-operated or hard-wired smoke detector must be present and working on each level of the unit/building. Smoke detectors must be installed in accordance with and meet the requirements of the National Fire Protection Association Standard (NFPA) 74 (or its successor standards).

If the dwelling unit is occupied by any hearing-impaired person, smoke detectors must have an alarm system designed for hearing-impaired persons as

specified in NFPA 74 (or successor standards).

Staff may obtain a report from the owner for an automated smoke/fire alarm system that is tested and kept in proper order from the company that inspects and maintains the system.

2.2 Carbon Monoxide Detectors

AHFC Housing Quality Standards (HQS) require operable carbon monoxide (CO) detectors. Review *Carbon Monoxide Detectors* for specific instructions to pass or fail. If it is present and in working order, circle "P" for pass. If it is not present or is not in working order, circle "F" for fail.

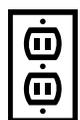
2.3 Fire Extinguisher

The inspector will check that the fire extinguisher has an inspection tag and that the pin is still in the device.

2.4 Electricity

In order to qualify, the outlets must be present and properly installed in the baseboard, wall or floor of the room. Do not count a single duplex receptacle as two outlets.

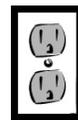
There are two basic types of outlets: two-pronged and three-pronged outlets. Three-pronged outlets with GFCI are acceptable as long as the outlet is grounded or has working GFCI protections.



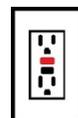
Two-Pronged Outlet. A two-pronged outlet is ungrounded and has a two-wire electrical system that includes only a hot and a neutral wire. Original two-pronged

ungrounded outlets are acceptable under HQS as long as they are in proper operating condition. The landlord is not required to upgrade an original two-pronged outlet. The inspector will verify that the outlet is in proper operating condition by ensuring a plugged in appliance or agency-provided outlet tester works.

A three-pronged outlet should not be substituted for ungrounded outlets unless 1) a ground wire is connected to the outlet, or 2) a Ground Fault Circuit Interrupter (GFCI) protects the outlet.



Three-Pronged Outlet. A three-pronged outlet typically has a three-wire electrical system that includes hot, neutral, and ground wires. Three-pronged outlets, including upgraded outlets that have been changed from two-pronged to three-pronged outlets are acceptable as long as the outlet is grounded. The inspector will verify that the outlet is grounded by using an outlet tester.



Three-Pronged Outlet with GFCI (Ground Fault Circuit Interrupter). An outlet with GFCI senses a difference in current flow between the hot and neutral terminals and in unsafe conditions, shuts off the flow of current to the outlet. Installing a three-pronged outlet with GFCI is a cost-effective method to upgrade from two-pronged to three-pronged outlets without requiring the expensive installation of a new ground wire. The inspector will verify the outlet is grounded by using an outlet tester. If the outlet is not grounded, the inspector will trip the GFCI outlet by

pressing the test button. If the power shuts off, the outlet is operating safely.

Improper Conditions. Reverse Polarity; Broken, exposed, or frayed wiring; or Missing, loose, or badly cracked cover plates.

2.5 Electrical Hazards

Examples of what this means: broken wiring; non-insulated wiring; frayed wiring; improper types of wiring, connections or insulation; wires lying in or located near standing water or other unsafe places; light fixture hanging from electric wiring without other firm support or fixture; missing cover plates on switches or outlets; badly cracked outlets; exposed fuse box connections; overloaded circuits evidenced by frequently “blown” fuses (ask the tenant). Check “Inconclusive” if you are uncertain about severity of the problem and seek expert advice.

2.6 Ceiling Condition

“Unsound or hazardous” means the presence of such serious defects that either a potential exists for structural collapse or that large cracks or holes allow significant drafts to enter the unit. The condition includes: severe bulging or buckling; large holes; missing parts; falling or in danger of falling loose surface materials (other than paper or paint).

Pass ceilings that are basically sound but have some nonhazardous defects, including: small holes or cracks; missing or broken ceiling tiles; water stains; soiled surfaces; unpainted surfaces; peeling paint (for peeling paint see item 2.9).

2.7 Wall Condition

“Unsound or hazardous” includes: serious defects such that the structural safety of the building is threatened, such as severe buckling, bulging or leaning; damaged or loose structural members; large holes; air infiltration.

Pass walls that are basically sound but have some nonhazardous defects, including: small or shallow holes; cracks; loose or missing parts; unpainted surfaces; peeling paint (for peeling paint see item 2.9).

2.8 Floor Condition

“Unsound or hazardous” means the presence of such serious defects that a potential exists for structural collapse or other threats to safety (e.g., stripping) or large cracks or holes allow substantial drafts from below the floor. The condition includes: severe buckling or major movements under walking stress; damaged or missing parts.

Pass floors that are basically sound but have some nonhazardous defects, including: heavily worn or damaged floor surface (for example, scratches or gouges in surface, missing portions of tile or linoleum, previous water damage). If there is a floor covering, also note the condition, especially if badly worn or soiled. If there is a floor covering, including paint or sealant, also note the conditions, especially if badly worn, soiled or peeling (for peeling paint, see 2.9).

2.9 Peeling Paint

No child under the age of 6 will occupy these units, and inspector will not inspect painted surfaces for lead-based paint.

Deteriorated paint includes any painted surface that is peeling, chipping, chalking, cracking, damaged or otherwise separated from the substrate.

3. Unit Inspection Checklist

Check each box on the checklist or note NA if an item is not found in the space being inspected. Write comments where needed.

No more than one person may reside in an SRO unit.

3.1 General

3.1.1. Unit Entry Door

Exterior doors and windows accessible from outside an SRO unit must be lockable. Access doors to an SRO unit must have locks for privacy in proper operating condition.

“Accessible to outside” means: doors open to the outside or to a common public hall. “Lockable” means the door has a properly working lock.

3.1.2. Closet Door

An SRO unit must contain at least four square feet of closet space for each resident (with an unobstructed height of at least five feet). If there is less closet space, space equal to the amount of the deficiency must be subtracted from the area of the habitable room space when determining the amount of floor space in the SRO unit. The SRO unit must contain

at least one hundred ten square feet of remaining floor space after subtracting the amount of the deficiency in minimum closet space.

3.1.3. Ceiling Condition

See section 2.6.

3.1.4. Wall Condition

See section 2.7.

3.1.5. Floor Condition

See section 2.8.

3.2 Living Room/Bedroom

3.2.1. Electricity

There must be two outlets in the room, or one outlet plus a permanently installed ceiling or wall light fixture. Both the outlets and/or the light must be working. Usually, a room will have sufficient lights or electrical appliances plugged into outlets to determine workability. Be sure light fixture does not fail just because the bulb is burned out.

Do not count any of the following items or fixtures as outlets/fixtures: Table or floor lamps (these are not permanent light fixtures); ceiling lamps plugged into socket; extension cords. See section 2.4.

3.2.2. Electrical Hazards

See section 2.5.

3.2.3. Window Condition

Rate the windows in the room (including windows in doors). “Severe deterioration” means that the window no longer has the capacity to keep out the wind and the rain or is a cutting hazard. Examples are: missing or broken-out panes; dangerously loose cracked panes;

windows that will not close; windows that, when closed, do not form a reasonably tight seal. If more than one window in the room is in this condition, give details in the space provided on the right of the form.

If there is only “moderate deterioration” of the windows the item should “Pass.” “Moderate deterioration” means windows which are reasonably weather-tight, but show evidence of some aging, abuse, or lack of repair. Signs of deterioration are: minor crack in window pane; splintered sill; signs of some minor rotting in the window frame or the window itself; window panes loose because of missing window putty.

“Accessible to outside” means windows accessible from the outside (e.g. basement and first floor) or windows leading onto a fire escape.

“Lockable” means the window has a properly working lock, or is nailed shut, or the window is not designed to be opened. A storm window lock that is working properly is acceptable. Windows that are nailed shut are acceptable only if these windows are not needed for ventilation or as an alternate exit in case of fire.

3.3 Kitchen

3.3.1. Electricity

The requirement is that at least one outlet and one permanent light fixture are present and working. See section 2.4.

3.3.2. Electrical Hazards

See section 2.5.

3.3.3. Stove Top

If no stove top is present, mark as “Fail”. A stove with top burners must be working. To be working, a stove or range must have all burners working and knobs to turn them off and on.

3.3.4. Microwave

If no microwave is present, mark as “Fail”. The microwave must be working.

3.3.5. Refrigerator

If no refrigerator is present, mark as “Fail”. A refrigerator is not working if it will not maintain a temperature low enough to keep food from spoiling over a reasonable period of time.

If the refrigerator is present and working but defects exist, note these to the right of the form. Possible minor defects include: broken or missing interior shelving; dented or scratched interior or exterior surfaces; minor deterioration of door seal; loose door handle.

3.3.6. Sink

If a permanently attached kitchen sink is not present in the kitchen or kitchen area, mark “Fail.” A sink in a bathroom or a portable basin will not satisfy this requirement. A sink is not working unless it has running hot and cold water from the faucets and a properly connected and properly working drain (with a “gas trap”).

If a working sink has defects, note this to the right of the item. Possible minor defects include: dripping faucet; marked, dented, or scratched surface; slow drain; missing or broken drain stopper.

3.3.7. Space for Storage, Preparation, and Serving of Food

Some space must be available for the storage, preparation, and serving of food. If there is no built-in space for food storage and preparation, a table used for food preparation and a portable storage cabinet will satisfy the requirement.

If there are some minor defects, check "Pass" and make notes to the right. Possible defects include: marked, dented, or scratched surfaces; broken shelving or cabinet doors; broken drawers or cabinet hardware; limited size relative to family needs.

3.4 Notes

Input any additional information necessary to describe the condition of the unit.

3.5 Tenant Signature

If this is a move-in inspection for a new tenant, the tenant must sign and date this form to acknowledge the condition of the unit.

3.6 Inspector Signature

The initial inspector must sign and date here. If a re-inspection is required, that inspector will sign on page 1.

3.7 Keys Issued – For Owner Use Only

The owner may use this space to document keys given to a new tenant.

4. Building Inspection Checklist

Once the inspection is complete, the inspector will sign and date the inspection on page 1.

4.1 Building Exterior

4.1.1. Foundation Condition

“Unsound or hazardous” means foundations with severe structural defects indicating the potential for structural collapse; or foundations that allow significant entry of ground water (for example, evidenced by flooding of basement).

4.1.2. Stairs, Rails, and Porches Condition

"Unsound or hazardous" means: stairs, porches, balconies, or decks with severe structural defects; broken, rotting, or missing steps; absence of a handrail when there are extended lengths of steps (generally four or more consecutive steps); absence of or insecure railings around a porch or balcony which is approximately 30 inches or more above the ground.

4.1.3. Roof/Gutters Condition

“Unsound and hazardous” means: the roof has serious defects such as serious buckling or sagging, indicating the potential of structural collapse; large holes or other defects that would result in significant air or water infiltration (in most cases severe exterior defects will be reflected in equally serious surface defects within the unit, e.g., buckling, water damage). The gutters, downspouts and soffits (area under the eaves) shows serious decay and have allowed the entry of significant air or water into the interior of the structure.

Gutters and downspouts are, however, not required to pass. If the roof is not observable and there is no sign of interior water damage, check “Pass.”

4.1.4. Exterior Surfaces Condition

See definition above for roof, item 4.1.3.

4.1.5. Site Condition

Examples of conditions that would “seriously and continuously endanger the health or safety of the residents” are:

- ✓ other buildings on, or near the property, that pose serious hazards (e.g., dilapidated shed or garage with potential for structural collapse),
- ✓ evidence of flooding or major drainage problems,
- ✓ evidence of mud slides or large land settlement or collapse, proximity to open sewage,
- ✓ unprotected heights (cliffs, quarries, mines, sandpits), fire hazards

4.1.6. Neighborhood Condition

Examples of conditions that would “seriously and continuously endanger the health or safety of the residents” are:

- ✓ abnormal air pollution or smoke which continues throughout the year and is determined to seriously endanger health, and
- ✓ continuous or excessive vibration of vehicular traffic (if the unit is occupied, ask the tenant).

4.2 Health and Safety

Each floor of the Adelaide is similarly configured. Prior to beginning this section, the inspector will indicate the floor number.

4.2.1. Access to Unit

An SRO unit must have immediate access to two or more approved means of exit, appropriately marked, leading to safe and open space at ground level, and any

means of exit required by State and local law.

The resident must be able to access an SRO unit without passing through any other unit. “Through another unit” means that access to the unit is only possible by means of passage through another dwelling unit.

4.2.2. Fire Exits

“Acceptable fire exit” means that the building must have an alternative means of exit that meets local or State regulations in case of fire; this could include:

- ✓ An openable window if the unit is on the first floor or second floor or easily accessible to the ground.
- ✓ A back door opening on to a porch with a stairway leading to the ground.
- ✓ Fire escape, fire ladder, or fire stairs.

“Blocked” means that the exit is not useable due to conditions such as debris, storage, door or window nailed shut, broken lock.

Important note: The HA has the final responsibility for deciding whether the type of emergency exit is acceptable, although the tenant should assist in making the decision.

4.2.3. Evidence of Infestation

“Presence of rats, or severe infestation by mice or vermin” (such as roaches) is evidenced by: rat holes; droppings; rat runs; numerous settings of rat poison. If the unit is occupied, ask the tenant.

4.2.4. Garbage and Debris

“Heavy accumulation” means large piles of trash and garbage, discarded furniture, and other debris (not temporarily stored awaiting removal) that might harbor rodents. This may occur inside the unit, in common areas, or outside. It usually means a level of accumulation beyond the capacity of an individual to pick up within an hour or two.

4.2.5. Refuse Disposal

“Adequate covered facilities” includes: trash cans with covers, garbage chutes, “dumpsters” (i.e., large scale refuse boxes with lids); trash bags (if approvable by local public agency).

“Approvable by local public agency” means that the local Health and Sanitation Department (city, town or county) approves the type of facility in use. Note: During the period when the HA is setting up its inspection program, it will check with the local health and sanitation department to determine which types of facilities are acceptable and include this in the inspection requirements.

4.2.6. Smoke Detector/Fire Alarm

At least one battery-operated or hard-wired smoke detector must be present and working on each level of the building, including the basement, but not the crawl spaces and unfinished attic. Smoke detectors must be installed in accordance with and meet the requirements of the National Fire Protection Association Standard (NFPA) 74 (or its successor standards).

Staff may obtain a report from the owner for an automated smoke/fire alarm

system that is tested and kept in proper order from the company that inspects and maintains the system.

4.2.7. Elevators

At the time the HA is setting up its inspection program, it will determine local licensing practices for elevators. Inspector should be aware of these practices when evaluating this item (e.g., check inspection date). If no elevator, check “Not Applicable.”

4.2.8. Interior Stairs and Common Halls

“Loose, broken, or missing steps” should fail if they present a serious risk of tripping or falling. A handrail is required on extended sections of stairs (generally four or more consecutive steps). A railing is required on unprotected heights such as around stairwells.

“Other hazards” would be conditions such as bare electrical wires and tripping hazards.

4.2.9. Interior Air Quality

If the inspector has any questions about whether an existing poor air quality condition should be considered dangerous, he or she should check with the local Health and Safety Department (city, town or county).

4.2.10. Other Interior Hazards

Examples of other hazards might be: a broken bathroom fixture with a sharp edge in a location where it represents a hazard; a protruding nail in a doorway.

4.3 Shower and Tub Rooms

Every lavatory basin and bathtub or shower must be supplied at all times with

an adequate quantity of hot and cold running water.

All of these facilities must be in proper operating condition, and must be adequate for personal cleanliness and the disposal of human waste. The facilities must utilize an approvable public or private disposal system.

Sanitary facilities must be reasonably accessible from a common hall or passageway to all persons sharing them. These facilities may not be located more than one floor above or below the SRO unit. Sanitary facilities may not be located below grade unless the SRO units are located on that level.

4.3.1. Electricity

The requirement is that at least one permanent light fixture is present and work. See also section 2.4.

4.3.2. Electrical Hazards

See section 2.5. In addition to the previously mentioned hazards, outlets that are located where water might splash or collect are considered an electrical hazard.

4.3.3. Security/Door

“Accessible to outside” means: doors open to the outside or to a common public hall; windows accessible from the outside (e.g. basement and first floor); windows or doors leading onto a fire escape, porch or other outside place that can be reached from the ground.

“Lockable” means: the window or door has a properly working lock, or is nailed shut, or the window is not designed to be opened. A storm window lock that is

working properly is acceptable. Windows that are nailed shut are acceptable only if these windows are not needed for ventilation or as an alternate exit in case of fire.

4.3.4. Ceiling Condition

See section 2.6.

4.3.5. Wall Condition

See section 2.7. Include under nonhazardous defects (that would pass, but should be noted) the following: broken or loose tile; deteriorated grouting at tub/wall and tub/floor joints, or tiled surfaces; water stains.

4.3.6. Floor Condition

See section 2.8. Include under nonhazardous defects (that would pass, but should be noted) the following: missing floor tiles; water stains.

4.3.7. Fixed Wash Basin or Lavatory

The wash basin must be permanently installed (i.e., a portable wash basin does not satisfy the requirement). Also, a kitchen sink used to pass the requirements under Part 2 of the checklist (kitchen facilities) cannot also serve as the bathroom wash basin. The wash basin may be located separate from the other bathroom facilities (e.g., in a hallway).

Not working means: the wash basin is not connected to a system that will deliver hot and cold running water; it is not connected to a properly operating drain; the connectors (or vents or traps) are faulty to the extent that severe leakage of water or escape of sewer gases occurs.

Comment to the right of the form if the wash basin is “present and working,” but

has the following types of minor defects: insufficient water pressure; dripping faucets; minor leaks; cracked or chipped porcelain; slow drain.

4.3.8. Tub or Shower

Not working covers the same requirements detailed above for wash basin.

Comment to the right of the form if the tub or shower is present and working, but has the following types of defects: dripping faucet; minor leaks; cracked porcelain; slow drain; absent or broken support rod for shower curtain.

4.3.9. Ventilation

Working vent systems include: ventilation shafts (non -mechanical vents) and electric fans. Electric vent fans must function when switch is turned on. (Make sure that any malfunctions are not due to the fan not being plugged in.)

4.4 Shared Spaces

4.4.1. Electricity

See section 2.4.

4.4.2. Electrical Hazards

See section 2.5.

4.4.3. Security

“Accessible to outside” means: doors open to the outside or to a common public hall; windows accessible from the outside (e.g. basement and first floor); windows or doors leading onto a fire escape, porch or other outside place that can be reached from the ground.

“Lockable” means: the window or door has a properly working lock, or is nailed

shut, or the window is not designed to be opened. A storm window lock that is working properly is acceptable. Windows that are nailed shut are acceptable only if these windows are not needed for ventilation or as an alternate exit in case of fire.

4.4.4. Ceiling Condition

See section 2.6.

4.4.5. Wall Condition

See section 2.7.

4.4.6. Floor Condition

See section 2.8.

4.5 Kitchen

4.5.1. Electricity

See section 2.4. The requirement is that at least one outlet and one permanent light fixture are present and working.

4.5.2. Electrical Hazards

See section 2.5.

4.5.3. Ceiling Condition

See section 2.6.

4.5.4. Wall Condition

See section 2.7.

4.5.5. Floor Condition

See section 2.8.

4.5.6. Stove or Range with Oven

Both an oven and a stove (or range) with top burners must be present and working. If either is missing and you know that the owner is responsible for supplying these appliances, check “Fail.”

An oven is not working if it will not heat up. To be working a stove or range must have all burners working and knobs to turn them off and on. Under "working condition," also look for hazardous gas hook-ups evidenced by strong gas smells; these should fail. (Be sure that this condition is not confused with an unlit pilot light –a condition that should be noted, but does not fail.)

If both an oven and a stove or range are present and working, but defects exist, check "Pass" and note these to the right of the form. Possible defects are marked, dented, or scratched surfaces; cracked burner ring; limited size relative to family needs.

4.5.7. Microwave

A microwave oven may be substituted for an owner-supplied oven and stove (or range) if the tenant agrees and microwave ovens are furnished instead of ovens and stoves (or ranges) to both subsidized and unsubsidized tenants in the building or premises.

4.5.8. Refrigerator

If no refrigerator is present, use the same criteria for marking either "Fail" or "Inconclusive" as were used for the oven and stove or range.

A refrigerator is not working if it will not maintain a temperature low enough to keep food from spoiling over a reasonable period of time.

If the refrigerator is present and working but defects exist, note these to the right of the form. Possible minor defects include: broken or missing interior shelving; dented or scratched interior or exterior

surfaces; minor deterioration of door seal; loose door handle.

4.5.9. Sink

If a permanently attached kitchen sink is not present in the kitchen or kitchen area, mark "Fail." A sink in a bathroom or a portable basin will not satisfy this requirement. A sink is not working unless it has running hot and cold water from the faucets and a properly connected and properly working drain (with a "gas trap").

If a working sink has defects, note this to the right of the item. Possible minor defects include: dripping faucet; marked, dented, or scratched surface; slow drain; missing or broken drain stopper.

4.5.10. Space for Storage, Preparation, and Serving of Food

Some space must be available for the storage, preparation, and serving of food. If there is no built-in space for food storage and preparation, a table used for food preparation and a portable storage cabinet will satisfy the requirement.

If there are some minor defects, check "Pass" and make notes to the right. Possible defects include: marked, dented, or scratched surfaces; broken shelving or cabinet doors; broken drawers or cabinet hardware; limited size relative to family needs.

4.6 Notes

Input any additional information necessary to describe the condition of the unit.

Carbon Monoxide Detector Information



Effective May 1, 2005 AHFC Housing Quality Standards (HQS) inspectors required operable carbon monoxide (CO) detectors as prescribed by Alaska Statute 18.70.095. AHFC uses the requirements contained in Alaska Statute, not local codes, as its guide for whether a unit passes or fails the inspection. Direct questions concerning State of Alaska carbon monoxide alarm requirements to the State Fire Marshall's Office, Alaska Department of Public Safety, 1-907-269-5604, or their web page at: www.dps.state.ak.us/fire.

The Municipality of Anchorage has stringent requirements. Anchorage landlords are encouraged to comply with those requirements. For questions about Anchorage carbon monoxide alarm requirements, see: <http://www.muni.org/Departments/Assembly/legislation/2004%20Ordinances/ao2004-064.pdf>.

Who is responsible for the CO detector?

Landlord Responsibilities

- Landlords shall provide CO detectors (alarms) in working condition.
- After notification of any malfunctions by the tenant, the landlord is responsible for repair or replacement.
- The alarm is to be maintained according to the manufacturer's recommendations.

Tenant Responsibilities

- The tenant must keep the devices in working condition by keeping charged batteries in battery-operated devices and by testing the device periodically.
- Disabling a CO detector is a violation of the tenant's HQS responsibilities.

Where are CO detectors needed?

- A unit that contains a carbon-based fuel appliance or a device that produces by-products of combustion;
- A unit serviced by a carbon-based fuel forced air heating system;

- A unit that is adjacent to a carbon-based fuel hot water baseboard (hydronic) heating system;
- A unit that has an attached garage or carport;
- A unit adjacent to a parking space (within 10 feet);

What type of appliance or device produces by-products of combustion?

- Gas, propane, wood, or oil furnace or boiler
- Gas, propane, or fuel oil water heaters
- Gas, propane, wood, charcoal, or oil fireplaces, stoves, ranges, ovens, or stovetops

- Gas fireplace logs and unvented heaters
- Gas or propane dryers
- Cars, snowmobiles, 4-wheelers, motorcycles
- Propane or oil space heaters

Where is the detector placed?

- The detector should be installed according to the manufacturer's recommendations.
- Put it where you will hear it.

- Carbon monoxide is roughly the same weight as air, so height is not an issue.
- Do not cover it with furniture or drapes.