

# C

## Mechanical Ventilation Checklist C – Distributed or Non-Distributed

Use this checklist when a centrally ducted exhaust ventilation systems such as an HRV (heat recovery ventilator or a CEV (central exhaust ventilator ) is used to meet principal fan requirements.

Civic Address _____		Permit No. _____
Number of Bedrooms	<input style="width: 80px; height: 30px;" type="text"/>	(A) A bedroom is a room with an openable window (minimum dimensions apply), a closet and a closing interior door.
Total Interior Volume of Dwelling	<input style="width: 80px; height: 30px;" type="text"/> ft <sup>3</sup>	Total volume includes heated interior joist spaces and heated crawlspaces.
.5 ACH (air changes/hr) = Volume x 0.5 ÷ 60 =	<input style="width: 80px; height: 30px;" type="text"/> cfm	(B) Exhaust appliances exceeding .5 ACH may require make-up air.

**1.** Use the bedroom count from Box (A) above and Table 9.32.3.3.A. to determine the minimum Principal Exhaust Rate provided by the system.

**Minimum Required Rate:**  cfm (C)

**2. HRV or CEV Equipment:** Make \_\_\_\_\_ Model \_\_\_\_\_

**3A. HRV Capacity:** CFM @.4"W.C. Box D must meet Box C Minimum Requirement.  cfm (D)

**3B. CEV Capacity:** CFM @.4"W.C. Box E must meet Box C Minimum Requirement.  
**a)** The fan must be controlled either with an interval timer or run continuously:  
 Continuous Operation      Intermittent Operation

cfm (E)

**b)** The Principal Fan Rate may be set lower than its full Box E Capacity if installation is in a NAFFVA home where the principal fan cfm rate must not exceed 110 cfm per 9.32.3.3.(2). If this applies, indicate fan cfm setting in Box F.

Box F must meet Box C Minimum Requirement.  cfm (F)

**4. Required Kitchen and Bathroom Exhaust:**

ROOM	EXHAUST RATE Required per Table 9.32.3.3.B	EXHAUST EQUIPMENT				
		Additional WALL/CEILING FANS				HRV/CEV Exhaust CFM
		Make & Model	CFM@.2" Manf. Rated	*Duct Dia (in)		
smooth	flex					

\* Use Table 9.32.3.9. For fan capacities **exceeding** Table 9.32.3.9, follow manufacturer's installation instructions or use good engineering practice to size duct. See *Ventilation Guidelines* Appendix pg 24-A.

TOTAL (Box D or E)

**5. NAFFVA (Naturally Aspirated Fuel Fired Vented Appliance) and/or Radon Gas present in dwelling unit?**

**Yes, Proceed to Step 6 if CEV or Step 7 if HRV.**       **No, Omit Steps 6 to 9.**

**6. CEV only—Make-Up Air Duct for Principal Fan: Choose (a) or (b) and proceed to Step 7.**

**a) Non-Distributed system—Passive make-up air duct:** Use Box E or F installed cfm and Table 9.32.3.8.

Make-up air duct diameter \_\_\_\_\_ inches.      Location \_\_\_\_\_

**b) Distributed system—Active Make-Up Air Duct for Principal Fan: Per Sec 9.32.3.8. (2) (b) (ii & iii)**

Install a 4"Ø outdoor air duct into the furnace return air plenum not more than 15ft (unless a flow control device is used) or less than 10ft from the furnace cabinet. In locations with winter design temperature less than -10° C, this duct must have a motorized damper interconnected with principal ventilation air fan.

**Interconnect in place:** Principal Fan & Furnace Blower  Yes  
Damper make \_\_\_\_\_ Voltage \_\_\_\_\_ & Damper (if present)  Yes

**7. Exhaust Appliance present which exceeds Box B —0.5 ACH:**

**Yes, Proceed to Step 8.**       **No such appliance. Omit Steps 8 to 9.**

**8. Use Passive Make-up Air for Exhaust Appliance with actual installed exhaust rate of 126 cfm or less:**

Appliance Cfm \_\_\_\_\_      Passive Make-up Air Duct Sized to Table 9.32.3.8: \_\_\_\_\_ inches

**9. Use Active Make-up Air for Exhaust Appliance with actual installed exhaust rate of more than 126 cfm.**

**Make-up Air Fan required:**

Fan Make \_\_\_\_\_ Model \_\_\_\_\_      \*Exhaust Appliance Cfm \_\_\_\_\_  
Fan Cfm \_\_\_\_\_

Duct diameter \_\_\_\_\_ inches      \*must equal actual installed exhaust rate of appliance.

Fan Location \_\_\_\_\_ Fan ducted to \_\_\_\_\_

**a) Active Make-up Air delivered to an Unoccupied Area** (not directly to room containing the appliance).

**i) Tempering Required per 9.32.4.1.(4)(a):**

Show calculation & describe how make-up air will be tempered to at least 34°F (1°C) before entering unoccupied area.

**ii) Transfer Grill Required:** Size to Table 9.32.3.8 (or 1 sq in of gross area per 2 cfm):

Transfer grill size \_\_\_\_\_ sq. in.      Location \_\_\_\_\_

**iii) Additional Tempering Required per 9.32.4.1.(4)(b) before transfer to occupied area:** Show calculation and describe how make-up air will be further tempered to at least 54°F (12°C).

**OR b) Active Make-up Air delivered to an Occupied Area: Tempering Required.** Show calculation and describe how make-up air will be tempered to at least 54°F (12°C).

**Installer Certification:**

Date \_\_\_\_\_

I hereby certify that the design and installation of the ventilation system complies with the 2006 B.C. Building Code.

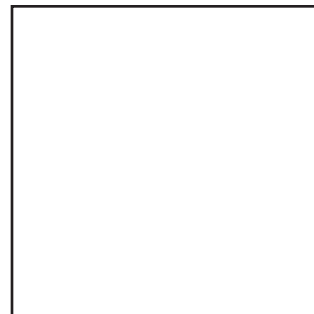
Print Name \_\_\_\_\_

**2006 TECA Ventilation Certification Stamp**

Signature \_\_\_\_\_

Company \_\_\_\_\_

Phone \_\_\_\_\_



Checklist C2