Building Inspection

Building Bulletin ~ Mechanical Ventilation Checklists



Please complete the appropriate Mechanical Ventilation Checklist and return to the appropriate CRD Building Inspection office.

Note: Ventilation checklists must be submitted with building permit application.

Mechanical Ventilation Checklists

Checklist 1	Forced Air Systems Forced air heating system ducts intake and distribute ventilation air.
Checklist 2	HRV Systems Centrally ducted HRV (heat recovery ventilator) is used alone or in combination with Force Air Heating System to meet principal ventilation system requirements.
Checklist 3	Distributed CRV Systems Ducted CRV (central recirculating ventilator) is used to meet the fresh air intake and distribution requirements and a Principal Exhaust fan meets the exhaust requirements.
Checklist 4	Exhaust Fan & Passive Inlets Used in single level, non-forced air heated dwellings located in coastal climate areas where winter design temperature is warmer than or equal to +14 degrees Fahrenheit.

Salt Spring Island Pender Island SGI, Malahat & Willis Point Juan de Fuca 625 Fisgard Street #3-7450 Butler Rd #206-118 Fulford-Ganges Rd #30-4605 Bedwell Harbour Rd PO Box 1000 Sooke BC Salt Spring Island BC PO Box 113 Victoria BC V8W 2S6 V9Z 1N1 V8K 2S4 Pender Island BC V0N 2M0 250.360.3230 250.642.8109 250.537.2711 250.629.3424 binspection@crd.bc.ca bijdf@crd.bc.ca bisaltspring@crd.bc.ca bipender@crd.bc.ca

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Ventilation Checklist 2—HRV Systems Sentence 9.32.3.4 (3) & (4)

Use this checklist when a centrally ducted HRV (heat recovery ventilator) is used alone or in combination with a Forced Air Heating System to meet principal ventilation system requirements.

Civic Address		Permit No			
Climate Zone: Number of Bedrooms	(A)	A bedroom is a room with an openable window (minimum dimensions apply), a			
Total Floor area of living space	ft ² (B)	closet and a closing interior door.			
Total Interior Volume of Dwelling	ft^3	Total volume includes all heated interior spaces (including crawlspace if heated).			
.5 ACH (air changes/hr) = Volume x $0.5 \div 60 = $	cfm (C)	Exhaust appliances exceeding .5 ACH may require make-up air.			
1. Use the bedroom count (Box A above) and total square footage (Box B above) to determine the minimum principal Air Flow rate required by Table 9.32.3.5 Minimum Required Rate (D)					
Nilnin 2. HRV Make M	num Required Ra Iodel				
3. HRV Capacity: CFM @ 0.4 ESP. Box E must meet Box D requirement. cfm (E					
4. List Exhaust Grilles Locations: 1 minimum @ 6 ft or higher from floor of uppermost level.					
5 Descriped Vitabers and Dethrocom Follows					

5. Required Kitchen and Bathroom Exhaust

If HRV used to meet all or part of Kitchen/Bathroom spot exhaust requirements list below.

ROOM Spot Exhaust Kitchen & Bath WALL/CEILING FANS HRV		REQUIRED	EXHAUST EQUIPMENT						
ROOM Table 9.32.3.6 Fan Make & Model CFM @ 0.2 ESP Manf. Pated Tigid flex Tigid Tigid flex Tigid T		EXHAUST RATE	Spot Exhau	Spot Exhaust Kitchen & Bath WALL/CEILING FANS				HRV	
9.32.3.6 Duct Dia (in Ø) Max. Equiv. Installed Equiv. System CFM Pated rigid flex Length Length	ROOM		Fan Make & Model						
	ROOM	9.32.3.6		Manf.			Length per		System CFM

^{*} For fan capacities **exceeding** 175cfm in Table 9.32.3.8(3), follow manufacturer's installation instructions or use good engineering practice to size duct. See *Ventilation*

TOTAL (must = Box E)

Guidelines Appendix page 16-A, Duct Sizing for Larger Fans. © March 2015 TECA All Rights Reserved Checklist 2, pg1of2

Removed reference to RADON in Make-up Air Requirements

6. HRV Fresh Air Dist	cribution (Choose	a or b)	
		ect to Return Air of a For	ced Air Heating System:
FA system fan and H		1	
•	11.	bedroom and each floor le	evel without a bedroom
b) Supply Air from		<u> </u>	
•		or level without a bedroom	and
HRV fan continuous	*		
7. If Heated Crawls			
		located in the crawlspace, OR Option 1, 2, or 3 per sentence 9	32 3 7 (2)
MAKE-UP AIR Requ		option 1, 2, or 5 per sentence 5	1021011 (2)
_		ed Appliance) present in dwelli	ng unit? (per Sentence 9.32.4.1)
No, Omit Steps 2 & 3 Yes, Proceed to Step 2		, ,	
2. Exhaust Appliance pres		x C 0.5 ACH:	
No such appliance. Or	-	ALITION TECAN AM	24)
Yes, Proceed to Step 3	surization test (See Ca	AUTION, TECA Vent Manual p	g 24)
3. Use Active Make-up Air	for Exhaust Annliance	(Choose a or h)	
Males un Ain Ean naguina	i.	Ershaugt Appliana	e Actual Installed Cfm
			Make-up Air Fan Cfm
Duct diameter	inches	Fan Location	
		an. Fan ducted to	
		ied Area first (not directly to ro	oom containing the appliance).
i) Tempering Required po		empered to at least 34°F (1°C) b	ofore entering uncommised area
	_	_	
Make-up Fan cfm			<u>your location)</u> = (kw)
T. C		3412 BTUH/kw	Duct Heater
			zesq. in. Locationed area: Show calculation and describe
,		I to at least 54°F (12°C).	ed area. Show earealation and describe
Make-up	Fancfm x 1.08	=	(kw) Heat from unoccupied area
	3412 BTU		required to raise temp by 20°F
Tempered by: ——			
	delivered to an Occi	ipied Area: Tempering Requir	red. Show calculation how make-up air wil
Make-up Fan cfm_	x 1.08 x (54° F -	°F Winter Design Temp	your location) = (kw)
© March 2015 TECA All Right	is Reserved	412 BTUH/kw	Duct Heater
Installer Certification			2012 TECA Ventilation
I hereby certify that the desi	•	•	Certification Stamp
complies with the 2018 B.C	. Building Code, 2014	Section 9.32 Amendment.	
Date			
Print Name			
Signature			
Company			
Phone			
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