

SC WAP ASSESSMENT

Agency _____

NAME: _____

ADDRESS: _____ CITY/TOWN: _____ ZIP: _____

COUNTY: _____ HOME PH#: _____ CELL PH#: _____

Directions: _____

Emergency Contact: _____ Phone#: _____

JOB #:	<input type="checkbox"/> Site Built	<input type="checkbox"/> Mobile Home	<input type="checkbox"/> Other _____	DATES
ASSESSOR(S):		YEAR BUILT:		APPLICATION:
Pre-CFM ₅₀ :	Post CFM ₅₀ :	# BEDROOMS:		ASSESSMENT:
Outdoor Temp _____ / _____ Pre Post	Wind _____ / _____ Pre Post	# OCCUPANTS: (for REDcalc, # of bedrooms + 1)		START WORK:
SQUARE FT:	HEIGHT: (Pressure Boundry)	VOLUME:		FINAL INSPECTION:

Client Education: Lead _____ Unvented Gas Heater(s) _____ Mold & Moisture _____
 Smoke Detectors (Yes or No) _____ Locations _____ Test OK? _____ # Needed? _____
 CO Detectors (Yes or No) _____ Locations _____ Test OK? _____ # Needed? _____

FUEL SOURCE: Are combustible fuels used for any appliance? (Yes No)																
If Yes for any appliance:																
<ul style="list-style-type: none"> enter fuel code from list below in chart → complete CAZ Workbook 																
NG – Natural Gas	LP - Propane	O - Oil	K - Kerosene	W - Wood												
<table border="1"> <thead> <tr> <th>Heating</th> <th>Hot Water</th> <th>Stove</th> <th>Other</th> </tr> </thead> <tbody> <tr> <td>1)</td> <td></td> <td></td> <td></td> </tr> <tr> <td>2)</td> <td></td> <td></td> <td></td> </tr> </tbody> </table>					Heating	Hot Water	Stove	Other	1)				2)			
Heating	Hot Water	Stove	Other													
1)																
2)																

Has the dwelling been weatherized previously? YES NO
 If YES, what steps were taken to ensure previous weatherization took place on or before 9/30/1994?

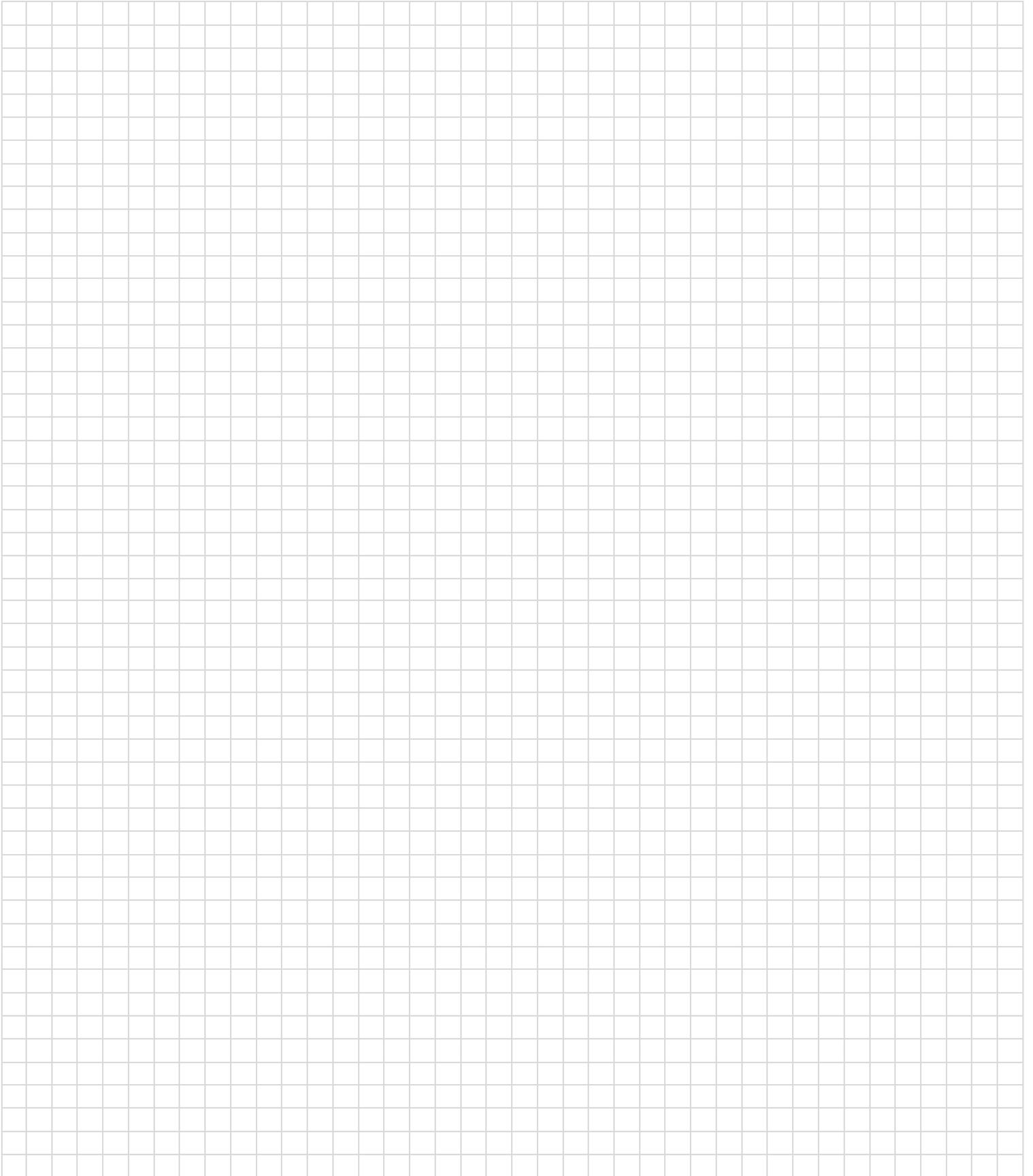
Has the dwelling been listed in the National Register of Historic Places, or been determined to be eligible for listing by the State Historic Preservation Office (SHPO), the Keeper of the National Register, or by a federal agency? YES NO

Comments:

Weatherization Measures Summary

Air Sealing	Insulation	Health & Safety	Other
By-Passes _____	Attic _____	RED Calc/ASHRAE _____	HVAC Clean & Tune _____
Kneewall Bypass _____	Sidewall _____	Smoke Alarm _____	Dryer Vent _____
Crawlspace _____	Kneewall _____	CO Alarm _____	Exhaust _____
Return Chase _____	Attic Ventilation _____	Mold/Moisture _____	DHW Pop Off _____
Ducts _____	Floor _____	Electrical _____	Belly Repair _____
Doors _____	Belly _____	CO _____	Vapor Barrier _____
Windows _____	Ducts _____	Gas Leaks _____	Roof Coat _____
Other _____	Water Heater _____	Other _____	HVAC Replacement _____
	Water Pipes _____		Refrigerator _____
			DHW Replacement _____

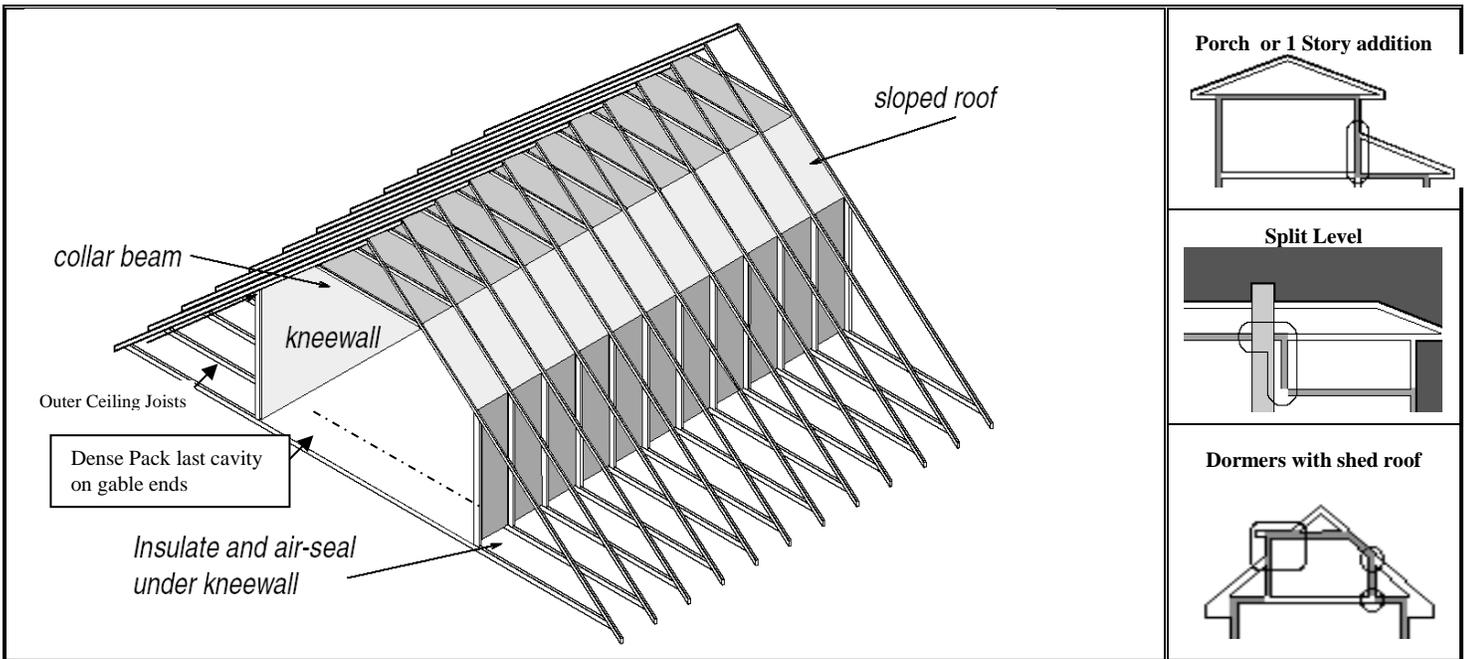
HOUSE FOOTPRINT



SITE BUILT				Kneewall Attic (See drawing →)			
Attic Weatherization	Attic 1	Attic 2	Attic 3	Collar Beam	Slopes	Knee wall	Outer Ceiling Joists
Insulation (<i>Bags Needed</i>)							
Dimensions							
Sq Footage							
Existing Type							
Existing R-Value							
Added Type							
Post WX R-Value							
Condition of Attic	Attic 1	Attic 2	Attic 3	CB	Slopes	Kw	OCJ
Knob and Tube Wiring ?							
Water Leaks							
Recessed Light							
Chimney / Vent Shielding							
Condition of Wiring							
Access							
By-Passes	Attic 1	Attic 2	Attic 3	CB	Slopes	Kw	OCJ
Open Ext Wall Tops							
Open Int Wall Tops							
Wire Chases							
Plumb Chases							
HVAC Chases							
Stairwell Drop							
Closet Drop							
Soffit Drop							
Kwall Floor Bottom							
Size KWall Flr Btm							
Ventilation	Attic 1	Attic 2	Attic 3	CB	Slopes	Kw	OCJ
* NFVA Sq" Needed (<i>Sq' x.24</i>)							
Sq" Existing Exhaust (High)							
Sq" Needed Exhaust (High)							
Total NFVA Exhaust Sq"							
Sq" Existing Intake (Low)							
Sq" Needed Intake (Low)							
Total NFVA Intake Sq"							

Comments: Note: 3 copies of Insulation Certificate – (1) Attic (S.B.) or Electrical Panel (M.H.); (2) Client; (3) Agency File

* NFVA = Net Free Ventilation Area



SIDEWALLS	SECTION 1			SECTION 2		
	Yes	No		Yes	No	
Existing Insulation ?	Yes	No		Yes	No	
Knob and Tube Wiring ?	Yes	No		Yes	No	
Do Walls Have Cavities ?	Yes	No		Yes	No	
Are Walls Weak ?	Yes	No		Yes	No	
Moisture Problems ?	Yes	No		Yes	No	
Can Sidewalls Be Blown ?	Yes	No		Yes	No	
Width of Cavity	24"	16"	Other_____	24"	16"	Other_____
Depth of Cavity	2 X 4	2 X 6	Other_____	2 X 4	2 X 6	Other_____
Gross Exterior Wall Surface	_____ SQ FT			_____ SQ FT		
Less Windows/Doors	_____ SQ FT			_____ SQ FT		
Net SQ FT Wall Surface	_____ SQ FT			_____ SQ FT		
INSULATION Bags Needed	_____ Bags			_____ Bags		
Are Repairs Needed ?	Yes	No		Yes	No	

Comments:

MOBILE HOME - SIDEWALLS

Long Wall Orientation: N S E W	Wall Stud Size: 2 X ____
Wall Ventilation: Vented <input type="checkbox"/> Unvented <input type="checkbox"/>	Existing Insulation: Yes No
Carport/Porch Roof Dimensions:	Add Sidewall Insulation? Yes No
Shielding: Exposed <input type="checkbox"/> Normal <input type="checkbox"/> Shielded <input type="checkbox"/>	Uninsulatable Wall Area: _____ ft ²
(Total wall area – window & door area) X Cavity Depth = Wall Volume	Wall Volume ÷ (ft ³ per bag) = _____ # bags needed

MOBILE HOME - CEILING

Roof Material	Shingle Metal Other	Roof Color: (White, reflective, shielded) or (Normal, weathered)	
Roof Type	Pitched Bowstring Flat	Joist Size: 2 X _____	
a) Cathedral ft ² :	% Cathedral = a ÷ (a+b) = _____ %	Peak Height	
b) Flat ft ² :		Roof Blowing Access	Side Top Gable
c) Total ft ² :		Gutter Length	
Existing Insulation Type		Roof Coating	
Existing R-Value		Peal and Seal	
Added Type		Plumbing Vent Caps	
Post WX R-Value		Total Bags Needed	

MOBILE HOME - ADDITION

Long Wall Orientation:	Wall Ventilation: Vented <input type="checkbox"/> Unvented <input type="checkbox"/>
Wall Configuration – Maximum Wall Height at:	interior wall center all walls same height
Interior Wall Height: Maximum ft ² _____ Minimum ft ² _____	Wall Stud Size: 2 X ____
<u>Ceiling</u> Existing Insulation (in.)	Batt/Blanket:
	Loose Fill:
	Foam Core:
Joist Size: 2 X _____	Roof Color: (White, reflective, shielded) or (Normal, weathered)
<u>Floor</u> Joist Size: 2 X _____	Floor Type: Crawlspace Exposed-Floor Slab-on-grade
Dimensions (ft.)	Length _____ Width _____
Batt/Blanket Attachment:	To Flooring Between Joists Under Joists None
Existing Insulation (in.)	Batt/Blanket _____ Loose Fill _____
Depth Available for Added Insulation (in.):	

Comments:

BASEMENT / CRAWLSPACE									
Site Built		SECTION 1				SECTION 2			
Location									
Conditioned / Unconditioned		Cond		Uncond		Cond		Uncond	
Type of Foundation		Crawl	Basement	Pier	Slab	Crawl	Basement	Pier	Slab
Type of Sub floor		Plywood	T&G	Plank		Plywood	T&G	Plank	
Total Square Ft of Floor									
Liner Feet of Perimeter									
Avg Wall Height above Grade									
Vapor Barrier Existing		Yes	No			Yes	No		
Open Ext Wall Bottoms		Yes	No			Yes	No		
Open Int Wall Bottoms		Yes	No			Yes	No		
Wire Chases		Yes	No			Yes	No		
Plumbing Chases		Yes	No			Yes	No		
HVAC Chases (Chimney-Ducts)		Yes	No			Yes	No		
Floor Joist Size 2 x ____ ?		6	8	10	12	6	8	10	12
Floor Insulation Existing		Yes	No			Yes	No		
R-Value Existing		6	11	13	19	6	11	13	19
Floor Insulation Needed		Yes	No			Yes	No		
R-Value Needed		R-11		R-19		R-11		R-19	
Does Band Joist Need Sealed		Yes	No			Yes	No		
Does Band Joist Need Insulation		Yes	No			Yes	No		
Is Perimeter Insulation Needed		Yes	No			Yes	No		
Stairwell Insulation Needed		Yes	No			Yes	No		
Exposed Water Lines Wrapped		Yes	No	_____ft		Yes	No	_____ft	
Mobile Home FLOOR		Floor Joist Direction: Lengthwise _____ Widthwise _____							
		Wings				Belly			
Floor Joist Size		2 X _____				2 X _____			
Loose Insulation Thickness (in.)									
Batt/Blanket Attachment:		To Flooring Under Joists		Between Joists Draped		To Flooring Under Joists		Between Joists Draped	
Batt/Blanket Thickness (in.)									
Condition (Good, Average, Poor)									
Maximum depth (in.)									
Total Bags Needed						Bags		Bags	
Exposed Water Lines Wrapped		Yes	No	_____ft		Yes	No	_____ft	
Vapor Barrier Present		Yes	No			Yes	No		
Plumbing Leaks		Yes	No			Yes	No		
Comments:									

ELECTRICAL PANEL INFORMATION

Electric Box	Manufacturer	Size Box	Cover	Type	Location
Main		Amp	Y N	Breaker Fuses	
Sub Panel		Amp	Y N	Breaker Fuses	

COMMENTS:

EXHAUST VENTS	Operational	Vented Outside?	Cfm	COMMENTS:
1 Dryer Vent	Y N None	Y N		
2 Kitchen Exhaust	Y N None	Y N		
3 Bathroom Exhaust	Y N None	Y N		
4 Other _____	Y N	Y N		

GAS COOKSTOVE INSPECTION			STOVE PART (Carbon Monoxide)	PRE (ppm) CO AF	POST (ppm) CO AF	COMMENTS:
1	Gas Stove Present	Y N	Oven			Top burners: CO not needed, visually evaluate each as Pass or Fail.
2	Gas Leak	Y N	Front Left			
3	If so, Location of Leak		Front Right			
4	Type of Fuel	NG LP	Rear Left			
5	Make of Stove		Rear Right			

Vented Range Hood Present? YES NO (Recirculating fans are **not** vented.)

Fuel Supply Flex Connector at appliance: Type SS___ Epoxy Coated___ Hard Piped___ Copper ___ *Brass ___ **(Must replace brass connector)**

FUEL TANK	Location	Stand	Legs	Cap Block	Vent Cap	Fill Cap	2 Line Cap	Gauge	Oil Line	Cut Off

COMMENTS:

If tank is located inside, is vent cap run to outdoors? Yes No Is fill cap run to outdoors? Yes No

UNVENTED SPACE HEATERS

* check for **Oxygen Depletion Switch (ODS)**; Must be labeled as conforming to ANSI (Z 21.11.2)

1	Make _____ Model # _____ BTU Input _____ * ODS? Y N Ventable Y N CO _____ ppm Primary or Secondary Gas Shutoff Y N Gas Leak Y N IF Yes, Location _____
2	Make _____ Model # _____ BTU Input _____ * ODS? Y N Ventable Y N CO _____ ppm Primary or Secondary Gas Shutoff Y N Gas Leak Y N IF Yes, Location _____

Note: All unvented combustion heaters must be removed from dwelling unless the unit has an oxygen depletion switch and is labeled as conforming to ANSI Z21.11.2. No unvented combustion heaters can remain in manufactured housing.

WINDOW AIR CONDITIONER(S)

#	Location	Brand	BTU	EER	Perm	Cover	Filter	Coils
1								
2								
3								
4								

Comments:

HEAT PUMP / CENTRAL AIR CONDITIONING

Outdoor Loc	Brand	Model	Serial #	SEER	Disc- onnect	Suction Line Insulation	Coil
Air Handler Location	Brand	Model	Serial #	KW	X	Btu Input	Coil
					3412 =		

Thermostat Location _____ Mercury? Yes No Temp Day _____ Temp Night _____

Filter Location _____ Type _____ Not installed ___ Clean ___ Dirty ___ Cleaned and Replaced _____

Filter Size _____ X _____ Qty _____ Does Blower Need Cleaning? Yes No Noisy? Yes No

Comments:

DUCTS / HEATING PIPES

Duct Location	Cond/ Uncond	Boots	Registers	Supp Duct	Ret Duct	Supp Plen	Ret Plen	Cross over	Duct Wrap	Ft Insul

Comments:

Type Ductwork (Sheet Metal Flex Duct Ductboard Other _____) Type Duct System (Trunk Spider Cottage Base Other _____)

Supply Size _____ OK? Yes No Return Size _____ OK? Yes No Replace return grill with Filter Grill Yes No

Airflow: Heating = 400cfm per 25,000 Btu output Cooling = 400 cfm per 12,000 Btu (TON)

Blower Door Diagnostics (These tests are done with the Blower Door at -50 Pa)

Note	Close all exterior doors, windows. Turn off exhaust fans, clothes dryer, HVAC system. Close fireplace damper. Set combustion appliances to "Pilot".							
	LOCATION	CONFIGURATION			Baseline	PA	CFM₅₀	* RED Calc
PRE		Open	Ring-A	Ring-B				
POST		Open	Ring-A	Ring-B				Fan Capacity _____ cfm Run Time _____ min/hour
* Whole house ventilation rate testing is required on all homes to comply with ASHRAE 62.2. Use the online RED Calc tool at: http://www.residentialenergydynamics.com/REDCalcFree/Tools/ASHRAE6222013.aspx								
Comments :								

Zonal Pressures (Test WRT House and WRT Outdoors)

Zone Tested	Before		After		Zone Tested	Before		After	
	WRT House	WRT Outside	WRT House	WRT Outside		WRT House	WRT Outside	WRT House	WRT Outside
Attic 1					Basement				
Attic 2					Crawlspace				
Cavity between 1&2 Floor					Bellyboard				
Kneewall N S E W					Garage (Attached)				
Kneewall N S E W					Room-to-Room (± 3 pa)				
Comments:									

Pressure Pan Test (Duct WRT House)

	Location	Pre	Post		Location	Pre	Post		Location	Pre	Post
1				8				15			
2				9				16			
3				10				17			
4				11				18			
5				12				19			
6				13				20	RETURN		
7				14							
Comments:									Pressure Pan Multipliers		
									50 = 1.0	25 = 2.0	
									45 = 1.1	20 = 2.5	
									40 = 1.25	15 = 3.5	
									35 = 1.42	10 = 5.0	
									30 = 1.66	5 = 10.0	

BASELOAD MEASURES

Water Heater Inspection		UNIT Description
1	Pass	Fail (If Fail, why?) _____) Repair or Replace with: _____
2	Location _____	Type of Fuel: Natural Propane Electric
3	Make _____	Model _____ Serial Number _____
4	Rated BTU Input _____	Size _____ Gal Measured Temperature _____ degF
5	Gas Leaks ? Yes No	If Yes, Location of Leak: _____
	Water Leaks ? Yes No	If Yes, Location of Leak: _____
6	Can Water Heater be Insulated ? Yes No Can Insulate First 6 feet of Hot Water Line? Yes No " " " " " Cold Water Line? Yes No Need _____ Low-flow Showerheads; _____ aerators	Is Pressure Relief Piping Needed? Yes No Is there Evidence of Flame Roll out? Yes No Is Pilot Safety Shutoff OK? Yes No
Diagnostic Inspection: Complete a separate CAZ Workbook for each combustible fuel appliance.		
7	Is Main Vent / Chimney OK? (circle any problems below) Yes No Type, Location, Clearance, Height, Size, Cap, Liner, Mortar, Flashing, Unused flue holes, Thimble, Other _____ Chimney Type _____ Chimney Size _____ inches Chimney Height _____ feet Liner Existing or Needed Type _____ Liner Size _____ inches Height _____ feet	
8	Is Vent Connector from Water Heater to Chimney OK? (circle any problems below) Yes No Proper type pipe, Connected properly, Leaky or Corroded, 1/4" Rise per Ft, Excessive elbows, Clearance Other _____ Vent Connector Type _____ Vent Connector Size _____ inches Vent Connector Run _____ feet	
CONFINED SPACE CALCULATIONS (See Rated BTU Input for Appliance)		
9	Is Combustion Air Venting Needed ? (Minimum Volume = Appliance BTU ÷ 20) Yes No	
10	L _____ X W _____ X H _____ = _____ Cu Ft. ≥ Appliance BTU ÷ 20 Yes No	
11	Sq" of NFA Combustion Air Needed = BTU Input _____ / 1000 = _____ X 2 _____ SQ" Needed	
12	<u>HIGH</u> Vent Size for NFA Needed = W _____ x H _____ = _____ *.75 = NFA Sq" Size	
13	<u>LOW</u> Vent Size for NFA Needed = W _____ x H _____ = _____ *.75 = NFA Sq" Size	
Comments:		

Refrigerator Assessment *(Photograph the manufacturer's label and note the following data.)*

Primary Refrigerator:

Manufacturer _____ Model Number _____
 Freezer Style _____ Defrost _____
 (top, bottom, side-by-side, chest, other) (auto or manual)
 Size (cu. Ft.) _____ Dimensions (W x H x D) _____
 Location (heated, unheated, unintentionally heated) _____
 Space Limits (W x H x D): _____
 (Narrowest opening new Refrigerator must be able to clear?)
 Hinges (R/L) _____ Age (estimate if necessary) _____ Door Seal Condition (good, fair, poor) _____

Secondary Refrigerator/Freezer:

Is homeowner willing to discontinue use of secondary refrigerator/freezer? (Larger Refrigerator/Freezer may be justified with audit.) **YES NO** If **YES**, complete section below.

Manufacturer _____ Model Number _____
 Freezer Style _____ Defrost _____
 (top, bottom, side-by-side, chest, other) (auto or manual)
 Size (cu. Ft.) _____ Dimensions (W x H x D) _____
 Location (heated, unheated, unintentionally heated) _____
 Hinges (R/L) _____ Age (estimate if necessary) _____ Door Seal Condition (good, fair, poor) _____

Replacement Basis *(Check database for model number first. If database search fails, enter Power Meter Results.)*

✓: Database _____ Metering _____
 Metering Information: Test Duration (minutes) _____ kWh _____ Peak Watts _____

Replacement Information *(Enter data for proposed replacement refrigerator)*

Manufacturer _____ Model Number _____
 Freezer Style _____ Defrost _____ kWh/yr: _____
 (top, bottom, side-by-side, chest, other) (auto or manual) (from the energy guide label)
 Size (cu. Ft.) _____ Dimensions (W x H x D): _____ Cost _____

Lighting Assessment and Replacement

	Room	Existing Incandescent Wattage	Replacement CFL Wattage	Type Fixture	Type Bulb Needed	Incandescent Watts	CFL Watts	Lumens
1				Tbl Flr Ceil Wall	Quad Spiral Circ Torch	25		232
2				Tbl Flr Ceil Wall	Quad Spiral Circ Torch		5	250
3				Tbl Flr Ceil Wall	Quad Spiral Circ Torch		7	400
4				Tbl Flr Ceil Wall	Quad Spiral Circ Torch	40		480
5				Tbl Flr Ceil Wall	Quad Spiral Circ Torch		9	600
6				Tbl Flr Ceil Wall	Quad Spiral Circ Torch	60	13	900
7				Tbl Flr Ceil Wall	Quad Spiral Circ Torch	75	18	1100
8				Tbl Flr Ceil Wall	Quad Spiral Circ Torch			1220
9				Tbl Flr Ceil Wall	Quad Spiral Circ Torch	100		1750
10				Tbl Flr Ceil Wall	Quad Spiral Circ Torch		26	1800

Note: Inform client on proper disposal techniques for broken/burned out CFL bulbs: double zipped lock plastic bags minimum.

Assessor Name (Printed) _____

I certify that the findings in this Assessment Report are true and accurate to the best of my knowledge.

Assessor Signature _____

Date _____