Texas Department of Housing and Community Affairs Weatherization Program WaWeb Q&As

(Updated February 2025)

The Texas Department of Housing and Community Affairs (The Department) has created the following document to assist its Weatherization funded Subrecipients to answer applicable program questions. The document contains answers to the questions the Department has received that are relevant to the network. In addition to this document, Subrecipients are encouraged to take the following steps to respond to their questions:

- Review your applicable DOE and LIHEAP WAP Contracts
- Reference applicable TAC Rules
- Reference other applicable program rules/guidelines (OMBs, CFRs, TXGMS, WPNs, WAP Memos, etc.)
- Review WAP guidance provided on the TDHCA Website

If after reading and referencing these materials, you still have questions, please contact the training department by submitting a program question by completing this form:

• <u>https://tdhca.wufoo.com/forms/request-for-ca-program-assistance/</u>

<u>You may click on the hyperlinks below to move to the most appropriate category that applies to your question.</u> Contents

Department Q&As available:

- For information regarding income guidelines, please refer to the Department's *Income Guidelines Q&A*.
- For information regarding Health & Safety topics (CAZ, ASHRAE, LSW, K&T, etc), please refer to the Department's <u>H&S Q&A</u>.
- For information regarding General WAP topics (T&TA, Bonding, etc), please refer to the Department's <u>General Q&A</u>.
- For information regarding WAP documentation (client files, Assessments, Final Inspections, Multifamily), please refer to the Department's <u>Documentation Q&A</u>.
- For information regarding energy audit processes, please refer to the Department's <u>Energy Audit Q&A</u>.
- For information regarding WAP Work topics (Priority List, Major/Mandatory/Secondary/Optional measures, etc), please refer to the Department's <u>WAP Work Scope Q&A</u>.

WAP Cheat Sheet(s) available upon request:

- Client Denials & Referrals
- WAP Client File Checklist
- Whole House Assessment
- Isolating the CAZ
- Mobile Home Work Scope
- Principles of CFM Reduction
- Window & Door Replacement
- Using ASHRAE 62.2-2016 Calculator
- Evaporative Coolers
- Unit Replacement
- Manual J/S
- SEER, EER, HSPF, and AFUE Degradation
- Water Heater
- Final Inspection Process
- Multifamily Weatherization

GENERAL WaWeb

1. Where can we find the standards for weatherization work?

Weatherization standard criteria can be located within the DOE/LIHEAP contracts and are as follows:

- <u>NREL Standard Work Specifications</u>
- <u>SWS TX Field Guide</u>
- 2. If the existing Hot Water Heater is located outside of the thermal boundary, which option should be selected? The location of the water heater impacts the surrounding temperature and, consequently, the heat loss from both the water heater tank and the hot water pipes. When the water heater is in an unconditioned basement, NEAT calculates the space temperature based on the basement's conditions. If it's in an unconditioned garage, NEAT uses the outdoor temperature from the weather data. You should choose the location option—unconditioned basement or unconditioned garage—that most closely matches the actual temperature of the space where the water heater is located.
- 3. During the initial assessment, the auditor was unable to locate a tag for the Model number to enter for water heating section of WaWeb. What is the best practice for entering information for existing equipment when it is unknown?

If you want to evaluate water heating measures but don't see your water heater's model number in the dropdown list, you can manually enter the necessary data related to the system and equipment. If the nameplate data for the current water heater isn't available, choose a model that closely matches the actual system (e.g., fuel type, tank size). Clicking the "Apply" button on a blank or partially filled form will show you which required fields are still missing.



4. When entering Duct Operating Pressures, we get warning stating the difference between the return duct operating pressure before and after duct sealing is more than 40%. Can I continue with the audit despite the warning?

Although, you received a "warning" message, you may continue with the audit. As a best practice in the past, the Department advised our auditors to apply +5 from the "Before Duct Sealing" to enter for the "After Duct Sealing". Evidently, by adding +5, the auditor should receive a warning message; instead add +2 Pa to both the supply and return readings avoid receiving a warning message.

For example, let's say your return reading from your initial is 10.7. If you were to add +5 the NEAT would evaluate the percentage increase by taking the +5 and dividing into the 10.7 which results in 46.7%, which is higher than the 40% threshold that triggers the warning message but if you were to use +2 method instead of +5 in the after duct sealing input boxes, the warning message will be eliminated allowing the auditor to continue with the audit.

Ducts and Infiltration Validation issues	2
Warnings:	
 The difference between the supply duct operating pressure before and after duct sealing is more than 40%. 	
 The difference between the return duct operating pressure before and after duct sealing is more than 40%. 	
Continue with save?	
Yes No	

- 5. How would I add a new NEAT Insulation type to define additional insulation types for shell components? The NEAT insulation types form available from the NEAT Measure Cost Library allows an auditor to define additional insulation types for shell components. Since Measure Costs libraries are shared or in-use are locked for editing, please follow these steps to complete:
 - 1. Create a copy of the NEAT Measure Cost Library, once you create a copy, please define the effective date in the Measure Cost Set Name.
 - 2. Then select the type of insulation you would like to define in the Retrofit Measure Cost Details and enter the costs associated with the added insulation type.
 - 3. Finally, select the edited NEAT Measure Cost Library on the NEAT Audit form for that audit then you will see the insulation type the auditor added in the Measure Cost Set Library

<u>Note</u>: It is best to define the name associated with the insulation type or you can name it "User-Defined Fiberglass Batt" just ensure that the R-Value per inch is based off the material specifications of that particular product. You may have to log out and log back in to have the new insulation type listed on the form.

See Pictures below for instructions.

NEAT Insulation Type	es v10							
	Attic		Kneev	vall*		Wall*		
	Name	Rs/Inch	Name	R-Value	Iva	me	value One	
Type 1 Blown Ce	llulose	3.75	Fiberglass Batts	13	Blown Cellulose		3.71 R/in	
Type 2 Blown Fil	perolass	3.09			User Defined- EG	Batt	3 R/in N	
The Diomittic	vergioss.				ober benned i to	but		
Type 3								
Type 4							Y	
Type 5	Informati	on				X	v	
Туре б	Ū.	 If you chain Foundation Details for the second secon	nged the R-value for an insu n Wall, you may need to rev	ulation type for Kneewa vise its cost details on t	all, Wall, Sill, or he Retrofit Measure (Cost II*	×	L
Type 1 Fiberglass	Name s Batts	Retrofit Me	easure Cost Details form in	order to evaluate it.	cost details on the		R-Value	L
				0				
Measure Cost Set Name: Agency: Audit Type: Te Arthue:	Added Insulation Type- TO 101 NEAT		V EA					
13 MLUYC:	THEAT INSURGOUND	Types (1)	Retrofit Measure Cost Detail	ils - V10				
Detrofit Maxima List			Measure Cost Set Name:	Added Insulation Type-	rdcha			
Index Measure Type	Measure Name	Lifetime Is Acti	Measure Type:	Building Insulation				
15 Building Insulation	Floor Insulation R11	20 Yes	 Measure Name: 	Wall Insulation				
16 Building Insulation	Floor Insulation R19	20 Yes	Lifetime (yr):	30				
18 Building Insulation	Floor Insulation R38	20 Yes	Is Active:	V				
19 Building Insulation	Wall Insulation	30 Yes	Measure Description:	Licer Defined, EG Datt				
20 Building Insulation	Kneewall Insulation	30 Yes	Picasure Description.	use Demet Po bau				
21 Building Insulation	White Roof Coating	7 Yes						
23 Doors and Windows	Weatherize Window	10 Yes	- Cost Details				6	
			Material:	Cost: 5 1.00	per SqPt	TDCHA- Test	Comment	
Comments			Labor:	Cost: 5 1.00	per SaFt	TDHCA- Test		
			Other:	Cost: \$ 0.00	per Each Wall	TDHCA- Test		
			Not considered unless co	ost is specified				
ew Copy Delete							ol	Apply Cance
ency	Manual Cost Cost	Name						
g" TDHCA Staff Training Agency	Added Insulation	Type- TDCHA	All Retrofit Measure Cost D	Details				
rg" TDHCA Staff Training Agency	Default (ORNL) N	EAT Measure Cost v10 Lib	Measure Description			# Audits Last Ed	ited	
rg" TDHCA Staff Training Agency	Default (ORNL) M	IHEA Measure Cost v10 Li	brary User Defined, IC Butt			0 09-11-	2024 2:29 PM	
rg" TDHCA Staff Training Agency	Default (ORNL) M	IulTEA Measure Cost Libra	ry					

6. How should the auditor enter a door on a buffered wall (EX: garage-to-house entry door)?

Replacement of doors on buffered walls is not cost-effective (handled as a non-ECM per guidance), airsealing/weatherizing under General Air sealing is not compatible with the future Energy Plus calculations. As such, doors on buffered walls are neither considered nor allowed in the entries.

7. How should the auditor account for door sq. ft. on a buffered wall if we are unable to enter the door? The auditor has some flexibility here, if you are concerned about the load difference, then it is easy in NEAT to reduce the wall Gross Area (sqft) to account for the door if it were on a buffered wall. If the auditor is worried about the insulation retrofit costs, there is an option to input a negative amount in the additional costs to remove the costs of the 20 sqft. of wall insulation. Either way works. (See Snip below)

Weatherization Assistant - Age	ency 🗸 Account 🗸 Audit (N	IEAT) • Libraries • Work Orders	- Use	r ▼ Release Notes ▼ Opt	ons 🗸 Admin Tools 👻 Help -	-			
NEAT Agency: Oak Ridge Nation	Walls 1 2 3 4 5	6							
Acct.: NEAT Testing - Bill Acct. #: NEAT Testing - Bill Audit: NEAT Random Checks Audit #: 4784	Wall Information Wall Code: Wall Type:	1 Balloon Frame		Existing Insulation Type: R Value:	None	~	Added Insulation Measure Number: Type:	1 V Blown Cellulose	~
General ● ✓ Audit Shell	Exterior Type: Exposed To:	2 X 4 Metal or Vinyl Outside (Ambient)	•				Additional Cost (\$).		
	Orientation: Gross Area (sq ft):	East 1							
→ Foundations Systems	Comments								

- 8. What if a home does not have any showerheads to enter, can the auditor move forward with the audit? Yes, WaWeb NEAT or MHEA do not require these entries (with or without replacement consideration).
- 9. In the previous NEAT version 8, there were separate entries for the heating & cooling sections; do we still need to enter the information separately?

No, within WaWeb version 10, you will no longer need to enter the heating & cooling information separately you may now enter the heating & cooling into a single entry for the existing equipment. In general, you should enter the existing equipment first, then enter the replacement options next. (see below for an example)

xisting HP			- Retront Options to Evaluate -							
Existing Equipment			Install Smart Thermosta	it:	Requi	red 📃 I	nclude in SIR			
HVAC System Code:	Existing HP]	Heating Nighttime Setb	ack (°F):		Daily Setba	ick Hours:	A	dditional Cost (\$):	
Equipment:	Heat Pump - Central	~								
Location:		~	Tune Up:		Requir	red 📃 I	nclude in SIR			
Fuel: Primary	Electricity Backup: None	~	Efficiency Improvement		Heating		Coolina	٨	dditional Cost (\$):	
Efficiency Input Method:	Year Manufactured		enconcy improvement		riedung.		cooning.		uuluunui evat (a).	U
Year Manufactured:	2000 💌		Replace the Equipment:		Requi	red 📃 I	nclude in SIR	M	laterial Cost (\$):	5000
	Heating Cooling									_
Efficiency:	7.4 HSPF 11.21 SEER		Equipment:	Heat Pu	imp - Central		*	1 L	abor Cost (\$):	120
Output Capacity:	36 kBtu/hr 🎽 36 kBtu/hr	~	Fuel: Primary:	Electrici	ty B	ackup: Ele	ctricity		ther Cost (\$)	-
Fraction of Load Served:	1 Estimate 1				lasting		Cooling		(a):	
Equipment Features:	Atmospheric Burner			"	eaung		cooming			
	Automatic Vent Damper		Efficiency:	10.2	HSPF2	15.4	SEER2	*		
	IID Pilot Light On in Summer		Output Capacity:	30	kBtu/hr ¥	2.5	Tons	*		
Year Installed:	~									
Maintenance Status:	Seldom or Never Maintained		Fraction of Load Served:		1		1			
Heating Setback Used:			Also Replaces:					*		
Figure 5: WA	Aweb (NEAT) HVAC Form -									
E	kisting Equipment									

- **10.** Is there a limit of how many heating & cooling system(s) the auditor can enter into WaWeb? NEAT will allow up to 9 systems (any combination) but MHEA will only allow 2 systems.
- 11. When entering the existing equipment, which efficiency input method should be used?

Either way is acceptable. However, if the auditor knows the manufactured date, it is recommended to use this option because the efficiency options will then auto-populate based on the degradation calculation methodology outlined in WPN 23-6, which means this system will only degrade based off the "Annual Professional maintenance" factor the auditor would normally see while using the TDCHA Degradation Calculator. If you want

to quality control check this, then enter the existing equipment information into the Degradation Calculator. The Department would recommend placing a copy into the file as back-up documentation to support the input.

12. What if the home has electric baseboard heat & (4) window units, is it possible to replace the existing equipment with a central heat pump through WaWeb?

Yes, it is possible, but you should ensure you have thorough documentation to support your NEAT inputs. During the evaluation, consider whether the existing home has the capacity to accommodate ductwork, or if it already has ductwork installed. In either case, the auditor must assess whether the home can support a central system. If this isn't feasible, the auditor may opt to replace the current system with a mini-split option to meet the home's heating and cooling needs.

Once this is determined, the auditor must accurately enter the information into WaWeb to evaluate if the replacement option is cost-effective. For example, when considering replacement options, be sure to input all existing equipment, verify that the selected equipment meets Energy Star standards, and use the "Also replaces" option to ensure all equipment being replaced is properly listed. Additionally, include all associated costs when evaluating these options.

13. Within the Ducts tab, if the auditor checks the use defaults box for the surface area of the ducts, is this acceptable?

Yes. It's probably going to be the preferred method unless the auditor has a specific run of duct that is uninsulated then you would want to add this area separately so WaWeb can evaluate the costs associated with the uninsulated ducts.

14. If the initial BD/DB readings from initial assessment are below the DB/DB target within the Blower Door and Duct Blaster Data Sheet, we noticed that if the target after Weatherization is higher than our initial an error message does not allow us to continue, what are we required to enter to continue with the audit? Yes, you may potentially run into this error message which will not let you continue. To bypass this message & continue with the auditor needs to enter the "actual" blower door number for both before & after.

For example, let's say your initial blower door reading is 800 CFM's @50 but the calculated target rate using the BD/DB sheet is 900 CFM's @50. The auditor should put the initial reading in the "After Weatherization (Target or Actual)" input box- See example below to eliminate the error message. The same logic will apply to duct systems. Note: If the Blower Door or Duct Blaster targets fall within the acceptable TDCHA range, additional sealing isn't required. However, if the assessor identifies further sealing needs and funding is necessary, the auditor may estimate a potential final target to assess cost-effectiveness. While not mandatory, additional efforts can be justified with strong documentation in the client file.

Ducts and Infiltration Validation issues	×
Error:	
The calculated air infiltration rate after weatheriza weatherization.	tion is greater than that before
OF	
Whole House Blower Door Measurements	
	Before After Weatherization Weatherization (Existing) (Target or Actual)
Air Leakage Rate (cf	n) 800 800
at House Pressure Difference (F	a) 50 50

15. There are three options for adding exterior shading to windows. Which one should option is recommended? The choice ultimately depends on the current practices of the Subrecipient. Historically, the "Sun Screen Louvered" option has been effective in reducing solar heat gain by at least 80%. If the product meets this specification, it is recommended to select the Sun Screen Louvered option. However, if the material does not meet the 80% or greater solar heat gain reduction criteria, a different shading option must be selected.