

Summary of Residential ACM Tests

Comparison Date: 1/19/2016
Comparison Author: Ken Nittler
Candidate Software: CBECC-Res 2013 812r431
Reference Software: CBECC-Res 2013 812r431
Type of Software: Reference
Type of Construction: Both
Tolerance: 0.03

Test	Pass	Description
T01	Pass	Standard Design in All Zones for Prototype S2100ft2
T02	Pass	Standard Design in All Zones for Prototype S2700ft2
T03	Pass	Standard Design in All Zones for Prototype S6960ft2
T04	Pass	Proposed Design in All Zones for Prototype P2100ft2
T05	Pass	Proposed Design in All Zones for Prototype P2700ft2
T06	Pass	Proposed Design in All Zones for Prototype P6960ft2
T07	Pass	Common Measures in Zone 12 for Prototype P2100ft2
T08	Pass	Water Heating in Zone 12 for Prototype P2100ft2
T09	Pass	Multiple Orientation in Zone 12 for Prototype S2100ft2/P2100ft2
T10	Pass	Multi Family Water Heating in Zone 12 for Prototype P6960ft2
T11	Pass	Source Energy in Zone 12 for Prototype P2100ft2
T12	Pass	E+A+A Base & Windows in Zone 12 for Prototype P1665ft2
T13	Pass	E+A+A Walls & HVAC in Zone 12 for Prototype P1665ft2

Comparison between Reference & Candidate Software in KTDV/ft2

Comparison Date: 1/19/2016
 Comparison Author: Ken Nittler
 Candidate Software: CBECC-Res 2013 812r431

Test	Run	Description	Pass/Fail	Reference Proposed	Candidate Proposed	Percent Difference	Within Tolerance	Standard Equals	Reference Standard	Candidate Standard	Percent Difference	Within Tolerance
T01 Standard Design in All Zones for Prototype S2100ft2				Standard = Proposed for this test								
T01	R01	Zone 01	Pass	48.18	48.18	0.00%	Yes		48.19	48.19	48.19	0.00% Yes
T01	R02	Zone 02	Pass	38.74	38.74	0.00%	Yes		38.74	38.74	38.74	0.00% Yes
T01	R03	Zone 03	Pass	28.18	28.18	0.00%	Yes		28.19	28.19	28.19	0.00% Yes
T01	R04	Zone 04	Pass	34.73	34.73	0.00%	Yes		34.73	34.73	34.73	0.00% Yes
T01	R05	Zone 05	Pass	25.75	25.75	0.00%	Yes		25.75	25.75	25.75	0.00% Yes
T01	R06	Zone 06	Pass	22.03	22.03	0.00%	Yes		22.03	22.03	22.03	0.00% Yes
T01	R07	Zone 07	Pass	16.09	16.09	0.00%	Yes		16.09	16.09	16.09	0.00% Yes
T01	R08	Zone 08	Pass	27.09	27.09	0.00%	Yes		27.09	27.09	27.09	0.00% Yes
T01	R09	Zone 09	Pass	40.32	40.32	0.00%	Yes		40.32	40.32	40.32	0.00% Yes
T01	R10	Zone 10	Pass	41.95	41.95	0.00%	Yes		41.95	41.95	41.95	0.00% Yes
T01	R11	Zone 11	Pass	74.79	74.79	0.00%	Yes		74.79	74.79	74.79	0.00% Yes
T01	R12	Zone 12	Pass	51.43	51.43	0.00%	Yes		51.43	51.43	51.43	0.00% Yes
T01	R13	Zone 13	Pass	77.26	77.26	0.00%	Yes		77.26	77.26	77.26	0.00% Yes
T01	R14	Zone 14	Pass	70.62	70.62	0.00%	Yes		70.62	70.62	70.62	0.00% Yes
T01	R15	Zone 15	Pass	112.05	112.05	0.00%	Yes		112.05	112.05	112.05	0.00% Yes
T01	R16	Zone 16	Pass	67.99	67.99	0.00%	Yes		67.99	67.99	67.99	0.00% Yes
Result T01			Pass									
T02 Standard Design in All Zones for Prototype S2700ft2				Standard = Proposed for this test								
T02	R01	Zone 01	Pass	38.58	38.58	0.00%	Yes		38.58	38.58	38.58	0.00% Yes
T02	R02	Zone 02	Pass	35.45	35.45	0.00%	Yes		35.45	35.45	35.45	0.00% Yes
T02	R03	Zone 03	Pass	23.39	23.39	0.00%	Yes		23.39	23.39	23.39	0.00% Yes
T02	R04	Zone 04	Pass	31.77	31.77	0.00%	Yes		31.77	31.77	31.77	0.00% Yes
T02	R05	Zone 05	Pass	20.77	20.77	0.00%	Yes		20.77	20.77	20.77	0.00% Yes
T02	R06	Zone 06	Pass	19.74	19.74	0.00%	Yes		19.74	19.74	19.74	0.00% Yes
T02	R07	Zone 07	Pass	14.14	14.14	0.00%	Yes		14.14	14.14	14.14	0.00% Yes
T02	R08	Zone 08	Pass	25.44	25.44	0.00%	Yes		25.44	25.44	25.44	0.00% Yes
T02	R09	Zone 09	Pass	38.99	38.99	0.00%	Yes		38.99	38.99	38.99	0.00% Yes
T02	R10	Zone 10	Pass	41.17	41.17	0.00%	Yes		41.17	41.17	41.17	0.00% Yes
T02	R11	Zone 11	Pass	73.22	73.22	0.00%	Yes		73.22	73.22	73.22	0.00% Yes
T02	R12	Zone 12	Pass	50.84	50.84	0.00%	Yes		50.84	50.84	50.84	0.00% Yes
T02	R13	Zone 13	Pass	75.22	75.22	0.00%	Yes		75.22	75.22	75.22	0.00% Yes
T02	R14	Zone 14	Pass	69.38	69.38	0.00%	Yes		69.38	69.38	69.38	0.00% Yes
T02	R15	Zone 15	Pass	106.16	106.16	0.00%	Yes		106.16	106.16	106.16	0.00% Yes
T02	R16	Zone 16	Pass	63.65	63.65	0.00%	Yes		63.65	63.65	63.65	0.00% Yes
Result T02			Pass									
T03 Standard Design in All Zones for Prototype S6960ft2				Standard = Proposed for this test								
T03	R01	Zone 01	Pass	44.63	44.63	0.00%	Yes		44.63	44.63	44.63	0.00% Yes
T03	R02	Zone 02	Pass	46.61	46.61	0.00%	Yes		46.61	46.61	46.61	0.00% Yes
T03	R03	Zone 03	Pass	34.74	34.74	0.00%	Yes		34.74	34.74	34.74	0.00% Yes
T03	R04	Zone 04	Pass	44.26	44.26	0.00%	Yes		44.26	44.26	44.26	0.00% Yes
T03	R05	Zone 05	Pass	33.34	33.34	0.00%	Yes		33.34	33.34	33.34	0.00% Yes
T03	R06	Zone 06	Pass	34.65	34.65	0.00%	Yes		34.65	34.65	34.65	0.00% Yes
T03	R07	Zone 07	Pass	31.66	31.66	0.00%	Yes		31.66	31.66	31.66	0.00% Yes
T03	R08	Zone 08	Pass	45.47	45.47	0.00%	Yes		45.47	45.47	45.47	0.00% Yes
T03	R09	Zone 09	Pass	56.24	56.24	0.00%	Yes		56.24	56.24	56.24	0.00% Yes
T03	R10	Zone 10	Pass	57.75	57.75	0.00%	Yes		57.75	57.75	57.75	0.00% Yes
T03	R11	Zone 11	Pass	82.57	82.57	0.00%	Yes		82.57	82.57	82.57	0.00% Yes
T03	R12	Zone 12	Pass	65.23	65.23	0.00%	Yes		65.23	65.23	65.23	0.00% Yes
T03	R13	Zone 13	Pass	84.05	84.05	0.00%	Yes		84.04	84.04	84.04	0.00% Yes
T03	R14	Zone 14	Pass	78.40	78.40	0.00%	Yes		78.40	78.40	78.40	0.00% Yes
T03	R15	Zone 15	Pass	118.93	118.93	0.00%	Yes		118.93	118.93	118.93	0.00% Yes
T03	R16	Zone 16	Pass	69.49	69.49	0.00%	Yes		69.49	69.49	69.49	0.00% Yes
Result T03			Pass									
T04 Proposed Design in All Zones for Prototype P2100ft2				Standard = T01 Standard for this test								
T04	R01	Zone 01	Pass	46.35	46.35	0.00%	Yes		48.19	48.19	48.19	0.00% Yes
T04	R02	Zone 02	Pass	36.68	36.68	0.00%	Yes		38.74	38.74	38.74	0.00% Yes
T04	R03	Zone 03	Pass	26.11	26.11	0.00%	Yes		28.19	28.19	28.19	0.00% Yes
T04	R04	Zone 04	Pass	32.50	32.50	0.00%	Yes		34.73	34.73	34.73	0.00% Yes
T04	R05	Zone 05	Pass	23.56	23.56	0.00%	Yes		25.75	25.75	25.75	0.00% Yes
T04	R06	Zone 06	Pass	20.49	20.49	0.00%	Yes		22.03	22.03	22.03	0.00% Yes
T04	R07	Zone 07	Pass	15.32	15.32	0.00%	Yes		16.09	16.09	16.09	0.00% Yes
T04	R08	Zone 08	Pass	24.79	24.79	0.00%	Yes		27.09	27.09	27.09	0.00% Yes
T04	R09	Zone 09	Pass	36.56	36.56	0.00%	Yes		40.32	40.32	40.32	0.00% Yes
T04	R10	Zone 10	Pass	37.90	37.90	0.00%	Yes		41.95	41.95	41.95	0.00% Yes
T04	R11	Zone 11	Pass	69.22	69.22	0.00%	Yes		74.79	74.79	74.79	0.00% Yes
T04	R12	Zone 12	Pass	46.99	46.99	0.00%	Yes		51.43	51.43	51.43	0.00% Yes
T04	R13	Zone 13	Pass	71.50	71.50	0.00%	Yes		77.26	77.26	77.26	0.00% Yes
T04	R14	Zone 14	Pass	63.92	63.92	0.00%	Yes		70.62	70.62	70.62	0.00% Yes
T04	R15	Zone 15	Pass	106.47	106.47	0.00%	Yes		112.05	112.05	112.05	0.00% Yes

T04	R16	Zone 16	Pass	63.80	63.80	0.00% Yes	67.99	67.99	67.99	0.00% Yes
Result T04			Pass							
T05	Proposed Design in All Zones for Prototype P2700ft2						Standard = T02 Standard for this test			
T05	R01	Zone 01	Pass	36.72	36.72	0.00% Yes	38.58	38.58	38.58	0.00% Yes
T05	R02	Zone 02	Pass	32.56	32.56	0.00% Yes	35.45	35.45	35.45	0.00% Yes
T05	R03	Zone 03	Pass	21.26	21.26	0.00% Yes	23.39	23.39	23.39	0.00% Yes
T05	R04	Zone 04	Pass	28.83	28.83	0.00% Yes	31.77	31.77	31.77	0.00% Yes
T05	R05	Zone 05	Pass	18.77	18.77	0.00% Yes	20.77	20.77	20.77	0.00% Yes
T05	R06	Zone 06	Pass	18.23	18.23	0.00% Yes	19.74	19.74	19.74	0.00% Yes
T05	R07	Zone 07	Pass	13.35	13.35	0.00% Yes	14.14	14.14	14.14	0.00% Yes
T05	R08	Zone 08	Pass	23.12	23.12	0.00% Yes	25.44	25.44	25.44	0.00% Yes
T05	R09	Zone 09	Pass	34.78	34.78	0.00% Yes	38.99	38.99	38.99	0.00% Yes
T05	R10	Zone 10	Pass	36.69	36.69	0.00% Yes	41.17	41.17	41.17	0.00% Yes
T05	R11	Zone 11	Pass	66.93	66.93	0.00% Yes	73.22	73.22	73.22	0.00% Yes
T05	R12	Zone 12	Pass	45.87	45.87	0.00% Yes	50.84	50.84	50.84	0.00% Yes
T05	R13	Zone 13	Pass	68.61	68.61	0.00% Yes	75.22	75.22	75.22	0.00% Yes
T05	R14	Zone 14	Pass	62.00	62.00	0.00% Yes	69.38	69.38	69.38	0.00% Yes
T05	R15	Zone 15	Pass	99.40	99.40	0.00% Yes	106.16	106.16	106.16	0.00% Yes
T05	R16	Zone 16	Pass	59.04	59.04	0.00% Yes	63.65	63.65	63.65	0.00% Yes
Result T05			Pass							
T06	Proposed Design in All Zones for Prototype P6960ft2						Standard = T03 Standard for this test			
T06	R01	Zone 01	Pass	45.42	45.42	0.00% Yes	44.63	44.63	44.63	0.00% Yes
T06	R02	Zone 02	Pass	44.48	44.48	0.00% Yes	46.61	46.61	46.61	0.00% Yes
T06	R03	Zone 03	Pass	33.66	33.66	0.00% Yes	34.74	34.74	34.74	0.00% Yes
T06	R04	Zone 04	Pass	40.99	40.99	0.00% Yes	44.26	44.26	44.26	0.00% Yes
T06	R05	Zone 05	Pass	32.53	32.53	0.00% Yes	33.34	33.34	33.34	0.00% Yes
T06	R06	Zone 06	Pass	32.77	32.77	0.00% Yes	34.65	34.65	34.65	0.00% Yes
T06	R07	Zone 07	Pass	29.65	29.65	0.00% Yes	31.66	31.66	31.66	0.00% Yes
T06	R08	Zone 08	Pass	42.19	42.19	0.00% Yes	45.47	45.47	45.47	0.00% Yes
T06	R09	Zone 09	Pass	51.31	51.31	0.00% Yes	56.24	56.24	56.24	0.00% Yes
T06	R10	Zone 10	Pass	52.73	52.73	0.00% Yes	57.75	57.75	57.75	0.00% Yes
T06	R11	Zone 11	Pass	76.76	76.76	0.00% Yes	82.57	82.57	82.57	0.00% Yes
T06	R12	Zone 12	Pass	59.96	59.96	0.00% Yes	65.23	65.23	65.23	0.00% Yes
T06	R13	Zone 13	Pass	77.45	77.45	0.00% Yes	84.04	84.04	84.04	0.00% Yes
T06	R14	Zone 14	Pass	72.34	72.34	0.00% Yes	78.40	78.40	78.40	0.00% Yes
T06	R15	Zone 15	Pass	110.58	110.58	0.00% Yes	118.93	118.93	118.93	0.00% Yes
T06	R16	Zone 16	Pass	66.54	66.54	0.00% Yes	69.49	69.49	69.49	0.00% Yes
Result T06			Pass							
T07	Common Measures in Zone 12 for Prototype P2100ft2						Standard = T01 Standard for this test			
T07	R01	Package	Pass	46.99	46.99	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T07	R02	Fenestration U 0.40/S 0.40	Pass	52.18	52.18	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T07	R03	Wall R13	Pass	47.72	47.72	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T07	R04	Ceiling R49	Pass	45.90	45.90	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T07	R05	Furnace AFUE 92	Pass	44.05	44.05	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T07	R06	Air Conditioner SEER 16/EER 14	Pass	45.36	45.36	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T07	R07	No Cool Vent	Pass	51.18	51.18	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T07	R08	Ducts 2% Leakage	Pass	45.76	45.76	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T07	R09	Insulation Construction Quality Improved	Pass	42.18	42.18	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T07	R10	Air Leakage ACH50 2.0	Pass	45.78	45.78	0.00% Yes	51.43	51.43	51.43	0.00% Yes
Result T07			Pass							
T08	Water Heating in Zone 12 for Prototype P2100ft2						Standard = T01 Standard for this test			
T08	R01	Package	Pass	46.99	46.99	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T08	R02	Parallel Piping	Pass	47.10	47.10	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T08	R03	Small Tankless EF 0.80/Input 195000/0 gal	Pass	43.19	43.19	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T08	R04	Large Tankless RE 0.76/Input 300000/0 gal	Pass	43.69	43.69	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T08	R05	Large Storage RE 0.77/Input 100000/75gal/Stby 0.01	Pass	45.65	45.65	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T08	R06	Large Storage RE 0.77/Input 100000/75gal/Stby 0.03	Pass	51.42	51.42	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T08	R07	Electric Resistance EF 0.92/Input 4500	Pass	64.51	64.51	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T08	R08	Heat Pump EF 2.4/Input 4500	Pass	48.72	48.72	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T08	R09	2 Water Heaters using Multiplier	Pass	51.17	51.17	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T08	R10	2 Water Heaters Using 2 entries	Pass	51.17	51.17	0.00% Yes	51.43	51.43	51.43	0.00% Yes
Result T08			Pass							
T09	Multiple Orientation in Zone 12 for Prototype S2100ft2/P2100ft2						Standard = T01 Standard for this test			
T09	R01	Single Standard Front 45	Pass	52.86	52.86	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T09	R02	East Standard	Pass	51.43	51.43	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T09	R03	South Standard	Pass	51.43	51.43	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T09	R04	West Standard	Pass	51.43	51.43	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T09	R05	North Standard	Pass	51.43	51.43	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T09	R06	Single Proposed front 45	Pass	52.50	52.50	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T09	R07	East Proposed	Pass	54.29	54.29	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T09	R08	South Proposed	Pass	47.93	47.93	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T09	R09	West Proposed	Pass	53.13	53.13	0.00% Yes	51.43	51.43	51.43	0.00% Yes
T09	R10	North Proposed	Pass	46.99	46.99	0.00% Yes	51.43	51.43	51.43	0.00% Yes
Result T09			Pass							

T10		Multi Family Water Heating in Zone 12 for Prototype P6960ft2				Standard = Varies for this test						
T10	R01	8 Storage	Pass	59.96	59.96	0.00%	Yes	65.23	65.23	65.23	0.00%	Yes
T10	R02	8 Storage 2 Systems	Pass	59.96	59.96	0.00%	Yes	65.23	65.23	65.23	0.00%	Yes
T10	R03	8 LgStor	Pass	66.44	66.44	0.00%	Yes	65.23	65.23	65.23	0.00%	Yes
T10	R04	2 LgStor Central Solar	Pass	50.11	50.11	0.00%	Yes	55.38	55.38	55.38	0.00%	Yes
T10	R05	2 LgStor Central Solar Recirc	Pass	60.82	60.82	0.00%	Yes	66.09	66.09	66.09	0.00%	Yes
T10	R06	2 LgStor Central Recirc	Pass	65.50	65.50	0.00%	Yes	66.09	66.09	66.09	0.00%	Yes
T10	R07	2 Smlstantant Central Solar	Pass	46.44	46.44	0.00%	Yes	51.71	51.71	51.71	0.00%	Yes
T10	R08	2 Smlstantant Central Solar Recirc	Pass	57.68	57.68	0.00%	Yes	62.95	62.95	62.95	0.00%	Yes
T10	R09	1 Indirect Central Solar	Pass	52.71	52.71	0.00%	Yes	57.33	57.33	57.33	0.00%	Yes
T10	R10	1 Indirect Central Solar Recirc	Pass	64.19	64.19	0.00%	Yes	68.80	68.80	68.80	0.00%	Yes
Result T10			Pass									

T11		Source Energy in Zone 12 for Prototype P2100ft2				Standard = Varies for this test						
T11	R01	Package	Pass	46.99	46.99	0.00%	Yes	51.43	51.43	51.43	0.00%	Yes
T11	R02	Package No Natural Gas	Pass	97.60	97.60	0.00%	Yes	103.63	103.63	103.63	0.00%	Yes
T11	R03	Electric DHW	Pass	63.35	63.35	0.00%	Yes	51.43	51.43	51.43	0.00%	Yes
T11	R04	Electric DHW no Natural Gas	Pass	92.91	92.91	0.00%	Yes	88.55	88.55	88.55	0.00%	Yes
T11	R05	Heatpump DHW	Pass	48.72	48.72	0.00%	Yes	51.43	51.43	51.43	0.00%	Yes
T11	R06	Heatpump DHW no Natural Gas	Pass	78.28	78.28	0.00%	Yes	88.55	88.55	88.55	0.00%	Yes
T11	R07	Heatpump HVAC	Pass	44.09	44.09	0.00%	Yes	49.76	49.76	49.76	0.00%	Yes
T11	R08	Heatpump HVAC no Natural Gas	Pass	65.14	65.14	0.00%	Yes	70.81	70.81	70.81	0.00%	Yes
T11	R09	Heatpump HVAC & DHW	Pass	45.82	45.82	0.00%	Yes	49.76	49.76	49.76	0.00%	Yes
T11	R10	Heatpump HVAC & DHW no Natural Gas	Pass	45.82	45.82	0.00%	Yes	55.73	55.73	55.73	0.00%	Yes
Result T11			Pass									

T12		E+A+A Base & Windows in Zone 12 for Prototype P1665ft2				Standard = Varies for this test						
T12	R01	E 1440ft2 as New Construction	Pass	225.78	225.78	0.00%	Yes	159.59	159.59	159.59	0.00%	Yes
T12	R02	E 1440ft2 as Addition/Alteration	Pass	225.67	225.67	0.00%	Yes	225.67	225.67	225.67	0.00%	Yes
T12	R03	EA 1665ft2	Pass	189.30	189.30	0.00%	Yes	188.72	188.72	188.72	0.00%	Yes
T12	R04	EAA Ceiling R38 Verified	Pass	165.64	165.64	0.00%	Yes	188.72	188.72	188.72	0.00%	Yes
T12	R05	EAA Ceiling R38 Verified Wind U0.41/S0.36	Pass	135.63	135.63	0.00%	Yes	159.42	159.42	159.42	0.00%	Yes
T12	R06	EAA Ceiling R38 Verified Wind U0.41/S0.36 Verified	Pass	135.63	135.63	0.00%	Yes	159.42	159.42	159.42	0.00%	Yes
T12	R07	EAA Ceiling R38 Verified Wind U0.40/S0.35	Pass	134.87	134.87	0.00%	Yes	159.42	159.42	159.42	0.00%	Yes
T12	R08	EAA Ceiling R38 Verified Wind U0.40/S0.35 Verified	Pass	134.87	134.87	0.00%	Yes	188.72	188.72	188.72	0.00%	Yes
T12	R09	EAA Ceiling R38 Verified Wind U0.39/S0.34	Pass	134.21	134.21	0.00%	Yes	159.42	159.42	159.42	0.00%	Yes
T12	R10	EAA Ceiling R38 Verified Wind U0.39/S0.34 Verified	Pass	134.21	134.21	0.00%	Yes	188.72	188.72	188.72	0.00%	Yes
Result T12			Pass									

T13		E+A+A Walls & HVAC in Zone 12 for Prototype P1665ft2				Standard = Varies for this test						
T13	R01	EAA Ceiling R38 Verified Wall R11	Pass	132.75	132.75	0.00%	Yes	155.54	155.54	155.54	0.00%	Yes
T13	R02	EAA Ceiling R38 Verified Wall R11 Verified	Pass	132.75	132.75	0.00%	Yes	155.54	155.54	155.54	0.00%	Yes
T13	R03	EAA Ceiling R38 Verified Wall R13	Pass	130.68	130.68	0.00%	Yes	155.54	155.54	155.54	0.00%	Yes
T13	R04	EAA Ceiling R38 Verified Wall R13 Verified	Pass	130.68	130.68	0.00%	Yes	188.72	188.72	188.72	0.00%	Yes
T13	R05	EAA Ceiling R38 Verified HVAC Worse	Pass	132.18	132.18	0.00%	Yes	122.61	122.61	122.61	0.00%	Yes
T13	R06	EAA Ceiling R38 Verified HVAC Worse Verified	Pass	132.18	132.18	0.00%	Yes	122.61	122.61	122.61	0.00%	Yes
T13	R07	EAA Ceiling R38 Verified HVAC Equal	Pass	108.45	108.45	0.00%	Yes	122.61	122.61	122.61	0.00%	Yes
T13	R08	EAA Ceiling R38 Verified HVAC Equal Verified	Pass	108.45	108.45	0.00%	Yes	188.72	188.72	188.72	0.00%	Yes
T13	R09	EAA Ceiling R38 Verified HVAC Better	Pass	91.58	91.58	0.00%	Yes	122.61	122.61	122.61	0.00%	Yes
T13	R10	EAA Ceiling R38 Verified HVAC Better Verified	Pass	91.58	91.58	0.00%	Yes	188.72	188.72	188.72	0.00%	Yes
Result T13			Pass									