			*	***	Col	umbia 9	county B	iuliding F	'ermit A	pplicati	on .	5	0//
	For	H	ce Use	Only A	pplication #	0710	-34	Date Rece	wed 10/	TOTE	6 P	rmit #	1475/2649
١	A	P	cation /	pproved	by - Zoning	Official_							
	1	G	d Zone	1 plus	Developm	nent Pem	nit <u> </u>	Zoning 🥂	SF-2	and Use	Plan Map	Categor	MES. La Der
	8	H	ments_			.,							
ا	AN.	K			PA - Site			□ State i	Road Info			o Deve	lopment Perm
D	•	•		•	nda Room	<	Sedvi	x Day	is		X	1-785	-4936
					8ths						none <u>45</u>	1-102	- 4-198
					ix Da		7.17	30()	1 (2)		950	1-789	>-4936
					SW 1		MaDle	Day1	ake. C				
					wher Bu					Pho			
					8ths								
					e & Addres								-
	Boi	#	g Co. N	ame & A	ddress	NA							
	Arc	ıř	ict/Engl	l 1007 Nan	ne & Addre	* 4):	IIMye	ers N	ick Gei:	sler			
					e & Addres				90			, W	
	Cir	le	the con	ect powe	r company	FL Po	wer & Ligh	t)- Clay E	iec. – Su	wannee	Volley Be	c. – Pro	gressive Energ
	Pro	HĒ	ly ID Nu	mber	13-45-	16-02	1732-10	23 6	offmated (	Cost of C	onstruction	90	20K
		#	Islon No	me	jure (	akes			~	lat 2	Nock	Hedi	Phone
	Dri				10 W,		Sw	Pinem	tnuoi	Rd	CCR	252	w)
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													an Existing Dr
	Aci	O	Distanc	e of Struc	ture from P		+		7			1-6"	kear <u>5741"</u>
	Tot	i	ullding	leight	37 4	Number	of Stories	He	ated Hog	Area 29	1893	_ Roof P	1ch 8-12
	Api	k	tion is	ieroby m	nde to obtai	n a perm	it to do wo	rk and inst	allations	a indica	led. I certif	y that n	o work or
	ine!	M II	tion has	i commer ing consi	iced prior to truction in t	o the lesu his juried	iance of a   liction.	permit and	that all w	ork be pe	rformed to	meet ti	ne standards o
	OW	IE	ts AFFI	DAVIT: 11	nereby certi	fy that ali	the foreg	oing Inform	ation is a	ocurate s	ınd <b>all</b> wor	k will be	done in
/	con		ince wi	ih ali appi	icable laws	and regu	lating con	struction a	nd zoning	<b>L</b>			74
1	₩	1	NG TO	WNER:	YOUR FAIL! ENTS TO Y	URE TO F OUR PRO	RECORD A DPERTY. #	NOTICE OF YOU INTE	F COMME ND TO OF	NCMENTAIN FIN	MAY RE	BULT IN CONSU	YOU PAYING LT WITH YOUR
L		)	R OR A	TORNEY	BEFORE F	RECORDI	NG YOUR	NOTICE OF	COMME	NCEMEN	Т,		9
	(		Sed	rish	Davis	ر							
	Ōw		Builder	or Author	rized Person	by Note	ida R. Ro	der		or Signa			•
1	<b>ST</b> /	n	OF FLC		* = *		mission #DD30 res: Mar 24,		Compet	ency Car	nse Numb d Number_	er	
	CO			XUMBIA	of OF	FLORINA Atlan	Bonded Thru		NOTARY	STAMP	SEAL	(4)	10 H
	Sw this	T	to (or at		nd subscrib	POPULATION	e me	7	-	Suil	10 D	00	
		-		day of			20.10 1			jus	m K.	# <i>101</i>	7
	T GI	U	ally kno	/ WIII	or Produce			-	MOEMY	Signatur			(Revised Sept. 20

### STOP WORK

Columbia County

### OFFICE OF BUILDING OFFICIAL

### NOTICE

This building has been inspected and

The building had boot mop	
General Construc	ction
Agency of the Assession	nry and Finish Cement Work
☐ Lathing	•
☐ Plastering	t e e e e e e e e e e e e e e e e e e e
☐ Elevators	
☐ Plumbing	
Mechanical Work	<
Electric Wiring	
☐ Gas Piping	
IS NO	T ACCEPTED
Please correct as noted be	elow before any further work is done
Please correct as noted be	elow before any further work is done.
•	- NOTE/
Please correct as noted be 2/28/08  Date	- NOTE/
2/28/08 Date	- NOTE - /
2/28/08 Date <b>Do Not</b>	- NOTE - HARRY DICKS Inspector Remove This Notice
De Not	- NOTE - HARRY DICKS
De Not	- NOTE - HARRY DICKS Inspector Remove This Notice
De Not	- NOTE - HARRY DICKS Inspector Remove This Notice
De Not Location: 20 S S W	- NOTE - HARRY DICKS Inspector Remove This Notice
Do Not Do	Inspector  Remove This Notice  In this Portion of Card With You.  Rep Mark Way
De Not Location: 20 S S W	Inspector  Remove This Notice  Inspector  Remove This Notice  Inspector  Remove This Notice  Remove This Notice  Remove This Notice  Remove This Notice
Do Not Do	Inspector  Remove This Notice  Inspector  Remove This Notice  Inspector  Remove This Notice  Remove This Notice  Remove This Notice  Remove This Notice

Date	Inspection	Inspect.	Owner	Pass	Location	Permit
01/17/08	Final	HD-WR	Cooks Heat & Air - Brashear	Not Ready	Deerwood Forest Lot 17 U-1	26374
01/18/08	Recheck Final		Cooks Heat & Air - Brashear	Cancelled	Deerwood Forest Lot 17	26374
01/29/08	Final	Harry	Cooks Heat & Air - Brashear	Not Right	Deerwood Forest Lot 17 U-1	26374

To whom this may concern I Sedrix Davis do hereby give Calvin twensey Permisson to pull building permits and to conduct any other business concurning the development of this property. I give him the right to sign my name to any forms necessary. Concerning Laurel Lake Lot 3 Columbia County, FL Sedrix Davis

Terrance M. Fuller
Commission # DD348762

Expires: OCT. 08, 2008

State of Florida

County of Broward

Done this 14th day of Nov. 2007.

Sedut Davis

### **Columbia County Building Department Culvert Permit**

### Culvert Permit No.

000001475

DATE <u>11/</u>	14/2007 PARCEL ID #	03-4S-16-02732-103	
APPLICANT	CALVIN TWENSEY	PHONE 758-4	511
ADDRESS .	201 SW PAUL ALLISON CT	LAKE CITY	FL 32024
OWNER S	EDRIX DAVIS	PHONE 954-7	85-4936
ADDRESS _2	208 SW RED MAPLE WAY	LAKE CITY	FL <u>32024</u>
CONTRACTO	OR OWNER BUILDER	PHONE	
LOCATION C	OF PROPERTY 90 W, L PINEMOUNT RD, I	RED MAPLE WAY, 2ND LOT C	N
THE RIGHT PAS	ST CAMPHOR CT		
SIGNATURE	INSTALLATION REQUIREMENTS Culvert size will be 18 inches in diamete driving surface. Both ends will be mitere thick reinforced concrete slab.  INSTALLATION NOTE: Turnouts will be a) a majority of the current and existin b) the driveway to be served will be pa Turnouts shall be concrete or paved concrete or paved driveway, whicher current and existing paved or concrete.	r with a total lenght of 32 feet d 4 foot with a 4 : 1 slope and e required as follows: g driveway turnouts are pavelyed or formed with concrete. a minimum of 12 feet wide over is greater. The width shall eted turnouts.	I poured with a 4 inch d, or; r the width of the conform to the
	Culvert installation shall conform to the	approved site plan standards	S.
	Department of Transportation Permit in	stallation approved standards	s.
	Other		
	•		
		100.00	

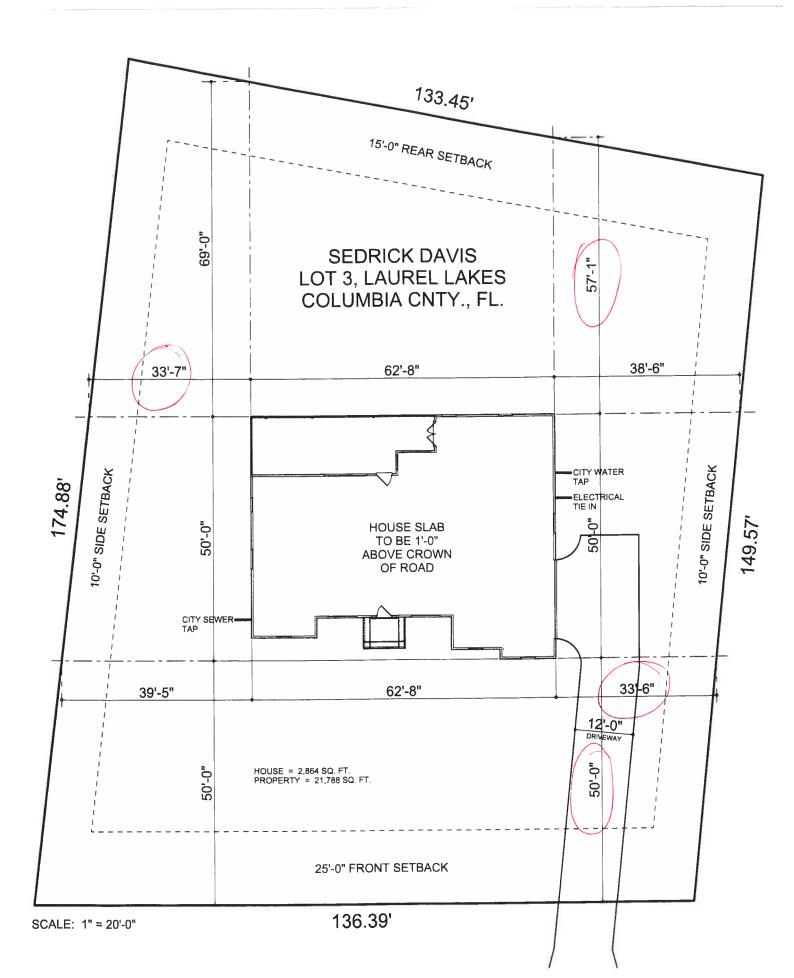
ALL PROPER SAFETY REQUIREMENTS SHOULD BE FOLLOWED DURING THE INSTALATION OF THE CULVERT.

135 NE Hernando Ave., Suite B-21 Lake City, FL 32055

Phone: 386-758-1008 Fax: 386-758-2160

Amount Paid 25.00





1/W/JB 31423.001

### THIS INSTRUMENT PREPARED BY AND RETURN TO:

Cohen, Norris, Scherer, Weinberger & Wolmer 712 U.S. Highway One, Suite 400 North Palm Beach, Fl 33408

Inst:200712020468 Date:9/10/2007 Time:12:49 PM Doc Stamp-Deed:336:00 321/2 DC,P.DeWitt Cason ,Columbia County Page 1 of 2

Property Appraisers Parcel Identification (Folio) Number: 03-45-16-02732-103

SPACE ABOVE THIS LINE FOR RECORDING DATA
--

THIS WARRANTY DEED, made the 7th day of September, 2007 by KATHY E. GALLIN, A MARRIED WOMAN, herein called the Grantor, whose post office address is 118 CHERRY LAUREL DRIVE, JUPITER, FL 33458 to SEDRIX Q. DAVIS, A MARRIED MAN, whose post office address is 336 NW 8TH STREET, POMPANO BEACH, FL 33060, hereinafter called the Grantee:

(Wherever used herein the terms "Grantor" and "Grantee" include all the parties to this instrument and the heirs, legal representatives and assigns of individuals, and the successors and assigns of corporations)

WITNESSETH: That the Grantor, for and in consideration of the sum of TEN AND 00/100'S (\$10.00) Dollars and other valuable considerations, receipt whereof is hereby acknowledged, hereby grants, bargains, sells, aliens, remises, releases, conveys and confirms unto the Grantee all that certain land situate in COLUMBIA County, State of Florida, viz.:

Lot 3, Laurel Lake, according to the map or plat thereof, as recorded in Plat Book 7, Page 9, of the Public Records of Columbia County, Florida.

SUBJECT TO easements, restrictions and reservations of record and to taxes for the year 2007 and thereafter.

TOGETHER, with all the tenements, hereditaments and appurtenances thereto belonging or in anywise appertaining.

GRANTOR STATES THAT SUBJECT PROPERTY IS VACANT LAND AND NOT THE HOMESTEAD OF HER SELF OR HER SPOUSE AND THAT SHE RESIDES AT 118 CHERRY LAUREL DRIVE, JUPITER, FL 33458.

TO HAVE AND TO HOLD, the same in fee simple forever.

AND, the Grantor hereby covenants with said Grantee that the Grantor is lawfully seized of said land in fee simple; that the Grantor has good right and lawful authority to sell and convey said land, and hereby warrants the title to said land and will defend the same against the lawful claims of all persons whomsoever; and that said land is free of all encumbrances, except taxes accruing subsequent to December 31, 2006.

IN WITNESS WHEREOF, the said Grantor has signed and scaled these presents the day and year first above written.

Witness #1 Signature

JANIS H. GADARIAN

Witness #1 Printed Name

Signed, sealed and delivered in the presence of:

Witness #2 Signature

Witness #2 Printed Name

### STATE OF FLORIDA COUNTY OF COLUMBIA

The foregoing instrument was acknowledged before me this 7th day of September, 2007 by KATHY E. GALLIN who is personally known to me or has produced <u>ORIVER'S LICEASE</u> as identification.

SEAL



Notary Public

Printed Notary Name

### NOTORIZED DISCLOSURE STATEMENT

FOR OWNER/BUILDER WHEN ACTING AS THER OWN CONTRACT OR AND CLAIMING EXEMPTION OF CONTRACTOR LICENSING REQUIREMENTS IN ACCORDANCE WITH FLORIDA STATUTES, ss. 489.103(7).

State law requires construction to be done by licensed contractors. You have applied for a permit ander an exemption to that law. The exemption allows you, as the owner of your property, to act as your ow contractor with certain restrictions even though you do not have a license. You must provide direc onsite supervision of the construction yourself. You may build or improve a one-family or two- amily res lence or a farm outbuilding. You may also build or improve a commercial building, provided your costs lo not exceed \$75,000. The building or residence must be for your own use or occupancy. It may not be b ilt or substantially improved for sale or lease. If you sell or lease a building you have built or substantial improved yourself within 1 year after the construction is complete, the law will presume that you built or substantially improved it for sale or lease, which is a violation of this exemption. You may not hire in unlicensed person to act as your contractor or to supervise people working on your building. It is your responsibility to make sure that people employed by you have licenses required by state law and by county or municipal licensing ordinances. You may not delegate the responsibility for supervisir g work to licensed contractor who is not licensed to perform the work being done. Any person working on your building who is not licensed must work under your direct supervision and must be empleyed by yo, which means that you must deduct F.I.C.A. and withholding tax and provide workers' compensation for hat employee, all as prescribed by law. Your construction must comply with all applicable la vs, ording aces, building codes, and zoning regulations.

() Single For II D. III	TYPE OF CONSTRUCTION	
() Single Family Dwelling () Farm Outbuilding	() Two-Family Residence () Other	
() New Construction	NEW CONSTRUCTION OR IMPROVEMENT  () Addition, Alteration, Modification or other In provement	
exemption from contractor lie provided for in Florida Status Columbia County Building Po	censing as an owner/builder. I agree to comply with all requ rements tes ss.489.103(7) allowing this exception for the construction and the second statements.	r
Sednit Dan Owner Builder Signature	Date	*
The above signer is personally produced identification	y known to me or  Linda R. Roder Commission #DD303275 Expires: Mar 24, 2008 Bonded Thru Atlantic Bonding Co., Inc.	
Notary Signature Tub	Le Pale Date 10-15-07 (Stamp 'Seal)	
I hereby certify that the above Statutes ss 489.103(7).	FOR BUILDING USE ONLY e listed owner/builder has been notified of the disclosure statement in laborida	,

Building Official/Representative\_

Date 11-14-07



### Columbia County, Florida Building & Zoning Department

Number of pages including cover sheet: 3
Date: <u>2-28-08</u>

To:     Mr. Lambert  Phone: Fax: 352-333-2867	From: Laurie Hodson Email: laurie_hodson@columbia countyfla.com
	Phone: <u>386-758-1008</u> Fax: <u>386-758-2160</u>

Remarks:	□ Urgent	☐ For review		□ Please comment					
Here is t	he inforr	nation Ran	dy Jones	s asked you					
<u>receive.</u>	receive.								
Thank yo	ou, Lauri	<u>e</u>							

Confidentiality Notice: This facsimile transmission is confidential and is intended only for the review of the party to whom it is addressed. It may contain proprietary and/or privileged information protected by law. If you are not the intended recipient, you may not use, copy or distribute this facsimile message or its attachments. If you have received this transmission in error, please immediately telephone the sender above to arrange for its return.

### STOP WORK

Columbia County
JURISDICTION

### OFFICE OF BUILDING OFFICIAL

### NOTICE

Project Name:

Sedrick Davis

### FLORIDA ENERGY EFFICIENCY CODE FOR BUILDING CONSTRUCTION

Florida Department of Community Affairs
Residential Whole Building Performance Method A

Builder:

City, State: I Owner: (	.ot: 3, Sub: Laurel Lake, .ake City, FL 32025- Custom Residence lorth	Plat:	Jurisdiction Number:	715 7100
<ol> <li>New construction or</li> <li>Single family or multi</li> <li>Number of units, if n</li> <li>Number of Bedrooms</li> <li>Is this a worst case?</li> <li>Conditioned floor are</li> <li>Glass type 1 and area</li> <li>U-factor:</li> </ol>	existing i-family sulti-family  a (ft²) (Label reqd. by 13-104.4.5 if not percentage) DEFAULT)  7a. (Dble Default)  FAULT)  7b. (Clear)  Insulation  R=5.0, 21  or R=13.0, 12  ent  R=30.0, 26	e family a. 1 b. No l893 ft² c. default) Area	Cooling systems Central Unit  N/A  N/A  Heating systems Electric Heat Pump  N/A  N/A  Hot water systems Electric Resistance  N/A  Conservation credits (HR-Heat recovery, Solar DHP-Dedicated heat pump)  HVAC credits (CF-Ceiling fan, CV-Cross ventilation, HF-Whole house fan, PT-Programmable Thermostat, MZ-C-Multizone cooling,	Cap: 44.0 kBtu/hr SEER: 13.00 —  Cap: 44.0 kBtu/hr HSPF: 7.70 —  Cap: 80.0 gallons EF: 0.90 —  PT, —
b. N/A	-tota	l as-built points:	MZ-H-Multizone heating)	
Glass/F	loor Area: U ZU	otal base points:		Ö

I hereby certify that the plans and specifications covered by this calculation are in compliance with the Florida Energy Code.

PREPARED BY:

DATE.

I hereby certify that this building, as designed, is in compliance

with the Florida Energy Code.

OWNER/AGENT

DATE: 16 (C

Review of the plans and specifications covered by this calculation indicates compliance with the Florida Energy Code. Before construction is completed this building will be inspected for compliance with Section 553.908

Florida Statutes.

**BUILDING OFFICIAL:** 

DATE:

<sup>1</sup> Predominant glass type. For actual glass type and areas, see Summer & Winter Glass output on pages 2&4. EnergyGauge® (Version: FLRCPB v4.5.2)

### **SUMMER CALCULATIONS**

### Residential Whole Building Performance Method A - Details

ADDRESS: Lot: 3, Sub: Laurel Lake, Plat: , Lake City, FL, 32025-

PERMIT #:

BASE	AS-BUILT				
GLASS TYPES .18 X Conditioned X BSPM = Points Floor Area		verhang nt Len Hgt	Area X SPM X	SOF = Points	
.18 1893.0 18.59 6334.0	1.Double, Clear	W 13.5 10.0	63.0 38.52	0.47 1131.0	
	· '	W 13.5 10.0		0.47 359.0	
	3.Double, Clear	S 31.5 10.0		0.43 325.0	
	<b>■</b>	W 8.5 10.0		0.57 916.0	
	5.Double, Clear	S 8.0 10.0		0.55 705.0	
	6.Double, Clear 7.Double, Clear	W 1.5 10.0 N 1.5 8.0		0.98 1583.0 0.97 297.0	
	8.Double, Clear	E 1.5 10.0		0.97 297.0	
	9.Double, Clear	E 1.5 10.0		0.98 822.0	
	10.Double, Clear	E 7.5 12.0		0.65 365.0	
	11.Double, Clear	E 7.5 12.0		0.65 342.0	
	12.Double, Clear	E 1.5 8.0		0.96 604.0	
	13.Double, Clear	S 1.5 8.0	2.7 35.87	0.92 88.0	
	14.Double, Clear	S 1.5 8.0	15.0 35.87	0.92 496.0	
	As-Built Total:		378.1	10501.0	
WALL TYPES Area X BSPM = Points	Туре	R-Value	e Area X SPN	1 = Points	
Adjacent 270.0 0.70 189.0	1. Frame, Wood, Exterior	13.0	1207.9 1.50	1811.9	
Exterior 1207.9 1.70 2053.4	2. Frame, Wood, Adjacent	13.0	270.0 0.60	162.0	
Base Total: 1477.9 2242.4	As-Built Total:		1477.9	1973.9	
<b>DOOR TYPES</b> Area X BSPM = Points	Туре		Area X SPM	1 = Points	
Adjacent 18.0 2.40 43.2	1.Exterior Insulated		20.0 4.10	82.0	
Exterior 20.0 6.10 122.0	2.Adjacent Insulated		18.0 1.60	28.8	
Base Total: 38.0 165.2	As-Built Total:		38.0	110.8	
CEILING TYPES Area X BSPM = Points	Туре	R-Value	Area X SPM X SC	CM = Points	
Under Attic 1893.0 1.73 3274.9	1. Under Attic	30.0	2000.0 1.73 X 1.00	3460.0	
Base Total: 1893.0 3274.9	As-Built Total:		2000.0	3460.0	
FLOOR TYPES Area X BSPM = Points	Туре	R-Value	e Area X SPM	1 = Points	
Slab         216.0(p)         -37.0         -7992.0           Raised         0.0         0.00         0.0	Slab-On-Grade Edge Insulation	5.0	216.0(p -36.20	-7819.2	
Base Total: -7992.0	As-Built Total:		216.0	-7819.2	

### **SUMMER CALCULATIONS**

### Residential Whole Building Performance Method A - Details

ADDRESS: Lot: 3, Sub: Laurel Lake, Plat: , Lake City, FL, 32025- PERMIT #:

BASE	AS-BUILT					
INFILTRATION Area X BSPM = Point	s Area X SPM = Points					
1893.0 10.21 19327	5 1893.0 10.21 19327.5					
Summer Base Points: 23352.0	Summer As-Built Points: 27554.0					
Total Summer X System = Cooling Points Multiplier Points	Total X Cap X Duct X System X Credit = Cooling Component Ratio Multiplier Multiplier Multiplier Points (System - Points) (DM x DSM x AHU)					
23352.0 0.3250 7589.	(sys 1: Central Unit 44000btuh ,SEER/EFF(13.0) Ducts:Unc(S),Unc(R),Gar(AH),R6.0(INS) 27554					

### WINTER CALCULATIONS

### Residential Whole Building Performance Method A - Details

ADDRESS: Lot: 3, Sub: Laurel Lake, Plat: , Lake City, FL, 32025-

PERMIT #:

BASE	AS-BUILT					
GLASS TYPES .18 X Conditioned X BWPM = Points Floor Area	Ov Type/SC Ornt	erhang Len Hgt Ar	rea X WPM X WO	)F = Points		
.18 1893.0 20.17 6873.0	1.Double, Clear	N 13.5 10.0	63.0 20.73 1.20	1561.0		
	2.Double, Clear	N 13.5 10.0	20.0 20.73 1.20	495.0		
	3.Double, Clear	S 31.5 10.0	21.0 13.30 3.66	1022.0		
	4.Double, Clear	N 8.5 10.0	42.0 20.73 1.15	1001.0		
	· ·	S 8.0 10.0	35.6 13.30 2.38			
	· ·	N 1.5 10.0	42.0 20.73 1.01			
	· ·	N 1.5 8.0	16.0 24.58 1.00	1		
		E 1.5 10.0	60.0 18.79 1.01			
	· '	E 1.5 10.0	20.0 18.79 1.01			
	· '	E 7.5 12.0	13.3 18.79 1.17			
	'	E 7.5 12.0	12.5 18.79 1.17			
		E 1.5 8.0	15.0 18.79 1.02			
	·	S 1.5 8.0 S 1.5 8.0	2.7 13.30 1.04 15.0 13.30 1.04			
	14.Double, Clear	3 1.5 6.0	15.0 15.30 1.04	207.0		
	As-Built Total:	3	78.1	9089.0		
WALL TYPES Area X BWPM = Points	Туре	R-Value	Area X WPM =	Points		
Adjacent 270.0 3.60 972.0	1. Frame, Wood, Exterior	13.0 12	07.9 3.40	4106.9		
Exterior 1207.9 3.70 4469.2	2. Frame, Wood, Adjacent		70.0 3.30	891.0		
Base Total: 1477.9 5441.2	As-Built Total:	14	77.9	4997.9		
DOOR TYPES Area X BWPM = Points	Туре		Area X WPM =	Points		
Adjacent 18.0 11.50 207.0	1.Exterior Insulated		20.0 8.40	168.0		
Exterior 20.0 12.30 246.0	2.Adjacent Insulated		18.0 8.00	144.0		
20.0 12.00 240.0	z.r ajacent modated		10.0	171.0		
Base Total: 38.0 453.0	As-Built Total:	,	38.0	312.0		
CEILING TYPES Area X BWPM = Points	Type F	R-Value Area	X WPM X WCM =	Points		
Under Attic 1893.0 2.05 3880.6	1. Under Attic	30.0 20	00.0 2.05 X 1.00	4100.0		
Base Total: 1893.0 3880.6	As-Built Total:	200	00.0	4100.0		
FLOOR TYPES Area X BWPM = Points	Туре	R-Value	Area X WPM =	Points		
Slab 216.0(p) 8.9 1922.4	1. Slab-On-Grade Edge Insulation	5.0 216	5.0(p 7.60	1641.6		
Raised 0.0 0.00 0.0						
Base Total: 1922.4	As-Built Total:	2	16.0	1641.6		

### WINTER CALCULATIONS

### Residential Whole Building Performance Method A - Details

ADDRESS: Lot: 3, Sub: Laurel Lake, Plat: , Lake City, FL, 32025- PERMIT #:

BASE	AS-BUILT					
INFILTRATION Area X BWPM = Points	Area X WPM = Points					
1893.0 -0.59 -1116.9	1893.0 -0.59 -1116.9					
Winter Base Points: 17453.4	Winter As-Built Points: 19023.6					
Total Winter X System = Heating Points Multiplier Points	Total X Cap X Duct X System X Credit = Heating Component Ratio Multiplier Multiplier Multiplier Points (System - Points) (DM x DSM x AHU)					
17453.4 0.5540 9669.2	(sys 1: Electric Heat Pump 44000 btuh ,EFF(7.7) Ducts:Unc(S),Unc(R),Gar(AH),R6.0         19023.6       1.000 (1.069 x 1.000 x 1.00) 0.443       0.950 8555.7         19023.6       1.00 1.069 0.443       0.950 8555.7					

### WATER HEATING & CODE COMPLIANCE STATUS

Residential Whole Building Performance Method A - Details

ADDRESS: Lot: 3, Sub: Laurel Lake, Plat: , Lake City, FL, 32025-PERMIT #:

BASE					AS-BUILT								
WATER HEA Number of Bedrooms	TING	Multiplier	=	Total	Tank Volume	EF	Number of Bedrooms	x	Tank X Ratio	Multiplier	X Credit Multiplie		otal
3		2635.00		7905.0	80.0	0.90	3		1.00	2693.56	1.00	80	80.7
					As-Built To	tal:						80	80.7

CODE COMPLIANCE STATUS									
BASE			AS-BUILT						
Cooling + Points	Heating Points	Hot Water Points	= Total Points	Cooling Points	+ Heating Points	+	Hot Water Points	=	Total Points
7589	9669	7905	25164	7418	8556		8081		24055

**PASS** 



### **Code Compliance Checklist**

### Residential Whole Building Performance Method A - Details

ADDRESS: Lot: 3, Sub: Laurel Lake, Plat: , Lake City, FL, 32025-

PERMIT #:

### 6A-21 INFILTRATION REDUCTION COMPLIANCE CHECKLIST

COMPONENTS	SECTION	REQUIREMENTS FOR EACH PRACTICE	CHECK
Exterior Windows & Doors	606.1.ABC.1.1	Maximum:.3 cfm/sq.ft. window area; .5 cfm/sq.ft. door area.	
Exterior & Adjacent Walls	606.1.ABC.1.2.1	Caulk, gasket, weatherstrip or seal between: windows/doors & frames, surrounding wall; foundation & wall sole or sill plate; joints between exterior wall panels at corners; utility penetrations; between wall panels & top/bottom plates; between walls and floor. EXCEPTION: Frame walls where a continuous infiltration barrier is installed that extends from, and is sealed to, the foundation to the top plate.	
Floors	606.1.ABC.1.2.2	Penetrations/openings >1/8" sealed unless backed by truss or joint members.  EXCEPTION: Frame floors where a continuous infiltration barrier is installed that is sealed to the perimeter, penetrations and seams.	
Ceilings	606.1.ABC.1.2.3	Between walls & ceilings; penetrations of ceiling plane of top floor; around shafts, chases, soffits, chimneys, cabinets sealed to continuous air barrier; gaps in gyp board & top plate; attic access. EXCEPTION: Frame ceilings where a continuous infiltration barrier is installed that is sealed at the perimeter, at penetrations and seams.	
Recessed Lighting Fixtures	606.1.ABC.1.2.4	Type IC rated with no penetrations, sealed; or Type IC or non-IC rated, installed inside a sealed box with 1/2" clearance & 3" from insulation; or Type IC rated with < 2.0 cfm from conditioned space, tested.	
Multi-story Houses	606.1.ABC.1.2.5	Air barrier on perimeter of floor cavity between floors.	
Additional Infiltration reqts	606.1.ABC.1.3	Exhaust fans vented to outdoors, dampers; combustion space heaters comply with NFPA, have combustion air.	

### 6A-22 OTHER PRESCRIPTIVE MEASURES (must be met or exceeded by all residences.)

COMPONENTS	SECTION	REQUIREMENTS	CHECK
Water Heaters	612.1	Comply with efficiency requirements in Table 612.1.ABC.3.2. Switch or clearly marked cirbreaker (electric) or cutoff (gas) must be provided. External or built-in heat trap required.	
Swimming Pools & Spas	612.1	Spas & heated pools must have covers (except solar heated). Non-commercial pools must have a pump timer. Gas spa & pool heaters must have a minimum thermal efficiency of 78%.	
Shower heads	612.1	Water flow must be restricted to no more than 2.5 gallons per minute at 80 PSIG.	
Air Distribution Systems	610.1	All ducts, fittings, mechanical equipment and plenum chambers shall be mechanically attached, sealed, insulated, and installed in accordance with the criteria of Section 610. Ducts in unconditioned attics: R-6 min. insulation.	
HVAC Controls	607.1	Separate readily accessible manual or automatic thermostat for each system.	
Insulation	604.1, 602.1	Ceilings-Min. R-19. Common walls-Frame R-11 or CBS R-3 both sides.  Common ceiling & floors R-11.	

Tested sealed ducts must be certified in this house.

### ENERGY PERFORMANCE LEVEL (EPL) DISPLAY CARD

### ESTIMATED ENERGY PERFORMANCE SCORE\* = 85.4

The higher the score, the more efficient the home.

Custom Residence, Lot: 3, Sub: Laurel Lake, Plat: , Lake City, FL, 32025-

1.	New construction or existing	New	y	12.	Cooling systems		
2.	Single family or multi-family	Single family		a.	Central Unit	Cap: 44.0 kBtu/hr	-
3.	Number of units, if multi-family	1				SEER: 13.00	_
4.	Number of Bedrooms	3		b.	N/A		
5.	Is this a worst case?	No	_				
6.	Conditioned floor area (fl²)	1893 ft²	_	c.	N/A		
7.	Glass type I and area: (Label reqd.	by 13-104.4.5 if not default)					
a.	U-factor:	Description Area		13.	Heating systems		0.00
	(or Single or Double DEFAULT)	7a. (Dble Default) 378.1 ft <sup>2</sup>			Electric Heat Pump	Cap: 44.0 kBtu/hr	
b.	SHGC:	(	200		•	HSPF: 7.70	
	(or Clear or Tint DEFAULT)	7b. (Clear) 378.1 ft <sup>2</sup>		b.	N/A		
8.	Floor types	(=====,======					
a.	Slab-On-Grade Edge Insulation	R=5.0, 216.0(p) ft		c.	N/A		
b.	N/A	•					
c.	N/A		_	14.	Hot water systems		
9.	Wall types		_		Electric Resistance	Cap: 80.0 gallons	
a.	Frame, Wood, Exterior	R=13.0, 1207.9 ft <sup>2</sup>				EF: 0.90	Ξ
b.	Frame, Wood, Adjacent	R=13.0, 270.0 ft <sup>2</sup>		b.	N/A		
c.	N/A						
d.	N/A		_	c.	Conservation credits		
e.	N/A		-		(HR-Heat recovery, Solar		
10.	Ceiling types				DHP-Dedicated heat pump)		
a.	Under Attic	R=30.0, 2000.0 ft <sup>2</sup>		15.	HVAC credits	PT,	
b.	N/A	,			(CF-Ceiling fan, CV-Cross ventilation,	,	
c.	N/A				HF-Whole house fan,		
11.	Ducts(Leak Free)				PT-Programmable Thermostat,		
a.	Sup: Unc. Ret: Unc. AH: Garage	Sup. R=6.0, 45.0 ft			MZ-C-Multizone cooling,		
	N/A	• ,			MZ-H-Multizone heating)		
			-				
I ce	rtify that this home has complic	ed with the Florida Energ	v Effic	iency	Code For Building		
	struction through the above en					OF THE STATE	
	nis home before final inspection						B
	ed on installed Code compliant		op 14	,	a oo oompietee		ξ
	-		Doto				
Dul	der Signature:		Date	•		10 I	× I
						1	A

\*NOTE: The home's estimated energy performance score is only available through the FLA/RES computer program. This is not a Building Energy Rating. If your score is 80 or greater (or 86 for a US EPA/DOE EnergyStar designation), your home may qualify for energy efficiency mortgage (EEM) incentives if you obtain a Florida Energy Gauge Rating. Contact the Energy Gauge Hotline at 321/638-1492 or see the Energy Gauge web site at www.fsec.ucf.edu for information and a list of certified Raters. For information about Florida's Energy Efficiency Code For Building Construction, contact the Department of Community Affairs at 850/487-1824.

City/FL Zip:

Address of New Home:

### **Energy Code Compliance**

### **Duct System Performance Report**

Project Name:

Sedrick Davis

Address:

City, State: Owner: Lake City, FL 32025-Custom Residence

Climate Zone:

North

Builder:

Owner

Permitting Office: Permit Number: Jurisdiction Number:

### **Total Duct System Leakage Test Results**

CFM	CFM25 Total Duct Leakage Test Values								
Line	System	Duct Leakage Total	Duct Leakage to Outdoors						
1	System1	cfm25(tot)	cfm25(out)						
2	System2	cfm25(tot)	cfm25(out)						
3	System3	cfm25(tot)	cfm25(out)						
4	System4	cfm25(tot)	cfm25(out)						
5	Total House Duct System Leakage	Sum lines 1-4  Divide by  (Total Conditioned Floor Area)  =(Q <sub>n</sub> ,tot)  Receive credit if Q <sub>n</sub> ,tot≤ 0.03	Sum lines 1-4  Divide by  (Total Conditioned Floor Area)  =(Q <sub>n</sub> ,out)  Receive credit if Q <sub>n</sub> ,out≤ 0.03  AND Q <sub>n</sub> ,tot≤ 0.09						

I hereby certify that the above duct testing performance results demonstrate compliance with the Florida Energy Code requirements in accordance with Section 610.1.A.1, Florida Building Code, Building Volume, Chapter 13 for leak free duct system credit.

Signature: \_\_\_\_\_
Printed Name: \_\_\_\_\_

Florida Rater Certification #:

DATE:

Florida Building Code requires that testing to confirm leak free duct systems be performed by a Class 1 Florida Energy Gauge Certified Energy Rater. Certified Florida Class 1 raters can be found at: http://energygauge.com/search.htp



BUILDING OFFICIAL: \_\_\_\_\_\_

### CLIMATE PRO® FIBER GLASS BLOWING WOOL

Your home has been professionally insulated to provide a guaranteed thermal resistance.

a guaranteed thermal resistance.					
- Moderon Ambress Ener (		NEA	PE	AP	
		RECORD OF INSTALLATIO	N		
	BLOWING WOOL			AND ROLLS	
New Construction	IF RETROFIT:		R-VALUE	FHICKNESS	AREA INSULATED
☐ RETROFIT	DEPTH OF PREVIO INSULATION	CEILINGS		IN	SQ. FT.
Number of bags used	1093	INCHES -			SQ. FT.
AREA INSULATED	SO. FI. PREVIOUS INSUI			IN	SQ. FT.
THICKNESS OF INSULATION					SQ. FT.
	INSULATION IN	ATTIC FLOORS _			SQ. FT.
R-Value of Insulation .		-		IN	\$Q. FT.
	CLIMA	ΓΕ PRO, BAG WEIGHT - 27 LB	NOMINAL		
RVAUE  ROSSIGN INT FISHLANCE (R) of	MINIMUM THICKNESS 1 Installed installed installed installed by less than	BAGS PEB! 1000 SULFT.  The nutrition of bags, per 100/0 sq. fixed, net argo should give to be less than	MAXIMUM NET EDVERAGE  Contents of this long sloute 101 cont more than	Pil Grad y 10-0 institut	IM WEIGHT LSC Fit ght fer in stilled on stilled so than
11 19 22 26 30 38 44 50 60	5.25 in. 8.50 in. 9.75 in. 11.25 in. 12.75 in. 15.50 in. 17.50 in. 19.50 in. 22.75 in	6,4 11.0 12.8 15.2 17.6 22.8 26.0 29.8 36.8	155 nq, ft., 91 nq ft. 78 nq ft. 66 nq, ft. 57, nq, ft. 15 nq, ft. 39 nq, ft. 34 nq, ft.	0,29 0,34 0,41 0,47 20,60	8 lbs. 6 lbs. 6 lbs. 0 lbs. 5 lbs. 3 lbs. 1 lbs. 4 lbs.
Insulation Contract Company	ADDR.	5°SSL ESS_		DatePhoneDate _	9/23/10
COMPANY	Addr	ESS		PHONE	

Johns Manville

BIC-250 10/03

North FL Permit
387 SW Kemp Gt
Lake City FL 32024

### NOTICE OF COMMENCEMENT

ST	DUNTY OF Columbia Inst:200712023344 Date:10/17/2007 Time:1:33 PM DC,P.DeWitt Cason, Columbia County Page 1 of 1
Τŀ	HE UNDERSIGNED hereby gives notice that improvement will be made to certain real property, and in accordance with Chapter 3, Florida Statutes, the following information is provided in this Notice of Commencement.
	Description of property: (legal description of property, and street address if available) 03-45-16-02732-103  Lot 3 Laurel Lakes
2.	General description of improvement: 51/196 family dwelling
	Owner information: a. Name and address: Sedrix Davis  336 NW 8th St. Pompano Beach, FL 33060 b. Interest in property: home site
	c. Name and address of fee simple titleholder (if other than owner):
4.	Contractor: (name and address) Owner builder Sedrix Davis
	a. Phone number:
5.	Surety: a. Name and address:
	b. Phone number: c. Amount of bond \$
6.	Lender: (name and address):
	a. Phone number:
7.	Persons with the State of Florida designated by Owner upon whom notices or other documents may be served as provided by Section 713.13(1)(a)7, Florida Statutes:  (name and address):
8.	In addition to himself, Owner designates the following person(s) to receive a copy of the Lienor's Notice as provided in Section 713.13(1)(b), Florida Statutes: (name and address)
9.	Expiration date of notice of commencement (the expiration date is one (1) year from the date of recording unless a different date is specified)
Γhi	is Space for Clerk's Use Only
	(signature of owner)
	Sworn to and subscribed before me
	thisday of,
	Jula Re Roden
	NOTARY PUBLIC Linda R. Roder
	Commission #DD303275 Expires: Mar 24, 2008 Bonded Thru Atlantic Bonding Co., Inc.



# 26419

March 25, 2008

Mr. Harry Dicks Columbia County Building Department 135 NE Hernando Ave. Lake City, FL 32055

Re: Permit No. 26419 – Sedrix Davis

Dear Harry,

This letter is to inform you that Whiddon Construction Co., Inc. will assume responsibility for completing the framing on the subject permit for Mr. Davis. Please let me know if there is anything else I need to do.

If you need any additional information, please contact me.

Office/Fax: 386.754.7367

Sincerely,

Roger Whiddon

President

Whiddon Construction Company, Inc.

Cc: File

JUSEL 4. \*\* 867.0812

Cell: 386.867.0812 Page 1 of 1



# OGGETAZGX

# **COLUMBIA COUNTY, FLORIDA**

# tment of Building and Zoning

This Certificate of Occupancy is issued to the below named permit holder for the building and premises at the below named location, and certifies that the work has been completed in accordance with the Columbia County Building Code.

Use Classification SFD, UTILITY Parcel Number 03-4S-16-02732-103 Building permit No. 000026419

Fire: 6.42

Waste: 16.75

Total: 23.17

Location: 208 SW RED MAPLE WAY, LAKE CITY, FL

Date: 09/30/2010

**Owner of Building SEDRIX DAVIS** 

Permit Holder OWNER BUILDER

Harry Dick

Building Inspector

POST IN A CONSPICUOUS PLACE (Business Places Only)

Buildings

Name

Organization General American Door - Product Manufactures

Result List for Organizations

Displaying 1-1 of 1

Approval Status:

(ALC)

FLORIDA BUILDING CODI

Quelview Usar Regisimlica

Chympiration Registration

Anthosization

Organte ation Accreditation

Select the organization type, status, or name to find an organization

Organization product Manufacturer Type:

Search

Cancel



Page i of 2

http://www.floridabuilding.org/Common/c\_org\_regi\_SRCH.asp

**电影光光 "我不过,我们就是我们就有什么好的,我就不过我们的老师,我们就不过我们,我们是是是我的,我们是我们会不是对你,我们是不知识,不会说什么好好,不是我们** 

Displaying 1-1 of 1

Org Code: PDM

System ID: 3585

Ganaria American Name

Montgomery

James Campbell Continct

6308593000

Product Manufacturer

01/01/2099 Expere

Perwiddy Status

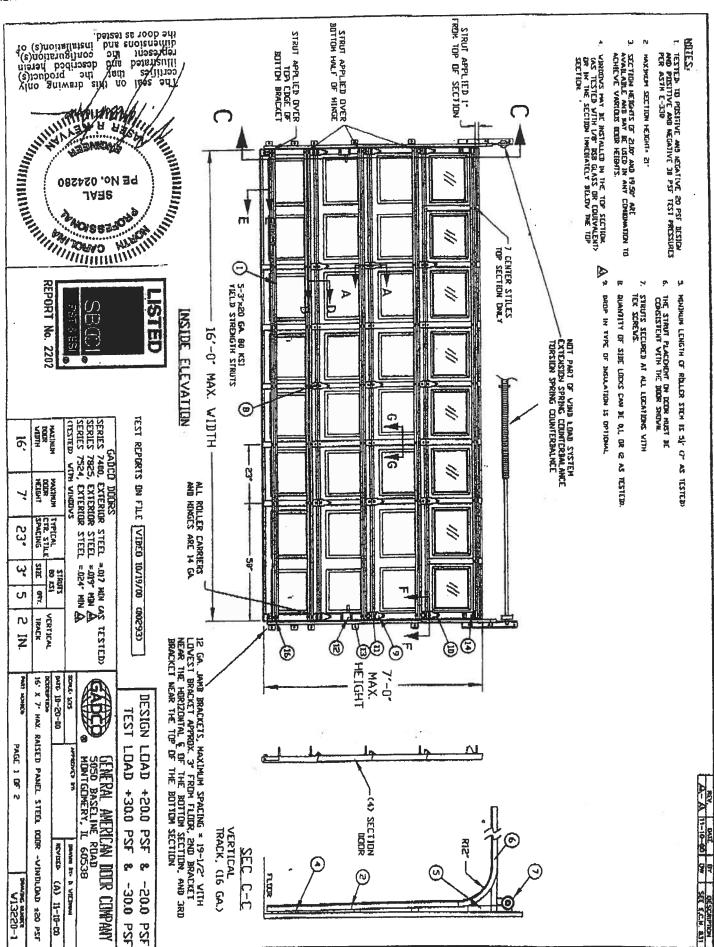
Phone

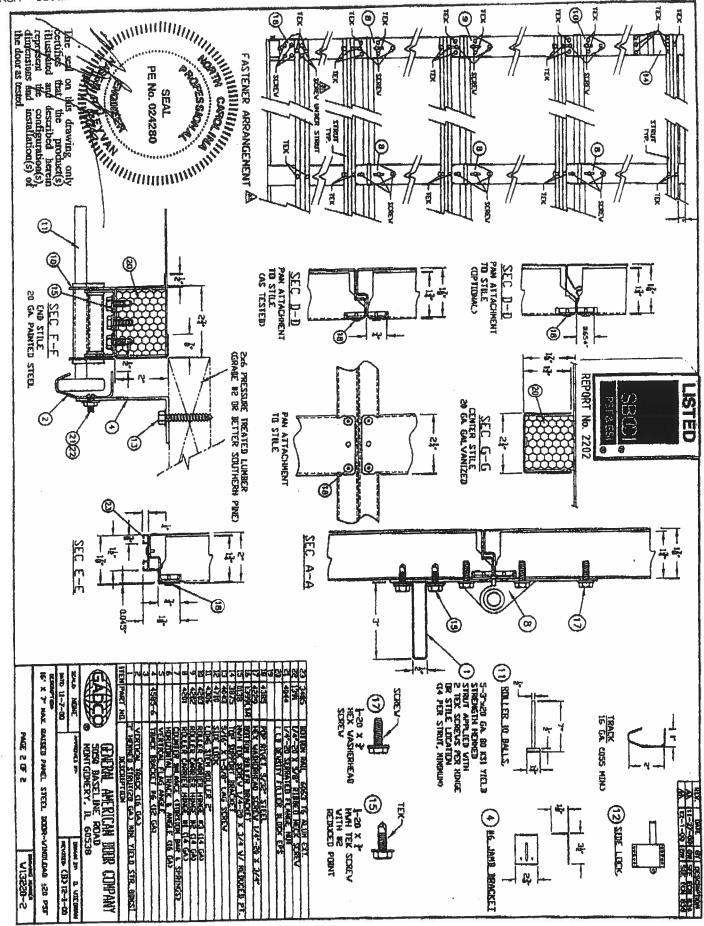
She Links www. gaden.com

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6/21/2004

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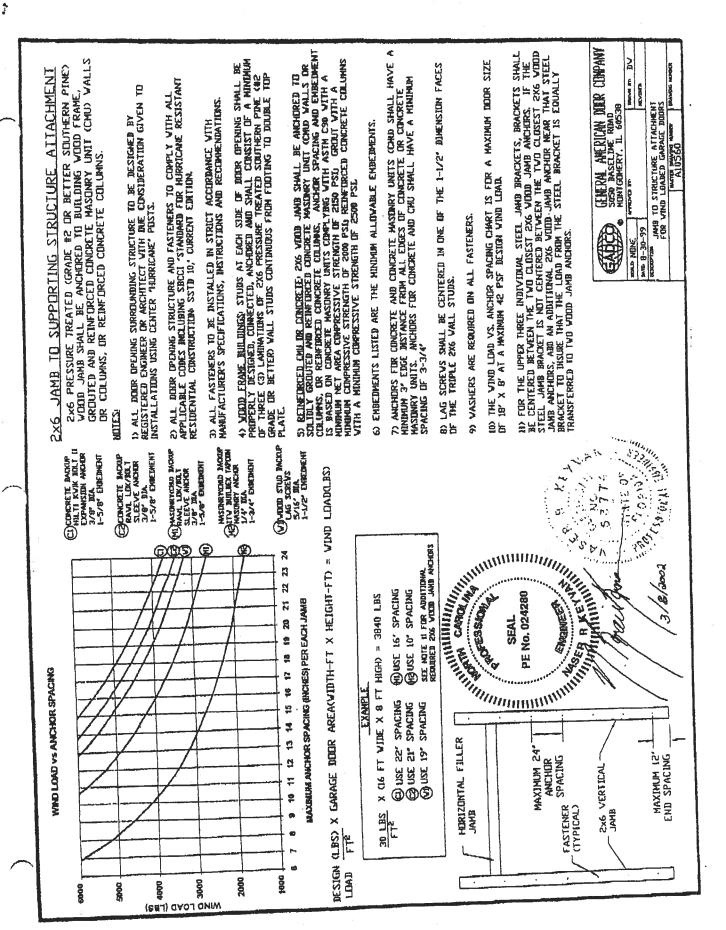




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Product Approval
USER: Public User

Product Approval Menu > Product or Application Search > Application List > Application Detail

FL1956-R1

\* COMMUNITY PLANNING OFFICE OF THE MANAGEMENT HOUSING & COMMUNITY

Comments **Application Status** Code Version **Application Type** 

Archived

Address/Phone/Email Product Manufacturer

**Authorized Signature** 

Address/Phone/Email Technical Representative

> Approved 2004 Revision

Frederick O'Connor PO Box 1404 fred\_oconnor@tamko.com (800) 641-4691 ext 2394 Joplin, MO 64802 TAMKO Building Products, Inc.

fred\_oconnor@tamko.com (800) 641-4691 Joplin, MO 64802 PO Box 1404 Frederick J. O'Connor

fred\_oconnor@tamko.com

Address/Phone/Email Quality Assurance Representative

Subcategory Category

**Asphalt Shingles** 

Roofing

Compliance Method Certification Mark or Listing

Certification Agency

Referenced Standard and Year (of

**Standard** 

Underwriters Laboratories Inc.

Standard)

**ASTM D 3462** 

**Year** 2001

Equivalence of Product Standards Certified By

Product Approval Method

Date Submitted

Method 1 Option A

Date Approved Date Validated Date Pending FBC Approval

06/29/2005 06/25/2005

06/20/2005 06/09/2005

## **Summary of Products**

	*
Model, Number or Name	
Description	

slopes of 2:12 or greater. Not approved for use in HVHZ.

Next Back

### DCA Administration

Department of Community Affairs Florida Bullding Code Online Codes and Standards

2555 Shumard Oak Boulevard
Tallahassee, Florida 32399-2100
(850) 487-1824, Suncom 277-1824, Fax (850) 414-8436
© 2000-2005 The State of Florida. All rights reserved. Copyright and Disclaimer

**Product Approval Accepts:** 











2/14/2007 11:22 AM





**Horthbreek Division** 

333 Pfryster Azed Northdook 1 60062-2006 LgA www.if.com abil 1 847 P77 5900

June 17, 2005

Tamko Roofing Products Ms. Kerri Eden P.O. Box 1404 220 W. 4<sup>th</sup> Street Joplin, MO 64802-1404

Our Reference: R2919

This is to confirm that "Elite Glass-Seal AR", "Heritage 30 AR", "Heritage 50 AR", "Glass-Seal AR" manufactured at Tuscaloosa, AL and "Elite Glass-Seal AR", "Heritage 30 AR", "Heritage XL AR", "Heritage 50 AR" manufactured at Frederick, MD and "Heritage 30 AR", "Heritage XL AR", and "Heritage 50 AR" manufactured in Dallas, TX are UL Listed asphalt glass mat shingles and have been evaluated in accordance with ANSI/UL 790, Class A (ASTM E108), ASTM D3462, ASTM D3161 or UL 997 modified to 110 mph when secured with four nails.

Let me know if you have any further questions.

Very truly yours,

Alpesh Patel (Ext. 42522)

**Engineer Project** 

Fire Protection Division

Reviewed by,

Randall K. Laymon (Ext. 42687)

Engineer Sr Staff

Fire Protection Division

P. K. Laynun



### **Application Instructions for**

### • **HERITAGE® VINTAGE™ AR** – Phillipsburg, KS **LAMINATED ASPHALT SHINGLES**

THESE ARE THE MANUFACTURER'S APPLICATION INSTRUCTIONS FOR THE ROOFING CONDITIONS DESCRIBED. TAMKO BUILDING PRODUCTS, INC. ASSUMES NO RESPONSIBILITY FOR LEAKS OR OTHER ROOFING DEFECTS RESULTING FROM FAILURE TO FOLLOW THE MANUFACTURER'S INSTRUCTIONS.

THIS PRODUCT IS COVERED BY A LIMITED WARRANTY, THE TERMS OF WHICH ARE PRINTED ON THE WRAPPER.

IN COLD WEATHER (BELOW 40°F), CARE MUST BE TAKEN TO AVOID DAMAGE TO THE EDGES AND CORNERS OF THE SHINGLES.

IMPORTANT: It is not necessary to remove the plastic strip from the back of the shingles.

### I. ROOF DECK

These shingles are for application to roof decks capable of receiving and retaining fasteners, and to inclines of not less than 2 in. per foot. For roofs having pitches 2 in. per foot to less than 4 in. per foot, refer to special instructions titled "Low Slope Application". Shingles must be applied properly. TAMKO assumes no responsibility for leaks or defects resulting from improper application, or failure to properly prepare the surface to be roofed over.

**NEW ROOF DECK CONSTRUCTION:** Roof deck must be smooth, dry and free from warped surfaces. It is recommended that metal drip edges be installed at eaves and rakes.

**PLYWOOD:** All plywood shall be exterior grade as defined by the American Plywood Association. Plywood shall be a minimum of 3/8 in. thickness and applied in accordance with the recommendations of the American Plywood Association.

SHEATHING BOARDS: Boards shall be well-seasoned tongue-andgroove boards and not over 6 in. nominal width. Boards shall be a 1 in. nominal minimum thickness. Boards shall be properly spaced and nailed.

TAMKO does not recommend re-roofing over existing roof.

### 2. VENTILATION

Inadequate ventilation of attic spaces can cause accumulation of moisture in winter months and a build up of heat in the summer. These conditions can lead to:

- 1. Vapor Condensation
- 2. Buckling of shingles due to deck movement.
- 3. Rotting of wood members.
- 4. Premature failure of roof.

To insure adequate ventilation and circulation of air, place louvers of sufficient size high in the gable ends and/or install continuous ridge and soffit vents. FHA minimum property standards require one square foot of net free ventilation area to each 150 square feet of space to be vented, or one square foot per 300 square feet if a vapor barrier is installed on the warm side of the ceiling or if at least one half of the ventilation is provided near the ridge. If the ventilation openings are screened, the total area should be doubled.

IT IS PARTICULARLY IMPORTANT TO PROVIDE ADEQUATE VEN-TILATION.

### 3. FASTENERS

**WIND CAUTION:** Extreme wind velocities can damage these shingles after application when proper sealing of the shingles does not occur. This can especially be a problem if the shingles are applied in cooler months or in areas on the roof that do not receive direct sunlight. These conditions may impede the sealing of the adhesive strips on the shingles. The inability to seal down may be compounded by prolonged cold weather conditions and/or blowing dust. In these situations, hand sealing of the shingles is recommended. Shingles must also be fastened according to the fastening instructions described below.

Correct placement of the fasteners is critical to the performance of the shingle. If the fasteners are not placed as shown in the diagram and described below, this will result in the termination of TAMKO's liabilities under the limited warranty. TAMKO will not be responsible for damage to shingles caused by winds in excess of the applicable miles per hour as stated in the limited warranty. See limited warranty for details.

**FASTENING PATTERNS:** Fasteners must be placed 6 in. from the top edge of the shingle located horizontally as follows:

1) Standard Fastening Pattern. (For use on decks with slopes 2 in. per foot to 21 in. per foot.) One fastener 1-1/2 in. back from each end, one 10-3/4 in. back from each end and one 20 in. from one end of the shingle for a total of 5 fasteners. (See standard fastening pattern illustrated below).

STANDARD FASTENING PATTERN

## All Zone Fasteners Algebra is Bracker is B

2) Mansard or Steep Slope Fastening Pattern. (For use on decks with slopes greater than 21 in. per foot.) Use standard nailing instructions with four additional nails placed 6 in. from the butt edge of the shingle making certain nails are covered by the next (successive) course of shingles.

Visit Our Web Site at www.tamko.com

Central District Northeast District Southeast District Southwest District Western District

220 West 4th St., Joplin, MO 64801 4500 Tamko Dr., Frederick, MD 21701 2300 35th St., Tuscaloosa, AL 35401 7910 S. Central Exp., Dallas, TX 75216 5300 East 43rd Ave., Denver, CO 80216

~10-3/4\*·

800-641-4691 800-368-2055 800-228-2656 800-443-1834 800-530-8868

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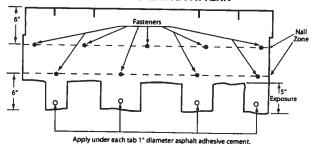


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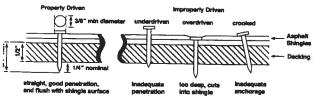
### • HERITAGE® VINTAGE™ AR — Phillipsburg, KS LAMINATED ASPHALT SHINGLES

Each shingle tab must be sealed underneath with quick setting asphalt adhesive cement immediately upon installation. Spots of cement must be equivalent in size to a \$.25 piece and applied to shingles with a 5 in. exposure, use 9 fasteners per shingle.

### MANSARD FASTENING PATTERN



NAILS: TAMKO recommends the use of nails as the preferred method of application. Standard type roofing nails should be used. Nail shanks should be made of minimum 12 gauge wire, and a minimum head diameter of 3/8 in. Nails should be long enough to penetrate 3/4 in. into the roof deck. Where the deck is less than 3/4 in. thick, the nails should be long enough to penetrate completely through plywood decking and extend at least 1/8 in. through the roof deck. Drive nail head flush with the shingle surface.



### 4. UNDERLAYMENT

UNDERLAYMENT: An underlayment consisting of asphalt saturated felt must be applied over the entire deck before the installation of TAMKO shingles. Failure to add underlayment can cause premature failure of the shingles and leaks which are not covered by TAMKO's limited warranty. Apply the felt when the deck is dry. On roof decks 4 in. per foot and greater apply the felt parallel to the eaves lapping each course of the felt over the lower course at least 2 in. Where ends join, lap the felt 4 in. If left exposed, the underlayment felt may be adversely affected by moisture and weathering. Laying of the underlayment and the shingle application must be done together.

Products which are acceptable for use as underlayment are:

- TAMKO No. 15 Asphalt Saturated Organic Felt
- A non-perforated asphalt saturated organic felt which meets ASTM: D226, Type I or ASTM D4869, Type I
- Any TAMKO non-perforated asphalt saturated organic felt
- TAMKO TW Metal and Tile Underlayment,
   TW Underlayment and Moisture Guard Plus® (additional ventilation maybe required. Contact TAMKO's technical services department for more information)

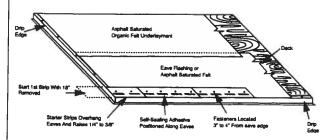
In areas where ice builds up along the eaves or a back-up of water from frozen or clogged gutters is a potential problem, TAMKO's Moisture Guard Plus® waterproofing underlayment (or any specialty eaves flashing product) may be applied to eaves, rakes, ridges, valleys, around chimneys, skylights or dormers to help prevent water damage. Contact TAMKO's Technical Services Department for more information.

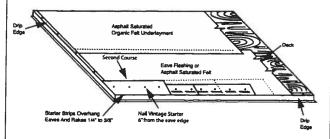
TAMKO does not recommend the use of any substitute products as shingle underlayment.

### 5. APPLICATION INSTRUCTIONS

STARTER COURSE: Two starter course layers must be applied prior to application of Heritage Vintage AR Shingles.

The first starter course may consist of TAMKO Shingle Starter, three tab self-sealing type shingles or a 9 inch wide strip of mineral surface roll roofing. If three tab self-sealing shingles are used, remove the exposed tab portion and install with the factory applied adhesive adjacent to the eaves. If using three tab self-sealing shingles or shingle starter, remove 18 in. from first shingle to offset the end joints of the Vintage Starter. Attach the first starter course with approved fasteners along a line parallel to and 3 in. to 4 in. above the eave edge. The starter course should overhang both the eave and rake edge 1/4 in. to 3/8 in. Over the first starter course, install Heritage Vintage Starter AR and begin at the left rake edge with a full size shingle and continue across the roof nailing the Heritage Vintage Starter AR along a line parallel to and 6 in. from the eave edge.





Note: Do not allow Vintage Starter AR joints to be visible between shingle tabs. Cutting of the starter may be required.

HERITAGE VINTAGE STARTER AR 12 1/2" x 36" 20 PIECES PER BUNDLE 60 LINEAL FT. PER BUNDLE

(Continued)

Visit Our Web Site at WWW.tamko.com Central District Northeast District Southeast District Southwest District Western District

220 West 4th St., Joplin, MO 64801 4500 Tamko Dr., Frederick, MD 21701 2300 35th St., Tuscaloosa, AL 35401 7910 S. Central Exp., Dallas, TX 75216 5300 East 43rd Ave., Denver, CO 80216 800-641-4691 800-368-2055 800-228-2656 800-443-1834 800-530-8868

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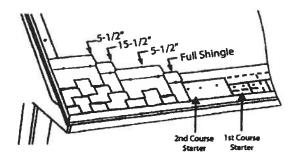
2



(CONTINUED from Pg. 2)

### HERITAGE® VINTAGE™ AR – Phillipsburg, KS LAMINATED ASPHALT SHINGLES

SHINGLE APPLICATION: Start the first course at the left rake edge with a full size shingle and overhang the rake edge 1/4 in. to 3/8 in.. To begin the second course, align the right side of the shingle with the 5-1/2 in. alignment notch on the first course shingle making sure to align the exposure notch. (See shingle illustration on next page) Cut the appropriate amount from the rake edge so the overhang is 1/4" to 3/8". For the third course, align the shingle with the 15-1/2 in. alignment notch at the top of the second course shingle, again being sure to align the exposure notch. Cut the appropriate amount from the rake edge. To begin the fourth course, align the shingle with the 5-1/2 in. alignment notch from the third course shingle while aligning the exposure notch. Cut the appropriate amount from the rake edge. Continue up the rake in as many rows as necessary using the same formula as outlined above. Cut pieces may be used to complete courses at the right side. As you work across the roof, install full size shingles taking care to align the exposure notches. Shingle joints should be no closer than 4 in.



### **6. LOW SLOPE APPLICATION**

On pitches 2 in. per foot to 4 in. per foot cover the deck with two layers of underlayment. Begin by applying the underlayment in a 19 in. wide strip along the eaves and overhanging the drip edge by 1/4 to 3/4 in. Place a full 36 in. wide sheet over the 19 in. wide starter piece, completely overlapping it. All succeeding courses will be positioned to overlap the preceding course by 19 in. If winter temperatures average 25°F or less, thoroughly cement the laps of the entire underlayment to each other with plastic cement from eaves and rakes to a point of a least 24 in. inside the Interior wall line of the building. As an alternative, TAMKO's Moisture Guard Plus self-adhering waterproofing underlayment may be used in lieu of the cemented felts.

### 7. VALLEY APPLICATION

TAMKO recommends an open valley construction with Heritage Vintage AR shingles.

To begin, center a sheet of TAMKO Moisture Guard Plus, TW Underlayment or TW Metal & Tile Underlayment in the valley.

After the underlayment has been secured, install the recommended corrosion resistant metal (26 gauge galvanized metal or an equivalent) in the valley. Secure the valley metal to the roof deck. Overlaps should be 12" and cemented.

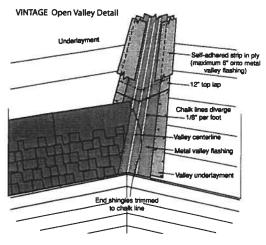
Following valley metal application; a 9" to 12" wide strip of TAMKO Moisture Guard Plus, TW Underlayment or TW Metal & Tile Underlayment should be applied along the edges of the metal valley flashing (max. 6" onto metal valley flashing) and on top of the valley underlayment. The valley will be completed with shingle application.

### SHINGLE APPLICATION INSTRUCTIONS (OPEN VALLEY)

- Snap two chalk lines, one on each side of the valley centerline over the full length of the valley flashing. Locate the upper ends of the chalk lines 3" to either side of the valley centerline.
- The lower end should diverge from each other by 1/8" per foot.
   Thus, for an 8' long valley, the chalk lines should be 7" either side of the centerline at the eaves and for a 16' valley 8".

As shingles are applied toward the valley, trim the last shingle in each course to fit on the chalk line. Never use a shingle trimmed to less than 12" in length to finish a course running into a valley. If necessary, trim the adjacent shingle in the course to allow a longer portion to be used.

- Clip 1" from the upper corner of each shingle on a 45° angle to direct water into the valley and prevent it from penetrating between the courses.
- Form a tight seal by cementing the shingle to the valley lining with a 3" width of asphalt plastic cement (conforming to ASTM D 4586).



### · CAUTION:

Adhesive must be applied in smooth, thin, even layers.

Excessive use of adhesive will cause blistering to this product.

TAMKO assumes no responsibility for blistering.

(Continued)

Visit Our Web Site at WWW.tamko.com Central District Northeast District Southeast District Southwest District Western District 220 West 4th St., Joplin, MO 64801 4500 Tamko Dr., Frederick, MD 21701 2300 35th St., Tuscakoosa, AL 35401 7910 S. Central Exp., Dallas, TX 75216 5300 East 43rd Ave., Denver, CO 80216 800-641-4691 800-368-2055 800-228-2656 800-443-1834 800-530-8868

05/06



(CONTINUED from Pg. 3)

### • HERITAGE® VINTAGE™ AR — Phillipsburg, KS LAMINATED ASPHALT SHINGLES

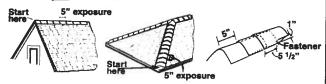
### 8. HIP AND RIDGE PASTENING DETAIL

Apply the shingles with a 5 in. exposure beginning at the bottom of the hip or from the end of the ridge opposite the direction of the prevailing winds. Secure each shingle with one fastener on each side, 5-1/2 in. back from the exposed end and 1 in. up from the edge. TAMKO recommends the use of TAMKO Heritage Vintage Hip & Ridge shingle products.

Fasteners should be 1/4 in. longer than the ones used for shingles.

IMPORTANT: PRIOR TO INSTALLATION, CARE NEEDS TO BE TAKEN TO PREVENT DAMAGE WHICH CAN OCCUR WHILE BENDING SHINGLE IN COLD WEATHER.

Direction of prevailing wind



THESE ARE THE MANUFACTURER'S APPLICATION INSTRUCTIONS FOR THE ROOFING CONDITIONS DESCRIBED. TAMKO BUILDING PRODUCTS, INC. ASSUMES NO RESPONSIBILITY FOR LEAKS OR OTHER ROOFING DEFECTS RESULTING FROM FAILURE TO FOLLOW THE MANUFACTURER'S INSTRUCTIONS.

TAMKO®, Moisture Guard Plus®, Nail Fast® and Heritage® are registered trademarks and Vintage™ is a trademark of TAMKO Building Products, Inc.

Visit Our Web Site at www.tamko.com

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05/06

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# Community Affairs

USER: Public User **Product Approval** 

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DOM HUME

MANAGEMENT LNAWACTBABO ALINDMWOD Y CMISHOHA

Product Approval Menu > Product or Application Search > Application List > Application Detail

Archived

**Application Type** 

**Application Status** 

Comments

Code Version

2004 New FL5108

**Approved** 

**Product Manufacturer** Address/Phone/Email

MI Windows and Doors

Gratz, PA 17030 (717) 365-3300 ext 2101 650 W Market St

surich@miwd.com

surich@miwd.com Steven Urich

**Authorized Signature** 

Window

Technical Representative

הייין יייין יייין דיייייי

Quality Assurance Representative

Addrson /Dhono /Empil

1 of 9

2/14/2007 11:12 AN



# AAMA **CERTIFICATION PROGRAM**



#### AUTHORIZATION FOR PRODUCT CERTIFICATION

Mi Wirk ows & Doors, Inc. P.O. Bc : 370 Gratz, F A 17030-0370

Attn:

桃 Emiley

The pri duct described below is hereby approved for listing in the next issue of the AAMA Certified Products Directory. Till e approval is based on successful completion of tests, and the reporting to the Administrator of the results # tests, acc impanied by related drawings, by an AAMA Accredited Laboratory.

The listing below will be added to the next published AAMA Centified Products Directory.

	SPECIFICATION		RECORD OF PRODUC	त्र गम्हरम्		LABEL			
AAI	ANMINOA 101/LS. 2-97 H-RSS*-306/2		LEAGUE AL LINGUE LEGICE						
COMPI NY AND PLANT LOCATION		CODE NO.	SERIES MODEL & PRODUCT DESCRIPTION	MUMDIAM	SIZE TESTED				
M Window M Window	& Doors, Inc. (Oldsmar, FL) & Doors, Inc. (Guyma, TH)	MTL-8 MTL-9	185/3185 SH (Fin) (AL)(O)(O)(O) (ASTM)	70 x 52	Sash Surker	Sy Request			

This C: riflication will expire May 14, 2006 and requires validation until then by continued listing in the current AAMA Certific 1 Products Directory.

Produc : Tested and Reported by: Architectural Testing, Inc.

Report No.: 01-50360.02

Date o Report: June 14, 2004

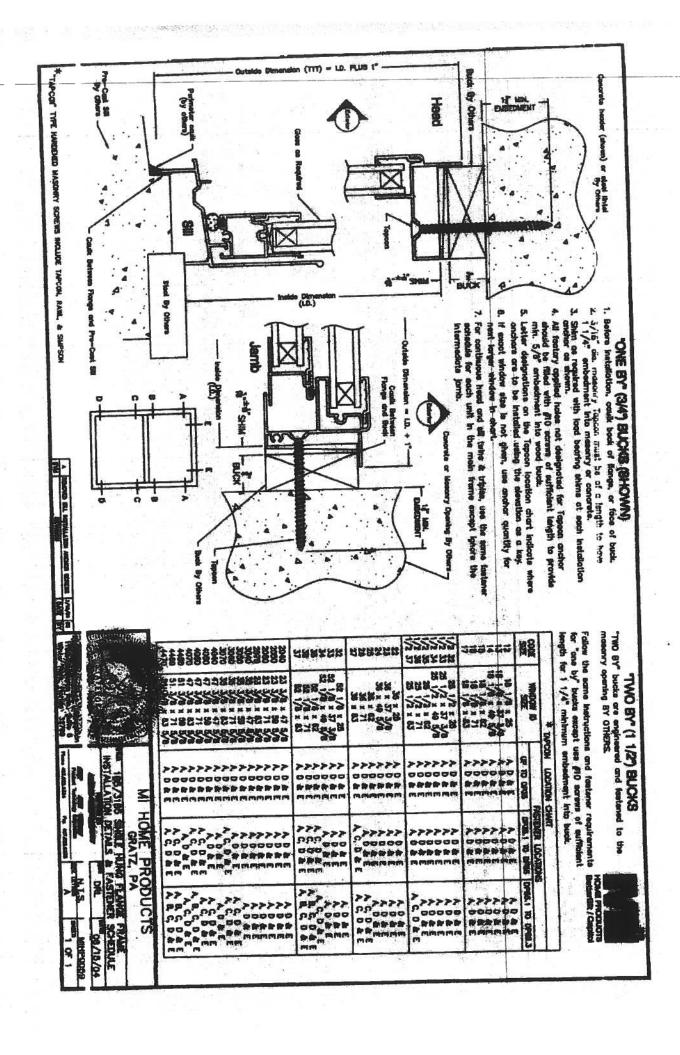
NOTE: "LEASE REVIEW, AND ADVIS : ALI MIMEDIATELY IF DATA, I S SHOWN, NEEDS CC PRECTION.

Date: AL 348 1, 2005

CC: AAMA JGS/df ACP-04 (Rt /. 5/03) Validated for Certification:

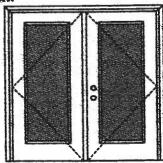
a Laboratories, Inc.

American Architectural Manufacturers Association



# **WOOD-EDGE STEEL DOORS**

#### APPROVED ARRANGEMENT:



Units of other sizes are covered by this report as long as the panels used do not exceed 3'0" x 6'8".

**Double Door** m anit size = 50" x 68"

Design Pressure +40.5/-40.5

Large Missile Impact Resistance

Hurricane protective system (shutters) is REQUIRED.

Actual design pressure and impact maintain requirements state or local building codes specify the edition required.

#### MINIMUM ASSEMBLY DETAIL:

Compliance requires that minimum assembly details have been followed - see MAD-WL-MA0012-02 and MAD-WL-MA0041-02.

#### MINIMUM INSTALLATION DETAIL:

Compliance requires that minimum installation details have been followed - see MID-WL-MA0002-02.

#### **APPROVED DOOR STYLES:** 1/4 BLASS:









#### 1/2 GLASS:

















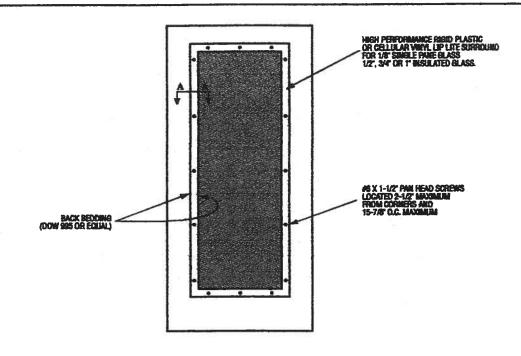


"This gless lift every also be used in the following door styles: 5-panel; 5-panel with scrult; Eyebrow 6-panel; Eyebrow 5-panel with scroll.





# GLASS INSERT IN DOOR OR SIDELITE PANEL

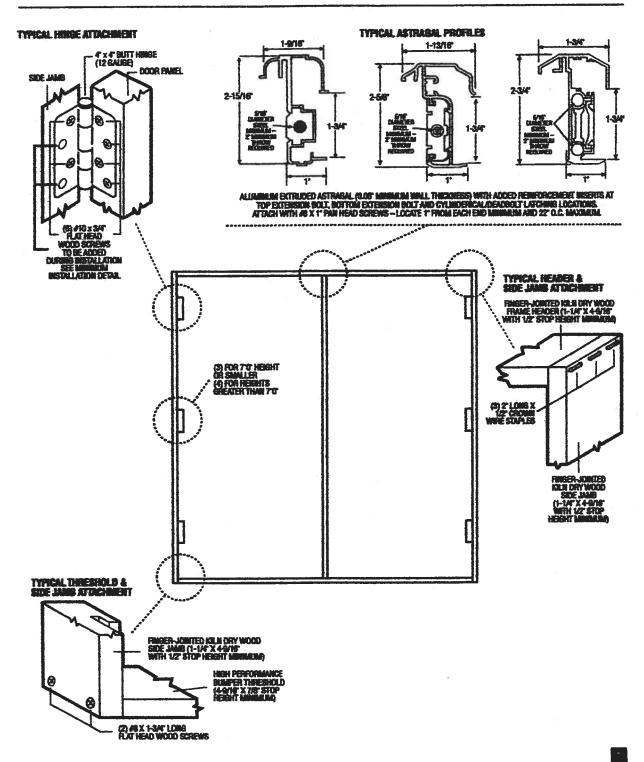


# TYPICAL RIGID PLASTIC LIP LITE SURROUND 1-9/16\* DOOR 1-9/16\* PASS BILLE PASS GLASS. 1/2, SMY OR T THE SINGLE PASS GLASS. 1/2 SMY OR T THE SINGLE PASS GLA



#### MAD-WL-MA0012-02

# OUTSWING UNITS WITH DOUBLE DOOR





# **WOOD-EDGE STEEL DOORS**

# APPROVED DOOR STYLES: 3/4 GLASS:







#### **FULL GLASS:**











#### CERTIFIED TEST REPORTS:

NCTL 210-1897-7, 8, 9, 10, 11, 12; NCTL 210-1884-5, 6, 7, 8; NCTL 210-2178-1, 2, 3

Certifying Engineer and License Number: Barry D. Portney, P.E. / 16258.

Unit Tested in Accordance with Miami-Dade BCCO PA202.

Evaluation report NCTL-210-2794-1

Door panels constructed from 26-gauge 0.017" thick steel skins. Both stiles constructed from wood. Top end rails constructed of 0.041" steel. Bottom end rails constructed of 0.021" steel. Interior cavity of stab filled with rigid polyurethane foam core. Slab glazed with insulated glass mounted in a rigid plastic lip lite surround.

Frame constructed of wood with an extruded aluminum bumper threshold.

#### PRODUCT COMPLIANCE LABELING:

TESTED IN ACCORDANCE WITH MIAMI-DADE BCCO PA202

COMPANY NAME

To the best of my incuriodge and shiftly the above side-kinged exterior door unit conforms to the requirements of the 2001 Florida Building Gods, Chapter 17 (Structural Tests and Inspections).

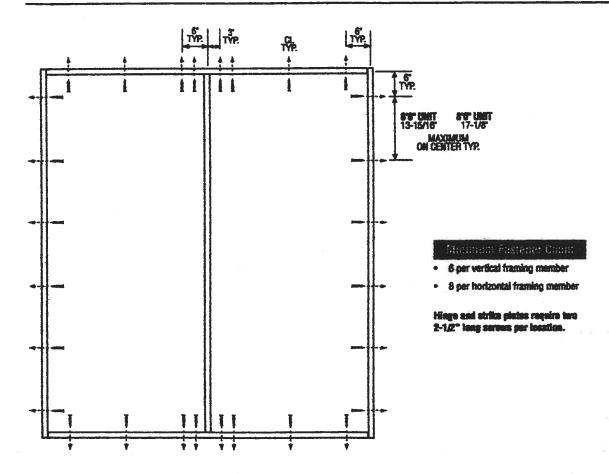
State of Rorida, Professional Engineer Kurt Balthazor, P.E. - License Number 56533

Johnson Entrysystems





#### **DOUBLE DOOR**



#### **Latching Hardware:**

Compliance requires that GRADE 2 or better (ANSI/BHMA A156.2) cylinderical and deadlock hardware be installed.

#### Notes:

- Anchor calculations have been carried out with the lowest (least) fastener rating from the different fasteners being considered for use. Fasteners analyzed for this unit include #8 and #10 wood screws or 3/16" Tapcons.
- The wood screw single shear design values come from Table 11.3A of ANSVAF & PA NDS for southern pine lumber with a side member thickness of 1-1/4" and achievement of minimum embedment. The 3/16" Tapcon single shear design values come from the ITW and ELCO Dade Country approvals respectively, each with minimum 1-1/4" embedment.
- 3. Wood bucks by others, must be anchored properly to transfer loads to the structure.



# **Residential System Sizing Calculation**

**Custom Residence** 

Lake City, FL 32025-

Summary Project Title: Sedrick Davis

Code Only **Professional Version** 

Climate: North

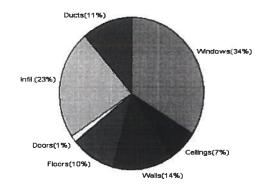
9/17/2007

				9/1//200	1					
Location for weather data: Gainesville - Defaults: Latitude(29) Altitude(152 ft.) Temp Range(M)										
Humidity data: Interior RH (50%) Outdoor wet bulb (77F) Humidity difference(54gr.)										
Winter design temperature 33 F Summer design temperature 92 F										
Winter setpoint	70	F	Summer setpoint	75	F					
Winter temperature difference	37	F	Summer temperature difference	17	F					
Total heating load calculation	35626	Btuh	Total cooling load calculation	50433	Btuh					
Submitted heating capacity	% of calc	Btuh	Submitted cooling capacity	% of calc	Btuh					
Total (Electric Heat Pump)	123.5	44000	Sensible (SHR = 0.75)	78.2	33000					
Heat Pump + Auxiliary(0.0kW)	123.5	44000	Latent	133.7	11000					
			Total (Electric Heat Pump)	87.2	44000					

## WINTER CALCULATIONS

Winter Heating Load (for 1893 soft)

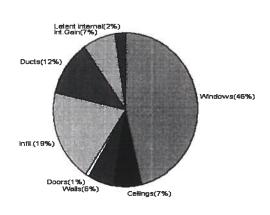
vviriter rieating Load (10	<u>ı 1093 Sylı)</u>			
Load component			Load	·
Window total	378	sqft	12170	Btuh
Wall total	1478	sqft	4854	Btuh
Door total	38	sqft	492	Btuh
Ceiling total	2000	sqft	2357	Btuh
Floor total	216	sqft	3532	Btuh
Infiltration	202	cfm	8179	Btuh
Duct loss			4042	Btuh
Subtotal			35626	Btuh
Ventilation	0	cfm	0	Btuh
TOTAL HEAT LOSS			35626	Btuh



# **SUMMER CALCULATIONS**

Summer Cooling Load (for 1893 sqft)

Load component	_		Load	
Window total	378	sqft	23250	Btuh
Wall total	1478	sqft	2927	Btuh
Door total	38	sqft	372	Btuh
Ceiling total	2000	sqft	3312	Btuh
Floor total			0	Btuh
Infiltration	177	cfm	3288	Btuh
Internal gain			3780	Btuh
Duct gain			5278	Btuh
Sens. Ventilation	0	cfm	0	Btuh
Total sensible gain			42207	Btuh
Latent gain(ducts)			569	Btuh
Latent gain(infiltration)			6457	Btuh
Latent gain(ventilation)			0	Btuh
Latent gain(internal/occur	oants/othe	r)	1200	Btuh
Total latent gain			8226	Btuh
TOTAL HEAT GAIN			50433	Btuh





EnergyGauge® System Sizing PREPARED BY: DATE:

# **System Sizing Calculations - Winter**

# Residential Load - Whole House Component Details

**Custom Residence** 

Project Title: Sedrick Davis

Code Only
Professional Version

Climate: North

Lake City, FL 32025-

Reference City: Gainesville (Defaults) Winter Temperature Difference: 37.0 F

9/17/2007

#### Component Loads for Whole House

Window	Panes/SHGC/Frame/U	Orientation	Area(sqft) X	HTM=	Load
1	2, Clear, Metal, 0.87	W	63.0	32.2	2028 Btuh
2	2, Clear, Metal, 0.87	W	20.0	32.2	644 Btuh
3	2, Clear, Metal, 0.87	S	21.0	32.2	676 Btuh
4	2, Clear, Metal, 0.87	W	42.0	32.2	1352 Btuh
5	2, Clear, Metal, 0.87	S	35.6	32.2	1145 Btuh
6	2, Clear, Metal, 0.87	W	42.0	32.2	1352 Btuh
7	2, Clear, Metal, 0.87	N	16.0	32.2	515 Btuh
8	2, Clear, Metal, 0.87	Ε	60.0	32.2	1931 Btuh
9	2, Clear, Metal, 0.87	Ε	20.0	32.2	644 Btuh
10	2, Clear, Metal, 0.87	E	13.3	32.2	429 Btuh
11	2, Clear, Metal, 0.87	E	12.5	32.2	402 Btuh
12	2, Clear, Metal, 0.87	E	15.0	32.2	483 Btuh
13	2, Clear, Metal, 0.87	S	2.7	32.2	86 Btuh
14	2, Clear, Metal, 0.87	S	15.0	32.2	483 Btuh
	Window Total		378(sqft)		12170 Btuh
Walls	Туре	R-Value	Area X	HTM=	Load
1	Frame - Wood - Ext(0.09)	13.0	1208	3.3	3967 Btuh
2	Frame - Wood - Adj(0.09)	13.0	270	3.3	887 Btuh
	Wall Total		1478	İ	4854 Btuh
Doors	Туре		Area X	HTM=	Load
1	Insulated - Exterior		20	12.9	259 Btuh
2	Insulated - Adjacent		18	12.9	233 Btuh
	Door Total		38		492Btuh
Ceilings	Type/Color/Surface	R-Value	Area X	HTM=	Load
1	Vented Attic/D/Shin	30.0	2000	1.2	2357 Btuh
	Ceiling Total		2000		2357Btuh
Floors	Type	R-Value	Size X	HTM=	Load
1	Slab On Grade	5	216.0 ft(p)	16.4	3532 Btuh
	Floor Total		216		3532 Btuh
			Envelope Su	ibtotal:	23405 Btuh
Infiltration	Туре	ACH X Vol	ume(cuft) walls(sqf	t) CFM=	
	Natural	0.80	15144 1478	201.9	8179 Btuh
Ductload			(D	LM of 0.128)	4042 Btuh
All Zones		Sen	sible Subtotal Al	l Zones	35626 Btuh

# **Manual J Winter Calculations**

Residential Load - Component Details (continued)

**Custom Residence** 

Project Title: Sedrick Davis

Code Only Professional Version

Climate: North

9/17/2007

Lake City, FL 32025-

WHOLE HOUSE TOTAL		
	Subtotal Sensible Ventilation Sensible Total Btuh Loss	35626 Btuh 0 Btuh 35626 Btuh

#### **EQUIPMENT**

1. Electric Heat Pump # 44000 Btuh

Key: Window types (SHGC - Shading coefficient of glass as SHGC numerical value or as clear or tint)
(Frame types - metal, wood or insulated metal)
(U - Window U-Factor or 'DEF' for default)
(HTM - ManualJ Heat Transfer Multiplier)

Key: Floor size (perimeter(p) for slab-on-grade or area for all other floor types )



# **System Sizing Calculations - Winter**

# Residential Load - Room by Room Component Details Project Title: Code C

**Custom Residence** 

Sedrick Davis

Code Only Professional Version Climate: North

Lake City, FL 32025-

Reference City: Gainesville (Defaults) Winter Temperature Difference: 37.0 F

9/17/2007

Component Loads for Zone #1: Main

Window	Panes/SHGC/Frame/U	Orientation	Area(sqft) X	HTM=	Load
1	2, Clear, Metal, 0.87	W	63.0	32.2	2028 Btuh
2	2, Clear, Metal, 0.87	W	20.0	32.2	644 Btuh
3	2, Clear, Metal, 0.87	S 21.0		32.2	676 Btul
4	2, Clear, Metal, 0.87	W	42.0	32.2	1352 Btuh
5	2, Clear, Metal, 0.87	S	35.6	32.2	1145 Btuh
6	2, Clear, Metal, 0.87	W	42.0	32.2	1352 Btuh
7	2, Clear, Metal, 0.87	N	16.0	32.2	515 Btuh
8	2, Clear, Metal, 0.87	E	60.0	32.2	1931 Btuh
9	2, Clear, Metal, 0.87	E	20.0	32.2	644 Btuh
10	2, Clear, Metal, 0.87	E	13.3	32.2	429 Btuh
11	2, Clear, Metal, 0.87	E	12.5	32.2	402 Btuh
12	2, Clear, Metal, 0.87	E	15.0	32.2	483 Btuh
13	2, Clear, Metal, 0.87	S	2.7	32.2	86 Btuh
14	2, Clear, Metal, 0.87	S	15.0	32.2	483 Btuh
	Window Total		378(sqft)		12170 Btuh
Walls	Туре	R-Value	Area X	HTM=	Load
1	Frame - Wood - Ext(0.09)	13.0	1208	3.3	3967 Btuh
2	Frame - Wood - Adj(0.09)	13.0	270	3.3	887 Btuh
	Wall Total		1478		4854 Btuh
Doors	Туре		Area X	HTM=	Load
1	Insulated - Exterior		20	12.9	259 Btuh
2	Insulated - Adjacent		18	12.9	233 Btuh
	Door Total		38	′	492Btuh
Ceilings	Type/Color/Surface	R-Value	Area X	HTM=	Load
1	Vented Attic/D/Shin	30.0	2000	1.2	2357 Btuh
	Ceiling Total		2000		2357Btuh
Floors	Туре	R-Value	Size X	HTM=	Load
1	Slab On Grade	5	216.0 ft(p)	16.4	3532 Btuh
	Floor Total		216		3532 Btuh
		4	Zone Envelope Su	ubtotal:	23405 Btuh
Infiltration	Туре	ACH X Vol	ume(cuft) walls(sqf	ft) CFM=	
	Natural	0.80	15144 1478	201.9	8179 Btuh
Ductload	Pro. leak free, Supply(R6.0-	Attic), Return(	R6.0-Attic) (D	DLM of 0.128)	4042 Btuh
Zone #1		Sen	sible Zone Subt	otal	35626 Btuh

# **Manual J Winter Calculations**

Residential Load - Component Details (continued)

Custom Residence

Lake City, FL 32025-

Project Title: Sedrick Davis Code Only Professional Version Climate: North

9/17/2007

WHOLE HOUSE TOTALS

Subtotal Sensible 35626 Btuh
Ventilation Sensible 0 Btuh
Total Btuh Loss 35626 Btuh

EQUIPMENT

1. Electric Heat Pump # 44000 Btuh

Key: Window types (SHGC - Shading coefficient of glass as SHGC numerical value or as clear or tint)
(Frame types - metal, wood or insulated metal)
(U - Window U-Factor or 'DEF' for default)
(HTM - ManualJ Heat Transfer Multiplier)

Key: Floor size (perimeter(p) for slab-on-grade or area for all other floor types )



# **System Sizing Calculations - Summer**

# Residential Load - Whole House Component Details

**Custom Residence** 

Project Title: Sedrick Davis

Professional Version

Lake City, FL 32025-

Seurick Day

Climate: North

Reference City: Gainesville (Defaults)

Summer Temperature Difference: 17.0 F

9/17/2007

#### **Component Loads for Whole House**

	Type*		Over	hang	Win	dow Area	a(saft)	H	HTM	Load	
Window	Pn/SHGC/U/InSh/ExSh/IS	Ornt	Len	Hat	Gross		Unshaded				
1	2, Clear, 0.87, None, N, N	W	13.5f	10ft.	63.0	63.0	0.0	29	80	1825	Btuh
2	2, Clear, 0.87, None, N, N	W	13.5f	10ft.	20.0	20.0	0.0	29	80	579	Btuh
3	2, Clear, 0.87, None, N, N	S	31.5f	10ft.	21.0	21.0	0.0	29	34	608	Btuh
4	2, Clear, 0.87, None, N,N	W	8.5ft	10ft.	42.0	24.3	17.7	29	80	2110	Btuh
5	2, Clear, 0.87, None, N,N	S	8ft.	10ft.	35.6	35.6	0.0	29	34	1030	Btuh
6	2, Clear, 0.87, None, N, N	W	1.5ft	10ft.	42.0	0.0	42.0	29	80	3340	Btuh
7	2, Clear, 0.87, None, N, N	N	1.5ft	8ft.	16.0	0.0	16.0	29	29	463	Btuh
8	2, Clear, 0.87, None,N,N	E	1.5ft	10ft.	60.0	0.0	60.0	29	80	4771	Btul
9	2, Clear, 0.87, None,N,N	E	1.5ft	10ft.	20.0	0.0	20.0	29	80	1590	Btul
10	2, Clear, 0.87, None, N, N	Е	7.5ft	12ft.	13.3	1.8	11.5	29	80	970	Btul
11	2, Clear, 0.87, None,N,N	Е	7.5ft	12ft.	12.5	0.0	12.5	29	80	994	
12	2, Clear, 0.87, None, N, N	Ε	1.5ft	8ft.	15.0	0.0	15.0	29	80	1193	Btul
13	2, Clear, 0.87, None, N, N	S	1.5ft	8ft.	2.7	2.7	0.0	29	34	77	
14	2, Clear, 0.87, None,N,N Excursion	S	1.5ft	8ft.	15.0	15.0	0.0	29	34	434 3266	Btul
	Window Total				378 (	sqft)				23250	Btuh
Walls	Туре		R-Va	alue/U	-Value	Area	(sqft)		HTM	Load	
1	Frame - Wood - Ext			13.0/	0.09	120	7.9		2.1	2519	Btul
2	Frame - Wood - Adj			13.0/	0.09	27	0.0		1.5	407	Btul
	Wall Total					147	'8 (sqft)			2927	Btuł
Doors	Type					Area			HTM	Load	
1	Insulated - Exterior					20	0.0		9.8	196	Btul
2	Insulated - Adjacent						3.0		9.8	176	Btul
	Door Total						8 (sqft)			372	Btul
Ceilings	Type/Color/Surface		R-Va	alue		Area			HTM	Load	
1	Vented Attic/DarkShingle			30.0			0.0		1.7	3312	Rhuk
'				30.0					1.7	3312	
Посто	Ceiling Total		D 1/-				00 (sqft)		LITA		Dlui
Floors	Туре		R-Va				ze		HTM	Load	
1	Slab On Grade			5.0			16 (ft(p))		0.0		Btuh
	Floor Total					216	.0 (sqft)			0	Btur
						Е	nvelope	Subtotal:		29861	Btuh
nfiltration	Туре		A	CH	Volum		wall area	(sqft)	CFM=	Load	
	SensibleNatural			0.70		15144	1478		201.9	3288	Btuh
Internal			Occup	ants			ccupant	/	Appliance	Load	
gain				6		X 23	0 +		2400	3780	Btu
						S	ensible E	nvelope	e Load:	36930	Btul
Ouct load							(DGI	VI of 0.1	43)	5278	Btu
						Sou	nsible Lo	nad All	Zones	42207	Rtut

# **Manual J Summer Calculations**

# Residential Load - Component Details (continued)

**Custom Residence** 

Lake City, FL 32025-

Project Title: Sedrick Davis

Code Only **Professional Version** Climate: North

9/17/2007

#### WHOLE HOUSE TOTALS

		,	
	Sensible Envelope Load All Zones	36930	Btuh
	Sensible Duct Load	5278	Btuh
	Total Sensible Zone Loads	42207	Btuh
	Sensible ventilation	0	Btuh
	Blower	0	Btuh
Whole House	Total sensible gain	42207	Btuh
Totals for Cooling	Latent infiltration gain (for 54 gr. humidity difference)	6457	Btuh
	Latent ventilation gain	0	Btuh
	Latent duct gain	569	Btuh
	Latent occupant gain (6 people @ 200 Btuh per person)	1200	Btuh
	Latent other gain	0	Btuh
	Latent total gain	8226	Btuh
	TOTAL GAIN	50433	Btuh

FOL	IIPM	IENT
	J16 18	

1. Central Unit	#	44000 Btuh

\*Key: Window types (Pn - Number of panes of glass)

(SHGC - Shading coefficient of glass as SHGC numerical value or as clear or tint)
(U - Window U-Factor or 'DEF' for default)

(InSh - Interior shading device: none(N), Blinds(B), Draperies(D) or Roller Shades(R))

(ExSh - Exterior shading device: none(N) or numerical value) (BS - Insect screen: none(N), Full(F) or Half(H))

(Ornt - compass orientation)



# **System Sizing Calculations - Summer**

# Residential Load - Room by Room Component Details ence Project Title: Code C

**Custom Residence** 

Sedrick Davis

Code Only Professional Version

Climate: North

Lake City, FL 32025-

Summer Temperature Difference: 17.0 F

9/17/2007

Component Loads for Zone #1: Main

Reference City: Gainesville (Defaults)

	Type*		Over	hang	Wind	dow Area	a(sqft)	H	HTM	Load	
Window	Pn/SHGC/U/InSh/ExSh/IS	Ornt	Len	Hat	Gross		Unshaded	Shaded	Unshaded		
1	2, Clear, 0.87, None, N, N	W	13.5f	10ft.	63.0	63.0	0.0	29	80	1825	Btuh
2	2, Clear, 0.87, None,N,N	W	13.5f	10ft.	20.0	20.0	0.0	29	80	579	Btuh
3	2, Clear, 0.87, None, N, N	S	31.5f	10ft.	21.0	21.0	0.0	29	34	608	Btuh
4	2, Clear, 0.87, None,N,N	w	8.5ft	10ft.	42.0	24.3	17.7	29	80	2110	Btuh
5	2, Clear, 0.87, None, N, N	S	8ft.	10ft.	35.6	35.6	0.0	29	34	1030	Btuh
6	2, Clear, 0.87, None,N,N	w	1.5ft	10ft.	42.0	0.0	42.0	29	80	3340	Btuh
7	2, Clear, 0.87, None,N,N	N	1.5ft	8ft.	16.0	0.0	16.0	29	29	463	Btuh
8	2, Clear, 0.87, None,N,N	E	1.5ft	10ft.	60.0	0.0	60.0	29	80	4771	Btuh
9	2, Clear, 0.87, None, N, N	E	1.5ft	10ft.	20.0	0.0	20.0	29	80	1590	Btuh
10	2, Clear, 0.87, None,N,N	E	7.5ft	12ft.	13.3	1.8	11.5	29	80	970	Btuh
11	2, Clear, 0.87, None, N, N	E	7.5ft	12ft.	12.5	0.0	12.5	29	80	994	Btuh
12	2, Clear, 0.87, None,N,N	Ē	1.5ft	8ft.	15.0	0.0	15.0	29	80	1193	Btuh
13	2, Clear, 0.87, None,N,N	S	1.5ft	8ft.	2.7	2.7	0.0	29	34		Btuh
14	2, Clear, 0.87, None,N,N	s	1.5ft	8ft.	15.0	15.0	0.0	29	34	434	Btuh
	Window Total	•		0	378 (		0.0			19984	Rtub
Walls	Type		D.V	ا ا/مبياد	-Value	Area	(caft)		НТМ	Load	Dian
1	Frame - Wood - Ext		11-76	13.0/		120			2.1	2519	Btuh
2						270			1.5		Btuh
2	Frame - Wood - Adj			13.0/	0.09				1.5		
	Wall Total						8 (sqft)			2927	Btun
Doors	Туре					Area	(sqft)		HTM	Load	
1	Insulated - Exterior					20	0.0		9.8	196	Btuh
2	Insulated - Adjacent					18	1.0		9.8	176	Btuh
	Door Total					3	8 (sqft)			372	Btuh
Ceilings	Type/Color/Surface		R-Va	alue		Area			HTM	Load	
1	Vented Attic/DarkShingle			30.0			0.0		1.7	3312	Btuh
•	Ceiling Total			50.0			0 (sqft)		1	3312	
E1.	·		D. \ /						LITA		Diun
Floors	Туре		R-Va			-	ze		НТМ	Load	
1	Slab On Grade			5.0			l6 (ft(p))		0.0	_	Btuh
	Floor Total					216.	0 (sqft)			0	Btuh
						Z	one Enve	elope Si	ubtotal:	26596	Btuh
nfiltration	Туре		Δ	CH	Volum	e(cuft) v	wall area	(saft)	CFM=	Load	
	SensibleNatural		•	0.70	10111	15144	1478	(-7')	176.7	3288	Btuh
Internal			Occup	ants		Btuh/oc	cupant		Appliance	Load	
gain			,	6		X 23	-		2400	3780	Btuh
						S	ensible E	Envelop	e Load:	33664	Btuh
Duct load	Prop. leak free, Supply(	R6.0-A	kttic), f	Returr	n(R6.0-	Attic)		(DGM	of 0.143)	4811	Btuh
							Sensib	le Zone	e Load	38475	Btuh

# **Manual J Summer Calculations**

Residential Load - Component Details (continued)

Project Title:
Sedrick Davis

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Prof

**Custom Residence** 

Lake City, FL 32025-

Code Only Professional Version Climate: North

The following	g window Excursion will be assigned to the system loads.	9/17/2007
Windows	July excursion for System 1  Excursion Subtotal:	3266 Btuh 3266 Btuh
Duct load		467 Btuh
	Sensible Excursion Load	3732 Btuh

# **Manual J Summer Calculations**

Residential Load - Component Details (continued)

Custom Residence

Project Title: Sedrick Davis Code Only **Professional Version** Climate: North

9/17/2007

Lake City, FL 32025-

#### WHOLE HOUSE TOTALS

		1	
	Sensible Envelope Load All Zones	36930	
	Sensible Duct Load	52/8	Btuh
	Total Sensible Zone Loads	42207	Btuh
	Sensible ventilation	0	Btuh
	Blower	0	Btuh
Whole House	Total sensible gain	42207	Btuh
<b>Totals for Cooling</b>	Latent infiltration gain (for 54 gr. humidity difference)	6457	Btuh
	Latent ventilation gain	0	Btuh
	Latent duct gain	569	Btuh
	Latent occupant gain (6 people @ 200 Btuh per person)	1200	Btuh
	Latent other gain	0	Btuh
	Latent total gain	8226	Btuh
	TOTAL GAIN	50433	Btuh

EQUIPMENT	
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1. Central Unit	#	44000 Btuh

\*Key: Window types (Pn - Number of panes of glass)
(SHGC - Shading coefficient of glass as SHGC numerical value or as clear or tint)

(U - Window U-Factor or 'DEF' for default)
(InSh - Interior shading device: none(N), Blinds(B), Draperies(D) or Roller Shades(R))

(ExSh - Exterior shading device: none(N) or numerical value)

(BS - Insect screen: none(N), Full(F) or Half(H))

(Ornt - compass orientation)



# **Residential Window Diversity**

## MidSummer

Custom Residence

Lake City, FL 32025-

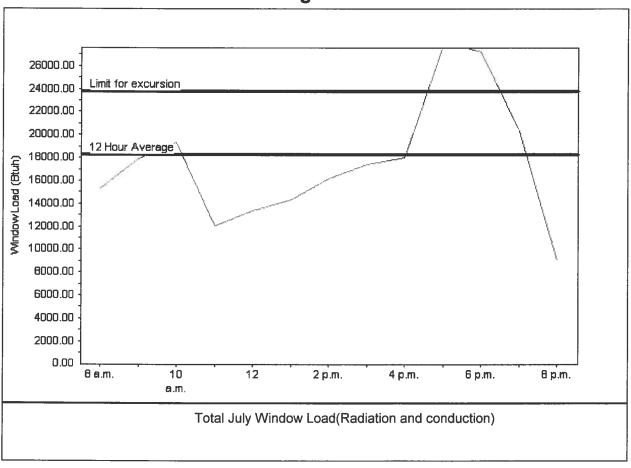
Project Title: Sedrick Davis

Code Only Professional Version Climate: North

9/17/2007

Weather data for: Gainesville - Defaults								
Summer design temperature	92 F	Average window load for July	18279 Btu					
Summer setpoint	75 F	Peak window load for July	28010 Btu					
Summer temperature difference	17 F	Excusion limit(130% of Ave.)	23763 Btu					
Latitude	29 North	Window excursion (July)	4247 Btuh					

# **WINDOW Average and Peak Loads**



This application has glass areas that produce large heat gains for part of the day. Variable air volume devices are required to overcome spikes in solar gain for one or more rooms. Install a zoned system or provide zone control for problem rooms. Single speed equipment may not be suitable for the application.

