130A-336(a)	Number of Bedrooms, employees, seats, etc. indicated?	Yes ☐	No ☐	N/A ☐
.1937(g)	Trench depth indicated?	Yes ☐	No ☐	N/A ☐
.1937(g)	Trench width indicated?	Yes ☐	No ☐	N/A ☐
.1937(g)	Trench length indicated?	Yes ☐	No ☐	N/A ☐
130A-336(a)(1)	Proposed/existing well shown?	Yes ☐	No ☐	N/A ☐
130A-336(a)(1)	Property line lengths shown?	Yes ☐	No ☐	N/A ☐
130A-336(a)	Facility/appurtenance setbacks shown from fixed points?	Yes ☐	No ☐	N/A ☐
	Operation Permit			
.1937(i)	System type as described in table V(a) of rule .1961	Yes ☐	No ☐	N/A ☐
.1937(i)	Conditions for system performance, operation, maintenance, monitoring and reporting.	Yes ☐	No ☐	N/A ☐

II. WASPS Review:

Construction authorization issued	Yes ☐	No ☐	N/A ☐
Installation approval issued	Yes ☐	No ☐	N/A ☐
Operation permit issued	Yes ☐	No ☐	N/A ☐
Other related documentation	Yes ☐	No ☐	N/A ☐

Items requiring correction/modification: _____

Comments:

_____

_____

_____

_____

_____

IA issued date: _____

OP issued date: _____

Review performed by: KR Date performed: 2-12-09

2004 OTS OK

Groundwater & Wastewater Services
Septic Project File & Data Review Worksheet

GWS File #: 7630 a WASPS App #: 3242

Primary ES assigned to project:

Secondary ES assigned to project:

pd 29774 LD 3/26/09 Trackit OTS OK

Project Type: New System ☐ Alteration ☐ Repair ☐ Modified Plot Plan ☐

I. File Review:

Rule or Law	Permit Application			
.1937(d)	Is the Application complete	Yes ☑	No ☐	N/A ☐
.1937(d)	Is there a Site plan/Plat with application	Yes ☑	No ☐	N/A ☐
.1937(d)	Is the Facility shown?	Yes ☐	No ☐	N/A ☐
.1937(d)	Are appurtenances shown	Yes ☑	No ☐	N/A ☐
	Site Evaluation Information			
.1939 (a)(1)	Topography and Landscape Position Recorded?	Yes ☐	No ☐	N/A ☐
.1940 (a-g)	Slope % Recorded?	Yes ☐	No ☐	N/A ☐
.1939 (a)(2)	Texture Class Recorded?	Yes ☐	No ☐	N/A ☐
.1939 (a)(2)	Structure type Recorded?	Yes ☐	No ☐	N/A ☐
.1939 (a)(2)	Consistence Recorded?	Yes ☐	No ☐	N/A ☐
.1939 (a)(2)	Mineralogy Recorded?	Yes ☐	No ☐	N/A ☐
.1939 (a)(3)	Soil Wetness Condition Recorded?	Yes ☐	No ☐	N/A ☐
.1939 (a)(4)	Soil Depth to Rock or Parent Material Recorded When Encountered	Yes ☐	No ☐	N/A ☐
.1939 (a)(5)	Depth to Restrictive Horizons Recorded When Encountered?	Yes ☐	No ☐	N/A ☐
.1939 (a)(6)	Sufficient Available Space Recorded?	Yes ☐	No ☐	N/A ☐
.1937(m)	Are the Profile Locations Shown?			
.1939(a)	Are the S/PS Profiles in system & in repair area?	Yes ☐	No ☐	N/A ☐
& .1945(b)	Number of auger borings made: _____ Were sufficient auger borings made?	Yes ☐	No ☐	N/A ☐
.1939(d), .1955, .1956, .1957	LTAR	Yes ☐	No ☐	N/A ☐
	Improvement Permit/Construction Authorization			
.1937(g) 130A-336(a)	Proposed System Type stated-Initial	Yes ☐	No ☐	N/A ☐
.1945(b)	Proposed System Type stated-Repair	Yes ☐	No ☐	N/A ☐
130A-336 (a)(3)	System location identifiable by setbacks - Initial	Yes ☐	No ☐	N/A ☐
.1937(g) .1945(b)	System components shown – Initial	Yes ☐	No ☐	N/A ☐
.1945(b)	Repair area shown	Yes ☐	No ☐	N/A ☐
.1937 (f)(g)	Does System design match facility, flow & WWcharacteristics?	Yes ☐	No ☐	N/A ☐
.1937 (f)(g)	Is System design consistent with soil/site conditions?	Yes ☐	No ☐	N/A ☐
.1937 (f)(g)	Is the System located in the approved area?	Yes ☐	No ☐	N/A ☐
130A-336(a)	Is the Design flow (gpd) indicated?	Yes ☐	No ☐	N/A ☐

3242 J Michelone

CD # 271183

FEE: 100.00
DATE: 2-4-08
CRT # Charged-X39257

APPLICATION FOR APPROVAL TO USE AN EXISTING ON-SITE WASTEWATER TREATMENT & DISPOSAL SYSTEM
MECKLENBURG COUNTY - GROUNDWATER & WASTEWATER SERVICES
700 N. Tryon St., Suite 211 Charlotte, NC 28202
Phone: (704) 336-5103 Fax: (704) 336-6894

GWS – UES.APP 06/07

FILE # 7630B

TYPE APPLICATION:
- [X] ADDITION - INCREASE ROOMS/OCCUPANCY/MOBILE HOME SIZE (A / M)
- [ ] ADDITION - RENOVATION OR GARAGE WITH NO MAJOR CHANGES (X)
- [ ] EXCHANGE MOBILE HOME - SAME # BEDROOMS (Y)
- [ ] COMMERCIAL OR INDUSTRIAL (N)

PERSON FILING APPLICATION:
NAME: Hampton Pike Power
ADDRESS: 6130 Performance Woods Dr
CITY: Charlotte
STATE: NC ZIP: 28214
PHONE: 704-398-0055
ALTERNATE PHONE:

PROPERTY OWNER:
NAME: Richard McElrath
ADDRESS: 7111 Arthur Autrey Rd.
CITY: Huntersville
STATE: NC ZIP: 28078
PHONE: 704-[illegible]
ALTERNATE PHONE:

JOB LOCATION INFORMATION
TAX/PARCEL #: 023-241-57
STREET ADDRESS: 7111 Arthur Autrey Rd.
CITY: Huntersville
STATE: NC ZIP: 28078
SUBDIVISION OR MOBILE HOME PARK NAME:
LOT #:

TOWNSHIP:
- [ ] 0-MECKLENBURG
- [ ] 1-CHARLOTTE
- [ ] 2-DAVIDSON
- [ ] 3-CORNELIUS
- [ ] 4-PINEVILLE
- [ ] 5-MATTHEWS
- [X] 6-HUNTERSVILLE
- [ ] 7-MINT HILL

WATER SUPPLY:
- [ ] MUNICIPAL (M)
- [ ] COMMUNITY (C)
- [X] PRIVATE WELL (P)
- [ ] SHARED WELL (S)
- [ ] OTHER 'SPRINGS' (O)

RESIDENTIAL PROPERTY TYPE:
- [X] HOUSE (H)
- [ ] MODULAR HOME (M)
- [ ] MULTIPLE FAMILY (U)
- [ ] SINGLE MOBILE HOME (S)
- [ ] DOUBLE WIDE (D)
- [ ] OTHER (O)

OCCUPANCY (both fields are required):
NUMBER OF BEDROOMS: 2
NUMBER OF OCCUPANTS: 2

COMMERCIAL / INDUSTRIAL PROPERTY TYPE:
TYPE OF BUSINESS:
EMPLOYEES PER SHIFT:
OF SHIFTS:
INDUSTRIAL WASTES? [ ] YES [ ] NO
UNDERGROUND STORAGE TANKS? [ ] YES [ ] NO

ADDITION TYPE ATTACHED TO EXISTING STRUCTURE:
- [ ] BEDROOM
- [ ] BATHROOM
- [ ] KITCHEN
- [ ] DINING ROOM
- [ ] LIVING ROOM
- [ ] DEN
- [ ] GARAGE
- [X] SUNROOM
- [ ] PORCH
- [ ] DECK
- [ ] OTHER

ADDITION TYPE DETACHED FROM EXISTING STRUCTURE:
- [ ] DETACHED GARAGE
- [ ] DETACHED GARAGE WITH PLUMBING
- [ ] POOL HOUSE
- [ ] SHOP
- [ ] BARN
- [ ] STORAGE SHED
- [ ] DETACHED PORCH / DECK
- [ ] OTHER

"The undersigned, owner, or legal agent for the owner, of the property described above as the "Job Location" has read the foregoing application, acknowledges that the contents of same are true, and authorizes the Mecklenburg County Health Department to enter onto the property for the purpose of processing this request.

Owner's/Agent's Signature — Date 2/15/08

"The undersigned, an authorized agent of the Mecklenburg County Health Department, certifies that the Department has approved the Request for the Job Location contained in this document. This approval is granted in accordance with the provisions of Laws and Rules for Sanitary Sewage Collection, Treatment and Disposal in effect at the time of issuance of the permit and is subject to the following provisions:

- No work shall be conducted on the septic tank system until an installation, construction, alteration and/or repair approval is granted by this Department.
- This permit is not transferable.

- [ ] ADDITION / RENOVATION APPROVAL - VALID 1 YEAR FROM ISSUANCE
- [ ] MOBILE HOME EXCHANGE APPROVAL - VALID 6 MONTHS FROM ISSUANCE

Use existing system denied due to setbacks and swim Buffer regulations.

EHS Signature — Date

Jimmy Mintz, R.S. 2/12/09

* PLANS WERE RE-ENGINEERED TO MEET SEPTIC SETBACKS. O.K. TO USE EXISTING SYSTEM FOR A SUNROOM ADDITION.

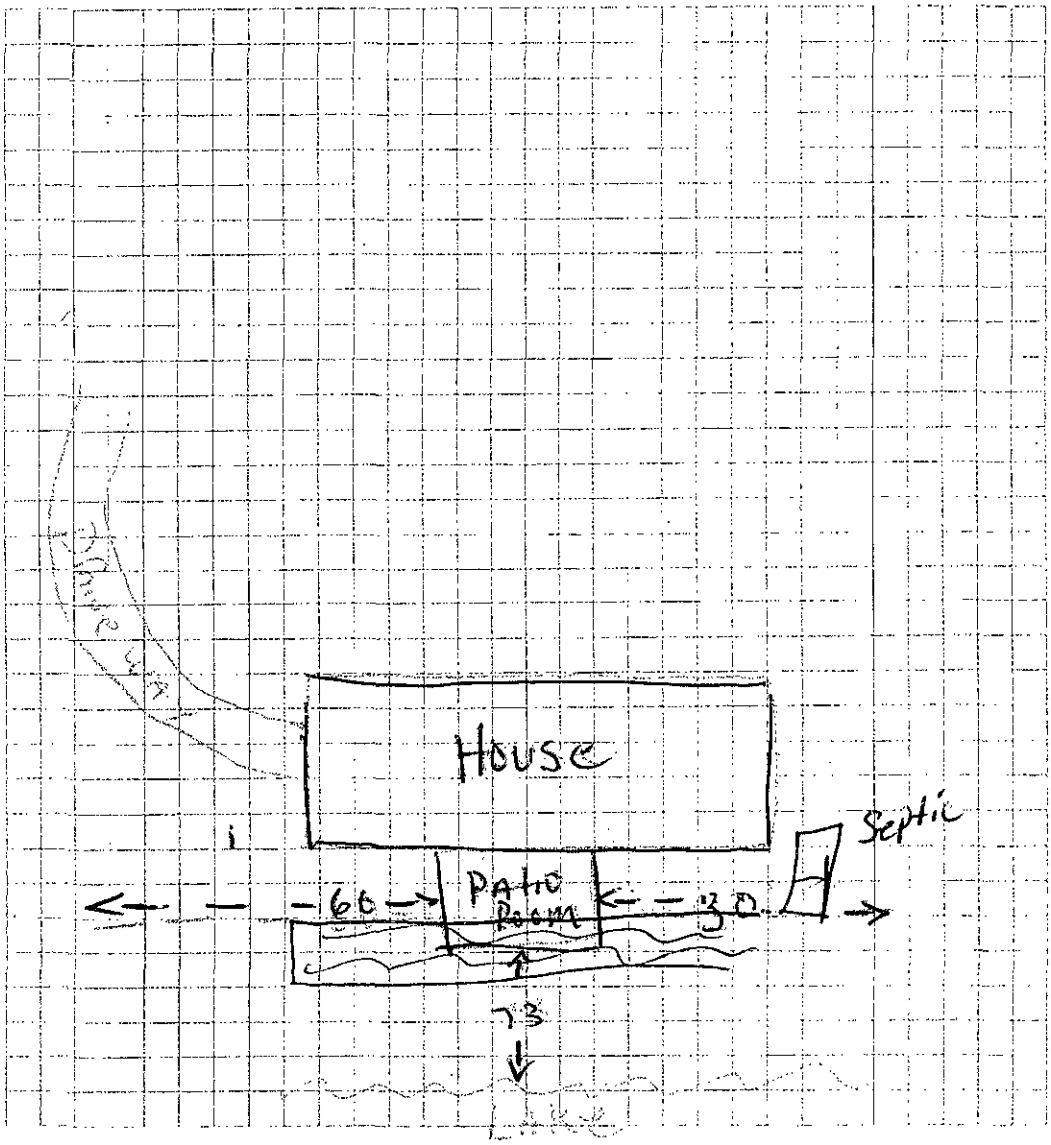
Jimmy Mintz, R.S. 2/12/09

Mecklenburg County
Land Use & Environmental Service Agency
Groundwater & Wastewater Services
700 N. Tryon St., Suite 211
Charlotte, NC 28202
Phone: (704) 336-5103
Fax: (704) 336-6894

File # _____
Date _____

PROPOSED PLOT PLAN

A map showing existing and proposed property lines and easements with dimensions, the location of the single family residence, non-single family residence, or other facility, and appurtenances, the site for the proposed well, and the location of existing or proposed sewer lines and/or sewage disposal systems, surface water bodies, aboveground or underground storage tanks. Name all roads adjoining the property. If this a repair indicate the type of repair.



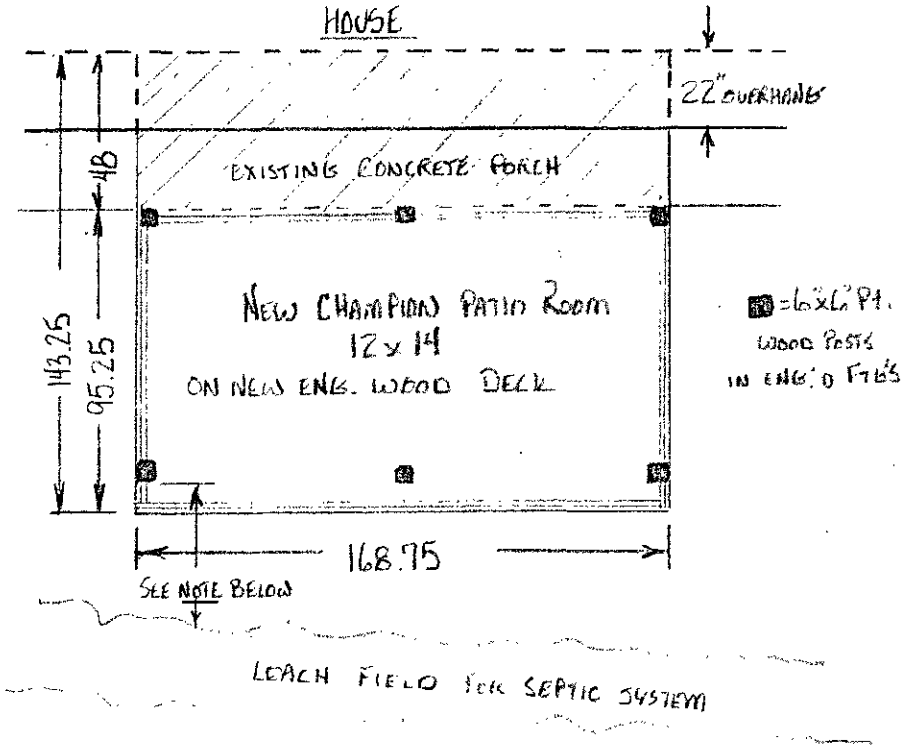
Owner/Agent Signature _____

Date: 2/8/05

LSC 12/15/04

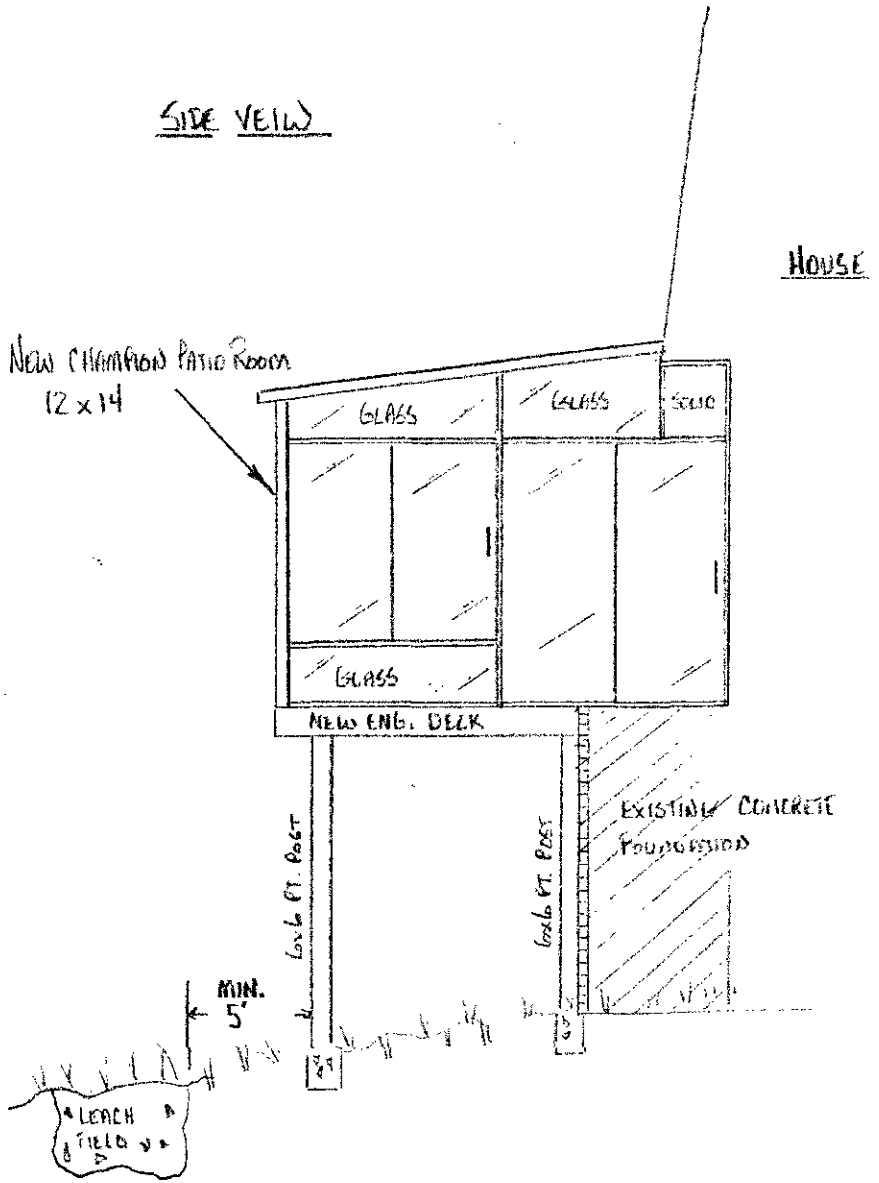
RICHARD & JACQUELINE MCELRATH
11111 ARTHUR AUTON ROAD
HUNTERSVILLE, NC. 28078

BIRD'S EYE VIEW



NOTE: DECK POST'S LOCATION TO BE A MINIMUM DISTANCE OF 5' TO EDGE OF LEACH FIELD.

SIDE VEIW



MECKLENBURG COUNTY

Land Use & Environmental Services Agency
Groundwater & Wastewater Services

Febuary 12, 2008

Richard McElrath
11111 Arthur Auten Road
Huntersville, NC 28078

Re: Application for approval to use an existing on-site wastewater treatment & disposal system.
Property Location: 11111 Arthur Auten Road
Health Department file number: **7630B**

Dear Property Owner or Owner's Agent:

On Febuary 12, 2008 the Mecklenburg County Health Department, Groundwater & Wastewater Services Section, evaluated the above-referenced property to determine if approval to use an existing on-site wastewater treatment & disposal system could be granted for your proposed project. This evaluation was done in accordance with the laws and rules governing wastewater systems in North Carolina General Statute 130A-333 and related statutes, Title 15A, Subchapter 18A, of the North Carolina Administrative Code, Rule .1900 and related rules, and the Mecklenburg County Groundwater Well Regulations.

Based on the information provided in the application, dated Febuary 8, 2008, and findings from the site evaluation conducted by our office, your request for approval to use an existing on-site wastewater treatment & disposal system is **not** being granted. This decision is based on the following conditions that were identified during the site visit:

- ☐ The existing on-site wastewater treatment & disposal system was not functioning properly at the time the site evaluation was conducted.
- ☒ The proposed plans do not meet the required setbacks for the on-site wastewater treatment & disposal system serving the property.
- ☐ The proposed plans do not meet the required setbacks for the reserved repair area for an on-site wastewater treatment & disposal system.
- ☐ The proposed plans do not meet the required setbacks for water supply wells.
- ☐ The proposed project will exceed the permitted daily design flow for the existing on-site wastewater treatment & disposal system. System alteration will be required in order to accommodate your proposed project.

If you need any additional information or assistance please contact our office at (704) 336-5103.

Sincerely,

Tammy Mitchell, R.S.

Environmental Specialist

Encl: (1) Application

MECKLENBURG COUNTY
LAND USE AND ENVIRONMENTAL SERVICES
Payment Receipt

Receipt Information

Date:	02/08/08	Amount:	100.00
Receipt #:	55174	Tendered:	100.00
Check / Auth #:	CHARGE	Returned:	100.00
Received By:	MULLIVR		

Account Information

Account #: X39257
Contractor: CHAMPION PATIO ROOMS OF CHAR
Attn:
Address: 9100 PERIMETER WOODS SUITE I
Address:
City/State/Zip: CHARLOTTE, NC 28216

Item	Description	Permit#	Quantity	Unit Price	Total Price
0705	MH Exc/Add/Repl w/o System Mod PN 02301157/ 11111 ARTHUR AUTEN RD		1	100.00	100.00

Outstanding Balances

Month-To-Date	Prior Month	30 Days	60 Days	90 Days	Balance
474.81	172.72				

Mecklenburg County, North Carolina

POLARIS

Property Ownership Land Records Information System

Date Printed: Fri Jan 16 11:29:24 EST 2009



This map is prepared for the inventory of real property within Mecklenburg County and is compiled from recorded deeds, plats, tax maps, surveys, planimetric maps, and other public records and data. Users of this map are hereby notified that the aforementioned public primary information sources should be consulted for verification. Mecklenburg County and its mapping contractors assume no legal responsibility for the information contained herein.

Mecklenburg County, North Carolina

POLARIS

Property Ownership Land Records Information System

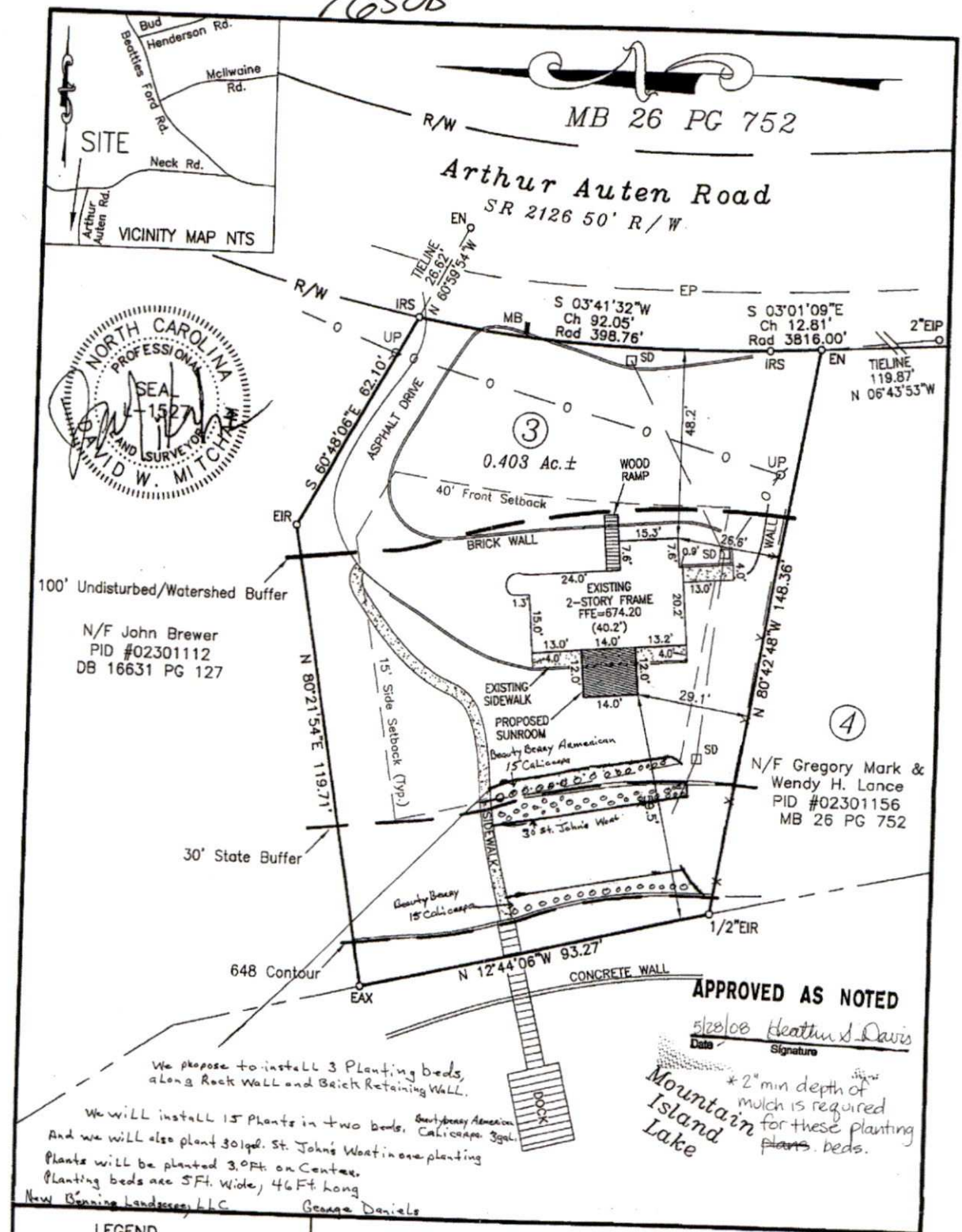
Date Printed: Tue Oct 7 13:32:25 EDT 2008

ARTHUR AUTEN RD



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7630B



APPROVED AS NOTED

5/28/08 Heather S. Davis
Date Signature

We propose to install 3 Planting beds, along Rock Wall and Brick Retaining Wall.

We will install 15 Plants in two beds, Beauty Berry American Calicarpa 3gal.
And we will also plant 30 1gal. St. John's Wort in one planting
Plants will be planted 3.0Ft. on Centers.
Planting beds are 5Ft. Wide, 46Ft long
New Beginning Landscapes, LLC George Daniels

Mountain Island Lake

* 2" min depth of mulch is required for these planting ~~plants~~ beds.

LEGEND

EN	EXISTING NAIL
EIR	EXISTING RON REBAR
IRS	IRON REBAR SET
EAX	EXISTING AXLE
R/W	RIGHT-OF-WAY
EP	EDGE OF PAVEMENT
SD	STORM DRAIN
TP	TELEPHONE PEDESTAL
UP	UTILITY POLE
MB	MAILBOX
FFE	FINISHED FLOOR ELEVATION
-X-	EXISTING FENCE LINE

NOTE

NO USGS OR NCGS MONUMENTS FOUND WITHIN 2000'

CLOSURE 1:10,000+

VARIANCE SURVEY FOR

RICHARD ALLEN MCELRATH, SR & JACQUELINE

11111 ARTHUR AUTEN ROAD
HUNTERSVILLE, NC 28078

TOWNSHIP	COUNTY	STATE	DEED BOOK	PAGE
LONG CREEK	MECKLENBURG	NC	23197	579

SUBDIVISION	LOT	SECTION	MAP	MAP BOOK	PAGE
GAENEL M. TESH	3	-	-	26	752

30' 15' 0' 30'
SCALE : 1" = 30'

DATE	TAX PID	
03/27/08	02301157	
JOB NO.	SURVEYED	DRAWN
6682	MCK	CJS

MITCHAM & ASSOCIATES, P.A.
SURVEYORS - PLANNERS
21343 CATAWBA AVENUE, CORNELIUS, NC 28031
(704) 987-3456 (704) 987-3457(FAX)

DATE: 10/7/2008 **PERMIT NUMBER:**

TO: CHARLOTTE-MECKLENBURG CODE ENFORCEMENT

FROM: MECKLENBURG COUNTY GIS **JURISDICTION:** HUNT

023-011-57

PARCEL NUMBER

11111 ARTHUR AUTEN RD

ASSIGNED STREET ADDRESS (ADDRESS OF RECORD)

N/A

EXISTING STREET ADDRESS (IF DIFFERENT FROM ASSIGNED)

N/A

PROJECT NAME (IF APPLICABLE)

Remarks: ADDRESS VERIFIED - BLDG ADDITION

Signed: Sharon K. Dapp

Addressing Verification Form Disclaimer Statement

The party indicated on this application shall be responsible for maintaining this address throughout the life of the project from plan submittal through final C/O. The contents of this form reflect information provided by the party listed on this form.

Incorrect information may result in delays in getting final approval of permits and the final C/O.

Special Circumstances: If a temporary address is being verified for the purposes of Plan Review, the responsible party will be required to obtain and submit a new form verifying the permanent address prior to issuance of the permit.

Name (please print) _____

Company _____

Company Address _____

_____

Telephone # _____

Signature _____

Date _____

Revised Oct-2005



Print

Close

Parcel Information

Parcel ID	Account	Parent	Previous
02301157	INDIVIDUAL	02301154	02301157

Owner(s)

Owner Name	Mailing Address	City/State
MCELRATH RICHARD ALLEN SR	11111 ARTHUR AUTEN RD	HUNTERSVILLE NC 28078
MCELRATH JACQUELINE BIRKES WIFE	11111 ARTHUR AUTEN RD	HUNTERSVILLE NC 28078

Legal Information

Legal	Municipality	Annexed	Special District	Fire District	Acreage
L3 M26-752	MECKLENBURG COUNTY-UNINCORPORATED		FIRE SERVICE D	GILEAD	0.41

Total Parcel Assessment & Exemptions

Building	Land	Features	Total	Exemption	Year Approved	Review Date	Amount
60600	200000	5900	266500				

Sales Information

Sale	Price	Stamps	Qualify	V/I	DeedBook	Type	Legal Ref.	Grantor
Dec 21 2007	430000	860.0000		VAC	23197 - 579	WARRANTY D	23197-579	TESH, GAENEL M
Jun 14 1995	0			VAC	08177 - 797	DEED STAMPS	08177-797	

Land Use

Use	Units	Type	Neighborhood	Assessment
R122	1.00	WF	C301	200000

Building Information

Bldg	Description	Type	Year Built	Property Location
1	Single-Fam	RES	1980	11111 ARTHUR AUTEN RD UNINC

Bldg	Story	Units	Total SqFt	Heated	Foundation	Ext. Wall	Grade	Value
1	1 STORY	1	1600	1600	CRAWL SPACE	WOOD ON SHTG -	AVERAGE 03	60600

Bldg	Heat	Fuel	FirePlace	AC	Fixtures	Bedrooms	Full Baths	3/4 Baths	1/2 Baths
1	AIR-DUCTED	ELECTRIC		AC-CENTRAL		2	2		0

Sub Areas

Bldg	Description	Size
1	BASE (FIRST FLOOR)	800
1	BASEMENT - FINISHED	800

Depreciation

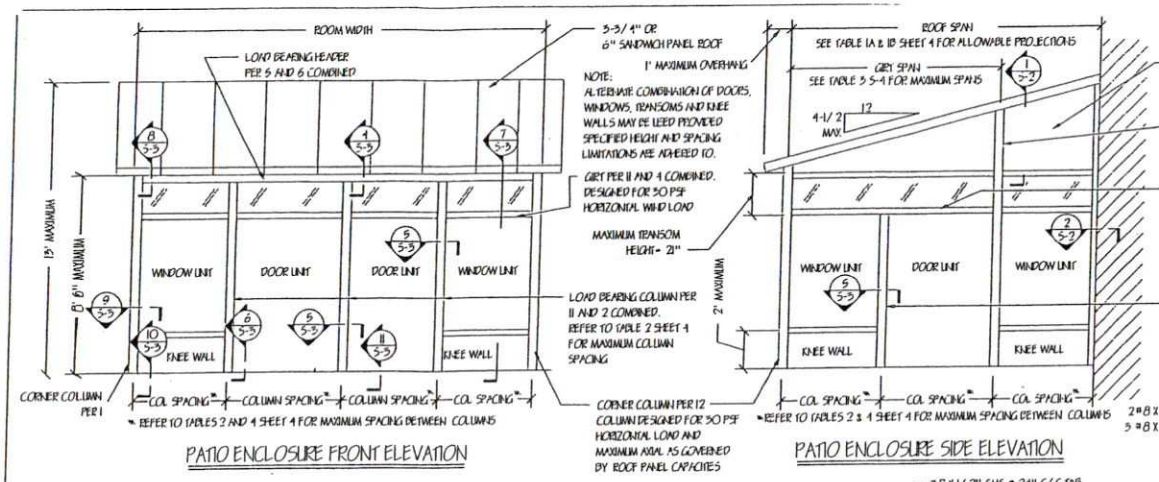
Bldg	Physical	Functional	Economic	Special	Override
1	AV - 24.00%				

Special Features & Yard Items

Bldg	Built	Type	Quantity	Units	Value
1	2003	DOCK	1	12x14	3200
1	2003	PIER	1	24x8	2700

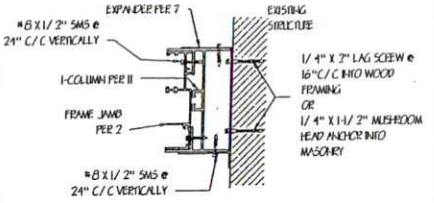
Value Changes

Notice Date	Tax Year	Reason	Changed To	Deferred
Oct 13 2004	2004	Revised Notice	266500	0
Jun 20 2003	2003	Reviewed - No change in value	260600	0
Jan 17 2003	2003	Countywide Revaluation	260600	0
Jan 5 1998	1998	Countywide Revaluation	108480	
Sep 6 1996	1996	Division of Real Estate and/or New Parce	107990	

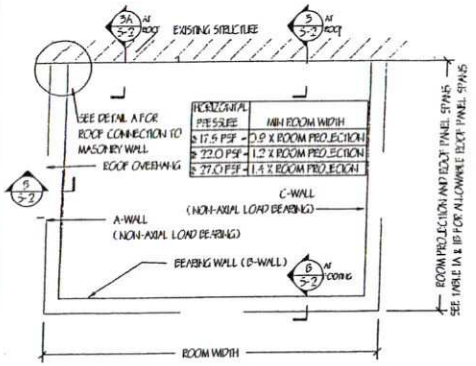


PATIO ENCLOSURE FRONT ELEVATION

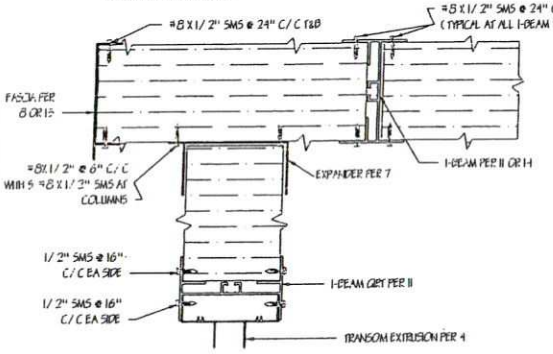
PATIO ENCLOSURE SIDE ELEVATION



(2/5-2) SIDEWALL TO ROOF CONNECTION DETAIL



PATIO ENCLOSURE PLAN

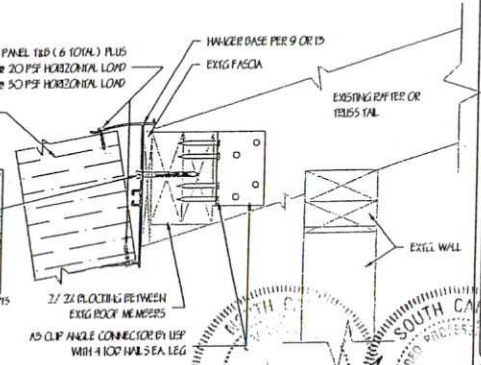


(1/5-2) SIDEWALL TO ROOF CONNECTION DETAIL

5/16" X 3" LAG SCREWS WITH 1" WASHER CONNECTING HANGER TO 2X BLOCKING LEDGER. SPACING PER FOLLOWING TABLE

	ROOF LOAD (PLF)*						
	100	150	200	250	300	350	400
FLG'D SPACING 16" (MAX)	16"	16"	12"	10"	8"	7"	6"

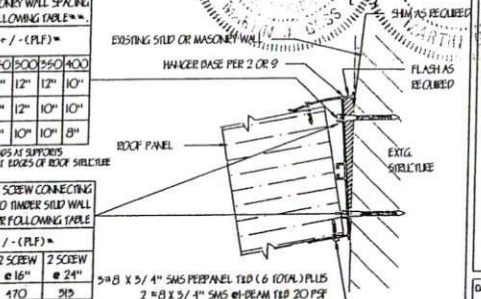
* REFER TO TABLE 2 SHEET 4 FOR ROOF LOADS AS SUPPORTS



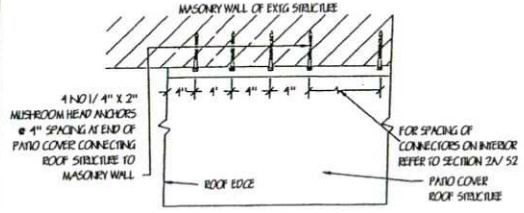
(3/5-2) ROOF CONNECTION TO EXTG ROOF

No. 1/4" X 2" MUSHROOM HEAD ANCHORS CONNECTING HANGER TO MASONRY WALL SPACING AT INTERIOR OF ROOF PER FOLLOWING TABLE**							
HORIZ WIND LOAD (PSF)	ROOF LOAD +/- (PLF)*						
	100	150	200	250	300	350	400
20	24"	16"	16"	16"	12"	12"	10"
30	16"	16"	16"	12"	12"	10"	10"
40	16"	12"	12"	12"	10"	10"	8"

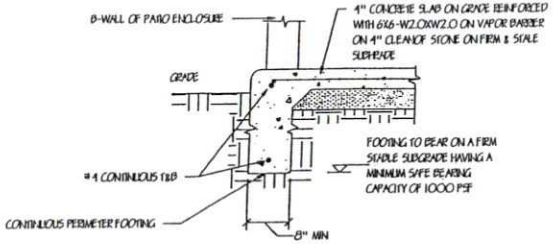
* REFER TO TABLE A SHEET 4 FOR ROOF LOADS AS SUPPORTS
** REFER TO A/5-2 FOR ANCHOR SPACING AT EDGES OF ROOF STRUCTURE



(2A/5-2) ROOF CONNECTION TO EXTG WALL



(A/5-2) DETAIL A: ROOF CONNECTION TO MASONRY WALL



(D/5-2) TURNED DOWN SLAB ON GRADE FOUNDATION DETAIL

5/16" X 3" LAG SCREW CONNECTING HANGER TO TIMBER STUD WALL LUMBER AND SPACING OF SCREWS PER FOLLOWING TABLE

HORIZ WIND LOAD (PSF)	MAX ROOF LOAD +/- (PLF)*			
	1 SCREW @ 16"	1 SCREW @ 24"	2 SCREW @ 16"	2 SCREW @ 24"
15	295	197	470	313
20	295	144	470	313
25	295	112	470	313
30	216		470	313
35	187		470	300
40			470	295

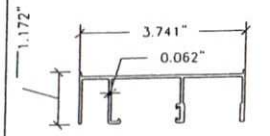
* REFER TO TABLE A SHEET 4 FOR ROOF LOADS AS SUPPORTS

CHAMPION ENCLOSURE SUPPLIERS INC
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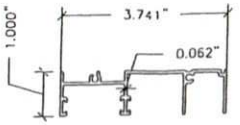
CESI

ELEVATIONS AND SECTION DETAILS FOR CHAMPIONS SINGLE SLOPE 4" ALUMINUM ENCLOSURE SYSTEM

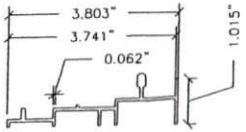
DATE: DEC 2001
SCALE: NTS
DRAWN BY: MJG
DRG NO. S-2
2 OF 4



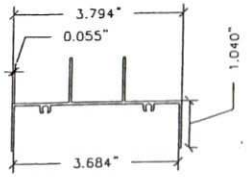
WINDOW/ DOOR FRAME HEAD (1)



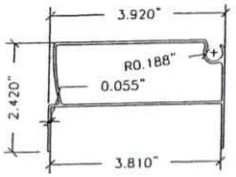
WINDOW/ DOOR FRAME JAMB (2)



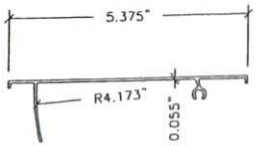
WINDOW/ DOOR FRAME SILL (3)



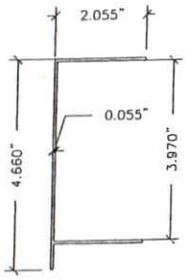
TRANSOM EXTRUSION (4)



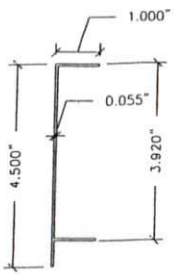
HEADER BASE (5)



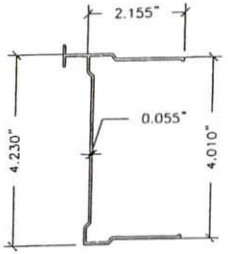
HEADER ARM (6)



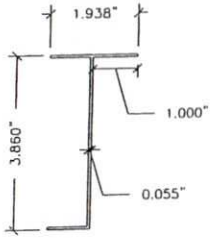
4" EXPANDER (7)



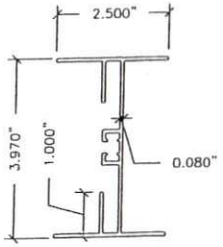
4" F-CHANNEL (8)



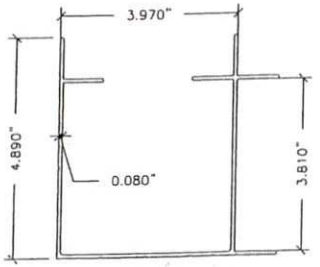
4" HANGER BASE (9)



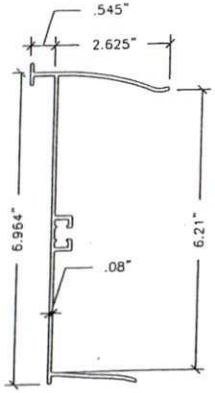
4" SILL EXTRUSION (10)



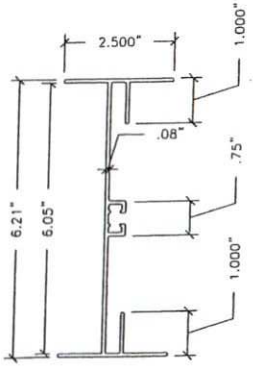
4" I- SECTION (11)



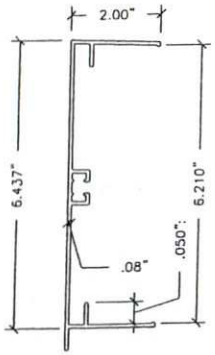
CORNER POST (12)



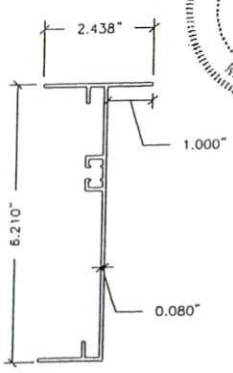
6" PANEL HANGER BASE (13)



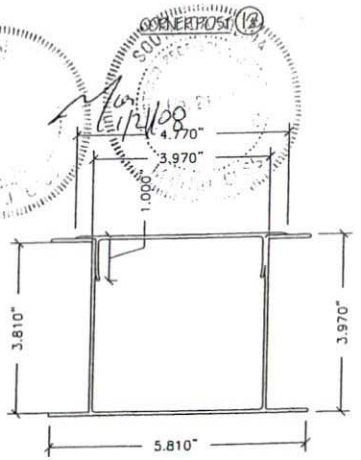
6" I-BEAM (14)



6" F-CHANNEL (15)



6" SILL (16)



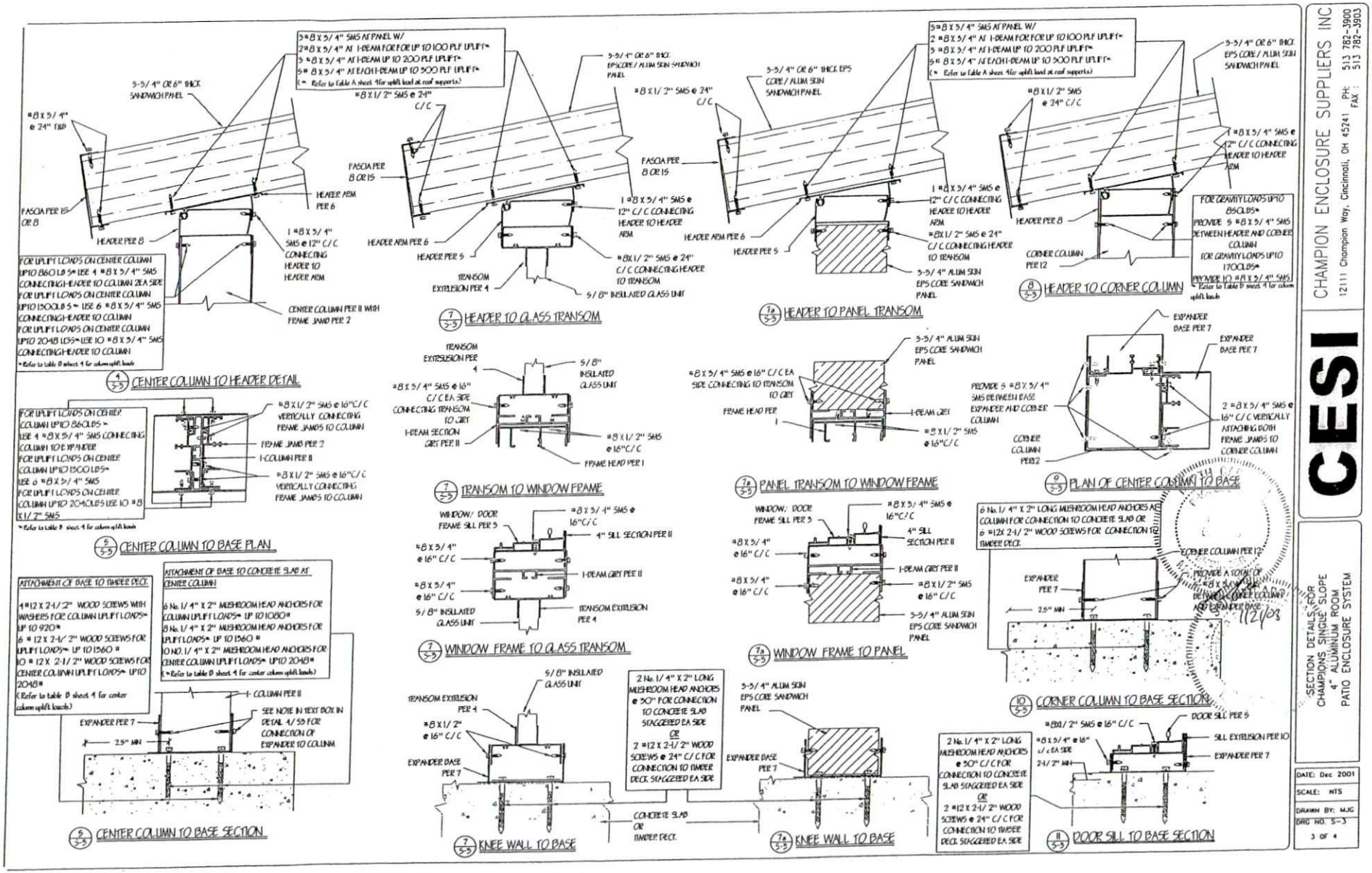
POST SLEEVE (17)

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FAX : 513 782-396

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PARTS FOR CHAMPIONS
SINGLE SLOPE
4" ALUMINUM ENCLOSURE SYSTEM

DATE: DEC 2001
SCALE: NTS
DRAWN BY: MJG
DRG NO. S-1
1 OF 4



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CHAMPION ENCLOSURE SUPPLIERS INC
12111 Champion Way, Cincinnati, OH 45241 PH: 513 782-3900 FAX: 513 782-3903

"SECTION DETAILS FOR CHAMPIONS SINGLE SLOPE 4" ALUMINUM ROOM PATIO ENCLOSURE SYSTEM"

DATE: Dec 2001
SCALE: NTS
DRAWN BY: MJG
DRG NO. 5-3
3 OF 4

TABLE A: ROOF REACTION LOADS (PLF) AT ROOF SUPPORTS

PANEL SPAN (FT)	ROOF LOAD +/- (PSF)										
	10	15	20	25	30	35	40	45	50	55	60
10	65	90	115	140	165	190	215	240	265	290	315
11	71.5	99	126.5	154	181.5	209	236.5	264	291.5	319	346.5
12	78	108	138	168	198	228	258	288	318	348	378
13	84.5	117	149.5	182	214.5	247	279.5	312	344.5	377	409.5
14	91	126	161	196	231	266	301	336	371	406	
15	97.5	135	172.5	210	247.5	285	322.5	360	397.5		
16	104	144	184	224	264	304	344				
17	110.5	153	195.5	238	280.5	323					
18	117	162	207	252	297						
19	123.5	171	218.5	266							
20	130	180	230								

* TABLE INCLUDES ROOF PANEL DEAD LOADS

TABLE B: COLUMN AXIAL LOADS (LBS)

PANEL SPAN (FT)	COLUMN SPACING (FT)	ROOF LOAD +/- (PSF)										
		10	15	20	25	30	35	40	45	50	55	60
10	4	260	360	460	560	660	760	860	960	1060	1160	1260
10	6	390	540	690	840	990	1140	1290	1440	1590	1740	1890
10	8	520	720	920	1120	1320	1520	1720	1920	2120	2320	2520
12	4	312	432	552	672	792	912	1032	1152	1272	1392	1512
12	6	468	648	828	1008	1188	1368	1548	1728	1908	2088	2268
12	8	624	864	1104	1344	1584	1824	2064	2304	2544	2784	3024
14	4	364	504	644	784	924	1064	1204	1344	1484	1624	
14	6	546	756	966	1176	1386	1596	1806	2016	2226	2436	
14	8	728	1008	1288	1568	1848	2128	2408	2688	2968	3248	
16	4	416	576	736	896	1056	1216	1376				
16	6	624	864	1100	1344	1584	1824	2064				
16	8	832	1152	1472	1792	2112	2432	2752				
18	4	468	648	828	1008	1188						
18	6	702	972	1242	1512	1782						
18	8	936	1296	1656	2016	2376						
20	4	520	720	920								
20	6	780	1080	1380								
20	8	1040	1440	1840								

USE TABULATED VALUES FOR AXIAL LOADS ON CENTER COLUMNS
USE 1/2 OF THE TABULATED VALUES FOR AXIAL LOADS ON CORNER COLUMNS

* TABLE INCLUDES ROOF PANEL DEAD LOADS

TABLE 1a: ALLOWABLE SPANS FOR 3-3/4" THICK EPS/ ALUM SANDWICH PANEL

LIVE ROOF/SNOW LOAD (PSF)								
20	25	30	35	40	45	50	55	60
16'	15'	14'	13'	12'4"	11' 8"	11'	10'6"	10'

* TABLE INCLUDES ROOF PANEL DEAD LOADS
SPANS BASED ON LESSER OF ULTIMATE LOAD DIVIDED BY A FACTOR OF SAFETY = 2.5 OR DEFLECTION CRITERIA OF THE SPAN DIVIDED BY 120

TABLE 1b: ALLOWABLE SPANS FOR 6" THICK EPS/ ALUM SANDWICH PANEL

ROOF LIVE/SNOW LOAD (PSF)								
20	25	30	35	40	45	50	55	60
21'	20'	18'	17'	16'	15'	14' 6"	14	13

* TABLE INCLUDES ROOF PANEL DEAD LOADS
SPANS BASED ON LESSER OF ULTIMATE LOAD DIVIDED BY A FACTOR OF SAFETY = 2.5 OR DEFLECTION CRITERIA OF THE SPAN DIVIDED BY 120

TABLE 2: MAXIMUN SPACING BETWEEN I-COLUMNS (PER 11 AND 2)

AXIAL LOAD (LBS)	HORIZONTAL WIND PRESSURE +/- (PSF)						
	15	17.5	20	22.5	25	27.5	30
0	96"	96"	95"	84"	76"	69"	63"
1000	96"	96"	95"	84"	76"	69"	63"
1500	96"	96"	95"	84"	76"	67"	61"
2000	96"	96"	88"	78"	70"	63"	58"
2500	96"	95"	82"	73"	65"	59"	54"
3000	96"	87"	76"	68"	61"	55"	51"

* REFER TO TABLE B FOR AXIAL LOADS ON COLUMNS

TABLE 3: ALLOWABLE GIRT SPANS 8.5' HIGH ROOM

ROOF ATTACHMENT HEIGHT (FT)	WIN PRESSURE +/- (PSF)							
	15	17.5	20	22.5	25	27.5	30	32.5
8	18' 3"	16' 10"	15' 9"	14' 10"	14' 1"	13' 5"	12' 10"	12' 3"
9	17' 10"	16' 3"	15' 3"	14' 4"	13' 8"	13' 1"	12' 6"	12' 0"
10	17' 2"	15' 11"	14' 11"	14' 0"	13' 3"	12' 7"	12' 2"	11' 7"
11	16' 9"	15' 6"	14' 6"	13' 7"	13' 0"	12' 3"	11' 10"	11' 5"
12	16' 3"	15' 1"	14' 2"	13' 3"	12' 7"	12' 0"	11' 6"	11' 1"
13	15' 11"	14' 9"	13' 10"	13' 0"	12' 3"	11' 9"	11' 3"	10' 9"

TABLE 4: ALLOWABLE LOADS (PLF) FOR DOOR/WINDOW HEADER

HEADER SPAN (FT)	47"	55"	59"	67"	71"	77"	85"	89"	95"
ALLOW LOAD (PLF)*	264	195	168	150	116	98	85	74	65

* REFER TO TABLE A FOR APPLIED ROOF REACTION AT SUPPORTS

GENERAL NOTES AND SPECIFICATIONS

1. THE DESIGN OF THE STRUCTURAL ALUMINUM MEMBERS AND CONNECTIONS HAVE BEEN PERFORMED IN ACCORDANCE WITH THE REQUIREMENTS OF THE ALUMINUM ASSOCIATION DESIGN MANUALS 2000 EDITION USING THE LOAD COMBINATIONS SPECIFIED IN THE 1999 BOCA, 1997 UBC, 1999 SBC, 2000 IBC, 2003 IBC AND THE 2006 IBC BUILDING CODES
2. UNLESS OTHERWISE NOTED, A DESIGN HORIZONTAL WIND LOAD OF 30PSF WAS USED IN THE DESIGN OF THE ALUMINUM FRAME CONNECTIONS.
3. THE LOAD BEARING CORNER COLUMNS HAVE BEEN DESIGNED TO WITHSTAND A 30PSF HORIZONTAL WIND LOAD AND THE MAXIMUM AXIAL LOAD OF 1650LBS IN THE COMBINATIONS SPECIFIED IN THE 1999 BOCA, 1997 UBC, 1999 SBC, 6TH ED OF THE MASSACHUSSETTS STATE BUILDING CODE, 2000 IBC, 2003 IBC AND THE 2006 IBC BUILDING CODES
4. THIS PATIO ENCLOSURE CAN BE CONSTRUCTED ON TIMBER FRAMED DECKS PROVIDED THE DECK AND ITS FOOTINGS HAVE BEEN PROPERLY ENGINEERED TO SAFELY CARRY THE ENCLOSURE AND DECKS DESIGN LOADS.
5. THE DOOR AND WINDOW UNITS USED IN THE CHAMPION PATIO ROOM SYSTEM, SUPPLIED BY ENCLOSURE SUPPLIERS INC., ARE GLAZED WITH FULLY TEMPERED INSULATED GLASS CONFORMING TO THE REQUIREMENTS OF ANSI Z97.1 AND CPSC 16 CFR 1201 CATEGORY II .
6. THIS ENCLOSURE SYSTEM IS LIMITED TO RECREATION AND OUTDOOR LIVING PURPOSES AND IS NOT TO BE USED AS A CARPORT, GARAGE OR HABITABLE ROOM.

MATERIALS

1. SOILS

A. ALL FOOTINGS SHALL BEAR ON LEVEL(WITHIN 1:12) UNDISTURBED SOIL OR APPROVED ENGINEERING FILL WITH AN ALLOWABLE SOIL BEARING CAPACITY OF 1000PSF FOOTINGS SHALL EXTEND BELOW THE FROST LINE OF THE LOCALITY.

2. CONCRETE

A. ALL CONCRETE SHALL CONFORM TO ALL REQUIREMENTS OF ACI 301 " SPECIFICATIONS FOR STRUCTURAL CONCRETE FOR BUILDINGS.
B. ALL CONCRETE SHALL HAVE A MINIMUM COMPRESSIVE STRENGTH OF 3000 PSI AT 28 DAYS AND WHERE EXPOSED TO THE EXTERIOR ENVIROMENT SHALL HAVE AN ENTRAINED AIR CONTENT OF BETWEEN 4.5% TO 7.0%.
C. ALL REINFORCING STEEL SHALL CONFORM TO ASTM A615 60 KSI DEFORMED BARS AND ASTM A185 MESH.

3. STRUCTURAL ALUMINUM

A. ALL EXTRUSIONS SHALL BE AL 6063-T6 ALUMINUM PROVIDED BY ENCLOSURE SUPPLIERS INCORPORTATED.
B. ROOF PANELS SHALL BE 3-3/4" OR 6" THICK SANDWICH PANELS MANUFACTURED BY ENCLOSURE SUPPLIERS INCORPORATED. THE PANEL CORE SHALL BE EXPANDED POLYSYRENE WITH A DENSITY OF 1.5 PCF. THE PANEL SKINS SHALL BE 0.024" ALUMINUM SHEETHING (5154 H34) TOP AND BOTTOM. ALTERNATIVELY THE PANELS SHALL HAVE A 0.024" ALUMINUM BOTTOM SKIN AND 7/16" OSB TOP AND SKIN. THE PANELS SHALL BE A MAXIMUM OF THREE FEET (3') WIDE AND SHALL BE SLOTTED BETWEEN AL 6063-T6 I-BEAMS.

4. SCREWS

a. SHEET METAL SCREWS SHALL BE STAINLESS STEEL, ZINC PLATED, GALVANIZED STEEL OR 2024-T4 ALUMINUM
B. LAG SCREWS SHOULD BE GALVANISED STEEL WITH A MINIMUM BENDING YIELD STRENGTH OF 60,000PSI. LAG SCREWS SHALL HAVE A MINIMUM EMBEDDMENT DEPTH OF 8 X LAG SCREW DIAMETER
C. WOOD SCREWS SHALL HAVE A MINIMUM BENDING YIELD STRENGTH OF 80,000 PSI

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FAX: 513 782-

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TABLES AND GENERAL NOTES AND SPECIFICATIONS FOR CHAMPIONS SINGLE SLOPE 4" ALUMINUM PATIO ENCLOSURE SYSTEM

DATE: FEB 2007
SCALE: NONE
DRAWN BY: MJG
DRC NO. S-4
4 OF 4

Michelone, Jeremy

From: Randall, Kelly
Sent: Monday, October 27, 2008 9:27 AM
To: Michelone, Jeremy
Subject: FW: buffer regulations and mitigation plan
Attachments: Mitigation plan approved.pdf

From: Lisa McCarter [mailto:LMcCarter@huntersville.org]
Sent: Wednesday, October 22, 2008 11:19 AM
To: Randall, Kelly
Subject: buffer regulations and mitigation plan

3.3.2 A. g) Buffer Protection

No permanent structures, impervious covers, septic tank systems or any other disturbance of existing vegetation shall be allowed within the buffer except as follows:

1) The surveyed buffer boundary must be clearly marked on-site with orange "tree-protection" or "high-hazard" fence prior to any land disturbing activities. Tree protection is required by Section 7.4(3) of this Ordinance.

2) The surveyed buffer boundary must be permanently marked with an iron pin at the intersection of the watershed buffer and each property line following the completion of land disturbing activities and prior to occupancy. Properties greater than 200' in width shall be marked at a maximum of 100' intervals.

3) No trees larger than 2-inch caliper, measured at 6 inches above the existing grade, are to be removed except for dead or diseased trees. Undergrowth and trees less than 2-inch caliper, measured at 6 inches above the existing grade, may be removed to be replaced by an effective stabilizing and filtering ground cover based upon the most recent edition of the "Watershed Buffer Guidelines for Mecklenburg County, NC" and as approved by the Mecklenburg County Water Quality Program.

4) Stream bank or shoreline stabilization is allowed as approved on a plan submitted to the Mecklenburg County Engineering Department and the Mecklenburg County Water Quality Program.

5) Water dependent structures and public projects such as road crossings and greenway paths are allowed where no practical alternatives exist. These activities should minimize built-upon area, direct runoff away from surface waters, and maximize the utilization of nonstructural BMP's and pervious materials.

6) During new development or the expansion of existing development, the Town, upon the advice of the Mecklenburg County Water Quality Program, can require enhancement of the existing vegetation in the buffer if necessary so that the buffer can effectively perform its filtering and absorption functions. Buffer enhancement requirements shall be based on the most recent edition of the "Watershed Buffer Guidelines for Mecklenburg County, NC".

7) Mitigation of disturbed buffers required. Should existing vegetation within the buffer be disturbed (except as allowed by this Ordinance) or should vegetation added to a buffer pursuant to paragraph 6) be disturbed, the property owner shall be required to enhance the buffer in accordance with the most recent edition of the "Watershed Buffer Guidelines for Mecklenburg County, NC" so that the buffer can effectively perform

its filtering and absorption functions.

8) Non-impervious recreational development and non-impervious pedestrian trails are allowed in the required buffer in compliance with paragraph 3), above. Pathway guidelines are available in the most recent edition of the "Watershed Buffer Guidelines for Mecklenburg County, NC." If in a common area, such development and trails must be located a minimum of 30 feet from the normal pool elevation of Mountain Island Lake (648' contour), or a minimum of 30 feet from the top of the bank on each side of all perennial streams; except for waterfront access points approved by the Town, upon the advice of the Mecklenburg County Water Quality Program.

9) Non-conforming structures and increasing built-upon area may permitted if the following criteria are met:

a. The existing structure (to be expanded) was built prior to the enactment of the 1993_watershed ordinance.
b. The Built-upon area (BUA) of the existing structure must cover a minimum of 10% of the 100-foot buffer on the lot.
c. In Critical Area 1 (CA1), which has a 6% BUA cap, the maximum allowable increase in BUA in the buffers is 2%. In Critical Area 2 (CA2) and Critical Area 3 (CA3), which have a 12% BUA cap and Critical Area 4 (CA4), which has a 24% BUA cap, the maximum allowable increase in BUA is the buffer is 4%.
d. Existing BUA shall not be increased within the State minimum 50-foot buffer.
e. Best Management Practices (BMPs) (including rain gardens and plantings) must be installed to achieve the following removal efficiencies for all BUA on the lot (not just the BUA in the buffer):
    i. 85% removal of Total Suspended Solids (TSS)
    ii. 60% removal of Total Phosphorus (TP)
f. All BMPs shall be installed or planted in accordance with the Charlotte-Mecklenburg BMP Design Manual and in accordance with Huntersville's Water Quality Ordinance.
g. Maintenance Agreements and Maintenance Plans must be recorded for all BMPs installed and/or planted and the location of the BMP and corresponding notes must be recorded on the deed in compliance with Huntersville's Water Quality Ordinance.
h. Mitigation measures, including all BMPs, must be installed, inspected and approved and the provisions described in item g (above) satisfied prior to the release of any certificates of occupancy for the structural expansion.
i. All structural BMPs must be inspected and certified annually for compliance with design criteria by a licensed N.C. engineer in accordance with the Huntersville Water Quality Ordinance. Inspection reports must be submitted to Mecklenburg County for approval.
j. Any deficiencies detected to the BMP or any other mitigation measure must be corrected within 30 days of detection at the sole expense of the property owner. Failure to do so will be in violation of the Huntersville Water Quality Ordinance and could result in the assessment of penalties.