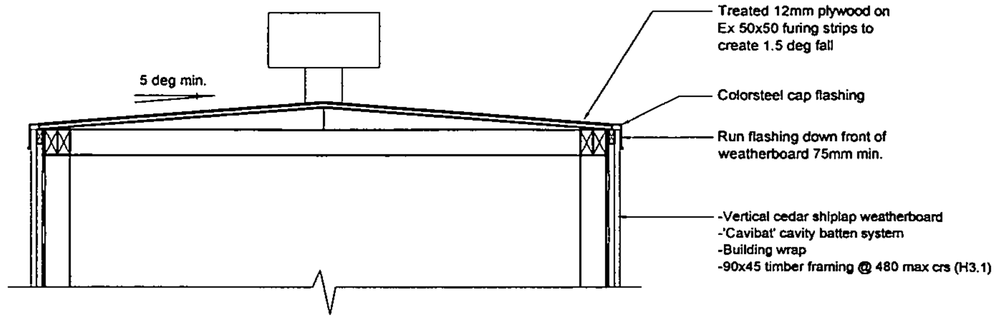
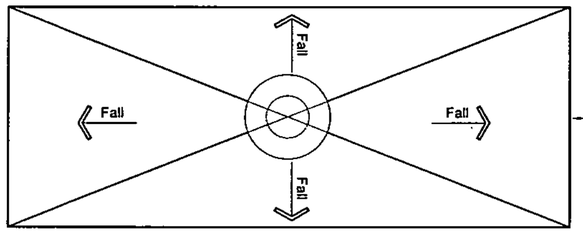


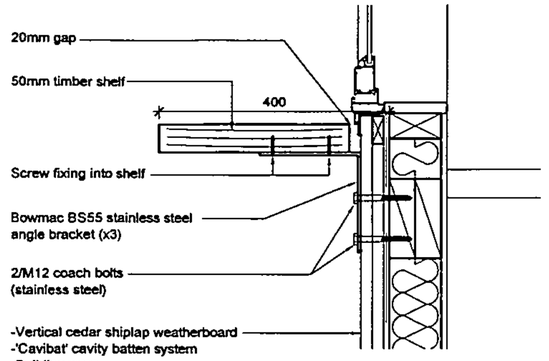
CHIMNEY CAP FLASHING DETAIL (section)

Scale 1:20



CHIMNEY CAP FLASHING DETAIL (plan)

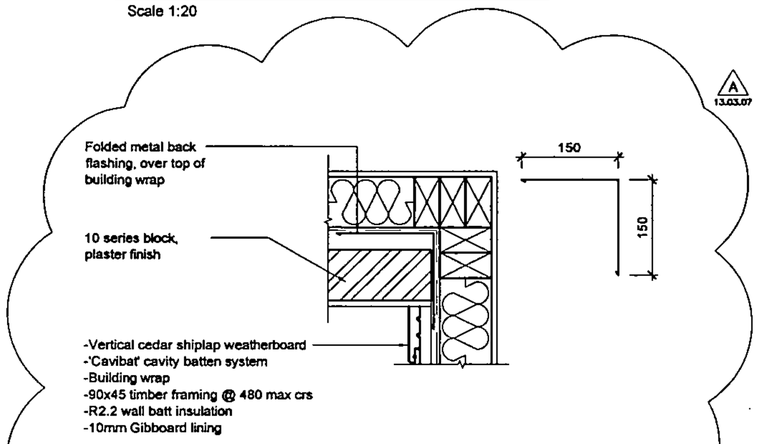
Scale 1:20



7 / A4-3 OUTSIDE SHELF DETAIL

Scale 1:10

A 13.03.07



TYPICAL WEATHERBOARD / PLASTER DETAIL

Scale 1:10

A	Details amended / deleted	13.03.07

REVISION :

JOB TITLE :

New Residence for
Richard & Sue Dyson
Weld Road,
Oakura

4site DESIGN
Ph. : (06) 769 5524 Fax : (06) 769 5525
Mob : 027 2100 564
Email : paul@4sitedesign.co.nz
PO Box 589 52 Gover Street
New Plymouth

SCALE : 1:10, 1:5

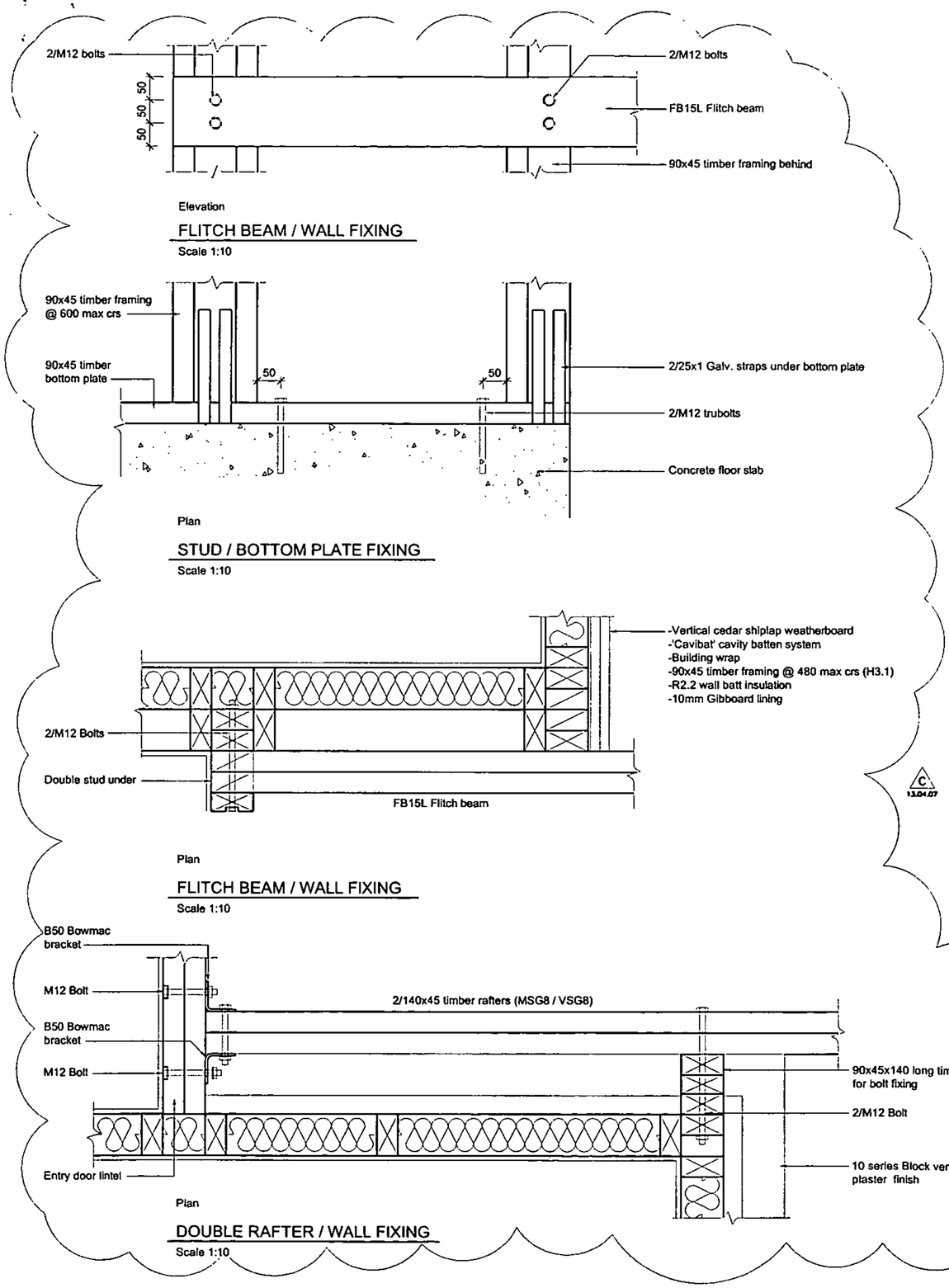
DRAWN : P. Russell

CHECKED : .

DATE : October 2006

JOB No. : 4128 REVISION : A

SHEET No. : A6-5



C	Details Added	13.04.07
B	Details deleted	13.03.07
A	Note amended, detail changed	12.12.06

REVISION :

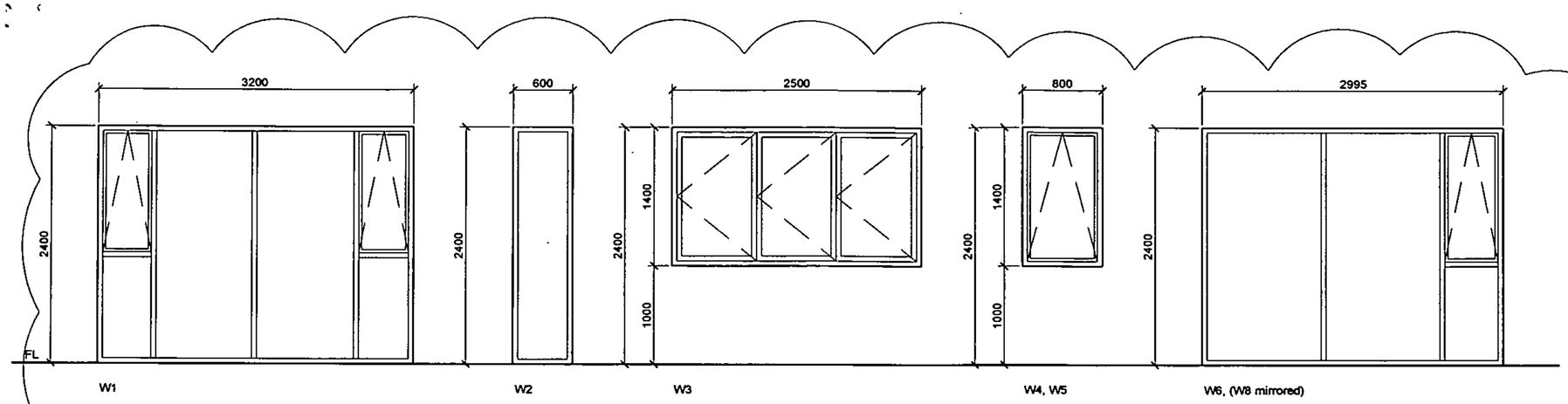
JOB TITLE :

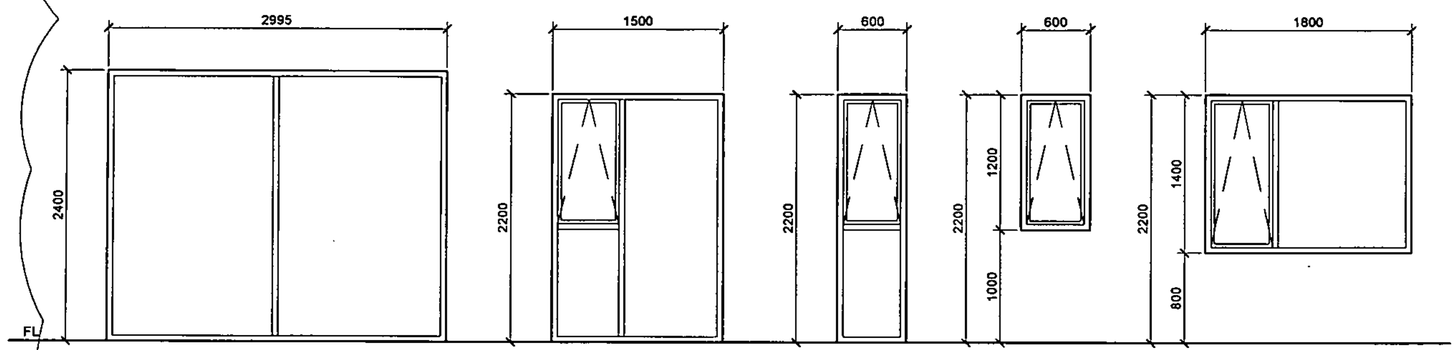
New Residence for
Richard & Sue Dyson
Weld Road,
Oakura

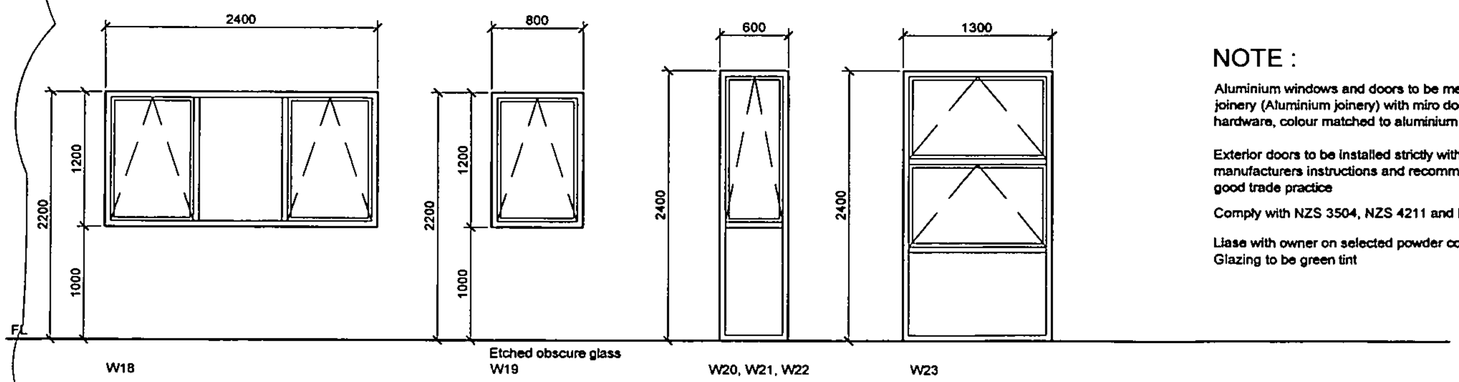
4site DESIGN
Ph. : (06) 769 5524 Fax : (06) 769 5525
Mob : 027 2100 584
Email : paul@4sitedesign co nz
PO Box 589 52 Gover Street
New Plymouth

SCALE : 1:10, 1:5
DRAWN : P. Russell
CHECKED : .
DATE : October 2006
JOB No. : 4128 REVISION : C
SHEET No. : A6-6

19 APR 2007







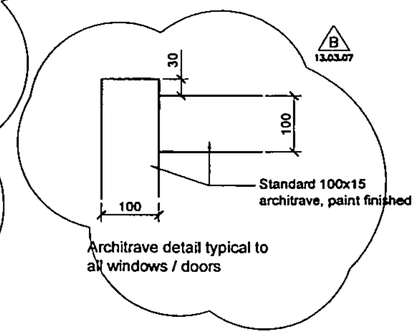
NOTE :

Aluminium windows and doors to be metro aluminium joinery (Aluminium joinery) with miro door/window hardware, colour matched to aluminium colour.

Exterior doors to be installed strictly with the manufacturers instructions and recommendations and good trade practice

Comply with NZS 3504, NZS 4211 and NZS 4223

Liase with owner on selected powder coating colour
Glazing to be green tint



Architrave detail typical to all windows / doors

B	Windows amended	13.03.07
A	Window changed, note added	12.12.06

REVISION :

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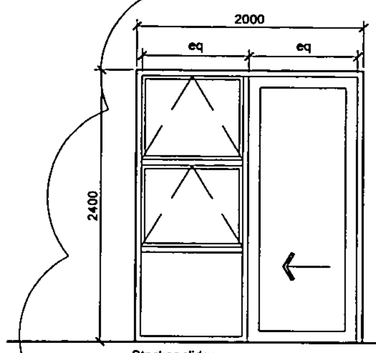
New Residence for
Richard & Sue Dyson
Weld Road,
Oakura

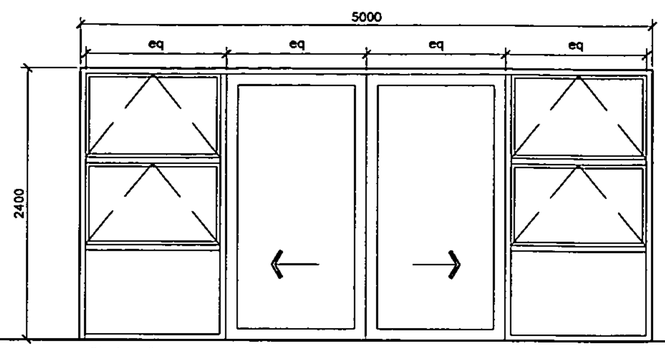
4site DESIGN
Ph. : (06) 769 5524 Fax : (06) 769 5525
Mob : 027 2100 564
Email : paul@4sitedesign.co.nz
PO Box 589 52 Gover Street
New Plymouth

SCALE : 1:100
DRAWN : P. Russell
CHECKED : -
DATE : October 2006
JOB No. : 4128 REVISION : B
SHEET No. : A7-1

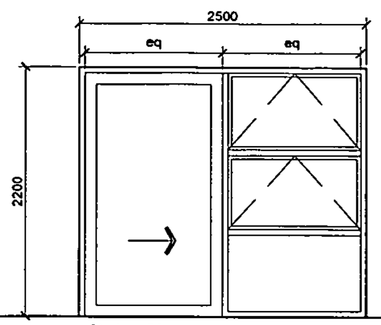
EXTERNAL DOORS



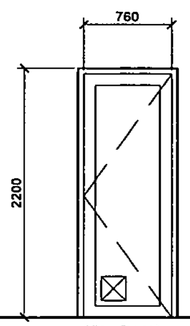
Stacker slider
D1



Stacker slider
D2

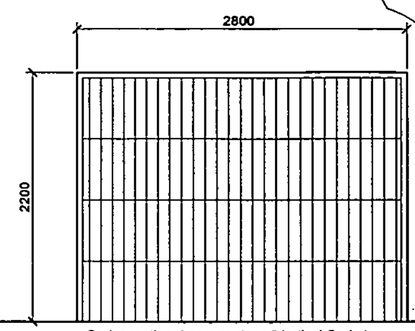


Stacker slider
D3

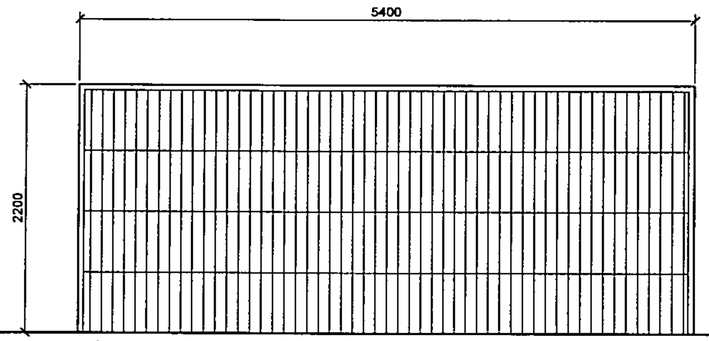


Allow for cat door in D4

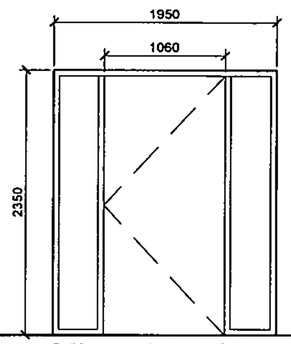
D4, D5, D6



Cedar sectional garage door (Vertical Cedar)
D7

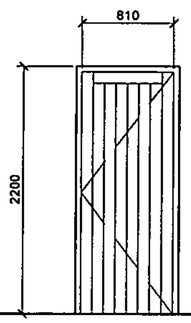


Cedar sectional garage door (Vertical cedar)
D8



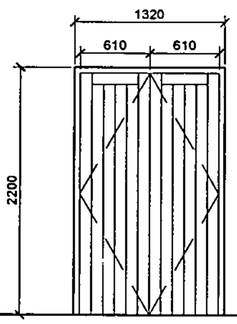
Solid core exterior door (Paint lacquer finish)
D9

INTERNAL DOORS

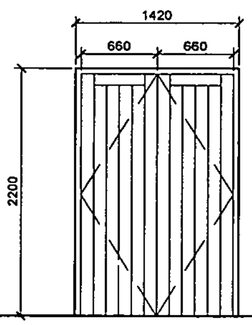


D10, D11, D12,
D13, D14, D16,
D17, D18, D19

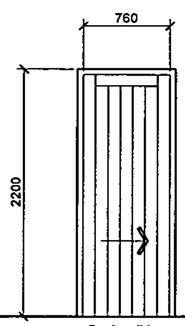
(D13 builder to put cat flap into door)



D15



D20



Cavity slider
D21

NOTE: All internal doors to have grooved full length of door

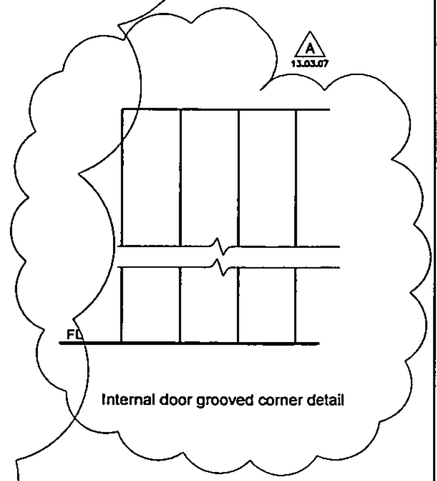
NOTE :

Aluminium windows and doors to be metro aluminium joinery (Aluminium joinery) with miro door/window hardware, colour matched to aluminium colour.

Exterior doors to be installed strictly with the manufacturers instructions and recommendations and good trade practice

Comply with NZS 3504, NZS 4211 and NZS 4223

Liase with owner on selected powder coating colour
Glazing to be green tint



Internal door grooved corner detail

A	Doors amended	13.03.07

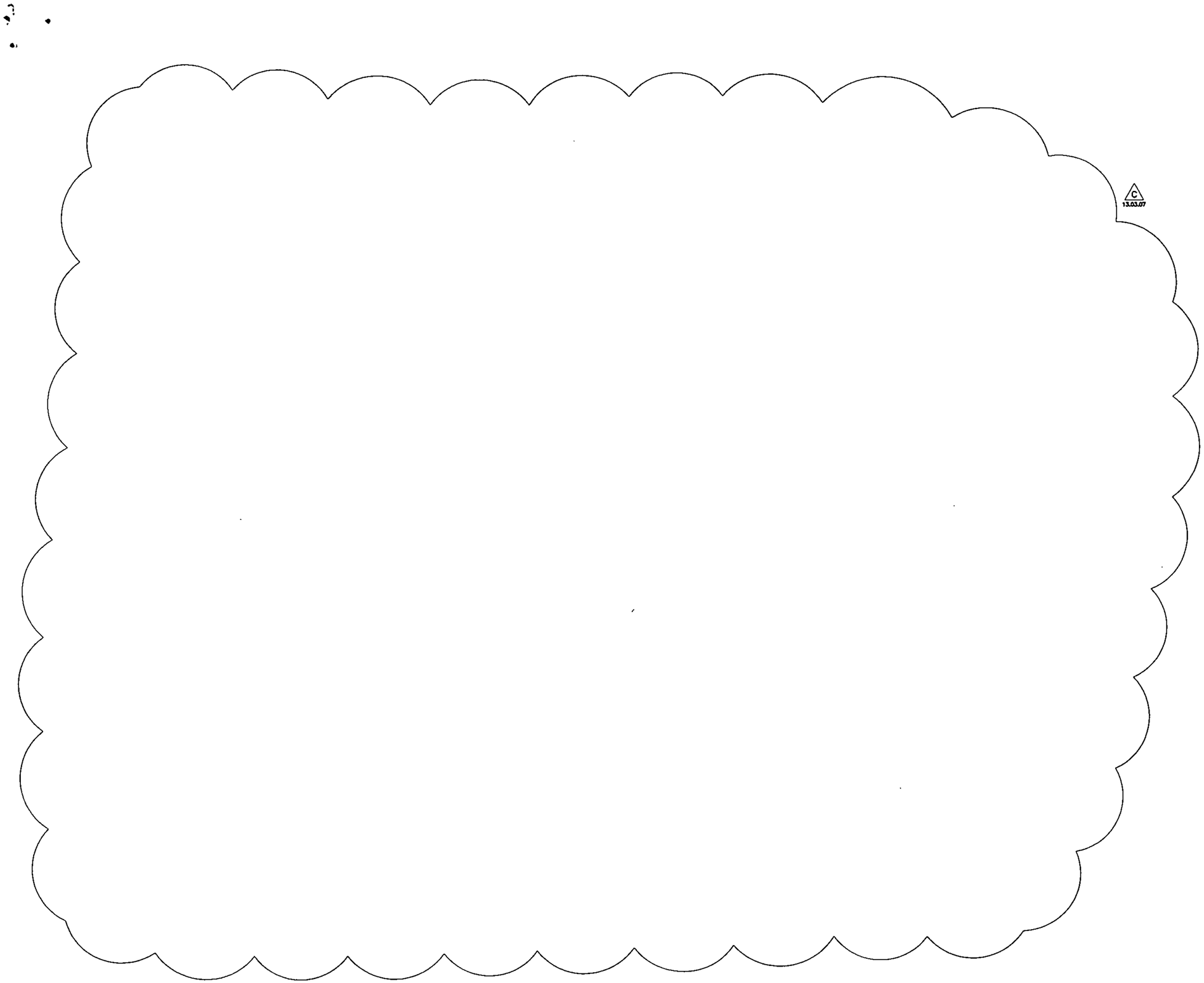
REVISION :

JOB TITLE :

New Residence for
Richard & Sue Dyson
Weld Road,
Oakura

4site DESIGN
Ph. : (06) 759 5524 Fax : (06) 759 5525
Mob : 027 2100 564
Email : paul@4sitedesign.co.nz
PO Box 589 52 Gover Street
New Plymouth

SCALE : 1:100
DRAWN : P. Russell
CHECKED : -
DATE : October 2006
JOB No. : 4128 REVISION : A
SHEET No. : A7-2



C	Details deleted	13.03.07
B	Steel frames amended	13.02.07
A	Ridge UB changed, dimension changed	12.12.06

REVISION :

JOB TITLE :

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Richard & Sue Dyson
Weld Road,
Oakura

4site DESIGN

Ph. : (06) 769 5524 Fax : (06) 769 5525
Mob : 027 2100 564
Email : paul@4sitedesign.co.nz
PO Box 589 52 Gover Street
New Plymouth

SCALE : 1:100

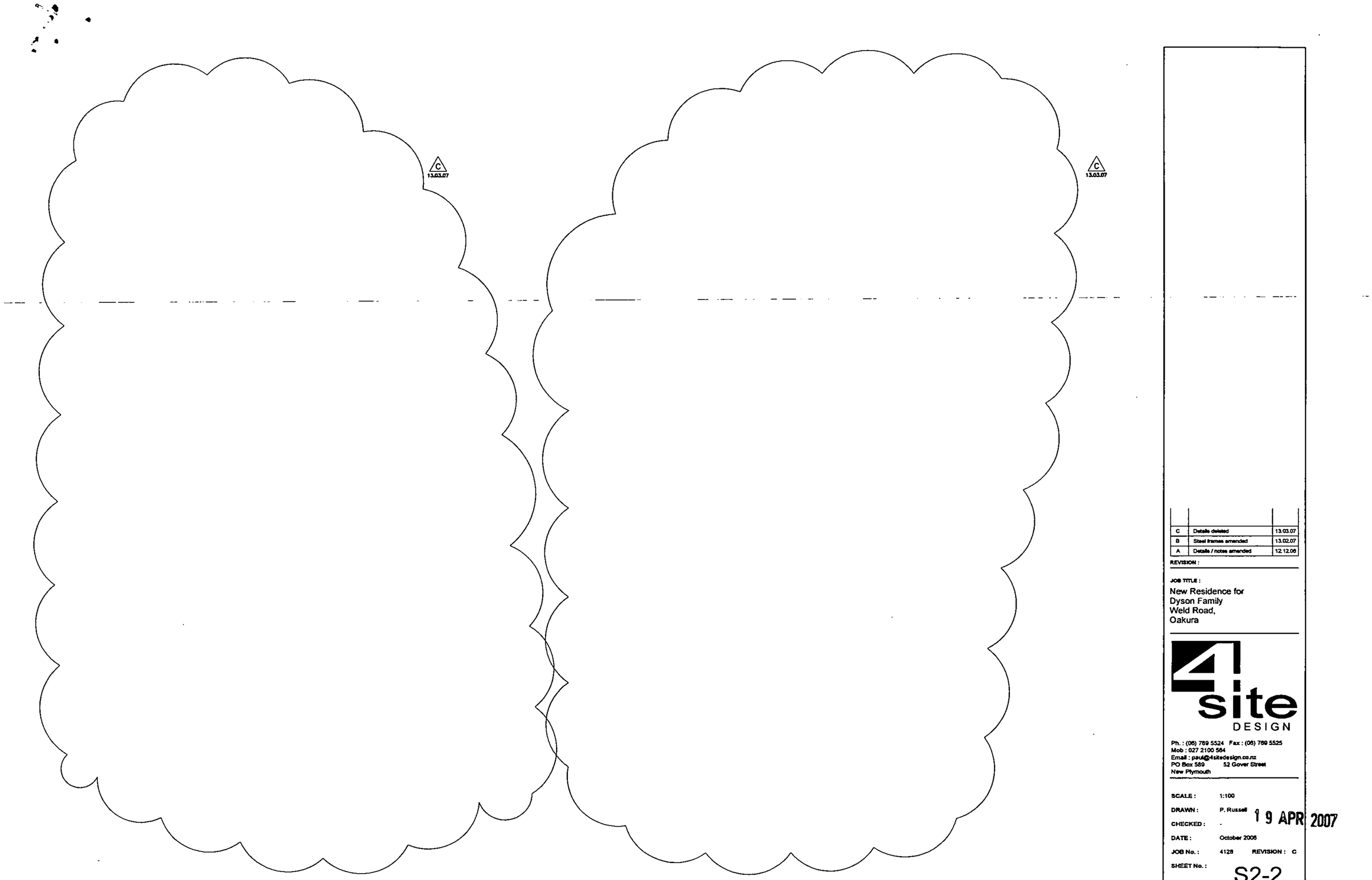
DRAWN : P. Russell

CHECKED : -

DATE : October 2006

JOB No. : 4128 REVISION : C

SHEET No. : S2-1



C	Details deleted	13.03.07
B	Steel frames amended	13.02.07
A	Details / notes amended	12.12.06

REVISION :

JOB TITLE :

New Residence for
Dyson Family
Weld Road,
Oakura

4site DESIGN

Ph. : (06) 769 5524 Fax : (06) 769 5525
Mob : 027 2100 564
Email : paul@4sitedesign.co.nz
PO Box 589 52 Gover Street
New Plymouth

SCALE : 1:100

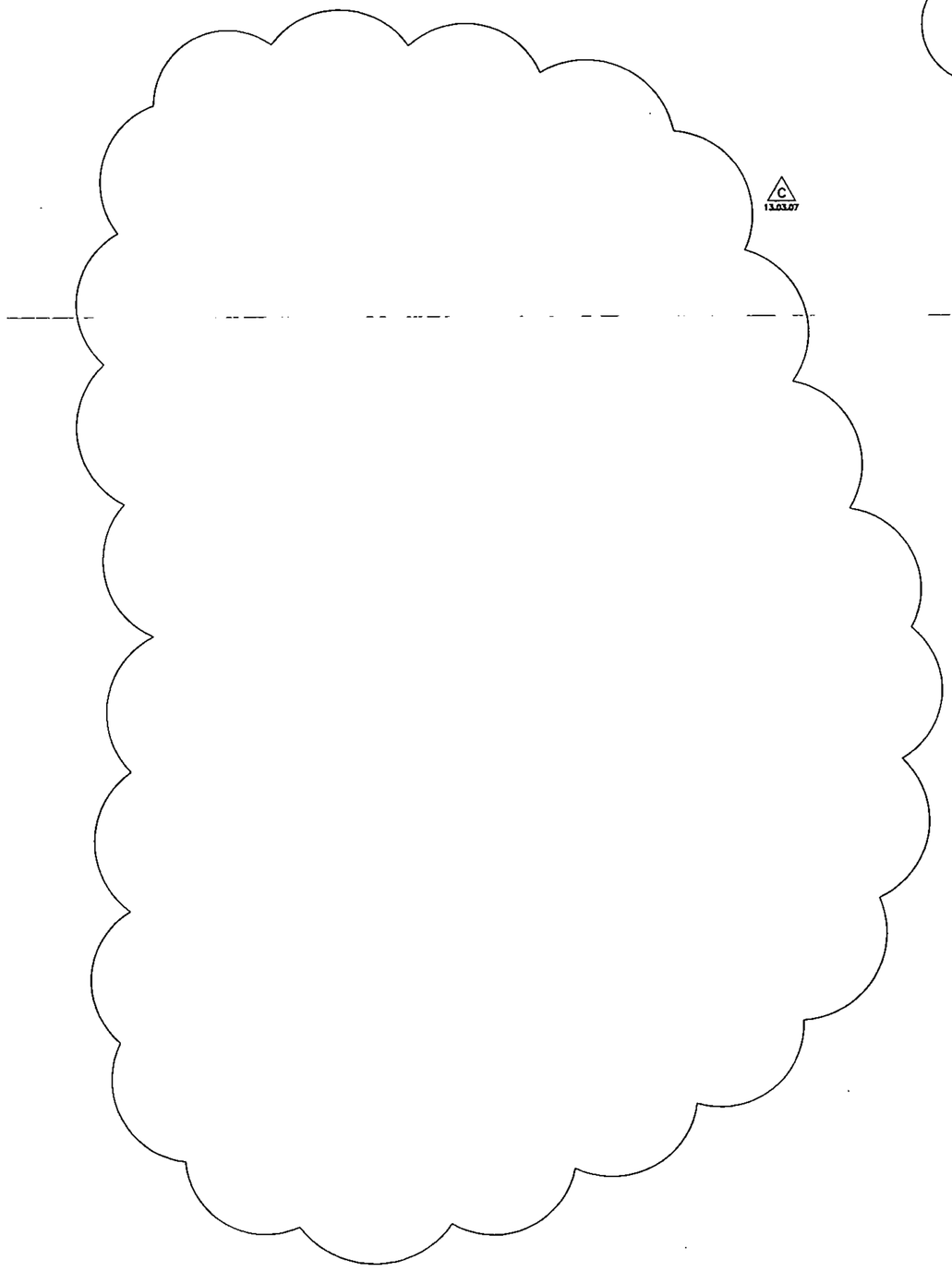
DRAWN : P. Russell

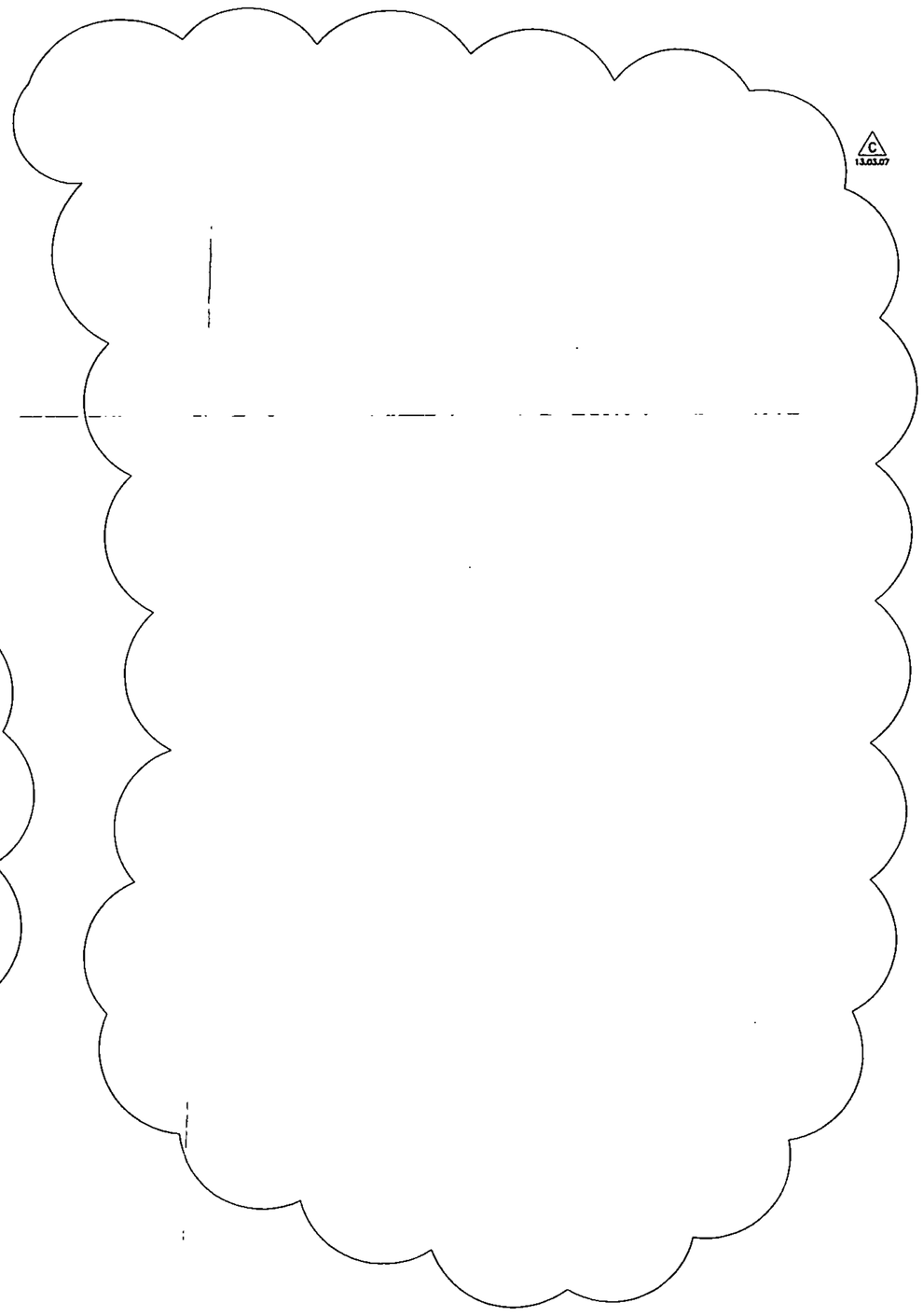
CHECKED : -

DATE : October 2006

JOB No. : 4128 REVISION : C

SHEET No. : S2-2





C	Details deleted	13.03.07
B	Steel frames amended	13.02.07
A	Details changed, notes added	12.12.06

REVISION :

JOB TITLE :

New Residence for
Dyson Family
Weld Road,
Oakura

4site DESIGN

Ph. : (06) 769 5524 Fax : (06) 769 5525
Mob : 027 2100 564
Email : paul@4sitedesign.co.nz
PO Box 589 52 Gover Street
New Plymouth

SCALE : 1:100

DRAWN : P. Russell

CHECKED : -

DATE : October 2006

JOB No. : 4128 REVISION : C

SHEET No. : S2-3

Red Jacket Ltd
CONSULTING ENGINEERS

Date 4/07	Job No. 317
By AF	Page No. 11.

Job Title: DYSON RESIDENCE, Oakura

Revised Entry Canopy

check edge beam worst cantilever

$U = 1.2G + 1.5Q$

$G = 0.4$
$Q_1 = 0.25$ } $U = 0.9$
$Q_2 = 1.0$ kN

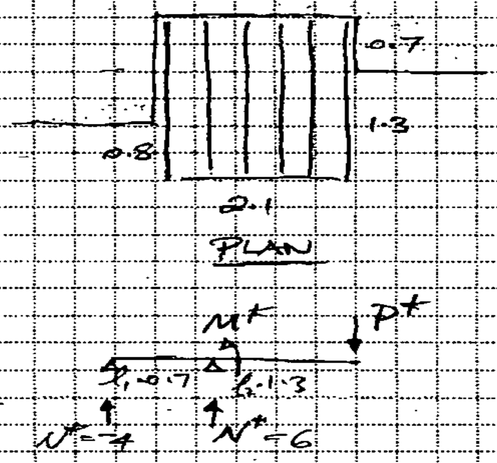
$P_L^* = \left(\frac{2.0}{2} \frac{2.1}{2}\right) U = 1.0$

or

$U = 0.5$; $P^* = 1.5$

$P_c^* = \left(\frac{2.0}{2} \frac{2.1}{2}\right) U + P^* = 2.0$ *

$M^* = 1.3 P_c^* = 2.6$



→ 2/140x45 MSG8 / MSG8, $\phi M_s = .8 \times .8 \times 14.0 \times 297$
$= 2.6 > M^*$ (min. size) OK

deflection will be critical

$EI = 0.165 \times 10^6$ $P_s = 1.3$

$\Delta s = \frac{P_s l_1 l_2^3}{120 EI} \left(4 + 3 \frac{l_2}{l_1}\right) = .010$ m

fixings

$N^* = -4$ kN — provide 2/M12 bolts through beam to double studs and anchor to concrete foundation with M12 foundation bolt with 2/25x1 galv. straps around bottom plate

18 APR 2007

PROVIDE FB15L FLITCH BEAM FOR STIFFNESS ON 1.3m CANT. & 2/140x45 MSG8/VSG8 ON 0.8m CANT.

Section A - Single Storey

4 site DESIGN

NPDC Approved
27 APR 2007

Ph (06) 769 5524 Fax (06) 769 5525 New Plymouth

WALL BRACING CALCULATIONS

(to NZS 3604:1999 Light Timber Frame Buildings and based on Gib Bracing Systems 2006)

Name: Dyson Residence — **Job No.** 4128

Address: Weld Road — **Town/Area:** NEW PLYMOUTH

Storey: SINGLE

System: HHL2

Wall Cladding: Block — *Heavy* — *80 - 220 kg/m²*

Foundation Material: Block — *Heavy* — *80 - 220 kg/m²*

Floor/Sub-floor Construction: *Concrete slab*

Are there any masonry or concrete chimneys reliant on the building structure for lateral support? *No*

Roofing: Steel — *Light* — *up to 20 kg/m²*

Pitch: *35 °*

Building Length =	*26.0 m*	Roof Length =	*27.2 m*
Building Width =	*10.0 m*	Roof Width =	*11.2 m*
Floor Plan Area =	*260.0 m²*	Roof Plan Area =	*304.6 m²*

Ridge Height from G.L. =	*5.7 m*	Floor to G.L. Height =	*0.225 m*
Ridge Height from G.F.L. (H) =	*6 m, actual = 5.48*	Stud Height =	*2.7 m*
Roof Height above eaves (h) =	*2 m, actual = 1.40*	Eave Width =	*0.6 m*

Region: R1 ◉ R2 ○

Terrain: Inland ○ Coastal ◉

Exposure: Sheltered ○ Exposed ◉

Topography: Gentle ◉ Moderate ○ Extreme ○

Lee Zone *No*

Total points: *2*

Wind Zone: *HIGH*

Wind Bracing Units/m² =	*63*	ACROSS
Wind Bracing Units/m² =	*73*	ALONG

From Table 5.6

WIND BRACING UNITS: ACROSS *1713.6* *BUs*

WIND BRACING UNITS: ALONG *817.6* *BUs*

Earthquake Zone: *A*

Earthquake Bracing Units/m² = *5.6*

From Table 5.10

Is there a room in the roof space and less than 50% of the ground floor area? *No* → *5.6*

Add extra BU's for chimney loadings: *Not applicable*

BUs

EARTHQUAKE BRACING UNITS: ALONG AND ACROSS *1456.0* *BUs* *Light Roof*

18 APR 2007

WALL BRACING CALCULATIONS continued

Name: Dyson Residence — Job No. 4128

BRACING ACROSS BUILDING — Storey: SINGLE

WALL LINE		WALL BRACING ELEMENTS PROVIDED							
Label	Min. BUs required	Label No.	Brace Type	Length(m) or [No.off]	WIND BUs/m	WIND No. of BUs	EARTHQUAKE BUs/m	EARTHQUAKE No. of BUs	Wall Angle
A	100	A1	GS1a-24	2.8	66.7	186.7	57.8	161.8	0 °
		A2	GS1a-18	2.0	57.8	115.6	48.9	97.8	
		A3	SP2c	1.6	80.0	128.0	93.3	149.3	
		A4	SP4	0.5	62.2	28.0	75.6	34.0	
	Achieved?	Yes			Sub-totals:	458.2		442.9	
B	70	B1	BL1-06	0.6	111.1	66.7	102.2	61.3	
		B2	BL1-06	0.7	111.1	77.8	102.2	71.6	
		B3	SP2c	1.0	80.0	80.0	93.3	93.3	
	Achieved?	Yes			Sub-totals:	224.4		226.2	
C	70	C1	BL1-06	0.6	111.1	66.7	102.2	61.3	
		C2	GS1a-24	3.6	66.7	240.0	57.8	208.0	
		C3	SP4	0.5	62.2	28.0	75.6	34.0	
		C4	SP2c	1.2	80.0	96.0	93.3	112.0	
	Achieved?	Yes			Sub-totals:	430.7		415.3	
D	70	D1	GS1a-24	3.6	66.7	240.0	57.8	208.0	
E		E1	GS1a-18	2.0	57.8	115.6	48.9	97.8	
		E2	GS2-18	1.8	71.1	128.0	62.2	112.0	
	Achieved?	Yes			Sub-totals:	483.6		417.8	
F	70	F1	GS1a-18	2.2	57.8	127.1	48.9	107.6	
G		G1	SP2c	1.5	80.0	120.0	93.3	140.0	
	Achieved?	Yes			Sub-totals:	247.1		247.6	
H	100	H1	SP2c	1.0	80.0	80.0	93.3	93.3	
		H2	GS1a-24	3.0	66.7	200.0	57.8	173.3	
I		I1	SP2c	0.6	80.0	48.0	93.3	56.0	
		I2	GS1a-24	3.0	66.7	200.0	57.8	173.3	
	Achieved?	Yes			Sub-totals:	528.0		496.0	

Note: If ratings exceed 150 BU/m then hold-downs and foundations require specific structural engineering design

Total BUs Across required:	Wind:	1713.6	Earthquake:	1456.0
Total BUs Provided:	Wind	2372.0 OKAY!	Earthquake:	2245.8 OKAY!

Note: Bracing ratings have been adjusted as stud height not 2.4m!...
No chimney loadings

BRACE TYPES:

GS1a-2410mm Standard Gib (2.4m or longer) on one face with diagonal steel brace
GS1a-1810mm Standard Gib (1.8 - 2.4m long) on one face with diagonal steel brace
SP2c 7mm Plywood (0.6m long minimum) on one face, with 6kN end straps - concrete floor
SP4 7mm Plywood (0.45m long minimum) on one face, studs at 450 crs, with 6kN end straps

BL1-06 Gib Bracetine (0.6m or longer) on one face with hold-down end straps
BL1-06 Gib Bracetine (0.6m or longer) on one face with hold-down end straps
SP2c 7mm Plywood (0.6m long minimum) on one face, with 6kN end straps - concrete floor

BL1-06 Gib Bracetine (0.6m or longer) on one face with hold-down end straps
GS1a-2410mm Standard Gib (2.4m or longer) on one face with diagonal steel brace
SP4 7mm Plywood (0.45m long minimum) on one face, studs at 450 crs, with 6kN end straps
SP2c 7mm Plywood (0.6m long minimum) on one face, with 6kN end straps - concrete floor

GS1a-2410mm Standard Gib (2.4m or longer) on one face with diagonal steel brace

GS1a-1810mm Standard Gib (1.8 - 2.4m long) on one face with diagonal steel brace
GS2-18 10mm Standard Gib (1.8 - 2.4m) on both faces

GS1a-1810mm Standard Gib (1.8 - 2.4m long) on one face with diagonal steel brace

SP2c 7mm Plywood (0.6m long minimum) on one face, with 6kN end straps - concrete floor

SP2c 7mm Plywood (0.6m long minimum) on one face, with 6kN end straps - concrete floor
GS1a-2410mm Standard Gib (2.4m or longer) on one face with diagonal steel brace

SP2c 7mm Plywood (0.6m long minimum) on one face, with 6kN end straps - concrete floor
GS1a-2410mm Standard Gib (2.4m or longer) on one face with diagonal steel brace

WALL BRACING CALCULATIONS continued

Name: Dyson Residence Job No. 4128

BRACING ALONG BUILDING Storey: SINGLE

WALL LINE		WALL BRACING ELEMENTS PROVIDED							
Label	Min. BUs required	Label No.	Brace Type	Length(m) or [No.off]	WIND BUs/m	WIND No. of BUs	EARTHQUAKE BUs/m	EARTHQUAKE No. of BUs	Wall Angle
L	260	L1	BL1-06	1.6	111.1	177.8	102.2	163.6	0 °
		L2	BL1-06	0.8	111.1	88.9	102.2	81.8	
		L3	BL1-06	0.7	111.1	77.8	102.2	71.6	
	Achieved?	Yes			Sub-totals:	344.4		316.9	
M	70	M1	GS2-24	2.7	80.0	216.0	71.1	192.0	
		M2	GS2-24	4.1	80.0	328.0	71.1	291.6	
		M3	BL1-06	0.6	111.1	66.7	102.2	61.3	
		M4	BL1-06	0.6	111.1	66.7	102.2	61.3	
		M5	SP2c	0.6	80.0	48.0	93.3	56.0	
	Achieved?	Yes			Sub-totals:	725.3		682.2	
N	70	M6	GS1a-24	3.0	66.7	200.0	57.8	173.3	
		N1	SP2c	1.5	80.0	120.0	93.3	140.0	
		N2	GS1a-24	3.0	66.7	200.0	57.8	173.3	
		N3	SP2c	1.0	80.0	80.0	93.3	93.3	
	Achieved?	Yes			Sub-totals:	600.0		580.0	
P	70	P1	SP2c	0.6	80.0	48.0	93.3	56.0	
		P2	SP2c	0.6	80.0	48.0	93.3	56.0	
	Achieved?	Yes			Sub-totals:	96.0		112.0	
Q	70	Q1	SP2c	0.6	80.0	48.0	93.3	56.0	
		Q2	SP2c	0.6	80.0	48.0	93.3	56.0	
	Achieved?	Yes			Sub-totals:	96.0		112.0	
R	260	R1							
	Achieved?	FALSE			Sub-totals:	0.0		0.0	

Note: If ratings exceed 150 BU/m then hold-downs and foundations require specific structural engineering design

Total BUs Along required:	Wind:	817.6	Earthquake:	1456.0
Total BUs Provided:	Wind:	1861.8 OKAY!	Earthquake	1783.1 OKAY!

Note: Bracing ratings have been adjusted as stud height not 2.4m.
No chimney loadings

BRACE TYPES:

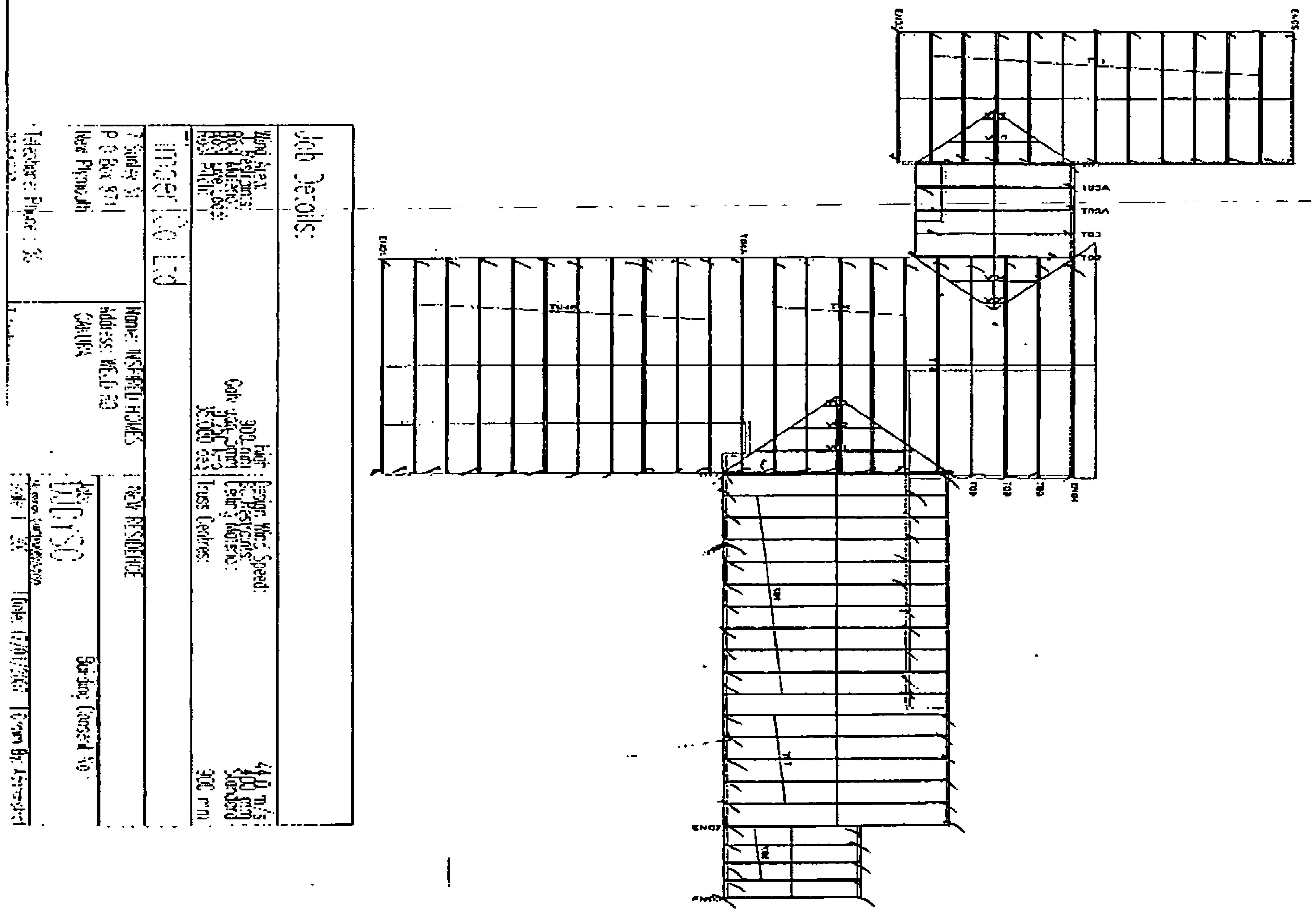
BL1-06 Gib Bracetine (0.6m or longer) on one face with hold-down end straps
BL1-06 Gib Bracetine (0.6m or longer) on one face with hold-down end straps
BL1-06 Gib Bracetine (0.6m or longer) on one face with hold-down end straps

GS2-24 10mm Standard Gib (2.4m or longer) on both faces
GS2-24 10mm Standard Gib (2.4m or longer) on both faces
BL1-06 Gib Bracetine (0.6m or longer) on one face with hold-down end straps
BL1-06 Gib Bracetine (0.6m or longer) on one face with hold-down end straps
SP2c 7mm Plywood (0.6m long minimum) on one face, with 6kN end straps - concrete floor

GS1a-24 10mm Standard Gib (2.4m or longer) on one face with diagonal steel brace
SP2c 7mm Plywood (0.6m long minimum) on one face, with 6kN end straps - concrete floor
GS1a-24 10mm Standard Gib (2.4m or longer) on one face with diagonal steel brace
SP2c 7mm Plywood (0.6m long minimum) on one face, with 6kN end straps - concrete floor

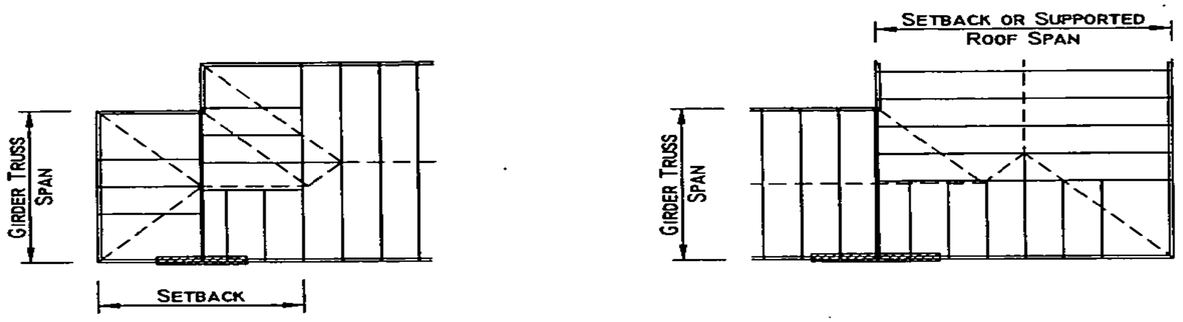
SP2c 7mm Plywood (0.6m long minimum) on one face, with 6kN end straps - concrete floor
SP2c 7mm Plywood (0.6m long minimum) on one face, with 6kN end straps - concrete floor

SP2c 7mm Plywood (0.6m long minimum) on one face, with 6kN end straps - concrete floor
SP2c 7mm Plywood (0.6m long minimum) on one face, with 6kN end straps - concrete floor



FLITCH BEAM

Selection Charts



D2

TABLE 7A:
LINTEL SUPPORTING GIRDER/SETBACK TRUSSES WITH LIGHT ROOF

LINTEL SIZE	SETBACK (m)	MAXIMUM LINTEL SPAN (m) GIRDER TRUSS SPAN (m) 5.0	6.0	7.0	8.0	9.0	10.0	11.0	12.0	13.0	14.0	15.0
FB15L	1.2	2.77	2.66	2.57	2.49	2.42	2.36	2.31	2.24	2.14	2.04	1.96
	2.4	2.70	2.60	2.49	2.29	2.12	1.98	1.85	1.74	1.64	1.55	1.47
	3.6	2.67	2.37	2.12	1.92	1.75	1.61	1.49	1.39	1.30	1.22	1.15
	4.8	2.40	2.07	1.83	1.63	1.47	1.34	1.23	1.14	1.06	0.99	0.93
	6.0	2.13	1.82	1.59	1.41	1.26	1.14	1.04	0.96	0.89	0.82	0.77
	7.5	1.87	1.58	1.36	1.19	1.06	0.95	0.87	0.80	0.73	0.68	0.63
	10.0	1.54	1.28	1.08	0.94	0.83	0.75	0.67	0.62	0.57	0.52	0.49
FB20H	1.2	4.23	4.06	3.93	3.80	3.70	3.60	3.52	3.44	3.37	3.30	3.24
	2.4	4.12	3.96	3.83	3.72	3.62	3.52	3.44	3.28	3.12	2.97	2.84
	3.6	4.07	3.92	3.79	3.67	3.40	3.17	2.97	2.80	2.64	2.50	2.37
	4.8	4.04	3.89	3.59	3.27	3.00	2.78	2.58	2.41	2.26	2.13	2.01
	6.0	4.02	3.63	3.24	2.93	2.67	2.45	2.26	2.10	1.96	1.84	1.73
	7.5	3.76	3.26	2.88	2.58	2.33	2.12	1.95	1.80	1.67	1.56	1.46
	10.0	3.25	2.77	2.41	2.12	1.90	1.72	1.56	1.44	1.33	1.24	1.15
FB25L	1.2	4.50	4.32	4.18	4.05	3.93	3.83	3.74	3.66	3.58	3.48	3.36
	2.4	4.39	4.22	4.08	3.95	3.76	3.54	3.35	3.17	3.02	2.88	2.75
	3.6	4.33	4.17	3.86	3.55	3.29	3.07	2.87	2.70	2.55	2.41	2.29
	4.8	4.30	3.84	3.47	3.16	2.90	2.68	2.49	2.32	2.18	2.05	1.93
	6.0	3.98	3.51	3.13	2.82	2.57	2.36	2.18	2.02	1.88	1.77	1.66
	7.5	3.63	3.15	2.78	2.48	2.24	2.04	1.87	1.73	1.60	1.50	1.40
	10.0	3.13	2.66	2.31	2.04	1.82	1.64	1.50	1.38	1.27	1.18	1.10
FB25H	1.2	5.38	5.17	5.00	4.84	4.71	4.58	4.48	4.38	4.29	4.20	4.13
	2.4	5.25	5.05	4.88	4.73	4.60	4.48	4.38	4.18	3.99	3.81	3.66
	3.6	5.18	4.99	4.83	4.68	4.38	4.11	3.86	3.65	3.46	3.29	3.13
	4.8	5.13	4.95	4.64	4.26	3.94	3.66	3.42	3.21	3.02	2.86	2.71
	6.0	5.09	4.72	4.26	3.87	3.55	3.28	3.05	2.84	2.66	2.51	2.37
	7.5	4.89	4.31	3.84	3.46	3.15	2.89	2.66	2.47	2.31	2.16	2.03
	10.0	4.32	3.73	3.27	2.91	2.62	2.38	2.18	2.01	1.86	1.74	1.63
FB30H	1.2	6.04	5.84	5.69	5.55	5.43	5.30	5.18	5.06	4.96	4.86	4.77
	2.4	5.86	5.68	5.53	5.40	5.28	5.18	5.00	4.77	4.56	4.37	4.20
	3.6	5.77	5.60	5.45	5.32	5.03	4.72	4.46	4.22	4.00	3.81	3.64
	4.8	5.72	5.54	5.34	4.92	4.56	4.25	3.98	3.75	3.54	3.35	3.18
	6.0	5.67	5.44	4.93	4.51	4.15	3.84	3.58	3.35	3.15	2.97	2.81
	7.5	5.63	5.00	4.49	4.06	3.71	3.41	3.16	2.94	2.75	2.58	2.43
	10.0	5.03	4.38	3.87	3.46	3.12	2.85	2.61	2.41	2.24	2.09	1.96

GANGLAM LINTELS

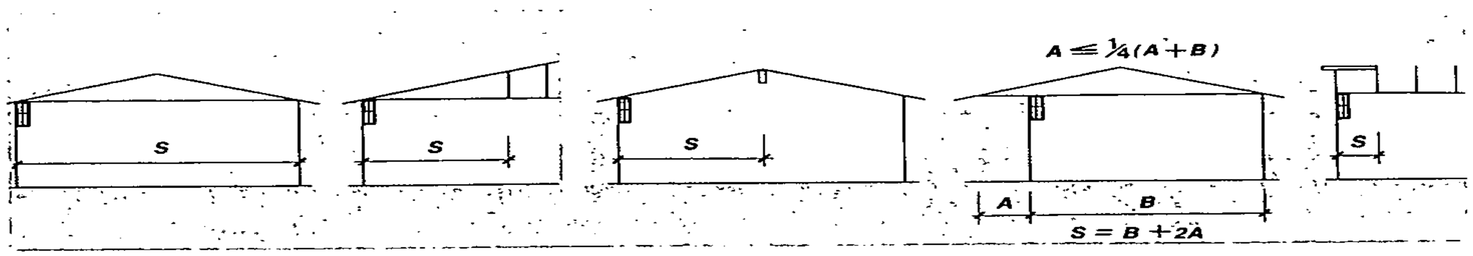


TABLE 1:
LINTELS SUPPORTING ROOF AND CEILING ONLY garage door.

	LINTEL SIZE	MAXIMUM LINTEL SPAN (m) SUPPORTED ROOF SPAN 'S' (m) 5.0	6.0	7.0	8.0	9.0	10.0	11.0	12.0	13.0	14.0	15.0
LIGHT ROOF	100 x 100	1.56	1.49	1.43	1.36	1.30	1.24	1.19	1.14	1.10	1.07	1.04
	125 x 100	2.08	1.98	1.90	1.82	1.73	1.65	1.59	1.53	1.47	1.42	1.38
	150 x 100	2.43	2.31	2.22	2.12	2.02	1.93	1.85	1.78	1.72	1.66	1.61
	200 x 100	3.29	3.14	3.01	2.88	2.74	2.62	2.51	2.42	2.33	2.25	2.19
	250 x 100	4.16	3.96	3.80	3.64	3.46	3.31	3.17	3.05	2.94	2.85	2.76
	300 x 100	4.62	4.40	4.22	4.07	3.94	3.82	3.71	3.62	3.54	3.42	3.32
	350 x 100	5.44	5.19	4.98	4.80	4.64	4.50	4.38	4.23	4.08	3.94	3.82
	400 x 100	6.27	5.98	5.73	5.52	5.34	5.15	4.94	4.76	4.59	4.44	4.30
	450 x 100	7.09	6.76	6.49	6.22	5.92	5.66	5.43	5.22	5.04	4.87	4.72
	500 x 100	7.92	7.55	7.16	6.77	6.44	6.15	5.90	5.68	5.48	5.30	5.14
	550 x 100	8.74	8.13	7.64	7.23	6.87	6.57	6.30	6.06	5.85	5.66	5.48
	600 x 100	9.29	8.65	8.12	7.68	7.30	6.98	6.70	6.45	6.22	6.02	5.83
HEAVY ROOF	100 x 100	1.26	1.20	1.15	1.11	1.07	1.04	1.00	0.96	0.93	0.90	0.87
	125 x 100	1.68	1.60	1.54	1.48	1.43	1.39	1.33	1.28	1.24	1.19	1.16
	150 x 100	1.96	1.87	1.79	1.73	1.67	1.62	1.55	1.49	1.44	1.39	1.35
	200 x 100	2.66	2.54	2.43	2.35	2.27	2.20	2.11	2.03	1.96	1.89	1.83
	250 x 100	3.36	3.21	3.08	2.96	2.87	2.77	2.66	2.56	2.47	2.39	2.32
	300 x 100	3.74	3.56	3.42	3.29	3.18	3.09	3.00	2.93	2.86	2.80	2.74
	350 x 100	4.40	4.20	4.03	3.88	3.75	3.64	3.54	3.45	6.37	3.30	3.23
	400 x 100	5.07	4.84	4.64	4.47	4.32	4.19	4.08	3.97	3.88	3.80	3.72
	450 x 100	5.74	5.47	5.25	5.06	4.89	4.74	4.6	4.50	4.39	4.30	4.21
	500 x 100	6.41	6.11	5.86	5.64	5.46	5.30	5.15	5.02	4.90	4.79	4.66
	550 x 100	7.07	6.74	6.47	6.23	6.03	5.85	5.69	5.54	5.36	5.19	5.03
	600 x 100	7.62	7.35	7.08	6.82	6.60	6.40	6.20	6.07	5.76	5.57	5.40

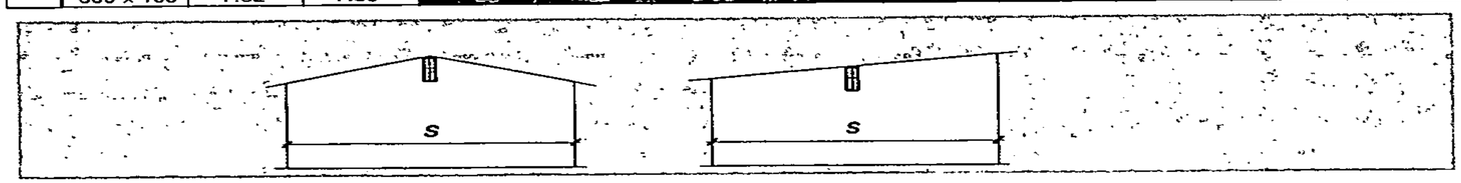


TABLE 2:
GANGLAM RIDGE BEAM SUPPORTING ROOF AND SARKING
(RAFTERS @ 1200MM CRS MAX)

	LINTEL SIZE	MAXIMUM LINTEL SPAN (m) SUPPORTED ROOF SPAN 'S' (m) 5.0	6.0	7.0	8.0	9.0	10.0	11.0	12.0	13.0	14.0	15.0
LIGHT ROOF	300 x 100	5.04	4.74	4.51	4.31	4.14	4.00	3.88	3.77	3.67	3.58	3.50
	350 x 100	5.94	5.59	5.31	5.08	4.88	4.72	4.57	4.44	4.32	4.22	4.12
	400 x 100	6.84	6.44	6.12	5.85	5.62	5.43	5.26	5.11	4.98	4.85	4.74
	450 x 100	7.62	7.28	6.92	6.62	6.36	6.14	5.95	5.78	5.63	5.49	5.37
	500 x 100	8.28	7.91	7.61	7.36	7.10	6.86	6.64	6.45	6.29	6.13	5.99
	550 x 100	8.92	8.52	8.20	7.93	7.70	7.50	7.32	7.13	6.94	6.77	6.62
	600 x 100	9.54	9.11	8.77	8.48	8.24	8.02	7.83	7.66	7.51	7.37	7.24
HEAVY ROOF	300 x 100	4.08	3.84	3.65	3.49	3.35	3.24	3.14	3.05	2.97	2.89	2.83
	350 x 100	4.81	4.52	4.30	4.11	3.95	3.81	3.70	3.59	3.50	3.42	3.35
	400 x 100	5.53	5.21	4.95	4.73	4.55	4.39	4.26	4.13	4.03	3.93	3.85
	450 x 100	6.26	5.89	5.60	5.35	5.14	4.97	4.82	4.68	4.56	4.44	4.34
	500 x 100	6.99	6.58	6.25	5.98	5.75	5.55	5.38	5.22	5.08	4.96	4.85
	550 x 100	7.61	7.26	6.90	6.60	6.35	6.13	5.94	5.77	5.62	5.48	5.36
	600 x 100	8.14	7.77	7.48	7.22	6.94	6.72	6.50	6.31	6.14	5.99	5.86

Regular duty plating Heavy duty plating Super heavy duty plating

BRANZ APPRAISED
SPECIFY WITH CONFIDENCE

BRANZ APPRAISAL CERTIFICATE No. 372 (2000)

THE WET-SEAL SYSTEM WATERPROOFING MEMBRANE

Wet-seal Management Pty Ltd
P.O. Box 481
Coffs Harbour
NSW 2452
Australia
Tel. 02-6658 2444
Fax. 02-6658 1696
Email: wetseal@Wet-seal.com.au
Internet Website
http://www.Wet-seal.com.au

Wet-seal New Zealand Ltd
P.O. Box 6120
Takapuna
Auckland
New Zealand
Tel/Fax 0-9-486 6630

Readers are advised to check that this Certificate has not been amended, withdrawn or superseded by a later one. Refer to the Validity Certificate index in BUILD magazine published by BRANZ. The Australian Institute of Building Surveyors Manual and the Certificate Listing on the BRANZ Internet Site contain BRANZ

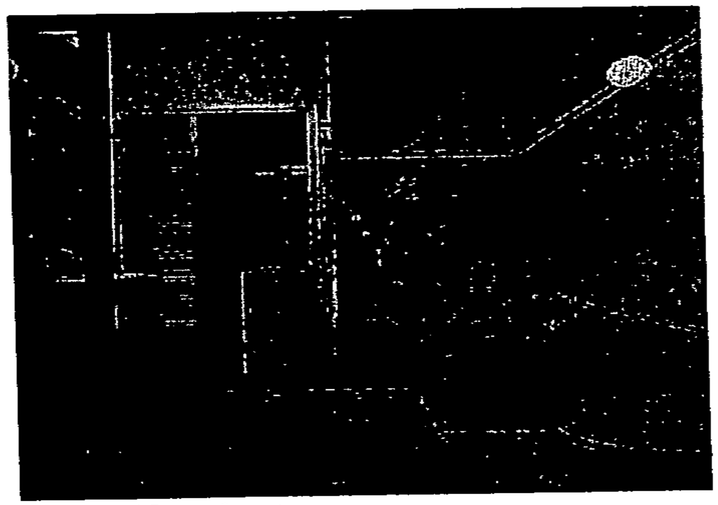
BRANZ Australia
P.O. Box 323
Mitcham
NSW 1450
Australia
Tel. (02) 8339 1881
Fax (02) 8339 1882

BRANZ
Private Bag 50908
Porirua City
New Zealand
Tel. 64-4-235 7600
Fax 64-4-235 6177
Web www.branz.co.nz

WFTAO

Product

- ***This Certificate relates to the Wet-seal System, a site applied flexible fibreglass reinforced modified polyester resin waterproofing membrane.***
- *The Wet-seal System has been appraised for use as an internal wet area water proofing membrane for floors, walls and shower bases which are to be tiled.*
- *The Wet-seal System must be applied by licensed and trained applicators, in accordance with the Wet-seal Management Pty Ltd document entitled "Installation Procedures Manual Issue B," dated 1 December 1993. Unless stated otherwise, reference to "Installation Procedures Manual" shall be taken as this document.*



The Wet-seal System for wet areas.

Building Regulations

1. New Zealand Building Code (NZBC)

In the opinion of BRANZ, the Wet-seal System waterproofing membrane if used, installed and maintained in accordance with the statements and conditions of this Certificate, will contribute to meeting the following provisions of the NZBC:

Clause B2 DURABILITY: Performance B2.3.1(b) 15 years. See Section 6.
Clause E3 INTERNAL MOISTURE: Performance E3.3.2, E3.3.3, E3.3.4, E3.3.5 and E3.3.6. See Section 8.
Clause F2 HAZARDOUS BUILDING MATERIALS: Performance F2.3.1 The Wet-seal System will not present a health hazard to people.

19 APR 2007

2. Building Code of Australia (BCA96)

In the opinion of BRANZ, the Wet-seal System waterproofing membrane if used, installed and maintained in accordance with the statements and conditions of this Certificate, will contribute to meeting the following BCA96 Performance Requirements:

BCA96 Volume 1 – Class 2 to Class 9 Buildings

Part F1 – Damp and Weatherproofing, Performance Requirement F1.7, FP1.6, FP1.7, SA3.1, SA FP1.6 and SA FP1.8. See Section 8.

BCA96 Volume 2 – Class 1 and Class 10 Buildings

Part 2.4 – Health and Amenity, Performance Requirement P2.4.1 and SA 3.1. See Section 8.

Product Information

3. Description

The Wet-seal System is a site applied flexible waterproofing membrane. It uses a fibreglass reinforced matting in conjunction with a flexible polyester resin hardened with a catalyst. When dry this is coated with a flow coat which is a jade coloured polymer also hardened with a catalyst. The total thickness of the membrane where a single layer of glass matt is used is 1.5 – 2 mm and greater at glass matt overlaps.

4. Handling and Storage

4.1 The Wet-seal System Safety Manual contains details on the safe handling and storage of the components.

4.2 The raw materials for the Wet-seal System must be stored in closed containers in a well ventilated area, protected from direct sunlight, heat and cold. They must not be stored near sources of heat or ignition, or near oxidising agents.

Design Information

5. General

5.1 A successful moisture excluding wet area system depends on the correct design and selection of all components including floor and wall substrates, plumbing fittings, tiles, adhesives, sealants and grouts. All components must be compatible with other parts of the system.

5.2 The Wet-seal System can be used on concrete slab, cement render, concrete and masonry walls, compressed fibre-cement flooring, fibre-cement flooring overlay, fibre-cement wall lining, water resistant plasterboard wall lining, plywood flooring and particleboard flooring. In each case the material must be determined as a suitable substrate for wet area waterproofing membranes by reference to the substrate manufacturer's technical literature.

5.3 Wall linings must be fixed in accordance with their manufacturer's instructions providing appropriate support for shower and wet area use and the support of tiles. Flashings must be installed at internal corners in showers, with a bond breaker at shower wall/floor junctions.

5.4 Flooring must also be fixed in accordance with their manufacturer's instructions for wet areas. The Wet-seal System must be laid on floor substrates that fall to waste. Deflections for tiled floors must not exceed 1/360th of the floor span. Specific engineering design may be required.

5.5 The Wet-seal System is flexible and able to accommodate normal building movement but must not be installed over movement joints.

5.6 The preferred installation method for tiled shower bases and floors is to apply the membrane to the floor substrate and all edges, followed by a mortar bed which slopes to drainage outlets. The Wet-seal System can also be applied to floors that have been laid to falls with the tiles' adhesive fixed direct to the Wet-seal System. Use only tile adhesives that have been verified as suitable for this method by test (refer to Wet-seal Management Pty Ltd or Wet-seal New Zealand Ltd).

5.7 The extent of areas that must be protected from moisture are defined in BCA96 Vol 1 F1.7, Vol 2 Part 3.8.1 and SA 3.2 (Minister's specification SAF1.7); the minimum areas to be protected by a waterproofing membrane are described in AS 3740. The BRANZ Good Tiling Practice also gives guidance. Some manufacturers require their wall linings in shower areas to be protected by a waterproofing membrane. Also manufacturers of flooring, e.g. particleboard, may require their product to be protected in wet areas by a waterproofing membrane.

5.8 Adequate falls must be provided to drains in the floor. In Australia a minimum fall of 1 in 60 must be provided in accordance with BCA 96 Vol 2 Pt. 3.8.1.4 and in New Zealand the minimum fall of 1 in 50 must be provided in accordance with NZBC Acceptable Solution E3/AS1 Paragraph 3.3.5. Inadequate falls will allow moisture to collect, increasing the risk of mould, reducing the slip resistance of the tiles and increasing the risk of deterioration of tile joints and sealants.

5.9 Hobs (upstands) must be constructed of brick, concrete or masonry or any other materials compatible with the waterproofing membrane - excluding timber. Where frameless screens are fitted, the Wet-seal System must be finished to a floor mounted aluminium angle water stop at a minimum distance of 1500 mm from the shower rose, or alternatively the full floor must be sealed. Any other areas where the mortar bed can become wet must also be finished at an angle water stop or at a wall with a membrane upturn.

5.10 Floor wastes compatible with the Wet-seal System must be used and in place at the time of application so the membrane can be sealed to the pipe and flange. The use of floor wastes with Leak Control Flanges is preferred.

5.11 Tiles used must be selected with the correct water absorption and slip resistance; in New Zealand the water absorption and slip resistance of tiles must comply with the NZBC requirements. All tiling must be carried out according to AS 3958.1, using an adhesive complying with AS 2358, and a flexible waterproof grout. All tiles, adhesives, grouts and sealants must be installed according to their manufacturer's instructions.

5.12 Tiles, tile adhesives, grouts and sealants are outside the scope of this Certificate.

6. Durability

Serviceable Life

The Wet-seal System has been successfully used in Australia for over 15 years. It has a compatible life expectancy with typical overlaying tiling systems.

7. Maintenance

7.1 Regular checks of tiled areas (at least annually) must be made to ensure they are sound and prevent moisture penetration. Any cracks or damage must be repaired immediately by replacing tiles, grout or sealants.

7.2 Mildew and mould must be removed from the tiles and tile joints by regular cleaning. Showers must be cleaned weekly to prevent the build up of soap deposits and body oils. Cleaning will reduce deterioration of the tiles and tile joints. Cleaning agents recommended by the tile manufacturer or in the BRANZ Good Tiling Practice must be used.

8. Internal Moisture

8.1 When used as directed by this Certificate the Wet-seal

System will contribute to meeting the requirements of BCA96 and NZBC by providing wall surfaces that are impervious and easily cleaned, by providing an impervious membrane, and by preventing water from penetrating behind linings or to concealed spaces.

8.2 While the membrane provides the waterproof sealing requirements of the BCA96 and NZBC, it is reliant on being supported by a suitable substrate and protected by an overlaying tiled surface.

Installation Information

9. General

Installation of the Wet-seal System is by licensed and trained installers in accordance with the Installation Procedures Manual instructions which are summarised below.

10. Preparation

10.1 Prior to the application of the Wet-seal System the surface to be coated must be smooth, sound, clean, dry and free from dirt, oil, grease, loose matter and other contaminants. Surface defects and shrinkage cracks must be repaired.

10.2 Hobs and angle water stops must be in place.

10.3 Two methods are used for waste outlets. In one method a leak control flange is fitted prior to the membrane installation and the membrane is sealed to the waste flange. In the other, the floor waste pipe is cut off flush with the floor with the inside roughened with sandpaper. The Wet-seal System waterproofing membrane is turned down into the pipe. The waste outlet is fitted into substrates other than concrete through a neat hole, such that there is no more than a 5 mm gap between the pipe work and the substrate and is securely fixed to the substrate with a flanged fitting.

10.4 Wall penetrations for plumbing fittings must be sealed. A backing rod, bead of sealant or tape is applied to all shower wall/floor junctions as a bond breaker.

11. Membrane Application

11.1 In shower areas, the fibreglass is dressed to fit the entire shower base, 25-35 mm down the waste pipe, and 150 mm up the walls. A double layer of fibreglass is used in all wall/floor joints. Hobs, if fitted are completely covered with fibreglass across the inner face, top and outer face and for a distance of approximately 50 mm across the floor. Fibreglass is placed approximately 1800 mm up the internal wall corners (to at least the height of the shower rose).

11.2 In walk-in showers (showers without hobs), the fibreglass membrane is carried across the floor areas and stopped at a floor angle or carried across the full floor area and 80 mm up the walls.

11.3 The mixed resin is applied to completely cover the fibreglass, it is also applied down the floor waste.

11.4 When the fibreglass is dry, the mixed flowcoat is applied. In all cases except when the tiles are to be laid directly onto the membrane, clean sharp sand is spread across the wet flowcoat on the floor area to provide a key for the mortar bed.

11.5 In New Zealand water resistant plasterboard wall linings must be sealed with a full coat of the Wet-seal System prior to the application of tiles.

12. Tiling

12.1 Tiling directly to the membrane may be carried out a minimum of 24 hours after the flowcoat is applied. A flexible two part adhesive recommended by Wet-seal Management Pty Ltd or Wet-seal New Zealand Ltd must be used.

12.2 Mortar beds and floor screeds may be applied 24 hours after the flowcoat.

13. Health and Safety

Precautions must be taken during the installation and the curing of the Wet-seal System to minimise health risks associated with the application of the materials. Work areas and interconnecting spaces must be well ventilated. Work areas and interconnecting spaces must not be occupied until the product is fully cured and all airborne chemicals removed. Protective clothing, including masks must be worn in accordance with the Installation Procedures Manual.

Basis of Appraisal

The following is a summary of technical investigations carried out.

14. Tests

14.1 The following tests commissioned by Wet-seal Australia Management Pty Ltd, have been reviewed by BRANZ and found to be satisfactory.

14.2 Water Absorption by Coated Fibreglass Sheeting, Physical test on Cured Fibreglass Resin, Tensile Strength of Fibre Glass Samples, Water Vapour Transmission, and Shower Tray Acceptance Testing.

15. Other Investigations

15.1 The processes in Australia including methods adopted for quality control have been examined by BRANZ. Details of the quality and composition of the materials used were also obtained and found satisfactory. Wet-seal Management Pty Ltd are an ISO 9002 certified supplier.

15.2 Site inspections were carried out by BRANZ to assess methods used for the installation of the Wet-seal System, and completed installations were examined.

15.3 The Applicators manual entitled "Installation Procedure Manual Issue B" dated 1 December 1993 has been reviewed by BRANZ and found to be satisfactory.

15.4 The Australian Building Systems Appraisal Council (ABSAC) Technical Opinion and the supporting files for the Wet-seal System were reviewed by BRANZ and found to be satisfactory. The review of the files was carried out with the assistance of ABSAC.

16. Sources of Information

- AS 2358:1990 Adhesive – for fixing ceramic tiles.
- AS 3740:1994 Waterproofing of wet areas within residential buildings.
- AS 3958.1:1991 Guide to the installation of ceramic tiles.
- BRANZ 'Good Tiling Practice', October 1996.
- BRANZ Bulletin No. 339 (December 1995) 'Internal Wall Tiling'.
- Building Code of Australia BCA96, Volumes 1 and 2, Australian Building Codes Board, 1996, including amendment No. 7
- Minister's Specification SA F1.7, October 1995.
- Technical Report No. 110 (Amended) by the Australian Building Systems Appraisal Council Ltd 'Wet-sealing System' – February 1990 (Revalidated February 1993).
- New Zealand Building Code Handbook and Approved Documents, Building Industry Authority, 1992.
- The Building Regulations 1992, including September 1997 Amendment.

The Wet-seal System.

BRANZ

In the opinion of BRANZ, the Wet-seal System Waterproofing Membrane is fit for purpose and can be used to meet the relevant provisions of the Building Code provided it is used, designed, installed and maintained as set out in this Certificate.

This Certificate is issued only to the Certificate Holder, Wet-seal Management Pty Ltd, and is valid until further notice, subject to the Conditions of Certification.

Conditions of Certification

1. This Certificate relates only to the product as described herein.
2. The Certificate Holder:
   a) continues to have the product reviewed by BRANZ;
   b) shall notify BRANZ of any changes in product specification or quality assurance measures prior to the product being marketed;
   c) abides by the BRANZ Appraisals Services Terms and Conditions.
3. The product and the manufacture are maintained at or above the standards, levels and quality assessed and found satisfactory by BRANZ.
4. This Certificate must be read, considered and used in full together with the technical literature.
5. BRANZ makes no representation as to:
   a) the nature of individual examples of batches of or individual installations of the product, including methods and workmanship;
   b) the presence or absence of any patent or similar rights subsisting in the product or any other product.
6. Any reference in this Certificate to any other publication shall be read as a reference to the version of the publication specified in this Certificate.
7. This Certificate does not address any Legislation, Regulations, Codes or Standards not specifically named herein.

For BRANZ

S J Dickinson

M E Reed

Date of issue: 8th September 2000

ISSN 0113-3675

Jøtul F 400 Castine

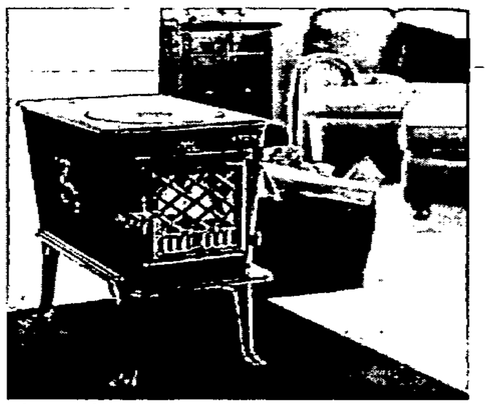
Print

Jøtul's medium-sized single door, non catalytic woodstove just got better, with enhanced fire viewing and air wash performance. Featuring meticulous craftsmanship and design, the Jøtul F 400 Castine will provide a warm, wonderful centerpiece for your hearth and home. Created by award winning designers, this stove has a unique nautical theme which highlights the tradition of seacoast living, a lifestyle shared by residents of Maine and Norway.

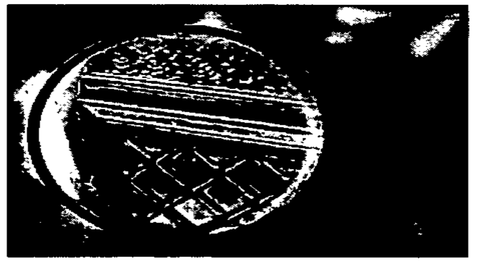
Jøtul F 400 Castine Blue-black Porcelain Enamel

- New and improved air-washed glass provides a clear view of flames
- Graceful single door with Gothic arch offers open door fire viewing
- Incorporates Jøtul non-catalytic clean burn technology with open door fire viewing
- Proven spring-loaded door latch system recognized as the industry's finest
- 5 year limited warranty

Showroom

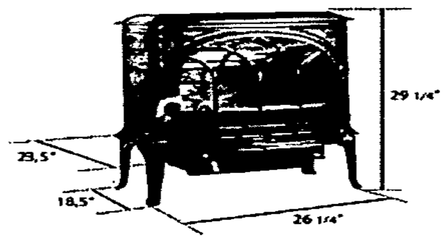


Jøtul F 602 CB



Technical data for Jøtul F 400 Castine

19 APR 2007



- Maximum heat output: 55,000 BTU/hr
- Heating capacity: Up to 1,600 sq.ft
- Max log length: Up to 20"
- Overall efficiency: 73%
- Burn time: Up to 8 hours
- Finish options: Blue/Black, Ivory, and Jøtul Iron™ Enamel, or Matte Black Paint
- Flue outlet: Top, and rear
- Flue size: 6"
- Weight: 375 lbs.
- Accessories: Fire screen, Rear heatshield, Short leg kit, Floor bracket kit

Jøtul has a policy of constant improvement and upgrading. Products therefore may differ in specification, design, material or dimensions at any time without prior notice.

Technical documentation for Jøtul F 400 Castine

- Manual (PDF - 700 kB)
- Spare part list (PDF - 37 kB)

DownloadAdobe Acrobat PDF Reader.
Some of our documents contain sections for several languages. In order to avoid unnecessary use of paper when printing you can select the specific pages you wish to print in Acrobat PDF Reader.
Jøtul F 400 Castine ☐ Print

B.A.C SERVICES
16 Lismore Street
New Plymouth
Phone 06 7584470
Mobile 025 421843

Job No:581

8 December 2005
Mr R Dyson
300a Mangorei Road
NEW PLYMOUTH

Dear Sir

FOUNDATION INVESTIGATION ON LOT 2 DP 310142, LOWER WELD ROAD, OAKURA.

1.0 Introduction

This report addresses the engineering issues of effluent, stormwater and building platform for the above property.

We have prepared a Site Plan No.581/01 which shows the general topography, soil test locations, possible building platform, and possible absorption field areas.

Our inspection of the site and surrounding terrain on 6th December 2005 indicates the land has been used for dairy farming purposes in recent years.

Lot 2 has an area of 3.6624Ha and is situated on the eastern side of Weld Road. The property is essentially flat to gentle rolling pasture in it's western sector, where the proposed building platform is to be located.

Our sub soil tests taken on the Lot shows subsoil conditions to be consistent. At all four test holes there was 250mm of brown topsoil over friable, undisturbed, firm natural orangey/brown volcanic ash.

The 4 holes were hand augured to 1.3 metres and probed to 1.5 metres. No hard pan surface or groundwater was encountered. Shear vane readings between 4Kgs and 7Kgs were recorded at depths of 0.4m and 0.8m at all test holes. This equates to an allowable bearing pressure of between 160 and 280KPa. A scala penetrometer test was taken at hole#1 and this gave consistent rates of 2 blows per 100mm down to a depth of 1.0m. These results indicate CBR values of above 3.5 percent.

The Lot has sufficient areas within its boundaries suitable for the construction of effluent absorption fields as outlined below. The site also north facing and exposed to all of the prevailing winds which will be beneficial for the evapo-transpiration of any effluent field.

1.0 Effluent Design

1.1 Evaluation

Our evaluation and preliminary design for wastewater from a proposed dwelling is in accordance with AS/NZS 1547:2000 "On-Site Domestic Wastewater Management".

Soil – volcanic ash DLR = 15mm/day
Water supply – Roof Stormwater (*)

Occupancy Option	**ONE**	**TWO**
Bedrooms	1-3	4-5
Number of Persons	5	7
Flow (litres/day) @ 140 pp (*)	700	980
Septic Tank Size (litres)	3000	3500
Absorption Bed Area (m^2)	47	65
Evaporation Trench Options		
A. Conventional Trench		
600W x 400D; W = 0.6m	L = 78m (4 x 20m)	L = 108m (6 x 18m)
B. Conventional Beds		
(i) 2000W x 600D; W = 2.0m	L = 24m (2 x 12m)	L = 33m (2 x 16m)
(ii) 4000W x 600D; W = 4.0m	L = 12m	L = 16m

1.2 General Notes:

(i) Multiple trenches or beds require a minimum 1.0m between adjacent sidewalls.

(ii) Bottom area of trench only used in absorption area assessment.

(iii) Base and sides of trenches and beds shall be intentionally roughened under dry conditions to expose optimum soil structure.

(iv) Garbage sink grinders are not included in the design.

(v) The septic tank shall be constructed with a proprietary biofilter on the outlet.

(vi) Where insufficient fall exists to permit gravity run pipework to the absorption field the effluent shall be pumped out to the field from a chamber located after the septic tank.

(vii) The tabulated trench proportions (sizes) may only be varied with prior approval.

(viii) Absorption fields shall be located 3m away from the house and soakholes and 1.5m from adjacent property boundaries.

(ix) Absorption fields shall be laid out in an area set aside for lawn or pasture and not gardens. Provide a distribution box downstream of the septic tank outlet to allow alternate trenches or beds to be 'rested' where applicable. Provide inspection/flushing points at both ends of pipe/arch runs in the absorption field.

(x) All absorption fields shall be located at least 25m away from any watercourse, wetland areas or cliff top and at least 50 m from any well or bore.

(xi) The above absorption areas should be increased by $(^{180}/_{140})$ or 30% if the on-site water supply is changed to a bore or municipal water supply in the future.

This report relies on proper use and maintenance of the final system chosen for advising filter types and replacement times, frequency for cleaning the septic tanks, pump type and expected servicing requirements and replacement times and distribution requirements for the absorption field.

The site has reserve areas for absorption beds or trenches should the system capacity be expanded in the future or the beds lose their function.

This effluent evaluation is based on the prevailing soil conditions found at the test locations shown on the Site Plan. The actual ground conditions encountered in the disposal field during construction shall be verified as similar to the conditions given in this report. Any variations in conditions that could affect the performance of the effluent system should be re-evaluated by a suitably qualified person.

The final layout and location of septic tank and absorption field should be made by the plumber at time of installation.

2.0 Stormwater

Roof stormwater should be piped to water tanks for domestic water supply with any overflow piped to soakholes located well away from the absorption field.

3.0 Building Platform

The Lot has an excellent flood free building platform as indicated on our Site Plan 581/01 that will be suitable for the construction of conventional residential building having foundations into the original, natural volcanic ash subsoil's.

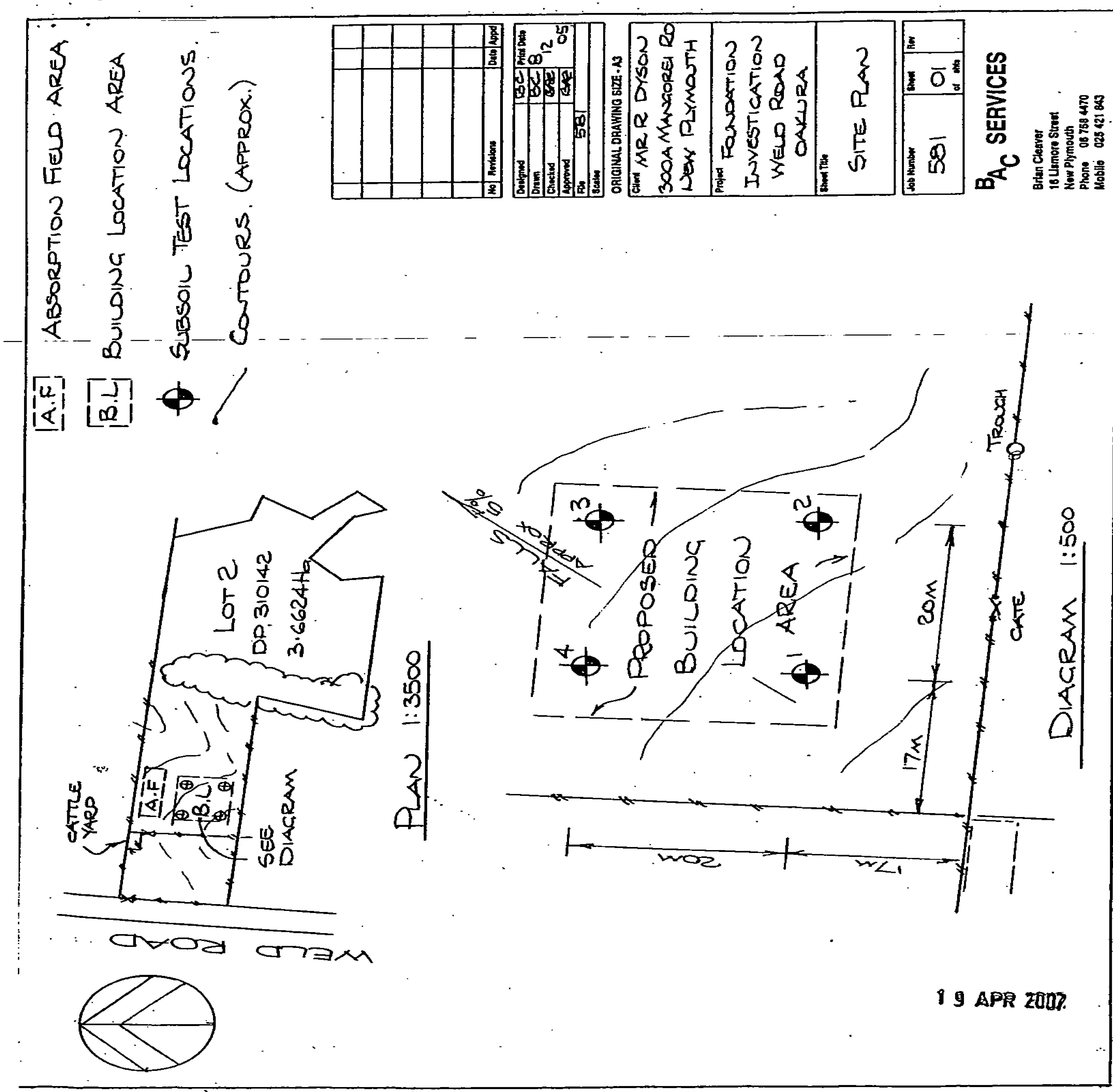
We trust this provides the necessary engineering information and if you have any questions relating to the above please do not hesitate to contact the undersigned.

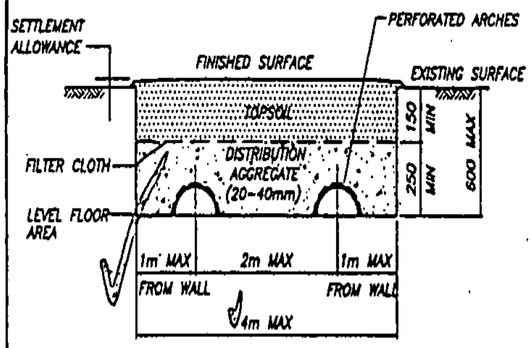
Yours faithfully
BAC SERVICES
per:

B A Cleaver

Enclosures:

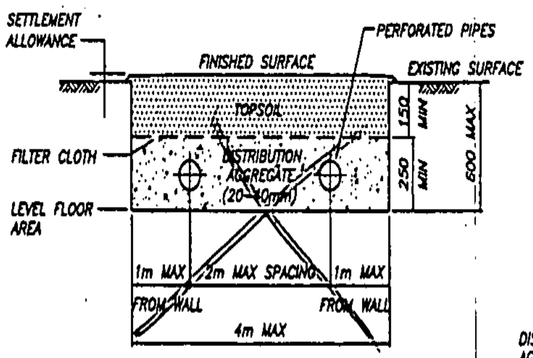
- Site Plan No. 581/01
- Effluent Trench and Bed Details: 582/02





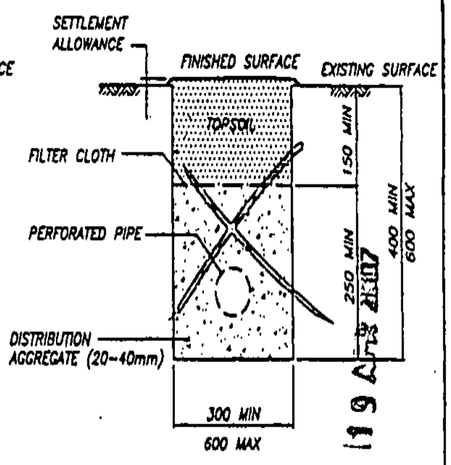
LEVEL SITE-SLOPE LESS THAN 5%

CONVENTIONAL BED ARCH

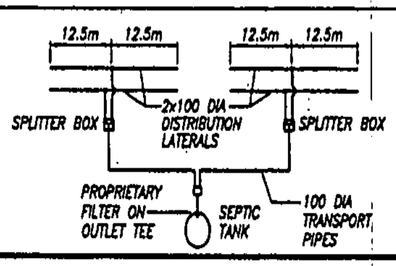


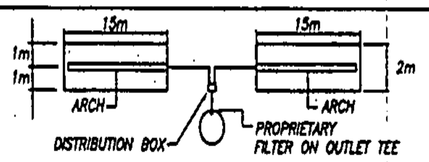
LEVEL SITE-SLOPE LESS THAN 5%

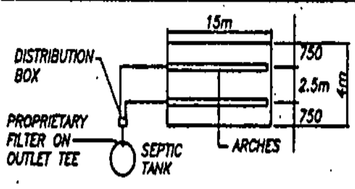
CONVENTIONAL BED PIPES

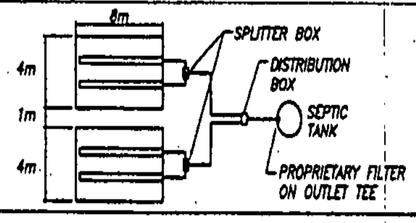


CONVENTIONAL PIPED TRENCH

ABSORBTION TRENCH BASE AREA	WIDTH	LENGTH	TYPICAL LAYOUTS
$A=60m^2$ (EXAMPLE)	$W=0.6$	$L=100m$	

ABSORBTION BED BASE AREA	WIDTH	LENGTH	TYPICAL LAYOUTS
$A=60m^2$ (EXAMPLE)	$W=2m$	$L=30m$	

	$W=4m$	$L=15m$	

	$W=4m$	$L=15m$	

TYPICAL LAYOUT FOR TRENCHES AND BEDS

No	Revisions	Date	Appd

Designed	Print Date
Drawn	
Checked	
Approved	
File	
Scales	NOT TO SCALE

ORIGINAL DRAWING SIZE - A4

Client MR R. DYSON
300A MANGOREI RD
NEW PLYMOUTH

Project FOUNDATION INVESTIGATION
WELD ROAD
OAKURA

EFFLUENT FIELD DETAILS

Job Number	Sheet	Rev
581	02 of sht3	

BAC SERVICES
Brian Cleaver
16 Lismore Street
New Plymouth
Phone 06 758 4470
Mobile 025 421 843

THESE PLANS HAVE BEEN

SUPERSEDED

REPLACEMENT PLANS WILL BE IN THE APPROVED OFFICE COPY.

BC: 88539 ADDRESS: 274 Weld Rd

Amendment No & Date of Amendments that these superseded plans relates to are:

1. AMENDMENT 01 _ 180507
2. AMENDMENT 02 _ 220807 no old plans.
3.
4.
5.
6.
7.
8.
9.
10.

THESE ARE TO BE **KEPT AND SCANNED** AT THE END OF THE PROJECT FOR FUTURE REFERENCE

AMENDMENT 01 180507

SUPERSEDED NPDC

D	Wing walls, pergola amended	11 05 07
C	Fireplace and D1 positions altered Pergola altered	27 04 07
B	Garage lintel amended, plan changed	13 03 07
A	Sink added, bathroom size / layout changed, notes added	12.12 06

REVISION :

SUPERSEDED NPDC 27-12-07

DELETED WINDOW

Jotul F400 Castine wood burner
fire place ℄ to line through with D1 ℄

LOUNGE
STUDY
ENTRY
DINING
KITCHEN
Layout shown as indicative only, confirm layout with owner prior to construction.
Hobs
Sink
Fridge
Oven
Infinity gas hot water system in roof space
PASSAGE
STORAGE
Art recess
Sink
Dry
Wm
LAUNDRY
Vent dryer directly to outside (through roof)
Whb
WC
BEDROOM 3
BATHROOM
WC
Bath
MASTER BEDROOM
W'robe
BEDROOM 2
W'robe
ENSUITE
Shr
Htr
GARAGE
Proprietary pull down ladder / hatch in Garage ceiling
Selected 5.4m wide x 2.2m high sectional garage door
Selected 2.8m wide x 2.2m high sectional garage door
Cleaners sink
Gas bottles

W23 ℄ to be ℄ of 1400 entry

FB30H Pitch Beam lintel

NOTE: 140x140 timber posts set back 25mm from face of timber framing

2200 high internal shower walls, tiles all sides

Mechanically vent shower to outside through roof

Mechanically vent shower to outside through roof

NOTE: Sound proof Gib to all Laundry walls (with sound proof batts) - exept Garage walls

KEY-

Timber walls

10 series block, plaster finish

NOTE:
All lintels to be 2/100x50 unless noted otherwise

All exterior walls to be 90x45 H3.1timber framing @ 480 max crs, all interior to be 90x45 timber framing @ 600 max crs

All Showers to have Gib Aqualine substrate and to be water proofed with "Wet-seal" or similar BRANZ approved water proofing system, Refer to "Wet-seal" Spec. attached.

Tile finish to all bathroom and ensuite walls and floor (showers included)

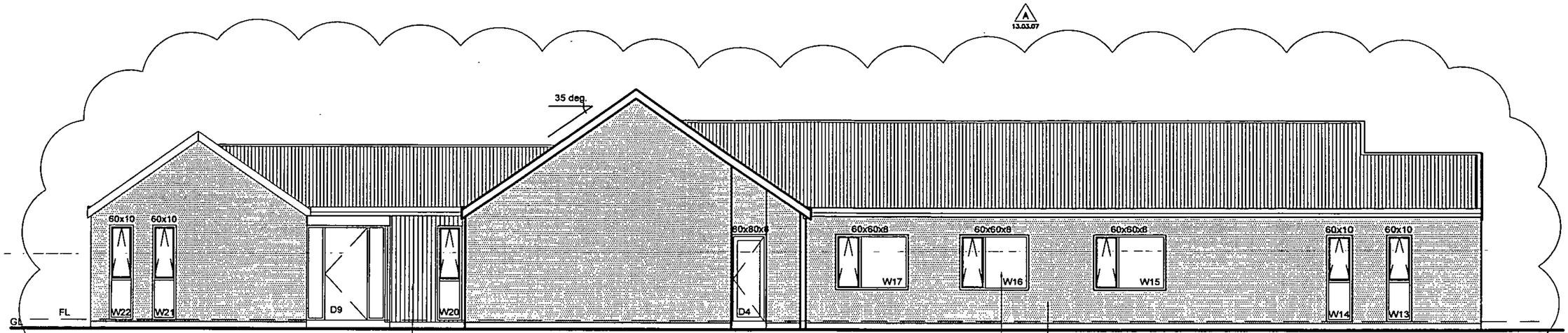
Shr = Shower
WC = Toilet
Whb = Wash hand basin
Wm = Washing machine
St. = Storage cupboard
Htr = Heated towel rail (with temp controlled switches)
Battery operated Smoke Alarm

FLOOR PLAN
SCALE 1:100

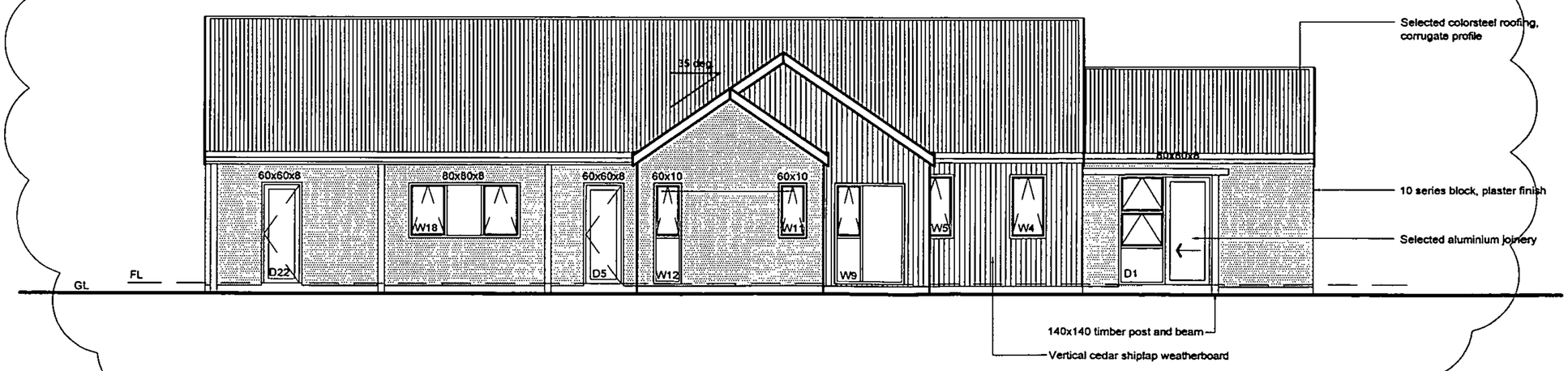
New Residence for
Ricahrd & Sue Dyson
Weld Road, Oakura

4site DESIGN
Ph. : (06) 769 5524 Fax : (06) 769 5525
Mob : 027 2100 564
Email : paul@4sitedesign.co.nz
PO Box 589 52 Gover Street
New Plymouth

SCALE :	1:100
DRAWN :	P. Russell
CHECKED :	-
DATE :	October 2006
JOB No. :	4128 REVISION : D
SHEET No. :	A2-1



SOUTH ELEVATION
Scale 1:100



EAST ELEVATION
Scale 1:100

A	Elevations amended	13.03.07

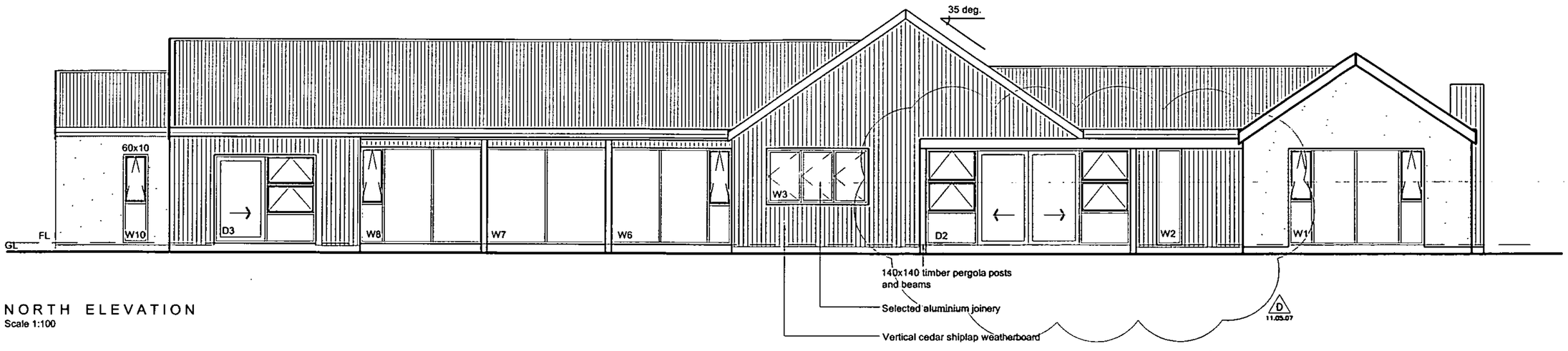
REVISION :

JOB TITLE :
New Residence for
Richard & Sue Dyson
Weld Road,
Oakura

4site DESIGN
Ph. : (06) 769 5524 Fax : (06) 769 5525
Mob : 027 2100 564
Email : paul@4sitedesign.co.nz
PO Box 589 52 Gover Street
New Plymouth

SCALE : 1:100
DRAWN : P. Russell
CHECKED : -
DATE : October 2006
JOB No. : 4128 REVISION : A
SHEET No. : A3-1

AMENDMENT
01_ 180507



NORTH ELEVATION
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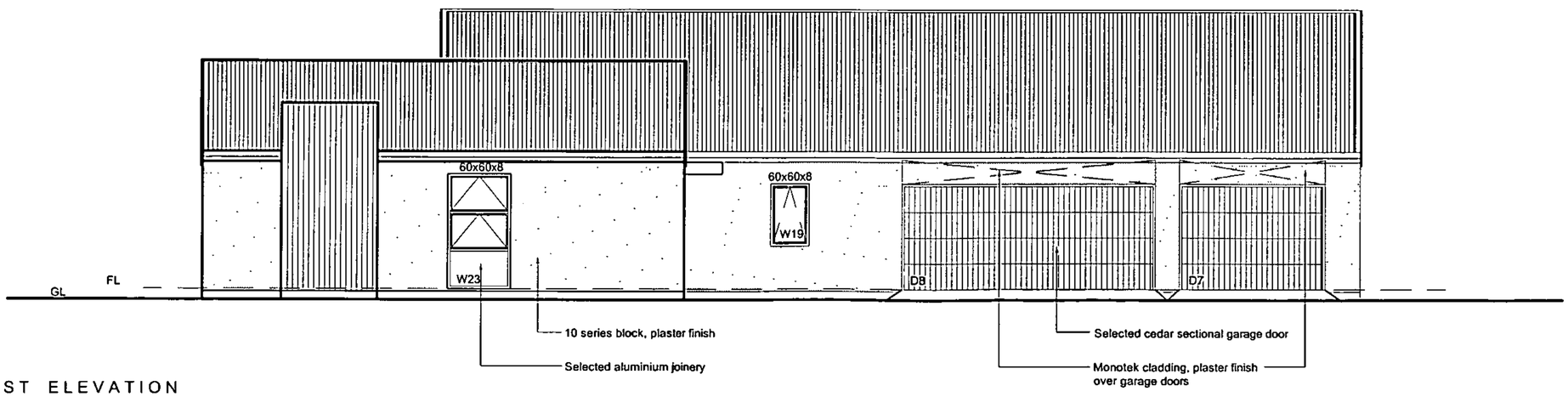


WEST ELEVATION
Scale 1:100

SUPERSEDED
NTDC

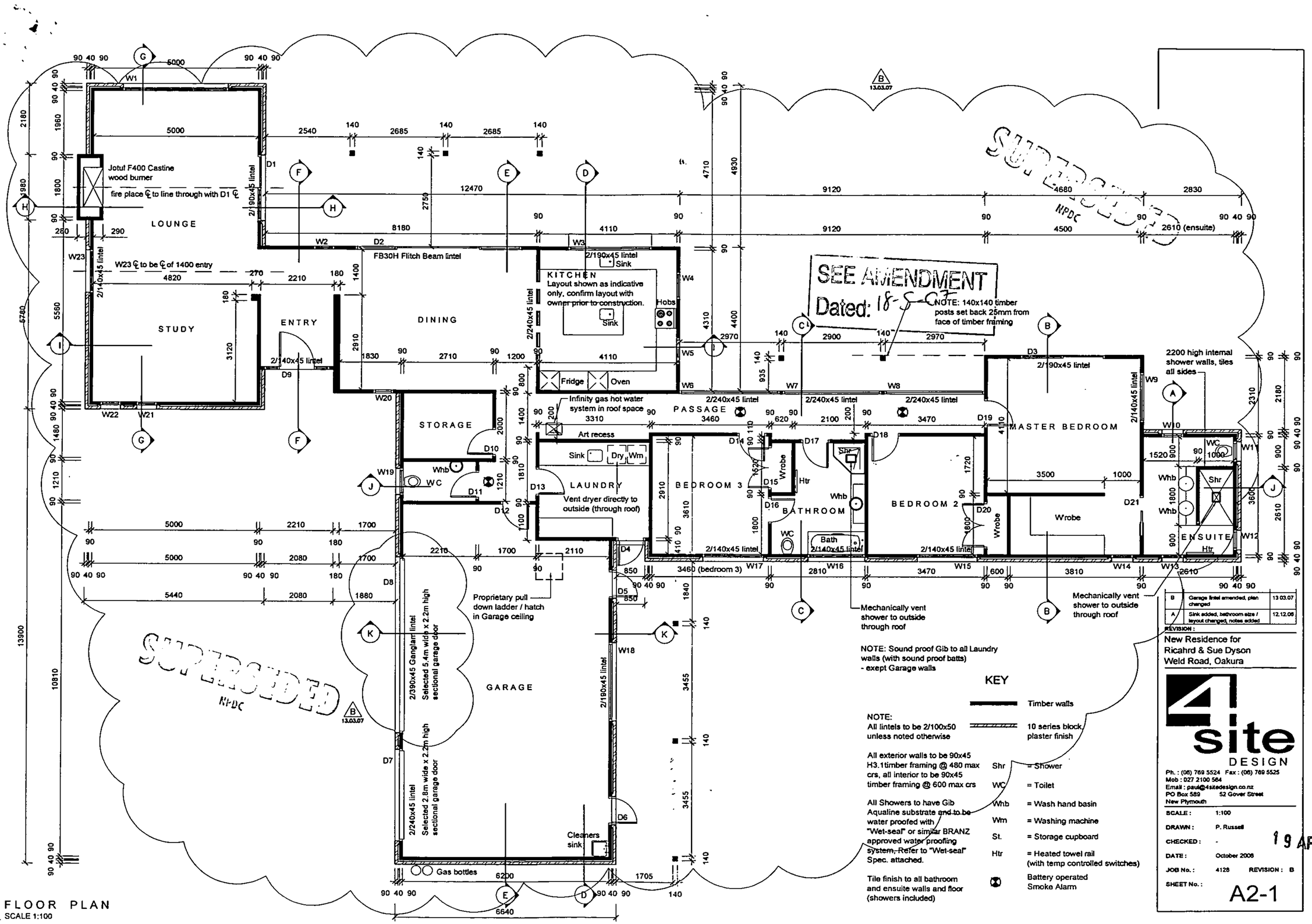
D	Pergola amended	11.05.07
C	Chimney position altered	26.04.07
B	Elevations amended	13.03.07
A	Window changed	12.12.06

REVISION :

JOB TITLE :
New Residence for
Richard & Sue Dyson
Weld Road,
Oakura

4site DESIGN
Ph. : (06) 769 5524 Fax : (06) 769 5525
Mob : 027 2100 564
Email : paul@4sitedesign.co.nz
PO Box 589 52 Gover Street
New Plymouth

SCALE : 1:100
DRAWN : P. Russell
CHECKED : -
DATE : October 2006
JOB No. : 4128 REVISION : D
SHEET No. : A3-2



FLOOR PLAN
SCALE 1:100

KEY

▬▬	Timber walls
═══	10 series block, plaster finish
Shr	= Shower
WC	= Toilet
Whb	= Wash hand basin
Wm	= Washing machine
St.	= Storage cupboard
Htr	= Heated towel rail (with temp controlled switches)
⊠	Battery operated Smoke Alarm

NOTE:
All lintels to be 2/100x50 unless noted otherwise

All exterior walls to be 90x45 H3.1timber framing @ 480 max crs, all interior to be 90x45 timber framing @ 600 max crs

All Showers to have Gib Aqualine substrate and to be water proofed with "Wet-seal" or similar BRANZ approved water proofing system, Refer to "Wet-seal" Spec. attached.

Tile finish to all bathroom and ensuite walls and floor (showers included)

B	Garage lintel amended, plan changed	13.03.07
A	Sink added, bathroom size / layout changed, notes added	12.12.06

REVISION :

New Residence for
Ricahrd & Sue Dyson
Weld Road, Oakura

4site DESIGN
Ph. : (06) 769 5524 Fax : (06) 769 5525
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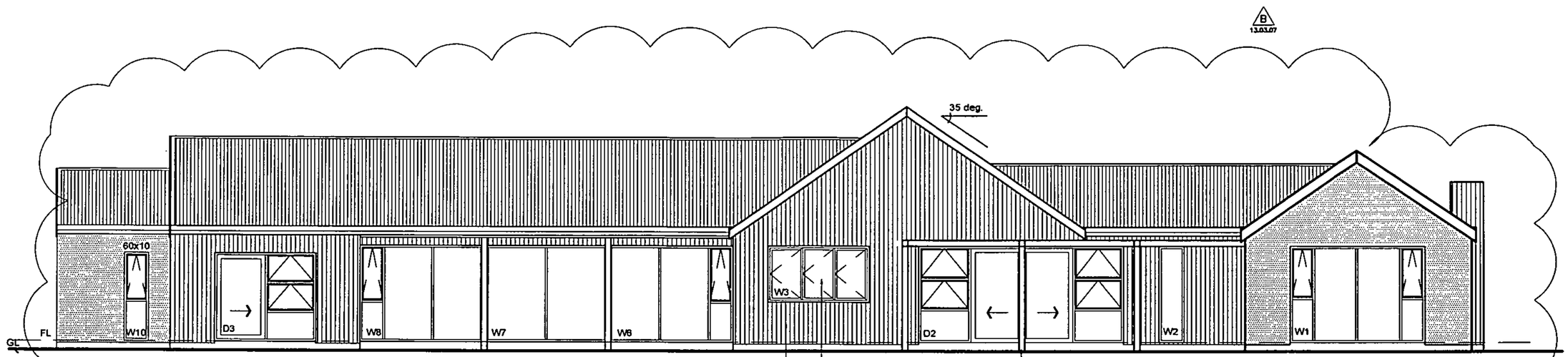
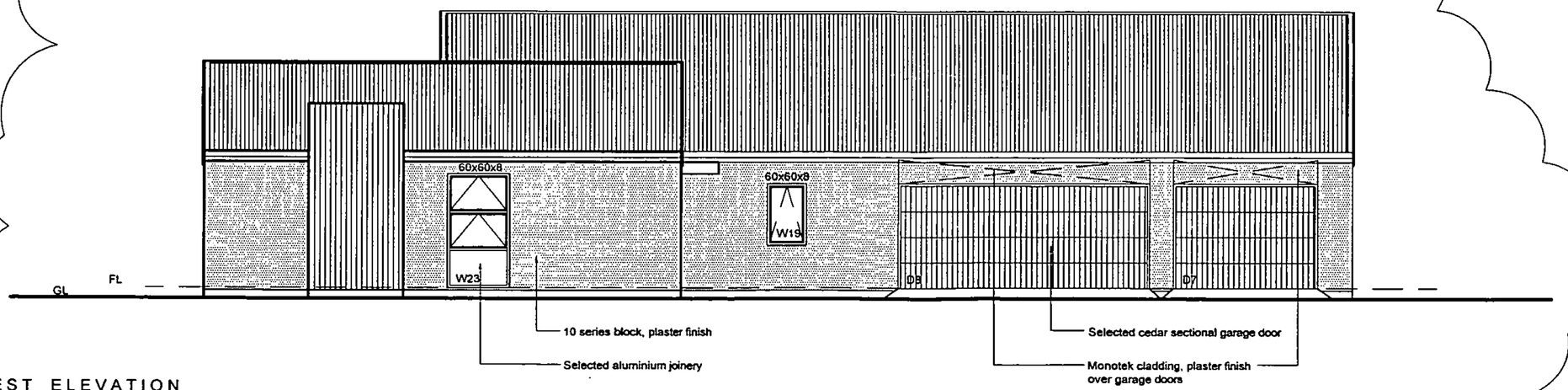
DRAWN :	P. Russell
CHECKED :	-
DATE :	October 2006
JOB No. :	4128 REVISION : B
SHEET No. :	A2-1

19 APR 2007



NORTH ELEVATION
Scale 1:100



WEST ELEVATION
Scale 1:100

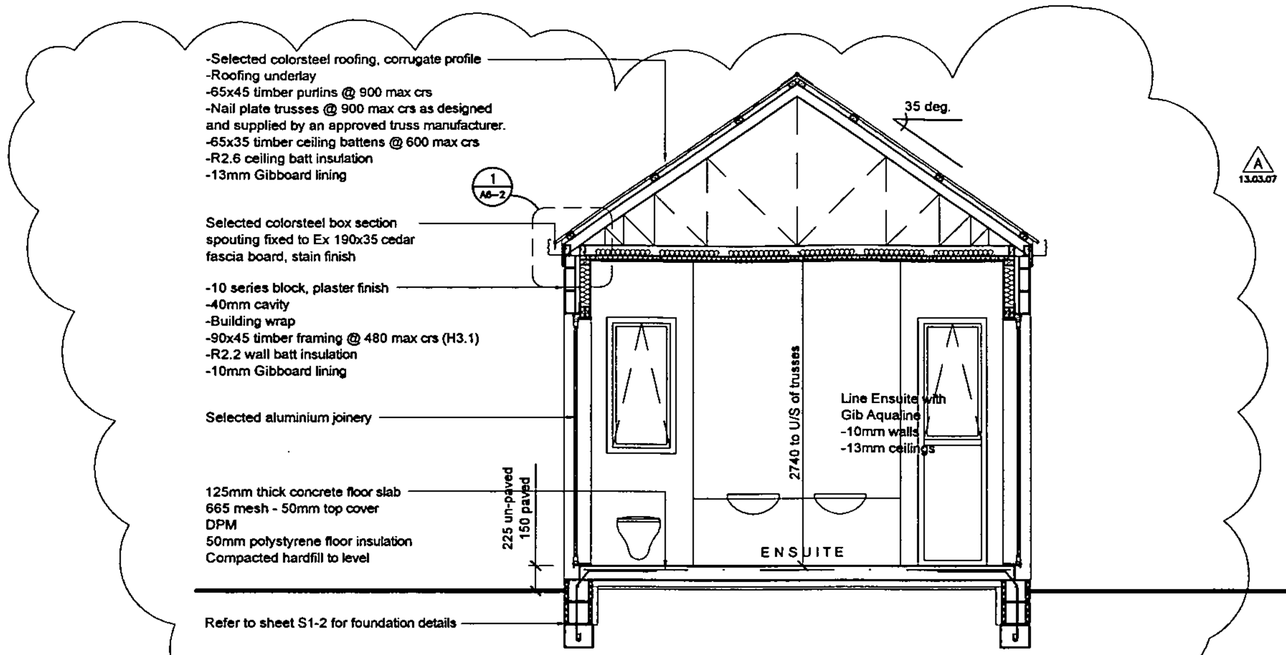
B	Elevations amended	13.03.07
A	Window changed	12.12.06

REVISION :

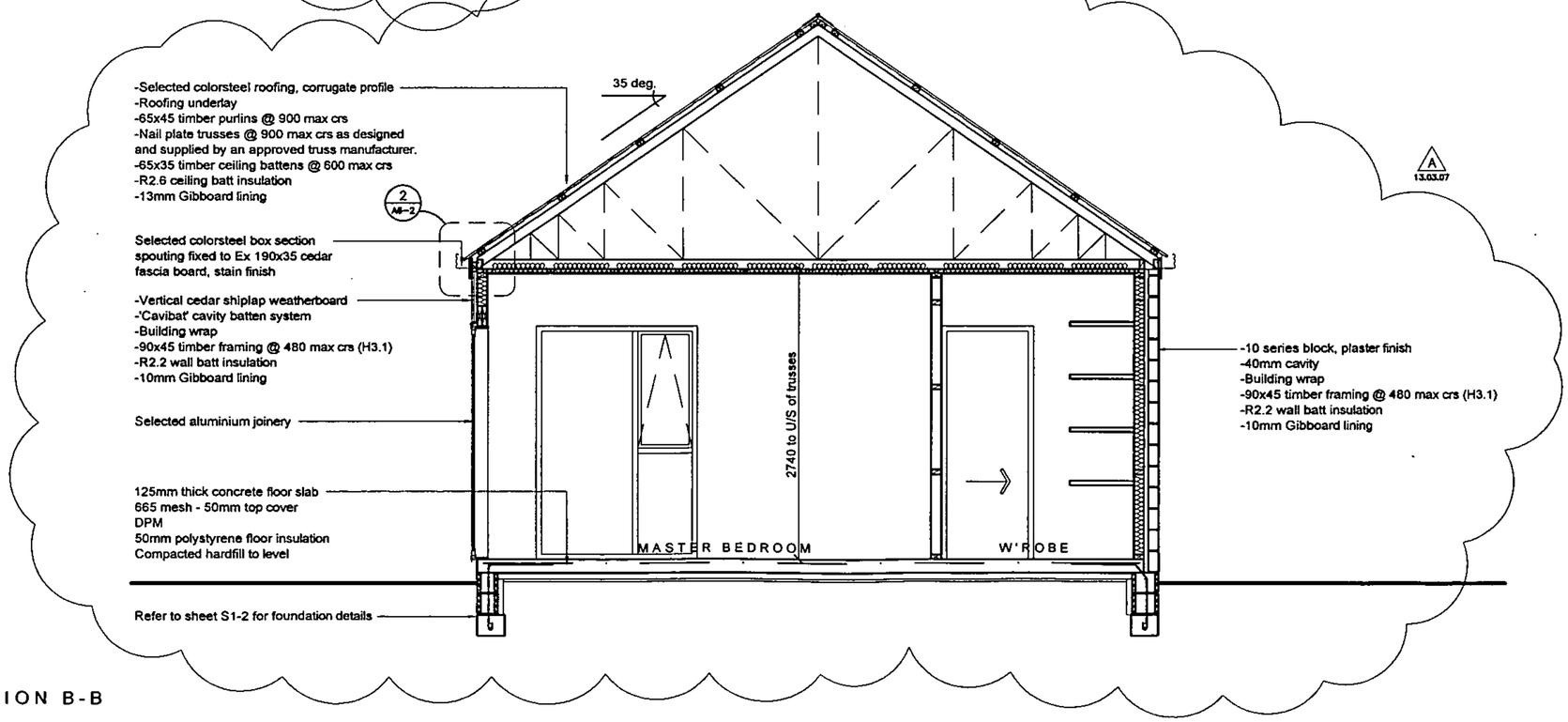
JOB TITLE :
New Residence for
Richard & Sue Dyson
Weld Road,
Oakura

4site DESIGN
Ph. : (06) 769 5524 Fax : (06) 769 5525
Mob : 027 2100 584
Email : paul@4sitedesign.co.nz
PO Box 589 52 Gover Street
New Plymouth

SCALE : 1:100
DRAWN : P. Russell
CHECKED : -
DATE : October 2006
JOB No. : 4128 REVISION : B
SHEET No. : A3-2



CROSS SECTION A-A
SCALE 1:50



CROSS SECTION B-B
SCALE 1:50

SUPERSEDED
N°DC

A	Sections amended	13.03.07

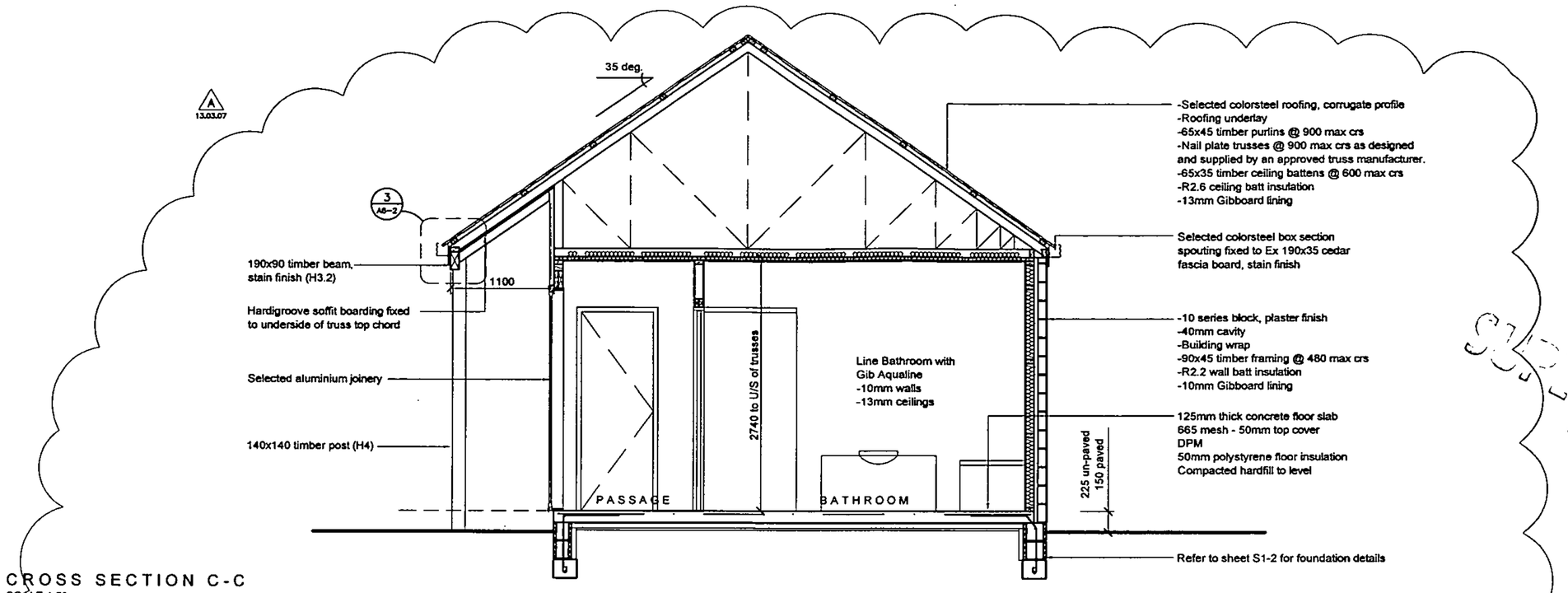
REVISION :

JOB TITLE :
New Residence for
Richard & Sue Dyson
Weld Road,
Oakura

4site DESIGN
Ph. : (06) 759 5524 Fax : (06) 759 5525
Mob : 027 2100 564
Email : paul@4sitedesign.co.nz
PO Box 589 52 Gover Street
New Plymouth

SCALE : 1:100
DRAWN : P. Russell
CHECKED : -
DATE : October 2006
JOB No. : 4128 REVISION : A
SHEET No. : A4-1

19 APR 2007



CROSS SECTION C-C
SCALE 1:50

CROSS SECTION F-F
SCALE 1:50

SUPERSEDED
NPDC

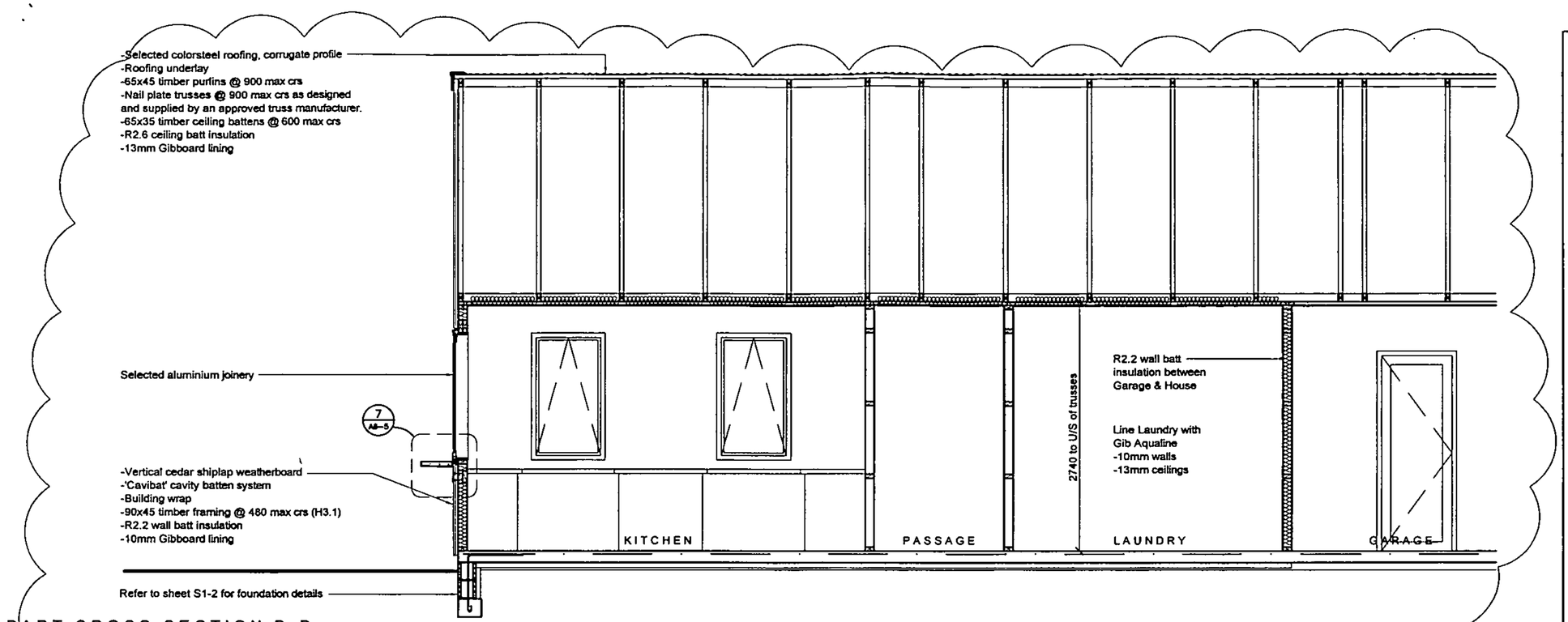
A	Sections / notes amended	13.03.07

REVISION :

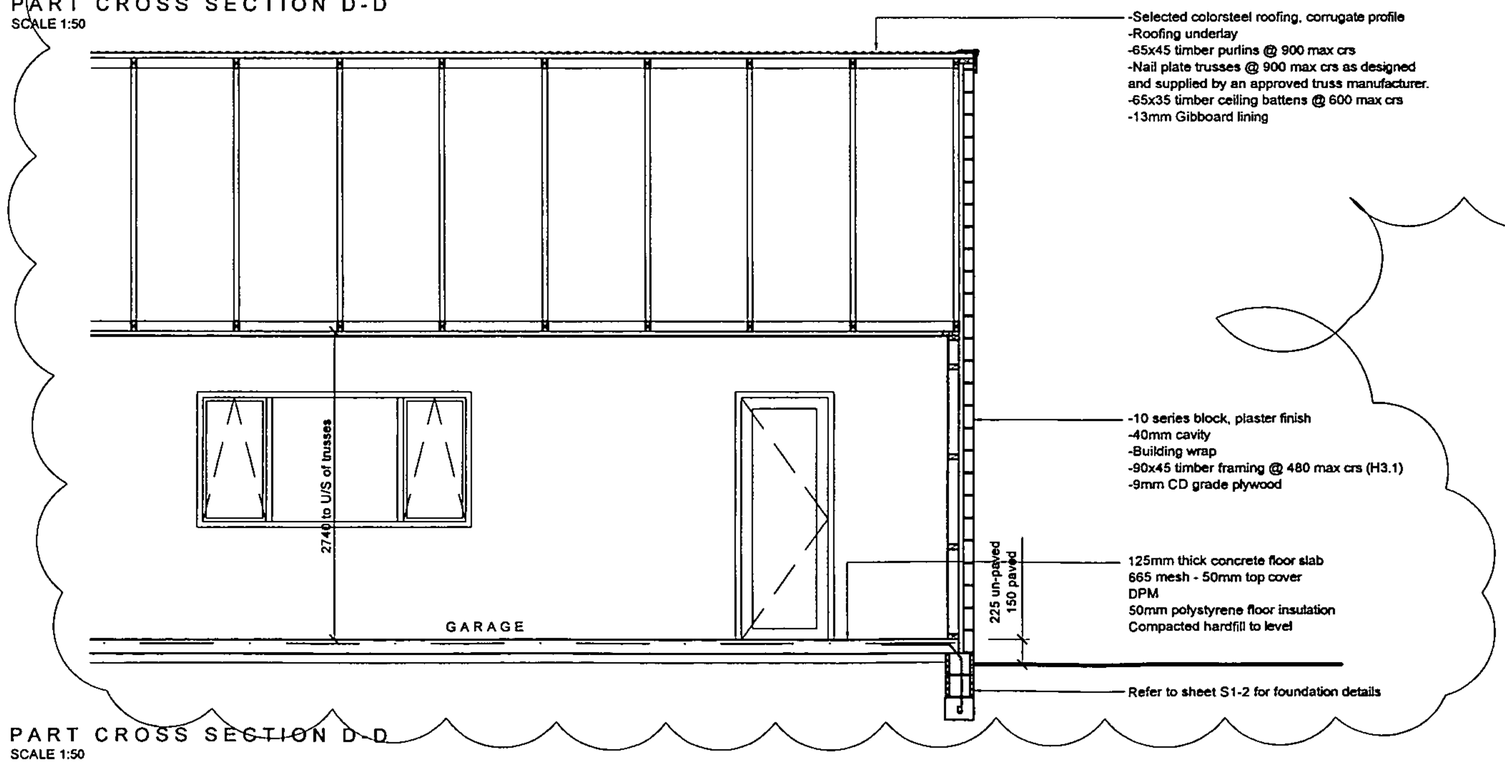
JOB TITLE :
New Residence for
Richard & Sue Dyson
Weld Road,
Oakura

4site DESIGN
Ph. : (06) 769 5524 Fax : (06) 769 5525
Mob : 027 2100 564
Email : paul@4sitedesign.co.nz
PO Box 569 52 Gover Street
New Plymouth

SCALE : 1:100
DRAWN : P. Russell
CHECKED : -
DATE : October 2006
JOB No. : 4128 REVISION : A
SHEET No. : A4-2



PART CROSS SECTION D-D
SCALE 1:50



PART CROSS SECTION D-D
SCALE 1:50

B
13.03.07

SUPERSEDED
NPDC

B	Sections / notes amended	13.03.07
A	Note amended	12.12.06

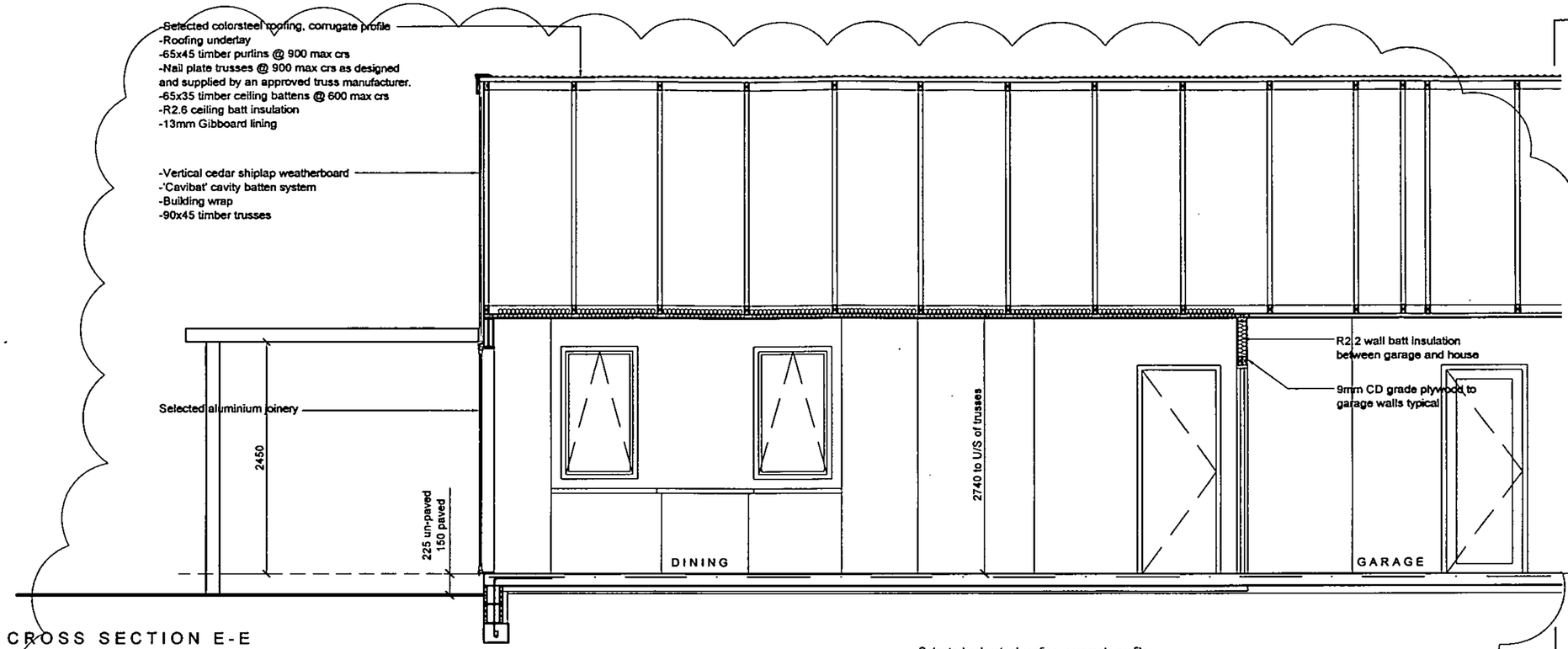
REVISION :

JOB TITLE :
New Residence for
Richard & Sue Dyson
Weld Road,
Oakura

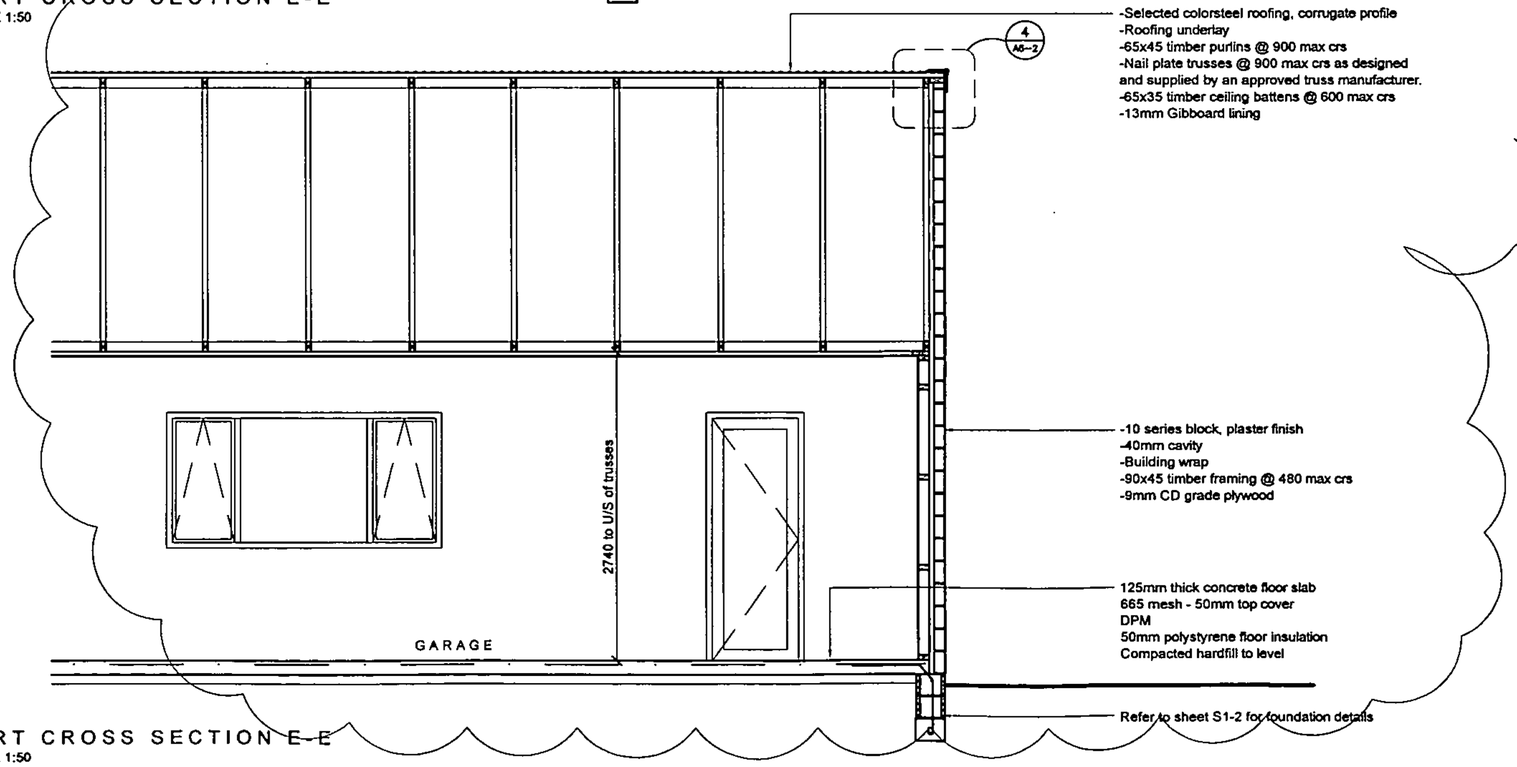
4site DESIGN
Ph. : (06) 769 5524 Fax : (06) 769 5525
Mob : 027 2100 564
Email : paul@4sitedesign.co.nz
PO Box 589 52 Gover Street
New Plymouth

SCALE : 1:100
DRAWN : P. Russell
CHECKED : -
DATE : October 2006
JOB No. : 4128 REVISION : B
SHEET No. : A4-3

19 APR 2007



PART CROSS SECTION E-E
SCALE 1:50



PART CROSS SECTION E-E
SCALE 1:50

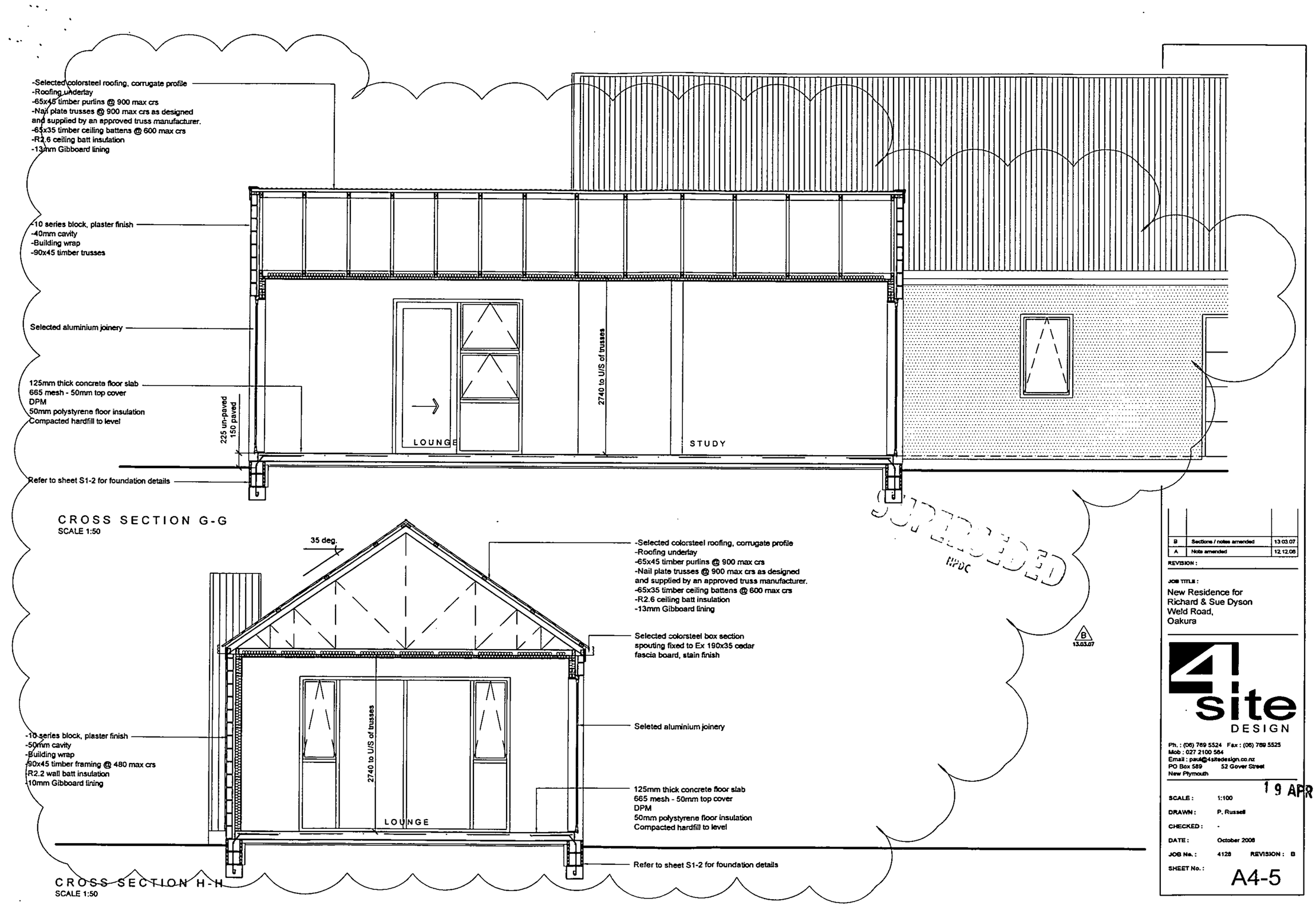
A	Sections / notes amended	13.03.07

REVISION :

JOB TITLE :
New Residence for
Richard & Sue Dyson
Weld Road,
Oakura

4site DESIGN
Ph. : (06) 769 5524 Fax : (06) 769 5525
Mob : 027 2100 564
Email : paul@4sitedesign.co.nz
PO Box 589 52 Gover Street
New Plymouth

SCALE : 1:100
DRAWN : P. Russell
CHECKED : -
DATE : October 2006
JOB No. : 4128 REVISION : A
SHEET No. : A4-4



B	Sections / notes amended	13.03.07
A	Note amended	12.12.06

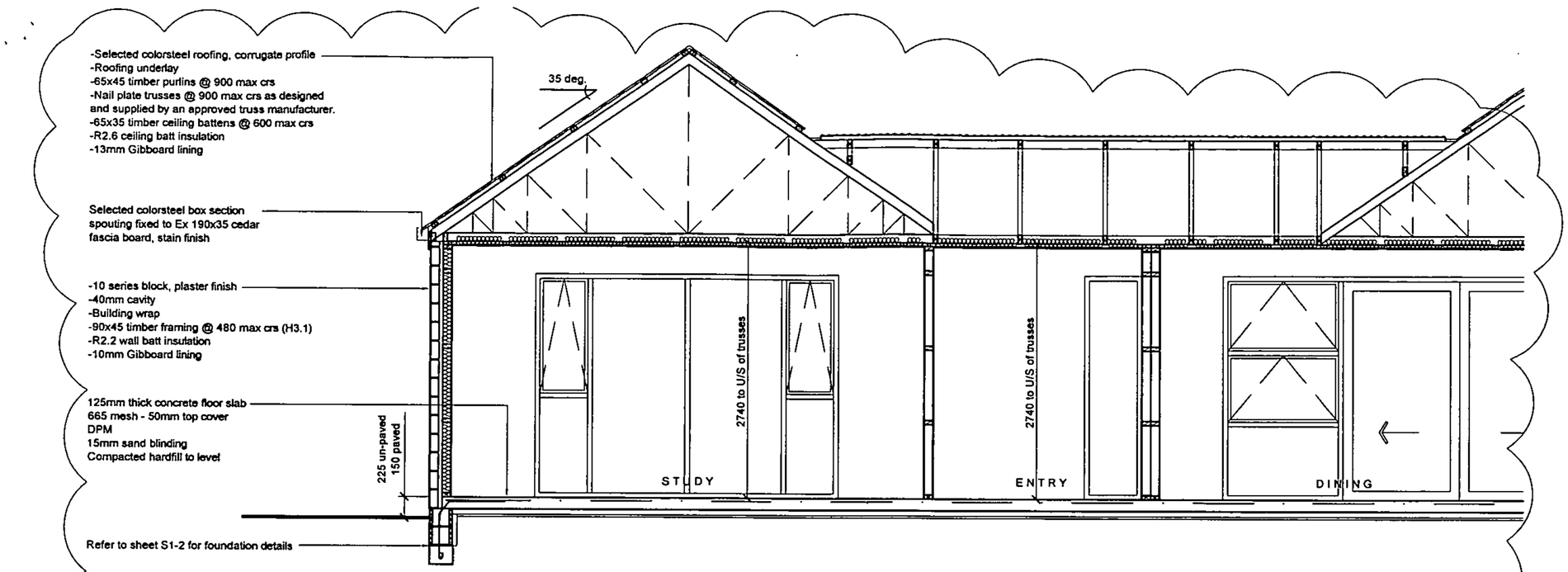
REVISION :

JOB TITLE :

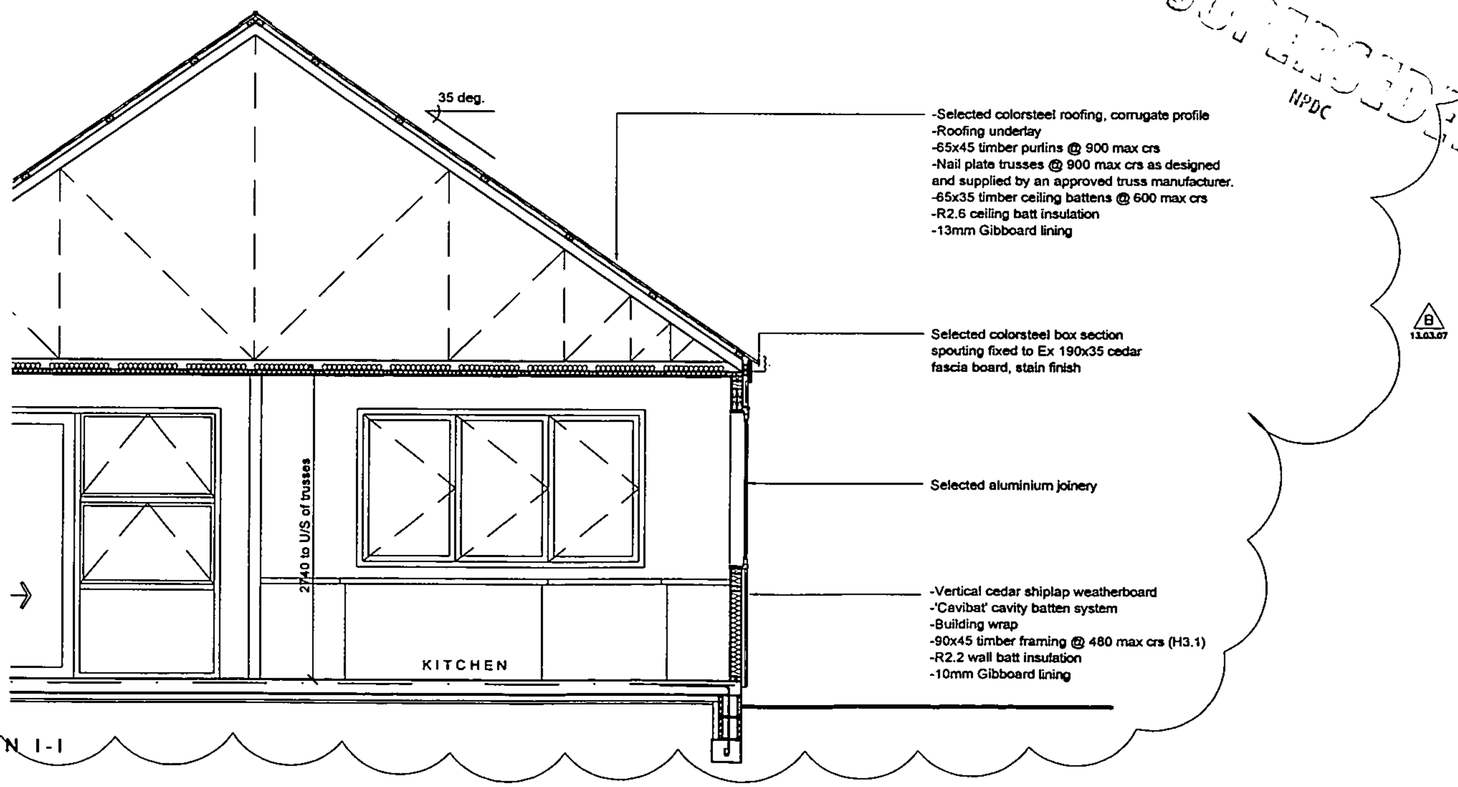
New Residence for
Richard & Sue Dyson
Weld Road,
Oakura

4site DESIGN
Ph. : (06) 769 5524 Fax : (06) 769 5525
Mob : 027 2100 564
Email : paul@4sitedesign.co.nz
PO Box 589 52 Gover Street
New Plymouth

SCALE :	1:100
DRAWN :	P. Russell
CHECKED :	-
DATE :	October 2006
JOB No. :	4128 REVISION : B
SHEET No. :	A4-5



PART CROSS SECTION I-I
SCALE 1:50



PART CROSS SECTION I-I
SCALE 1:50

SUPERSEDED
NPDC

B 13.03.07

B	Sections / notes amended	13.03.07
A	Note amended	12.12.06

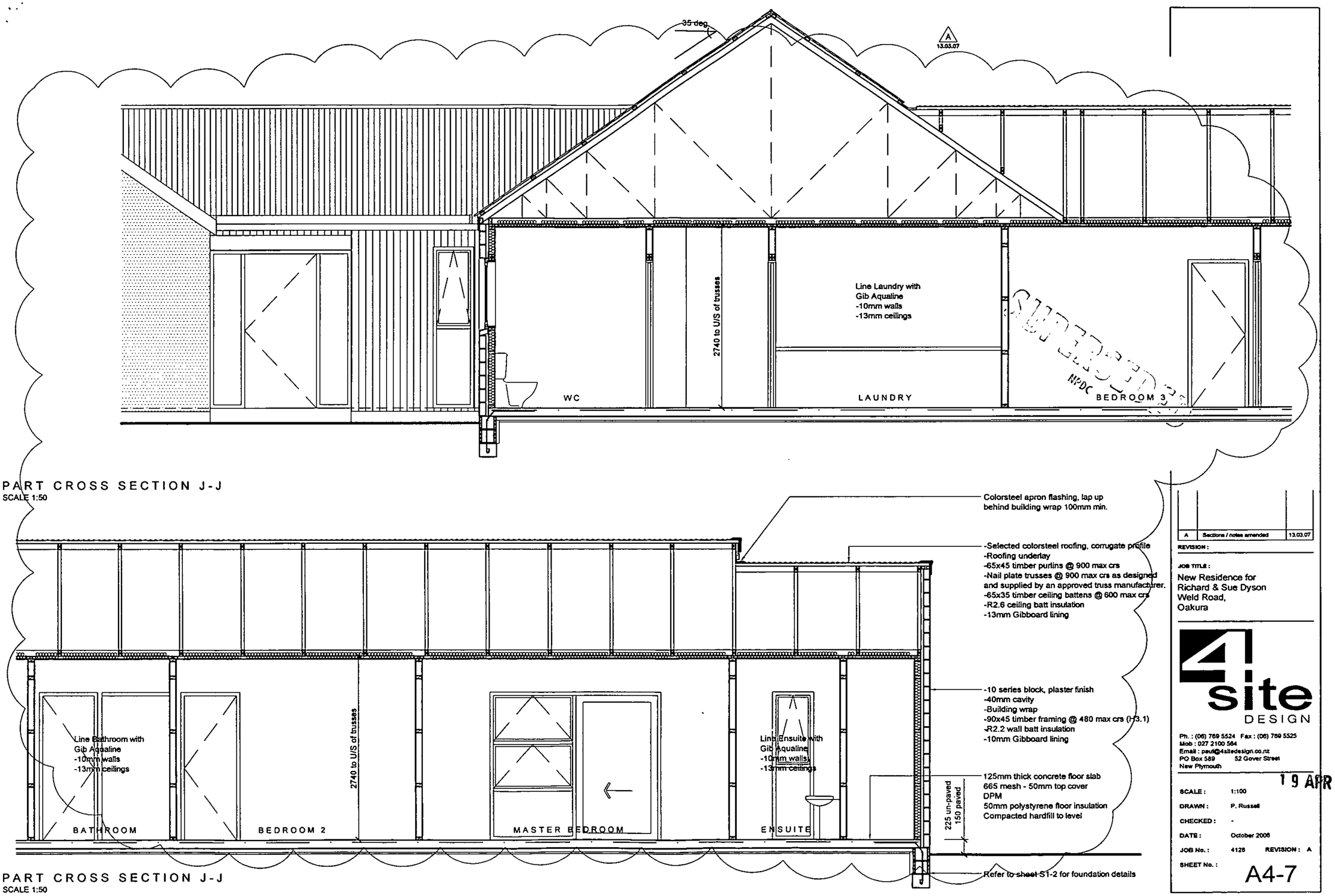
REVISION :

JOB TITLE :
New Residence for
Richard & Sue Dyson
Weld Road,
Oakura

4site DESIGN
Ph. : (06) 769 5524 Fax : (06) 769 5525
Mob : 027 2100 564
Email : paul@4sitedesign.co.nz
PO Box 589 52 Gover Street
New Plymouth

SCALE : 1:100
DRAWN : P. Russell
CHECKED : -
DATE : October 2006
JOB No. : 4128 REVISION : B
SHEET No. : A4-6

19 APR 2007



PART CROSS SECTION J-J
SCALE 1:50

PART CROSS SECTION J-J
SCALE 1:50

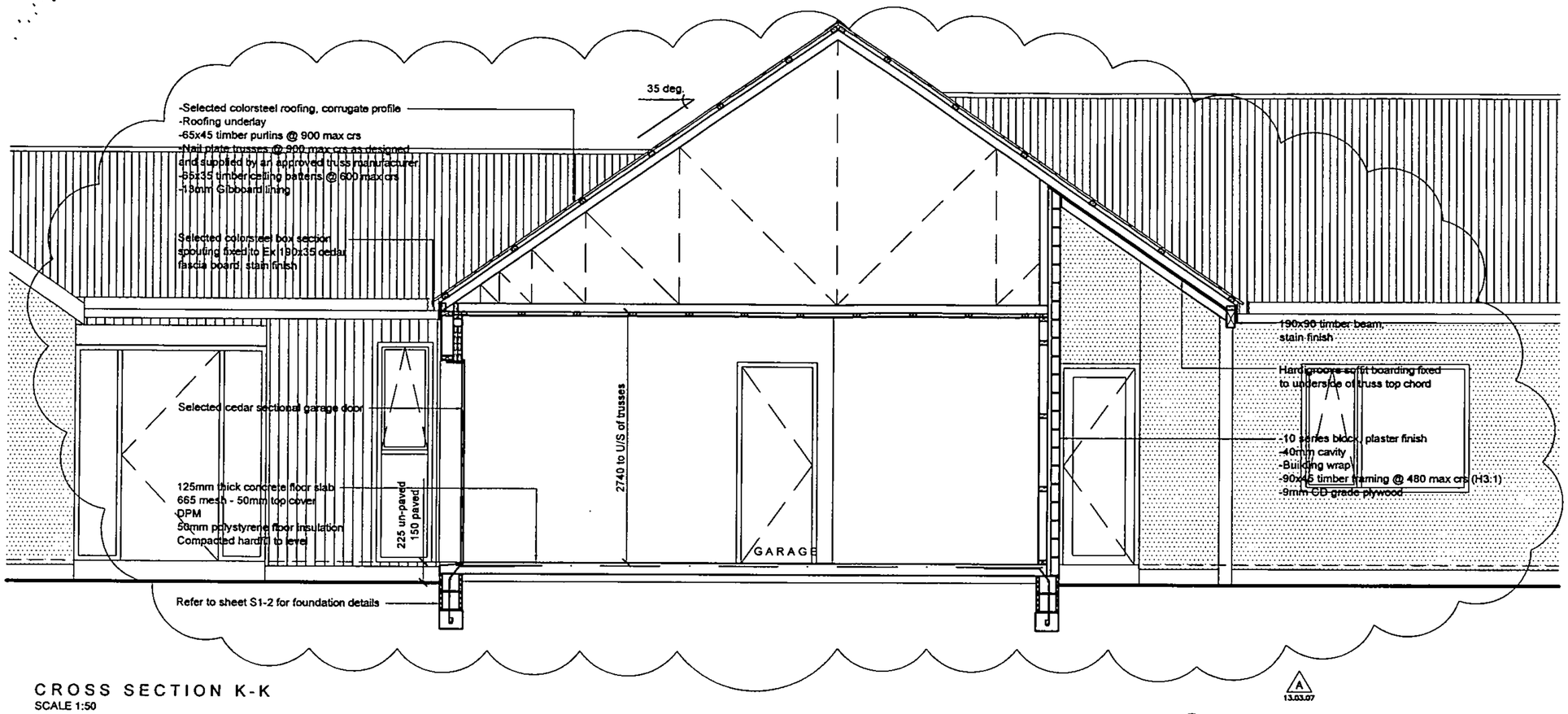
A	Sections / notes amended	13.03.07

REVISION :

JOB TITLE :
New Residence for
Richard & Sue Dyson
Weld Road,
Oakura

4site DESIGN
Ph. : (06) 769 5524 Fax : (06) 769 5525
Mob : 027 2100 564
Email : paul@4sitedesign.co.nz
PO Box 589 52 Gover Street
New Plymouth

SCALE : 1:100
DRAWN : P. Russell
CHECKED : -
DATE : October 2006
JOB No. : 4128 REVISION : A
SHEET No. : A4-7



CROSS SECTION K-K
SCALE 1:50

A
13.03.07

SUPERSEDED
NPDC

A	Section / notes amended	13.03.07

REVISION :

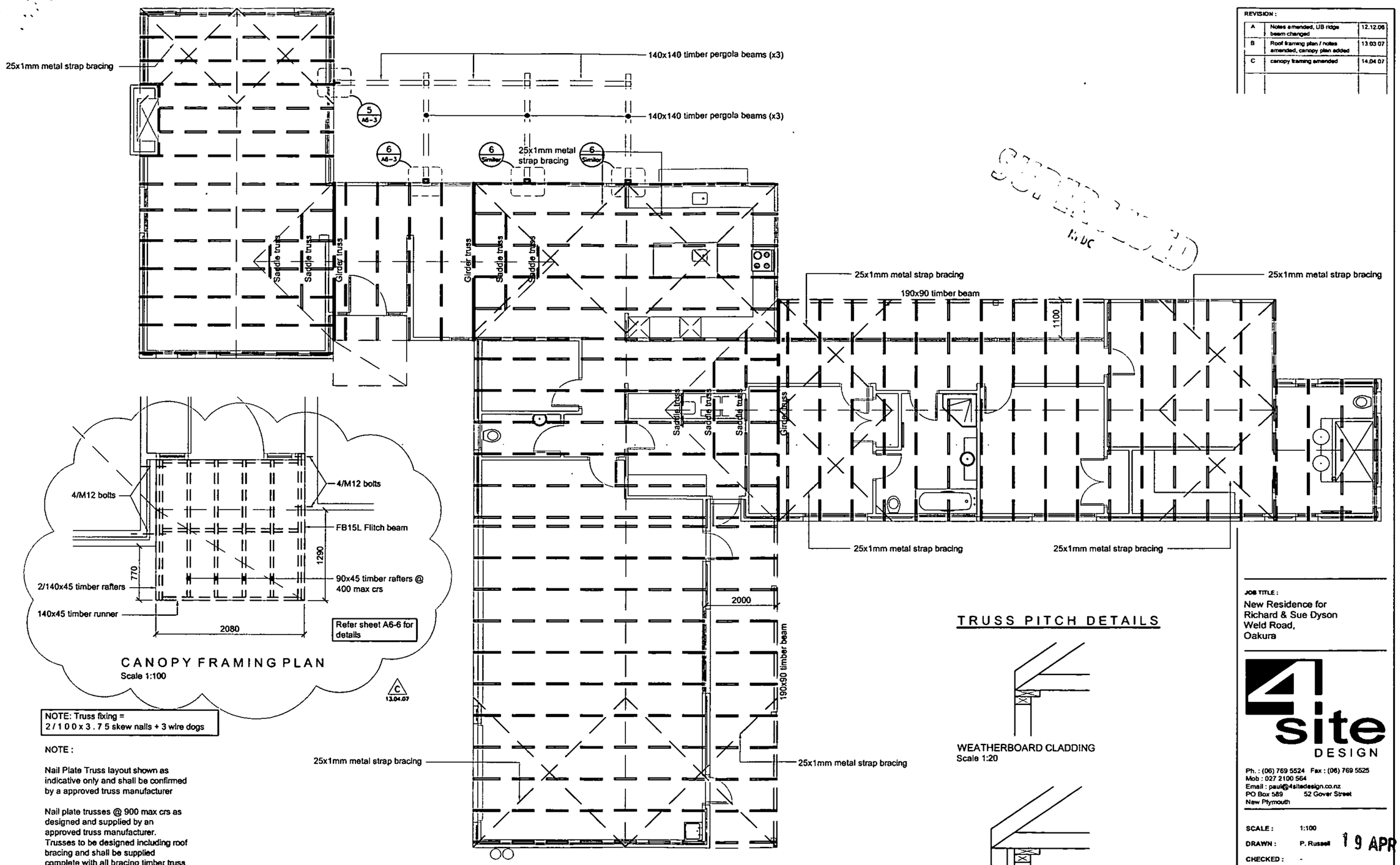
JOB TITLE :
New Residence for
Richard & Sue Dyson
Weld Road,
Oakura

4site DESIGN
Ph. : (06) 769 5524 Fax : (06) 769 5525
Mob : 027 2100 564
Email : paul@4sitedesign.co.nz
PO Box 589 52 Gover Street
New Plymouth

SCALE : 1:100
DRAWN : P. Russell
CHECKED : -
DATE : October 2006
JOB No. : 4128 REVISION : A
SHEET No. : A4-8

19 APR 2007

REVISION :		
A	Notes amended, UB ridge beam changed	12.12.06
B	Roof framing plan / notes amended, canopy plan added	13.03.07
C	canopy framing amended	14.04.07



CANOPY FRAMING PLAN
Scale 1:100

C 13.04.07

NOTE: Truss fixing = 2 / 1 0 0 x 3 . 7 5 skew nails + 3 wire dogs

NOTE :

Nail Plate Truss layout shown as indicative only and shall be confirmed by a approved truss manufacturer

Nail plate trusses @ 900 max crs as designed and supplied by an approved truss manufacturer. Trusses to be designed including roof bracing and shall be supplied complete with all bracing timber truss ties, hip and valley boards or beams, ridge boards etc as per NZS 3604

ROOF FRAMING PLAN
Scale 1:100

TRUSS PITCH DETAILS

WEATHERBOARD CLADDING
Scale 1:20

BLOCK VENEER CLADDING
Scale 1:20

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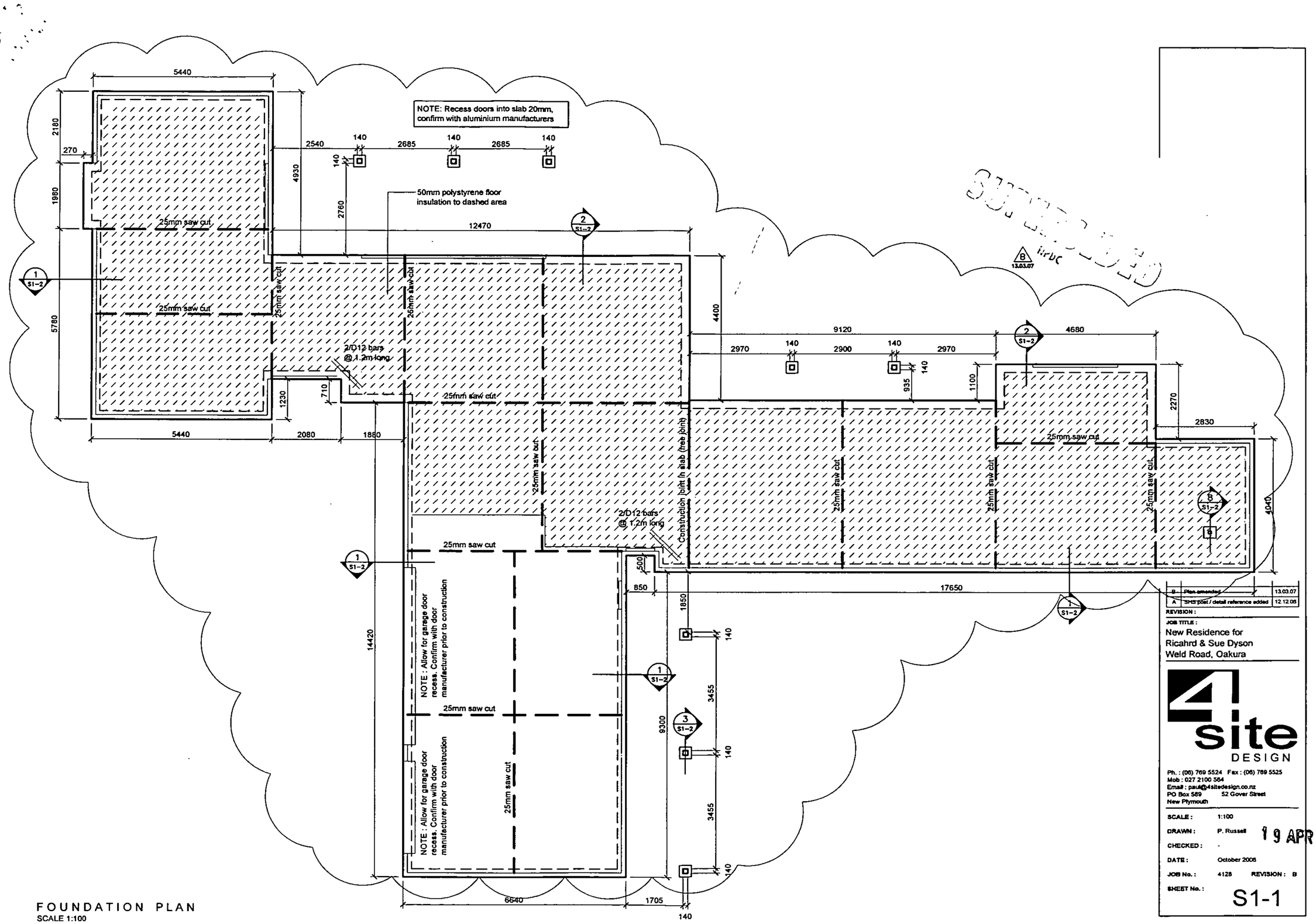
New Residence for
Richard & Sue Dyson
Weld Road,
Oakura

4site DESIGN
Ph. : (06) 769 5524 Fax : (06) 769 5525
Mob : 027 2100 564
Email : paul@4sitedesign.co.nz
PO Box 589 52 Gover Street
New Plymouth

SCALE :	1:100
DRAWN :	P. Russell
CHECKED :	-
DATE :	October 2006
JOB No. :	4128 REVISION : C
SHEET No. :	A5-2

19 APR 2007



FOUNDATION PLAN
SCALE 1:100

B	Plan amended	13.03.07
A	SHS post / detail reference added	12.12.06

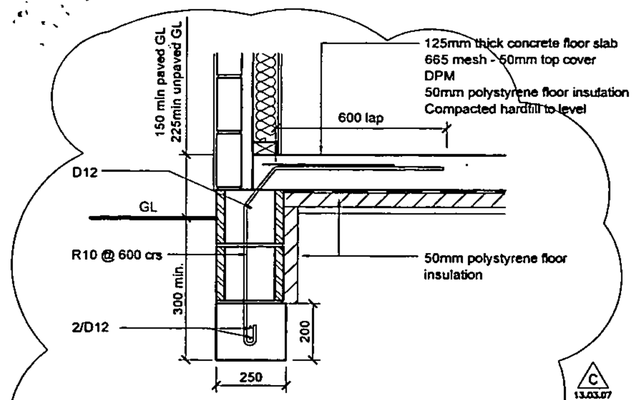
REVISION :

JOB TITLE :
New Residence for
Ricahrd & Sue Dyson
Weld Road, Oakura

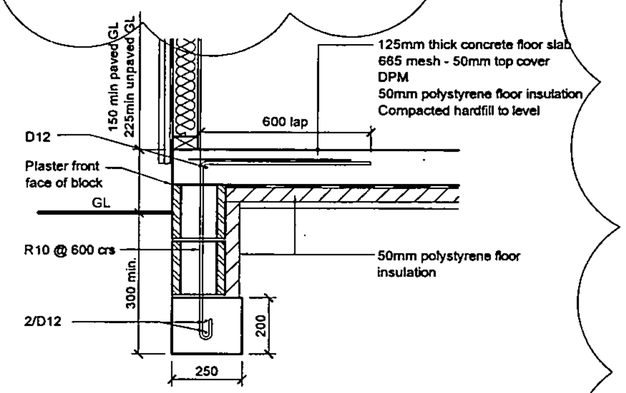
4site DESIGN
Ph. : (06) 769 5524 Fax : (06) 769 5525
Mob : 027 2100 564
Email : paul@4sitedesign.co.nz
PO Box 589 52 Gover Street
New Plymouth

SCALE : 1:100
DRAWN : P. Russell
CHECKED : -
DATE : October 2006
JOB No. : 4128 REVISION : B
SHEET No. : S1-1

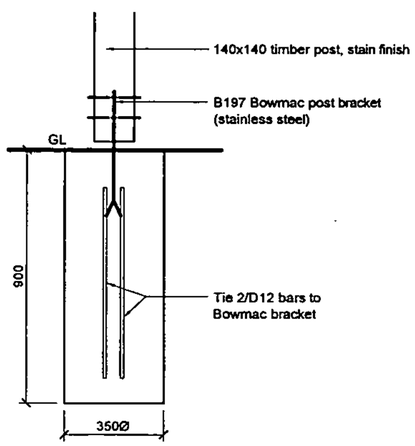
19 APR 2007



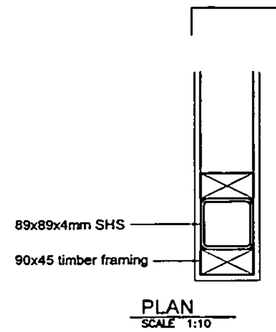
1 S1-1 BLOCK VENEER TYPICAL FOUNDATION DETAIL
SCALE 1:20



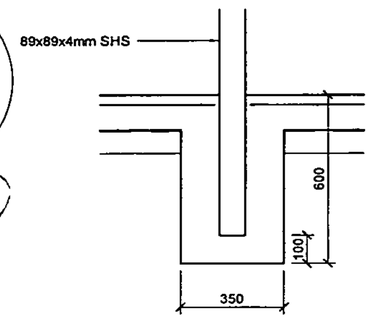
2 S1-1 VERTICAL SHIPLAP TYPICAL FOUNDATION DETAIL
SCALE 1:20



3 S1-1 TYPICAL POST FOOTING DETAIL
SCALE 1:20



PLAN
SCALE 1:10



8 S1-1 SHS FOOTING DETAIL
SCALE 1:20

C	Details deleted / amended	13.03.07
B	Steel frame fixing detail amended	12.12.06
A	SHS post details added	12.12.06

REVISION :

JOB TITLE :
New Residence for
Richard & Sue Dyson
Weld Road,
Oakura

4site DESIGN
Ph. : (06) 769 5524 Fax : (06) 769 5525
Mob : 027 2100 564
Email : paul@4sitedesign.co.nz
PO Box 589 52 Gover Street
New Plymouth

SCALE : 1:100
DRAWN : P. Russell
CHECKED : -
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JOB No. : 4128 REVISION : C
SHEET No. : S1-2