Project								TRI	AL PIT No	
Fev	vcott R	oad, Fritwell								TP2
Job No	1105	Date	. 11 15	Ground Level (n	n) Co-O	rdinates ()				
Contractor	195	02	2-11-15					Sh	neet	
BR	OWNF	TELD CONS	ULTANCY	7				51	icci .	1 of 1
				SIKAIA			Dei	AMPI	LES	& IESIS
Depth 0.00-0.20	No	Grass over d	ark brown slig ine to coarse	DESC ghtly sandy gravelly C buff brown limestone	RIPTION LAY. Gravel is . (TOPSOIL)	subangular and				Kemarks/Tests
0.20-0.45		Firm dark bro	own slightly s ine to coarse	andy very gravelly Cl buff brown limestone	AY. Gravel is s (OOLITE)	ubangular and	0.35	I	D	
0.45-1.20	10, 00, 00, 00, 00, 00, 00, 00, 00, 00,	Buff brown s subangular a	slightly clayey nd subrounde	/ locally very clayey s d oolitic limestone. (C	andy GRAVEL (OOLITE)	& COBBLE of				
1.20		No further pr	rogress due to	hard limestone.						
Shoring/S Stability:	Support Sides	: stable.			N 4 1 1			Backf	GEI REN Filled v	NERAL MARKS with arisings etion.
All dimen Scal	C sions in r e 1:18.75	metres Client	CALA H	IOMES	Method/ Plant Used	JCB 3CX		Logge	ed By	JT

Project	Project							RIAL PIT No	
Fev	wcott Road	d, Fritwell					TP3		
Job No		Date	Ground Level (n	n) Co-Ordi	inates ()			11.5	
BC	2195	02-11-15					~		
Contractor			~				Sheet		
BR	OWNFIE	LD CONSULTAN	СҮ					1 of 1	
			STRATA			SAN	IPLE	S & TESTS	
						Depth	No	Remarks/Tests	
Depth 0.00-0.30	No No $\frac{\sqrt{l_{Z}}}{\sqrt{l_{Z}}}$	Grass over dark brown subrounded fine to coar 0.00 - 0.50 Live roots a	DESC slightly sandy gravelly C rse buff brown limestone nd rootlets.	RIPTION CLAY. Gravel is su e. (TOPSOIL)	bangular and				
0.30-0.50									
0.50-1.05	5 00 6° 00 00 00								
1.05		No further progress due	e to hard limestone.						
<u> </u>	~								
Shoring/S Stability:	Support: Sides sta	ble.					G R	EMARKS	
				ът		B	ackfille	d with arisings	
				N		սլ	on con	npletion.	
	A			Ŧ					
D	С	В		Å					
All dimen	isions in met	res Client CALA	HOMES	Method/			ogged I	By	
Scal	le 1:18.75			Plant Used	JCB 3CX			JT	

Project								TRIAL PIT No	
Fev Job No	cott Roa	Date	Ground Level (m) Co-Ordi	nates ()		-	TP4	
BC	195	02-11-15	Ground Lever (in						
Contractor							Sheet		
BR	OWNFIE	LD CONSULTAN	СҮ					1 of 1	
			STRATA			SA	MPLE	S & TESTS	
						Depth	No	Remarks/Tests	
Depth 0.00-0.30	No $\frac{\underbrace{(\underline{M}, \underline{L}_{\underline{Z}})}_{L_{\underline{Z}}}}{\underbrace{(\underline{N}, \underline{L}_{\underline{Z}})}_{L_{\underline{Z}}}}$	Grass over dark brown subrounded fine to coar	DESCH slightly sandy gravelly C rse buff brown limestone.	RIPTION LAY. Gravel is sub (TOPSOIL)	bangular and				
0.30-0.60		Firm brown sandy very coarse buff brown lime	stone. (OOLITE)	is subangular and s	ubrounded fine to				
		0.50	D						
0.60-1.70	Ø.	-							
		subangular and subrour	ided oontic infiestone. (O	OLITE)		0.70	В		
1.70		No turiner progress due	e to naru ninestone.						
Shoring/S Stability:	Support: Sides sta	ıble.					G R Backfille	ENERAL EMARKS	
D	A	B		N + 			pon con	a with ansings npletion.	
All dimens	sions in me	tres Client CALA	HOMES	Method/ Plant Used	ICR 2CV		.ogged H	By IT	

Project								TI	RIAL PIT No	
Fev	vcot	t Roa	d, Fritwell							TD5
Job No			Date		Ground Level (m)	Co-Ordinates ()			IFJ
BC	2195	5	(02-11-15						
Contractor									Shee	t
BR	OW	NFIE	ELD CON	SULTAN	CY					1 of 1
					STRATA			SA	MPLE	ES & TESTS
								Depth	n No	Remarks/Tests
Depth 0.00-0.20	No	<u>N 12</u> 1 <u>7</u> <u>N 1</u>	Grass over subrounded	dark brown fine to coa	DESC slightly sandy gravelly rse buff brown limeston	CRIPTION CLAY. Gra e. (TOPSO)	vel is subangular and L)			
0.20-0.40			Firm brown coarse buff	sandy very brown lime	gravelly CLAY. Grave estone. (OOLITE)	l is subang	lar and subrounded fine to	0.35	FS	
0.40-1.00	0-1.00 Buff brown slightly clayey locally clayey sandy GRAVEL & COBBLE of subangular and subrounded frequently tabular oolitic limestone. (OOLITE)								LS	
1.00		° R 9	No further	progress due	e to hard limestone.			1.00	ES	
Shoring/S Stability:	Supp Sid	oort: les sta	able.				N		R Backfille	ENERAL EMARKS
		A		Ŧ			+		upon coi	npieuoli.
D		С	I	3						
All dimen Scal	All dimensions in metres Scale 1:18.75 Client CALA HOMES Method/ Plant Used JCB 3CX									By JT

Project								RIAL PIT No	
Fev	wcott Road	l, Fritwell						TDC	
Job No		Date	Ground Level (n	n) Co-Ord	inates ()			IPO	
BC	C195	02-11-15							
Contractor							Sheet		
BR	OWNFIE	LD CONSULTANCY	Y					1 of 1	
			STRATA			SAN	ЛРLЕ	S & TESTS	
			51101111			Depth	No	Remarks/Tests	
Depth 0.00-0.30		Grass over dark brown sli subrounded fine to coarse	DESCI ghtly sandy gravelly C buff brown limestone	RIPTION LAY. Gravel is su . (TOPSOIL)	ıbangular and				
0.30-0.50	0.30-0.50 Firm brown sandy very gravelly CLAY. Gravel is subangular and subrounded fine to coarse buff brown limestone. (OOLITE)								
0.50-1.80									
1.80		No further progress due to) hard limestone.						
Shoring/S Stability:	Support: Sides stal	ble.		N		Buj	G R ackfille	ENERAL EMARKS d with arisings apletion.	
D	С	B							
All dimen Scal	All dimensions in metres Scale 1:18.75 Client CALA HOMES Method/ Plant Used JCB 3CX							^{3y} JT	

Project								TR	RIAL PIT No
Fev	cott Road	, Fritwell							TP7
Job No	105	Date		Ground Level (m)) Co-O	rdinates ()			
Contractor	195	02-	11-15					Shoot	
Contractor	OWNEIEI	DCONSU	ITANCV					Sheet	1 of 1
		DCONSO					<u> </u>		
			S	IRATA			SAI	MPLE	S & TESTS
Depth 0.00-1.10	No Cs ss	Grass over soft ubrounded find outh west of p	dark brown sl e to coarse lim it. Extended pi	DESCR ightly sandy gravell estone and red bricl it in a northerly dire	IPTION y CLAY. Grav. c. Two boulder ction. (MADE (el is subangular and sized slabs of concrete in GROUND)			ACHIGINS/ ICSUS
1.10-1.90		Buff brown slig ubrounded free	ghtly clayey lo quently tabula	cally clayey sandy (GRAVEL & CO OOLITE)	OBBLE of subangular and	-		
1.90		No further prog	ress due to ha	rd limestone.			_		
Shoring/Support: Stability: Sides stable. A D C B C									ENERAL EMARKS d with arisings apletion.
All dimensions in metres Scale 1:18.75 Client CALA HOMES Method/ Plant Used JCB 3CX								ogged I	^{3y} JT

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Project								TF	RIAL PIT No
Fev	wcot	t Roa	ad, Fritwell						TP8
Job No	310		Date	Ground Level (1	m) Co	-Ordinates ()			
BC	. 195)	02-11-15					Shoot	t
BR	OW	NFI	ΕΙ Ο CONSULTAN	CV				Silee	1 of 1
							C A I		
				SIRAIA			SA Denth	NO	Remarks/Tests
Depth 0.00-0.20 0.20-0.60	No		Grass over dark brown subrounded fine to coar Firm brown sandy very coarse buff brown lime	DESC slightly sandy gravelly (rse buff brown limestone gravelly CLAY. Grave stone. (OOLITE)	CRIPTION CLAY. Gravel e. (TOPSOIL) l is subangular	is subangular and and subrounded fine to	_		
0.60-1.60		1.50	В						
1.60			No further progress due	e to hard limestone.					
Shoring/S Stability:	Supp Sic	A	able.			N A A	- Fu	G R Backfille ipon cor	ENERAL EMARKS ed with arisings mpletion.
All dimen Scal	sions le 1:1	in me 8.75	etres Client CALA	HOMES	Method/ Plant Used	JCB 3CX	Ι	Logged]	By JT

BROWNFIELD TP FRITWELL LOGS.GPJ GINT STD AGS 3_1.GDT 6/11/15

Project	Project								r	ΓRI	AL PIT No	
Fev	vcott	Road, Fi	ritwell									TP9
Job No]	Date		Ground Level (r	n)	Co-Ordina	tes ()				
BC	2195		02	2-11-15								
Contractor	011.0		CONTR							Sh	eet	1 6 1
BR	OWN	FIELD	CONSU	JLTANCY								1 of 1
					STRATA				SA	MPI	LES	& TESTS
Depth	No	Ux Gras	s over da	urk brown slig	DESC	RIPTION	avel is suba	ngular and	Deptl	n N	0	Remarks/Tests
0.20 0.40	1/	$\frac{1}{2}$	ounded fi	ine to coarse t	welly CLAX Crowel	e. (TOPSO	IL)	rounded fine to	_			
0.20-0.40			se buff bi	rown limestor	e. Locally a clayey g	gravel. (O	DLITE)		_			
0.40-1.70	.40-1.70 (2) But brown slightly clayey locally clayey sandy GRAVEL & COBBLE of subangular and subrounded oolitic limestone. (OOLITE)										5	
										E	s	
	4 0 2 2 4 0 2 2 0 2 2 0 2 2 0 2 2 0 2 2 0 2 2 0 2 2 0 2 2 2 0 2											
1.70		No f	urther pro	ogress due to	hard limestone.							
Shoring/S Stability:	Suppo Side	rt: s stable.									GE REI	NERAL MARKS
D		A	B	Ţ			N + 			Backfi upon c	illed comp	with arisings letion.
		С]	1								
All dimensions in metres Scale 1:18.75 Client CALA HOMES Method/ Plant Used JCB 3CX Logs								Logge	d By	JT		

Project								RIAL PIT No	
Fewc	cott Road,	Fritwell			•		-	TP10	
Job No	0.5	Date	Ground Level (n	n) Co-O	rdinates ()				
BCI	.95	02-11-15					Shoot		
BDO	WNEIEI I	CONSULTANCY	J				Sileet	1 of 1	
BKU	WINFIELI		I						
			STRATA			SAI	MPLE	<u>S & TESTS</u>	
Depth N 0.00-0.50	No Gi to ca	rass over dark brown sar coarse limestone. Forei, n, aluminium and plastic	DESC ndy gravelly CLAY. (gn objects comprise p c sheeting. (MADE G	RIPTION Gravel is subangu lastic bag, cobble ROUND)	alar and subrounded fine e of concrete slab, rusted			Kemarks/Tests	
0.50-0.80		ark brown clayey locally brounded oolitic limesto	/ very clayey sandy G one. (MADE GROUN	RAVEL & COB D)	BLE of subangular and				
0.80-1.60		iff brown slightly clayer brounded oolitic limesto	y locally clayey sandy ne. (OOLITE)	GRAVEL & CO	DBBLE of subangular and				
1.60	N	o further progress due to	hard limestone.						
Shoring/Su Stability: S	Bu	G R Packfille pon con	ENERAL EMARKS ed with arisings npletion.						
All dimensio Scale	All dimensions in metres Scale 1:18.75 Client CALA HOMES Method/ Plant Used I								

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Project								RIAL PIT No
Fev	vcot	t Roa	ad, Fritwell					TD11
Job No			Date	Ground Level (m)	Co-Ordinates ()			
BC	2195		02-11-15				<u> </u>	
Contractor	OW	NICII					Sheet	1 - 6 1
BR	.Ow	NFII	ELD CONSULTANCY					1 01 1
				STRATA		SA	MPLE	S & TESTS
Danth	Na			DESCRIPTI	ON	Depth	No	Remarks/Tests
0.00-0.30	INO		Grass over dark brown sligh subrounded fine to coarse b	atly sandy gravelly CLAY. uff brown limestone. (MA	. Gravel is subangular and DE GROUND)			
0.30-0.60			Dark brown very clayey slig limestone. (MADE GROUN	ghtly sandy gravelly COBI ND)	BLES of subangular and subrounded	0.50	ES	
0.60-1.00			Loose and voided brown ve objects include plastic sheet boulders of tabular tarmac, a asbestos containing roofing					
1.00-1.50			VEL & COBBLE of subangular and					
1.50			No further progress due to h	ard limestone.				
Shoring/S Stability:	Supp	A	able. B 		N Å	Eu	G R Backfille pon cor	ENERAL EMARKS ed with arisings npletion.
All dimen Scal	.ogged I	^{By} JT						

BROWNFIELD TP FRITWELL LOGS.GPJ GINT STD AGS 3_1.GDT 6/11/15

Project								IAL PIT No
Few	vcott Road	, Fritwell						TD12
Job No		Date	Ground Level (m) Co-Ord	inates ()			11 12
BC	2195	02-11-15						
Contractor							Sheet	
BR	OWNFIEL	D CONSULTANCY	Ι					1 of 1
			STRATA			SAN	APLE	S & TESTS
						Depth	No	Remarks/Tests
Depth 0.00-0.25	No cs	Grass over dark brown slig ubrounded fine to coarse	DESCR ghtly sandy gravelly Cl buff brown limestone a	CIPTION LAY. Gravel is su and rare red brick.	bangular and (MADE GROUND)			
0.25-1.40		Dark brown very clayey sl imestone. Foreign objects imestone. Clay is soft and	ightly sandy gravelly (include brick, timber (firm. (MADE GROU	COBBLES of suba larmac, concrete, f ND)	angular and subrounded tile and boulder of	1.00	D	
1 40-1 50		Firm light brown slightly s	andy CLAY (MADE	GROUND)				
1.50.2.50		Duff brown all abd1-	v locally alarger and 1		DIE of onhonce-less 1			
		ubrounded oolitic limesto 2.35 Water strike. Modera	ne. (OOLITE) te ingress. Depth of wa	ater at 2.30m after	30 minutes.			
2.50	- Ka	No further progress due to	hard limestone					
Shoring/S Stability:	Support: Sides stab	ble.					G RI	ENERAL EMARKS
◀────				N L		B ur	ackfille oon com	d with arisings apletion.
D	A C	В		Ţ				
All dimens Scale		ogged E	By JT					

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Project								TF	RIAL PIT No
Fev	vcot	t Roa	ad, Fritwell						TD13
Job No			Date	Ground Level (m	n) Co	-Ordinates ()			1115
BC	C195	5	02-11-15					~	
Contractor				-				Sheet	t
BR	.OW	NFII	ELD CONSULTANCY						1 of 1
				STRATA			SA	MPLE	S & TESTS
							Depth	No	Remarks/Tests
Depth 0.00-0.20	No		Grass over dark brown san to coarse buff brown limes	DESCI dy gravelly CLAY. G tone. (MADE GROU	RIPTION ravel is subar ND)	gular and subrounded fine	_		
0.20-0.40			coarse buff brown limestor	ne and rare concrete. (MADE GRO	and subrounded fine to UND)			
0.40-0.90			Brown very clayey slightly limestone. Foreign objects asbestos containing roofing						
0.90-1.80			Firm brown slightly sandy fine to coarse buff brown l speckling. (MADE GROU	slightly gravelly CLA imestone. Rare pocke ND)	Y. Gravel is a structure of ash. Rare	subangular and subrounded e timber. Carbonaceous	1.00	D	
1.80-2.00			Buff brown slightly clayey subrounded oolitic limesto	locally clayey sandy ne. (OOLITE)	GRAVEL &	COBBLE of subangular and			
2.00			No further progress due to	hard limestone.					
1									
Shoring/S	Shoring/Support:								ENERAL
Stability:	510	ies st	.aoie.			N	E	R Backfille pon cor	EMAKKS ed with arisings npletion.
D		A	B			Î.			
All dimen Scal	All dimensions in metres Scale 1:18.75 Client CALA HOMES Method/ Plant Used JCB 3CX								By JT

BROWNFIELD TP FRITWELL LOGS.GPJ GINT STD AGS 3 1.GDT 6/11/15

Project								TRIAL PIT No			
Fev	vcott Road,	Fritwell								-	
Job No		Date	(Ground Level (n	n)	Co-Ordin	ates ()				1714
BC	C195	02-11	-15								
Contractor									She	eet	
BR	OWNFIEL	D CONSUL	ΓANCY								1 of 1
			STI	RATA				SA	MPL	ES	& TESTS
								Deptl	n N	0	Remarks/Tests
Depth 0.00-0.20	No G	rass over dark b coarse buff bro	orown sandy gr own limestone.	DESC avelly CLAY. C (MADE GROU	RIPTION Gravel is su IND)	bangular a	and subrounded fine				
0.20-1.00	Fc	rm brown sandy barse buff brown	y very gravelly n limestone. (N	CLAY. Gravel	is subangu D)	lar and su	brounded fine to				
1.00-1.60		uff brown slight ibrounded ooliti	tly clayey loca c limestone. (C	lly clayey sandy DOLITE)	GRAVEL	& COBB	LE of subangular ar	d			
1.60	N	o further progre	ss due to hard	limestone.							
Shoring/S Stability:	Support: Sides stab	le.				N + 			Backfi upon c	GEI REM Illed v	NERAL MARKS with arisings letion.
All dimensions in metres Scale 1:18.75 Client CALA HOMES Method/ Plant Used JCB 3CX										d By	JT

Few	cott Roa	d. Fritwell					
ob No		Date	Ground Level (m)	Co-Ordinates ()			TP15
BC	195	04-03-16					
Contractor						Sheet	
BR	OWNFIE	LD CONSULTANC	Y				1 of 1
			STRATA		SAN	APLE:	S & TESTS
					Depth	No	Remarks/Test
Depth 0.00-1.20	No Og = g	Trial trench excavated 17 largely comprised rework slightly gravelly CLAY fi southeast. Rare fragments Buff brown slightly claye subrounded oolitic limest (OOLITE)	DESCRIPTI m long with its long axis tre ed granular oolite to 0.90m. rom 0.90-1.10m containing r s of asbestos sheeting. (MAI y locally clayey sandy GRA one. Materials recorded at 1	ON nding northwest-southeast. Material Horizon of dark brown ashy sandy are metal wire thinning towards the DE GROUND) VEL & COBBLE of subangular and 00m in far southeast of trial trench.	s 0.50 0.70 0.90	ES ES	
Shoring/S Stability:	upport: Sides sta	ble.		N	В	GI RI ackfille	ENERAL EMARKS d with arisings
-	A	₽		4	uj	oon com	pletion.
D	С	B		Ń			

Project	200.0									TF	RIAL PIT No
Fev	cott F	Road, Fritv	vell								TD16
Job No		Date	e		Ground Level (m	1)	Co-Ordinates ()				IFIU
BC	195		04-03	-16							
Contractor										Sheet	1 6 1
BR	OWN.	FIELD CC	DNSULI	ANCY							1 01 1
				S	TRATA				SA	MPLE	S & TESTS
Douth	Na				DECO	DIDTION			Depth	i No	Remarks/Test
0.00-1.00		Trial tre variable COBBL Piece of sheeting	nch excav but gener ES of bric masonry g. (MADE	vated 7m lon ally compris- ck, tarmac, c recovered 1 GROUND)	sed dark brown ver concrete, tile. Wire .50m long by 1.00r	s trending ry clayey s , timber, ri m wide. R	northwest-southeast. lightly sandy gravelly isted metal sheeting. ire fragments of asbe	Materials / Steel pipe. stos	0.50	ES	
									0.80 0.85	ES ES	
1.00-1.20	0.0 20	Buff bro subroun (OOLIT	own slight ded oolitic 'E)	ly clayey loo c limestone.	cally clayey sandy Materials recorded	GRAVEL d at 1.00m	& COBBLE of subation far southeast of tri	ngular and al trench.	-		
Shoring/S Stability:	Sides	rt: s stable.								G R Backfill	ENERAL EMARKS
D		A					N + 			ыасктий	cu with arisings npletion.
All dimens	sions in 2 1:18.7	metres C	lient C.	ALA HO	MES	Method/ Plant Use	d JCB 3C	X	J []	Logged]	By JT

Project								TRIAL PIT No	
Few Job No	vcott Ro	ad, Fritwell	Cround Loval (m)	Co Ordin				TP17	
JOD NO	105	Date 04.02.16	Ground Level (m)	Co-Ordina	ates ()				
Contractor	.195	04-03-10					Sheet		
BR	OWNFI	ELD CONSULTANCY	*					1 of 1	
			STRATA			SAN	ЛРІ F	S & TESTS	
			SIRTIN			Depth	No	Remarks/Tests	
Depth 0.00-0.10	No	Grass over dark brown slig	DESCRIP htly sandy gravelly CLA	TION Y. (MADE GRO)UND)				
0.10-0.80		Trial trench excavated 8m brown slightly clayey local subrounded oolitic limestor GROUND)	long trending northwest- lly very clayey sandy GR ne. Rare subangular cobb	southeast. Materi AVEL & COBB le of concrete an	als comprised buff LE of subangular and d red brick. (MADE	0.30	ES		
0.80		No further progress due to	encountering concrete. P	ossible sewer.		-			
Shoring/S Stability:	Support: Sides st	B		N + 			G Rl ackfille	ENERAL EMARKS d with arisings apletion.	
All dimens	sions in m e 1:18.75	etres Client CALA H	OMES Ma	ethod/ ant Used	JCB 3CX		ogged H	^{3y} JT	

Project							TRIAL PIT No			
Fey	wcott R	load, F	ritwell							TD10
Job No			Date		Ground Level (r	n)	Co-Ordinates ()			IFIO
BC	C195		04	-03-16						
Contractor	•								Shee	t
BR	OWNF	FIELD	CONSU	JLTANCY						1 of 1
				S	TRATA			SA	MPLE	ES & TESTS
								Dept	n No	Remarks/Tests
Depth 0.00-0.20		Gra Gra subi	ss over da rounded fi	rk brown slight ine to coarse but	DESC ly sandy slightly g ff brown limestone	RIPTION ravelly CL e. (TOPSO	AY. Gravel is subangular a L)	und 0.10	ES	
0.20-0.40		Firn subi	n dark bro rounded fi	own slightly sand ine to coarse but	dy very gravelly C ff brown limestone	LAY. Gra e. (OOLITI	vel is subangular and E)			
0.40-0.70	0000	Buf Suba	f brown sl angular an	lightly clayey lo ad subrounded o	ocally very clayey solitic limestone. (C	sandy GRA OOLITE)	VEL & COBBLE of			
2										
5										
Shoring/Stability:	Support Sides	t: stable							C R	GENERAL EMARKS
							N ↓		Backfille upon cor	ed with arisings mpletion.
	Α			Ŧ			† 1			
	С	1	В	L L						
All dimen	isions in	metres	Client	CALA HO	MES	Method/	d ICD 2CV		Logged	By IT
Scal	ie 1:18./3	J					JUD JUA			JI

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Project								Г	TRIAL PIT No		
Fev	wcott	Road,	Fritwell								TD10
Job No			Date		Ground Level (r	n)	Co-Ordin	ates ()			1619
BC	C195		04	-03-16							
Contractor										She	eet
BR	OWI	NFIELI	D CONSU	JLTANCY							1 of 1
					STRATA				SA	AMPL	ES & TESTS
									Dept	h No	Remarks/Tests
Depth 0.00-0.15	No	$\frac{\sqrt{1}}{\sqrt{2}}$ Gr	ass over da	urk brown sand ine to coarse b	DESC dy slightly gravelly C ouff brown limestone	CLAY. Gra CLAY. Gra e. (TOPSO)	vel is sub L)	angular and			
0.15-0.40		- <u>°</u> Fri su	rm dark bro brounded fi	own slightly sa ine to coarse b	undy very gravelly C ouff brown limestone	LAY. Grav e. (OOLITH	vel 1s suba E)	ngular and			
0.40-0.80			ıff brown v litic limeste	ery clayey sar one. (OOLITE	dy GRAVEL & CO !)	BBLE of s	ubangular	and subrounded	0.35	ES	3
Shoring/S Stability:	Suppo	ort: es stabl A C	е. В	Ţ			N 4 1] Backfil upon co	GENERAL REMARKS lled with arisings ompletion.
All dimen Scal	sions e 1:18	in metres	Client	CALA H	OMES	Method/ Plant Use	d	JCB 3CX		Logged	i By JT

Project					TRIAL PIT No
Fewcott Road	l, Fritwell				ТРОЛ
Job No	Date	Ground Level (m)	Co-Ordinates ()		11720
BC195	04-03-16				
Contractor					Sheet
BROWNFIEI	LD CONSULTANCY	•			1 of 1
		STRATA		SAN	MPLES & TESTS
ļ				Depth	No Remarks/Tests
Depth No 0.00-0.10 0.10-0.50	Grass over dark brown san subrounded fine to coarse b Firm dark brown slightly sa subrounded fine to coarse b	DESCRI dy slightly gravelly CL. ouff brown limestone. (' andy very gravelly CLA ouff brown limestone. ((PTION AY. Gravel is subangular and TOPSOIL) Y. Gravel is subangular and OOLITE)	0.05	ES
	Buff brown slightly clayey subrounded oolitic limestor	locally clayey sandy G ne. (OOLITE)	RAVEL & COBBLE of subar	ngular and	
Shoring/Support: Stability: Sides stal	ble.		N + 	Buy	GENERAL REMARKS ackfilled with arisings pon completion.
C All dimensions in metr Scale 1:18.75	res Client CALA H	OMES M P	Iethod/ lant Used JCB 3C	X	ogged By JT

Project							TF	RIAL PIT No
Fev	wcott Road	l, Fritwell						TD91
Job No		Date	Ground Level (n	n) Co	o-Ordinates ()			1721
BC	C195	04-03-16						
Contractor							Sheet	:
BR	OWNFIEI	LD CONSULTAN	CY					1 of 1
			STRATA			SAI	MPLE	S & TESTS
						Depth	No	Remarks/Tests
Depth	No		DESC	RIPTION				
0.00-0.10		Grass over dark brown subrounded fine to coar	slightly sandy gravelly C rse buff brown limestone	LAY. Grave	l is subangular and			
0.10-0.40		Firm dark brown slight	ly sandy gravelly CLAY.	Gravel is su	bangular and subrounded fine			
		to coarse buff brown lin	mestone. (OOLITE)					
0.40-0.60		Buff brown clayey sand	dy GRAVEL & COBBLI	E of subangu	ar and subrounded oolitic	0.40	ES	
		innestone. (OOLITE)						
						1		
Shoring/S	Support:						G	ENERAL
Stability:	Sides stal	ole.					R	EMARKS
200					N	В	ackfille	d with arisings
		►			4	u	pon con	npletion.
	А				1			
D		В			N			
	С							
All dimen	sions in metr	res Client CALA	A HOMES	Method/		L	ogged I	By
g Scal	e 1:18.75			Plant Used	JCB 3CX			JT

Project									TF	RIAL PIT No
Fey	wcott Road	, Fritwell								троо
Job No		Date		Ground Level (r	n)	Co-Ordinates ()				1722
BC	C195	04	4-03-16							
Contractor	•								Sheet	İ.
BR	OWNFIE	LD CONS	ULTANCY							1 of 1
			S	TRATA				SAN	/IPLE	S & TESTS
								Depth	No	Remarks/Tests
Depth 0.00-0.10 0.10-0.40	No	Grass over da subrounded f Firm dark bro subrounded f	ark brown slight fine to coarse buf own slightly sand fine to coarse buf	DESC ly sandy gravelly C ff brown limestone dy very gravelly C ff brown limestone	RIPTION CLAY. Gra 2. (TOPSO) LAY. Grav 2. (OOLITH	avel is subangular ar L) vel is subangular and S)	nd d	0.10	ES	
0.40-0.80	1	Buff brown s subangular a	slightly clayey lo nd subrounded o	cally very clayey s olitic limestone. (C	sandy GRA OOLITE)	VEL & COBBLE o	of			
Shoring/S Stability:	Support: Sides stal	ble.				N		Baup	G R ackfille	ENERAL EMARKS ed with arisings npletion.
	A C	B		MES	Method	T.				39
All dimen	lsions in meti le 1:18.75	es Client	CALA HU	WES	Plant Use	d JCB 3	СХ		lgged I	JT

Project		•							TF	RIAL PIT No
Few	cott Ro	oad, Fritwell								
Job No		Date		Ground Level (n	n) Co-C	Ordinates ()				TP23
BC	195	04	-03-16							
Contractor									Sheet	
BRO	OWNF	IELD CONSU	JLTANCY							1 of 1
				STRATA				SA	MPLE	S & TESTS
								Depth	No	Remarks/Tests
Depth 0.00-0.60 0.60-0.80	No Q Q Q Q Q Q Q Q Q Q Q Q Q Q Q Q Q Q Q	Grass over so subrounded fi (MADE GRC Buff brown sl subangular an	ft brown sligh ne to coarse b DUND) ightly clayey d subrounded	DESC ttly sandy gravelly C uff brown limestone locally very clayey s oolitic limestone. (C	RIPTION LAY. Gravel is . Rare subangul andy GRAVEL OOLITE)	subangular and ar cobble of conc & COBBLE of	erete. ().50	ES	
Shoring/S Stability:	upport: Sides s	stable.	Ţ					Eu	G R Backfille pon con	ENERAL EMARKS d with arisings npletion.
All dimens Scale	ions in n 21:18.75	netres Client	CALA H	OMES	Method/ Plant Used	JCB 3C	X		ogged I	^{3y} JT

Project							TF	RIAL PIT No			
Fev	wcott l	Road,	Fritwell								TD9/
Job No			Date		Ground Level (m)	Co	-Ordinates ()				1624
BC	C195		04	-03-16							
Contractor										Sheet	i.
BR	OWN	FIELI	D CONSU	JLTANCY							1 of 1
				S	STRATA				SA	MPLE	S & TESTS
									Depth	No	Remarks/Tests
Depth 0.00-0.20		$\frac{I_{z}}{\frac{\lambda I}{U}}$ Gi	ass over da brounded fi	rk brown sligh ne to coarse bu	DESCRII tly sandy gravelly CLA ff brown limestone. (1	PTION AY. Gravel FOPSOIL)	is subangular a	nd	0.10	ES	
0.20-0.50		<u>○</u> Fi _ su 	rm dark bro brounded fi	wn slightly sar ne to coarse bu	ndy very gravelly CLA ff brown limestone. (C	Y. Gravel OOLITE)	is subangular an	ıd			
0.50-1.00	0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0		ıff brown sl bangular an	ightly clayey lo id subrounded o	ocally very clayey sand politic limestone. (OOI	dy GRAVI LITE)	EL & COBBLE	of			
1.00	8 2 2 2	No No	o further pro	ogress due to er	ncountering hard bedro	ock.			0.90	ES	
Shoring/Stability:	Sides	rt: s stabl <u>A</u>	е.	Ĭ			N 		E	G R Backfille pon cor	ENERAL EMARKS ed with arisings npletion.
All dimen Scal	sions ir e 1:18.7	n metres 75	Client	CALA HC	OMES M	lethod/ lant Used	JCB 3	CX		.ogged l	^{By} JT

Project					TF	RIAL PIT No
Fewcott Road, F	Fritwell					TD25
Job No	Date	Ground Level (m)	Co-Ordinates ()			IFZJ
BC195	04-03-16					
Contractor					Sheet	
BROWNFIELD	CONSULTANCY					1 of 1
	S	TRATA		SAM	MPLE	S & TESTS
				Depth	No	Remarks/Tests
Depth 0.00-0.40	ass over soft brown slightly rounded fine to coarse but acrete. Single whole red br	DESCRIPT y sandy gravelly CLAY. ff brown limestone. Rare ick. (MADE GROUND	ION . Gravel is subangular and e subangular cobble and boulder of)			
0.40-0.90	ff brown slightly clayey lo angular and subrounded o	cally very clayey sandy olitic limestone. (OOLI'	GRAVEL & COBBLE of TE)	0.35	ES	
Shoring/Support: Stability: Sides stable			N ↓	Buj	G R ackfille pon con	ENERAL EMARKS Ed with arisings npletion.
All dimensions in metres Scale 1:18.75	Client CALA HO	MES Meti Plan	hod/ t Used JCB 3CX		ogged I	^{By} JT

TP26 Jok No Date Contracts () State: State: State: State: TP26 Contractor State: TP26 Contractor State: To f 1 Contractor State: To f 1 Contractor State: To f 1 Contractor	Project							TF	RIAL PIT No
Job No Date Ground Level (m) Co-Ordinates () IT # 20 Contractor Sheet 1 of 1 1 Contractor STRATA SAMPLES & TESTS Depth No A Crass over dark brown slightly sady greatby CLAY. Gravel is subangular and subrounded fine to coare 0.15 Is 0.00-0.010 0 State to coare buff worn limestone. (COD-CITE) 0.15 Is Is 0.00-0.02 1 State to coare buff worn limestone. (COLTE) 0.15 Is Is 0.00-0.03 1 State to coare buff worn limestone. (COLTE) 0.15 Is Is 0.00-0.04 1 State to coare buff worn limestone. (COLTE) Is Is Is 0.00-0.04 1 State to coare buff worn limestone. (COLTE) Is Is Is 0.00-0.04 1 Is Is Is Is Is Is 0.00-0.04 1 Is Is Is Is Is Is 0.00-05 Is Is Is Is Is Is Is Is 0.00-05 Is	Fev	wcott Road	, Fritwell						TD26
BC195 04-03-16 Steel It of 1 BROWNFIELD CONSULTANCY Steel I of 1 STRATA SAMPLES & TESTS Depth N No Remarks/Tests Dopth N 2 Grass over data box on digitaly subget CLAYC (Serie) Depth No Remarks/Tests Dopth N 2 Grass over data box on digitaly clavely for any subget CLAYC (Serie) Depth No Remarks/Tests Dopth N 2 Grass over data box on digitaly clavely for any subsequer and subs	Job No		Date	Ground Le	vel (m)	Co-Ordinates ()			1720
Sub-Construct STRATA International Construct STRATA STRATA SAMPLES & TESTS Depth No Remarks/Tests Submining the course biff three in course biff three in course biff three in linestone: (OOLITE) OLITES Submining colspan="2">Submining colspan="2">Colspan="2"Colspan="2"Colspan="2"Colspan="2"Colspan="2"Colspan="2"Colspan="2"Colspan="2"Colspan="2"Colspan="2"Colspan="2"Colspan="2"Colspan="2"Colspan="2"Colspan="2"Colspan="2"Colspan="2"Colsp	BC	C195	04-03-1	6					
BROWNFIELD CONSULTANCY I of 1 STRATA STRATA SAMULES & TESTS Depth No Remarks/Tests Depth From bimscience, (OOLITE) 0.15 ES Depth Safe Transmissione, (OOLITE) No Remarks/Tests Safe Transmissione, (OOLITE) Buff Thrown slipshy charky standy GRAVEL & COBBLE of subangular and subrounded fire to course 0.15 ES Safe Transmissione, (OOLITE) Buff Thrown slipshy charky standy GRAVEL & COBBLE of subangular and subrounded fire to course 0.15 ES Safe Transmissione, (OOLITE) Buff Thrown slipshy charky standy GRAVEL & COBBLE of subangular and subrounded fire to course 0.15 ES Safe Transmissione E E E E	Contractor	•						Sheet	t
STRATA Depth No Remarks/Tests DECCRIPTION Depth No Remarks/Tests Sintering to colspan="4"Depth andis (Colspan="4"	BR	OWNFIEI	D CONSULTA	NCY					1 of 1
Depth No DESCRIPTION DESCRIPTION subangular and 0.000.00 Image: Subangular and Subangular and Subrounds fine to coarse 0.15 ES 0.100.40 Image: Subangular and Subangular and Subrounds fine to coarse 0.15 ES 0.400.90 Image: Subangular and Subangular and Subangular and Subrounds fine to coarse 0.15 ES 0.400.90 Image: Subangular and Sub				STRATA			SAN	MPLE	S & TESTS
Depth 0000.00 No Crass over dark brown sightly agravely CLX. Gravel is subangular and 0.100.04 0.15 ES 9 Firm brown sings gravely CLX. Gravel is subangular and subrounded fine to ccause of thrown linestone. (OOLTE) 0.15 ES 0.400.030 Buff brown singshifty clayey locally clayey sandy GRAVEL & COBBLE of subangular and subrounded obline filmestone. (OOLTE) 0.15 ES 0.400.930 Buff brown singshifty clayey locally clayey sandy GRAVEL & COBBLE of subangular and subrounded obline filmestone. (OOLTE) Image: Subrounded filmestone. (OOLTE) Image: Subrounded filmestone. (OOLTE) 0.400.930 Subrounded obline filmestone. (OOLTE) Image: Subrounded filmestone. (OOLTE) Image: Subrounded filmestone. (OOLTE) 0.400.931 Image: Subrounded filmestone. (OOLTE) Image: Subrounded filmestone. (OOLTE) Image: Subrounded filmestone. (OOLTE) 0.400.931 Image: Subrounded filmestone. (OOLTE) Image: Subrounded filmestone. (OOLTE) Image: Subrounded filmestone. (OOLTE) 0.400.931 Image: Subrounded filmestone. (OOLTE) Image: Subrounded filmestone. (OOLTE) Image: Subrounded filmestone. (OOLTE) 1.400.400.400 Image: Subrounded filmestone. (Image: Subrounded filmes							Depth	No	Remarks/Tests
0.000-0.00 2.1 Circles over date forow sightly stating stat	Depth	No		E	DESCRIPTION	· · · · · ·			
0.109.40 Image: Construction of the state of the s	0.00-0.10		ubrounded fine to c	oarse buff brown lime	elly CLAY. Gr stone. (TOPSO	DIL)			
0.40.90 0.40.90 Buf brown slightly clayey locally clayey sandy GRAVEL & COBBLE of subangular and subconded onlite limestone. (OOLITE) Subconded onlite limestone. (OOLITE) Stability: Sides stable. All dimensions in metres Client CALA HOMES Method/ Plant Used JCB 3CX Logged By JT	0.10-0.40		Firm brown sandy gr	avelly CLAY. Gravel	is subangular a	and subrounded fine to coarse	0.15	ES	
0.40.090 0.40.090 Buff brown slightly clayey locally clayey sandy GRAVEL & COBBLE of subangular and subcounded collitic limestone. (OOLITE) Image: Completion of the subscript of the subscrited of the subscript of the subscrited of the			uir brown mileston	(OOLITE)					
0.40-0.50 Solution backwise status Solution and status Solution and status Shoring/Support: Status Status Status Status Status Status Status D C B Image: Status Status All dimensions in metres Clicent CALA HOMES Method/ Plant Used JCB 3CX Logged By JT	0.40.0.00			1 1 11 1			-		
Shoring/Support: Stability: Sides stable.	0.40-0.90		ubrounded oolitic li	mestone. (OOLITE)	sandy GRAVE	L & COBBLE of subangular and			
Shoring/Support: Stability: Sides stable.		20							
Shoring/Support: Stability: Sides stable.		0-70							
Shoring/Support: Stability: Sides stable.		8 D							
Shoring/Support: Stability: Sides stable. Image: Stab		20					-		
Shoring/Support: Stability: Sides stable.									
Shoring/Support: Stability: Sides stable.									
Shoring/Support: Stability: Sides stable.									
Shoring/Support: Stability: Sides stable.									
Shoring/Support: Stability: Sides stable.									
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Shoring/Support: Stability: Sides stable.									
Shoring/Support: Stability: Sides stable.									
Shoring/Support: Stability: Sides stable.									
Shoring/Support: Stability: Sides stable. D C All dimensions in metres Client CALA HOMES Method/ Plant Used JCB 3CX Logged By JT									
Shoring/Support: Stability: Sides stable. A D C All dimensions in metres Scale 1:18.75 Client CALA HOMES Method/ Plant Used JCB 3CX JCB 3CX Logged By JT									
Shoring/Support: Stability: Sides stable. A D C All dimensions in metres Scale 1:18.75 C C C C C C C C C C C C C									
Shoring/Support: Shoring/Support: Stability: Sides stable. Image: Constraint of the stability: Image: Constraint of the stability of									
Shoring/Support: Stability: Sides stable.									
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Shoring/Support: Stability: Sides stable. Image: Constraint of the stability: Sides stability: Sides stability: Sides stable. Image: Constraint of the stability: Sides stabil									
Shoring/Support: Stability: Sides stable. Image: Constraint of the stable of the stab	,								
Shoring/Support: Stability: Sides stable. A D C A A A C A A C B C C C C C C C C C C C C C									
Shoring/Support: Stability: Sides stable. A D C All dimensions in metres Scale 1:18.75 C C C C C C C C C C C C C									
Shoring/Support: Stability: Sides stable. A C A C A C C C C C									
Shoring/Support: Stability: Sides stable. A D C C B C C C C C C C C C C C C C C C C									
Stability: Sides stable. A A C C C C C C C C C C C	Shoring/S	Support:						G	ENERAL
A Backfilled with arisings upon completion. D B C C All dimensions in metres Scale 1:18.75 Client CALA HOMES Method/ JCB 3CX Logged By JT	Stability:	Sides stab	ole.					R	EMARKS
A A C All dimensions in metres Scale 1:18.75 Client CALA HOMES Method/ Plant Used JCB 3CX JCB 3CX JCB 3CX						N	B	ackfille	ed with arisings
A D C All dimensions in metres Scale 1:18.75 Client CALA HOMES Method/ Plant Used JCB 3CX Logged By JT	 	<u> </u>	▶			4		001	- <u>r</u> -eao
D B B C C C C C C C C C C C C C C C C C		A	T						
C Method/ Logged By All dimensions in metres Client CALA HOMES Method/ Scale 1:18.75 Client CALA HOMES JCB 3CX	D		В			7			
All dimensions in metres Scale 1:18.75 Client CALA HOMES Method/ Plant Used JCB 3CX Logged By JT		С	¥						
Scale 1:18.75 CALA HOIVIES Michael JCB 3CX Logged By JT	A 11 12		Client CAT	A HOMES	Matha 1/			oggadi	By
	All dimen Scal	isions in metri le 1:18.75	es Chem CAI	LA NUMES	Plant Us	ed JCB 3CX		oggeu I	JT

The **Brown**field Consultancy

Project	0200	1000					TF	RIAL PIT No
Fev	vcot	t Roa	nd, Fritwell					TD 27
Job No			Date	Ground Level (m)	Co-Ordinates ()			1621
BC	C195		04-03-16					
Contractor	0111						Sheet	
BR	.Ow	NFIE	ELD CONSULTANCY					l of l
				STRATA		SAI	MPLE	S & TESTS
						Depth	No	Remarks/Tests
Depth 0.00-0.20	No		Loose dark brown locally b aungular to subrounded lim (MADE GROUND)	DESCRIPTI lack very sandy very claye estone, concrete and red b	ON y GRAVEL and COBBLE of rick. Suspected asbestos sheeting.			
0.20-0.75			Brown locally grey slightly subrounded limestone, con sheeting. (MADE GROUN	clayey, sandy GRAVEL a rete and red brick. Numer D)	nd COBBLE of aungular to ous pieces of suspected asbestos	0.25	ES	
0.75-0.90			Firm brown sandy gravelly buff brown limestone. (OO	CLAY. Gravel is subangu LITE)	lar and subrounded fine to coarse			
0.90			Investigation of a small over are recorded from top of sto	ergrown stockpile. Trial pit ockpile above ground level	terminated in virgin soils. Depths			
Shoring/S Stability:	Supp Sid	ort: les sta	able.				G	ENERAL EMARKS
 -		A	►		N H	B u	ackfille pon con	ed with arisings npletion.
D		С	В		R			
All dimen Scal	sions e 1:1	in me 8.75	Client CALA H	OMES Meth Plant	nod/ t Used JCB 3CX		ogged I	^{By} JT

BROWNFIELD TP FRITWELL LOGS.GPJ GINT STD AGS 3_1.GDT 7/4/16

Project										TF	RIAL PIT No
Fev	wcott	Road,	Fritwell								троо
Job No			Date		Ground Level (r	n)	Co-Ordinates ()				1720
BC	C195		04	-03-16							
Contractor										Sheet	t
BR	OWN	NFIELI	O CONSU	ULTANCY							1 of 1
				(STRATA				SA	MPLE	ES & TESTS
									Depth	No	Remarks/Tests
Depth 0.00-0.10 0.10-0.70	No		ose black a coarse bric m dark bro	and grey slight k, tile and cond own slightly sa	DESC ly clayey very sandy crete. Rare metal wi ndy very gravelly C	CRIPTION y GRAVEI ire. (MAD LAY. Grave	c of angular to subi E GROUND) rel is subangular an	rounded fine	0.05	ES	
0.70		sul	al pit exca	vated into an a	uff brown limestone	e. (OOLITI	() ge for a commerci	al roofer.			
		Nu	imerous tile	es at the surfac	re.		6				
Shoring/S Stability:	Suppo Side	ort: es stable	¢. ►				N		Eu	G R Backfille pon cor	ENERAL EMARKS ed with arisings npletion.
D		A C	В	T Y			†				
All dimen Scal	isions i le 1:18	in metres	Client	CALA HO	OMES	Method/ Plant Use	d JCB	3CX	L	ogged l	By JT

Project						TR	RIAL PIT No
Fev	wcott Road	, Fritwell					TD20
Job No		Date	Ground Level (m)	Co-Ordinates ()			1723
BC	2195	04-03-16					
Contractor						Sheet	
BR	OWNFIEL	D CONSULTANCY					1 of 1
			STRATA		SAN	MPLE	S & TESTS
					Depth	No	Remarks/Tests
Depth 0.00-0.30	No I f	loose black locally grey sl ine to coarse tile, brick, co GROUND)	DESCRIPTI ightly clayey very sandy G ncrete and glass. Rare meta	ON RAVEL of angular to subrounded al pipe. Plastic bag. (MADE	0.25	EC	
0.30-1.10		irm dark brown slightly sa ubrounded fine to coarse b	ndy very gravelly CLAY. uff brown limestone. (OOl	Gravel is subangular and LITE)		ES	
1.10-1.30		Buff brown slightly clayey ubangular and subrounded	locally very clayey sandy (oolitic limestone. (OOLIT	GRAVEL & COBBLE of E)			
1.30		rnal pit excavated into an a Numerous tiles at the surfa	area formerly occupied by a ce.	storage for a commercial roofer.			
Shoring/S Stability:	Support: Sides stab	B			B	G R ackfille pon con	ENERAL EMARKS
All dimen Scal	sions in metro e 1:18.75	es Client CALA H	OMES Meth Plant	od/ Used JCB 3CX		ogged I	^{3y} JT

APPENDIX E

Geotechnical Laboratory Results





Contract Number: 29005

Client's Reference: BC195

Laboratory Report

Report Date: 30-11-2015

Client The Brownfield Consultancy Ltd Woodstock Memorial Road Fenny Compton Warwickshire CV47 2XU

Contract Title: Fritwell For the attention of: Jim Twaddle

Date Received: 11-11-2015 Date Commenced: 11-11-2015 Date Completed: 30-11-2015

Test Description

Moisture Content 1377 : 1990 Part 2 : 3.2 - * UKAS

4 Point Liquid & Plastic Limit (LL/PL) 1377 : 1990 Part 2 : 4.3 & 5.3 - * UKAS

PSD Wet Sieve method 1377 : 1990 Part 2 : 9.2 - * UKAS

Disposal of Samples on Project

Notes: Observations and Interpretations are outside the UKAS Accreditation

- * denotes test included in laboratory scope of accreditation
- # denotes test carried out by approved contractor
- @ denotes non accredited tests

This certificate is issued in accordance with the accreditation requirements of the United Kingdom Accreditation Service. The results reported herein relate only to the material supplied to the laboratory. This certificate shall not be reproduced in full, without the prior written approval of the laboratory.

Approved Signatories:

Alex Wynn (Associate Director) - Benjamin Sharp (Contracts Manager) - Emma Sharp (Office Manager) Paul Evans (Quality/Technical Manager) - Vaughan Edwards (Managing Director) Qty

4

4

2

Client ref:	BC195
Location:	Fritwell
Contract Number:	29005-111115

Hole	Sample	Tuno	Denth (m)	Description of Sample*
Number	Number	туре		
TP2		D	0.35	Brown fine to medium gravelly fine to coarse sandy very silty CLAY.
TP4		D	0.50	Brown fine to coarse gravelly fine to coarse sandy silty CLAY.
TP12		D	1.00	Brown fine gravelly fine to coarse sandy silty CLAY.
TP13		D	1.00	Brown fine gravelly fine to coarse sandy silty CLAY.

Note: Results on this table are in summary format and may not meet the requirements of the relevant standards, additional information is held by the laboratory



For and behalf of GEO Site & Testing Services Ltd

Authorised By: **Paul Evans (Quality/Technical Manager)** Date: 30.11.15



Test Report: Method of the Determination of the plastic limit and plasticity index BS 1377 : Part 2 : 1990 Method 5

Client ref:	BC195
Location:	Fritwell
Contract Number:	29005-111115

Hole/			Moisture	Liquid	Plastic	Plasticity	%	
Sample	Sample	Depth	Content	Limit	Limit	Index	Passing	Remarks
Number	Туре	m	%	%	%	%	.425mm	
			Cl. 3.2	Cl. 4.3/4.4	Cl. 5.	Cl. 6.		
TP2	D	0.35	19	41	24	17	75	CI Intermediate Plasticity
TP4	D	0.50	18	47	23	24	58	CI Intermediate Plasticity
TP12	D	1.00	21	48	21	27	87	CI Intermediate Plasticity
TP13	D	1.00	30	53	22	31	86	CH High Plasticity
Symbols:	•	NP : Non Plas	stic # : Li	quid Limit a	nd Plastic Li	mit Wet Siev	ved	
		PL	ASTICITY C	HART FOR C	ASAGRAND	E CLASSIFIC	ATION.	

BS 5930:1999+A2:2010





For and behalf of GEO Site & Testing Services Ltd

Authorised By: Paul Evans (Quality/Technical Manager) Date: 30.11.15



Test Report:

Particle Size Distribution Test BS 1377 Part 2:1990.

Wet Sieve, Clause 9.2

Client ref:	BC195	Sample Number:	
Contract Number:	29005-111115	Depth from (m):	0.70
Hole Number:	TP4	Depth to (m):	0.80
		Sample Type:	В
Location:	Fritwell		
Description:	Brown silty sandy GRAVEL with cobbles		



Remarks:

#- not determined



For and behalf of GEO Site & Testing Services Ltd

Authorised By: Paul Evans (Quality/Technical Manager)





Test Report:

Particle Size Distribution Test BS 1377 Part 2:1990.

Wet Sieve, Clause 9.2

Client ref	: BC	2195	Sample Number:	
Contract	Number: 29	005-111115	Depth from (m):	1.50
Hole Num	nber: TF	8	Depth to (m):	
			Sample Type:	В
Location:	Frit	well		
Description	on: Bro	wn silty sandy GRAVEL with cobbles		



Remarks:

#- not determined



For and behalf of GEO Site & Testing Services Ltd

Authorised By: Paul Evans (Quality/Technical Manager)



Date: 30.11.15

2788

APPENDIX F

Chemical Laboratory Results



Jim Twaddle The Brownfield Consultancy Woodstock Memorial Road Fenny Compton Warwickshire CV47 2XU



i2 Analytical Ltd. 7 Woodshots Meadow, Croxley Green Business Park, Watford, Herts, WD18 8YS

t: 01923 225404 f: 01923 237404 e: reception@i2analytical.com

e: jim.twaddle@brownfieldconsultancy.co.uk

Analytical Report Number : 15-82288

Project / Site name:	Fritwell	Samples received on:	10/11/2015
Your job number:	BC195	Samples instructed on:	11/11/2015
Your order number:		Analysis completed by:	18/11/2015
Report Issue Number:	1	Report issued on:	19/11/2015

Samples Analysed:

Signed:

3 soil samples, 1 buk sample



Rexona Rahman Reporting Manager For & on behalf of i2 Analytical Ltd.

Other office located at: ul. Pionierów 39, 41 -711 Ruda Śląska, Poland

Standard sample disposal times, unless otherwise agreed with the laboratory, are :

Emma Winter Assistant Reporting Manager For & on behalf of i2 Analytical Ltd.

soils	 4 weeks from reporting
leachates	- 2 weeks from reporting
waters	- 2 weeks from reporting
asbestos	- 6 months from reporting

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Project / Site name: Fritwell

Lab Sample Number				505622	505623	505624	
Sample Reference				TP5	TP5	TP9	
Sample Number				ES	ES	ES	
Depth (m)	0.35	1.00	0.60				
Date Sampled	02/11/2015	02/11/2015	02/11/2015				
Time Taken	None Supplied	None Supplied	None Supplied				
Analytical Parameter (Soil Analysis)	Units	Limit of detection	Accreditation Status				
Stone Content	%	0.1	NONE	< 0.1	< 0.1	< 0.1	
Moisture Content	%	N/A	NONE	17	7.2	7.2	
Total mass of sample received	0.18	0.57	0.43				
General Inorganics							

рН	pH Units	N/A	MCERTS	7.6	7.8	7.8					
Water Soluble Sulphate (2:1 Leachate Equivalent)	g/l	0.00125	MCERTS	0.0098	0.0059	0.0079					





Project / Site name: Fritwell

Lab Sample Number				505625		
Sample Reference				TP11		
Sample Number	ES					
Depth (m)	0.50					
Date Sampled	02/11/2015					
Time Taken				None Supplied		
Analytical Parameter (Bulk Analysis)	Units	Limit of detection	Accreditation Status			
Asbestos Identification Name	Туре	N/A	ISO 17025	Chrysotile- Hard/cement type material		





Project / Site name: Fritwell

* These descriptions are only intended to act as a cross check if sample identities are questioned. The major constituent of the sample is intended to act with respect to MCERTS validation. The laboratory is accredited for sand, clay and loam (MCERTS) soil types. Data for unaccredited types of solid should be interpreted with care.

Stone content of a sample is calculated as the % weight of the stones not passing a 10 mm sieve. Results are not corrected for stone content.

Lab Sample Number	Sample Reference	Sample Number	Depth (m)	Sample Description *
505622	TP5	ES	0.35	Brown loam and clay.
505623	TP5	ES	1.00	Light brown sandy loam with gravel.
505624	TP9	ES	0.60	Light brown sandy loam with gravel.





Project / Site name: Fritwell

Water matrix abbreviations: Surface Water (SW) Potable Water (PW) Ground Water (GW)

Analytical Test Name	Analytical Method Description	Analytical Method Reference	Method number	Wet / Dry Analysis	Accreditation Status
Asbestos identification in Bulks	Asbestos Identification with the use of polarised light microscopy in conjunction with disperion staining techniques.	In house method based on HSG 248	A001-PL	W	ISO 17025
Moisture Content	Moisture content, determined gravimetrically.	In-house method based on BS1377 Part 3, 1990, Chemical and Electrochemical Tests	L019-UK/PL	W	NONE
pH in soil (automated)	Determination of pH in soil by addition of water followed by electrometric measurement.	In-house method based on BS1377 Part 3, 1990, Chemical and Electrochemical Tests	L099-PL	D	MCERTS
Stones content of soil	Standard preparation for all samples unless otherwise detailed. Gravimetric determination of stone > 10 mm as % dry weight.	In-house method based on British Standard Methods and MCERTS requirements.	L019-UK/PL	D	NONE
Sulphate, water soluble, in soil	Determination of water soluble sulphate by ICP- OES. Results reported directly (leachate equivalent) and corrected for extraction ratio (soil equivalent).	In-house method based on BS1377 Part 3, 1990, Chemical and Electrochemical Tests, 2:1 water:soil extraction, analysis by ICP- OES.	L038-PL	D	MCERTS

For method numbers ending in 'UK' analysis have been carried out in our laboratory in the United Kingdom.

For method numbers ending in 'PL' analysis have been carried out in our laboratory in Poland. Soil analytical results are expressed on a dry weight basis. Where analysis is carried out on as-received the results obtained are multiplied by a moisture correction factor that is determined gravimetrically using the moisture content which is carried out at a maximum of 30oC.



Jim Twaddle The Brownfield Consultancy Woodstock Memorial Road Fenny Compton Warwickshire CV47 2XU



i2 Analytical Ltd. 7 Woodshots Meadow, Croxley Green Business Park, Watford, Herts, WD18 8YS

t: 01923 225404 f: 01923 237404 e: reception@i2analytical.com

e: jim.twaddle@brownfieldconsultancy.co.uk

Analytical Report Number : 16-12830

Project / Site name:	Fritwell	Samples received on:	08/03/2016
Your job number:	BC195	Samples instructed on:	08/03/2016
Your order number:		Analysis completed by:	17/03/2016
Report Issue Number:	1	Report issued on:	17/03/2016
Samples Analysed:	22 soil samples		



Rexona Rahman Reporting Manager For & on behalf of i2 Analytical Ltd. Signed:

Emma Winter Assistant Reporting Manager For & on behalf of i2 Analytical Ltd.

Standard Geotechnical, Asbestos and Chemical Testing Laboratory located at: ul. Pionierów 39, 41 -711 Ruda Śląska, Poland.

Accredited tests are defined within the report, opinions and interpretations expressed herein are outside the scope of accreditation.

Standard sample disposal times, unless otherwise agreed with the laboratory, are :

soils	 4 weeks from reporting
leachates	- 2 weeks from reporting
waters	- 2 weeks from reporting
asbestos	- 6 months from reporting

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Lah Camala Number				E46062	E46062	E46064	FACOCE	E46066
Lab Sample Number				TD17	540003 TD19	540004 TD10	00005 TD20	TD21
Sample Number				None Supplied	None Supplied	None Supplied	None Supplied	None Supplied
Denth (m)				0.30		0.35		0 40
Date Sampled				Deviating	Deviating	Deviating	Deviating	Deviating
Time Taken				None Supplied	None Supplied	None Supplied	None Supplied	None Supplied
			Þ				None Supplied	None Supplied
Analytical Parameter (Soil Analysis)	Units	Limit of detection	Accreditation Status					
Stone Content	%	0.1	NONE	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1
Moisture Content	%	N/A	NONE	19	20	20	22	17
Total mass of sample received	kg	0.001	NONE	0.37	0.41	0.18	0.34	0.38
Asbestos in Soil Screen / Identification Name	Туре	N/A	ISO 17025	-	-	-	-	-
Asbestos in Soil	Туре	N/A	ISO 17025	-	-	-	-	-
Speciated DAHe								
Nanhthalono	ma/ka	0.05	MCEDTC	_		< 0.05		
Aconanthylene	mg/kg	0.05	MCEDTC	-	-	< 0.05	_	_
Acenaphthylene	mg/kg	0.1	MCERTS			< 0.10	_	_
Fluorene	mg/kg	0.1	MCERTS			< 0.10		-
Phenanthrene	mg/kg	0.1	MCERTS	-	-	< 0.10	-	-
Anthracene	ma/ka	0.1	MCERTS	-	-	< 0.10	-	-
Eluoranthene	ma/ka	0.1	MCERTS	-	-	< 0.10	-	-
Pyrene	ma/ka	0.1	MCERTS	-	-	< 0.10	-	-
Benzo(a)anthracene	mg/kg	0.1	MCERTS	-	-	< 0.10	-	-
Chrysene	mg/kg	0.05	MCERTS	-	-	< 0.05	-	-
Benzo(b)fluoranthene	mg/kg	0.1	MCERTS	-	-	< 0.10	-	-
Benzo(k)fluoranthene	mg/kg	0.1	MCERTS	-	-	< 0.10	-	-
Benzo(a)pyrene	mg/kg	0.1	MCERTS	-	-	< 0.10	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	0.1	MCERTS	-	-	< 0.10	-	-
Dibenz(a,h)anthracene	mg/kg	0.1	MCERTS	-	-	< 0.10	-	-
Benzo(ghi)perylene	mg/kg	0.05	MCERTS	-	-	< 0.05	-	-
Total PAH								
Speciated Total EPA-16 PAHs	ma/ka	1.6	MCERTS	-	-	< 1.60	-	-
Heavy Metals / Metalloids								
Arsenic (aqua regia extractable)	mg/kg	1	MCERTS	10	16	-	15	13
Boron (water soluble)	mg/kg	0.2	MCERTS	2.0	3.4	-	2.7	2.8
Cadmium (aqua regia extractable)	mg/kg	0.2	MCERTS	< 0.2	0.2	-	0.3	< 0.2
Chromium (aqua regia extractable)	mg/kg	1	MCERTS	16	27	-	23	22
Copper (aqua regia extractable)	mg/kg	1	MCERTS	17	25	-	21	22
Lead (aqua regia extractable)	mg/kg	1	MCERTS	26	37	-	42	30
Mercury (aqua regia extractable)	mg/kg	0.3	MCERTS	< 0.3	< 0.3	-	< 0.3	< 0.3
Nickei (aqua regia extractable)	mg/kg		MCEDITC	15	<u>∠1</u>	-	19	10
Jerenium (dyud reyid exit dctdDle)	mg/kg	1	MCEDIC	< 1.U 62	< 1.U 71	-	< 1.U 70	< 1.U 50
בוווב נמקעמ ובטומ בגנומנגמטוב)	шу/ку	Ţ	MULERIS	05	/1	-	/3	JZ

TPH5 (C6 - C10)	mg/kg	0.1	NONE	-	-	-	-	-
TPH5 (C10 - C20)	mg/kg	10	NONE	-	-	-	-	-
TPH5 (C20 - C30)	mg/kg	10	NONE	-	-	-	-	-
TPH5 (C30 - C40)	mg/kg	10	NONE	-	-	-	-	-
TPH5 (C6 - C40)	mg/kg	10	NONE	-	-	-	-	-





Lab Causela Neurobau				E40007	F46060	F46060	F46070	E46071
Lab Sample Number				546067	546068	546069	546070	546071
Sample Reference				IPZZ	IP23	IP24	IP25	IP26
Sample Number								
Depth (m)				0.10	0.50	0.10	U.35	U.15
Date Sampled				Deviauity Name Cumplied	Deviduing Name Cumplied	Deviauity Name Cumplied	Deviduing Name Cumplied	Deviduing
				None Supplied	None Supplied	None Supplied	None Supplied	None Supplied
Analytical Parameter (Soil Analysis)	Units	Limit of detection	Accreditation Status					
Stone Content	%	0.1	NONE	-	< 0.1	< 0.1	< 0.1	< 0.1
Moisture Content	%	N/A	NONE	-	15	19	11	13
Total mass of sample received	kg	0.001	NONE	-	0.42	0.42	0.18	0.39
								[
Asbestos in Soil Screen / Identification Name	Туре	N/A	ISO 17025	-	-	-	-	-
Asbestos in Soil	Туре	N/A	ISO 17025	Not-detected	Not-detected	-	Not-detected	-
Speciated PAHs								
Naphthalene	mg/kg	0.05	MCERTS	-	-	-	-	-
Acenaphthylene	mg/kg	0.1	MCERTS	-	-	-	-	-
Acenaphthene	mg/kg	0.1	MCERTS	-	-	-	-	-
Fluorene	mg/kg	0.1	MCERTS	-	-	-	-	-
Phenanthrene	mg/kg	0.1	MCERTS	-	-	-	-	-
Anthracene	mg/kg	0.1	MCERTS	-	-	-	-	-
Fluoranthene	mg/kg	0.1	MCERTS	-	-	-	-	-
Pyrene	mg/kg	0.1	MCERTS	-	-	-	-	-
Benzo(a)anthracene	mg/kg	0.1	MCERTS	-	-	-	-	-
Chrysene	mg/kg	0.05	MCERTS	-	-	-	-	-
Benzo(b)fluoranthene	mg/kg	0.1	MCERTS	-	-	-	-	-
Benzo(k)fluoranthene	mg/kg	0.1	MCERTS	-	-	-	-	-
Benzo(a)pyrene	mg/kg	0.1	MCERTS	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	0.1	MCERTS	-	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	0.1	MCERTS	-	-	-	-	-
Benzo(ghi)perylene	mg/kg	0.05	MCERTS	-	-	-	-	-
Total PAH								
Speciated Total EPA-16 PAHs	ma/ka	1.6	MCERTS	-	-	-	-	-
Heavy Metals / Metalloids								
Arsenic (aqua regia extractable)	mg/kg	1	MCERTS	-	13	17	15	15
Boron (water soluble)	mg/kg	0.2	MCERTS	-	2.3	3.4	4.1	4.4
Cadmium (aqua regia extractable)	mg/kg	0.2	MCERTS	-	< 0.2	< 0.2	0.2	0.2
Chromium (aqua regia extractable)	mg/kg	1	MCERTS	-	19	24	24	21
Copper (aqua regia extractable)	mg/kg	1	MCERTS	-	17	22	21	22
Lead (aqua regia extractable)	mg/kg	1	MCERTS	-	50	41	34	45
Mercury (aqua regia extractable)	mg/kg	0.3	MCERTS	-	< 0.3	< 0.3	< 0.3	< 0.3
Nickel (aqua regia extractable)	mg/kg	1	MCERTS	-	18	21	21	18
Selenium (aqua regia extractable)	mg/kg	1	MCERTS	-	2.7	< 1.0	< 1.0	< 1.0
Zinc (aqua regia extractable)	mg/kg	1	MCERTS	-	49	68	70	88

TPH5 (C6 - C10)	mg/kg	0.1	NONE	-	-	-	-	-
TPH5 (C10 - C20)	mg/kg	10	NONE	-	-	-	-	-
TPH5 (C20 - C30)	mg/kg	10	NONE	-	-	-	-	-
TPH5 (C30 - C40)	mg/kg	10	NONE	-	-	-	-	-
TPH5 (C6 - C40)	mg/kg	10	NONE	-	-	-	-	-





Lab Sample Number				F46072	546072	546074	546075	546076
Sample Reference				TD27	90075	TD20	TD26	TD15
Sample Number				None Supplied	None Supplied	None Supplied	None Supplied	None Supplied
Donth (m)								0.70
Depth (III)				0.23 Deviating	Deviating	Deviating	0.90 Deviating	0.70 Deviating
Time Taken				Nono Supplied	Nono Supplied	Nono Supplied	Nono Supplied	Nono Supplied
				None Supplied	None Supplied	None Supplied	None Supplied	None Supplied
Analytical Parameter (Soil Analysis)	Units	Limit of detection	Accreditation Status					
Stone Content	%	0.1	NONE	-	-	-	< 0.1	< 0.1
Moisture Content	%	N/A	NONE	-	-	-	10	18
Total mass of sample received	kg	0.001	NONE	-	-	-	0.37	0.40
Asbestos in Soil Screen / Identification Name	Туре	N/A	ISO 17025	Chrysotile- Hard/Cement Type Material, Loose Fibres	Chrysotile- Hard/Cement Type Material	-	-	-
Asbestos in Soil	Туре	N/A	ISO 17025	Detected	Detected	Not-detected	-	-
Speciated PAHs								
Naphthalene	mg/kg	0.05	MCERTS	-	-	-	< 0.05	< 0.05
Acenaphthylene	mg/kg	0.1	MCERTS	-	-	-	< 0.10	< 0.10
Acenaphthene	mg/kg	0.1	MCERTS	-	-	-	< 0.10	< 0.10
Fluorene	mg/kg	0.1	MCERTS	-	-	-	< 0.10	< 0.10
Phenanthrene	mg/kg	0.1	MCERTS	-	-	-	< 0.10	< 0.10
Anthracene	mg/kg	0.1	MCERTS	-	-	-	< 0.10	< 0.10
Fluoranthene	mg/kg	0.1	MCERTS	-	-	-	< 0.10	< 0.10
Pyrene	mg/kg	0.1	MCERTS	-	-	-	< 0.10	< 0.10
Benzo(a)anthracene	mg/kg	0.1	MCERTS	-	-	-	< 0.10	< 0.10
Chrysene	mg/kg	0.05	MCERTS	-	-	-	< 0.05	< 0.05
Benzo(b)fluoranthene	mg/kg	0.1	MCERTS	-	-	-	< 0.10	< 0.10
Benzo(k)fluoranthene	mg/kg	0.1	MCERTS	-	-	-	< 0.10	< 0.10
Benzo(a)pyrene	mg/kg	0.1	MCERTS	-	-	-	< 0.10	< 0.10
Indeno(1,2,3-cd)pyrene	mg/kg	0.1	MCERTS	-	-	-	< 0.10	< 0.10
Dibenz(a,h)anthracene	mg/kg	0.1	MCERTS	-	-	-	< 0.10	< 0.10
Benzo(ghi)perylene	mg/kg	0.05	MCERTS	-	-	-	< 0.05	< 0.05
Tetel DALL								
	ma/ka	1.6	MCEDTC	_	_	_	< 1.60	< 1.60
Specialed Total EFA-10 FAIls	niy/ky	1.0	MCER13	-	-	-	< 1.00	< 1.00
Heavy Metals / Metalloids								
Arsenic (aqua regia extractable)	mg/kg	1	MCERTS	-	-	-	-	19
Boron (water soluble)	mg/kg	0.2	MCERTS	-	-	-	-	2.7
Cadmium (aqua regia extractable)	mg/kg	0.2	MCERTS	-	-	-	-	0.4
Chromium (aqua regia extractable)	mg/kg	1	MCERTS	-	-	-	-	18
Copper (aqua regia extractable)	mg/kg	1	MCERTS	-	-	-	-	30
Lead (aqua regia extractable)	mg/kg	1	MCERTS	-	-	-	-	90
Mercury (aqua regia extractable)	mg/kg	0.3	MCERTS	-	-	-	-	< 0.3
Nickel (aqua regia extractable)	mg/kg	1	MCERTS	-	-	-	-	19
Selenium (aqua regia extractable)	mg/kg	1	MCERTS	-	-	-	-	< 1.0
zinc (aqua regia extractable)	mg/kg	1	MCERTS	-	-	-	-	210

TPH5 (C6 - C10)	mg/kg	0.1	NONE	-	-	-	< 0.1	-
TPH5 (C10 - C20)	mg/kg	10	NONE	-	-	-	< 10	-
TPH5 (C20 - C30)	mg/kg	10	NONE	-	-	-	< 10	-
TPH5 (C30 - C40)	mg/kg	10	NONE	-	-	-	< 10	-
TPH5 (C6 - C40)	mg/kg	10	NONE	-	-	-	< 10	-





Lab Camula Number				F4C077	F4C070	F4C070	F4C000	F4C001
Lab Sample Number				540077	540078 TD15	546079	540080 TD16	540081
Sample Reference				1915	1115	1915	IP10	IP10
Sample Number				5	15	2		
Depth (m)				0.50	0.90	U./U	U.50	0.80
Date Sampled				Deviating	Deviating	Deviating	Deviating	Deviating
	r			None Supplied	None Supplied	None Supplied	None Supplied	None Supplied
Analytical Parameter (Soil Analysis)	Units	Limit of detection	Accreditation Status					
Stone Content	%	0.1	NONE	-	-	-	-	-
Moisture Content	%	N/A	NONE	-	-	-	-	-
Total mass of sample received	kg	0.001	NONE	-	-	-	-	-
Asbestos in Soil Screen / Identification Name	Туре	N/A	ISO 17025	-	-	-	-	-
Asbestos in Soil	Type	N/A	ISO 17025	Not-detected	Not-detected	Not-detected	Not-detected	Not-detected
					-	-	-	-
Speciated PAHs								
Naphthalene	mg/kg	0.05	MCERTS	-	-	-	-	-
Acenaphthylene	mg/kg	0.1	MCERTS	-	-	-	-	-
Acenaphthene	mg/kg	0.1	MCERTS	-	-	-	-	-
Fluorene	mg/kg	0.1	MCERTS	-	-	-	-	-
Phenanthrene	mg/kg	0.1	MCERTS	-	-	-	-	-
Anthracene	mg/kg	0.1	MCERTS	-	-	-	-	-
Fluoranthene	mg/kg	0.1	MCERTS	-	-	-	-	-
Pyrene	mg/kg	0.1	MCERTS	-	-	-	-	-
Benzo(a)anthracene	mg/kg	0.1	MCERTS	-	-	-	-	-
Chrysene	mg/kg	0.05	MCERTS	-	-	-	-	-
Benzo(b)fluoranthene	mg/kg	0.1	MCERTS	-	-	-	-	-
Benzo(k)fluoranthene	ma/ka	0.1	MCERTS	-	-	-	-	-
Benzo(a)pyrene	ma/ka	0.1	MCERTS	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	mg/kg	0.1	MCERTS	-	-	-	-	-
Dibenz(a,h)anthracene	mg/kg	0.1	MCERTS	-	-	-	-	-
Benzo(ghi)perylene	mg/kg	0.05	MCERTS	-	-	-	-	-
						-	-	-
Total PAH								
Speciated Total EPA-16 PAHs	mg/kg	1.6	MCERTS	-	-	-	-	-
Heavy Metals / Metalloids								
Arsenic (aqua regia extractable)	mg/kg	1	MCERTS	-	-	-	-	-
Boron (water soluble)	mg/kg	0.2	MCERTS	-	-	-	-	-
Cadmium (aqua regia extractable)	mg/kg	0.2	MCERTS	-	-	-	-	-
Chromium (aqua regia extractable)	mg/kg	1	MCERTS	-	-	-	-	-
Copper (aqua regia extractable)	mg/kg	1	MCERTS	-	-	-	-	-
Lead (aqua regia extractable)	mg/kg	1	MCERTS	-	-	-	-	-
Mercury (aqua regia extractable)	mg/kg	0.3	MCERTS	-	-	-	-	-
Nickel (aqua regia extractable)	mg/kg	1	MCERTS	-	-	-	-	-
Selenium (aqua regia extractable)	mg/kg	1	MCERTS	-	-	-	-	-
Zinc (aqua regia extractable)	mg/kg	1	MCERTS	-	-	-	-	-
Zinc (aqua regia extractable)	mg/kg	1	MCERTS	-	-	-	-	-

TPH5 (C6 - C10)	mg/kg	0.1	NONE	-	-	-	-	-
TPH5 (C10 - C20)	mg/kg	10	NONE	-	-	-	-	-
TPH5 (C20 - C30)	mg/kg	10	NONE	-	-	-	-	-
TPH5 (C30 - C40)	mg/kg	10	NONE	-	-	-	-	-
TPH5 (C6 - C40)	mg/kg	10	NONE	-	-	-	-	-





				546000	F 46000	 	
Lab Sample Number				546082	546083		
Sample Reference				1P16	IP16	 	
Sample Number				None Supplied	None Supplied	 	
Depth (m)				0.85	0.80-0.90	 	
Date Sampled				Deviating	Deviating	 	
lime laken				None Supplied	None Supplied	 	
Analytical Parameter (Soil Analysis)	Units	Limit of detection	Accreditation Status				
Stone Content	%	0.1	NONE	< 0.1	-		
Moisture Content	%	N/A	NONE	17	-		
Total mass of sample received	kg	0.001	NONE	0.30	-		
Asbestos in Soil Screen / Identification Name	Туре	N/A	ISO 17025	-	-		
Asbestos in Soil	Type	N/A	ISO 17025	-	Not-detected		
		-					
Speciated PAHs							
Naphthalene	mg/kg	0.05	MCERTS	< 0.05	-		
Acenaphthylene	mg/kg	0.1	MCERTS	< 0.10	-		
Acenaphthene	mg/kg	0.1	MCERTS	< 0.10	-		
Fluorene	mg/kg	0.1	MCERTS	< 0.10	-		
Phenanthrene	mg/kg	0.1	MCERTS	0.22	-		
Anthracene	mg/kg	0.1	MCERTS	< 0.10	-		
Fluoranthene	mg/kg	0.1	MCERTS	0.41	-		
Pyrene	mg/kg	0.1	MCERTS	0.37	-		
Benzo(a)anthracene	mg/kg	0.1	MCERTS	0.28	-		
Chrysene	ma/ka	0.05	MCERTS	0.23	-		
Benzo(b)fluoranthene	ma/ka	0.1	MCERTS	< 0.10	-		
Benzo(k)fluoranthene	ma/ka	0.1	MCERTS	< 0.10	-		
Benzo(a)pyrene	ma/ka	0.1	MCERTS	0.20	-		
Indeno(1,2,3-cd)pyrene	mg/kg	0.1	MCERTS	< 0.10	-		
Dibenz(a,h)anthracene	ma/ka	0.1	MCERTS	< 0.10	-		
Benzo(ghi)perylene	mg/kg	0.05	MCERTS	< 0.05	-		
Total PAH						 	
Speciated Total EPA-16 PAHs	mg/kg	1.6	MCERTS	1.71	-		L
Heavy Metals / Metalloids							-
Arsenic (aqua regia extractable)	mg/kg	1	MCERTS	12	-		
Boron (water soluble)	mg/kg	0.2	MCERTS	2.0	-	 	
Cadmium (aqua regia extractable)	mg/kg	0.2	MCERTS	0.4	-	 	
Chromium (aqua regia extractable)	mg/kg	1	MCERTS	17	-	 	
Copper (aqua regia extractable)	mg/kg	1	MCERTS	34	-		
Lead (aqua regia extractable)	mg/kg	1	MCERTS	120	-		
Mercury (aqua regia extractable)	mg/kg	0.3	MCERTS	< 0.3	-		
Nickel (aqua regia extractable)	mg/kg	1	MCERTS	16	-		
Selenium (aqua regia extractable)	mg/kg	1	MCERTS	< 1.0	-		
Zinc (aqua regia extractable)	mg/kg	1	MCERTS	200	-		

TPH5 (C6 - C10)	mg/kg	0.1	NONE	-	-		
TPH5 (C10 - C20)	mg/kg	10	NONE	-	-		
TPH5 (C20 - C30)	mg/kg	10	NONE	-	-		
TPH5 (C30 - C40)	mg/kg	10	NONE	-	-		
TPH5 (C6 - C40)	mg/kg	10	NONE	-	-		





Project / Site name: Fritwell

* These descriptions are only intended to act as a cross check if sample identities are questioned. The major constituent of the sample is intended to act with respect to MCERTS validation. The laboratory is accredited for sand, clay and loam (MCERTS) soil types. Data for unaccredited types of solid should be interpreted with care.

Stone content of a sample is calculated as the % weight of the stones not passing a 10 mm sieve. Results are not corrected for stone content.

Lab Sample Number	Sample Reference	Sample Number	Depth (m)	Sample Description *
546062	TP17	None Supplied	0.30	Brown clay and loam with gravel and vegetation.
546063	TP18	None Supplied	0.10	Brown loam and clay with gravel and vegetation.
546064	TP19	None Supplied	0.35	Brown loam and clay with gravel and vegetation.
546065	TP20	None Supplied	0.05	Brown loam and clay with gravel and vegetation.
546066	TP21	None Supplied	0.40	Brown loam and clay with gravel and vegetation.
546067	TP22	None Supplied	0.10	-
546068	TP23	None Supplied	0.50	Brown loam and clay with gravel and vegetation.
546069	TP24	None Supplied	0.10	Brown loam and clay with gravel and vegetation.
546070	TP25	None Supplied	0.35	Brown loam and clay with gravel and vegetation.
546071	TP26	None Supplied	0.15	Brown loam and clay with gravel and vegetation.
546072	TP27	None Supplied	0.25	-
546073	TP28	None Supplied	0.05	
546074	TP29	None Supplied	0.25	-
546075	TP26	None Supplied	0.90	Light brown clay and sand with gravel.
546076	TP15	None Supplied	0.70	Brown loam and clay with gravel.
546077	TP15	5	0.50	-
546078	TP15	15	0.90	
546079	TP15	2	0.70	-
546080	TP16	None Supplied	0.50	-
546081	TP16	None Supplied	0.80	-
546082	TP16	None Supplied	0.85	Brown loam and clay with gravel and vegetation.
546083	TP16	None Supplied	0.80-0.90	





Project / Site name: Fritwell

Water matrix abbreviations: Surface Water (SW) Potable Water (PW) Ground Water (GW)

Analytical Test Name	Analytical Method Description	Analytical Method Reference	Method number	Wet / Dry Analysis	Accreditation Status
Asbestos identification in soil	Asbestos Identification with the use of polarised light microscopy in conjunction with disperion staining techniques.	In house method based on HSG 248	A001-PL	D	ISO 17025
Boron, water soluble, in soil	Determination of water soluble boron in soil by hot water extract followed by ICP-OES.	In-house method based on Second Site Properties version 3	L038-PL	D	MCERTS
Metals in soil by ICP-OES	Determination of metals in soil by aqua-regia digestion followed by ICP-OES.	In-house method based on MEWAM 2006 Methods for the Determination of Metals in Soil.	L038-PL	D	MCERTS
Moisture Content	Moisture content, determined gravimetrically.	In-house method based on BS1377 Part 3, 1990, Chemical and Electrochemical Tests	L019-UK/PL	W	NONE
Speciated EPA-16 PAHs in soil	Determination of PAH compounds in soil by extraction in dichloromethane and hexane followed by GC-MS with the use of surrogate and internal standards.	In-house method based on USEPA 8270	L064-PL	D	MCERTS
Stones content of soil	Standard preparation for all samples unless otherwise detailed. Gravimetric determination of stone > 10 mm as % dry weight.	In-house method based on British Standard Methods and MCERTS requirements.	L019-UK/PL	D	NONE
TPH5 (Soil)	Determination of TPH bands by HS-GC-MS/GC-FID	In-house method	L076-PL	D	NONE

For method numbers ending in 'UK' analysis have been carried out in our laboratory in the United Kingdom. For method numbers ending in 'PL' analysis have been carried out in our laboratory in Poland.

Soil analytical results are expressed on a dry weight basis. Where analysis is carried out on as-received the results obtained are multiplied by a moisture correction factor that is determined gravimetrically using the moisture content which is carried out at a maximum of 30oC.



Jim Twaddle The Brownfield Consultancy Woodstock Memorial Road Fenny Compton Warwickshire CV47 2XU



i2 Analytical Ltd. 7 Woodshots Meadow, Croxley Green Business Park, Watford, Herts, WD18 8YS

t: 01923 225404 f: 01923 237404 e: reception@i2analytical.com

e: jim.twaddle@brownfieldconsultancy.co.uk

Analytical Report Number : 16-12831

Project / Site name:	Fritwell	Samples received on:	08/03/2016
Your job number:	BC195	Samples instructed on:	08/03/2016
Your order number:		Analysis completed by:	16/03/2016
Report Issue Number:	1	Report issued on:	16/03/2016
Samples Analysed:	1 wac multi sample		

Signed:

Dr Irma Doyle Senior Account Manager For & on behalf of i2 Analytical Ltd.



Emma Winter Assistant Reporting Manager For & on behalf of i2 Analytical Ltd.

Standard Geotechnical, Asbestos and Chemical Testing Laboratory located at: ul. Pionierów 39, 41 -711 Ruda Śląska, Poland.

Accredited tests are defined within the report, opinions and interpretations expressed herein are outside the scope of accreditation.

Standard sample disposal times, unless otherwise agreed with the laboratory, are :

soils	 4 weeks from reporting
leachates	- 2 weeks from reporting
waters	- 2 weeks from reporting
asbestos	- 6 months from reporting

Excel copies of reports are only valid when accompanied by this PDF certificate.





i2 Analytical

7 Woodshots Meadow Croxley Green Business Park Watford, WD18 8YS

Telephone: 01923 225404 Fax: 01923 237404 email:reception@i2analytical.com

Waste Acceptance Criteria Analytical	Results						
Report No:		16-1	2831				
					Client:	BROWNFIEL	D
Location		Erit	woll				
Location		The	wen		Landfill	Naste Accentanc	e Criteria
Lab Reference (Sample Number)		546	084	-	Lunami	Limits	e entena
Sampling Date		Devi	Deviating			Stable Non-	
Sample ID		TP	24		To and Minister	reactive	Universidade
Depth (m)		0.	90		Landfill	waste in non- hazardous Landfill	Waste Landfill
Solid Waste Analysis							
TOC (%)**	0.4				3%	5%	6%
Loss on Ignition (%) **	1.8						10%
BTEX (µg/kg) **	< 10				6000		
Sum of PCBS (mg/kg) **	< 0.30				500		
Total PAH (WAC-17) (mg/kg)	< 16				100		
pH (units)**	7.0					>6	
Acid Neutralisation Capacity (mol / kg)	0.0000					To be evaluated	To be evaluated
Elusto Analycia					Limit value	s for compliance le	eaching test
	2:1	8:1		Cumulative 10:1			
(BS EN 12457 - 3 preparation utilising end over end leaching procedure)	mg/l	mg/l		mg/kg	using BS EN 12457-3 at L/S 10 l/kg (mg/kg)		
Arsenic *	< 0.010	< 0.010		< 0.050	0.5	2	25
Barium *	0.0061	0.011		0.10	20	100	300
Cadmium *	< 0.0005	< 0.0005		< 0.0020	0.04	1	5
Chromium *	< 0.0010	< 0.0010		0.0072	0.5	10	70
Copper *	0.0033	< 0.0030		< 0.020	2	50	100
Mercury *	< 0.0015	< 0.0015		< 0.010	0.01	0.2	2
Molybdenum *	< 0.0030	< 0.0030		< 0.020	0.5	10	30
Nickel *	< 0.0010	0.0019		0.018	0.4	10	40
Lead ~	< 0.0050	< 0.0050		0.026	0.5	10	50
	< 0.0050	< 0.0050		< 0.020	0.06	0.7	
	< 0.010	< 0.010		< 0.040	4	50	200
Chloride *	< 4.0	< 4.0		< 15	800	4000	25000
Eluoride	0.33	0.24		2.5	10	150	500
Sulphate *	3.6	1.7		19	1000	20000	50000
TDS	90	60		640	4000	60000	100000
Phenol Index (Monhydric Phenols) *	< 0.13	< 0.13		< 0.50	1	-	-
DOC	5.2	3.4		37	500	800	1000
Leach Test Information							
Stone Content (%)	< 0.1						
Sample Mass (kg)	1.6						
Dry Matter (%)	90						
Moisture (%)	10						
Stage 1	0.22						
Volume Eluate L2 (litres)	0.33						
nicereu Liuale VEI (IILIES)	0.25						

Results are expressed on a dry weight basis, after correction for moisture content where applicable Stated limits are for guidance only and 12 cannot be held responsible for any discrepencies with current legislation *= UKAS accredited (liquid eluate analysis only) ** = MCERTS accredited





Project / Site name: Fritwell

* These descriptions are only intended to act as a cross check if sample identities are questioned. The major constituent of the sample is intended to act with respect to MCERTS validation. The laboratory is accredited for sand, clay and loam (MCERTS) soil types. Data for unaccredited types of solid should be interpreted with care.

Stone content of a sample is calculated as the % weight of the stones not passing a 10 mm sieve. Results are not corrected for stone content.

Lab Sample Number	Sample Reference	Sample Number	Depth (m)	Sample Description *
546084	TP24	None Supplied	0.90	Light brown clay and sand with gravel.





Project / Site name: Fritwell

Water matrix abbreviations: Surface Water (SW) Potable Water (PW) Ground Water (GW)

Analytical Test Name	Analytical Method Description	Analytical Method Reference	Method number	Wet / Dry Analysis	Accreditation Status
Acid neutralisation capacity of soil	Determination of acid neutralisation capacity by addition of acid or alkali followed by electronic probe.	In-house method based on Guidance an Sampling and Testing of Wastes to Meet Landfill Waste Acceptance	L046-PL	w	NONE
BTEX (Sum of BTEX compounds) in soil	Determination of BTEX in soil by headspace GC- MS. Individual components MCERTS accredited	In-house method based on USEPA8260	L073B-PL	W	MCERTS
Chloride in WAC leachate (BS EN 12457-3 Prep)	Determination of Chloride colorimetrically by discrete analyser.	In house based on MEWAM Method ISBN 0117516260.	L082-PL	w	ISO 17025
DOC in WAC leachate (BS EN 12457- 3 Prep)	Determination of dissolved organic carbon in leachate by TOC/DOC NDIR analyser.	In-house method based on Standard Methods for the Examination of Water and Waste Water, 21st Ed.	L037-PL	W	NONE
Fluoride in WAC leachate (BS EN 12457-3 Prep)	Determination of fluoride in leachate by 1:1ratio with a buffer solution followed by Ion Selective Electrode.	In-house method based on Standard Methods for the Examination of Water and Waste Water, 21st Ed.	L033-PL	W	NONE
Loss on ignition of soil @ 450oC	Determination of loss on ignition in soil by gravimetrically with the sample being ignited in a muffle furnace.	In-house method based on BS1377 Part 3, 1990, Chemical and Electrochemical Tests	L047-PL	D	MCERTS
Metals in WAC leachate (BS EN 12457 3 Prep)	Determination of metals in leachate by acidification followed by ICP-OES.	In-house method based on Standard Methods for the Examination of Water and Waste Water, 21st Ed.	L039-PL	W	ISO 17025
Mineral Oil in Soil	Determination of dichloromethane/hexane extractable hydrocarbons in soil by GC-MS.	In-house method based on USEPA 8270	L064-PL	D	NONE
Moisture Content	Moisture content, determined gravimetrically.	In-house method based on BS1377 Part 3, 1990, Chemical and Electrochemical Tests	L019-UK/PL	W	NONE
PCB's by GC-MS in soil	Determination of PCB by extraction with acetone and hexane followed by GC-MS.	In-house method based on USEPA 8082	L027-PL	D	MCERTS
pH in soil	Determination of pH in soil by addition of water followed by electrometric measurement.	In-house method based on BS1377 Part 3, 1990, Chemical and Electrochemical Tests	L005-PL	W	MCERTS
Phenol Index in WAC leachate (BS EN 12457-3 Prep)	Determination of monohydric phenols in leachate by continuous flow analyser.	In-house method based on Examination of Water and Wastewater 20th Edition: Clesceri, Greenberg & Eaton (skalar)	L080-PL	W	ISO 17025
Seciated WAC-17 PAHs in soil	Determination of PAH compounds in soil by extraction in dichloromethane and hexane followed by GC-MS with the use of surrogate and internal standards.	In-house method based on USEPA 8270	L064-PL	D	NONE
Stones content of soil	Standard preparation for all samples unless otherwise detailed. Gravimetric determination of stone > 10 mm as % dry weight.	In-house method based on British Standard Methods and MCERTS requirements.	L019-UK/PL	D	NONE
Sulphate in WAC leachate (BS EN 12457-3 Prep)	Determination of sulphate in leachate by acidification followed by ICP-OES.	In-house method based on Standard Methods for the Examination of Water and Waste Water, 21st Ed.	L039-PL	w	ISO 17025
TDS in WAC leachate (BS EN 12457-3 Prep)	Determination of total dissolved solids in leachate by electrometric measurement.	In-house method based on Standard Methods for the Examination of Water and Waste Water, 21st Ed.	L004-PL	w	NONE
Total organic carbon in soil	Determination of organic matter in soil by oxidising with potassium dichromate followed by titration with iron (II) sulphate.	In-house method based on BS1377 Part 3, 1990, Chemical and Electrochemical Tests	L023-PL	D	MCERTS

This certificate should not be reproduced, except in full, without the express permission of the laboratory. The results included within the report are representative of the samples submitted for analysis.





Project / Site name: Fritwell

Water matrix abbreviations: Surface Water (SW) Potable Water (PW) Ground Water (GW)

Analytical Test Name	Analytical Method Description	Analytical Method Reference	Method number	Wet / Dry Analysis	Accreditation Status
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For method numbers ending in 'UK' analysis have been carried out in our laboratory in the United Kingdom.

For method numbers ending in 'PL' analysis have been carried out in our laboratory in Poland.

Soil analytical results are expressed on a dry weight basis. Where analysis is carried out on as-received the results obtained are multiplied by a moisture correction factor that is determined gravimetrically using the moisture content which is carried out at a maximum of 30oC.

APPENDIX G

Soakaway Results

The **Brown**field Consultancy

Woodstock Memorial Road Fenny Compton. CV47 2XU

Your Ref:

Our Ref: BC195 L.003 / JT

CALA Homes (Chiltern) Limited Riverside House Holtspur Lane Wooburn Green Buckinghamshire HP10 0TJ

21st April 2020

For the attention of James Forbes

Dear James

FEWCOTT ROAD, FRITWELL. OX27 7QA Results of Soakaway Testing

The Brownfield Consultancy was commissioned by CALA Chiltern to undertake trial pit soakaway testing in accordance with BRE 365 at the above site. The fieldwork was undertaken on 25th and 26th March 2020.

The site comprises of a square plot of paddock land on the south eastern outskirts of Fritwell, Oxfordshire. Access is off Fewcott Road. It is proposed to apply for planning permission for the construction of 32No. two storey houses with associated access roads, driveways and gardens. The site slopes gently from south to north. This report is subject to limitations which are presented in Appendix D.

A previous ground investigation was undertaken in November 2015 by The Brownfield Consultancy and reported in *'Fewcott Road, Fritwell – Report on Ground Conditions'* dated 29th December 2015. A second report entitled *'Desk Top Study and Contaminated Land Assessment'* was undertaken dated 8th April 2016.

1. FIELDWORK

Soakaway tests were undertaken within five trial pits denoted SA1, SA2, SA3, SA4 and SA6 as denoted on the exploratory hole location plan in Appendix A. The pits were excavated by a backhoe excavator, their dimensions carefully measured and then flooded using a mobile water bowser. The time for the water to drain was then measured.

2. GROUND CONDITIONS

The ground conditions encountered during the investigation were consistent with the published geological map and the findings of the previous investigations. A veneer of Topsoil or Made Ground overlies the Great Oolite Group described by the British Geological Survey as :-

'A variety of mudstone-dominated and ooidal, bioclastic and fine-grained limestone formations'.

The **Brown**field Consultancy

Woodstock Memorial Road Fenny Compton. CV47 2XU

A summary of the strata encountered during the investigation is described in the following sections but for full details of the strata encountered, samples taken, results of any in-situ testing and any other relevant information, reference should be made to the exploratory hole logs presented in Appendix B.

Topsoil

Topsoil was encountered in SA1, SA3, SA4 and SA6 to depths varying between 0.30-0.45m bgl. Materials comprised dark brown clay with varying quantities of sand and gravel. Gravel comprised brown limestone.

Made Ground

Made Ground was encountered in SA2 and SA4 to depths of 0.30-0.40m. Materials were similar to the Tospoil with the inclusion of tile, red brick and string.

Great Oolite Group

The Great Oolite Group was encountered in all trial pit locations and comprised of brown gravel and cobbles of ooidal limestone in a clay matrix with varying quantities of sand. Occasionally, thin units of sandy gravelly clay were encountered. 'Bedrock' was encountered in SA3 at 1.40m and SA4 at 1.00m bgl where no further penetration was possible with the backhoe excavator.

Groundwater

Groundwater was encountered in trial pits SA1, SA2 and SA5. All three pits were located at the lowest level of the site (north). In SA1 soils were recorded as 'damp' from 1.40m to the base of the pit. Prior to the test, groundwater was recorded at 1.50m bgl. In SA2, soils were recorded as damp from 0.40-1.50m and a water seepage was recorded at 1.20m. Prior to flooding the pit, groundwater was recorded at 1.28m bgl. In SA5 a slow ingress of groundwater was encountered at 0.90m and the pit was abandoned and backfilled.

3. SOAKAWAY DRAINAGE

In accordance with the digest, three repeat tests were successfully undertaken in SA1, SA3 and SA4. A single successful test was undertaken in SA6. The test in trial pit SA2, which contained 22cm of groundwater at the start of the test, was not successful.

The following soil infiltration rates were obtained:

SA1 2.6 x 10⁻⁵m/s, 4.6 x 10⁻⁵m/s, 3.1 x 10⁻⁵m/s
SA3 3.4 x 10⁻⁵m/s, 1.5 x 10⁻⁵m/s, 1.6 x 10⁻⁴m/s
SA4 1.6 x 10⁻⁵m/s, 1.2 x 10⁻⁵m/s, 1.5 x 10⁻⁵m/s
SA6 1.0 x 10⁻⁵m/s

In accordance with BRE 365, it is recommended that the lowest infiltration rate of the three tests is taken as the design figure for each location. The full results of soakaway testing are presented in Appendix C.

Groundwater was encountered in SA1, SA2 and SA5 in the north of the site. A 'freeboard' of 1m is often required i.e. at least 1 metre clearance between the base of any soakaway and the top of the water table. Clearly this is not achievable in the north of the site. If soakaways are the only viable

The Brownfield Consultancy

Woodstock Memorial Road Fenny Compton. CV47 2XU

means of disposing of surface water at the site, then a number of boreholes will need to be installed across the site followed by the implementation of a groundwater level monitoring programme, to account for seasonal variations and extreme rainfall events.

We trust the above is satisfactory for your purposes. Should you have any queries please do not hesitate to contact me.

Yours sincerely

Jim Twaddle cGeol Director

Appendix A	Exploratory Hole Location Plan
Appendix B	Exploratory Hole Logs
Appendix C	Soakaway Test Calculations
Appendix D	Limitations

APPENDIX A

Exploratory Hole Location Plan

FRITWELL SOAKAWAY TESTS

Exploratory Hole Location Plan



APPENDIX B

Exploratory Hole Logs

Project						TF	RIAL PIT No
Fewcott Road, Fritwell						S Δ1	
Job No		Date	Ground Level (m)	Co-Ordinates ()			UAI
BC	2195	25-03-20				Closed	
Contractor	OWNEE					Sheet	1 6 1
BR	OWNFIE	LD CONSULTANCY					1 of 1
			STRATA		SAI	MPLE	S & TESTS
	N		DECODID	ON	Depth	No	Remarks/Tests
Depth 0.00-0.40	No $\frac{\sqrt{1}}{1}$	Grass over dark brown slig subrounded fine to coarse b	DESCRIPTI htly sandy gravelly CLAY suff brown limestone. (TOI	ON . Gravel is subangular and PSOIL)			
0.40-1.00		Buff brown sandy clayey lo fine to coarse limestone wi	ocally very clayey GRAVE th a low cobble content. Co	L of subangular and subrounded obbles are limestone. (OOLITE)			
1.00-1.40		Buff brown slightly sandy s coarse limestone with a low	slightly clayey GRAVEL o v cobble content. Cobbles a	f subangular and subrounded fine t re limestone. (OOLITE)	0		
1.40-1.55		Damp buff brown sandy ve coarse limestone. (OOLITH	ry clayey GRAVEL of sub E)	angular and subrounded fine to	_		
1.55	~``	Trial pit terminated.					
Shoring/S Stability:	upport: Sides sta	ble.		N	SB	G R oakawa ackfille	ENERAL EMARKS y test undertaken.
D	— 1.4 — A	► B 0.7					utongo.
All dimens	sions in met e 1:18.75	res Client CALA C	HILTERN Meth Plant	nod/ t Used 5t excavator		ogged l	By JT

Project					TR	RIAL PIT No
Fewcott Road,	Fritwell					SV3
Job No	Date	Ground Level (m)	Co-Ordinates ()			JAZ
BC195	25-03-20					
Contractor					Sheet	
BROWNFIEL	D CONSULTANCY					1 of 1
	S	STRATA		SAN	APLE	S & TESTS
				Depth	No	Remarks/Tests
Depth 0.00-0.40 No Gi	rass over dark brown slight brounded fine to medium b	DESCRIPTI tly sandy gravelly CLAY. buff brown limestone, tile	ON Gravel is subangular and and red brick. (MADE GROUND)			
$0.40-1.50$ $\begin{array}{c} & & & & \\ & & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & & \\ & & &$	amp buff brown slightly sa arse limestone with a low 20 Seepage.	ndy clayey GRAVEL of s cobble content. Cobbles a	subangular and subrounded fine to re limestone. (OOLITE)			
1.50 Tr W	ial pit terminated. 'ater level at 1.28m bgl at t	he start of the soakaway t	est.			
Shoring/Support: Stability: Sides stabl	e. B 0.7		N + 	So B	G RI Dakawa ackfille	ENERAL EMARKS y test undertaken. d with arisings.
All dimensions in metres Scale 1:18.75	S Client CALA CH	ILTERN Meth Plant	od/ Used 5t excavator		ogged H	^{3y} JT

Project	02001000					TF	RIAL PIT No
Fewcott Road, Fritwell						SV3	
Job No		Date	Ground Level (m)	Co-Ordinates ()			UAU
BC	2195	25-03-20					
Contractor			-			Sheet	1 6 1
BR	OWNFI	ELD CONSULTANCY					1 of 1
			STRATA		SAI	MPLE	S & TESTS
					Depth	No	Remarks/Tests
Depth 0.00-0.40	$\begin{array}{ c c c c c c c c c c c c c c c c c c c$	Grass over dark brown slig subrounded fine to coarse b	DESCRIPT htly sandy gravelly CLAY ouff brown limestone. (TO	ON . Gravel is subangular and PSOIL)			
0.40-1.20		Buff brown sandy clayey C limestone with a low cobbl	GRAVEL of subangular and e content. Cobbles are lime	d subrounded fine to coarse estone. (OOLITE)			
1.20-1.40		Buff brown SAND & GRA limestone. (OOLITE)	VEL. Gravel is subangula	r and subrounded fine to coarse			
		Groundwater not encounter	red.				
Shoring/S Stability:	Support: Sides st 	able.			SB	G R oakawa ackfille	ENERAL EMARKS y test undertaken. d with arisings.
All dimen Scal	sions in me e 1:18.75	etres Client CALA C	HILTERN Meth Plan	nod/ t Used 5t excavator		ogged I	^{3y} JT

Project					TR	IAL PIT No
Fewcott Road,	Fritwell					61
Job No	Date	Ground Level (m)	Co-Ordinates ()			3A 4
BC195	25-03-20					
Contractor					Sheet	
BROWNFIEL	D CONSULTANCY					1 of 1
	(STRATA		SAN	APLE	S & TESTS
				Depth	No	Remarks/Tests
$\begin{array}{ c c c c c c c c c c c c c c c c c c c$	rass over dark brown sligh ibrounded fine to coarse bu	DESCRIPTION tly sandy gravelly CLAY. iff brown limestone. (TOP	DN Gravel is subangular and SOIL)			
$0.45 - 0.80 \qquad \begin{array}{c} \overbrace{} \downarrow $	uff brown sandy clayey loo ne to coarse limestone with	cally very clayey GRAVE a a low cobble content. Co	L of subangular and subrounded bbles are limestone. (OOLITE)			
0.80-0.90 0.80-0.90	irm brown sandy very grav	elly CLAY. Gravel is sub	angular and subrounded fine to	-		
0.90-1.00 0 c R	barse limestone. (OOLITE)) ightly clavey GRAVEL of	Subangular and subrounded fine to			
	barse limestone with a high	cobble content. Cobbles a	are limestone. (OOLITE)			
N	o further progress. Unable	to penetrate bedrock.				
G	roundwater not encountere	ed.				
Shoring/Support:	1-				G	ENERAL
Stability: Sides stabl	ie.				RI	LIMARKS
			N		oakawa ackfille	y test undertaken. d with arisings.
1.45	►		1			6
A	↑					
D	B 0.7		n			
C	¥					
All dimensions in my	Client CALACE		od/		ogged D	Rv
Scale 1:18.75		Plant	Used 5t excavator		-55 CU L	JT

Project							TI	RIAL PIT No
Fev	wcott Road,	Fritwell						S 1 5
Job No		Date	Ground Level (n	n)	Co-Ordinates ()			SAJ
BC	C195	25-03-20						
Contractor							Sheet	t
BR	OWNFIEL	D CONSULTANC	CY					1 of 1
			STRATA			SAI	MPLE	S & TESTS
						Depth	No	Remarks/Tests
Depth 0.00-0.30	Depth 0.00-0.30 No Crass over dark brown slightly sandy gravelly CLAY. Gravel is subangular and subrounded fine to medium buff brown limestone, tile and pieces of orange string. (MADE GROUND)							
0.30-0.45	Fi	irm brown sandy very g mestone. (OOLITE)	gravelly CLAY. Gravel	is angular	to subrounded fine to coarse			
0.45-0.90		uff brown sandy clayey ne to coarse limestone	v locally very clayey GF with a low cobble conte	RAVEL of ent. Cobble	subangular and subrounded s are limestone. (OOLITE)			
0.90	Ti	rial pit terminated. Slov	w ingress of groundwate	er at 0.90n	L			
Shoring/S Stability:	Support: Sides stabl	le. ► B			N ↓ ↓	B	G R ackfille	ENERAL EMARKS ed with arisings.
All dimen Scale	sions in metre e 1:18.75	s Client CALA	CHILTERN	Method/ Plant Use	d 5t excavator		ogged	By JT

Project						TRIAL PIT No	
Fey	CAC						
Job No		Date	Ground Level (m)	Co-Ordinates ()		540	
BO	C195	25-03-20					
Contractor	•					Sheet	
BR	OWNFIEI	LD CONSULTANCY				1 of 1	
			STRATA		SAN	MPI FS & TESTS	
			0110111		Depth	No Remarks/Tests	
Depth 0.00-0.30	No No	Grass over dark brown slig subrounded fine to coarse b	DESCRII htly sandy gravelly CLA uff brown limestone. (1	PTION AY. Gravel is subangular and TOPSOIL)			
0.30-0.40		Firm brown sandy very gra	velly CLAY. Gravel is	angular to subrounded fine to coarse			
0.40-0.90	$\begin{array}{c} 0.40-0.90 \\ \hline 0.40-0.90$						
0.90		Trial pit terminated.					
Shoring/Stability:	Support: Sides stal	ole.				GENERAL REMARKS	
	— 1.35 — A	B 0.7		N + +	SB	oakaway test undertaken. ackfilled with arisings.	
All dimen Scal	usions in metr le 1:18.75	res Client CALA Cl	HILTERN M	lethod/ lant Used 5t excavator	L	ogged By JT	

APPENDIX C

Soakaway Calculation Sheets






















APPENDIX D

Limitations

NOTES ON LIMITATIONS

This report has been prepared by the Brownfield Consultancy with all reasonable skill, care and diligence. This report is confidential and has been prepared solely for the benefit of the client as stated at the front of the report in relation to a specific development or scheme; and those parties with whom a warranty agreement has been executed, or with whom an assignment has been agreed. Should any third party wish to use or rely upon the contents of the report, written approval must be sought from The Brownfield Consultancy; a charge may be levied against such approval. We accept no responsibility or liability for the consequences of this document being used for any purpose or project other than for which it was commissioned, and: this document to any third party with whom an agreement has not been executed.

Any comments given are based on the understanding that the proposed development will be as detailed. The Brownfield Consultancy warrants the accuracy of this report up to and including the published date. Additional information, improved practice or changes in legislation may necessitate this report having to be reviewed in whole or in part after that date.

This report is only valid when used it its entirety. Any information or advice included in the report should not be relied upon until considered in the context of the whole report. Whilst this report and the opinion made herein are correct to the best of our belief we cannot guarantee the accuracy or completeness of any information provided by third parties.

The opinions and recommendations expressed in this report are based on statute, guidance, and appropriate practice current at the date of its preparation. The Brownfield Consultancy does not accept any liability whatsoever for the consequences of any future legislative changes or the release of subsequent guidance documentation, etc. Such changes may render some of the opinions and advice in this report inappropriate or incorrect and we will be pleased to advise if any report requires revision due to changing circumstances. Following delivery of a report we have no obligation to advise the Client or any other party of such changes or their repercussions.

Phase 1 Reports

The work undertaken to provide the basis of a Phase I report comprised a study of available documented information from a variety of sources, together with (where appropriate) a brief walk over inspection of the site. The opinions given in this report have been dictated by the finite data on which they are based and are relevant only to the purpose for which the report was commissioned. The information reviewed should not be considered exhaustive and has been accepted in good faith as providing true and representative data pertaining to site conditions. It should be noted that any risks identified in this report are perceived risks based on the information reviewed; actual risks can only be assessed following a physical investigation of the site.

Historical maps and aerial photographs provide a "snap shot" in time about conditions or activities at the site and cannot be relied upon as indicators of any events or activities that may have taken place at other times.

Phase II Intrusive Investigations

The investigation of the site has been carried out to provide sufficient information concerning the type and degree of contamination, and ground and groundwater conditions to allow a reasonable risk assessment to be made. The conclusions and recommendations made in this site appraisal report and the opinions expressed are based on the information reviewed and/or the ground conditions encountered in exploratory holes and the results of any field or laboratory testing undertaken. There may be ground conditions at the site that have not been disclosed by the information reviewed or by the investigative work undertaken. Such undisclosed conditions cannot be taken into account in any analysis and reporting.

Some of the conclusions in this site appraisal report may be based on third party data. No guarantee can be given for the accuracy or completeness of any of the third party data used.

The evaluation and conclusions do not preclude the existence of contamination, which could not reasonably have been revealed by the current work. Given the discrete nature of sampling, no investigation technique is capable of identifying all conditions present in all areas. The number of sampling points and the methods of sampling and testing do not preclude the existence of localised "hotspots" of contamination where concentrations may be significantly higher than those actually encountered. Hence this report should be used for information purposes only and should not be construed as a comprehensive characterisation of all site conditions.

It should be noted that groundwater levels, groundwater chemistry, surface water levels, surface water chemistry, soil gas concentrations and soil gas flow rates can vary due to seasonal, climatic, tidal and man-made effects.

The interpretation carried out in this report is based on scientific and engineering appraisal carried out by suitably experienced and qualified technical consultants based on the scope of our engagement. We have not taken into account the perceptions of, for example, banks, insurers, other funders, lay people, etc., unless the report has been prepared specifically for that purpose. Advice from other specialists may be required such as the legal, planning and architecture professions, whether specifically recommended in our report or not.

The objectives of the investigation have been linked to establishing the risks associated with potential human targets, building materials, the environment (including adjacent land), and to surface and ground water. The amount of exploratory work and chemical testing undertaken has necessarily been restricted by the short timescale available, and the locations of exploratory holes have been restricted to areas unoccupied by the building(s) on the site and by buried services.

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APPENDIX H

Photographs

Photographs



Trial Trench TP15 looking North West



Trial Trench TP15 looking South East



Suspected ACM - Trial Trench TP15



Trial Trench TP15 stockpiled arisings

Photographs of the Site



Trial Trench TP16 arisings



Trial Trench TP16 arisings



Suspected ACM - Trial Trench TP16



Trial Trench TP16



Trial Trench TP16 – large piece of masonry



TP27 – Stockpile in North-West Corner

Photographs of the Site



Location of TP28



Photographs of the Site



TP29

APPENDIX I

Limitations

NOTES ON LIMITATIONS

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Should any third party wish to use or rely upon the contents of the report, written approval must be sought from The Brownfield Consultancy; a charge may be levied against such approval. We accept no responsibility or liability for the consequences of this document being used for any purpose or project other than for which it was commissioned, and: this document to any third party with whom an agreement has not been executed.

Any comments given are based on the understanding that the proposed development will be as detailed. The Brownfield Consultancy warrants the accuracy of this report up to and including the published date. Additional information, improved practice or changes in legislation may necessitate this report having to be reviewed in whole or in part after that date.

This report is only valid when used it its entirety. Any information or advice included in the report should not be relied upon until considered in the context of the whole report. Whilst this report and the opinion made herein are correct to the best of our belief we cannot guarantee the accuracy or completeness of any information provided by third parties.

The opinions and recommendations expressed in this report are based on statute, guidance, and appropriate practice current at the date of its preparation. The Brownfield Consultancy does not accept any liability whatsoever for the consequences of any future legislative changes or the release of subsequent guidance documentation, etc. Such changes may render some of the opinions and advice in this report inappropriate or incorrect and we will be pleased to advise if any report requires revision due to changing circumstances. Following delivery of a report we have no obligation to advise the Client or any other party of such changes or their repercussions.

Phase 1 Reports

The work undertaken to provide the basis of a Phase I report comprised a study of available documented information from a variety of sources, together with (where appropriate) a brief walk over inspection of the site. The opinions given in this report have been dictated by the finite data on which they are based and are relevant only to the purpose for which the report was commissioned. The information reviewed should not be considered exhaustive and has been accepted in good faith as providing true and representative data pertaining to site conditions. It should be noted that any risks identified in this report are perceived risks based on the information reviewed; actual risks can only be assessed following a physical investigation of the site.

Historical maps and aerial photographs provide a "snap shot" in time about conditions or activities at the site and cannot be relied upon as indicators of any events or activities that may have taken place at other times. Any borehole data from the British Geological Survey sources are included on the following basis: "The British Geological Survey accept no responsibility for omissions or misinterpretation of the data from their Data Bank as this may be old or obtained from non-BGS sources and may not represent current interpretation".

Phase II Intrusive Investigations

The investigation of the site has been carried out to provide sufficient information concerning the type and degree of contamination, and ground and groundwater conditions to allow a reasonable risk assessment to be made. The conclusions and recommendations made in this site appraisal report and the opinions expressed are based on the information reviewed and/or the ground conditions encountered in exploratory holes and the results of any field or laboratory testing undertaken. There may be ground conditions at the site that have not been disclosed by the information reviewed or by the investigative work undertaken. Such undisclosed conditions cannot be taken into account in any analysis and reporting.

Some of the conclusions in this site appraisal report may be based on third party data. No guarantee can be given for the accuracy or completeness of any of the third party data used.

The evaluation and conclusions do not preclude the existence of contamination, which could not reasonably have been revealed by the current work. Given the discrete nature of sampling, no investigation technique is capable of identifying all conditions present in all areas. The number of sampling points and the methods of sampling and testing do not preclude the existence of localised "hotspots" of contamination or different ground conditions where concentrations may be significantly higher than those actually encountered. Hence this report should be used for information purposes only and should not be construed as a comprehensive characterisation of all site conditions.

It should be noted that groundwater levels, groundwater chemistry, surface water levels, surface water chemistry, soil gas concentrations and soil gas flow rates can vary due to seasonal, climatic, tidal and man-made effects.

Exploratory hole locations provided in the report are generally established by tape measurement from existing features or boundaries. Hole locations are not accurately surveyed and ground levels at these locations are not obtained unless specifically requested.

The interpretation carried out in this report is based on scientific and engineering appraisal carried out by suitably experienced and qualified technical consultants based on the scope of our engagement. We have not taken into account the perceptions of, for example, banks, insurers, other funders, lay people, etc., unless the report has been prepared specifically for that purpose. Advice from other specialists may be required such as the legal, planning and architecture professions, whether specifically recommended in our report or not.

The objectives of the investigation have been linked to establishing the risks associated with potential human targets, building materials, the environment (including adjacent land), and to surface and ground water. The amount of exploratory work and chemical testing undertaken has necessarily been restricted by the short timescale available, and the locations of exploratory holes have been restricted to areas unoccupied by the building(s) on the site and by buried services.

New information, improved practices and legislation may necessitate an alteration to the report in whole, or in part, after its submission. Therefore with any change in circumstances or after the expiry of one year from the date of the report, the report should be referred to the Brownfield Consultancy Limited for re-assessment and, if necessary, re-appraisal.

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