

**LEGEND**

- FACILITY BOUNDARY
- BOGLAND/ WETLAND
- DOMESTIC WELL
- DWELLING

ORDNANCE SURVEY IRELAND  
LICENCE NUMBER  
**AR0056004**

Issue Date:		
No.	Date	Description

A NOV '04 ISSUE TO EPA  
Surveyed by:  
Environment & Resource Management Ltd.

Client:  
**KTK Landfill Ltd.**  
Brownstown, KILCULLEN  
Co. KILDARE

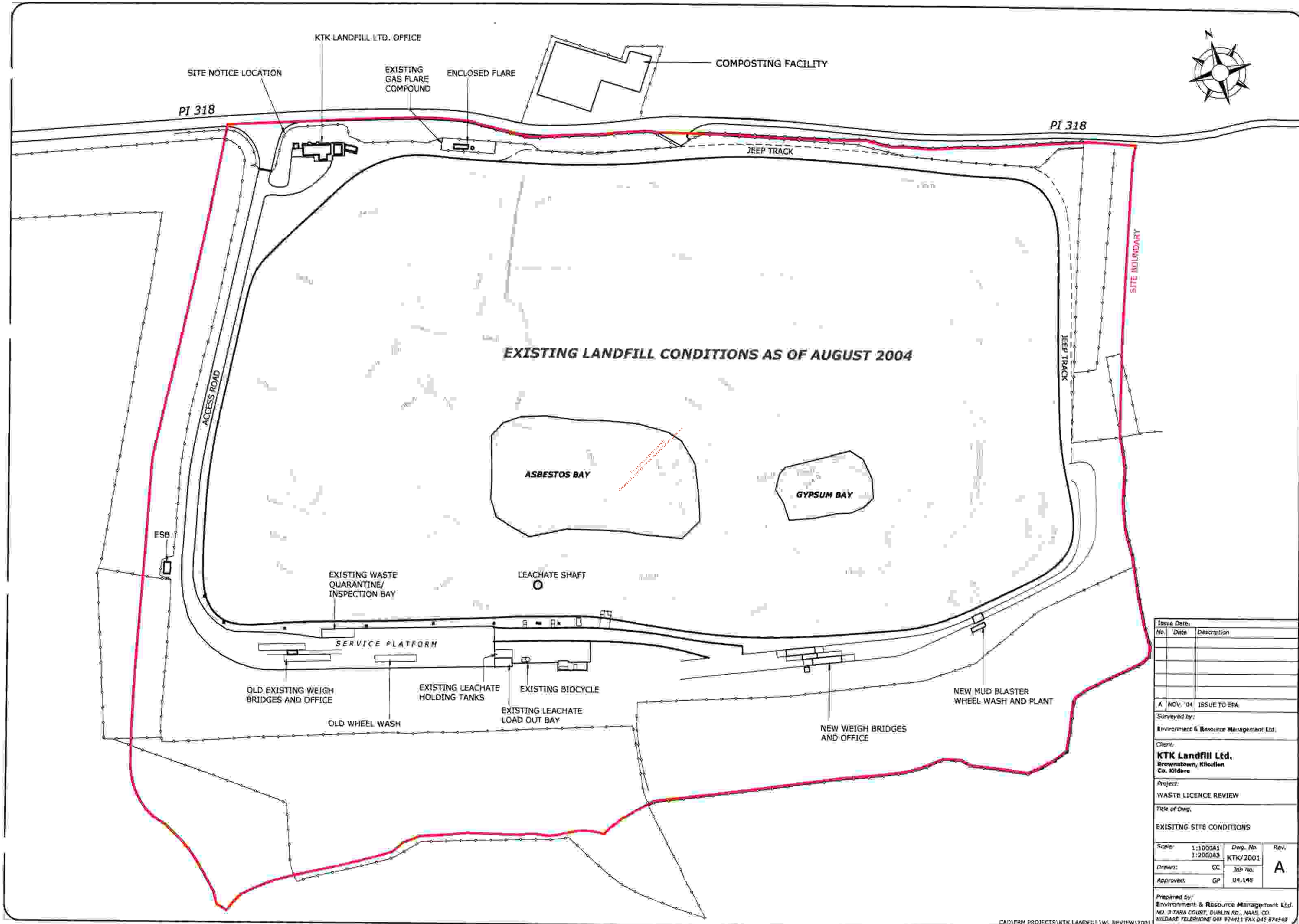
Project:  
WASTE LICENCE REVIEW

Title of Dwg:  
SITE LOCATION

Scale:	Dwg. No.	Rev.
1:2500A1 1:5000A3	KTK/2000	A
Drawn: CC	Job No.	
Approved: GP	04.148	

Prepared by:  
Environment & Resource Management Ltd  
NO 3 TARA COURT, DUBLIN RD., NANS, CO.  
KILDARE TELEPHONE 045 874411 FAX 045 874549

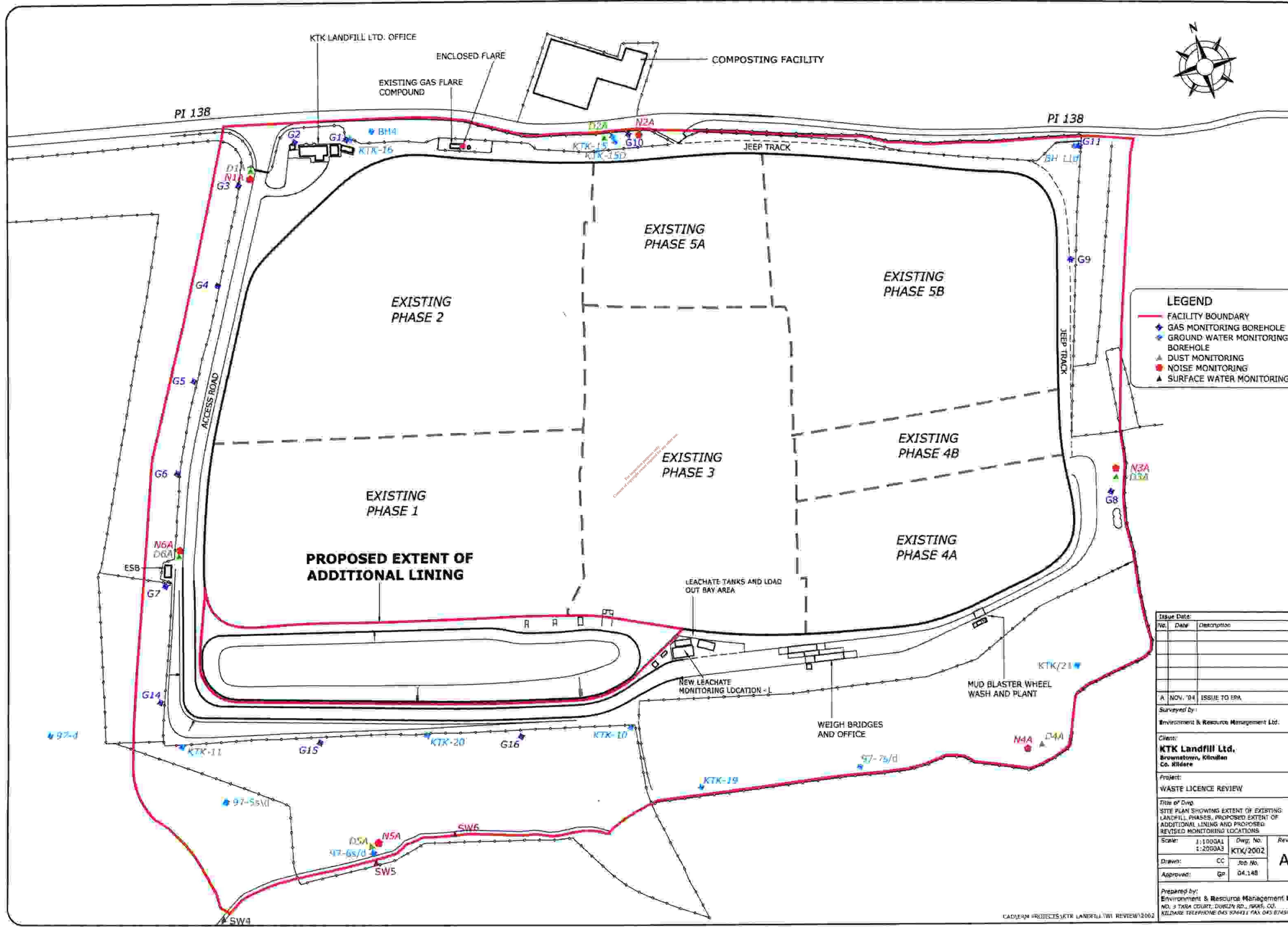




**EXISTING LANDFILL CONDITIONS AS OF AUGUST 2004**

Issue Date:		
No.	Date	Description
A	NOV. '04	ISSUE TO EPA
Surveyed by: Environment & Resource Management Ltd.		
Client: <b>KTK Landfill Ltd.</b> Brownstown, Kilkullen Co. Kildare		
Project: WASTE LICENCE REVIEW		
Title of Dwg. <b>EXISTING SITE CONDITIONS</b>		
Scale:	1:1000A1 1:2000A3	Dwg. No. KTK/2001
Drawn:	CC	Job No.
Approved:	GP	04.148
Prepared by: Environment & Resource Management Ltd. NO. 3 TARA COURT, DUBLIN RD., NAAS, CO. MIDDARE TELEPHONE 018 744111 FAX 018 744549		



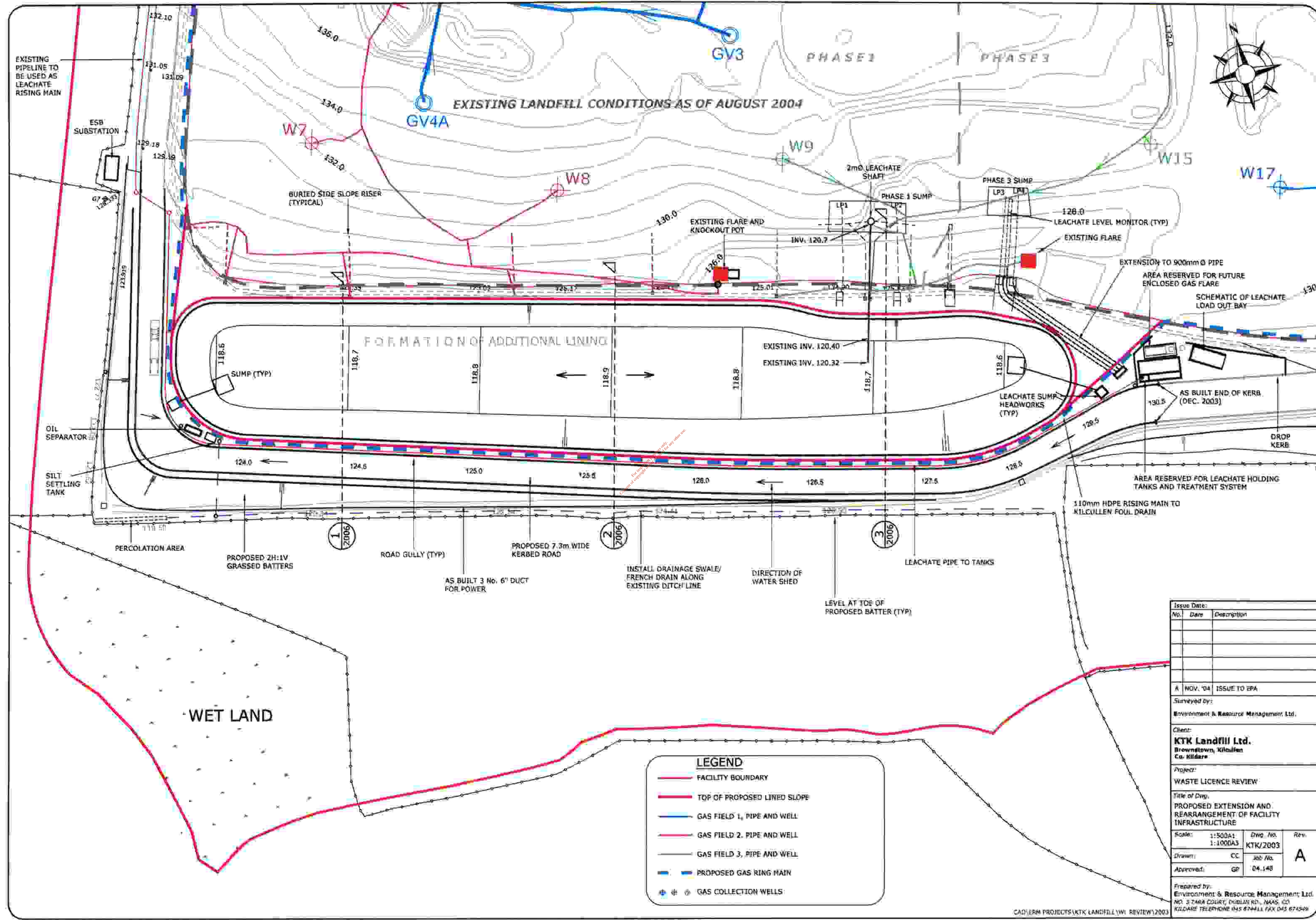


**LEGEND**

- FACILITY BOUNDARY
- ◆ GAS MONITORING BOREHOLE
- ◆ GROUND WATER MONITORING BOREHOLE
- ▲ DUST MONITORING
- NOISE MONITORING
- ▲ SURFACE WATER MONITORING

Issue Date:		
No.	Date	Description
A	NOV. '04	ISSUE TO EPA
Surveyed by: Environment & Resource Management Ltd.		
Client: <b>KTK Landfill Ltd.</b> Brownstown, Kilkenny Co. Kildere		
Project: WASTE LICENCE REVIEW		
Title of Dwg: SITE PLAN SHOWING EXTENT OF EXISTING LANDFILL PHASES, PROPOSED EXTENT OF ADDITIONAL LINING AND PROPOSED REVISED MONITORING LOCATIONS		
Scale:	1:1000A1 1:2000A3	Dwg. No. KTK/2002
Drawn:	CC	Job No. 04.148
Approved:	Gp	
Prepared by: Environment & Resource Management Ltd. NO. 3 TARA COURT, DUBLIN RD., SPANISH CO., KILDARE. TELEPHONE 045 804411 FAX 045 874549		



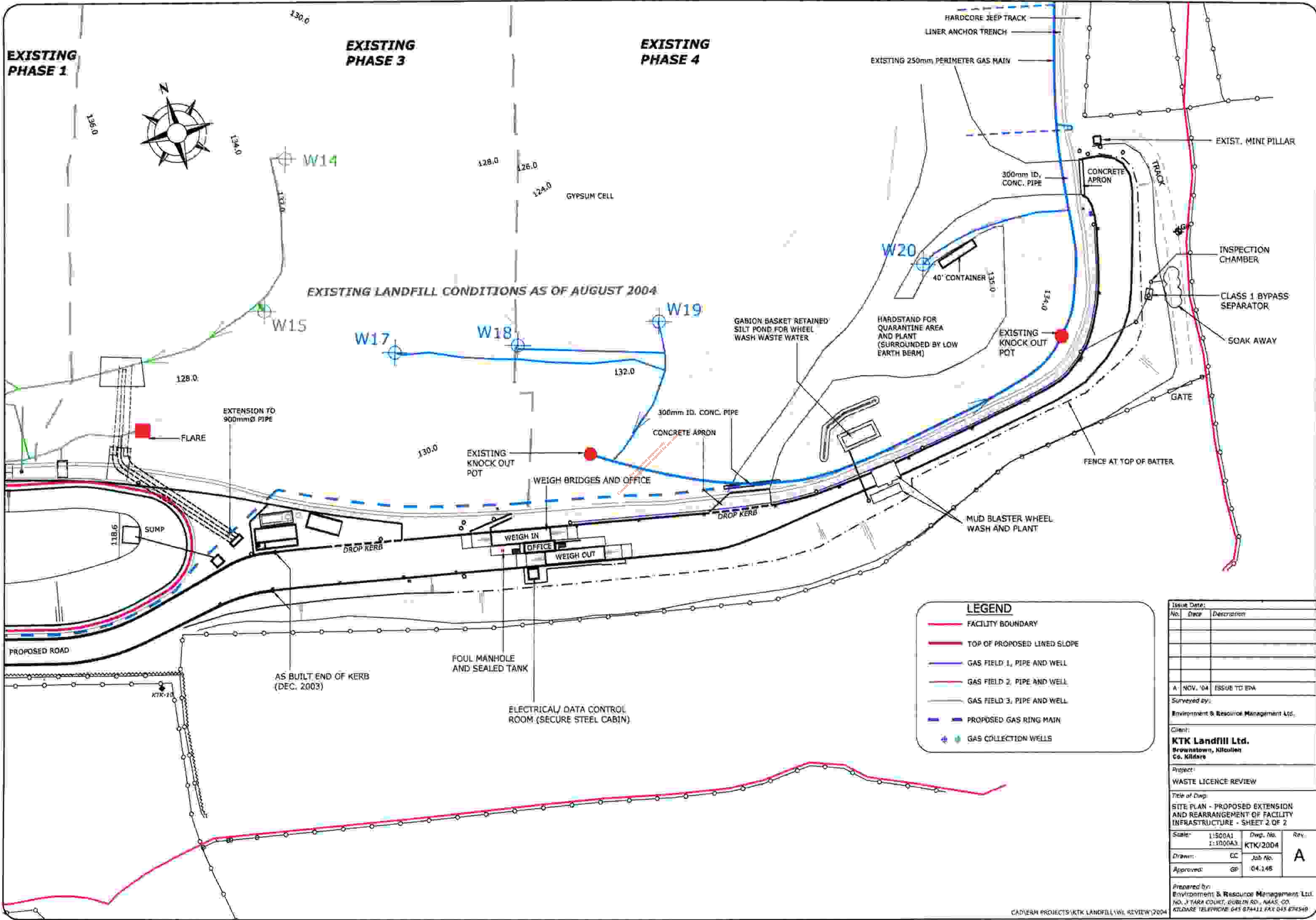


**LEGEND**

- FACILITY BOUNDARY
- TOP OF PROPOSED LINED SLOPE
- GAS FIELD 1, PIPE AND WELL
- GAS FIELD 2, PIPE AND WELL
- GAS FIELD 3, PIPE AND WELL
- PROPOSED GAS RING MAIN
- ⊕ ⊖ ⊙ GAS COLLECTION WELLS

Issue Date:		
No.	Date	Description
A	NOV. '04	ISSUE TO EPA
Surveys by: Environment & Resource Management Ltd.		
Client: <b>KTK Landfill Ltd.</b> Browstown, Kildare Co. Kildare		
Project: WASTE LICENCE REVIEW		
Title of Dwg. PROPOSED EXTENSION AND REARRANGEMENT OF FACILITY INFRASTRUCTURE		
Scale:	1:500A1 1:1000A3	Dwg. No. KTK/2003
Drawn:	CC	Job No. 04.148
Approved:	GP	Rev. <b>A</b>
Prepared by: Environment & Resource Management Ltd. NO. 3 ZARA COURT, DUBLIN RD., NAAS, CO. KILDARE TELEPHONE (01) 8744111 FAX (01) 8745499		





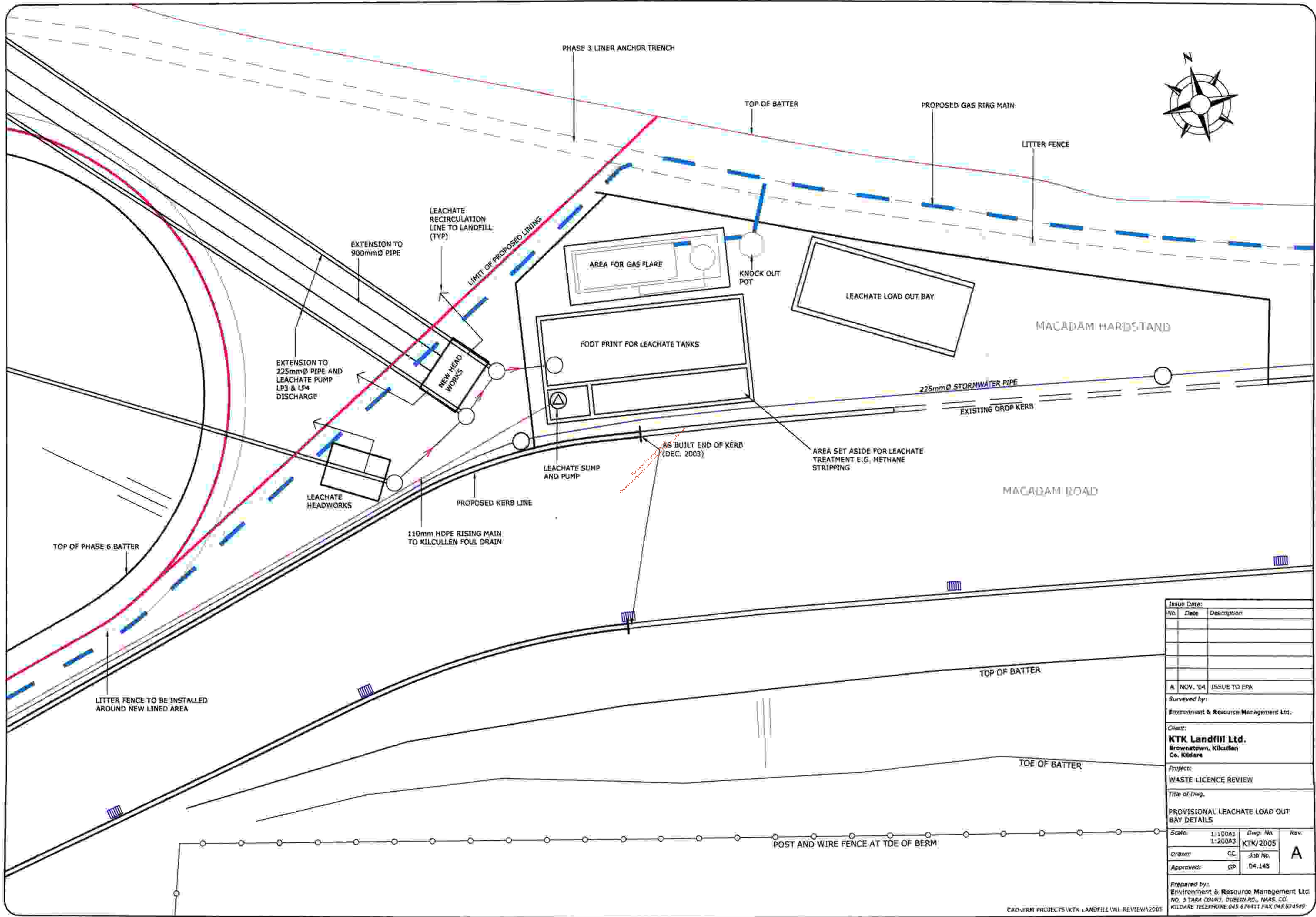
EXISTING LANDFILL CONDITIONS AS OF AUGUST 2004

**LEGEND**

- FACILITY BOUNDARY
- TOP OF PROPOSED LINED SLOPE
- GAS FIELD 1, PIPE AND WELL
- GAS FIELD 2, PIPE AND WELL
- GAS FIELD 3, PIPE AND WELL
- PROPOSED GAS RING MAIN
- + GAS COLLECTION WELLS

Issue Date:		
No.	Date	Description
A	NOV. '04	ISSUE TO EMA
Surveyed by:		
Environment & Resource Management Ltd.		
Client:		
KTK Landfill Ltd. Brownstown, Kildare Co. Kildare		
Project:		
WASTE LICENCE REVIEW		
Title of Dwg:		
SITE PLAN - PROPOSED EXTENSION AND REARRANGEMENT OF FACILITY INFRASTRUCTURE - SHEET 2 OF 2		
Scale:	1:500A1 1:1000A3	Dwg. No. KTK/2004
Drawn:	CC	Rev. A
Approved:	GP	Job No. 04.146
Prepared by:		
Environment & Resource Management Ltd. NO. 3 TARA COURT, DUBLIN RD., NAAS, CO. KILDARE TELEPHONE: 045 874411 FAX: 045 874549		





Issue Date:		
No.	Date	Description
A	NOV. '04	ISSUE TO EPA
Survised by:		
Environment & Resource Management Ltd.		
Client:		
<b>KTK Landfill Ltd.</b> Brownstown, Kilkullen Co. Kildare		
Project:		
WASTE LICENCE REVIEW		
Title of Dwg.		
PROVISIONAL LEACHATE LOAD OUT BAY DETAILS		
Scale:	1:1000 1:2000	Dwg. No. KTK/2005
Drawn:	CC	Job No. 04.148
Approved:	GP	
Prepared by:		
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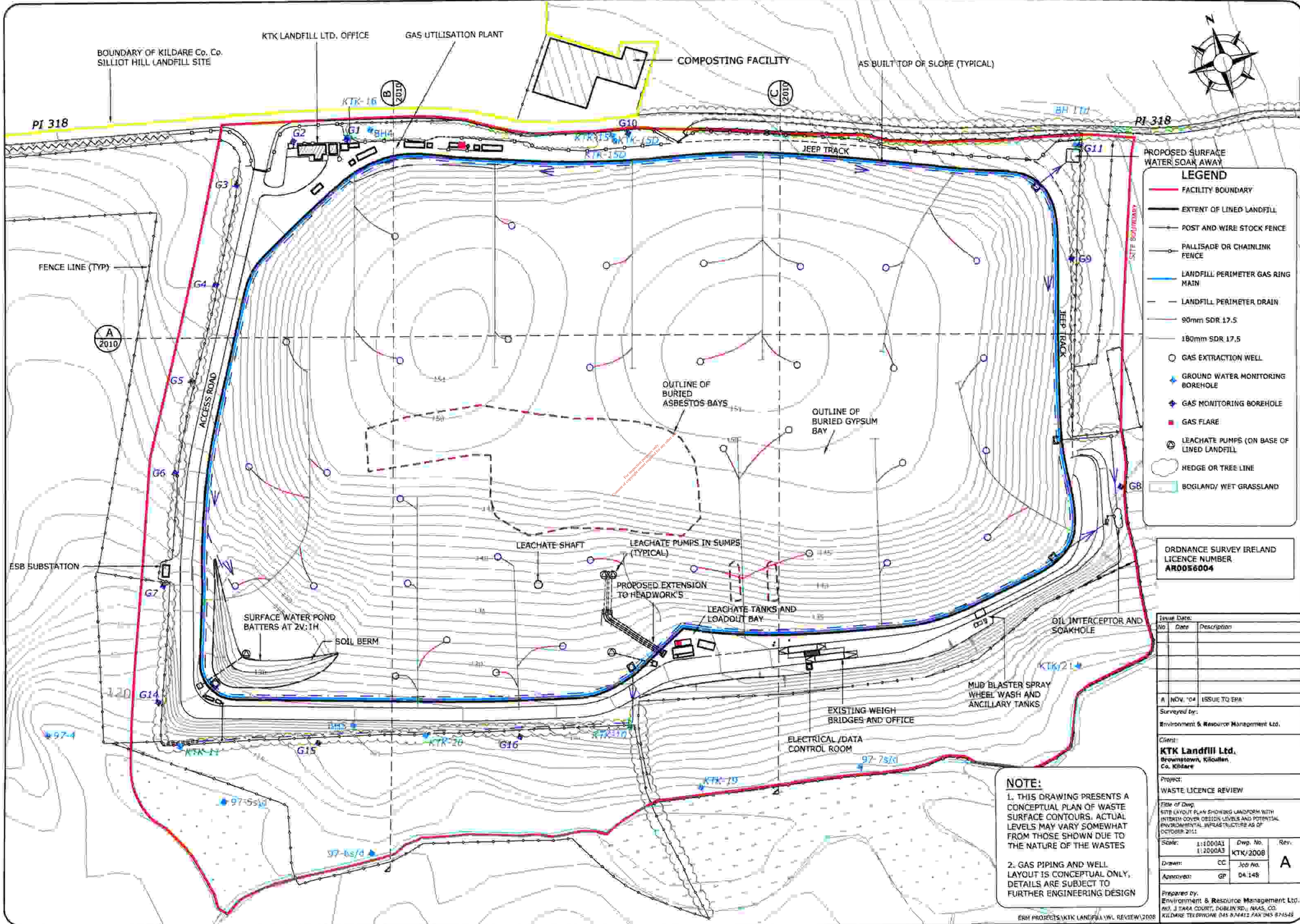












**PROPOSED SURFACE WATER SOAK AWAY**

**LEGEND**

- FACILITY BOUNDARY
- EXTENT OF LINED LANDFILL
- POST AND WIRE STOCK FENCE
- PALLISADE OR CHAINLINK FENCE
- LANDFILL PERIMETER GAS RING MAIN
- LANDFILL PERIMETER DRAIN
- 90mm SDR 17.5
- 180mm SDR 17.5
- GAS EXTRACTION WELL
- ⊕ GROUND WATER MONITORING BOREHOLE
- ⊕ GAS MONITORING BOREHOLE
- GAS FLARE
- ⊗ LEACHATE PUMPS (ON BASE OF LINED LANDFILL)
- HEDGE OR TREE LINE
- BOG/ WET GRASSLAND

ORDNANCE SURVEY IRELAND LICENCE NUMBER  
**AR0056004**

Issue Date:		
No.	Date	Description
A	NOV. '04	ISSUE TO EPA

Surveyed by:  
Environment & Resource Management Ltd.

Client:  
**KTK Landfill Ltd.**  
Brownstown, Kilkullen,  
Co. Kildare

Project:  
WASTE LICENCE REVIEW

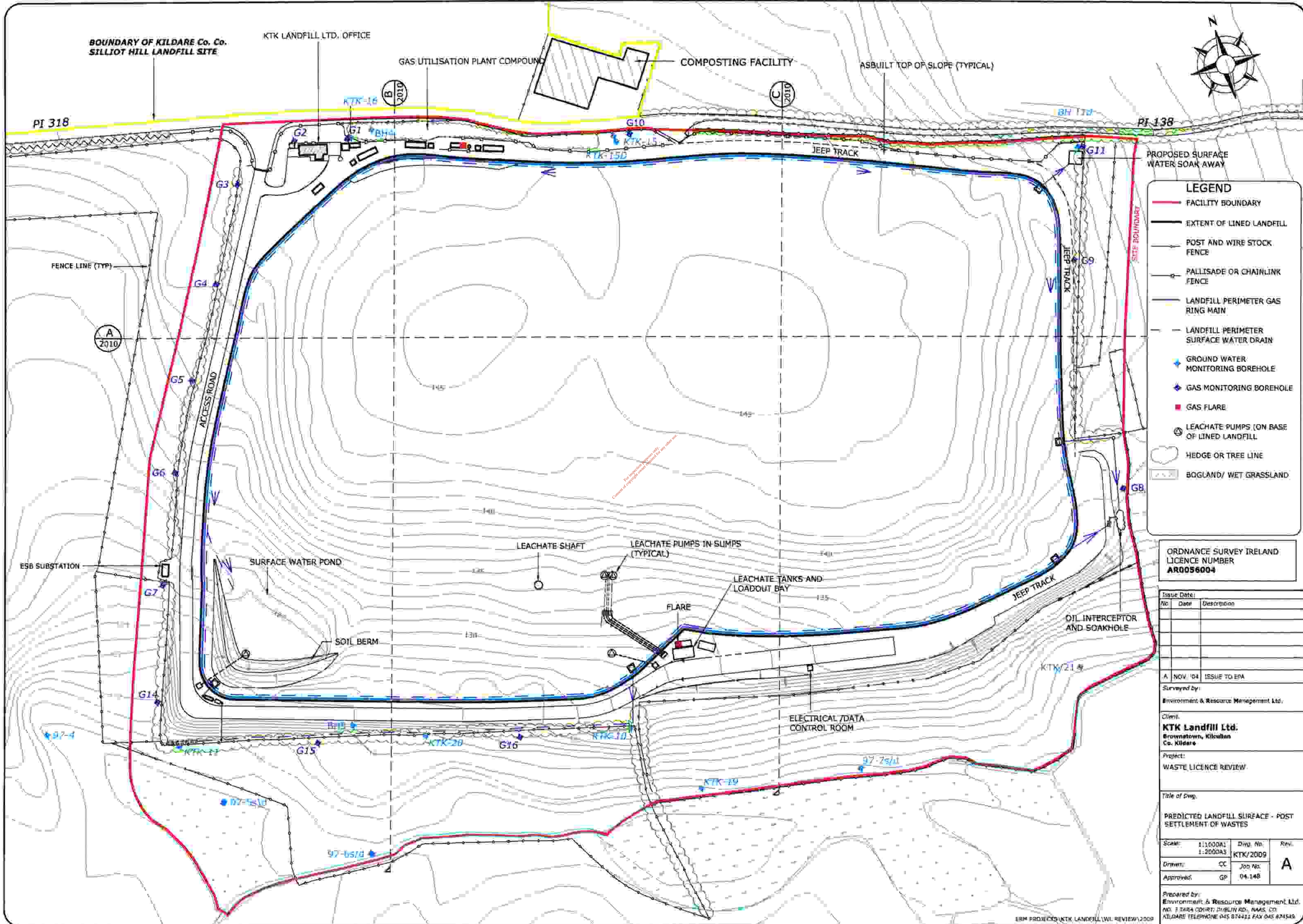
Title of Dwg:  
SITE LAYOUT PLAN SHOWING LANDFORM WITH INTERIM COVER DESIGN LEVELS AND POTENTIAL ENVIRONMENTAL INFRASTRUCTURE AS OF OCTOBER 2012

Scale:	Dwg. No.	Rev.
1:1000A1 1:2000A3	KTK/2008	A

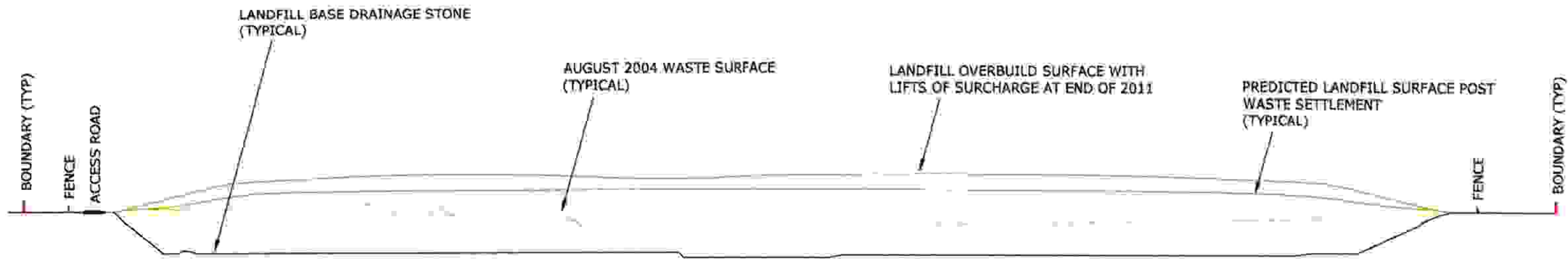
Drawn: CC  
Approved: GP  
Prepared by:  
Environment & Resource Management Ltd.  
NO. 3 TARA COURT, DUBLIN RD., NAAS, CO. KILDARE  
KILDARE TELEPHONE 045 874412 FAX 045 874545

**NOTE:**  
1. THIS DRAWING PRESENTS A CONCEPTUAL PLAN OF WASTE SURFACE CONTOURS. ACTUAL LEVELS MAY VARY SOMEWHAT FROM THOSE SHOWN DUE TO THE NATURE OF THE WASTES  
2. GAS PIPING AND WELL LAYOUT IS CONCEPTUAL ONLY. DETAILS ARE SUBJECT TO FURTHER ENGINEERING DESIGN

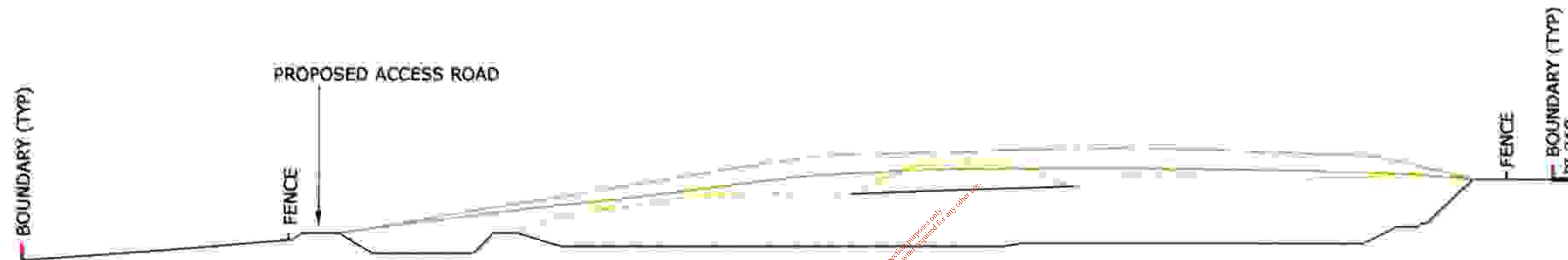








DATUM = 100m  
**SECTION A**



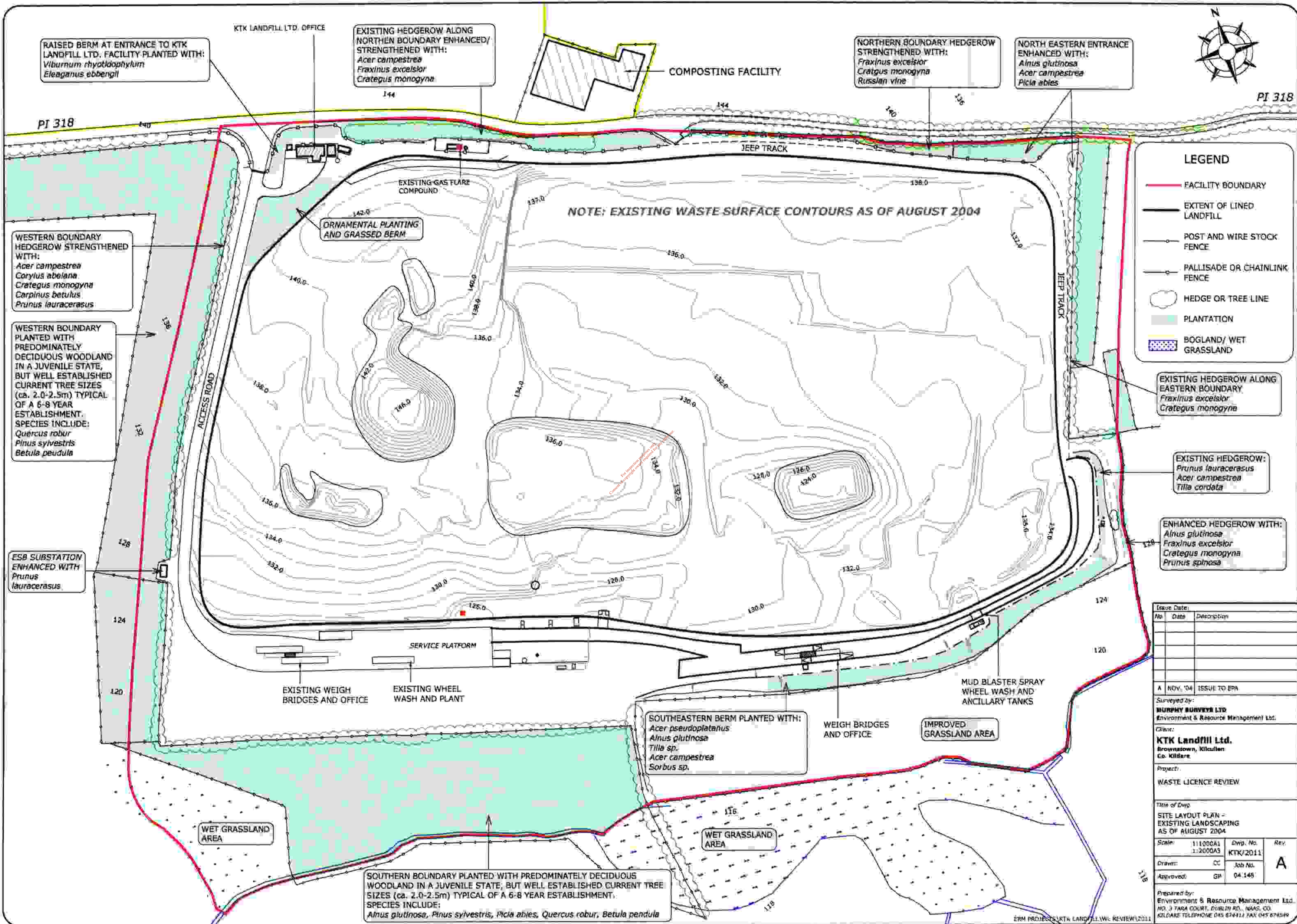
DATUM = 100m  
**SECTION B**



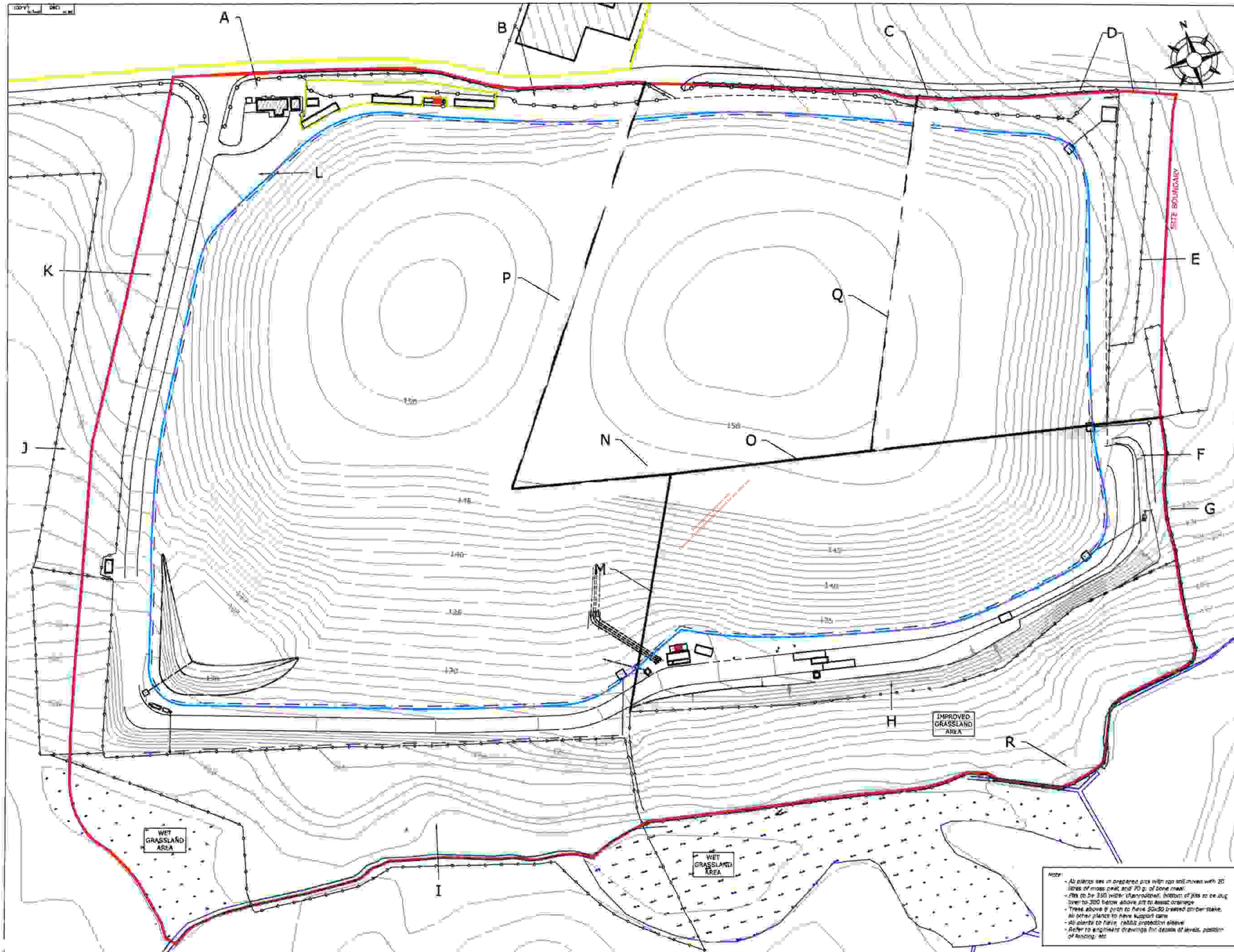
DATUM = 100m  
**SECTION C**

Issue Date:			
No.	Date	Description	
A	NOV. '04	ISSUE TO EPA	
Surveyed by:			
Environment & Resource Management Ltd.			
Client:			
<b>KTK Landfill Ltd.</b> Brownstown, Kilkullen Co. Kildare			
Project:			
WASTE LICENCE REVIEW			
Title of Dwg.			
SECTIONS (REFER TO DWG. NO. KTK/2008 & DWG. NO. KTK/2009)			
Scale:	1:1000A1 1:2000A3	Dwg. No. KTK/2010	Rev. A
Drawn:	CC	Job No.	04.148
Approved:	GP	04.148	
Prepared by:			
Environment & Resource Management Ltd NO 3 YASKA COURT, DUBLIN RD., NAAS, CO. KILDARE TELEPHONE 045 874411 FAX 045 874540			









**EXISTING PLANTING SCHEDULE**

A	Viburnum rhytidophyllum Elaeagnus ebbengei
B	Acer campestre Fraxinus excelsior Crataegus monogyna
C	Fraxinus excelsior Crataegus monogyna Rosa sp.
D	Alnus glutinosa Acer campestre Ficus sp.
E	Fraxinus excelsior Crataegus monogyna
F	Pinus laurocassus Acer campestre Tilia cordata
G	Alnus glutinosa Fraxinus excelsior Crataegus monogyna Prunus spinosa
H	Acer campestre Alnus glutinosa Tilia sp. Acer campestre Sorbus sp.
I	Alnus glutinosa Pinus sylvestris Rosa sp. Quercus robur Betula pendula
J	Quercus robur Pinus sylvestris Betula pendula
K	Acer campestre Corylus avellana Crataegus monogyna Carpinus betulus Prunella laurocassus
L	Ornamental planting and grassed berm

**PROPOSED PLANTING SCHEDULE**

Descriptor	No.	Min size in cm
M	Fraxinus Excelsior 8 No.	10-12 Girth
	Crataegus Monogyna 100 No.	65+ Height
	Corylus Avellana 35 No.	65+ Height
	Ilex Aquifolium 55 No.	90+ Height
	Prunus Spinosa 75 No.	65+ Height
	Viburnum Tiliifolium 7 No.	55+ Height
	Betula Pendula 8 No.	55+ Height
	Cornus A. Brevipetiolata 21 No.	65+ Height
	Rosa Rugosa 13 No.	45+ Height
N	Fraxinus Excelsior 13 No.	10-12 Girth
	Pinus Sylvestris 3 No.	60+ Height
	Quercus Cerris 3 No.	120+ Height
	Alnus Glutinosa 5 No.	5-10 Girth
	Acer Campestre 6 No.	10-12 Girth
	Betula Pendula 14 No.	10-12 Girth
	Acer Platanoides 6 No.	5-8 Girth
	Rosa Rugosa 14 No.	5-8 Girth
	Prunella Sp. 5 No.	120+ Height
	Crataegus Monogyna 75 No.	65+ Height
	Corylus Avellana 35 No.	90+ Height
	Ilex Aquifolium 9 No.	90+ Height
	Prunus Spinosa 35 No.	65+ Height
	Prunella Sp. 3 No.	65+ Height
	Viburnum Tiliifolium 7 No.	55+ Height
	Betula Pendula 12 No.	65+ Height
	Cornus A. Brevipetiolata 10 No.	55+ Height
	Rosa Rugosa 25 No.	45+ Height
O	Fraxinus Excelsior 25 No.	10-12 Girth
	Quercus Cerris 5 No.	120+ Height
	Acer Campestre 8 No.	10-12 Girth
	Crataegus Monogyna 68 No.	65+ Height
	Corylus Avellana 14 No.	90+ Height
	Ilex Aquifolium 9 No.	90+ Height
	Prunus Spinosa 35 No.	65+ Height
	Viburnum Tiliifolium 7 No.	55+ Height
	Cornus A. Brevipetiolata 14 No.	65+ Height
	Rosa Rugosa 35 No.	45+ Height
P	Fraxinus Excelsior 49 No.	10-12 Girth
	Pinus Sylvestris 14 No.	60+ Height
	Quercus Cerris 7 No.	120+ Height
	Alnus Glutinosa 21 No.	8-10 Girth
	Acer Campestre 11 No.	10-12 Girth
	Crataegus Monogyna 212 No.	65+ Height
	Corylus Avellana 49 No.	90+ Height
	Ilex Aquifolium 14 No.	90+ Height
	Prunus Spinosa 105 No.	65+ Height
	Rhamnus T. Ole Sward 4 No.	65+ Height
	Viburnum Tiliifolium 16 No.	55+ Height
	Betula Pendula 27 No.	65+ Height
	Cornus A. Brevipetiolata 45 No.	65+ Height
	Rosa Rugosa 55 No.	65+ Height
Q	Fraxinus Excelsior 25 No.	10-12 Girth
	Quercus Cerris 10 No.	60+ Height
	Acer Campestre 5 No.	10-12 Girth
	Alnus Glutinosa 5 No.	10-12 Girth
	Crataegus Monogyna 150 No.	65+ Height
	Corylus Avellana 35 No.	90+ Height
	Ilex Aquifolium 9 No.	90+ Height
	Prunus Spinosa 75 No.	65+ Height
	Rhamnus T. Ole Sward 1 No.	65+ Height
	Viburnum Tiliifolium 14 No.	55+ Height
	Betula Pendula 19 No.	65+ Height
	Cornus A. Brevipetiolata 35 No.	65+ Height
	Rosa Rugosa 40 No.	65+ Height
R	Crataegus Monogyna 25 No.	65+ Height
	Corylus Avellana 15 No.	90+ Height
	Ilex Aquifolium 9 No.	90+ Height
	Prunus Spinosa 35 No.	65+ Height
	Viburnum Tiliifolium 9 No.	55+ Height
	Betula Pendula 13 No.	65+ Height
	Rosa Rugosa 21 No.	45+ Height
	Potentilla Franchetii 10 No.	30+ Height

**NOTE:**

- All strips are in prepared pits with top soil mixed with 20 litres of moss peat and 70 g of bone meal.
- Pits to be 350 width, channelled, bottom of pits to be dug over to 300 below above pit to assist drainage.
- Trees above 8' girth to have 50x50 treated timber stake.
- All other plants to have support cane.
- All plants to have 100% protection sleeve.
- Refer to engineer's drawings for details of levels, position of fencing, etc.

revisions	date	issue	revisions	date	issue

date	issue	revisions	date	issue

Do not scale from this drawing. If you must, consult the architect.

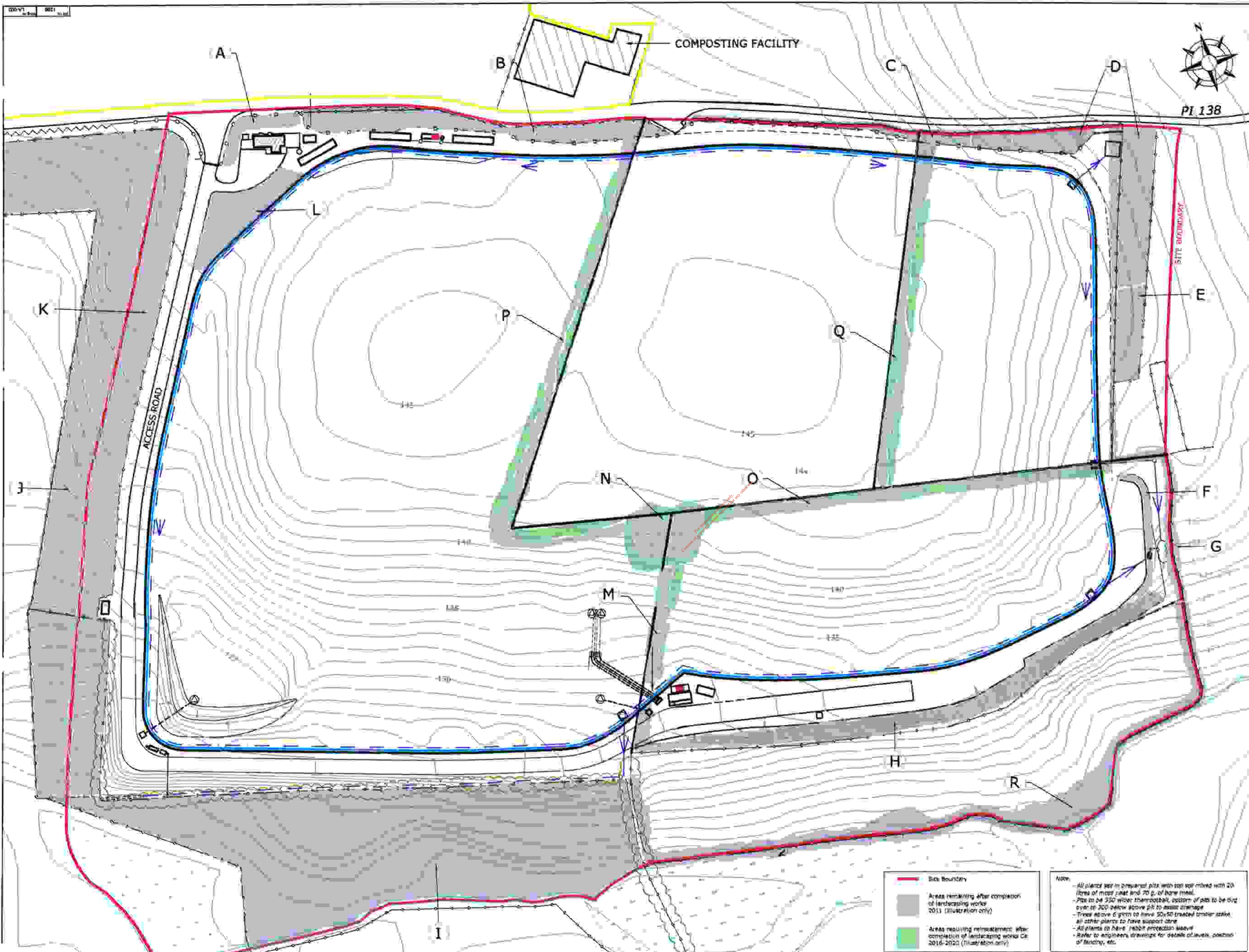
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job no 1286  
 dra no LA-001  
 issue PP  
 job title KTK LANDFILL LTD. BROWNSTOWN. KILCULLEN. Co. KILDARE  
 dra title COMPLETION OF LANDSCAPING WORKS END OF 2011  
 dra by C B  
 scale 1:1000 (A1)  
 date SET 2004



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**EXISTING PLANTING SCHEDULE**

A	Viburnum rhytidophyllum Fraxinus excelsior
B	Acer campestre Fraxinus excelsior Crataegus monogyna
C	Fraxinus excelsior Crataegus monogyna Rosa rugosa
D	Alnus glutinosa Acer campestre Ficus siliqua
E	Fraxinus excelsior Crataegus monogyna
F	Prunus laurocerasus Acer campestre Tilia cordata
G	Alnus glutinosa Fraxinus excelsior Crataegus monogyna Prunus laurocerasus
H	Acer pseudoplatanus Alnus glutinosa Tilia sp. Acer campestre Sorbus sp.
I	Alnus glutinosa Prunus sylvatica Rosa rugosa Quercus robur Betula pendula
J	Quercus robur Prunus sylvatica Betula pendula
K	Acer campestre Corylus avellana Crataegus monogyna Carpinus betulus Prunus laurocerasus
L	Ornamental planting and grassed lawn

**PROPOSED PLANTING SCHEDULE**

Description	No.	Min size in cm
M	Fraxinus excelsior 8 No.	10-12 Girth
	Crataegus monogyna 100 No.	65+ Height
	Corylus avellana 35 No.	90+ Height
	Ilex aquifolium 55 No.	50+ Height
	Prunus serrulata 75 No.	55+ Height
	Viburnum tinus 7 No.	55+ Height
	Salix caprea 8 No.	55+ Height
	Cornus A. elegantissima 21 No.	65+ Height
	Rosa rugosa 13 No.	45+ Height
N	Fraxinus excelsior 13 No.	10-12 Girth
	Fagus sylvatica 2 No.	60+ Height
	Quercus cerris 5 No.	120+ Height
	Alnus glutinosa 12 No.	8-10 Girth
	Acer campestre 6 No.	10-12 Girth
	Betula pendula 14 No.	10-12 Girth
	Acer pseudoplatanus 6 No.	6-8 Girth
	Alnus cordata 14 No.	6-8 Girth
	Populus alba 6 No.	120+ Height
	Crataegus monogyna 75 No.	65+ Height
	Corylus avellana 35 No.	90+ Height
	Ilex aquifolium 55 No.	50+ Height
	Prunus serrulata 75 No.	55+ Height
	Phormium T. Oak Sward 3 No.	55+ Height
	Viburnum tinus 7 No.	55+ Height
	Salix caprea 12 No.	65+ Height
	Cornus A. elegantissima 10 No.	65+ Height
	Rosa rugosa 13 No.	45+ Height
O	Fraxinus excelsior 25 No.	10-12 Girth
	Quercus cerris 8 No.	120+ Height
	Acer campestre 8 No.	10-12 Girth
	Crataegus monogyna 68 No.	65+ Height
	Corylus avellana 34 No.	90+ Height
	Ilex aquifolium 54 No.	50+ Height
	Prunus serrulata 85 No.	55+ Height
	Viburnum tinus 8 No.	55+ Height
	Cornus A. elegantissima 14 No.	65+ Height
	Rosa rugosa 13 No.	45+ Height
P	Fraxinus excelsior 45 No.	10-12 Girth
	Fagus sylvatica 14 No.	60+ Height
	Quercus cerris 7 No.	120+ Height
	Alnus glutinosa 21 No.	8-10 Girth
	Acer campestre 11 No.	10-12 Girth
	Crataegus monogyna 215 No.	65+ Height
	Corylus avellana 48 No.	90+ Height
	Ilex aquifolium 54 No.	50+ Height
	Prunus serrulata 105 No.	55+ Height
	Phormium T. Oak Sward 4 No.	55+ Height
	Viburnum tinus 18 No.	55+ Height
	Salix caprea 27 No.	65+ Height
	Cornus A. elegantissima 49 No.	65+ Height
	Rosa rugosa 13 No.	45+ Height
Q	Fraxinus excelsior 35 No.	10-12 Girth
	Fagus sylvatica 10 No.	60+ Height
	Quercus cerris 3 No.	120+ Height
	Alnus glutinosa 15 No.	8-10 Girth
	Acer campestre 8 No.	10-12 Girth
	Crataegus monogyna 156 No.	65+ Height
	Corylus avellana 35 No.	90+ Height
	Ilex aquifolium 54 No.	50+ Height
	Prunus serrulata 75 No.	55+ Height
	Phormium T. Oak Sward 3 No.	55+ Height
	Viburnum tinus 14 No.	55+ Height
	Salix caprea 15 No.	65+ Height
	Cornus A. elegantissima 15 No.	65+ Height
	Rosa rugosa 13 No.	45+ Height
R	Crataegus monogyna 45 No.	65+ Height
	Corylus avellana 15 No.	90+ Height
	Ilex aquifolium 3 No.	50+ Height
	Prunus serrulata 15 No.	55+ Height
	Viburnum tinus 5 No.	55+ Height
	Salix caprea 15 No.	65+ Height
	Rosa rugosa 13 No.	45+ Height
	Potentilla fruticosa 18 No.	30+ Height

**Site Boundary**

Areas remaining after completion of landscaping works 2011 (Illustration only)

Areas requiring reinstatement after completion of landscaping works ca 2016-2020 (Illustration only)

**Note:**

- All plants set in prepared pits with top soil mixed with 20 litres of manure and 70 g of bone meal.
- Pits to be 300 wider than rootball, bottom of pits to be dug over to 300 below above pit to assist drainage.
- Trees above 6 girth to have 30x50 treated timber stakes.
- All plants to have rabbit protection added.
- Refer to engineers drawings for details of levels, contours of footing, etc.

revisions	date	issue	revisions	date	issue

Do not scale from this drawing. If in doubt, contact the Author.	stamp	job title	job no.	dwg no.	issue

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job title  
**KTK LANDFILL LTD,  
BROWNSTOWN,  
KILGULLEN,  
Co KILDARE**

job no.  
1286

dwg no.  
LA-002

issue  
PP

dwg title  
**LANDSCAPE REINSTATEMENT WORKS  
Ca. 2016-2020**

drawn by  
C.B.

scale  
1:1000 (A1)

date  
OCT 2004

**MARTIN MURRAY  
ARCHITECTS**

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