Westbury Homes (Holdings) Ltd 34-37 Lambourne Crescent Cardiff Business Park Llanishen Cardiff CF14 5GG
Tel 02920 768400 Fax 02920 761044 Website www.westbury-homes.co.uk

Westbury

Polution and Discharge Consent
Environmental Agency
154 St Helens Road
Swansea
SA1 4DF

Our ref: L269.DS.HW
1 July 2003

Dear Sir/Madam,

RE: PROPROSED DEVELOPMENT AT GAS WORKS TERRACE, BRIDGEND.

Please find enclosed an application form together with the relevant drawings and fee for a consent to discharge an emergency overflow from a pumping station to the Llynf River.

I trust the enclosed meets with your approval and should you require any further information please do not hesitate to contact myself.

Yours faithfully

DEAN STEPHENS
Design Engineer

Westbury

BRYN ROAD, BRYNMENYN

Pump Station Operation

No. of units = 23

(Pr = Pump Rate (assume) 7.5 l/s)

Therefore 6 DWF @ 4000 l/unit/day = 1.065 l/s
1 DWF @ 4000 l/unit/day = 0.18 l/s

Pump Station ring diameter 2.4m
Effective pump sump diameter 1.725m

Assuming 300mm pump window – Volume of Sump = 0.7 m^3
700 litres

Average time to full sump @ 6 DWF inflow = $\frac{1.065 \times 700}{60}$ = 12.42 min

Full sump @ 1 DWF = 64.8 min

Check Rising Main Velocity
Rising Main Diameter = 100mm

VRM = Q = Vrm x A
VRM = Q/A
VRM = $\frac{7.5 \text{ l/s} / 1000}{\frac{(0.1 \times 0.1 \times \pi)}{4}}$ = 0.96 m/s

Time to empty sump @ 6DWF inflow and assumed pump rate of 7.5 l/s
= $700/\frac{(7.5 - 1.065) \times 60}{3600}$ = 1.81 min

Total Pump Cycle at Qpeak = 12.42 + 1.81 = 14.2 mins
Therefore No. of steps/stops per hr = 4.2

Dwr Cymru

Required storage of 160 l/s dwelling (SFA 2.14.6)
160 x 23 = 3.68 m^3

Providing a 2400mm wet well
Area of 2400mm circular wet well = 4.52 m^2
Therefore depth required to store **3.68 m^3 = 820mm**

EA

Required storage of 1801/per head/day = DWF
23 units totalling 69 heads at 1.5 = 103.5
3 DWF x 2 hours storage = $3 \times \frac{180 \times 103.5}{24} \times 2 = 465\ m^3$

Therefore depth required to store **4.65 m^3 = 1030mm**

Storage Calculations

Lowest slab level = 48.40m

Lowest private manhole invert = 46.65m

Cover level of Pump Station = 48.70
Invert level of Pump Station = 44.60m

Storage Required as Previously Calculated

WW = 3.68 m^3
EA = 4.65 m^3

Level within wet well = 44.60 – 46.60 = 2m
Therefore = 2 x 4.52
= 9.04 m^3

Storage Available	Before Overflow is Required
Dwr Cymru 160 l/s dwelling	@1DWF @6DWF 3.88 hrs 2.35hrs
Environment Agency 180 l/s Head /day	@ 3DWF 3.85 hrs

MANHOLE SCHEDULE

MH No.	Cover Level	Pipe size & Invert level In	Pipe size & Invert level out	Invert Spurs All 150mm	Depth to Soffit	Manhole Type/Size
S1	49.13	-	225mm 47.150	47.225 x 2	1.755	Type B 1.2 diameter
S2	48.58	225mm 46.230	300mm 46.155	46.305 x 3	2.125	Type B 1.2 diameter
S3	48.23	300mm 45.900	300mm 45.900	46.050 x 2	2.030	Type B 1.2 diameter
S4	47.90	300mm 45.360	300mm 45.360	45.435 x 1	1.950	Type B 1.2 diameter
S5	48.00	300mm 45.000	300mm 45.000	45.075 x 1	2.200	Type B 1.2 diameter
F1	48.28	-	150mm 46.460	46.460 x 3	1.670	Type B 1.2 diameter
F2	48.65	150mm 46.215	150mm 46.215	46.215 x 2	2.285	Type B 1.2 diameter
F3	48.98	150mm 45.965	150mm 45.965	-	2.865	Type B 1.2 diameter
PUMP	49.15	150mm 45.900	Overflow 46.600	-	4.55	Pump Station Detail
FOF1	48.98	150mm 46.560	150mm 46.560	-	2.27	Type B 1.2 diameter
FOF2	48.63	150mm 46.305	150mm 46.305	-	2.175	Type B 1.2 diameter

STORM SEWER DESIGN by the Modified Rational Method

Global Variables

Location - England & Wales

Return Period (years)	2	Volumetric Runoff Coeff.	0.75
M5-60 (mm)	20	Infiltration %	0
Ratio R	0.35	Minimum Backdrop Height (m)	0.200
Maximum Rainfall (mm/hr)	75	Depth from Soffit to G.L. (m)	0.100
Foul Sewage (l/s/ha)	0.00	Min Vel. (m/s - Auto Design Only)	0.75
O'flow Setting (*Foul only)	0	Min Slope (1:X - Optimisation)	500

Designed with Level Soffits

Network Design Table

PN	Length (m)	Fall (m)	Slope (1:X)	Area (ha)	T.E. (mins)	DWF (l/s)	k (mm)	HYD SECT	DIA (mm)
1.000	54.00	0.920	58.7	0.050	5.00	0	0.600	o	225
1.001	36.60	0.255	143.5	0.150	0.00	0	0.600	o	300
1.002	34.30	0.540	63.5	0.090	0.00	0	0.600	o	300
1.003	23.00	0.360	63.9	0.040	0.00	0	0.600	o	300
1.004	4.00	0.020	200.0	0.050	0.00	0	0.600	o	300

Network Results Table

PN	Rain (mm/hr)	T.C. (mins)	US/IL (m)	E.Area (ha)	E.DWF (l/s)	Foul (l/s)	Infil. (l/s)	Vel (m/s)	CAP (l/s)	Flow (l/s)
1.000	62.9	5.5	47.150	0.050	0	0	0	1.71	68	9
1.001	60.8	6.0	46.155	0.200	0	0	0	1.31	93	33
1.002	59.6	6.3	45.900	0.290	0	0	0	1.98	140	47
1.003	58.7	6.5	45.360	0.330	0	0	0	1.97	139	53
1.004	58.5	6.5	45.000	0.380	0	0	0	1.11	78	60

Time Area Diagram

Time From (mins)	Time To (mins)	Area (ha)
0	4	0.301
4	8	0.079

Total Area Contributing (ha) = 0.380

Total Pipe Volume (m3) = 9.067

PIPELINE SCHEDULES

Upstream Manhole

PN	Hyd Sect	Diam (mm)	MH No.	C.Level (m)	I.Level (m)	Depth (m)	MH DIAM., L*W (mm)
1.000	o	225	2	49.130	47.150	1.755	1200
1.001	o	300	2	48.580	46.155	2.125	1200
1.002	o	300	3	48.230	45.900	2.030	1200
1.003	o	300	4	47.900	45.360	2.240	1200
1.004	o	300	5	48.000	45.000	2.700	1200

Downstream Manhole

PN	Length (m)	Slope (1:X)	MH No.	C.Level (m)	I.Level (m)	Depth (m)	MH DIAM., L*W (mm)
1.000	54.0	59	2	48.580	46.230	2.125	1200
1.001	36.6	144	3	48.230	45.900	2.030	1200
1.002	34.3	64	4	47.900	45.360	2.240	1200
1.003	23.0	64	5	48.000	45.000	2.700	1200
1.004	4.0	200	6	47.200	44.980	1.920	0

MANHOLE SCHEDULES

M/Hole Number	Cover Level (m)	M/Hole Depth (m)	M/Hole Diam.,L*W (mm)	Pipes Out PN	Pipes Out IL.(m)	Pipes Out D (mm)	Pipes In PN	Pipes In IL.(m)	Pipes In D (mm)
2	49.130	1.980	1200	1.000	47.150	225			
2	48.580	2.425	1200	1.001	46.155	300	1.000	46.230	225
3	48.230	2.330	1200	1.002	45.900	300	1.001	45.900	300
4	47.900	2.540	1200	1.003	45.360	300	1.002	45.360	300
5	48.000	3.000	1200	1.004	45.000	300	1.003	45.000	300
6	47.200	2.220	0		OUTFALL		1.004	44.980	300

Westbury Homes (Holdings) Ltd	
Westbury House Lansdown Road Cheltenham GL50 2WH	
Date File Bryn Road.sws	Designed By Checked By
Micro Drainage	Simulation W.7.6 (c)1982-2001 Micro Drainage

Summary of Results

Return Period (years)	2	Analysis Time Step (seconds)	5
Storm Duration (mins)	15	DVD Status	OFF
Margin for Flood Risk warning (mm)	300	Inertia Status	OFF

PN	Water Lev. (m)	Surcharged Depth (m)	Flooded Vol (m3)	Flow/ Capacity	Overflow (l/s)	Pipe Flow (l/s)	Status
1.000	47.200	-0.175	0.000	0.11	0	8	O K
1.001	46.268	-0.187	0.000	0.30	0	27	O K
1.002	46.009	-0.191	0.000	0.29	0	39	O K
1.003	45.478	-0.182	0.000	0.33	0	44	O K
1.004	45.260	-0.040	0.000	0.82	0	50	O K

Global Variables

Region	FSR - England & Wales
Return Period (yrs)	2
M5-60 (mm)	20.000
Ratio R	0.350
Volumetric Runoff Coef	0.750
Profile Type	Winter
PIMP (%)	100
Areal Reduction Factor	1.000
Storm Duration (mins)	15
Hot Start (mins)	0
Manhole Headloss Coefficient	0.150
MADD Factor * 10m3/ha Storage	1.000
Foul Sewage/Hectare (l/s)	0.00
Additional Flow - % of Total Flow	0
Number of Input Hydrographs	0
Number of Time/Area Diagrams	0
Number of Bifurcations	0
Number of Overflows	0
Number of Off-Line Controls	0
Number of Tank Sewers	0

Freely Discharging Outfalls

Outfall Pipe Number	Outfall MH/No	C.Level (m)	I.Level (m)	D,L (mm)	B (mm)
1.004	6	47.200	44.980	1200	0

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Network Details

PN	Length (m)	Fall (m)	Slope (1:x)	Area (ha)	T.E. (mins)	Rain Pro	k (mm)	Hyd Sect	Dia (mm)
1.000	54.00	0.920	59	0.050	5.00	1	0.600	o	225
1.001	36.60	0.255	144	0.150	0.00	1	0.600	o	300
1.002	34.30	0.540	64	0.090	0.00	1	0.600	o	300
1.003	23.00	0.360	64	0.040	0.00	1	0.600	o	300
1.004	4.00	0.020	200	0.050	0.00	1	0.600	o	300

PN	USMH No.	US/CL (m)	US/IL (m)	US/Dep (m)	DS/CL (m)	DS/IL (m)	DS/Dep (m)	Ctrl No.	US/MH (mm)
1.000	2	49.130	47.150	1.755	48.580	46.230	2.125		1200
1.001	2	48.580	46.155	2.125	48.230	45.900	2.030		1200
1.002	3	48.230	45.900	2.030	47.900	45.360	2.240		1200
1.003	4	47.900	45.360	2.240	48.000	45.000	2.700		1200
1.004	5	48.000	45.000	2.700	47.200	44.980	1.920		1200

Summary of Results

Return Period (years)	30	Analysis Time Step (seconds)	5
Storm Duration (mins)	15	DVD Status	OFF
Margin for Flood Risk warning (mm)	300	Inertia Status	OFF

PN	Water Lev. (m)	Surcharged Depth (m)	Flooded Vol (m3)	Flow/ Capacity	Overflow (l/s)	Pipe Flow (l/s)	Status
1.000	47.221	-0.154	0.000	0.21	0	14	O K
1.001	46.337	-0.118	0.000	0.67	0	60	O K
1.002	46.077	-0.123	0.000	0.64	0	88	O K
1.003	45.682	0.022	0.000	0.74	0	99	SURCH'ED
1.004	45.478	0.178	0.000	1.84	0	113	SURCH'ED

Westbury House
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Micro Drainage

Designed By
Checked By
Simulation W.7.6 (c)1982-2001 Micro Drainage

Global Variables

Region	FSR - England & Wales
Return Period (yrs)	30
M5-60 (mm)	20.000
Ratio R	0.350
Volumetric Runoff Coef	0.750
Profile Type	Winter
PIMP (%)	100
Areal Reduction Factor	1.000
Storm Duration (mins)	15
Hot Start (mins)	0
Manhole Headloss Coefficient	0.150
MADD Factor * 10m3/ha Storage	1.000
Foul Sewage/Hectare (l/s)	0.00
Additional Flow - % of Total Flow	0
Number of Input Hydrographs	0
Number of Time/Area Diagrams	0
Number of Bifurcations	0
Number of Overflows	0
Number of Off-Line Controls	0
Number of Tank Sewers	0

Freely Discharging Outfalls

Outfall Pipe Number	Outfall MH/No	C.Level (m)	I.Level (m)	D,L (mm)	B (mm)
1.004	6	47.200	44.980	1200	0

Network Details

PN	Length (m)	Fall (m)	Slope (1:x)	Area (ha)	T.E. (mins)	Rain Pro	k (mm)	Hyd Sect	Dia (mm)
1.000	54.00	0.920	59	0.050	5.00	1	0.600	o	225
1.001	36.60	0.255	144	0.150	0.00	1	0.600	o	300
1.002	34.30	0.540	64	0.090	0.00	1	0.600	o	300
1.003	23.00	0.360	64	0.040	0.00	1	0.600	o	300
1.004	4.00	0.020	200	0.050	0.00	1	0.600	o	300

PN	USMH No.	US/CL (m)	US/IL (m)	US/Dep (m)	DS/CL (m)	DS/IL (m)	DS/Dep (m)	Ctrl No.	US/MH (mm)
1.000	2	49.130	47.150	1.755	48.580	46.230	2.125		1200
1.001	2	48.580	46.155	2.125	48.230	45.900	2.030		1200
1.002	3	48.230	45.900	2.030	47.900	45.360	2.240		1200
1.003	4	47.900	45.360	2.240	48.000	45.000	2.700		1200
1.004	5	48.000	45.000	2.700	47.200	44.980	1.920		1200

Global Variables

Region	FSR - England & Wales
Return Period (yrs)	30
M5-60 (mm)	20.000
Ratio R	0.350
Volumetric Runoff Coef	0.750
Profile Type	Winter
PIMP (%)	100
Areal Reduction Factor	1.000
Storm Duration (mins)	30
Hot Start (mins)	0
Manhole Headloss Coefficient	0.150
MADD Factor * 10m3/ha Storage	1.000
Foul Sewage/Hectare (l/s)	0.00
Additional Flow - % of Total Flow	0
Number of Input Hydrographs	0
Number of Time/Area Diagrams	0
Number of Bifurcations	0
Number of Overflows	0
Number of Off-Line Controls	0
Number of Tank Sewers	0

Freely Discharging Outfalls

Outfall Pipe Number	Outfall MH/No	C.Level (m)	I.Level (m)	D,L (mm)	B (mm)
1.004	6	47.200	44.980	1200	0

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Summary of Results

Return Period (years)	30	Analysis Time Step (seconds)	5
Storm Duration (mins)	30	DVD Status	OFF
Margin for Flood Risk warning (mm)	300	Inertia Status	OFF

PN	Water Lev. (m)	Surcharged Depth (m)	Flooded Vol (m3)	Flow/ Capacity	Overflow (l/s)	Pipe Flow (l/s)	Status
1.000	47.212	-0.163	0.000	0.17	0	12	O K
1.001	46.309	-0.146	0.000	0.52	0	47	O K
1.002	46.051	-0.149	0.000	0.50	0	68	O K
1.003	45.524	-0.136	0.000	0.58	0	78	O K
1.004	45.392	0.092	0.000	1.45	0	89	SURCH'ED

Westbury House
Lansdown Road
Cheltenham GL50 2WH

Date
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Micro Drainage

Designed By
Checked By
Simulation W.7.6 (c)1982-2001 Micro Drainage

Network Details

PN	Length (m)	Fall (m)	Slope (1:x)	Area (ha)	T.E. (mins)	Rain Pro	k (mm)	Hyd Sect	Dia (mm)
1.000	54.00	0.920	59	0.050	5.00	1	0.600	o	225
1.001	36.60	0.255	144	0.150	0.00	1	0.600	o	300
1.002	34.30	0.540	64	0.090	0.00	1	0.600	o	300
1.003	23.00	0.360	64	0.040	0.00	1	0.600	o	300
1.004	4.00	0.020	200	0.050	0.00	1	0.600	o	300

PN	USMH No.	US/CL (m)	US/IL (m)	US/Dep (m)	DS/CL (m)	DS/IL (m)	DS/Dep (m)	Ctrl No.	US/MH (mm)
1.000	2	49.130	47.150	1.755	48.580	46.230	2.125		1200
1.001	2	48.580	46.155	2.125	48.230	45.900	2.030		1200
1.002	3	48.230	45.900	2.030	47.900	45.360	2.240		1200
1.003	4	47.900	45.360	2.240	48.000	45.000	2.700		1200
1.004	5	48.000	45.000	2.700	47.200	44.980	1.920		1200

Summary of Results

Return Period (years)	30	Analysis Time Step (seconds)	5
Storm Duration (mins)	60	DVD Status	OFF
Margin for Flood Risk warning (mm)	300	Inertia Status	OFF

PN	Water Lev. (m)	Surcharged Depth (m)	Flooded Vol (m3)	Flow/ Capacity	Overflow (l/s)	Pipe Flow (l/s)	Status
1.000	47.201	-0.174	0.000	0.12	0	8	O K
1.001	46.277	-0.178	0.000	0.35	0	31	O K
1.002	46.020	-0.180	0.000	0.33	0	45	O K
1.003	45.490	-0.170	0.000	0.38	0	51	O K
1.004	45.278	-0.022	0.000	0.96	0	59	O K

Global Variables

Region	FSR - England & Wales
Return Period (yrs)	30
M5-60 (mm)	20.000
Ratio R	0.350
Volumetric Runoff Coef	0.750
Profile Type	Winter
PIMP (%)	100
Areal Reduction Factor	1.000
Storm Duration (mins)	60
Hot Start (mins)	0
Manhole Headloss Coefficient	0.150
MADD Factor * 10m3/ha Storage	1.000
Foul Sewage/Hectare (l/s)	0.00
Additional Flow - % of Total Flow	0
Number of Input Hydrographs	0
Number of Time/Area Diagrams	0
Number of Bifurcations	0
Number of Overflows	0
Number of Off-Line Controls	0
Number of Tank Sewers	0

Freely Discharging Outfalls

Outfall Pipe Number	Outfall MH/No	C.Level (m)	I.Level (m)	D,L (mm)	B (mm)
1.004	6	47.200	44.980	1200	0

Network Details

PN	Length (m)	Fall (m)	Slope (1:x)	Area (ha)	T.E. (mins)	Rain Pro	k (mm)	Hyd Sect	Dia (mm)
1.000	54.00	0.920	59	0.050	5.00	1	0.600	o	225
1.001	36.60	0.255	144	0.150	0.00	1	0.600	o	300
1.002	34.30	0.540	64	0.090	0.00	1	0.600	o	300
1.003	23.00	0.360	64	0.040	0.00	1	0.600	o	300
1.004	4.00	0.020	200	0.050	0.00	1	0.600	o	300

PN	USMH No.	US/CL (m)	US/IL (m)	US/Dep (m)	DS/CL (m)	DS/IL (m)	DS/Dep (m)	Ctrl No.	US/MH (mm)
1.000	2	49.130	47.150	1.755	48.580	46.230	2.125		1200
1.001	2	48.580	46.155	2.125	48.230	45.900	2.030		1200
1.002	3	48.230	45.900	2.030	47.900	45.360	2.240		1200
1.003	4	47.900	45.360	2.240	48.000	45.000	2.700		1200
1.004	5	48.000	45.000	2.700	47.200	44.980	1.920		1200

Deddf Adnoddau Dŵr 1991

fel y'i diwygiwyd gan Ddeddf yr Amgylchedd 1995

ASIANTAETH YR AMGYLCHEDD CYMRU
ENVIRONMENT AGENCY WALES

Caniatâd Gollwng

Tystysgrif Daliwr

Rhan A

At : WESTBURY HOMES HOLDINGS LTD
THE COMPANY SECRETARY
34-37 LAMBOURNE CRESCENT
CARDIFF BUSINESS PARK
LLANISHEN CARDIFF CF14 5GG

DS: I gorfforaeth gorfforedig mae teitl y swydd yn bwynt cysylltu.

Dyddiad Cychwyn y Daliwr : **5 Rhagfyr 2003**

Mae Asiantaeth yr Amgylchedd ("yr Asiantaeth") yn cadarnhau drwy hyn mai / bod y sawl (neu sefydliad) a enwyd uchod yw / yn ddaliwr cofrestredig y caniatâd : **BP0311801** ***Cyhoeddwyd y Caniatâd :*** **5 Rhagfyr 2003**

Natur y Gollyngiad(au) : **SSOR Carthffrwd**

yn **SS8974084531 PUMPING STATION OFF GASWORKS TERRAC**

Noder : Dylid cadw'r dystysgrif hon gyda'r ddogfen ganiatâd i gyfeirio ati yn y dyfodol. Os byddwch yn trosglwyddo cyfrifoldeb am y gollyngiad i rywun arall, rhaid i chi drosglwyddo'r caniatâd iddo ef neu hi a dweud wrth yr Asiantaeth cyn pen 21 diwrnod. Ni all y Daliwr wadu cyfrifoldeb am y caniatâd, ond gall cofrestriad y Daliwr gael ei drosglwyddo i olynydd. I wneud hynny, byddwch gystal â llenwi'r ffurflen isod (Rhan B), yna'i dychwelyd i'r cyfeiriad a nodir. Os fethwch â throsglwyddo'r caniatâd, hyd yn oed os nad ydych ar y safle mwyach, gallwch gael eich erlyn am achosi llygredd. Os trosglwyddwch y caniatâd ond heb ddweud wrthym, yna byddwch yn cyflawni trosedd. Os bydd gennych unrhyw ymholiadau a fyddech gystal â chysylltu â'ch swyddfa Asiantaeth yr Amgylchedd lleol, gan ddyfynnu Cyfeirnod y Caniatâd.

- torrwch yma -

Rhan B ***Llenwch mewn priflythrennau bras neu deipio***

At : Deddf Adnoddau Dŵr 1991 : Hysbysiad am drosglwyddo Caniatâd Gollwng

Cyfeirnod y Caniatâd : **BP0311801**

Cyhoeddwyd y Caniatâd : **5 Rhagfyr 2003**

Enw : **WESTBURY HOMES HOLDINGS LTD**

Cyfeiriad : **THE COMPANY SECRETARY**
34-37 LAMBOURNE CRESCENT
CARDIFF BUSINESS PARK
LLANISHEN CARDIFF CF14 5GG

Yr wyf fi / Yr ydym ni* drwy hyn yn hysbysu'r Asiantaeth nad fi / ni mwyach yw* Daliwr / Deiliaid y caniatâd uchod a fydd yn cael / cafodd ei drosglwyddo i

**** dileer fel yn briodol***

Enw(au) y Daliwr / Deiliaid newydd :

Côd Post :

Dyddiad Trosglwyddo i'r Daliwr / Deiliaid newydd : .....

Llofnodwyd : ..... **Dyddiedig :** .....

Enw (priflythrennau bras) : ..... **Swydd (os yn briodol) :** .....

(i'w lenwi pan yn llofnodi ar ran corfforaethau corfforedig)

Water Resources Act 1991

as amended by the Environment Act 1995

ASIANTAETH YR AMGYLCHEDD CYMRU
ENVIRONMENT AGENCY WALES

Consents to Discharge

Certificate of Holder

Part A

To : WESTBURY HOMES HOLDINGS LTD
THE COMPANY SECRETARY
34-37 LAMBOURNE CRESCENT
CARDIFF BUSINESS PARK
LLANISHEN CARDIFF CF14 5GG

NB: For a body corporate the job title is a point of contact.

Holder Start Date : **05 December 2003**

The Environment Agency ("the Agency") hereby confirm that the above named person (or organisation) is a / the registered Holder of the Consent : **BP0311801** ***Consent Issued :*** **05 December 2003**

Nature of Discharge(s) **SSOR Sewage effluent**

at **SS8974084531 PUMPING STATION OFF GASWORKS TERRAC**

Note : This certificate should be kept with the consent document for future reference. If you transfer responsibility for the discharge to somebody else, you must pass the consent to them and tell the Agency within 21 days. Responsibility for the consent cannot be disclaimed by the Holder but the registration of Holder may be transferred to a successor. To do this, please complete the form below (Part B), then tear it off and return it to the address shown. If you fail to transfer the consent, even though you are no longer on the site, you will still be liable for prosecution for pollution. If you transfer the consent but do not tell us, you will be committing an offence. In case of any queries, please contact your local Environment Agency office, quoting the Consent Reference.

- cut here -

Part B ***Please complete in block capitals or type***

To : Water Resources Act 1991 : Notice of transfer of Consent to Discharge

Consent Reference : **BP0311801** ***Name :*** **WESTBURY HOMES HOLDINGS LTD**

Consent Issued : **05 December 2003** ***Address :*** **THE COMPANY SECRETARY**
34-37 LAMBOURNE CRESCENT
CARDIFF BUSINESS PARK
LLANISHEN CARDIFF CF14 5GG

I / We* hereby serve notice on the Agency that I / we* am /are* no longer a / the* Holder of the above consent which will be / was* transferred to :

**** delete as appropriate***

Name(s) of the new Holder(s) :

Post Code :

Date of Transfer to new Holder(s) .....

Signed : ..... **Dated :** .....

Name (block capitals) : ..... **Postion (if appropriate) :** .....

(to be completed when signing on behalf of corporate bodies)

CONSENT NO.	BP0311801

ASIANTAETH YR AMGYLCHEDD CYMRU
ENVIRONMENT AGENCY WALES

WATER RESOURCES ACT 1991

SECTION 88 - SCHEDULE 10

(AS AMENDED BY THE ENVIRONMENT ACT 1995)

CONSENT TO DISCHARGE

TO: Westbury Homes Holdings Ltd.
34 –37 Lambourne Crescent
Cardiff Business Park
Llanishen
Cardiff
CF14 5GG

The **ENVIRONMENT AGENCY** ("The Agency") in pursuance of its powers under the Water Resources Act 1991 **HEREBY CONSENTS** to the making of a discharge **OF SEWAGE EFFLUENT**, as follows:

SEWAGE IN AN EMERGENCY

FROM: A PUMPING STATION AT THE OLD GAS WORKS

AT: OFF GASWORKS TERRACE, BRYNMENYN, BRIDGEND

TO: RIVER LLYNFI

SUBJECT TO the conditions set out in the following schedule(s):

SEWAGE IN AN EMERGENCY **Schedule No. BP0311801**

Subject to the provisions of Paragraphs 7 and 8 of Schedule 10 of the Water Resources Act 1991, no notice shall be served by the Agency, altering this consent, without the agreement in writing of the consent holder, during a period of 4 years from the date this consent takes effect.

This consent is issued and takes effect on the 5th day of December 2003

Signed .....
Alan J Jones
Team Leader Environment Management

Asiantaeth yr Amgylchedd Cymru
MaesNewydd, Llandarsi, Nedd Port Talbot, SA10 6JQ
Ffon: 01792 325500, Ffacs: 01792 325511

Environment Agency Wales
Maes Newydd Llandarcy, Neath Port Talbot, SA10 6JQ
Tel: 01792 325500, Fax: 01792 325511

CONSENT NO.	BP0311801
SCHEDULE NO.	BP031180101
DATED	

ASIANTAETH YR AMGYLCHEDD CYMRU
ENVIRONMENT AGENCY WALES

CONDITIONS OF CONSENT TO DISCHARGE

SEWAGE IN AN EMERGENCY ("the Discharge")

FROM: A PUMPING STATION AT OLD THE GAS WORKS

NATURE

1. The Discharge shall consist solely of sewage in an emergency.

2. The Discharge shall occur only when the sewage pumping station is inoperative as a result of one or more of the following:

   (a) electrical power failure not due to the act or default of the consent holder, its agents, representatives, officers, employees or servants;

   (b) mechanical breakdown of duty and standby pumps;

   (c) rising main failure;

   (d) blockage of the downstream sewer not due to the act or default of the consent holder, its agents, representatives, officers, employees or servants;

   and it is not reasonably practicable to dispose of the sewage otherwise. There shall be no undue delay on the part of the consent holder in remedying any such failure or breakdown.

LOCATION

3. The Discharge shall be made in the manner and at the place specified as:

   (a) discharging via a 150 millimetre diameter pipe;

   (b) discharging to the River Llynfi;

   (c) at National Grid Reference SS 89740 84531;

   (d) shown marked 'Discharge Point' on Plan BP0311801 attached as Annex 1.

CONSENT NO.	BP0311801
SCHEDULE NO.	BP031180101

ASIANTAETH YR AMGYLCHEDD CYMRU
ENVIRONMENT AGENCY WALES

SAMPLE POINT

4. A sample point shall be provided and maintained at National Grid Reference SS 89856 84545, as shown marked 'Sample Point' on the attached Plan BP0311801, or some other point as agered in writing with the Agency, so that a representative sample of the Discharge may be obtained. The consent Holder shall ensure that all constituents of the Discharge pass through the said sampling point at all times and in any legal proceedings it shall, for the purpose of Section 10 of the Rivers (Prevention of Pollution) Act 1961, be presumed, until the contrary is shown, that any sample of the Discharge taken at the said sampling point is a sample of what was being discharged into controlled waters.

VOLUME

5. Storage capacity, equivalent to a total of at least 3.86 hours of the dry weather flow in the sewer immediately upstream of the pumping station, shall be provided in the wet well and the upstream sewerage system, above the wet well design top water level.

   For the purpose of this condition Dry Weather Flow shall mean the average daily flow as measured in the sewer immediately upstream of the pumping station during seven consecutive days without rain (excluding a period which includes public holidays) following seven days during which the rainfall did not exceed 0.25 millimetres on any one day.

PUMPS

6. The duty pump(s) shall be maintained in good working order, and at least one stand-by pump shall be provided and maintained.

7. Stand-by pump(s) shall activate should the duty pump(s) become inoperative for reasons other than power failure. The pumping station shall be maintained so that the pump shall reactivate as soon as is practicable after the power is restored after interruption to the supply.

COMPOSITION

8. (a) The discharge shall have passed, without prior comminution or maceration, through a screening device having apertures no greater than 10 mm in one dimensions.

   (b) The screening device shall be maintained in an efficient operational condition.

   (c) All screenings must be removed and disposed of in a manner such as to prevent entry to the discharge.

CONSENT NO.	BP0311801
SCHEDULE NO.	BP0311801 01

RECORDING AND REPORTING

9. (a) The Consent Holder shall establish and operate a documented maintenance programme and record all non-routine actions undertaken that may have adversely affected the operation of the pumping station. Copies of the programme shall be made available for inspection by the Agency's officers at all reasonable times.

(b) On request the Consent Holder shall supply the Agency with a written report on the maintenance and all non-routine actions that may have adversely affected the operation of the pumping station.

TELEMETRY

10. (a) A 24 hour response telemetry alarm system shall be provided and maintained to give notification of failure or breakdown of the pumping station.

(b) The consent holder shall take all reasonable remedial measures to return the pumping station to normal operation, as soon as practicable after warning of failure or breakdown of the pumping station.

(b) The consent holder shall notify the Agency, as soon as practicable, when there is potential for operation of the emergency overflow in the event of failure or breakdown of the pumping station.

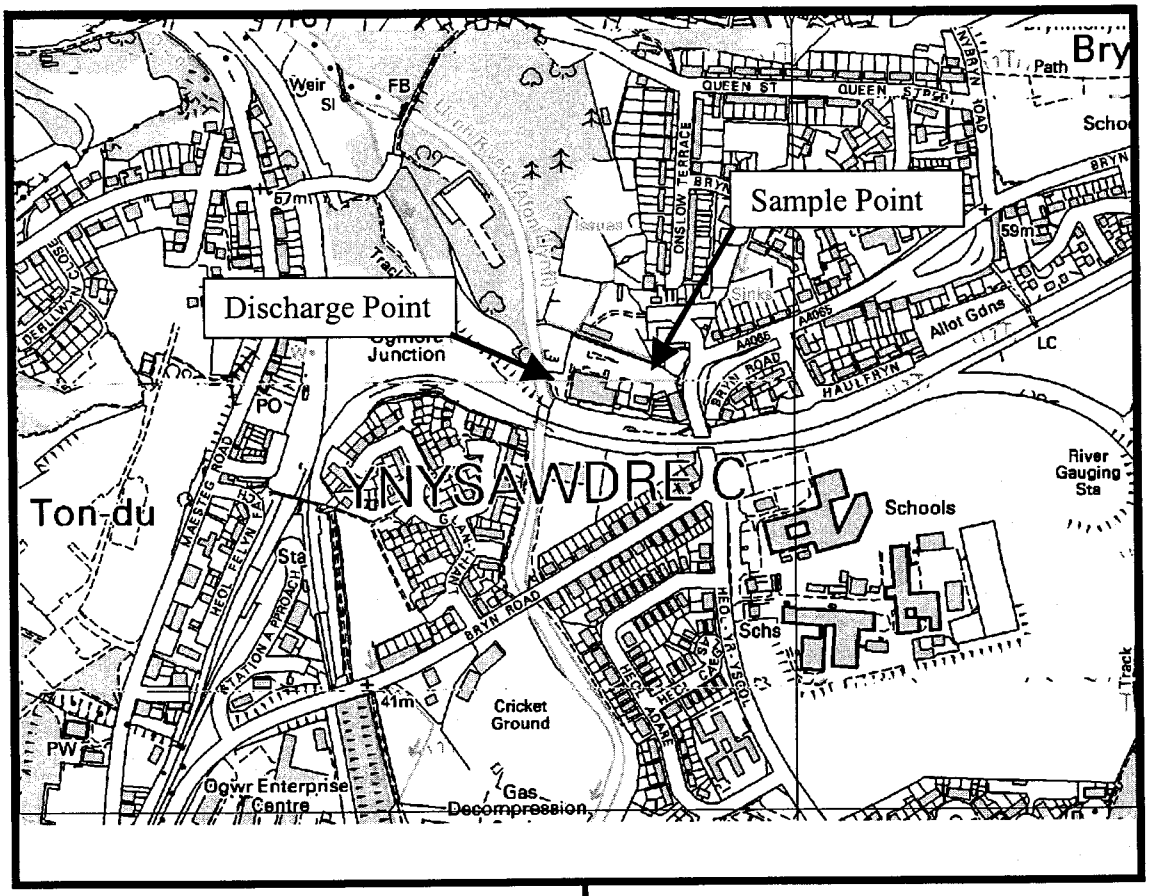
OTHER

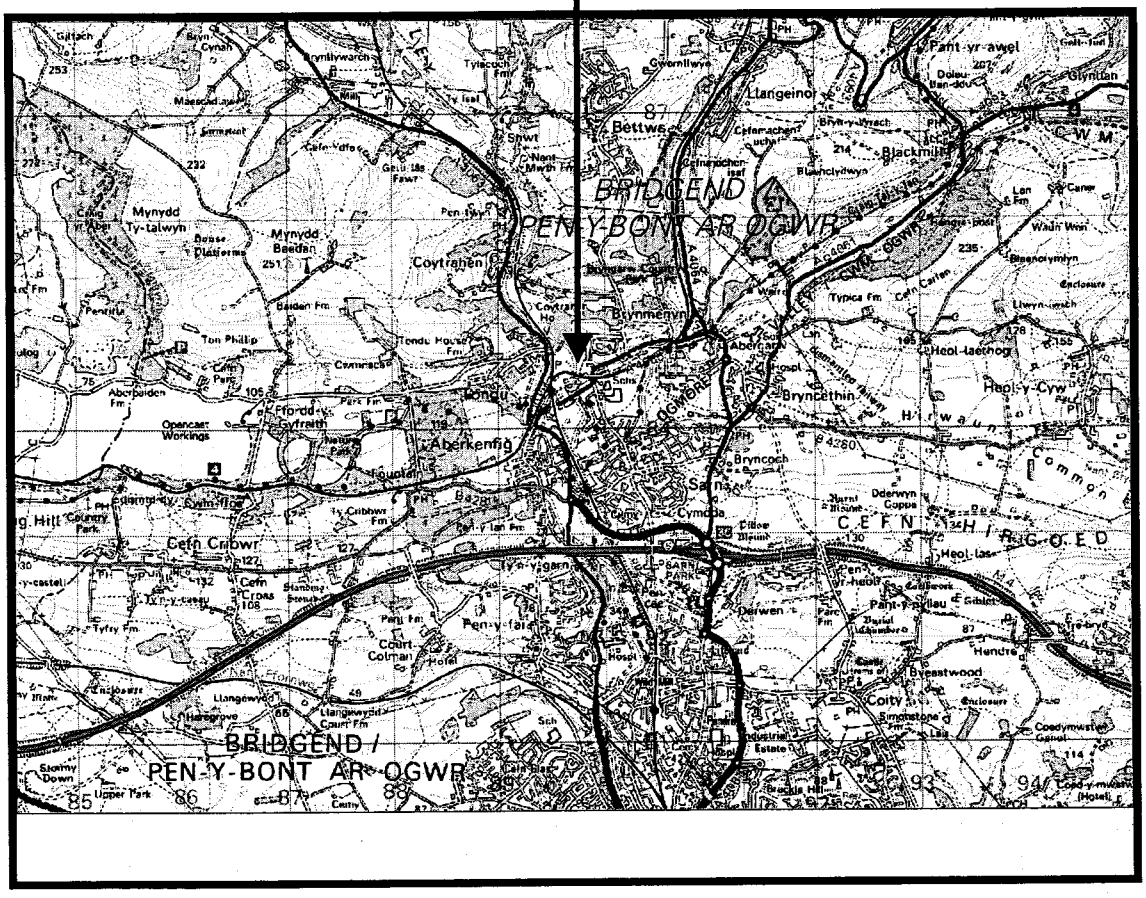
11. A tanker access facility at an appropriate location shall be provided and maintained to enable removal of sewage by tanker when necessary.

12. On request the consent holder shall supply the Agency with a written report on the operation of the emergency overflow.

ANNEX 1	BP0311801

Old Gas Works Pumping Station, Off Gasworks Terrace, Brynmenin





ASIANTAETH YR AMGYLCHEDD CYMRU
ENVIRONMENT AGENCY WALES

Ein cyf/Our ref. 2/CS/LL/BP0311801
Eich cyf/Your ref.

Dyddiad/Date: 9 December 2003

Westbury Homes Holdings Ltd
34-37 Lambourne Crescent
Cardiff Business Park
Llanishen
Cardiff
CF14 5GG

Dear Sir/Madam

RE: WATER RESOURCES ACT 1991, SCHEDULE 10 (AS AMENDED BY THE ENVIRONMENT ACT 1995) APPLICATION FOR CONSENT TO DISCHARGE SEWAGE EFFLUENT IN AN EMERGENCY AT SITE OFF GASWORKS TERRACE, BRYNMENYN, BRIDGEND BY WESTBURY HOMES HOLDINGS LTD
APPLICATION NO: BP0311801

Further to your application the Agency has decided that consent should be given subject to conditions. I enclose the Agency's formal consent to discharge sewage in an emergency from a pumping station at the old gas works.

Under the present Scheme of Charges for Discharges to Controlled Waters an annual charge will be made for all consents to discharge, except where the discharge is of sewage effluent of five cubic metres or less per day. The charge is based on information derived from the conditions attached to the consent to discharge, as outlined in the enclosed leaflet.

If you consider that the conditions imposed by the consent are unreasonable you have a right of appeal to the National Assembly for Wales at Cathays Park, Cardiff CF10 3NQ.

Notice of an appeal must be given in writing within three months of this notification and must be accompanied by a statement of the grounds of appeal.

If granted, a consent under Schedule 10 of the Act, covers water quality considerations only. It does not alter the need to obtain any other consents or approvals which might be required in connection with your proposal under other legislation. For example it does not give any right or permission to discharge where land is not owned by the applicant.

Asiantaeth yr Amgylchedd Cymru
Maes Newydd, Llandarsi, Nedd Port Talbot, SA10 6JQ
Ffon: 01792 325500, Ffacs: 01792 325511

Environment Agency Wales
Maes Newydd, Llandarcy, Neath Port Talbot, SA10 6JQ
Tel: 01792 325500, Fax: 01792 325511

Please take careful note that if the holder of the consent changes, you must inform the Agency IN WRITING as soon as possible of the name of the new holder. This is to ensure that the rights and charges associated with the Consent are transferred to the new holder. A Certificate of Holder notice will be sent to you shortly which is designed for this purpose, and should be kept safely with the Consent until required.

If you have any queries regarding the enforcement of this consent, please do not hesitate to contact Alan J Jones, Team Leader Environment Management, Environment Agency Wales, Maes Newydd, Llandarcy, Neath Port Talbot, SA10 6JQ

Yours faithfully

GARETH DAVIES
Customer Contact & Authorisation Officer

Enc.

Asiantaeth yr Amgylchedd Cymru
Maes Newydd, Llandarsi, Nedd Port Talbot, SA10 6JQ
Ffon: 01792 325500, Ffacs: 01792 325511

Environment Agency Wales
Maes Newydd, Llandarcy, Neath Port Talbot, SA10 6JQ
Tel: 01792 325500, Fax: 01792 325511

Westbury Homes (Holdings) Ltd 34-37 Lambourne Crescent Cardiff Business Park Llanishen Cardiff CF14 5GG
Tel 02920 768400 Fax 02920 761044 Website www.westbury-homes.co.uk

Westbury

For the attention of: ~~Steve Allison~~

Environment Agency
Rivers House
St Mellons Business Park
St Mellons
Cardiff
CF3 0LT

Vanessa
Shoebridge
Water Quality

Our ref: L255.DS.HW
23 May 2003

Dear Sir

PROPOSED DEVELOPMENT OF OLD GASWORKS, BRYN ROAD, BRYNMENYN, BRIDGEND

Please find enclosed for your information and approval the following drawings and calculations:

Engineering Layout	-	BRYN/200
Existing Survey	-	BRYN/201
Longitudinal Sections	-	BRYN/202

I await your comments regarding this submission, should you require further information, please do not hesitate to contact myself.

Yours faithfully

Dean Steph

DEAN STEPHENS
Design Engineer

Enc.