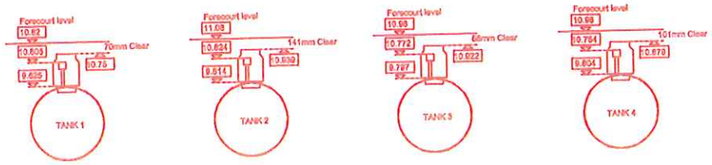
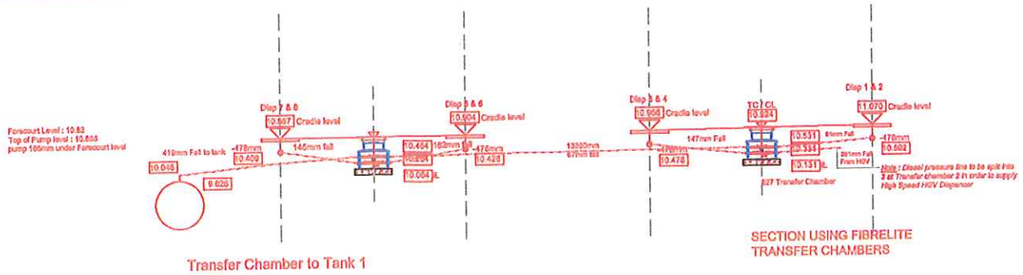
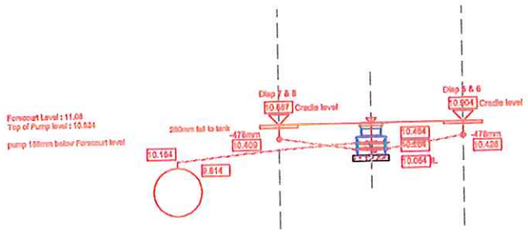
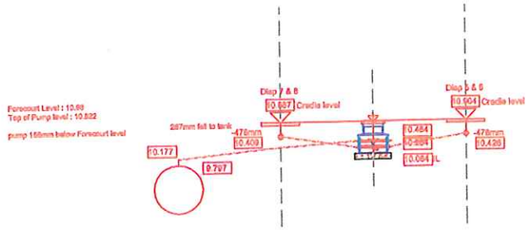
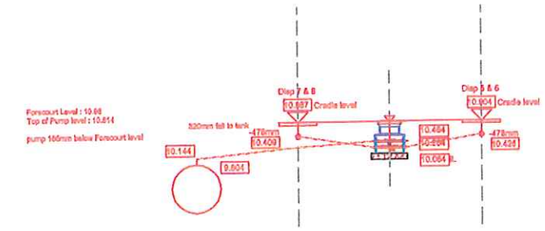
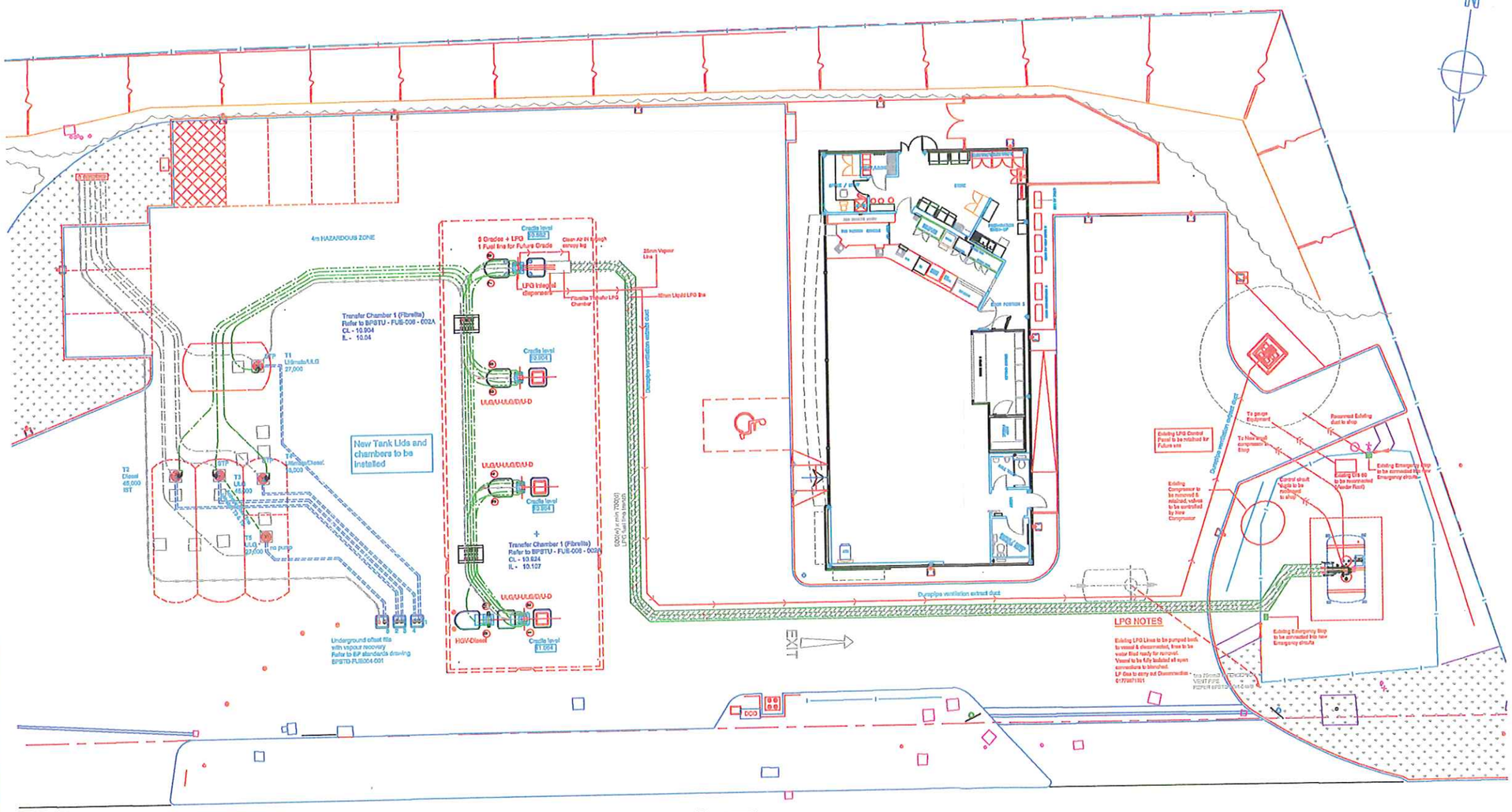












GREENFIELDS CONNECT

PETROLEUM SERVICES

Pipework Details - Pressure System

Pressure Lines	1.5" Ø or 4mm Duraflex 3 stainless steel pipe
Vents	2" Ø nylon Bpd/Vent+ single wall pipe
Offsets	110mm (4") Duraplus plus single welded Fuchs weld pipe
Ullage lines	80mm (3.4") Duraplus plus single welded Fuchs weld pipe
Stage 2 vapour lines:	
Dispenser to Transfer chamber	1.5" Ø or 4mm Duraflex 3 stainless steel pipe
Transfer Chamber to Tank	1.5" Ø or 4mm Duraflex 3 stainless steel pipe
Ullage to return line	80mm (3") Corrugated Pipe, Fuchs - vented Pipe only under where known ground ullages or manhole vent installed

- ULTIMATE DIESEL
- ULTIMATE UNLEADED
- DIESEL
- UNLEADED
- VENT LINES
- OFFSET FILL LINE
- STAGE 1 VAPOUR RECOVERY
- STAGE 2 VAPOUR RECOVERY (old tanneach pressure lines)
- LPG LIQUID LINE
- LPG VAPOUR RETURN

TANK TO PUMP SCHEDULE

TANK NO	CAPACITY (LITRES)	PRODUCT	CAPACITY (LITRES)	PUMPS	1	2	3	4	5	6
1	27500	Ultimate	24750	5000SS	○	○	○	○	○	
2	45000	Ultimate	40500	5000SS	○	○	○	○		○
3	45000	Ultimate	40500	ULG	○	○	○	○		
4	45000	Ultimate	40500	ULG	○	○	○	○		
5	18000	Ultimate	16200	5000SS	○					
6	27500	Ultimate	24750	DIESEL		○	○	○	○	○

STAGE 2 RETURN TO TANK 4

LPG VESSEL

TANK NO	CAPACITY (LITRES)	CAPACITY (LITRES) @ 80% BY VOLUME	PUMPS	
LPG Tank	15,000 litre	11800	LPG	○

NOTE: Existing 15000 litre Base bunker is compliant

ALL INSTALLATION WORKS AND EQUIPMENT TO BE AS BP STANDARD DRAWINGS

Tanks to be double skin steel supplied by Containex & Elan Installation to standard details to suit ground conditions and water PC requirements with pea shingle surround.

All tanks to tanks and offset fills to be to be steel and shown anti-vortexing assembly 90% of which assembly back fills and type of fuel.

All offset fills to 45 PC and 27.5 PC and tanks to be filled to tanks, vents, and offset fills tanks to be filled to all fill positions.

Fillchecker and fill prevention valves to each tank fill point.

Tank gauges Veeder-Root TLS 350R with Magnetostrictive probe

EMC Veeder-Root 330i-8 compatible with above

Control Panel ATEX 4000 with RAP 2 EDM interface

Monitoring Wells 50mm dia ACO (See probe)

Tank monitoring system below to with TLS 350R unit

All 4 pressure lines to be brought at Transfer Chambers to pressure will be allowed

Stage 2 vapour recovery

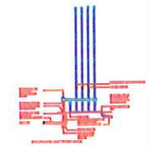
Vapour recovery to be taken from each dispenser to transfer chambers & tanks to manifold split tank

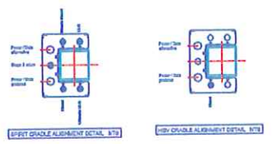
PUMPS (Submersible)

PP Pump 1 Per Tank
STP = Submersible Turbine pump
SUT = Submersible Submersible Turbine
VFD = Variable Frequency controller used in conjunction with the VST

DISPENSERS

Wayne Dresser 4 hose forecourt Dispenser certified to EPA & ATEX Approvals
Adegon LPG Dispenser certified to EPA & ATEX Approvals
Wayne Dresser 2 hose forecourt Dispenser certified to EPA & ATEX Approvals





Rev	Date	Revision
G	01 Feb 05	Pipework Levels Revised (Surveyed 30.01.05)
F	02 Dec 04	LPG PRV Fire unit relocated / door swing to line changed door handed / sump added to fire pumps.
E	24 Nov 04	Tank lids modified / VR2 to tank 1
D	11 Nov 04	Grades at Dispenser 7 & 8 included as 5 grades + LPG and 1 Fuel line for future use
C	09 Nov 04	Drawing revised - surrounds from 3 Fills. 05.1.04
B	03 Nov 04	Offset fill position revised - bollard moved - Manager position revised
A	13 Oct 04	LPG pump integral, LPG PRV unit added

REVISION APPROVAL

OWNER	NAME & SIGNATURE	DATE
RETAIL A & D MGR		

bp

BP OIL UK LTD
Asset Development
Wilton Gate House,
500/600 Wilton gate,
Central Milton Keynes,UK.
01908 853000
01908 853838

GREENFIELDS CONNECT
MANOR WAY
HALESOWEN
WEST MIDLANDS B62 8RJ

PETROLEUM SERVICES

DRAWN EW/pm
DATE 03.02.2004
DESIGN APPROVED M MORAN
DATE
SCALE 1:100
DIMENSIONS mm
DO NOT SCALE

DRAWING No 13025/40
REV G
FILE 13025
CAD REF : ADDOCK ASSOCIATES - 03127
Checked :
Date :

OS GRID REF: EAST NORTH

COPYRIGHT OF BP OIL UK LTD, ELSE IS PROHIBITED. REPRODUCTION ONLY WITH PERMISSION OF BP. BP OIL UK LTD, ASSET DEVELOPMENT, BRITANNIA HOUSE GATE WEST, MILTON KEYNES, MK9 1EH

12.02