

V-117B

FORM U-1A MANUFACTURER'S DATA REPORT FOR PRESSURE VESSELS  
(Alternative Form for Single Chamber, Completely Shop or Field Fabricated Vessels Only)  
As Required by the Provisions of the ASME Code Rules, Section VIII, Division 1

Manufactured and certified by KORFAB INC, 403 WEST FOXSHIRE LANE HOUSTON, TEXAS 77053  
(Name and address of manufacturer)

Manufactured for LFG Systems - 47 Bentwood - Sugarland, Texas 77478  
(Name and address of purchaser)

Location of installation Unknown  
(Name and address)

Type: Vertical 194-B D-194 61 2005  
(Horiz. or vert. tank) (Mfr's serial No.) (CRN) (Drawing no.) (Nat'l Bd. No.) (Year built)

The chemical and physical properties of all parts meet the requirements of material specifications of the ASME BOILER AND PRESSURE VESSEL CODE. The design, construction, and workmanship conform to ASME Rules, Section VIII, Division 1

to No Addenda Code Case Nos. Special Service per UG 120(d)  
Addenda (Date)

Shell: SA-312 Ty TP304\* WLD .375 .125 1'-11 1/4 6'-0  
Mat'l. (Spec. No., Grade) Nom. Thk. (in.) Corr. Allow. (in.) Diam. I.D. (ft. & in.) Length (overall) (ft. & in.)

Seams: Long. (Welded, Dbl., Sngl., Lap, Butt) R.T. (Spot or Full) Eff. (%) H.T. Temp (°F) Time (hr) 1 Spot 1  
Girth (Welded, Dbl., Sngl., Lap, Butt) R.T. (Spot, Partial, or Full) No. of Courses

Heads: (a) Mat'l. SA-240 Ty 304\* (b) Mat'l. SA-240 Ty 304\*  
(Spec No., Grade) (Spec No., Grade)

	Location (Top, Bottom, Ends)	Minimum Thickness	Corrosion Allowance	Crown Radius	Knuckle Radius	Elliptical Ratio	Conical Apex Angle	Hemispherical Radius	Flat Diameter	Side to Pressure (Convex or Concave)
a)	TOP	.3158	.125	-	-	2:1	-	-	-	Concave
b)	BOTTOM	.3177	.125	-	-	2:1	-	-	-	Concave

If removable, bolts used (describe other fastenings) (Mat'l, Spec. No., Gr., Size, No.)

MAWP 170 psi at max. temp. 150 °F  
Min. design metal temp. -20 °F at 170 psi. Hydro. 221 psi.

1. Nozzles, Inspection and safety valve openings:

Purpose (Inlet, Outlet, Drain)	No.	Diam. or Size	Type	Mat'l.	Nom. Thk.	Reinforcement Mat'l.	How Attached	Location
Inlet	1	6	RFWN	SA-312 Ty TP 304*	0.432	SA-312 Ty TP304*	UW16.1(c)	Shell
Outlet	1	5	RFWN	SA-312 Ty TP 304*	0.75	SA-312 Ty TP304*	UW16.1(c)	Shell
Head Control	1	2	RFLWN	SA-182 Ty F304*	.5	Integral	UW16.1(c)	Shell
Misc.	5	1	RFLWN	SA-182 Ty F304*	.5	Integral	UW16.1(c)	Shell/Head

1. Supports: Skirt Yes Lugs - Legs - Other - Attached Bottom Head / Welded  
(Yes or no) (No.) (No.) (Describe) (Where and how)

2. Remarks: Manufacturer's Partial Data Reports properly identified and signed by Commissioned Inspectors have been furnished for the following items of the report: -

(Name of part, item number, Mfr's name and identifying stamp)  
Design UG 22 (a) MDMT UG 20 (f) 1-5 Pressure Relief 125 (a)

\*ALL MATERIALS DUAL CERTIFIED TO L GRADE

CERTIFICATE OF SHOP / FIELD COMPLIANCE

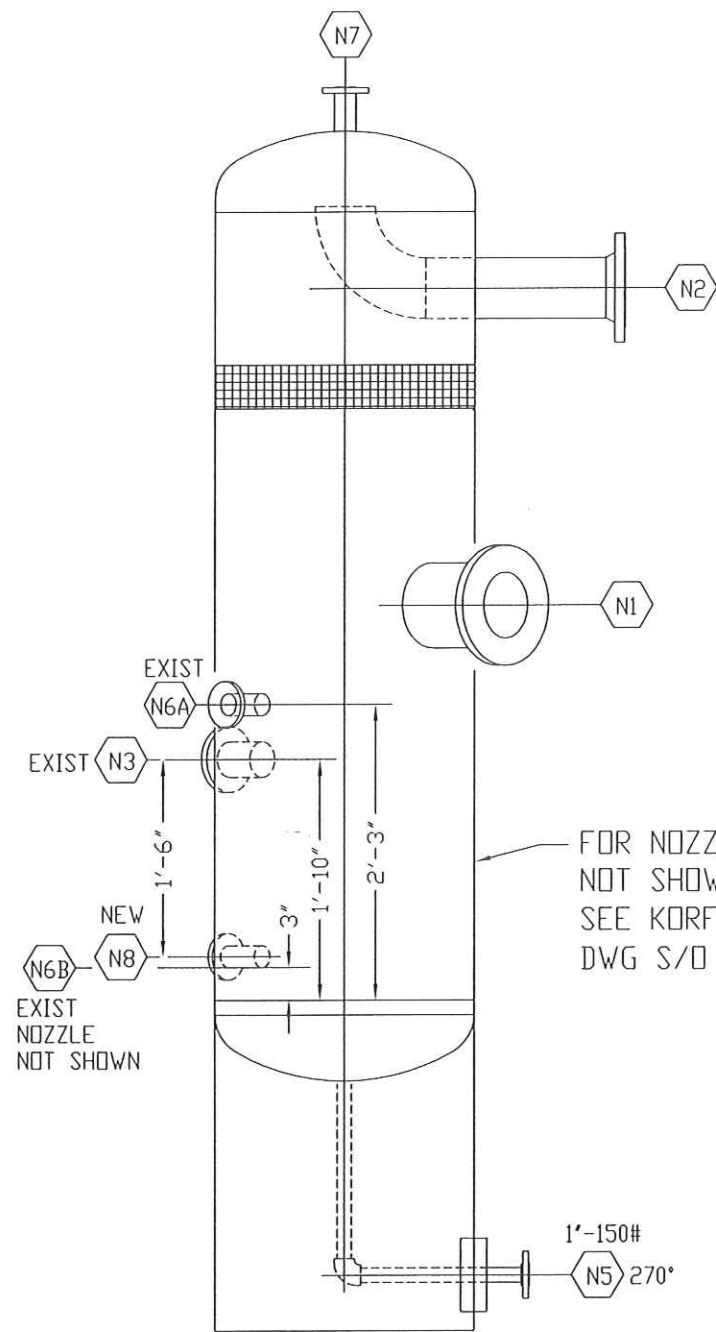
We certify that the statements made in this report are correct and that all details of design, material, construction, and workmanship of this vessel conform to the ASME Code for Pressure Vessels, Section VIII, Division 1. "U" Certificate of Authorization No. 32,824 expires 9/25/2007  
Date 10/05/2005 Co. Name KORFAB INC Signed Thomas Dillon  
(Manufacturer) (Representative)

CERTIFICATE OF SHOP / FIELD INSPECTION

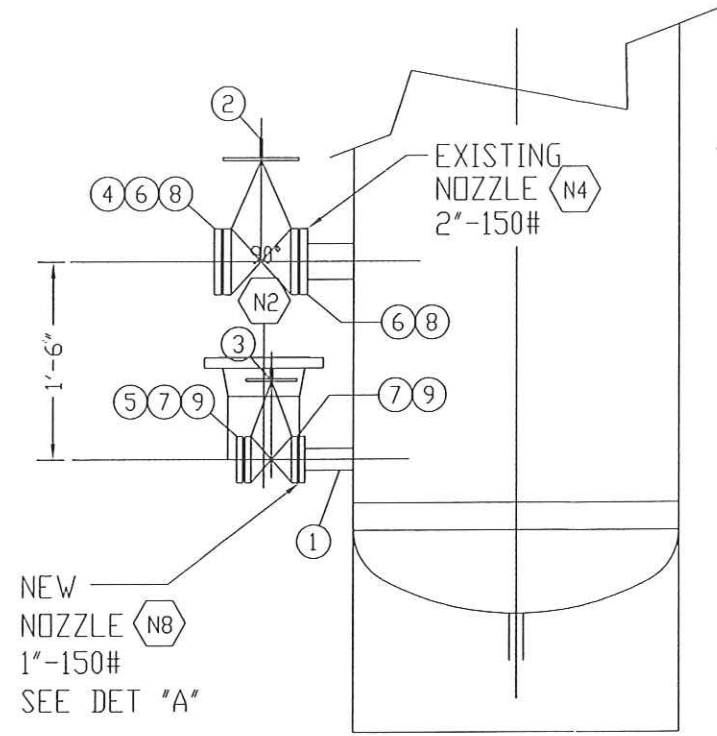
Vessel constructed by KORFAB INC at 403 WEST FOXSHIRE LANE HOUSTON, TEXAS 77053  
I, the undersigned, holding a valid commission issued by The National Board of Boiler and Pressure Vessel Inspectors and the State or Province of Texas and employed by IB & M RE have inspected the component described in this Manufacturer's Data Report on 9/02/2005, and state that, to the best of my knowledge and belief, the Manufacturer has constructed this pressure vessel in accordance with ASME Code, Section VIII, Division 1. By signing this certificate neither the Inspector nor his employer makes any warranty, expressed or implied, concerning the pressure vessel described in this Manufacturer's Data Report. Furthermore, neither the Inspector nor his employer shall be liable in any manner for any personal injury or property damage or a loss of any kind arising from or connected with this inspection.  
Date 10/05/2005 Signed Michael Anderson Commissions NB 11581A / Tx 1496  
(Authorized Inspector) (Nat'l Board, incl. endorsements) State, Prov. and No.)



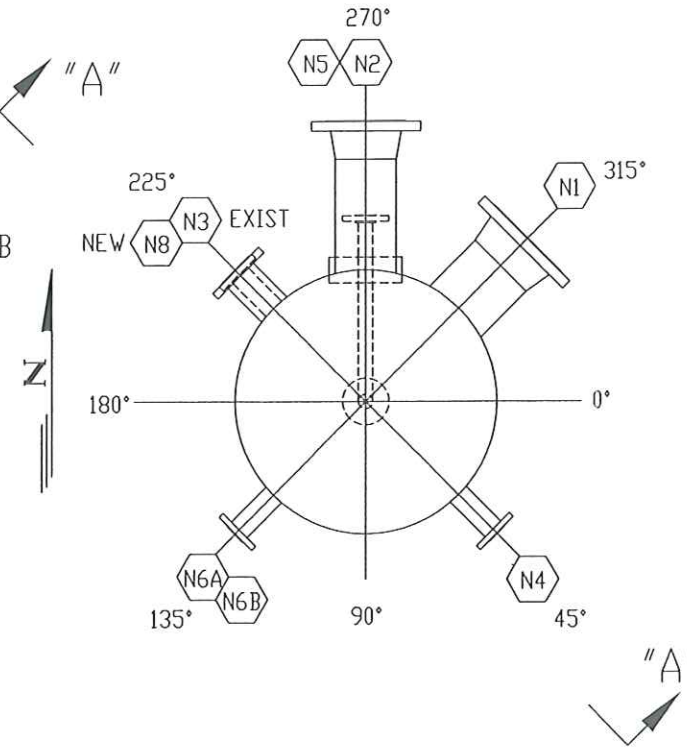
A  
B  
C  
D  
E  
F  
G  
H  
I  
J



V-117A & B  
LOOKING WEST  
V-117A AND V-117B SHOWN



SECTION "A-A"  
V-117A AND V-117B SHOWN

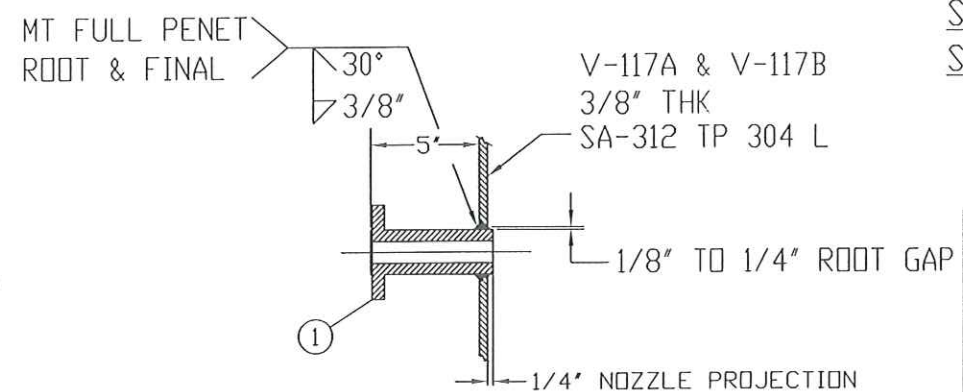


ORIENTATION  
V-117A AND V-117B SHOWN

BILL OF MATERIALS		
ITEM	QTY.	DESCRIPTION
1	2	1' DIA LONG WELD NECK FLANGE, 150#, RF, SS, SA 182, F304 L=9' LG
2	2	2' DIA GATE VALVE, 150# RF FLG, OS&Y, SS BODY
3	2	1' DIA GATE VALVE, 150# RF FLG, OS&Y, SS BODY
4	2	2' DIA BLIND FLANGE, 150#, RF, CS, ASTM A105
5	2	1' DIA BLIND FLANGE, 150#, RF, CS, ASTM A105
6	4	2' GASKET, 150# RF, T316L S/S WITH FLEX GRAPHITE
7	4	1' GASKET, 150# RF, T316L S/S WITH FLEX GRAPHITE
8	16	5/8" DIA X 3 1/4' LG STUD BOLT, A193-B7 W/2 NUTS
9	16	1/2" DIA X 2 3/4' LG STUD BOLT, A193-B7 W/2 NUTS

ITEM 1 ORDERED ON W.O. B45174, PR 33550.  
ITEM 2, 3 & 5 ORDERED ON W.O. B45100, PR33936, PD35494 AND PR33974.  
REUSE ITEM 4.  
ALL OTHER MAT'L TO BE TAKEN FROM STOCK.

- NOTES
- SEE JOB NOTE H2-08-06 FOR CODE INSTALLATION WORK.
  - FIELD INSTALL NEW TANK NOZZLE AS SHOWN TO BE USED WITH THE EXISTING 2' NOZZLE SHOWN FOR THE INSTALLATION OF A HIGH LIQUID LEVEL ALARM SWITCH LSH-7732A AND LSH-7732B. ALL PER SAFETY MOC UU-08-109.
  - FIELD CHECK ALL DIMENSIONS PRIOR TO FABRICATION.
  - FLANGE BOLT HOLES TO STRADDLE NORMAL CENTER LINES.
  - ALL GASKET SURFACES TO BE PROTECTED FROM WELD SPLATTER PRIOR TO FITUP.
  - USE WELD PROCEDURE WPS-105 FOR WELDING.
  - WELDER MUST BE QUALIFIED TO WELD CODED PRESSURE VESSEL. MT FULL PENET WELD.
  - HYDRO PIPING NOZZLE WITH TANK AT 170 PSI.



DETAIL "A"  
NOT TO SCALE  
TO BE IDENTICAL TO  
AS BUILT DWG, 1' NOZZLE (DET 'F')

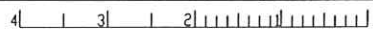
FOR INFO NOT SHOWN  
SEE DWG KORFAB, INC  
S/D 194 A/B

PARENT W.O. B45100  
MAT'L WD B45174

KORFAB, INC S/D 194 A/B		30" OD X 7'-0" 1ST STAGE SUCTION SCRUBBER
B-360-G-277		HYDROGEN PLANT P&ID COMPRESSOR SKID PKG C-102B
B-360-G-276		HYDROGEN PLANT P&ID COMPRESSOR SKID PKG C-102A
P&ID NO		REFERENCE DRAWINGS
WESTERN INDUSTRIES INC.		DESIGNING DEPARTMENT - FORTVAL, VIRGINIA
HYDROGEN PLANT V-117A AND V-117B		NEW 1' DIA. TANK NOZZLE
HIGH LEVEL ALARMS LSH-7732A & B		
DATE 01/22/2009	CHWIE NO	SEE DWG
ENGR T. D. WALKER	DATE/ISSUED	LCN
SCALE 3/4" = 1'-0"	B-360-V-324	REV. 0

NOTIFY ENGINEERING OF ALL CHANGES

CAD FILE 360V324



#107500  
107501

PLOTTING SCALE: 1"=16'