12C

INVENTORY 80 81 82 83 84 85 86 87 88 89 90 91 92 93 94 95

Ward Transformer Co., Inc.

TRANSFORMER DEPT.

No. 2443

Received From:	Texas Gulf		Original Cost:
			Shop Cost:
Town:	Aurora	State N.C.	Incoming Freight:
Received Via:		Date: 7-8-81	Date Billed:
Card Made:	Jack Shipman	P. O. No:	Our R No:
Sold To:			Cust. Order No:

EQUIPMENT: 1 STATION TYPE TRANSFORMER

Serial No. L3H4991

Make: LE	K.V.A. 1500	Imp. 8.59	Phase: 3	Style No.
H. Volts: 22900	Type: STA	Form:	Cycles: 60	Cat. No.
L. Volts: 480 [redacted]	Gals Oil: 435	Pol:	N. P. No. 65	Spec. No.
No. Taps 4 Taps	Up 2 Down 2	YEAR BUILT:		
	Pocket Pri. Sec	Top Pri. Sec	Steel ☑	Cast ☐ Cast Top Bot.
(3)	Stud Pri Sec.	Oblong ☐	Straight ☑	Round ☑ Corregated ☐ Fins
CRACKED L.V. BUSHINGS		Ht. top of H. V.:		Tank & Fittings: 3352
LEAKING	24100	Ht. No. H. V. Bush: 108		C & C Wt.: 3471
	23500	Dia:	Wide: 72	Oil Wt.: 3230
100%	22900	Deep: 56"		Total Wt.: 8891
	22300	Oil Level Gauge	☑	Thermometer ☑
	21700	Tap Changer:	External ☑	Internal ☐
		NEW USER:		
		REBUILT USER:		
WELDED DOWN TOP		DEALER:		

REMARKS:

10816793

TRANSFORMER TEST

Continuity	Lead Clearances	Exciting Current ____ At ____ Volts		Core Loss ____ At ____ Volts	
Oil N R	Oil Level	500 Cycles At ____ L. Volts		High Pot. ✓	High To Grd. 45 K. V.
Grd Terminals 1 2	Surge Tested	Radio Interference OK	Polprity A S	Low To Grd	5 K. V.
Oil Leaks NO	Anti Siphon Joints	Impeadence Calculated At ____ Volts		High To Low	K.V.
Pri. Grd. Connected Y N	Sec. Grd. Connected Y N	Number Taps 4	What %	Up 8	Down 8

SECONDARY BREAKER		Position	% Tap	Connect	Pot. Difference	T.T.R. Ratio	Calculated Ratio
Breaker No.		1		50.189	50.192	48.768	
Trip and Reset	Oil Temp. °C	2		48.945	48.948	48.032	
Factory Trip Allowable	Tot. Secs.	3	100%	47.705	47.709	47.504	
Factory Trip Current	At °C	4		46.459	46.462	46.462	
Shop Trip Current	At °C	5		45.186	45.188	45.201	
Shop Trip Time Right Side	Secs.		out on	3PD 1-28	Tot on 22900		
Shop Trip Time Left Side	Secs.						

INSULATION POWER FACTOR			OIL TEST		INCOMING	OUTGOING
High to Grd.	I.P.F.	M.F.	SHOT A	SHOT B	Color	
High to Low	I.P.F.	M.F.	No. 1 K. V.	No. 1 K. V.	Neut No.	
Low to Grd.	I.P.F.	M.F.	No. 2 K. V.	No. 2 K. V.	I. F. T.	
Megger High to Grd.	In	Out	No. 3 K. V.	No. 3 K. V.	Power Factor	
Megger Low to Grd.	In	Out	No. 4 K. V.	No. 4 K. V.	Oxidation %	Time
Megger High to Low	In	Out	No. 5 K. V.	No. 5 K. V.	Oxidation %	Time
			TOTAL K. V.	TOTAL K. V.	Average K. V. 30	

Fuse No.	Good	Bad	GRD. Clamps	OUT	Approved YES
Hangers	IN	OUT	Pri. Bushing Good	OUT	Date Tested 2-15-88
Arrestors	IN	OUT	Sec. Bushing Good	OUT	Tested
Paint		OUT	Sec. Breaker IN	OUT	By John Lapan

REMARKS

50.196 Same Old

L.G. 2000 48.951 1 = mpd. Car Ratio

H.G. 2500 47.709

H.L. 10,000 46.466

2500 Volt Scale 45.193

OHMS	97.8°C	milli OHMS
H-1-H-2	2.980	X-1-X-2 1.397
H-2-H-3	2.915	X-2-X-3 1.415
H-1-H-3	2.840	X-1-X-3 1.370

SHOP

WARD TRANSFORMER CO., INC.

P.O. BOX 30009 • MT. HERMAN CHURCH ROAD
RALEIGH, N.C. 27622

PHONE: 919-787-3553
800-334-9600

FAX: 919-787-1683

ORDER SHEET

ORDER NO.	DATE SOLD	SALESMAN
0003137212	07/08/88	25

CUSTOMER NO.	TERMS
007782	

SOLD TO:
TEXAS GULF INC
PO BOX 48
AURORA, NORTH CAROLINA 27806

CUSTOMER P.O. NO. D98-13086
ATTENTION:
TELEPHONE NO.: 919-322-4111

SHIP TO:
TEXAS GULF INC
PO BOX 48
AURORA, NORTH CAROLINA 27806

REFERENCE NO.:
ATTENTION:
TELEPHONE NO.: 919-322-4111 7/19/88

DATE REQUIRED: 07/13/88 | F.O.B. PT. & FREIGHT: | SHIP VIA: JT PP&ADD Bill

ITEM NUMBER	QTY. ORD.	QTY. SHIP	DESCRIPTION	UNIT
3-2443	1	0	REPAIRS TO 1-1500 KVA GE	EA
			TRANSFORMER, 3PH, 60CY, CLASS OA,	
			8.59% IMP., 65 DEGREE C RISE, PRI:	
			22900 VOLTS DELTA W/ 2-2.5% TAPS ABOVE	
			& BELOW, SEC: 480[redacted] VOLTS, 435	
			GALLONS OF OIL, 108" H X 72"W X 56"D,	
			8891 LBS TOTAL WEIGHT, SER#L244991	
			INCOMING FREIGHT	
			REPAIR CHARGES	
			OUTGOING FREIGHT	
			INSTRUCTIONS:	
			1) INSPECT & REPAIR THE LEAKING	
			BUSHING ON THE SEC. SIDE. TEST & REPLACE	
			ANY DEFECTIVE GAUGES & FANS.	
			2) TEST THE OIL A) GAS IN OIL B) STD.	
			OIL SCREEN C) PCB	
			3) REPLACE ALL THE GASKETS AND CLEAN,	
			TEST & PAINT.	
			NOTE: SEE RICHARD BREWER FOR BILLING	

W/O# 07118.092

INSTRUCTIONS: