



**DUKE POWER**

April 25, 1991

U. S. Nuclear Regulatory Commission  
ATTN: Document Control Desk  
Washington, DC 20555

Subject: McGuire Nuclear Station  
Docket No. 50-369  
Unit 1 EOC-6 Refueling Outage  
Steam Generator Inspection

Gentlemen:

Pursuant to Technical Specification 3/4.4.5.5, the following information is submitted for McGuire Nuclear Station, Unit 1 Steam Generator inspections:

1. The following quantity of tubes were inspected from either side of the steam generator:

<u>Steam Generator</u>	<u>Tubes Inspected</u> <u>Full Length</u>
A	4479
B	4452
C	4516
D	4427

2. The following information is submitted concerning tube indications of imperfections. (The attached lists identify the tubes with imperfections, their locations and their size.)

<u>Steam Generator</u>	<u>Attachment</u>
A	1
B	3
C	5
D	7

A047  
11

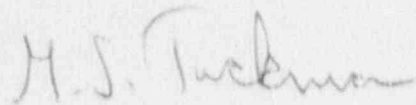
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3. The following quantities of tubes were removed from service by plugging and repaired by sleeving. (The tubes are identified in the attachments.):

<u>Steam Generator</u>	<u>Number of Tubes Plugged or Repaired</u>	<u>Attachment</u>
A	170	2
B	138	4
C	96	6
D	178	8

If there are any questions on this matter, please contact P. F. Guill at (704) 373-2844.

Very truly yours,



M. S. Tuckman

LTB

Attachments

xc: Regional Administrator, Region II  
USNRC

McGuire Project Mnanger, ONRR  
USNRC

McGuire Senior Resident Inspector  
USNRC

Plant: McGUIRE UNIT 1  
Outages: 01/90 E360 01/90 RFO

Steam Generator: A

QUERY: ATTACHMENT 1 INDICATIONS OF IMPERFECTIONS

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
50000	1	01/90 RFO	ID (general)	65 % TW	6.41	HTS-D	+ 4.92
50000	53	01/90 E360	ID (general)	23 % TW	1.02	HTS-S	
50000	56	01/90 E360	ID (general)	16 % TW	0.64	HTS-S	+ 0.10
50000	60	01/90 E360	ID (general)	32 % TW	1.79	HTS-S	+ 0.20
50000	73	01/90 RFO	ID (general)	40 % TW	20.40	HTS-S	
50000	114	01/90 E360	ID (general)	30 % TW	1.18	HTS-S	
50000	23	01/90 E360	ID (general)	33 % TW	2.39	HTS-S	
50000	39	01/90 E360	ID (general)	27 % TW	1.41	HTS-S	
50000	50	01/90 E360	ID (general)	27 % TW	1.41	HTS-S	+ 0.10
50000	58	01/90 E360	ID (general)	27 % TW	0.97	HTS-S	- 2.00
50000	62	01/90 E360	ID (general)	25 % TW	0.78	HTS-S	- 0.80
50000	65	01/90 RFO	ID (general)	70 % TW	2.97	HTS-D	+ 20.17
50000	68	01/90 E360	ID (general)	22 % TW	0.87	HTS-S	
50000	81	01/90 E360	ID (general)	13 % TW	0.56	HTS-S	+ 0.20
50000	83	01/90 E360	ID (general)	30 % TW	1.67	HTS-S	+ 0.20
50000	88	01/90 E360	ID (general)	35 % TW	1.35	HTS-S	- 1.20
50000	88	01/90 E360	ID (general)	28 % TW	1.98	HTS-S	+ 0.10
50000	53	01/90 E360	ID (general)	47 % TW	4.29	HTS-S	- 0.90
50000	69	01/90 E360	ID (general)	29 % TW	1.56	HTS-S	+ 0.50
50000	78	01/90 RFO	ID (general)	25 % S/N	3.52	HTS-D	+ 12.93
50000	86	01/90 E360	ID (general)	25 % TW	2.06	HTS-S	+ 0.20
50000	97	01/90 E360	ID (general)	35 % TW	0.86	HTS-S	
50000	98	01/90 E360	ID (general)	27 % TW	1.49	HTS-S	+ 0.10
50000	8	01/90 E360	OD (general)	18 % TW	8.30	1	+ 13.00
50000	58	01/90 RFO	OD (general)	25 % S/N	0.77	1	+ 15.21
50000	58	01/90 E360	ID (general)	32 % TW	1.76	HTS-S	+ 0.20
50000	61	01/90 RFO	ID (general)	40 % TW	15.25	HTS-S	
50000	67	01/90 E360	ID (general)	30 % TW	1.05	HTS-S	+ 0.10
50000	100	01/90 E360	ID (general)	27 % TW	2.28	HTS-S	
50000	102	01/90 E360	ID (general)	22 % TW	1.47	HTS-S	+ 0.10
50000	60	01/90 RFO	ID (general)	22 % TW	0.12	HTS-S	
50000	96	01/90 E360	ID (general)	25 % TW	9.47	HTS-D	+ 16.98
50000	110	01/90 E360	ID (general)	31 % TW	1.74	HTS-S	+ 0.20
50000	114	01/90 E360	ID (general)	30 % TW	1.61	HTS-S	+ 0.20
50000	55	01/90 E360	ID (general)	28 % TW	2.11	HTS-S	+ 0.20
50000	77	01/90 E360	ID (general)	20 % TW	1.13	HTS-S	+ 0.20
50000	77	01/90 E360	ID (general)	35 % TW	1.61	HTS-S	+ 0.20
50000	80	01/90 E360	ID (general)	30 % TW	1.68	HTS-S	- 0.20
50000	82	01/90 E360	ID (general)	30 % TW	1.66	HTS-S	+ 0.20
50000	107	01/90 E360	ID (general)	10 % TW	0.36	HTS-S	+ 0.10
50000	111	01/90 E360	ID (general)	29 % TW	1.40	HTS-S	+ 0.20
50000	54	01/90 E360	ID (general)	17 % TW	0.79	HTS-S	+ 0.20
50000	86	01/90 E360	ID (general)	42 % TW	2.62	HTS-S	- 1.50
50000	93	01/90 E360	ID (general)	31 % TW	1.33	HTS-S	+ 0.10
50000	106	01/90 E360	ID (general)	25 % TW	1.06	HTS-S	+ 0.10
50000	53	01/90 E360	ID (general)	25 % TW	1.38	HTS-S	+ 0.20
50000	63	01/90 RFO	ID (general)	25 % S/N	11.54	HTS-S	+ 17.10
50000	91	01/90 E360	ID (general)	44 % TW	2.92	HTS-S	+ 0.30
50000	96	01/90 E360	ID (general)	42 % TW	2.56	HTS-S	+ 0.10
50000	105	01/90 E360	ID (general)	48 % TW	3.49	HTS-S	
50000	106	01/90 E360	ID (general)	11 % TW	0.38	HTS-S	+ 0.10
50000	107	01/90 E360	ID (general)	28 % TW	1.14	HTS-S	
50000	72	01/90 E360	ID (general)	41 % TW	2.45	HTS-S	+ 0.10
50000	74	01/90 E360	ID (general)	36 % TW	1.63	HTS-S	
50000	109	01/90 RFO	ID (general)	25 % S/N	12.77	HTS-S	+ 5.36
50000	26	01/90 E360	ID (general)	43 % TW	2.89	HTS-S	+ 0.10
50000	22	01/90 E360	OD (general)	34 % TW	3.62	6	+ 11.30
50000	95	01/90 RFO	OD (general)	25 % S/N	0.92	6	+ 9.79
50000	95	01/90 E360	ID (general)	36 % TW	2.09	HTS-S	+ 0.20
50000	103	01/90 E360	ID (general)	15 % TW	0.53	HTS-S	+ 0.10
50000	106	01/90 E360	ID (general)	25 % TW	1.01	HTS-S	
50000	113	01/90 E360	ID (general)	19 % TW	0.67	HTS-S	- 0.10
50000	44	01/90 E360	ID (general)	24 % TW	1.51	HTS-S	- 1.20
50000	83	01/90 E360	ID (general)	27 % TW	0.11	HTS-S	- 0.10
50000	79	01/90 E360	ID (general)	27 % TW	2.16	HTS-S	- 0.10
50000	80	01/90 E360	ID (general)	29 % TW	2.36	HTS-S	- 0.20
50000	88	01/90 E360	ID (general)	24 % TW	1.73	HTS-S	+ 0.10

Plant: McGUIRE UNIT 1  
Outages: 01/90 E360 01/90 RFO

Steam Generator: A

QUERY: ATTACHMENT 1 INDICATIONS OF IMPERFECTIONS

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
14	100	01/90 E360	OD (general)	46 % TW	29.21	2	+16.50
		01/90 E360	OD (general)	66 % TW	29.43	2	+20.20
		01/90 RFO	OD (general)	19 % TW	5.84	2	+13.88
15	76	01/90 E360	ID (general)	48 % TW	5.50	HTS	+ 0.10
15	82	01/90 E360	ID (general)	42 % TW	4.31	HTS	+ 0.10
15	84	01/90 E360	ID (general)	54 % TW	6.76	HTS	+ 0.20
15	85	01/90 E360	ID (general)	35 % TW	3.30	HTS	+ 0.10
15	91	01/90 E360	ID (general)	42 % TW	4.20	HTS	+ 0.20
15	92	01/90 E360	ID (general)	37 % TW	3.54	HTS	+ 0.10
15	94	01/90 E360	ID (general)	23 % TW	1.60	HTS	+ 0.10
15	112	01/90 E360	ID (general)	14 % TW	0.69	HTS	+ 0.10
16	62	01/90 E360	ID (general)	20 % TW	0.72	HTS	+ 0.10
16	63	01/90 E360	ID (general)	31 % TW	1.23	HTS	- 1.90
16	64	01/90 E360	ID (general)	45 % TW	3.68	HTS	- 1.80
		01/90 RFO	ID (general)	S/N	4.51	HTS	+10.92
16	68	01/90 E360	ID (general)	23 % TW	1.48	HTS	+ 0.10
		01/90 RFO	ID (general)	40 % TW	2.03	HTS	+ 0.10
16	70	01/90 E360	ID (general)	15 % TW	0.90	HTS	+ 0.10
16	79	01/90 E360	ID (general)	23 % TW	1.56	HTS	+ 0.10
16	81	01/90 E360	ID (general)	43 % TW	4.23	HTS	+ 0.10
		01/90 RFO	ID (general)	40 % TW	1.38	HTS	+ 0.10
16	88	01/90 E360	ID (general)	24 % TW	1.71	HTS	+ 0.10
16	95	01/90 RFO	ID (general)	S/N	5.43	HTS	+ 0.80
16	106	01/90 E360	ID (general)	60 % TW	5.58	HTS	+ 0.30
		01/90 RFO	ID (general)	40 % TW	1.02	HTS	+ 0.30
16	110	01/90 E360	ID (general)	24 % TW	1.26	HTS	+ 0.10
16	111	01/90 E360	ID (general)	27 % TW	1.50	HTS	+ 0.10
		01/90 RFO	ID (general)	44 % TW	9.83	HTS	+ 8.66
18	80	01/90 E360	ID (general)	18 % TW	1.11	HTS	+17.08
18	86	01/90 RFO	ID (general)	57 % TW	7.19	HTS	+ 0.20
19	76	01/90 E360	ID (general)	46 % TW	3.62	HTS	+ 0.20
19	78	01/90 E360	ID (general)	23 % TW	1.61	HTS	+ 0.10
19	97	01/90 E360	ID (general)	20 % TW	0.72	HTS	+ 0.10
19	101	01/90 E360	ID (general)	21 % TW	1.05	HTS	+ 0.10
20	60	01/90 E360	ID (general)	34 % TW	2.15	HTS	+ 0.10
20	73	01/90 E360	ID (general)	62 % TW	6.18	HTS	+ 0.20
20	77	01/90 E360	ID (general)	39 % TW	2.66	HTS	+ 0.20
20	79	01/90 E360	ID (general)	38 % TW	2.60	HTS	+ 0.20
20	83	01/90 E360	ID (general)	40 % TW	2.74	HTS	- 3.30
21	64	01/90 E360	ID (general)	41 % TW	2.92	HTS	- 3.40
		01/90 E360	ID (general)	50 % TW	4.21	HTS	- 3.80
		01/90 RFO	ID (general)	S/N	5.00	HTS	+10.62
		01/90 RFO	ID (general)	S/N	4.79	HTS	+16.71
21	67	01/90 E360	ID (general)	26 % TW	1.34	HTS	+ 0.30
21	69	01/90 E360	ID (general)	32 % TW	2.01	HTS	+ 0.30
21	74	01/90 E360	ID (general)	32 % TW	1.97	HTS	+ 0.10
21	82	01/90 RFO	ID (general)	S/N	13.51	HTS	+12.71
21	96	01/90 E360	ID (general)	27 % TW	1.46	HTS	- 0.10
21	110	01/90 E360	ID (general)	59 % TW	5.43	HTS	- 0.60
21	57	01/90 E360	ID (general)	45 % TW	2.69	HTS	+ 0.20
21	59	01/90 E360	ID (general)	27 % TW	1.48	HTS	+ 0.20
21	61	01/90 E360	ID (general)	53 % TW	4.68	HTS	+ 0.10
21	63	01/90 E360	ID (general)	54 % TW	4.86	HTS	+ 0.30
21	66	01/90 E360	ID (general)	47 % TW	3.77	HTS	- 2.30
		01/90 E360	ID (general)	23 % TW	1.00	HTS	- 3.40
		01/90 E360	ID (general)	32 % TW	1.96	HTS	+ 0.10
21	71	01/90 E360	ID (general)	42 % TW	3.05	HTS	+ 0.20
21	73	01/90 E360	ID (general)	25 % TW	1.26	HTS	+ 0.10
21	74	01/90 E360	ID (general)	58 % TW	5.57	HTS	+ 0.10
21	75	01/90 E360	ID (general)	57 % TW	5.44	HTS	+ 0.20
21	77	01/90 E360	ID (general)	47 % TW	3.75	HTS	- 1.30
21	82	01/90 E360	ID (general)	28 % TW	1.52	HTS	- 0.50
21	51	01/90 E360	ID (general)	23 % TW	1.59	HTS	+ 0.20
21	59	01/90 E360	ID (general)	34 % TW	2.10	HTS	+ 0.20
21	66	01/90 E360	ID (general)	44 % TW	3.27	HTS	+ 0.10
21	69	01/90 E360	ID (general)	68 % TW	7.86	HTS	- 0.30
21	74	01/90 E360	ID (general)	53 % TW	4.68	HTS	- 0.30



Plant: McGUIRE UNIT 1  
Outages: 01/90 E360 01/90 RFO

Steam Generator: A

QUERY: ATTACHMENT 1 INDICATIONS OF IMPERFECTIONS

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
23	75	01/90 E360	ID (general)	30 % TW	1.74	HTS-S	
23	77	01/90 E360	ID (general)	24 % TW	1.17	HTS-S	+ 0.20
23	81	01/90 E360	ID (general)	27 % TW	1.47	HTS-S	
24	65	01/90 E360	ID (general)	75 % TW	9.85	HTS-S	+ 0.10
24	71	01/90 E360	ID (general)	43 % TW	3.17	HTS-S	+ 0.10
24	73	01/90 E360	ID (general)	31 % TW	1.83	HTS-S	+ 0.20
24	87	01/90 E360	ID (general)	34 % TW	2.22	HTS-S	
24	94	01/90 E360	ID (general)	25 % TW	1.26	HTS-S	+ 0.10
25	64	01/90 E360	ID (general)	33 % TW	2.03	HTS-S	
25		01/90 E360	ID (general)	56 % TW	5.18	HTS-S	- 2.30
25	65	01/90 E360	ID (general)	46 % TW	3.63	HTS-S	
25		01/90 RFO	ID (general)	40 % TW	10.56	HTS-S	
25	66	01/90 E360	ID (general)	54 % TW	4.88	HTS-S	+ 0.10
25	71	01/90 E360	ID (general)	37 % TW	2.52	HTS-S	+ 0.10
25	74	01/90 E360	ID (general)	25 % TW	1.21	HTS-S	+ 0.20
26	46	01/90 RFO	ID (general)	S/N	3.68	HTS-P	+11.20
26	59	01/90 E360	ID (general)	64 % TW	6.82	HTS-S	+ 0.20
26		01/90 RFO	ID (general)	40 % TW	11.53	HTS-S	
26	66	01/90 E360	ID (general)	29 % TW	2.40	HTS-S	+ 0.50
26	67	01/90 RFO	OD WEAR	27 % TW	3.17	DVCR	
26	69	01/90 E360	ID (general)	23 % TW	1.53	HTS-S	+ 0.10
26	71	01/90 E360	ID (general)	22 % TW	1.43	HTS-S	+ 0.20
26	72	01/90 E360	ID (general)	32 % TW	2.69	HTS-S	
26	78	01/90 E360	ID (general)	19 % TW	1.18	HTS-S	+ 0.20
26	80	01/90 E360	ID (general)	24 % TW	1.65	HTS-S	- 1.30
26	81	01/90 E360	ID (general)	25 % TW	1.84	HTS-S	+ 0.20
26	84	01/90 RFO	ID (general)	S/N	2.39	HTS-P	+15.20
26		01/90 RFO	ID (general)	S/N	6.73	HTS-P	+14.00
26	85	01/90 E360	ID (general)	12 % TW	0.76	HTS-S	
27	11	01/90 RFO	ID (general)	77 % TW	1.57	HTS-P	+16.90
27	19	01/90 RFO	ID (general)	95 % TW	2.42	HTS-P	+12.00
27	34	01/90 E360	OD (general)	S/N	6.05	HTS-S	+ 1.50
27	39	01/90 RFO	OD WEAR	19 % TW	0.70	DVCR	
27	63	01/90 E360	ID (general)	24 % TW	1.76	HTS-S	+ 0.10
27	64	01/90 E360	ID (general)	29 % TW	2.33	HTS-S	+ 0.10
27	67	01/90 E360	ID (general)	24 % TW	1.69	HTS-S	+ 0.20
27	69	01/90 E360	ID (general)	21 % TW	2.56	HTS-S	+ 0.10
27	71	01/90 E360	OD (general)	65 % TW	6.56	HTS-S	
27	72	01/90 E360	ID (general)	12 % TW	0.76	HTS-S	+ 0.10
27	77	01/90 RFO	OD WEAR	19 % TW	0.60	DVCR	
27	93	01/90 E360	ID (general)	48 % TW	5.50	HTS-S	+ 0.10
27		01/90 RFO	ID (general)	40 % TW	19.59	HTS-S	
27	106	01/90 E360	ID (general)	32 % TW	1.82	HTS-S	
28	39	01/90 E360	ID (general)	54 % TW	6.84	HTS-S	
28	43	01/90 RFO	OD WEAR	19 % TW	1.26	DVCR	
28	60	01/90 E360	ID (general)	34 % TW	2.98	HTS-S	+ 0.20
28	67	01/90 E360	ID (general)	37 % TW	3.44	HTS-S	+ 0.20
28		01/90 RFO	OD WEAR	19 % TW	1.18	DVCR	
28	68	01/90 E360	ID (general)	26 % TW	1.90	HTS-S	+ 0.20
28	69	01/90 E360	ID (general)	34 % TW	3.00	HTS-S	+ 0.40
28	72	01/90 E360	ID (general)	24 % TW	1.69	HTS-S	+ 0.10
28	74	01/90 E360	ID (general)	22 % TW	1.41	HTS-S	+ 0.10
28	75	01/90 E360	ID (general)	42 % TW	4.14	HTS-S	+ 0.10
28	78	01/90 E360	ID (general)	24 % TW	1.67	HTS-S	+ 0.10
28	81	01/90 RFO	OD WEAR	19 % TW	0.78	DVCR	
28	84	01/90 E360	ID (general)	7 % TW	0.40	HTS-S	+ 0.20
28	103	01/90 E360	ID (general)	38 % TW	2.23	HTS-S	+ 0.10
29	52	01/90 RFO	OD WEAR	19 % TW	1.52	DVCR	
29	68	01/90 RFO	ID (general)	S/N	10.60	HTS-P	+18.70
29	73	01/90 E360	ID (general)	17 % TW	1.07	HTS-S	+ 0.10
29	74	01/90 E360	ID (general)	23 % TW	1.55	HTS-S	+ 0.10
29	94	01/90 RFO	OD (general)	S/N	0.74	9	+ 5.64
30	65	01/90 E360	ID (general)	25 % TW	1.00	HTS-S	+ 0.10
30	66	01/90 E360	ID (general)	19 % TW	0.62	HTS-S	+ 0.10
30	78	01/90 E360	ID (general)	36 % TW	3.63	HTS-S	- 0.50
30		01/90 RFO	ID (general)	S/N	7.21	HTS-P	+12.67
30	86	01/90 E360	ID (general)	32 % TW	1.61	HTS-S	- 2.50

Plant: McGUIRE UNIT 1  
Outages: 01/90 E360 01/90 RFO

Steam Generator: A

QUERY: ATTACHMENT 1 INDICATORS OF IMPERFECTIONS

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
30	94	01/90 E360	ID (general)	35 % TW	1.87	HTS-S	+ 0.20
31	44	01/90 RFO	OD WEAR	19 % TW	1.59	AVB3	
31	86	01/90 RFO	ID (general)	44 % TW	5.87	HTS-P	+19.85
32	48	01/90 E360	OD (general)	22 % TW	1.67	5	+12.40
32		01/90 RFO	OD (general)	19 % TW	0.82	5	+10.65
33	77	01/90 E360	ID (general)	59 % TW	5.21	HTS-S	- 0.50
33	40	01/90 E360	ID (general)	21 % TW	0.72	HTS-S	+ 0.20
33	77	01/90 E360	ID (general)	34 % TW	1.78	HTS-S	+ 0.10
33	86	01/90 E360	ID (general)	41 % TW	2.40	HTS-S	+ 0.40
33	93	01/90 E360	ID (general)	36 % TW	1.88	HTS-S	+ 0.20
33	52	01/90 E360	ID (general)	26 % TW	2.37	HTS-S	+ 0.20
33	53	01/90 E360	ID (general)	10 % TW	0.79	HTS-S	+ 0.10
33	71	01/90 E360	ID (general)	36 % TW	1.94	HTS-S	+ 0.10
33	84	01/90 E360	ID (general)	36 % TW	1.92	HTS-S	+ 0.20
33	56	01/90 E360	OD (general)	33 % TW	5.07	7	+ 3.20
33		01/90 RFO	OD (general)	19 % TW	0.60	7	+ 1.20
36	99	01/90 E360	ID (general)	30 % TW	1.41	HTS-S	+ 0.10
37	16	01/90 RFO	OD WEAR	19 % TW	0.88	AVB2	
37		01/90 RFO	OD WEAR	19 % TW	0.86	AVB3	
37	28	01/90 E360	ID (general)	34 % TW	1.75	HTS-S	- 4.00
37	29	01/90 E360	ID (general)	63 % TW	6.67	HTS-S	-12.20
		01/90 RFO	ID (general)	S/N	5.07	HTS-P	+ 9.58
38	77	01/90 E360	ID (general)	43 % TW	2.71	HTS-S	
38	80	01/90 E360	ID (general)	41 % TW	3.29	HTS-S	+ 0.10
40	51	01/90 RFO	OD WEAR	19 % TW	1.26	AVB1	
40	86	01/90 RFO	OD WEAR	19 % TW	0.68	AVB3	
		01/90 RFO	OD WEAR	19 % TW	0.81	AVB2	
40	95	01/90 E360	ID (general)	28 % TW	1.29	HTS-S	
41	54	01/90 RFO	OD WEAR	19 % TW	0.87	AVB2	
41	59	01/90 RFO	OD WEAR	19 % TW	1.38	AVB1	
41	71	01/90 E360	ID (general)	11 % TW	0.55	HTS-S	
41	86	01/90 E360	ID (general)	59 % TW	5.28	HTS-S	- 0.40
42	43	01/90 RFO	OD WEAR	19 % TW	0.71	AVB3	
42	51	01/90 RFO	OD WEAR	19 % TW	0.67	AVB1	
42	57	01/90 RFO	OD WEAR	19 % TW	1.18	AVB1	
43	57	01/90 RFO	OD WEAR	19 % TW	1.22	AVB1	
44	74	01/90 E360	ID (general)	50 % TW	3.78	HTS-S	- 1.00
46	59	01/90 RFO	OD WEAR	19 % TW	1.18	16	
47	56	01/90 RFO	OD WEAR	23 % TW	3.56	16	
47	58	01/90 RFO	OD WEAR	21 % TW	1.51	14	
		01/90 RFO	OD WEAR	19 % TW	1.22	16	
47	59	01/90 RFO	OD WEAR	19 % TW	1.25	16	
		01/90 RFO	OD WEAR	20 % TW	1.35	14	
47	60	01/90 RFO	OD WEAR	22 % TW	1.52	16	
		01/90 RFO	OD WEAR	19 % TW	0.79	14	
47	61	01/90 RFO	OD WEAR	25 % TW	1.89	16	
		01/90 RFO	OD WEAR	19 % TW	0.85	14	
47	77	01/90 E360	OD WEAR	7 % TW	2.44	16	
		01/90 E360	OD WEAR	7 % TW	2.44	16	
		01/90 RFO	OD WEAR	19 % TW	2.26	16	
48	38	01/90 RFO	OD WEAR	19 % TW	1.42	16	
48	41	01/90 RFO	OD WEAR	19 % TW	1.67	16	
48	54	01/90 RFO	OD WEAR	19 % TW	2.45	16	
48	55	01/90 RFO	OD WEAR	19 % TW	1.75	16	
48	56	01/90 RFO	OD WEAR	19 % TW	2.24	16	
		01/90 RFO	OD WEAR	21 % TW	3.33	14	
		01/90 RFO	OD WEAR	19 % TW	2.84	12	
48	59	01/90 RFO	OD WEAR	19 % TW	1.93	16	
48	62	01/90 E360	OD WEAR	10 % TW	3.60	16	
		01/90 E360	OD WEAR	10 % TW	3.60	16	
		01/90 RFO	OD WEAR	33 % TW	2.89	16	
49	38	01/90 RFO	OD WEAR	19 % TW	2.04	16	
49	40	01/90 RFO	OD WEAR	19 % TW	2.50	16	
		01/90 RFO	OD WEAR	19 % TW	1.89	17	
49	41	01/90 RFO	OD WEAR	19 % TW	2.70	16	
49	42	01/90 RFO	OD WEAR	19 % TW	2.77	16	
49	43	01/90 RFO	OD WEAR	19 % TW	2.19	17	

Plant: McGUIRE UNIT 1  
 Outages: 01/90 E360 01/90 RFO

Steam Generator: A

QUERY: ATTACHMENT 1 INDICATIONS OF IMPERFECTIONS

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
		01/90 RFO	OD WEAR	19 % TW	2.18	16	
		01/90 RFO	OD WEAR	19 % TW	2.54	15	
49	45	01/90 RFO	OD WEAR	19 % TW	1.39	16	
49	50	01/90 RFO	OD WEAR	19 % TW	2.82	16	
49	53	01/90 RFO	OD WEAR	19 % TW	2.65	19	
		01/90 RFO	OD WEAR	19 % TW	2.70	17	
		01/90 RFO	OD WEAR	21 % TW	3.37	16	
		01/90 RFO	OD WEAR	19 % TW	1.77	14	
		01/90 RFO	OD WEAR	19 % TW	1.83	12	
49	54	01/90 RFO	OD WEAR	19 % TW	2.09	17	
		01/90 RFO	OD WEAR	19 % TW	2.60	16	
49	57	01/90 E360	OD WEAR	9 % TW	3.36	14	
		01/90 E360	OD WEAR	7 % TW	2.21	16	
		01/90 E360	OD WEAR	7 % TW	2.52	17	
		01/90 E360	OD WEAR	9 % TW	3.36	14	
		01/90 E360	OD WEAR	7 % TW	2.21	16	
		01/90 E360	OD WEAR	7 % TW	2.52	17	
		01/90 RFO	OD WEAR	19 % TW	2.17	17	
		01/90 RFO	OD WEAR	19 % TW	2.64	16	
		01/90 RFO	OD WEAR	19 % TW	1.89	14	
49	64	01/90 RFO	OD WEAR	19 % TW	1.45	16	
		01/90 RFO	OD WEAR	19 % TW	1.17	17	
49	74	01/90 E360	OD WEAR	11 % TW	4.02	16	
		01/90 E360	OD WEAR	11 % TW	4.02	16	
		01/90 RFO	OD WEAR	30 % TW	2.71	16	
49	76	01/90 E360	OD WEAR	9 % TW	3.35	16	
		01/90 E360	OD WEAR	9 % TW	3.35	16	
		01/90 RFO	OD WEAR	20 % TW	1.57	16	
49	77	01/90 E360	OD WEAR	10 % TW	3.91	16	
		01/90 E360	OD WEAR	10 % TW	3.91	16	
		01/90 RFO	OD WEAR	23 % TW	1.90	16	

TOTAL TUBES FOUND = 237  
 TOTAL INDICATIONS FOUND = 299



Plant: McGuire UNIT 1  
Outages: 01/90 E360 01/90 RFO

Steam Generator: A

QUERY: ATTACHMENT 2 TUBES PLUGGED OR REPAIRED

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
2	53	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
2	56	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
2	60	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
2	73	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
2	114	01/90 RFO	SLEEVED	Design	1	HTS-P	+11.00
2	133	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
2	39	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
2	50	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
2	62	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
2	65	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
2	68	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
2	81	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
2	83	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
2	88	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
4	53	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
4	69	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
4	86	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
4	97	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
4	98	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
5	58	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
5	61	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
5	67	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
5	100	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
5	102	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
6	96	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
6	110	01/90 RFO	SLEEVED	Design	1	HTS-P	+17.50
6	114	01/90 RFO	SLEEVED	Design	1	HTS-P	+11.00
7	55	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
7	77	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
7	80	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
7	82	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
7	107	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
7	111	01/90 RFO	SLEEVED	Design	1	HTS-P	+11.00
8	54	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
8	86	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
8	93	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
8	106	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
9	53	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
9	91	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
9	96	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
9	105	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
9	106	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
9	107	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
10	72	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
10	74	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
10	109	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
11	26	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
12	95	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
12	103	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
12	106	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
12	113	01/90 RFO	SLEEVED	Design	1	HTS-P	+11.00
13	44	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
13	83	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
14	79	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
14	80	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
14	88	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
14	100	01/90 RFO	PLUGGED	MECH		HTS-P	
15	76	01/90 RFO	PLUGGED	MECH		HTS-P	
15	82	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
15	84	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
15	85	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
15	91	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
15	92	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
15	94	01/90 RFO	SLEEVED	Design		HTS-P	+17.50
15	112	01/90 RFO	SLEEVED	Design	1	HTS-P	+11.00
16	62	01/90 RFO	SLEEVED	Design		HTS-P	+17.50



Plant: MCGUIRE UNIT 1  
Outages: 01/90 E360 01/90 RFO

STATION GENERATION

QUERY: ATTACHMENT 2 TUBES PLUGGED OR REPAIRING

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
16	63	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
16	64	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
16	68	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
16	70	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
16	79	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
16	81	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
16	88	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
16	106	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
16	110	01/90 RFO	SLEEVED	Desi		HTS-D	+11.50
16	111	01/90 RFO	SLEEVED	Desi		HTS-D	+11.50
10	80	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
10	76	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
10	78	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
10	97	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
10	101	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	60	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	73	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	77	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	79	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
11	67	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
11	69	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
11	74	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
11	96	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
11	110	01/90 RFO	SLEEVED	Desi		HTS-D	+11.50
00	57	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	59	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	61	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	63	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	66	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	71	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	73	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	74	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	75	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	77	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	82	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	51	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	59	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	66	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	69	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	74	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	75	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	77	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	81	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
4	65	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
4	71	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
4	73	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
4	87	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
4	94	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	64	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	65	01/90 RFO	PLUGGED	MECH		CTS-D	
00		01/90 RFO	PLUGGED	WELD		HTS-D	
00	66	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	71	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	74	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	59	01/90 RFO	PLUGGED	MECH		CTS-D	
00		01/90 RFO	PLUGGED	WELD		HTS-D	
00	66	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	69	01/90 RFO	PLUGGED	MECH		CTS-D	
00		01/90 RFO	PLUGGED	WELD		HTS-D	
00	71	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	72	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	78	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	80	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	81	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
00	85	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
7	63	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50
7	64	01/90 RFO	SLEEVED	Desi		HTS-D	+17.50

Plant: MCGUIRE UNIT 1  
Outages: 01/90 E360 01/90 RFO

Steam Generator: A

QUERY: ATTACHMENT 2 TUBES PLUGGED OR REPAIRED

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
27	67	01/90 RFO	PLUGGED	MECH		CTS-P	
		01/90 RFO	PLUGGED	WELD		HTS-P	
27	69	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
27	71	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
27	72	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
27	93	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
27	106	01/90 RFO	SLEEVED	Desig		HTS-P	+11.00
28	39	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
28	60	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
28	67	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
28	68	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
28	69	01/90 RFO	PLUGGED	MECH		CTS-P	
		01/90 RFO	PLUGGED	WELD		HTS-P	
28	72	01/90 RFO	PLUGGED	MECH		CTS-P	
		01/90 RFO	PLUGGED	WELD		HTS-P	
28	74	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
28	75	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
28	78	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
28	84	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
28	103	01/90 RFO	SLEEVED	Desig		HTS-P	+11.00
29	73	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
29	74	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
30	65	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
30	66	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
30	86	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
30	94	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
31	86	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
32	77	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
33	40	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
33	77	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
33	86	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
33	93	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
35	52	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
35	53	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
35	71	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
35	84	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
36	99	01/90 RFO	SLEEVED	Desig		HTS-P	+11.00
38	77	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
38	80	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
40	95	01/90 RFO	SLEEVED	Desig		HTS-P	+11.00
41	71	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50
41	86	01/90 RFO	SLEEVED	Desig		HTS-P	+11.00
44	74	01/90 RFO	SLEEVED	Desig		HTS-P	+17.50

TOTAL TUBES FOUND = 170  
TOTAL INDICATIONS FOUND = 177

Plant: McGuire UNIT 1  
Outages: 01/90 E360 01/90 RFO

Steam Generator: B

QUERY: ATTACHMENT 3 INDICATIONS OF IMPERFECTIONS

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
2	6	01/90 E360	ID (general)	35 % TW	3.64	HTS-S	+ 0.20
2	39	01/90 RFO	ID (general)	S/N	9.03	HTS-P	+ 4.90
2	69	01/90 E360	ID (general)	30 % TW	3.58	HTS-S	+ 0.10
2	110	01/90 E360	ID (general)	23 % TW	2.35	HTS-S	- 1.70
3	5	01/90 E360	ID (general)	88 % TW	21.60	HTS-S	-10.30
3		01/90 RFO	ID (general)	S/N	17.21	HTS-P	+10.21
3	30	01/90 E360	ID (general)	40 % TW	3.32	HTS-S	+ 0.10
3	44	01/90 E360	ID (general)	46 % TW	3.15	HTS-S	- 0.80
3	56	01/90 E360	ID (general)	44 % TW	2.72	HTS-S	+ 0.10
3	84	01/90 E360	ID (general)	30 % TW	2.69	HTS-S	+ 0.10
3	97	01/90 RFO	OD (general)	S/N	1.88	7	+ 3.68
4	3	01/90 E360	ID (general)	30 % TW	2.76	HTS-S	- 2.50
4	26	01/90 E360	ID (general)	21 % TW	0.84	HTS-S	- 0.30
4	45	01/90 E360	ID (general)	45 % TW	2.95	HTS-S	- 0.20
4	52	01/90 E360	OD (general)	46 % TW	2.03	HTS-S	+ 1.30
4		01/90 E360	OD (general)	43 % TW	1.51	HTS-S	+ 2.80
4	105	01/90 E360	ID (general)	26 % TW	2.77	HTS-S	- 0.60
5	37	01/90 E360	ID (general)	21 % TW	0.87	HTS-S	+ 0.20
5	43	01/90 E360	OD (general)	31 % TW	0.88	HTS-S	+ 1.00
5	1	01/90 E360	ID (general)	25 % TW	1.87	HTS-S	- 0.10
5	20	01/90 E360	ID (general)	40 % TW	4.17	HTS-S	
5	26	01/90 E360	ID (general)	27 % TW	1.92	HTS-S	+ 0.20
5	38	01/90 E360	ID (general)	30 % TW	2.47	HTS-S	+ 0.10
5		01/90 E360	ID (general)	32 % TW	2.70	HTS-S	- 3.60
5		01/90 RFO	ID (general)	40 % TW	1.17	HTS-S	- 0.10
6	41	01/90 E360	ID (general)	30 % TW	1.59	HTS-S	+ 0.20
6	44	01/90 E360	ID (general)	24 % TW	1.07	HTS-S	- 1.00
6	54	01/90 E360	ID (general)	36 % TW	2.05	HTS-S	- 0.10
6	110	01/90 E360	ID (general)	29 % TW	3.21	HTS-S	- 5.30
6		01/90 RFO	ID (general)	S/N	5.23	HTS-P	+19.09
7	2	01/90 RFO	ID (general)	62 % TW	7.71	HTS-P	+ 9.39
7	10	01/90 E360	ID (general)	30 % TW	2.67	HTS-S	+ 0.10
7	22	01/90 E360	ID (general)	19 % TW	0.78	HTS-S	- 2.80
7	29	01/90 RFO	ID (general)	66 % TW	7.82	HTS-P	+10.36
7	57	01/90 E360	OD WEAR	6 % TW	1.08	1	
8	2	01/90 E360	ID (general)	33 % TW	3.21	HTS-S	+ 0.10
8	16	01/90 E360	ID (general)	24 % TW	1.41	HTS-S	
8	34	01/90 RFO	ID (general)	47 % TW	13.33	HTS-P	+ 2.07
8	46	01/90 E360	ID (general)	44 % TW	2.93	HTS-S	- 4.80
8		01/90 RFO	ID (general)	52 % TW	5.04	HTS-P	+16.36
8	56	01/90 RFO	ID (general)	47 % TW	6.59	HTS-P	+14.40
9	24	01/90 E360	OD (general)	3 % TW	0.59	CTSS-S	+ 1.50
9	94	01/90 E360	ID (general)	38 % TW	2.79	HTS-S	- 2.70
10	7	01/90 E360	ID (general)	33 % TW	3.26	HTS-S	+ 0.10
10	26	01/90 E360	ID (general)	36 % TW	3.49	HTS-S	- 1.10
10	36	01/90 E360	ID (general)	29 % TW	1.46	HTS-S	- 2.00
10	37	01/90 E360	ID (general)	19 % TW	0.38	HTS-S	
10	50	01/90 RFO	ID (general)	S/N	5.58	HTS-P	+15.09
10	51	01/90 E360	ID (general)	52 % TW	7.47	HTS-S	- 1.20
10		01/90 RFO	ID (general)	S/N	1.96	HTS-P	+19.75
11	9	01/90 E360	ID (general)	23 % TW	1.50	HTS-S	+ 0.20
11	12	01/90 RFO	ID (general)	40 % TW	13.61	HTS-S	
11	27	01/90 E360	ID (general)	36 % TW	2.31	HTS-S	- 0.10
11		01/90 E360	ID (general)	45 % TW	4.19	HTS-S	- 3.20
11	30	01/90 RFO	ID (general)	S/N	1.09	HTS-P	+ 6.31
11	31	01/90 E360	ID (general)	34 % TW	2.00	HTS-S	
11	38	01/90 E360	ID (general)	28 % TW	1.34	HTS-S	
11	73	01/90 E360	ID (general)	38 % TW	2.59	HTS-S	- 2.00
11	75	01/90 RFO	ID (general)	40 % TW	2.22	HTS-S	
11	76	01/90 E360	ID (general)	16 % TW	0.74	HTS-S	- 0.10
11	80	01/90 E360	ID (general)	54 % TW	4.39	HTS-S	- 2.00
11	86	01/90 E360	ID (general)	62 % TW	5.45	HTS-S	- 3.40
11		01/90 E360	ID (general)	55 % TW	7.37	HTS-S	- 3.20
11		01/90 RFO	ID (general)	S/N	5.18	HTS-P	+18.02
12	18	01/90 RFO	ID (general)	S/N	4.09	HTS-P	+12.11
12	67	01/90 E360	ID (general)	29 % TW	2.01	HTS-S	- 3.70
13	18	01/90 E360	ID (general)	30 % TW	2.55	HTS-S	+ 0.20



Plant: McGUIRE UNIT 1  
Outages: 01/90 E360 01/90 RFO

Steam Generator: B

QUERY: ATTACHMENT 3 INDICATIONS OF IMPERFECTIONS

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
13	30	01/90 E360	ID (general)	29 % TW	2.43	HTS-S	+ 0.40
13	41	01/90 E360	ID (general)	24 % TW	2.61	HTS-S	+ 0.20
		01/90 RFO	ID (general)	S/N	5.47	HTS-P	+ 7.17
13	47	01/90 RFO	ID (general)	S/N	3.21	HTS-P	+ 4.30
13	57	01/90 E360	ID (general)	24 % TW	2.54	HTS-S	+ 0.10
13	98	01/90 RFO	ID (general)	S/N	15.46	HTS-P	+ 1.33
14	41	01/90 RFO	ID (general)	S/N	2.28	HTS-P	+13.94
14	42	01/90 RFO	ID (general)	S/N	5.94	HTS-P	+16.94
14	47	01/90 E360	ID (general)	57 % TW	7.16	HTS-S	- 9.60
		01/90 RFO	ID (general)	S/N	3.99	HTS-P	+ 4.95
		01/90 RFO	ID (general)	S/N	3.59	HTS-P	+11.19
		01/90 RFO	ID (general)	S/N	7.57	HTS-P	+12.23
15	5	01/90 E360	ID (general)	39 % TW	3.09	HTS-S	- 2.00
15	15	01/90 RFO	ID (general)	S/N	2.46	HTS-P	+14.30
15	20	01/90 RFO	ID (general)	S/N	3.33	HTS-P	+ 5.10
		01/90 RFO	ID (general)	S/N	4.36	HTS-P	+ 6.20
15	59	01/90 E360	ID (general)	46 % TW	4.80	HTS-S	+ 0.30
15	93	01/90 E360	OD (general)	21 % TW	6.66	4	+18.00
16	25	01/90 E360	OD (general)	1 % TW	0.23	20	- 2.80
16	38	01/90 E360	ID (general)	79 % TW	14.78	HTS-S	- 3.70
		01/90 RFO	ID (general)	98 % TW	16.17	HTS-P	+17.17
17	35	01/90 E360	ID (general)	42 % TW	3.57	HTS-S	- 3.70
		01/90 RFO	ID (general)	S/N	6.00	HTS-P	+16.89
17	55	01/90 E360	OD (general)	17 % TW	5.53	HTS-S	+ 7.80
		01/90 RFO	OD (general)	S/N	0.73	HTS-S	+ 7.92
17	64	01/90 E360	ID (general)	26 % TW	1.09	HTS-S	+ 0.10
17	70	01/90 RFO	ID (general)	S/N	9.42	HTS-P	+ 8.40
17	71	01/90 RFO	ID (general)	S/N	2.24	HTS-P	+15.78
18	13	01/90 E360	OD (general)	28 % TW	10.49	4	+21.20
		01/90 E360	OD (general)	12 % TW	3.19	4	+ 1.30
18	14	01/90 E360	ID (general)	25 % TW	1.17	CTS-S	-17.70
18	28	01/90 E360	ID (general)	41 % TW	3.28	HTS-S	+ 0.10
18	46	01/90 RFO	ID (general)	S/N	1.59	HTS-P	+15.80
18	47	01/90 E360	ID (general)	25 % TW	1.72	HTS-S	+ 0.10
18	60	01/90 E360	ID (general)	45 % TW	4.60	HTS-S	+ 0.10
18	72	01/90 E360	ID (general)	35 % TW	2.60	HTS-S	- 1.30
19	29	01/90 E360	ID (general)	44 % TW	4.12	HTS-S	- 2.50
19	31	01/90 RFO	ID (general)	S/N	9.01	HTS-P	+14.77
19	32	01/90 E360	ID (general)	27 % TW	1.50	HTS-S	- 3.50
19	49	01/90 E360	ID (general)	24 % TW	1.59	HTS-S	+ 0.10
19	51	01/90 E360	ID (general)	41 % TW	3.26	HTS-S	- 1.40
		01/90 RFO	ID (general)	S/N	6.41	HTS-P	+18.67
19	66	01/90 E360	ID (general)	26 % TW	1.30	HTS-S	- 4.70
19	71	01/90 E360	OD (general)	10 % TW	3.05	7	-17.20
19	81	01/90 E360	ID (general)	35 % TW	2.16	HTS-S	- 1.30
20	11	01/90 RFO	ID (general)	S/N	10.11	HTS-P	+15.68
20	15	01/90 E360	ID (general)	63 % TW	5.90	HTS-S	- 3.00
		01/90 RFO	ID (general)	S/N	9.31	HTS-P	+17.73
20	32	01/90 RFO	ID (general)	S/N	5.30	HTS-P	+ 5.97
20	36	01/90 E360	ID (general)	53 % TW	6.19	HTS-S	- 0.80
20	39	01/90 RFO	ID (general)	S/N	7.07	HTS-P	+15.94
20	101	01/90 E360	ID (general)	29 % TW	1.89	HTS-S	- 1.10
21	10	01/90 RFO	ID (general)	S/N	3.27	HTS-P	+12.31
21	14	01/90 E360	ID (general)	37 % TW	2.88	HTS-S	- 1.20
		01/90 RFO	ID (general)	S/N	4.32	HTS-P	+19.60
21	15	01/90 E360	ID (general)	39 % TW	3.10	HTS-S	- 2.90
		01/90 E360	ID (general)	39 % TW	2.96	HTS-S	- 5.10
		01/90 RFO	ID (general)	S/N	4.77	HTS-P	+17.42
21	19	01/90 E360	ID (general)	50 % TW	4.69	HTS-S	- 3.60
		01/90 RFO	ID (general)	S/N	3.95	HTS-P	+17.03
21	20	01/90 E360	ID (general)	39 % TW	2.87	HTS-S	+ 0.20
		01/90 RFO	ID (general)	60 % TW	17.09	HTS-P	+ 4.53
		01/90 RFO	ID (general)	S/N	3.90	HTS-P	+15.29
		01/90 RFO	ID (general)	S/N	3.73	HTS-P	+16.24
		01/90 RFO	ID (general)	40 % TW	16.45	HTS-S	
21	25	01/90 RFO	ID (general)	S/N	3.07	HTS-P	+11.49
21	27	01/90 E360	ID (general)	28 % TW	1.66	HTS-S	- 1.80



Plant: MOBILE UNIT 1  
Outages: 01/90 E360 01/90 RFO

STEAM GENERATOR

QUERY: ATTACHMENT 3 INDICATIONS OF IMPERFECTIONS

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
21	28	01/90 RFO	ID (general)	S/N	4.98	HTS-T	+14.40
21	28	01/90 E360	ID (general)	32 % TW	2.10	HTS-S	- 2.40
21	29	01/90 E360	ID (general)	16 % TW	0.62	HTS-S	
21	30	01/90 RFO	ID (general)	60 % TW	14.26	HTS-P	+ 3.45
		01/90 RFO	ID (general)	55 % TW	4.90	HTS-P	+ 4.40
21	31	01/90 RFO	ID (general)	S/N	5.66	HTS-P	+15.15
21	34	01/90 E360	ID (general)	35 % TW	2.39	HTS-S	- 1.50
		01/90 RFO	ID (general)	S/N	7.66	HTS-P	+19.06
21	38	01/90 E360	ID (general)	14 % TW	3.08	20	- 4.50
		01/90 E360	ID (general)	62 % TW	0.57	HTS-S	- 2.60
		01/90 E360	ID (general)	44 % TW	4.02	HTS-S	- 3.70
		01/90 RFO	ID (general)	S/N	4.57	HTS-P	+17.07
		01/90 RFO	ID (general)	S/N	9.54	HTS-P	+17.50
21	41	01/90 RFO	ID (general)	S/N	7.48	HTS-P	+ 3.60
21	42	01/90 E360	ID (general)	41 % TW	3.26	HTS-S	- 0.90
		01/90 RFO	ID (general)	S/N	3.66	HTS-P	+17.98
21	61	01/90 E360	ID (general)	35 % TW	2.79	HTS-S	
21	66	01/90 E360	ID (general)	27 % TW	1.18	HTS-S	- 3.40
21	74	01/90 E360	ID (general)	41 % TW	3.63	HTS-S	+ 0.10
		01/90 RFO	ID (general)	S/N	13.82	HTS-P	+ 9.53
21	80	01/90 E360	ID (general)	56 % TW	5.97	HTS-S	+ 0.10
22	8	01/90 E360	ID (general)	27 % TW	1.80	HTS-S	- 2.30
		01/90 E360	ID (general)	29 % TW	1.98	HTS-S	- 3.60
		01/90 RFO	ID (general)	S/N	4.37	HTS-P	+14.80
		01/90 RFO	ID (general)	S/N	3.77	HTS-P	+17.00
		01/90 RFO	ID (general)	S/N	2.65	HTS-P	+18.70
22	18	01/90 RFO	ID (general)	S/N	6.97	HTS-P	+15.70
		01/90 RFO	ID (general)	80 % TW	8.74	HTS-P	+ 5.26
22	33	01/90 RFO	ID (general)	S/N	4.16	HTS-P	+10.90
22	47	01/90 E360	ID (general)	44 % TW	3.51	HTS-S	+ 0.20
		01/90 RFO	ID (general)	S/N	2.47	HTS-P	+15.60
		01/90 RFO	ID (general)	40 % TW	2.72	HTS-S	
22	52	01/90 E360	ID (general)	67 % TW	8.13	HTS-S	- 3.80
		01/90 RFO	ID (general)	S/N	4.48	HTS-P	+16.68
22	66	01/90 E360	ID (general)	22 % TW	0.77	HTS-S	
22	77	01/90 E360	ID (general)	52 % TW	5.33	HTS-S	- 1.30
22	93	01/90 E360	ID (general)	56 % TW	6.00	HTS-S	- 8.20
		01/90 RFO	ID (general)	S/N	7.03	HTS-P	+13.11
22	106	01/90 RFO	ID (general)	S/N	2.70	HTS-P	+14.40
23	19	01/90 RFO	ID (general)	S/N	2.12	HTS-P	+15.93
23	23	01/90 RFO	ID (general)	S/N	12.80	HTS-T	+ 8.60
		01/90 RFO	ID (general)	S/N	4.58	HTS-P	+ 9.03
		01/90 RFO	ID (general)	S/N	3.27	HTS-P	+10.60
		01/90 RFO	ID (general)	S/N	9.93	HTS-P	+10.98
		01/90 RFO	ID (general)	S/N	6.75	HTS-P	+12.90
		01/90 RFO	ID (general)	S/N	3.61	HTS-P	+13.94
		01/90 RFO	ID (general)	S/N	3.39	HTS-P	+14.91
23	26	01/90 RFO	ID (general)	S/N	3.07	HTS-P	+13.82
23	33	01/90 E360	ID (general)	27 % TW	1.43	HTS-S	- 1.60
23	41	01/90 RFO	ID (general)	S/N	3.46	HTS-P	+15.00
23	45	01/90 E360	ID (general)	29 % TW	1.83	HTS-S	- 3.70
		01/90 RFO	ID (general)	S/N	9.04	HTS-P	+ 9.83
		01/90 RFO	ID (general)	S/N	3.05	HTS-P	+14.50
		01/90 RFO	ID (general)	S/N	5.84	HTS-P	+16.50
23	68	01/90 E360	ID (general)	44 % TW	4.16	HTS-S	- 2.90
		01/90 RFO	ID (general)	S/N	6.30	HTS-P	+18.74
23	71	01/90 E360	ID (general)	27 % TW	1.58	HTS-S	+ 0.20
23	80	01/90 E360	ID (general)	48 % TW	4.74	HTS-S	
24	23	01/90 E360	ID (general)	24 % TW	1.04	HTS-S	- 1.50
24	25	01/90 RFO	ID (general)	S/N	4.47	HTS-P	+17.73
24	28	01/90 RFO	ID (general)	47 % TW	7.11	HTS-P	+ 9.30
24	39	01/90 E360	ID (general)	26 % TW	1.33	HTS-S	+ 0.10
		01/90 E360	ID (general)	44 % TW	4.02	HTS-S	- 1.60
		01/90 RFO	ID (general)	S/N	2.33	HTS-P	+18.87
		01/90 RFO	ID (general)	S/N	2.63	HTS-P	+ 8.86
24	44	01/90 E360	ID (general)	24 % TW	0.76	HTS-S	+ 0.20
24	55	01/90 E360	ID (general)	45 % TW	4.24	HTS-S	+ 0.20

Plant: McGUIRE UNIT 1  
Outages: 01/90 E360 01/90 RFO

Steam Generator: B

QUERY: ATTACHMENT 3 INDICATIONS OF IMPERFECTIONS

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
05	45	01/90 E360	ID (general)	21 % TW	0.61	HTS-S	+ 0.20
05	56	01/90 RFO	ID (general)	59 % TW	3.84	HTS-P	+19.93
05	66	01/90 E360	ID (general)	25 % TW	1.57	HTS-S	+ 0.10
05	88	01/90 E360	ID (general)	30 % TW	2.03	HTS-S	- 1.30
06	8	01/90 RFO	OD WEAR	19 % TW	0.59	AVB2	
06	17	01/90 E360	ID (general)	32 % TW	2.17	HTS-S	- 1.70
06	66	01/90 E360	ID (general)	29 % TW	1.16	HTS-S	+ 0.10
06	81	01/90 E360	ID (general)	56 % TW	3.98	HTS-S	- 2.90
26		01/90 RFO	ID (general)	S/N	5.02	HTS-P	+17.96
26	87	01/90 RFO	ID (general)	S/N	3.88	HTS-P	+11.14
27	8	01/90 E360	OD (general)	15 % TW	4.57	7	-12.60
27		01/90 RFO	OD (general)	19 % TW	0.62	7	- 9.66
27	16	01/90 RFO	ID (general)	S/N	8.39	HTS-P	+10.86
27	22	01/90 E360	ID (general)	60 % TW	7.92	HTS-S	+ 0.30
		01/90 E360	ID (general)	81 % TW	15.36	HTS-S	-14.00
		01/90 E360	ID (general)	47 % TW	5.84	HTS-S	- 0.10
		01/90 RFO	ID (general)	S/N	7.63	HTS-P	+ 6.08
27	43	01/90 E360	ID (general)	29 % TW	1.81	HTS-S	- 3.60
27	66	01/90 E360	ID (general)	51 % TW	3.40	HTS-S	- 4.00
27	71	01/90 E360	ID (general)	35 % TW	1.64	HTS-S	+ 0.20
27	75	01/90 E360	ID (general)	27 % TW	0.98	HTS-S	
27	106	01/90 RFO	ID (general)	65 % TW	10.15	HTS-P	+ 3.56
28	60	01/90 E360	OD (general)	10 % TW	2.66	9	+ 3.20
28	71	01/90 E360	ID (general)	61 % TW	4.64	HTS-S	- 3.30
		01/90 RFO	ID (general)	S/N	2.97	HTS-P	+17.93
28	82	01/90 E360	ID (general)	33 % TW	1.53	HTS-S	- 1.70
28	85	01/90 E360	ID (general)	61 % TW	4.78	HTS-S	- 2.50
		01/90 RFO	ID (general)	81 % TW	6.48	HTS-P	+11.30
		01/90 RFO	ID (general)	89 % TW	6.10	HTS-P	+18.04
		01/90 RFO	ID (general)	S/N	1.94	HTS-P	+10.30
28	103	01/90 E360	ID (general)	36 % TW	3.11	HTS-S	- 1.50
29	56	01/90 E360	ID (general)	17 % TW	1.24	HTS-S	+ 0.20
30	23	01/90 RFO	ID (general)	S/N	4.29	HTS-P	+19.86
30	56	01/90 RFO	ID (general)	S/N	7.39	HTS-P	+ 3.39
31	23	01/90 E360	ID (general)	36 % TW	2.31	HTS-S	+ 0.20
31	48	01/90 E360	ID (general)	40 % TW	2.87	HTS-S	- 3.00
		01/90 RFO	ID (general)	S/N	4.20	HTS-P	+17.94
31	54	01/90 E360	ID (general)	34 % TW	2.16	HTS-S	+ 0.10
		01/90 RFO	ID (general)	S/N	9.79	HTS-P	+11.48
31	59	01/90 RFO	ID (general)	S/N	2.85	HTS-P	+11.14
31	62	01/90 E360	ID (general)	28 % TW	2.12	HTS-S	+ 0.20
31	72	01/90 RFO	ID (general)	S/N	7.58	HTS-P	+12.16
32	42	01/90 E360	ID (general)	41 % TW	2.95	HTS-S	+ 0.20
32	45	01/90 E360	ID (general)	29 % TW	1.51	HTS-S	+ 0.20
32	58	01/90 RFO	ID (general)	S/N	0.15	HTS-P	+11.31
33	14	01/90 RFO	ID (general)	S/N	3.04	CTG-P	+ 4.59
33	19	01/90 E360	ID (general)	31 % TW	1.74	HTS-S	- 2.40
		01/90 E360	ID (general)	32 % TW	2.11	HTS-S	- 3.50
		01/90 E360	ID (general)	45 % TW	3.58	HTS-S	-19.60
		01/90 E360	ID (general)	47 % TW	3.91	HTS-S	- 9.20
		01/90 RFO	ID (general)	70 % TW	4.11	HTS-P	+18.15
		01/90 RFO	ID (general)	67 % TW	5.26	HTS-P	+17.19
		01/90 RFO	ID (general)	44 % TW	3.10	HTS-P	+16.23
		01/90 RFO	ID (general)	42 % TW	3.81	HTS-P	+15.18
		01/90 RFO	ID (general)	57 % TW	4.45	HTS-P	+13.31
		01/90 RFO	ID (general)	44 % TW	4.46	HTS-P	+12.35
		01/90 RFO	ID (general)	S/N	2.49	HTS-P	+11.42
33	66	01/90 RFO	ID (general)	70 % TW	10.68	HTS-P	+ 6.04
33	76	01/90 E360	ID (general)	67 % TW	10.90	HTS-S	- 2.30
		01/90 E360	ID (general)	70 % TW	6.04	HTS-S	- 2.30
		01/90 RFO	ID (general)	S/N	4.00	HTS-P	+19.00
33	100	01/90 RFO	OD WEAR	19 % TW	0.81	AVB2	
33	102	01/90 E360	OD (general)	14 % TW	5.30	3	-12.80
		01/90 RFO	OD (general)	19 % TW	1.18	2	+31.46
34	17	01/90 RFO	ID (general)	S/N	1.13	HTS-P	+20.20
34	18	01/90 E360	ID (general)	36 % TW	2.24	HTS-S	+ 0.20
34	30	01/90 RFO	OD WEAR	19 % TW	0.87	AVB2	



Plant: McGUIRE UNIT 1  
Outages: 01/90 E360 01/90 RFO

Steam Generator: B

QUERY: ATTACHMENT 3 INDICATIONS OF IMPERFECTIONS

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
34	53	01/90 E360	ID (general)	45 % TW	3.56	HTS-S	+ 0.10
34	86	01/90 RFO	OD (general)	S/N	0.64	AVB2	- 5.90
35	41	01/90 E360	ID (general)	35 % TW	2.12	HTS-S	+ 0.20
35	46	01/90 E360	ID (general)	45 % TW	3.68	HTS-S	+ 0.20
		01/90 RFO	ID (general)	40 % TW	9.00	HTS-S	
35	49	01/90 E360	ID (general)	28 % TW	1.43	HTS-S	+ 0.10
		01/90 RFO	ID (general)	40 % TW	12.16	HTS-S	
35	53	01/90 RFO	OD WEAR	19 % TW	1.53	AVB3	
35	78	01/90 RFO	OD WEAR	19 % TW	0.92	AVB3	
35	95	01/90 RFO	ID (general)	74 % TW	17.66	HTS-P	+ 3.40
35	99	01/90 RFO	ID (general)	57 % TW	17.35	HTS-P	+ 5.93
35	39	01/90 RFO	OD WEAR	S/N	0.64	AVB1	
35	45	01/90 E360	ID (general)	23 % TW	0.85	HTS-S	- 1.60
35	64	01/90 E360	ID (general)	37 % TW	4.18	HTS-S	- 3.30
35	69	01/90 RFO	OD WEAR	19 % TW	0.80	AVB3	
35	96	01/90 E360	ID (general)	23 % TW	1.41	HTS-S	- 0.90
35	25	01/90 E360	ID (general)	18 % TW	0.58	HTS-S	+ 0.20
35	43	01/90 E360	ID (general)	9 % TW	0.52	HTS-S	+ 0.10
35	54	01/90 RFO	OD WEAR	19 % TW	0.66	AVB1	
35	58	01/90 RFO	OD WEAR	22 % TW	1.42	AVB3	
35	28	01/90 E360	ID (general)	46 % TW	4.27	HTS-S	+ 0.20
		01/90 RFO	ID (general)	40 % TW	7.37	HTS-S	
35	64	01/90 E360	ID (general)	25 % TW	1.54	HTS-S	- 1.00
35	67	01/90 E360	ID (general)	35 % TW	3.70	HTS-S	- 2.40
35	76	01/90 RFO	OD WEAR	30 % TW	3.23	AVB2	
35	80	01/90 RFO	OD WEAR	20 % TW	1.28	AVB2	
		01/90 RFO	OD WEAR	22 % TW	1.42	AVB3	
35	82	01/90 RFO	ID (general)	92 % TW	2.11	HTS-P	+20.20
40	34	01/90 E360	ID (general)	18 % TW	1.02	HTS-S	+ 0.10
41	34	01/90 E360	ID (general)	22 % TW	1.32	HTS-S	+ 0.30
		01/90 E360	OD (general)	23 % TW	1.29	HTS-S	+ 1.70
41	39	01/90 E360	ID (general)	32 % TW	2.36	HTS-S	+ 0.20
41	41	01/90 E360	ID (general)	21 % TW	1.22	HTS-S	+ 0.20
41	42	01/90 E360	ID (general)	11 % TW	0.64	HTS-S	+ 0.30
41	44	01/90 RFO	OD WEAR	19 % TW	0.67	AVB2	
41	57	01/90 RFO	OD WEAR	20 % TW	1.51	AVB1	
41	58	01/90 RFO	OD WEAR	21 % TW	1.32	AVB1	
41	64	01/90 RFO	OD WEAR	21 % TW	1.34	AVB1	
		01/90 RFO	OD WEAR	19 % TW	0.55	AVB2	
		01/90 RFO	OD WEAR	19 % TW	0.48	AVB3	
41	65	01/90 RFO	OD WEAR	26 % TW	1.75	AVB2	
41	66	01/90 RFO	OD WEAR	19 % TW	0.93	AVB1	
41	70	01/90 RFO	OD WEAR	19 % TW	0.78	AVB1	
42	26	01/90 E360	ID (general)	43 % TW	4.42	HTS-S	+ 0.40
42	36	01/90 E360	ID (general)	24 % TW	1.57	HTS-S	- 1.00
		01/90 RFO	ID (general)	42 % TW	5.63	HTS-P	+19.96
42	59	01/90 RFO	OD WEAR	25 % TW	1.66	AVB1	
42	64	01/90 RFO	OD WEAR	19 % TW	1.12	AVB1	
42	73	01/90 RFO	OD WEAR	19 % TW	0.81	AVB2	
		01/90 RFO	OD WEAR	32 % TW	2.41	AVB3	
42	88	01/90 E360	ID (general)	61 % TW	10.20	HTS-S	- 1.00
		01/90 RFO	ID (general)	S/N	2.46	HTS-P	+19.69
43	22	01/90 RFO	OD WEAR	19 % TW	0.50	AVB1	
43	24	01/90 E360	OD (general)	24 % TW	8.89	6	+12.30
		01/90 RFO	OD (general)	19 % TW	0.76	6	+12.20
43	32	01/90 E360	ID (general)	20 % TW	1.17	HTS-S	+ 0.20
43	33	01/90 E360	ID (general)	48 % TW	5.45	HTS-S	+ 0.20
		01/90 RFO	ID (general)	40 % TW	9.00	HTS-S	
43	38	01/90 E360	ID (general)	25 % TW	1.67	HTS-S	+ 0.10
43	62	01/90 E360	OD WEAR	5 % TW	1.04	19	- 0.20
43	89	01/90 RFO	ID (general)	S/N	13.52	HTS-P	+17.08
44	23	01/90 E360	ID (general)	41 % TW	3.80	HTS-S	+ 0.20
		01/90 RFO	OD (general)	S/N	0.75	3	- 0.50
		01/90 RFO	OD (general)	S/N	0.75	3	- 0.50
44	25	01/90 E360	ID (general)	29 % TW	2.17	HTS-S	+ 0.20
44	30	01/90 E360	ID (general)	35 % TW	2.98	HTS-S	+ 0.20
44	82	01/90 RFO	ID (general)	80 % TW	22.15	HTS-P	+ 3.25

Plant: McGUIRE UNIT 1  
Outages: 01/90 E360 01/90 RFO

Steam Generator: B

QUERY: ATTACHMENT 3 INDICATIONS OF IMPERFECTIONS

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
45	50	01/90 E360	ID (general)	25 % TW	1.39	HTS-S	+ 0.10
46	29	01/90 RFO	ID (general)	S/N	5.97	HTS-P	+11.38
47	46	01/90 E360	OD (general)	26 % TW	0.92	9	+ 0.70
		01/90 E360	OD (general)	11 % TW	2.69	9	- 8.80
		01/90 E360	OD (general)	8 % TW	1.66	9	-11.20
		01/90 E360	OD (general)	7 % TW	1.41	9	-16.20
		01/90 E360	OD (general)	4 % TW	0.86	9	+ 1.30
		01/90 E360	OD (general)	23 % TW	0.68	9	+ 0.10
		01/90 E360	OD (general)	26 % TW	1.07	CTS-S	+ 0.30
48	59	01/90 E360	ID (general)	12 % TW	1.17	HTS-S	- 0.40
49	40	01/90 RFO	OD WEAR	19 % TW	1.27	17	
49	48	01/90 E360	ID (general)	24 % TW	1.23	HTS-S	
49	52	01/90 E360	OD WEAR	23 % TW	7.08	16	- 0.30
		01/90 E360	OD WEAR	6 % TW	1.21	17	+ 0.30
		01/90 E360	OD WEAR	22 % TW	6.92	19	- 0.80
		01/90 RFO	OD WEAR	18 % TW	1.29	19	
		01/90 RFO	OD WEAR	20 % TW	1.52	17	
		01/90 RFO	OD WEAR	34 % TW	3.05	16	
49	56	01/90 E360	OD WEAR	10 % TW	2.82	19	- 0.70
		01/90 RFO	OD (general)	S/N	0.59	19	- 0.27
49	62	01/90 E360	OD WEAR	9 % TW	2.14	18	+ 0.10
		01/90 RFO	OD (general)	S/N	0.57	18	

TOTAL TUBES FOUND = 246  
TOTAL INDICATIONS FOUND = 357



Plant: McGuire UNIT 1  
Outages: 01/90 E360 01/90 RFD

Steam Generator: B

QUERY: ATTACHMENT 4 TUBES PLUGGED OR REPAIRED

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
2	6	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
2	69	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
2	112	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
3	30	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
3	44	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
3	56	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
3	84	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
4	3	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
4	26	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
4	45	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
4	52	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
4	105	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
5	37	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
5	43	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
6	1	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
6	20	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
6	26	31/ RFD	SLEEVED	Design 2		HTS-P	+17.50
6	38	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
6	41	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
6	44	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
6	54	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
6	110	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
7	10	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
8	2	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
8	16	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
9	94	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
10	7	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
10	26	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
10	36	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
10	37	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
10	51	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
11	9	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
11	12	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
11	27	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
11	31	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
11	38	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
11	73	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
11	75	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
11	76	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
11	80	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
13	18	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
13	30	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
13	41	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
13	57	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
15	5	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	

Plant: McGUIRE UNIT 1  
Outages: 01/90 E360 01/90 RFD

Steam Generator: B

QUERY: ATTACHMENT 4 TUBES PLUGGED OR REPAIRED

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
15	59	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
17	35	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
17	55	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
17	64	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
18	28	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
18	46	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
18	47	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
18	60	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
18	72	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
19	29	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
19	49	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
19	51	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
19	66	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
19	81	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
20	15	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
20	36	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
20	101	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
21	14	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
21	15	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
21	20	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
21	27	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
21	28	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
21	29	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
21	34	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
21	38	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
21	61	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
21	66	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
21	74	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
21	80	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
22	8	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
22	47	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
22	66	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
22	77	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
23	33	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
23	71	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
23	80	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
24	23	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
24	39	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
24	44	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
24	55	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
25	45	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
		01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
25	56	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
25	66	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
25	80	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
26	17	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
26	66	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
26	81	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
27	22	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
27	71	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	

Plant: McGuire Unit 1

Steam Generator: B

Outages: 01/90 E360 01/90 RFD

QUERY: ATTACHMENT 4 TUBES PLUGGED OR REPAIRED

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
27	75	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
28	82	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
28	103	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
29	55	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
30	22	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
31	23	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
31	48	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
31	54	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
31	62	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
32	42	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
32	45	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
33	76	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
34	17	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
34	18	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
34	53	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
35	41	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
35	46	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
35	49	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
36	45	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
36	64	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
36	96	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
37	25	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
38	43	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
39	28	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
39	64	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
39	82	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
40	34	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
41	34	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
41	39	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
41	41	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
41	42	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
42	26	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
42	36	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
42	88	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
43	32	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
43	33	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
43	38	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
44	23	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
44	25	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
44	38	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
45	50	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
47	46	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
48	59	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50
49	48	01/90 RFD	SLEEVED	Design 2		HTS-P	+17.50

TOTAL TUBES FOUND = 138  
TOTAL INDICATIONS FOUND = 193

Plant: McGuire Unit 1  
Outages: 01/90 E360 01/90 RFD

Steam Generator: C

QUERY: ATTACHMENT 5 INDICATIONS OF IMPERFECTIONS

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
2	54	01/90 E360	ID (general)	27 % TW	1.84	HTS-S	- 0.20
2	90	01/90 E360	ID (general)	27 % TW	2.66	HTS-S	+ 0.10
2	183	01/90 E360	ID (general)	43 % TW	2.48	HTS-S	+ 0.20
		01/90 RFD	ID (general)	40 % TW	2.44	HTS-S	
2	106	01/90 E360	ID (general)	29 % TW	1.85	HTS-S	+ 0.20
3	60	01/90 E360	ID (general)	24 % TW	0.92	HTS-S	+ 0.20
3	79	01/90 E360	ID (general)	19 % TW	1.33	HTS-S	+ 0.20
3	98	01/90 E360	ID (general)	43 % TW	5.01	HTS-S	- 3.30
4	65	01/90 E360	ID (general)	25 % TW	0.98	HTS-S	
4	68	01/90 E360	ID (general)	24 % TW	0.92	HTS-S	+ 0.10
4	82	01/90 E360	ID (general)	30 % TW	3.02	HTS-S	- 0.10
4	95	01/90 E360	ID (general)	42 % TW	4.64	HTS-S	+ 0.10
4	102	01/90 E360	ID (general)	46 % TW	3.02	HTS-S	
5	66	01/90 E360	ID (general)	33 % TW	2.17	HTS-S	+ 0.20
		01/90 RFD	ID (general)	40 % TW	3.36	HTS-S	
5	67	01/90 E360	ID (general)	8 % TW	0.12	HTS-S	+ 0.10
5	79	01/90 E360	ID (general)	9 % TW	0.61	HTS-S	+ 0.20
5	81	01/90 E360	ID (general)	19 % TW	5.90	5	+17.00
		01/90 RFD	ID (general)	19 % TW	0.39	5	+16.49
5	97	01/90 E360	ID (general)	34 % TW	3.36	HTS-S	+ 0.10
5	100	01/90 E360	ID (general)	37 % TW	2.41	HTS-S	
		01/90 E360	ID (general)	37 % TW	1.79	HTS-S	+ 0.10
6	89	01/90 E360	ID (general)	18 % TW	1.35	HTS-C	- 0.10
6	107	01/90 E360	ID (general)	51 % TW	4.70	HTS-S	+ 0.10
7	12	01/90 E360	ID (general)	13 % TW	3.33	10	+25.00
		01/90 RFD	ID (general)	S/N	0.50	10	+21.09
7	20	01/90 E360	ID (general)	23 % TW	1.56	HTS-S	- 1.50
7	23	01/90 E360	ID (general)	24 % TW	1.70	HTS-S	- 1.50
7	79	01/90 E360	ID (general)	18 % TW	5.23	9	- 0.90
		01/90 RFD	ID (general)	S/N	0.43	9	- 1.00
7	90	01/90 E360	ID (general)	21 % TW	1.68	HTS-S	+ 0.10
7	92	01/90 E360	ID (general)	32 % TW	2.12	HTS-S	+ 0.10
10	22	01/90 E360	ID (general)	16 % TW	4.37	10	+23.90
11	65	01/90 E360	ID (general)	43 % TW	4.66	HTS-S	
12	76	01/90 E360	ID (general)	11 % TW	3.12	6	+12.00
13	10	01/90 E360	ID (general)	16 % TW	4.93	5	-15.90
13	21	01/90 RFD	ID (general)	S/N	1.84	HTS-P	+10.81
13	183	01/90 E360	ID (general)	28 % TW	2.15	HTS-S	+ 0.10
14	32	01/90 E360	ID (general)	23 % TW	1.00	HTS-S	+ 0.20
14	66	01/90 E360	ID (general)	58 % TW	7.45	HTS-S	- 3.70
14	97	01/90 E360	ID (general)	18 % TW	5.47	17	+14.40
		01/90 RFD	ID (general)	S/N	0.83	17	+13.85
14	98	01/90 RFD	ID (general)	64 % TW	4.32	HTS-P	+14.06
14	112	01/90 RFD	ID (general)	S/N	14.87	CTS-P	+ 1.63
15	80	01/90 E360	ID (general)	15 % TW	3.99	9	+19.50
		01/90 RFD	ID (general)	S/N	0.39	9	+18.72
15	93	01/90 E360	ID (general)	30 % TW	2.77	HTS-S	+ 0.10
15	94	01/90 E360	ID (general)	46 % TW	4.02	HTS-S	+ 0.30
15	105	01/90 RFD	ID (general)	40 % TW	6.74	HTS-P	+ 9.39
15	112	01/90 RFD	ID (general)	S/N	16.37	CTS-P	+ 1.40
15	33	01/90 RFD	ID (general)	S/N	0.35	10	+20.96
16	47	01/90 E360	ID (general)	29 % TW	1.94	HTS-S	- 2.50
16	52	01/90 E360	ID (general)	40 % TW	3.71	HTS-S	- 0.20
		01/90 RFD	ID (general)	40 % TW	1.95	HTS-S	
16	53	01/90 E360	ID (general)	55 % TW	4.99	14	+ 9.40
		01/90 E360	ID (general)	63 % TW	A.58	HTS-S	+ 0.10
		01/90 RFD	ID (general)	40 % TW	1.91	HTS-S	
		01/90 RFD	ID (general)	19 % TW	2.76	14	+ 9.36
16	74	01/90 E360	ID (general)	62 % TW	6.79	HTS-S	+ 0.30
		01/90 RFD	ID (general)	40 % TW	5.52	HTS-S	
16	82	01/90 E360	ID (general)	33 % TW	2.31	HTS-S	- 0.10
16	102	01/90 E360	ID (general)	S/N	5.12	4	+19.00
17	8	01/90 RFD	ID (general)	S/N	0.35	10	+ 9.44
17	44	01/90 E360	ID (general)	38 % TW	3.31	HTS-S	- 0.20
17	66	01/90 E360	ID (general)	55 % TW	5.55	HTS-S	- 1.50
		01/90 RFD	ID (general)	S/N	5.16	HTS-P	+ 8.36
17	76	01/90 E360	ID (general)	40 % TW	2.91	HTS-S	- 0.20



Plant: McGuire UNIT 1  
Outages: 01/90 E360 01/90 RFD

Steam Generator: C

QUERY: ATTACHMENT 5 INDICATIONS OF IMPERFECTIONS

ROW	CUL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
17	7A	01/90 E360	ID (general)	20 % TW	1.26	HTS-S	- 5.00
17	90	01/90 E360	OD (general)	S/N	2.95	HTS-S	+ 1.40
17	106	01/90 E360	ID (general)	27 % TW	1.51	HTS-S	+ 0.20
18	59	01/90 E360	ID (general)	63 % TW	7.12	HTS-S	+ 0.30
18	70	01/90 E360	ID (general)	23 % TW	1.54	HTS-S	+ 0.10
		01/90 RFD	ID (general)	42 % TW	7.24	HTS-P	+ 0.46
18	77	01/90 E360	OD (general)	16 % TW	4.50	10	+17.50
		01/90 RFD	OD (general)	S/N	0.66	10	+16.72
18	82	01/90 E360	ID (general)	42 % TW	3.26	HTS-S	- 0.10
18	88	01/90 E360	OD (general)	16 % TW	4.40	17	+15.90
		01/90 RFD	OD (general)	S/N	0.42	17	+15.42
19	90	01/90 E360	ID (general)	45 % TW	3.79	HTS-S	- 3.20
19	91	01/90 E360	ID (general)	25 % TW	7.01	10	- 5.90
		01/90 RFD	OD (general)	19 % TW	0.90	11	+40.29
19	99	01/90 E360	OD (general)	12 % TW	2.97	HTS-S	+ 9.00
		01/90 RFD	OD (general)	S/N	0.72	HTS-S	+ 8.38
20	50	01/90 E360	OD (general)	11 % TW	2.96	3	+11.00
20	6A	01/90 E360	ID (general)	16 % TW	1.03	HTS-S	+ 0.20
20	70	01/90 E360	ID (general)	29 % TW	2.00	HTS-S	+ 0.20
20	73	01/90 E360	ID (general)	29 % TW	2.01	HTS-S	+ 0.10
20	76	01/90 E360	ID (general)	31 % TW	2.14	HTS-S	+ 0.10
20	78	01/90 E360	ID (general)	30 % TW	2.73	HTS-S	+ 0.10
20	79	01/90 E360	ID (general)	47 % TW	4.09	HTS-S	+ 0.10
20	91	01/90 E360	ID (general)	29 % TW	2.02	HTS-S	+ 0.20
21	51	01/90 E360	ID (general)	30 % TW	2.66	HTS-S	+ 0.40
21	53	01/90 E360	ID (general)	14 % TW	0.34	HTS-S	- 0.40
21	67	01/90 E360	OC (general)	12 % TW	3.34	3	+ 5.00
		01/90 RFD	OD (general)	S/N	0.60	3	+ 6.21
21	76	01/90 E360	ID (general)	23 % TW	1.27	HTS-S	+ 0.10
		01/90 RFD	ID (general)	40 % TW	0.65	HTS-S	
22	30	01/90 RFD	ID (general)	S/N	3.53	CTS-P	+15.60
22	70	01/90 E360	ID (general)	31 % TW	1.07	HTS-S	+ 0.20
22	77	01/90 E360	ID (general)	35 % TW	2.20	HTS-S	+ 0.10
22	81	01/90 E360	ID (general)	40 % TW	2.63	HTS-S	+ 0.10
22	82	01/90 E360	ID (general)	21 % TW	1.09	HTS-S	+ 0.10
		01/90 RFD	ID (general)	40 % TW	0.72	HTS-S	
22	105	01/90 E360	OD (general)	16 % TW	4.43	17	+ 3.20
		01/90 E360	OD (general)	13 % TW	3.60	CTS-S	+21.30
		01/90 E360	OD (general)	15 % TW	4.21	CTS-S	+19.20
		01/90 RFD	OD (general)	S/N	0.92	17	+ 1.01
23	9	01/90 E360	OD (general)	17 % TW	5.33	1	- 0.90
24	16	01/90 RFD	OD WEAR	19 % TW	0.43	AVB2	
24	59	01/90 E360	ID (general)	54 % TW	5.24	HTS-S	+ 0.10
24	69	01/90 E360	ID (general)	46 % TW	3.69	HTS-S	+ 0.10
		01/90 RFD	ID (general)	40 % TW	1.72	HTS-S	
24	71	01/90 E360	ID (general)	56 % TW	5.59	HTS-S	+ 0.10
		01/90 RFD	ID (general)	40 % TW	2.60	HTS-S	
24	72	01/90 E360	ID (general)	23 % TW	1.36	HTS-S	+ 0.20
24	75	01/90 E360	ID (general)	47 % TW	4.62	HTS-S	+ 0.10
		01/90 RFD	ID (general)	40 % TW	3.87	HTS-S	
25	7	01/90 RFD	ID (general)	S/N	2.72	HTS-P	+10.00
25	49	01/90 E360	ID (general)	37 % TW	2.90	HTS-S	+ 0.20
25	55	01/90 RFD	ID (general)	S/N	2.29	HTS-P	+14.90
25	56	01/90 RFD	ID (general)	S/N	3.78	CTS-P	+12.00
25	60	01/90 E360	ID (general)	26 % TW	1.73	HTS-S	+ 0.20
25	70	01/90 E360	ID (general)	30 % TW	3.26	HTS-S	+ 0.10
		01/90 RFD	ID (general)	40 % TW	2.20	HTS-S	
25	78	01/90 E360	ID (general)	30 % TW	2.19	HTS-S	+ 0.20
26	50	01/90 E360	ID (general)	33 % TW	2.50	HTS-S	+ 0.10
26	74	01/90 RFD	OD (general)	S/N	0.41	2	+25.70
27	31	01/90 RFD	OD WEAR	19 % TW	0.83	AVB3	
27	50	01/90 RFD	OD (general)	S/N	0.59	11	- 6.92
27	64	01/90 E360	ID (general)	40 % TW	6.12	HTS-S	+ 0.30
		01/90 E360	ID (general)	29 % TW	2.47	HTS-S	- 1.50
		01/90 RFD	ID (general)	40 % TW	2.46	HTS-S	
27	78	01/90 E360	ID (general)	26 % TW	1.93	HTS-S	- 4.10
25	37	01/90 RFD	OD WEAR	19 % TW	0.76	AVB4	

Plant: McGuire UNIT 1  
Outages: 01/90 E360 01/90 RFD

Steam Generator: C

QUERY: ATTACHMENT 5 INDICATIONS OF IMPERFECTIONS

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
28	57	01/90 E360	OD (general)	17 % TW	5.89	9	+26.00
		01/90 RFD	OD (general)	S/N	0.37	9	+23.26
28	101	01/90 E360	ID (general)	25 % TW	1.75	HTS-S	+ 1.20
28	102	01/90 E360	ID (general)	19 % TW	1.17	HTS-S	+ 0.20
28	106	01/90 E360	ID (general)	42 % TW	1.93	HTS-S	+ 0.10
29	44	01/90 E360	ID (general)	29 % TW	1.90	HTS-S	+ 0.30
29	64	01/90 E360	ID (general)	32 % TW	2.99	HTS-S	+ 0.20
29	68	01/90 E360	ID (general)	37 % TW	3.88	HTS-S	- 0.40
30	103	01/90 E360	ID (general)	28 % TW	0.78	HTS-S	+ 0.20
30	105	01/90 RFD	OD WEAR	19 % TW	1.76	AVB2	
31	12	01/90 E360	OD (general)	S/N	2.40	HTS-S	+ 0.40
31	89	01/90 E360	ID (general)	40 % TW	2.73	HTS-S	
32	59	01/90 E360	ID (general)	21 % TW	1.07	HTS-S	- 0.10
		01/90 RFD	ID (general)	40 % TW	13.45	HTS-S	
33	22	01/90 E360	ID (general)	46 % TW	5.28	HTS-S	- 2.70
33	33	01/90 RFD	OD WEAR	19 % TW	1.20	AVB3	
33	46	01/90 RFD	OD WEAR	19 % TW	0.71	AVB2	
33	89	01/90 RFD	OD (general)	S/N	0.50	3	-23.91
33	102	01/90 RFD	OD WEAR	19 % TW	0.65	AVB2	
34	18	01/90 E360	ID (general)	29 % TW	1.96	HTS-S	- 0.30
		01/90 E360	ID (general)	27 % TW	1.78	HTS-S	- 2.00
		01/90 E360	ID (general)	27 % TW	1.63	HTS-S	- 3.00
34	80	01/90 E360	ID (general)	26 % TW	2.54	HTS-S	+ 0.10
35	19	01/90 RFD	OD WEAR	19 % TW	0.70	AVB2	
35	46	01/90 RFD	OD WEAR	19 % TW	1.11	AVB1	
35	48	01/90 RFD	OD WEAR	19 % TW	0.83	AVB1	
35	101	01/90 E360	ID (general)	14 % TW	0.87	HTS-S	+ 0.40
36	45	01/90 RFD	ID (general)	S/N	4.00	HTS-P	+12.96
36	69	01/90 E360	ID (general)	22 % TW	1.01	HTS-S	+ 0.10
36	97	01/90 E360	ID (general)	22 % TW	1.01	HTS-S	+ 0.10
38	31	01/90 RFD	OD WEAR	19 % TW	1.69	AVB3	
		01/90 RFD	OD WEAR	19 % TW	0.76	AVB4	
38	39	01/90 RFD	OD WEAR	35 % TW	3.93	AVB3	
38	40	01/90 RFD	OD WEAR	23 % TW	1.46	AVB2	
		01/90 RFD	OD WEAR	30 % TW	2.19	AVB3	
38	40	01/90 RFD	OD WEAR	19 % TW	0.90	AVB1	
38	52	01/90 RFD	OD WEAR	19 % TW	0.84	AVB1	
38	74	01/90 E360	ID (general)	14 % TW	0.81	HTS-S	+ 0.10
38	89	01/90 E360	ID (general)	46 % TW	2.83	HTS-S	
39	29	01/90 RFD	OD WEAR	19 % TW	1.05	AVB2	
39	30	01/90 RFD	OD WEAR	19 % TW	0.71	AVB2	
		01/90 RFD	OD WEAR	19 % TW	0.76	AVB3	
39	35	01/90 RFD	OD WEAR	32 % TW	2.34	AVB2	
		01/90 RFD	OD WEAR	19 % TW	1.75	AVB3	
		01/90 RFD	OD WEAR	19 % TW	0.92	AVB1	
39	44	01/90 RFD	OD WEAR	39 % TW	3.28	AVB2	
		01/90 RFD	OD WEAR	19 % TW	1.04	AVB3	
39	50	01/90 RFD	OD WEAR	19 % TW	0.51	AVB1	
39	52	01/90 RFD	OD WEAR	19 % TW	0.59	AVB1	
39	89	01/90 E360	ID (general)	42 % TW	3.42	HTS-S	+ 0.10
39	96	01/90 E360	ID (general)	60 % TW	9.86	HTS-S	+ 0.10
40	39	01/90 RFD	OD WEAR	19 % TW	0.76	AVB2	
40	41	01/90 RFD	OD WEAR	25 % TW	1.61	AVB2	
40	42	01/90 RFD	OD WEAR	19 % TW	1.00	AVB2	
		01/90 RFD	OD WEAR	19 % TW	0.82	AVB3	
40	43	01/90 RFD	OD WEAR	19 % TW	1.35	AVB2	
		01/90 RFD	OD WEAR	19 % TW	0.65	AVB3	
		01/90 RFD	OD WEAR	19 % TW	0.63	AVB4	
40	46	01/90 RFD	OD WEAR	19 % TW	0.55	AVB1	
40	47	01/90 RFD	OD WEAR	19 % TW	0.85	AVB1	
40	48	01/90 RFD	OD WEAR	19 % TW	1.02	AVB1	
40	61	01/90 RFD	OD WEAR	19 % TW	0.45	AVB2	
41	24	01/90 RFD	OD WEAR	19 % TW	0.89	AVB2	
41	37	01/90 RFD	ID (general)	S/N	1.39	HTS-P	+19.00
41	39	01/90 RFD	OD WEAR	19 % TW	0.64	AVB2	
41	55	01/90 RFD	OD WEAR	19 % TW	0.79	AVB2	
41	90	01/90 E360	ID (general)	30 % TW	1.79	HTS-S	

Plant: McGuire UNIT 1  
Outages: 01/90 E360 01/90 RFD

Steam Generator: C

QUERY: ATTACHMENT 5 INDICATIONS OF IMPERFECTIONS

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
43	22	01/90 RFD	OD WEAR	19 % TW	0.45	AVB3	
43	33	01/90 RFD	OD WEAR	19 % TW	0.79	AVB1	
		01/90 RFD	OD WEAR	12 % TW	0.77	AVB3	
		01/90 RFD	OD WEAR	9 % TW	0.52	AVB2	
43	47	01/90 RFD	OD WEAR	15 % TW	1.00	AVB1	
43	50	01/90 RFD	OD WEAR	12 % TW	0.72	AVB1	
43	53	01/90 RFD	OD WEAR	11 % TW	0.68	AVB1	
43	54	01/90 RFD	OD WEAR	11 % TW	0.71	AVB1	
43	55	01/90 RFD	OD WEAR	12 % TW	0.77	AVB1	
43	56	01/90 RFD	OD WEAR	16 % TW	1.05	AVB1	
43	61	01/90 RFD	OD WEAR	19 % TW	0.88	AVB1	
45	56	01/90 RFD	OD WEAR	19 % TW	0.93	AVB1	
46	44	01/90 E360	ID (general)	26 % TW	1.69	HTS-S	- 0.30
46	62	01/90 E360	ID (general)	37 % TW	2.12	HTS-S	
46	89	01/90 E360	ID (general)	31 % TW	1.54	HTS-S	
49	31	01/90 RFD	OD WEAR	19 % TW	0.31	16	
49	39	01/90 RFD	OD WEAR	19 % TW	0.95	16	
49	41	01/90 RFD	OD WEAR	19 % TW	0.43	14	
		01/90 RFD	OD WEAR	34 % TW	2.65	16	
		01/90 RFD	OD WEAR	26 % TW	1.75	17	
49	56	01/90 E360	OD (general)	38 % TW	2.82	HTS-S	+ 1.10
		01/90 E360	OD (general)	56 % TW	6.44	HTS-S	+ 0.40
		01/90 E360	OD (general)	56 % TW	4.95	HTS-S	+ 0.20
		01/90 E360	OD (general)	41 % TW	1.85	HTS-S	+ 1.00
		01/90 RFD	OD (general)	S/N	0.42	HTS-S	+ 0.69
49	71	01/90 RFD	OD WEAR	19 % TW	1.20	16	
49	74	01/90 E360	OD WEAR	25 % TW	7.90	16	+ 0.20
		01/90 RFD	OD WEAR	48 % TW	3.77	16	
		01/90 RFD	OD WEAR	19 % TW	1.26	14	
49	75	01/90 E360	OD WEAR	32 % TW	13.28	16	+ 0.10
		01/90 RFD	OD WEAR	51 % TW	4.33	16	
49	76	01/90 RFD	OD (general)	S/N	1.17	2	
49	79	01/90 RFD	OD WEAR	33 % TW	2.08	16	

TOTAL TUBES FOUND = 179  
TOTAL INDICATIONS FOUND = 234



Plant: McGuire UNIT 1

Steam Generator: C

Outages: 01/90 E360 01/90 RFD

QUERY: ATTACHMENT 6 TUBES PLUGGED OR REPAIRED

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
2	54	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
2	90	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
2	103	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
2	106	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
3	60	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
3	79	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
3	98	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
4	65	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
4	68	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
4	82	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
4	95	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
4	102	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
5	66	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
5	67	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
5	79	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
5	97	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
5	100	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
6	89	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
6	107	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
7	20	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
7	23	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
7	79	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
7	90	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
7	92	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
11	65	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
13	103	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
14	32	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
14	66	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
15	93	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
15	94	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
16	52	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
16	53	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
16	74	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
16	82	01/90 RFD	PLUGGED	MECH		CTS-P	

Plant: MCGUIRE UNIT 1  
Outages: 01/90 E360 01/90 RFD

Steam Generator: C

QUERY: ATTACHMENT 6 TUBES PLUGGED OR REPAIRED

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
17	44	01/90 RFD	PLUGGED	MECH		HTS-P	
		01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
17	66	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
17	76	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
17	98	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
17	106	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
18	59	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
18	70	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
18	82	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
19	99	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
20	68	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
20	70	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
20	73	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
20	76	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
20	78	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
20	79	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
20	91	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
21	51	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
21	53	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
21	76	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
22	70	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
22	77	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
22	81	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
22	82	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
24	59	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
24	69	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
24	71	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
24	72	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
24	75	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
25	49	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
25	56	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
25	60	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
25	70	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
25	78	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	

Plant: McGuire Unit 1  
Outages: 01/90 E360 01/90 RFD

Steam Generator: C

QUERY: ATTACHMENT 6 TUBES PLUGGED OR REPAIRED

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
26	50	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
27	64	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
28	101	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
28	102	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
28	106	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
29	44	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
29	64	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
29	68	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
30	103	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
31	12	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
31	89	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
32	59	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
33	22	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
34	18	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
34	80	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
35	101	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
36	45	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
36	69	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
36	97	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
38	74	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
38	89	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
39	89	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
39	96	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
41	37	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
41	90	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
46	44	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
46	62	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
46	89	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
49	56	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	

TOTAL TUBES FOUND = 96  
TOTAL INDICATIONS FOUND = 192



Plant: McGuire Unit 1  
Outages: 01/90 E360 01/90 RFO

Steam Generator: D

## QUERY: ATTACHMENT 7 INDICATIONS OF IMPERFECTIONS

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
2	38	01/90 E360	ID (general)	20 % TW	1.17	HTS-S	- 2.70
2	61	01/90 RFO	ID (general)	S/N	3.81	HTS-P	+ 8.30
2	71	01/90 E360	ID (general)	50 % TW	4.72	HTS-S	- 3.00
2	74	01/90 E360	ID (general)	20 % TW	1.50	HTS-S	- 4.00
		01/90 RFO	ID (general)	S/N	3.16	HTS-P	+11.35
2	87	01/90 RFO	ID (general)	S/N	1.76	HTS-P	+16.25
2	89	01/90 E360	ID (general)	38 % TW	2.48	HTS-S	- 2.90
2	90	01/90 E360	OD (general)	10 % TW	2.15	20	+ 2.90
		01/90 E360	OD (general)	12 % TW	3.17	20	+ 1.20
		01/90 E360	OD (general)	9 % TW	1.86	20	- 0.30
		01/90 E360	OD (general)	11 % TW	2.60	20	- 1.10
		01/90 E360	OD (general)	12 % TW	3.00	20	- 1.70
		01/90 E360	OD (general)	11 % TW	2.69	20	- 5.70
		01/90 E360	OD (general)	9 % TW	1.75	20	- 9.50
		01/90 E360	OD (general)	10 % TW	1.95	20	- 9.80
		01/90 E360	OD (general)	9 % TW	1.21	20	-10.20
		01/90 E360	OD (general)	9 % TW	1.32	20	-10.60
		01/90 E360	OD (general)	12 % TW	3.02	20	-11.40
		01/90 E360	OD (general)	11 % TW	2.76	20	-12.00
		01/90 E360	OD (general)	12 % TW	3.00	20	-20.30
		01/90 E360	OD (general)	13 % TW	3.65	20	-29.70
		01/90 E360	OD (general)	11 % TW	2.55	20	-30.60
2	103	01/90 E360	ID (general)	34 % TW	1.71	HTS-S	- 1.00
2	3	01/90 E360	ID (general)	38 % TW	2.76	HTS-S	- 4.00
		01/90 RFO	ID (general)	S/N	1.33	HTS-P	+16.49
3	27	01/90 E360	ID (general)	44 % TW	3.75	HTS-S	- 3.00
		01/90 RFO	ID (general)	S/N	1.20	HTS-P	+17.33
3	35	01/90 E360	ID (general)	10 % TW	0.57	HTS-S	+ 0.20
3	39	01/90 E360	ID (general)	48 % TW	4.19	HTS-S	- 3.10
		01/90 RFO	ID (general)	S/N	1.75	HTS-P	+17.62
		01/90 RFO	ID (general)	S/N	3.21	HTS-P	+ 8.46
3	42	01/90 E360	ID (general)	31 % TW	2.07	HTS-S	- 4.50
3	46	01/90 RFO	ID (general)	S/N	1.79	HTS-P	+16.40
3	56	01/90 RFO	ID (general)	S/N	2.27	HTS-P	+11.51
3	68	01/90 RFO	ID (general)	S/N	1.16	HTS-P	+15.51
		01/90 RFO	ID (general)	S/N	0.94	HTS-P	+17.47
3	76	01/90 E360	ID (general)	44 % TW	3.53	HTS-S	- 2.00
		01/90 E360	ID (general)	34 % TW	3.11	HTS-S	- 3.00
3	80	01/90 E360	ID (general)	47 % TW	4.04	HTS-S	- 3.90
4	17	01/90 E360	ID (general)	24 % TW	1.52	HTS-S	+ 0.10
		01/90 RFO	ID (general)	40 % TW	1.84	HTS-S	+ 0.20
4	27	01/90 E360	ID (general)	18 % TW	1.05	HTS-S	+ 0.30
4	28	01/90 E360	ID (general)	36 % TW	2.84	HTS-S	- 3.90
4	30	01/90 E360	ID (general)	52 % TW	4.68	HTS-S	+16.31
		01/90 RFO	ID (general)	S/N	1.50	HTS-P	- 0.40
4	31	01/90 E360	ID (general)	21 % TW	1.22	HTS-S	+ 0.20
4	32	01/90 E360	ID (general)	23 % TW	1.42	HTS-S	- 3.70
4	36	01/90 E360	ID (general)	20 % TW	1.17	HTS-S	+10.70
4	55	01/90 E360	OD (general)	10 % TW	1.70	5	- 0.10
		01/90 E360	OD (general)	9 % TW	1.45	5	- 0.10
4	62	01/90 E360	ID (general)	30 % TW	1.98	HTS-S	- 3.00
		01/90 E360	ID (general)	35 % TW	2.23	HTS-S	- 0.10
4	63	01/90 E360	ID (general)	30 % TW	1.81	HTS-S	- 1.60
4	64	01/90 E360	ID (general)	27 % TW	1.14	HTS-S	- 0.70
		01/90 E360	ID (general)	23 % TW	1.19	HTS-S	- 2.90
		01/90 E360	ID (general)	59 % TW	6.55	HTS-S	+18.00
		01/90 RFO	ID (general)	S/N	5.11	HTS-P	+10.20
4	84	01/90 RFO	ID (general)	S/N	2.75	HTS-P	- 0.10
5	13	01/90 E360	ID (general)	25 % TW	1.02	HTS-S	- 2.20
		01/90 E360	ID (general)	24 % TW	1.64	HTS-S	+ 0.20
5	19	01/90 E360	ID (general)	9 % TW	0.52	HTS-S	+ 0.20
5	25	01/90 E360	ID (general)	14 % TW	0.81	HTS-S	+14.10
5	31	01/90 RFO	ID (general)	S/N	2.30	HTS-P	+10.70
5	68	01/90 RFO	ID (general)	57 % TW	3.67	HTS-P	+ 0.20
6	3	01/90 E360	ID (general)	22 % TW	1.47	HTS-S	- 2.60
6	5	01/90 E360	ID (general)	53 % TW	4.69	HTS-S	- 5.00
		01/90 E360	ID (general)	42 % TW	3.26	HTS-S	

Plant: McGuire UNIT 1  
Outages: 01/90 E360 01/90 RFD

Steam Generator: D

QUERY: ATTACHMENT 7 INDICATIONS OF IMPERFECTIONS

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
		01/90 RFD	ID (general)	64 % TW	4.20	HTS-P	+18.57
6	30	01/90 E360	ID (general)	38 % TW	3.75	HTS-S	- 0.40
6	33	01/90 E360	ID (general)	22 % TW	1.33	HTS-S	- 3.90
6	35	01/90 RFD	ID (general)	S/N	4.26	HTS-P	+ 8.40
6	37	01/90 E360	ID (general)	32 % TW	2.40	HTS-S	- 3.00
		01/90 RFD	ID (general)	59 % TW	11.88	HTS-P	+ 9.23
6	62	01/90 E360	ID (general)	31 % TW	1.86	HTS-S	- 0.50
6	65	01/90 E360	ID (general)	20 % TW	1.01	HTS-S	+ 0.10
6	67	01/90 E360	ID (general)	40 % TW	4.21	HTS-S	- 2.80
		01/90 RFD	ID (general)	S/N	1.90	HTS-P	+18.00
6	68	01/90 RFD	ID (general)	S/N	1.86	HTS-P	+17.53
6	71	01/90 RFD	ID (general)	S/N	1.67	HTS-P	+16.21
6	79	01/90 E360	ID (general)	42 % TW	3.16	HTS-S	- 0.80
7	9	01/90 E360	ID (general)	63 % TW	6.20	HTS-S	- 2.60
7	11	01/90 E360	ID (general)	53 % TW	4.67	HTS-S	- 2.50
7	15	01/90 E360	ID (general)	16 % TW	1.06	HTS-S	+ 0.10
		01/90 E360	ID (general)	30 % TW	2.77	HTS-S	+ 0.10
7	34	01/90 E360	ID (general)	23 % TW	1.40	HTS-S	- 2.20
7	39	01/90 E360	ID (general)	30 % TW	3.94	HTS-S	+ 0.20
		01/90 RFD	ID (general)	40 % TW	5.10	HTS-S	
7	57	01/90 E360	ID (general)	57 % TW	2.90	HTS-S	- 1.70
7	61	01/90 RFD	ID (general)	S/N	3.57	HTS-P	+ 3.52
7	62	01/90 E360	ID (general)	44 % TW	3.50	HTS-S	- 1.00
		01/90 RFD	ID (general)	S/N	3.22	HTS-P	+14.93
		01/90 RFD	ID (general)	S/N	1.06	HTS-P	+19.37
7	70	01/90 E360	ID (general)	42 % TW	3.05	HTS-S	- 1.40
7	79	01/90 E360	ID (general)	35 % TW	2.20	HTS-S	- 3.10
7	101	01/90 E360	ID (general)	24 % TW	1.37	HTS-S	- 2.00
8	9	01/90 E360	ID (general)	24 % TW	1.62	HTS-S	+ 0.20
8	23	01/90 RFD	ID (general)	67 % TW	18.00	HTS-P	+ 2.71
8	28	01/90 E360	ID (general)	28 % TW	2.45	HTS-S	- 1.10
8	42	01/90 E360	ID (general)	14 % TW	0.96	HTS-S	- 1.10
8	62	01/90 E360	ID (general)	31 % TW	1.90	HTS-S	- 1.00
		01/90 E360	ID (general)	62 % TW	7.19	HTS-S	- 4.20
		01/90 RFD	ID (general)	S/N	1.02	HTS-P	+ 7.76
		01/90 RFD	ID (general)	S/N	1.20	HTS-P	+11.74
		01/90 RFD	ID (general)	S/N	1.40	HTS-P	+12.70
8	63	01/90 RFD	ID (general)	S/N	1.62	HTS-P	+10.67
		01/90 RFD	ID (general)	S/N	2.65	HTS-P	+15.91
8	74	01/90 RFD	ID (general)	85 % TW	6.94	HTS-P	+ 5.96
8	76	01/90 RFD	ID (general)	99 % TW	11.35	HTS-P	+ 9.96
8	77	01/90 E360	ID (general)	31 % TW	2.24	HTS-S	- 1.20
		01/90 E360	ID (general)	31 % TW	2.21	HTS-S	- 3.30
8	82	01/90 E360	ID (general)	25 % TW	1.81	HTS-S	+ 0.20
		01/90 E360	ID (general)	52 % TW	4.16	HTS-S	- 1.60
8	102	01/90 E360	ID (general)	43 % TW	2.71	HTS-S	- 3.80
		01/90 RFD	ID (general)	S/N	1.22	HTS-P	+16.45
9	2	01/90 E360	ID (general)	13 % TW	0.85	HTS-S	+ 0.10
9	5	01/90 RFD	ID (general)	S/N	1.55	HTS-P	+14.52
9	13	01/90 E360	ID (general)	17 % TW	1.14	HTS-S	
		01/90 RFD	ID (general)	62 % TW	17.31	HTS-P	+ 8.51
9	35	01/90 E360	ID (general)	44 % TW	3.45	HTS-S	- 2.90
		01/90 E360	ID (general)	39 % TW	2.83	HTS-S	- 4.00
		01/90 RFD	ID (general)	S/N	2.40	HTS-P	+16.97
		01/90 RFD	ID (general)	S/N	2.83	HTS-P	+18.01
9	37	01/90 E360	ID (general)	20 % TW	1.35	HTS-S	- 0.90
9	57	01/90 E360	ID (general)	23 % TW	0.87	HTS-S	- 1.10
9	69	01/90 E360	ID (general)	31 % TW	2.21	HTS-S	- 2.40
9	75	01/90 E360	ID (general)	31 % TW	2.20	HTS-S	- 1.10
		01/90 E360	ID (general)	33 % TW	2.33	HTS-S	- 3.30
		01/90 RFD	ID (general)	S/N	4.17	HTS-P	+13.09
9	79	01/90 E360	ID (general)	21 % TW	1.52	HTS-S	- 1.30
		01/90 E360	ID (general)	25 % TW	1.75	HTS-S	- 3.30
9	80	01/90 E360	ID (general)	15 % TW	1.04	HTS-S	- 0.20
		01/90 RFD	ID (general)	S/N	0.50	HTS-P	+ 8.46
9	83	01/90 E360	ID (general)	20 % TW	1.43	HTS-S	+ 0.10
		01/90 RFD	ID (general)	67 % TW	9.06	HTS-P	+14.00

Plant: McGuire UNIT 1  
Outages: 01/90 E360 01/90 RFD

Steam Generator: D

QUERY: ATTACHMENT 7 INDICATIONS OF IMPERFECTIONS

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
		01/90 RFD	ID (general)	S/N	2.53	HTS-P	+ 6.93
9	05	01/90 RFD	ID (general)	S/N	5.39	HTS-P	+10.19
10	12	01/90 E360	ID (general)	21 % TW	1.38	HTS-S	- 4.40
		01/90 E360	ID (general)	22 % TW	1.46	HTS-S	- 6.00
10	17	01/90 E360	ID (general)	30 % TW	2.07	HTS-S	- 2.70
10	20	01/90 E360	ID (general)	12 % TW	0.81	HTS-S	- 2.20
10	29	01/90 E360	ID (general)	12 % TW	2.60	HTS-S	- 1.20
		01/90 E360	ID (general)	12 % TW	2.30	HTS-S	- 5.90
10	31	01/90 E360	ID (general)	11 % TW	0.72	HTS-S	- 4.50
10	32	01/90 E360	ID (general)	62 % TW	6.00	HTS-S	- 2.10
		01/90 RFD	ID (general)	S/N	2.14	HTS-P	+10.77
10	40	01/90 E360	ID (general)	41 % TW	3.10	HTS-S	
		01/90 RFD	ID (general)	40 % TW	1.01	HTS-S	
10	63	01/90 E360	ID (general)	62 % TW	5.50	HTS-S	- 0.70
10	67	01/90 E360	ID (general)	26 % TW	1.83	HTS-S	- 0.00
10	84	01/90 E360	ID (general)	35 % TW	2.53	HTS-S	- 3.30
10	85	01/90 RFD	ID (general)	60 % TW	9.04	HTS-P	+11.30
11	3	01/90 E360	ID (general)	42 % TW	3.15	HTS-S	- 4.50
11	11	01/90 E360	ID (general)	73 % TW	0.54	HTS-S	- 1.40
		01/90 RFD	ID (general)	S/N	3.20	HTS-P	+19.57
11	13	01/90 RFD	ID (general)	S/N	6.14	CTS-P	+16.78
11	14	01/90 E360	ID (general)	12 % TW	0.78	HTS-S	+ 0.20
11	16	01/90 RFD	ID (general)	57 % TW	10.60	HTS-P	+ 3.41
11	18	01/90 E360	ID (general)	23 % TW	1.46	HTS-S	- 0.00
		01/90 E360	ID (general)	77 % TW	11.50	HTS-S	- 3.40
		01/90 RFD	ID (general)	S/N	3.40	HTS-P	+16.70
11	20	01/90 E360	ID (general)	56 % TW	5.04	HTS-S	- 0.10
		01/90 RFD	ID (general)	40 % TW	2.77	HTS-S	
11	52	01/90 E360	ID (general)	53 % TW	2.23	HTS-S	
11	60	01/90 E360	ID (general)	52 % TW	3.57	HTS-S	- 0.00
		01/90 E360	ID (general)	41 % TW	2.43	HTS-S	- 2.90
		01/90 RFD	ID (general)	S/N	1.32	HTS-P	+16.46
11	61	01/90 E360	ID (general)	66 % TW	5.71	HTS-S	- 1.10
		01/90 E360	ID (general)	34 % TW	1.96	HTS-S	- 2.10
11	69	01/90 E360	ID (general)	33 % TW	1.85	HTS-S	- 0.50
11	72	01/90 RFD	ID (general)	S/N	1.89	HTS-P	+13.78
11	84	01/90 RFD	ID (general)	S/N	2.40	HTS-P	+13.55
		01/90 RFD	ID (general)	S/N	1.33	HTS-P	+10.55
11	85	01/90 RFD	ID (general)	97 % TW	5.46	HTS-P	+ 9.19
11	96	01/90 E360	ID (general)	68 % TW	5.90	HTS-S	- 3.10
		01/90 RFD	ID (general)	S/N	1.02	HTS-P	+17.23
12	10	01/90 E360	ID (general)	21 % TW	1.37	HTS-S	- 2.20
12	24	01/90 E360	ID (general)	25 % TW	1.67	HTS-S	+ 0.10
12	30	01/90 E360	ID (general)	39 % TW	3.14	HTS-S	- 3.90
12	34	01/90 E360	ID (general)	34 % TW	2.65	HTS-S	- 1.60
		01/90 E360	ID (general)	19 % TW	1.12	HTS-S	- 3.50
12	35	01/90 E360	ID (general)	11 % TW	0.64	HTS-S	- 0.70
12	62	01/90 E360	ID (general)	50 % TW	3.41	HTS-S	- 0.60
		01/90 E360	ID (general)	41 % TW	2.51	HTS-S	- 1.00
		01/90 RFD	ID (general)	S/N	1.80	HTS-P	+20.44
		01/90 RFD	ID (general)	S/N	1.60	HTS-P	+19.50
		01/90 RFD	ID (general)	S/N	1.19	HTS-P	+18.50
12	63	01/90 E360	ID (general)	51 % TW	3.46	HTS-S	- 0.00
		01/90 E360	ID (general)	22 % TW	1.00	HTS-S	- 1.50
12	81	01/90 E360	ID (general)	22 % TW	1.00	HTS-S	- 0.30
		01/90 RFD	ID (general)	40 % TW	17.74	HTS-S	
13	26	01/90 E360	ID (general)	17 % TW	0.69	HTS-S	+ 0.30
13	29	01/90 E360	ID (general)	25 % TW	1.27	HTS-S	- 1.70
		01/90 RFD	ID (general)	S/N	3.59	HTS-P	+16.04
13	30	01/90 E360	ID (general)	34 % TW	1.67	20	- 1.50
		01/90 E360	ID (general)	31 % TW	1.40	20	- 1.70
13	33	01/90 E360	ID (general)	24 % TW	1.15	HTS-S	- 0.00
13	35	01/90 E360	ID (general)	45 % TW	3.70	HTS-S	- 2.50
13	46	01/90 E360	ID (general)	38 % TW	2.60	HTS-S	+ 0.20
13	60	01/90 E360	ID (general)	47 % TW	2.56	HTS-S	- 0.60
		01/90 E360	ID (general)	21 % TW	1.03	HTS-S	- 1.60
		01/90 RFD	ID (general)	S/N	2.09	HTS-P	+18.56



Plant: McGuire Unit 1  
Outages: 01/90 E360 01/90 RFO

Steam Generator: D

## QUERY: ATTACHMENT 7 INDICATIONS OF IMPERFECTIONS

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
13	61	01/90 RFO	ID (general)	S/N	2.24	HTS-P	+19.51
		01/90 E360	ID (general)	37 % TW	1.91	HTS-S	- 1.10
		01/90 E360	ID (general)	16 % TW	0.80	HTS-S	- 2.00
		01/90 E360	ID (general)	16 % TW	0.77	HTS-S	- 3.40
		01/90 RFO	ID (general)	S/N	0.77	HTS-P	+17.55
13	62	01/90 E360	ID (general)	66 % TW	4.64	HTS-S	- 0.60
		01/90 E360	ID (general)	62 % TW	3.75	HTS-S	- 1.70
		01/90 E360	ID (general)	30 % TW	2.21	HTS-S	- 2.70
		01/90 E360	ID (general)	26 % TW	1.32	HTS-S	- 3.80
		01/90 RFO	ID (general)	S/N	1.18	HTS-P	+19.44
		01/90 RFO	ID (general)	S/N	1.54	HTS-P	+20.45
13	65	01/90 RFO	ID (general)	62 % TW	7.92	HTS-P	+ 8.60
14	29	01/90 RFO	ID (general)	S/N	5.31	HTS-P	+13.12
14	30	01/90 E360	ID (general)	32 % TW	2.03	HTS-S	- 1.60
14	60	01/90 E360	ID (general)	74 % TW	6.05	HTS-S	- 2.20
		01/90 RFO	ID (general)	S/N	4.21	HTS-P	+16.47
14	65	01/90 RFO	ID (general)	S/N	2.01	HTS-P	+ 6.29
14	80	01/90 RFO	ID (general)	44 % TW	6.53	HTS-P	+ 9.19
14	86	01/90 E360	ID (general)	45 % TW	2.46	HTS-S	- 1.40
15	20	01/90 E360	ID (general)	9 % TW	1.91	20	+ 2.00
15	30	01/90 RFO	ID (general)	S/N	3.39	HTS-P	+15.51
15	59	01/90 RFO	ID (general)	S/N	3.99	HTS-P	+15.13
15	62	01/90 E360	ID (general)	50 % TW	2.77	HTS-S	- 0.50
		01/90 RFO	ID (general)	S/N	3.86	HTS-P	+20.22
15	64	01/90 E360	ID (general)	26 % TW	1.31	HTS-S	- 2.50
16	7	01/90 E360	ID (general)	72 % TW	8.39	HTS-S	- 1.20
		01/90 RFO	ID (general)	S/N	4.21	HTS-P	+19.55
16	11	01/90 RFO	ID (general)	S/N	2.55	HTS-P	+14.85
16	16	01/90 E360	ID (general)	73 % TW	9.14	HTS-S	- 1.30
		01/90 RFO	ID (general)	S/N	3.76	HTS-P	+14.73
		01/90 RFO	ID (general)	S/N	3.26	HTS-P	+18.79
16	17	01/90 RFO	ID (general)	S/N	4.49	HTS-P	+10.55
16	20	01/90 E360	ID (general)	51 % TW	4.49	HTS-S	- 2.40
		01/90 RFO	ID (general)	100 % TW	3.10	HTS-P	+17.69
16	21	01/90 E360	ID (general)	81 % TW	11.43	HTS-S	- 2.90
		01/90 RFO	ID (general)	94 % TW	5.62	HTS-P	+17.24
16	57	01/90 RFO	ID (general)	40 % TW	6.66	HTS-P	+14.12
16	65	01/90 RFO	ID (general)	S/N	4.02	HTS-P	+12.81
17	5	01/90 E360	ID (general)	22 % TW	1.58	HTS-S	+ 0.10
17	12	01/90 E360	ID (general)	27 % TW	1.91	HTS-S	- 3.40
		01/90 RFO	ID (general)	S/N	2.45	HTS-P	+17.50
17	15	01/90 E360	ID (general)	77 % TW	9.94	HTS-S	- 5.50
		01/90 RFO	ID (general)	S/N	2.99	HTS-P	+15.81
17	18	01/90 E360	ID (general)	28 % TW	1.62	HTS-S	- 1.60
17	24	01/90 RFO	ID (general)	86 % TW	4.22	HTS-P	+13.51
17	56	01/90 RFO	ID (general)	95 % TW	13.96	HTS-P	+ 5.12
17	80	01/90 E360	ID (general)	39 % TW	1.99	HTS-S	- 1.40
		01/90 RFO	ID (general)	S/N	1.80	HTS-P	+19.14
17	85	01/90 E360	ID (general)	27 % TW	1.33	HTS-S	- 3.90
17	90	01/90 RFO	ID (general)	S/N	2.05	HTS-P	+15.31
17	94	01/90 RFO	ID (general)	52 % TW	6.61	HTS-P	+11.10
18	10	01/90 E360	ID (general)	15 % TW	1.06	HTS-S	+ 0.30
18	13	01/90 E360	ID (general)	8 % TW	0.54	HTS-S	+ 0.10
		01/90 E360	ID (general)	17 % TW	0.69	HTS-S	- 3.10
18	14	01/90 E360	ID (general)	27 % TW	1.90	HTS-S	- 1.60
		01/90 RFO	ID (general)	S/N	2.37	HTS-P	+13.63
18	15	01/90 E360	ID (general)	23 % TW	1.60	HTS-S	+ 0.20
18	31	01/90 E360	ID (general)	24 % TW	1.17	HTS-S	+ 0.20
18	34	01/90 E360	ID (general)	29 % TW	1.77	HTS-S	- 8.20
18	54	01/90 E360	ID (general)	33 % TW	2.22	HTS-S	- 3.20
18	55	01/90 E360	ID (general)	62 % TW	6.17	HTS-S	+ 0.10
		01/90 RFO	ID (general)	40 % TW	4.01	HTS-S	- 1.60
18	96	01/90 RFO	ID (general)	S/N	2.84	HTS-P	+14.06
19	10	01/90 E360	ID (general)	28 % TW	2.03	HTS-S	+ 0.30
19	13	01/90 RFO	ID (general)	S/N	3.90	HTS-P	+11.01
19	22	01/90 E360	ID (general)	29 % TW	1.73	HTS-S	- 3.10
19	31	01/90 E360	ID (general)	25 % TW	1.28	HTS-S	+ 0.20

Plant: McGuire UNIT 1  
Outages: 01/90 E360 01/90 RFD

Steam Generator: D

QUERY: ATTACHMENT 7 INDICATIONS OF IMPERFECTIONS

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
19	46	01/90 E360	ID (general)	35 % TW	2.41 HTS-S	+ 0.20	
19	61	01/90 E360	ID (general)	86 % TW	15.05 HTS-S	- 2.00	
		01/90 RFD	ID (general)	S/N	3.51 HTS-P	+17.61	
19	62	01/90 RFD	ID (general)	42 % TW	14.45 HTS-P	+13.38	
19	69	01/90 E360	ID (general)	26 % TW	1.77 HTS-S	- 3.50	
19	77	01/90 E360	ID (general)	15 % TW	0.89 HTS-S		
20	9	01/90 E360	ID (general)	13 % TW	0.90 HTS-S	- 3.30	
20	24	01/90 RFD	ID (general)	S/N	2.63 HTS-P	+ 0.60	
20	38	01/90 RFD	ID (general)	S/N	1.55 HTS-P	+10.20	
20	47	01/90 E360	ID (general)	15 % TW	0.74 HTS-S	- 0.70	
20	49	01/90 E360	ID (general)	23 % TW	1.31 HTS-S	- 0.70	
		01/90 E360	ID (general)	41 % TW	2.72 HTS-S	- 1.70	
20	80	01/90 RFD	ID (general)	S/N	3.99 HTS-P	+12.21	
20	94	01/90 E360	ID (general)	35 % TW	2.72 HTS-S	- 1.90	
		01/90 E360	ID (general)	17 % TW	1.63 HTS-S	- 4.00	
21	36	01/90 E360	ID (general)	21 % TW	1.40 HTS-S	- 1.69	
21	87	01/90 RFD	ID (general)	S/N	1.87 HTS-P	+11.39	
22	10	01/90 E360	ID (general)	78 % TW	10.02 HTS-S	- 4.40	
		01/90 RFD	ID (general)	S/N	5.23 HTS-P	+16.55	
22	31	01/90 E360	ID (general)	40 % TW	1.79 HTS-S	+ 0.10	
22	38	01/90 RFD	ID (general)	S/N	0.84 HTS-P	+15.09	
22	50	01/90 E360	ID (general)	28 % TW	1.04 HTS-S	+ 0.30	
22	57	01/90 E360	ID (general)	37 % TW	1.96 HTS-S	+ 0.20	
		01/90 E360	ID (general)	31 % TW	2.03 HTS-S	+ 0.30	
		01/90 RFD	ID (general)	40 % TW	2.29 HTS-S		
22	78	01/90 E360	ID (general)	64 % TW	5.33 HTS-S	- 2.00	
		01/90 RFD	ID (general)	79 % TW	10.86 HTS-P	+17.77	
22	80	01/90 E360	ID (general)	63 % TW	4.09 HTS-S	- 1.50	
23	21	01/90 E360	ID (general)	11 % TW	2.77 TW	- 5.00	
23	24	01/90 E360	ID (general)	12 % TW	0.63 HTS-S	- 2.50	
		01/90 RFD	ID (general)	S/N	1.13 HTS-P	+18.46	
23	45	01/90 E360	ID (general)	22 % TW	1.17 HTS-S	+ 0.20	
23	70	01/90 RFD	ID (general)	44 % TW	20.24 HTS-P	+ 5.97	
23	92	01/90 RFD	ID (general)	62 % TW	6.86 HTS-P	+ 6.03	
24	19	01/90 E360	ID (general)	42 % TW	2.43 HTS-S	- 3.50	
24	23	01/90 RFD	ID (general)	S/N	2.84 HTS-P	+16.42	
24	100	01/90 RFD	ID (general)	S/N	2.66 HTS-P	+17.87	
25	53	01/90 E360	ID (general)	49 % TW	3.26 HTS-S	+ 0.20	
25	54	01/90 RFD	ID (general)	55 % TW	11.14 HTS-P	+12.22	
25	56	01/90 E360	ID (general)	32 % TW	1.63 HTS-S	+ 0.20	
25	81	01/90 E360	ID (general)	40 % TW	3.61 HTS-S	-10.50	
		01/90 RFD	ID (general)	52 % TW	7.74 HTS-P	+11.10	
26	51	01/90 E360	ID (general)	83 % TW	11.69 HTS-S	+ 0.20	
		01/90 RFD	ID (general)	S/N	18.50 HTS-P	+16.53	
		01/90 RFD	ID (general)	40 % TW	5.35 HTS-S		
27	18	01/90 E360	ID (general)	15 % TW	1.00 HTS-S	- 4.70	
27	30	01/90 RFD	ID (general)	S/N	0.00 HTS-P	+11.20	
27	49	01/90 E360	ID (general)	15 % TW	0.78 HTS-S		
		01/90 E360	ID (general)	54 % TW	4.00 HTS-S	- 1.70	
27	54	01/90 E360	ID (general)	51 % TW	3.58 HTS-S	- 0.90	
27	67	01/90 E360	ID (general)	24 % TW	2.25 HTS-S	+ 0.20	
27	84	01/90 RFD	ID WEAR	19 % TW	1.05 RVB1		
28	55	01/90 E360	ID (general)	20 % TW	1.45 HTS-S		
28	57	01/90 E360	ID (general)	20 % TW	6.96 11	+24.40	
		01/90 E360	ID (general)	59 % TW	6.75 HTS-S	+ 0.10	
		01/90 RFD	ID (general)	40 % TW	3.43 HTS-S		
		01/90 RFD	ID (general)	S/N	0.87 10	+19.47	
28	69	01/90 E360	ID (general)	21 % TW	1.87 HTS-S	- 1.70	
28	70	01/90 RFD	ID (general)	97 % TW	9.04 HTS-P	+ 4.40	
		01/90 RFD	ID (general)	S/N	3.12 HTS-P	+ 5.10	
29	18	01/90 E360	ID (general)	50 % TW	5.57 HTS-S	- 1.60	
29	34	01/90 E360	ID (general)	31 % TW	2.66 HTS-S	- 4.90	
29	37	01/90 E360	ID (general)	46 % TW	5.00 HTS-S	+ 6.10	
		01/90 RFD	ID (general)	40 % TW	3.39 HTS-S		
29	46	01/90 RFD	ID (general)	64 % TW	4.69 HTS-P	+12.17	
29	49	01/90 E360	ID (general)	35 % TW	3.22 HTS-S	- 4.60	
29	61	01/90 E360	ID (general)	10 % TW	0.91 HTS-S	- 0.20	

Plant: McGuire Unit 1  
Outages: 01/90 E360 01/90 RFO

Steam Generator: D

QUERY: ATTACHMENT 7 INDICATIONS OF IMPERFECTIONS

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
29	66	01/90 RFO	ID (general)	70 % TW	4.23	HTS-P	+13.00
29	67	01/90 RFO	ID (general)	91 % TW	5.13	HTS-P	+11.00
29	70	01/90 E360	ID (general)	23 % TW	2.05	HTS-S	- 3.90
		01/90 RFO	ID (general)	S/N	2.01	HTS-P	+17.37
30	39	01/90 RFO	ID (general)	S/N	4.73	HTS-P	+ 2.75
30	40	01/90 RFO	ID (general)	S/N	1.00	HTS-P	+ 9.09
30	43	01/90 RFO	ID (general)	52 % TW	9.44	HTS-P	+ 6.41
30	44	01/90 E360	ID (general)	32 % TW	2.78	HTS-S	- 4.30
		01/90 RFO	ID (general)	95 % TW	4.11	HTS-P	+17.18
30	45	01/90 E360	ID (general)	26 % TW	2.06	HTS-S	+ 0.20
30	47	01/90 E360	ID (general)	55 % TW	6.60	HTS-S	- 0.00
		01/90 RFO	ID (general)	S/N	4.16	HTS-P	+20.35
30	52	01/90 E360	ID (general)	14 % TW	0.75	HTS-S	+ 0.10
		01/90 RFO	ID (general)	S/N	2.95	HTS-P	+13.50
30	61	01/90 RFO	ID (general)	S/N	4.25	HTS-P	+ 6.20
		01/90 RFO	ID (general)	S/N	1.73	HTS-P	+ 0.30
30	62	01/90 E360	ID (general)	39 % TW	4.00	HTS-S	- 3.60
		01/90 RFO	ID (general)	S/N	1.66	HTS-P	+16.00
30	68	01/90 RFO	ID (general)	S/N	5.25	HTS-P	+13.00
30	77	01/90 RFO	ID (general)	S/N	11.73	HTS-P	+13.00
31	14	01/90 RFO	ID (general)	S/N	4.88	HTS-P	+12.13
31	29	01/90 E360	ID (general)	44 % TW	4.59	HTS-S	- 2.00
		01/90 E360	ID (general)	42 % TW	3.16	HTS-S	- 2.10
		01/90 RFO	ID (general)	S/N	2.12	HTS-P	+10.25
31	38	01/90 RFO	ID (general)	65 % TW	6.05	HTS-P	+15.25
31	50	01/90 E360	ID (general)	51 % TW	5.50	HTS-S	+ 0.10
31	70	01/90 RFO	ID (general)	87 % TW	11.18	HTS-P	+ 3.99
31	75	01/90 E360	ID (general)	34 % TW	3.39	HTS-S	- 3.00
		01/90 E360	ID (general)	38 % TW	2.73	HTS-S	- 2.10
31	84	01/90 E360	ID (general)	30 % TW	3.85	HTS-S	- 0.10
31	100	01/90 RFO	ID (general)	S/N	3.25	HTS-P	+ 9.00
		01/90 RFO	ID (general)	S/N	1.59	HTS-P	+10.90
32	30	01/90 E360	ID (general)	24 % TW	1.72	HTS-S	- 0.50
		01/90 RFO	ID (general)	S/N	5.49	HTS-P	+13.20
32	52	01/90 E360	ID (general)	36 % TW	3.33	HTS-S	+ 0.10
32	67	01/90 E360	ID (general)	12 % TW	1.05	HTS-S	- 1.50
		01/90 RFO	ID (general)	S/N	1.12	HTS-P	+19.49
32	68	01/90 E360	OD (general)	10 % TW	2.28	17	+ 2.00
		01/90 RFO	OD (general)	19 % TW	0.99	17	+ 2.16
32	80	01/90 E360	ID (general)	56 % TW	7.15	HTS-S	- 0.30
33	33	01/90 E360	ID (general)	29 % TW	2.39	HTS-S	- 3.90
33	43	01/90 E360	ID (general)	38 % TW	3.50	HTS-S	- 1.90
		01/90 RFO	ID (general)	45 % TW	8.70	HTS-P	+19.10
33	81	01/90 E360	ID (general)	35 % TW	3.57	HTS-S	- 2.30
33	102	01/90 RFO	OD WEAR	19 % TW	0.72	AVB1	
34	31	01/90 E360	ID (general)	23 % TW	1.50	HTS-S	- 1.00
34	37	01/90 RFO	ID (general)	S/N	3.90	HTS-P	+ 7.81
34	81	01/90 RFO	ID (general)	S/N	2.38	HTS-P	+ 9.31
35	27	01/90 E360	ID (general)	30 % TW	2.57	HTS-S	- 1.50
35	33	01/90 E360	ID (general)	36 % TW	2.30	HTS-S	- 1.90
35	38	01/90 E360	ID (general)	19 % TW	0.96	HTS-S	- 5.20
35	51	01/90 E360	ID (general)	40 % TW	2.82	HTS-S	- 0.10
35	54	01/90 E360	ID (general)	43 % TW	3.29	HTS-S	- 4.10
		01/90 RFO	ID (general)	S/N	1.04	HTS-P	+17.42
35	67	01/90 RFO	ID (general)	60 % TW	4.71	HTS-P	+15.36
		01/90 RFO	ID (general)	50 % TW	2.84	HTS-P	+16.29
35	75	01/90 E360	ID (general)	0 % TW	0.71	HTS-S	- 2.50
36	30	01/90 RFO	ID (general)	S/N	1.39	HTS-P	+10.60
36	31	01/90 E360	ID (general)	40 % TW	3.95	HTS-S	- 6.00
		01/90 RFO	ID (general)	82 % TW	4.66	HTS-P	+15.34
36	35	01/90 E360	ID (general)	23 % TW	1.21	HTS-S	- 5.00
36	38	01/90 RFO	ID (general)	S/N	1.56	HTS-P	+ 4.81
36	43	01/90 E360	ID (general)	24 % TW	1.35	HTS-S	+ 0.10
		01/90 RFO	ID (general)	40 % TW	1.31	HTS-S	
36	51	01/90 E360	WJ (general)	35 % TW	2.32	HTS-S	- 4.20
36	54	01/90 RFO	OD WEAR	19 % TW	1.06	AVB1	
37	20	01/90 E360	ID (general)	43 % TW	3.26	HTS-S	- 0.40



Plant: McGuire UNIT 1  
Outages: 01/90 E360 01/90 RFD

Steam Generator: D

QUERY: ATTACHMENT 7 INDICATIONS OF IMPERFECTIONS

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
37	26	01/90 RFD	ID (general)	57 % TW	8.68	HTS-P	+11.49
37	63	01/90 RFD	ID (general)	95 % TW	8.50	HTS-P	+12.48
37	66	01/90 RFD	ID (general)	74 % TW	5.62	HTS-P	+12.18
38	18	01/90 E360	ID (general)	20 % TW	1.13	HTS-S	- 0.10
38	24	01/90 RFD	ID (general)	67 % TW	5.37	HTS-P	+14.50
38	27	01/90 E360	ID (general)	31 % TW	1.94	HTS-S	- 0.30
38	63	01/90 RFD	ID (general)	S/N	3.92	HTS-P	+13.29
38	67	01/90 RFD	OD WEAR	19 % TW	0.93	AVB1	
38	77	01/90 RFD	ID (general)	S/N	7.66	HTS-P	+13.20
39	27	01/90 E360	ID (general)	27 % TW	1.79	HTS-S	- 0.20
39	30	01/90 E360	ID (general)	32 % TW	2.10	HTS-S	- 4.40
		01/90 RFD	ID (general)	S/N	1.54	HTS-P	+16.37
		01/90 RFD	OD WEAR	19 % TW	0.69	AVB3	
39	34	01/90 E360	ID (general)	27 % TW	1.88	HTS-S	- 3.60
		01/90 RFD	ID (general)	S/N	2.17	HTS-P	+17.43
39	39	01/90 RFD	ID (general)	S/N	2.60	HTS-P	+ 9.73
39	51	01/90 RFD	OD WEAR	19 % TW	0.91	AVB1	
39	52	01/90 RFD	ID (general)	S/N	7.56	HTS-P	+13.61
39	67	01/90 RFD	ID (general)	S/N	2.79	HTS-P	+13.35
39	75	01/90 RFD	ID (general)	S/N	4.37	HTS-P	+11.25
39	84	01/90 RFD	ID (general)	87 % TW	3.05	HTS-P	+12.11
40	32	01/90 E360	ID (general)	43 % TW	3.25	HTS-S	- 4.00
40	41	01/90 E360	ID (general)	51 % TW	4.22	HTS-S	- 3.30
		01/90 RFD	ID (general)	65 % TW	6.89	HTS-P	+18.02
40	47	01/90 E360	ID (general)	82 % TW	10.92	HTS-S	- 0.40
40	52	01/90 RFD	ID (general)	S/N	1.16	HTS-P	+16.20
40	66	01/90 RFD	OD WEAR	19 % TW	0.70	AVB1	
41	53	01/90 RFD	ID (general)	S/N	2.18	HTS-P	+15.39
41	66	01/90 E360	ID (general)	31 % TW	3.18	HTS-S	- 3.20
42	25	01/90 E360	ID (general)	23 % TW	0.90	HTS-S	- 5.10
42	76	01/90 E360	ID (general)	49 % TW	6.00	HTS-S	- 3.10
		01/90 RFD	ID (general)	78 % TW	2.35	HTS-P	+18.13
42	80	01/90 RFD	ID (general)	S/N	1.02	HTS-P	+18.97
42	94	01/90 E360	OD (general)	S/N	2.07	HTS-S	+ 0.60
		01/90 E360	OD (general)	7 % TW	1.19	HTS-S	+ 0.40
43	37	01/90 RFD	OD WEAR	19 % TW	1.47	AVB3	
43	66	01/90 RFD	OD WEAR	19 % TW	0.67	AVB1	
43	53	01/90 RFD	ID (general)	47 % TW	11.78	HTS-P	+ 5.46
43	71	01/90 RFD	ID (general)	S/R	2.34	HTS-P	+ 5.40
44	31	01/90 E360	ID (general)	69 % TW	5.46	HTS-S	- 3.60
		01/90 E360	ID (general)	65 % TW	7.70	HTS-S	- 3.30
44	37	01/90 E360	ID (general)	73 % TW	6.18	HTS-S	- 5.70
		01/90 RFD	ID (general)	S/N	5.26	HTS-P	+15.71
44	49	01/90 RFD	OD WEAR	19 % TW	0.69	AVB1	
44	53	01/90 RFD	OD WEAR	19 % TW	0.89	AVB1	
44	59	01/90 RFD	OD WEAR	19 % TW	0.43	AVB1	
44	60	01/90 RFD	OD WEAR	19 % TW	0.87	AVB1	
44	66	01/90 RFD	OD WEAR	19 % TW	0.74	AVB1	
45	37	01/90 E360	ID (general)	61 % TW	4.04	HTS-S	+ 0.10
		01/90 RFD	ID (general)	40 % TW	15.19	HTS-S	
45	52	01/90 RFD	OD WEAR	19 % TW	0.90	AVB1	
45	57	01/90 RFD	OD WEAR	19 % TW	2.01	AVB1	
45	59	01/90 RFD	OD WEAR	19 % TW	2.44	AVB1	
45	60	01/90 RFD	OD WEAR	19 % TW	2.01	AVB1	
46	35	01/90 E360	ID (general)	26 % TW	1.89	HTS-S	- 2.40
		01/90 E360	ID (general)	16 % TW	0.93	HTS-S	- 1.30
46	59	01/90 RFD	ID (general)	S/N	3.91	HTS-P	+ 4.00
46	78	01/90 RFD	OD WEAR	19 % TW	1.12	AVB1	
47	28	01/90 E360	ID (general)	58 % TW	3.67	HTS-S	
		01/90 E360	OD (general)	72 % TW	7.97	1	+ 0.90
		01/90 RFD	OD WEAR	S/N	0.41	AVB3	
		01/90 RFD	OD (general)	36 % TW	1.66	1	+ 1.12
47	29	01/90 E360	OD (general)	29 % TW	1.07	1	- 0.40
		01/90 E360	OD (general)	39 % TW	1.86	1	+ 1.10
		01/90 RFD	OD (general)	33 % TW	0.70	1	+ 1.37
47	34	01/90 E360	ID (general)	35 % TW	1.54	HTS-S	- 1.50
47	42	01/90 RFD	ID (general)	90 % TW	16.33	HTS-P	+ 1.39

Plant: McGUIRE UNIT 1  
Outages: 01/90 E360 01/90 RFD

Steam Generator: D

QUERY: ATTACHMENT 7 INDICATIONS OF IMPERFECTIONS

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
47	43	01/90 E360	ID (general)	24 % TW	0.97	HTS-S	- 5.00
47	45	01/90 RFD	ID (general)	S/N	1.95	HTS-P	+10.55
		01/90 RFD	ID (general)	S/N	1.93	HTS-P	+13.42
47	78	01/90 RFD	OD WEAR	19 % TW	0.91	AMB1	
47	81	01/90 RFD	ID (general)	S/N	2.55	HTS-P	+ 4.30
48	39	01/90 E360	ID (general)	37 % TW	3.85	HTS-S	- 0.60
48	44	01/90 RFD	OD WEAR	19 % TW	2.66	19	
48	45	01/90 RFD	OD WEAR	19 % TW	2.50	19	
48	81	01/90 E360	ID (general)	13 % TW	0.73	HTS-S	- 2.30
49	61	01/90 E360	ID (general)	11 % TW	0.62	HTS-S	+ 0.10
49	62	01/90 RFD	ID (general)	66 % TW	6.27	HTS-P	+14.07
49	69	01/90 RFD	OD WEAR	19 % TW	1.42	17	
49	72	01/90 E360	ID (general)	28 % TW	1.62	HTS-S	- 0.80
49	78	01/90 RFD	OD WEAR	12 % TW	1.75	17	
49	79	01/90 RFD	OD WEAR	11 % TW	1.55	17	
49	80	01/90 RFD	OD WEAR	19 % TW	1.55	17	
49	81	01/90 E360	OD WEAR	11 % TW	2.75	17	- 0.50
		01/90 RFD	OD WEAR	19 % TW	1.54	17	

TOTAL TUBES FOUND = 334  
TOTAL INDICATIONS FOUND = 487

Plant: McGuire Unit 1  
Outages: 01/90 E360 01/90 RFD

Steam Generator: D

QUERY: ATTACHMENT 8 TUBES PLUGGED OR REPAIRED

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
2	71	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
2	74	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
2	87	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
2	90	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
2	103	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
3	3	01/90 RFD	SLEEVED	Design 1	HTS-P	+11.00	
3	35	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
3	39	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
3	42	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
3	56	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
3	68	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
4	17	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
4	27	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
4	28	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
4	30	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
4	31	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
4	32	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
4	36	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
4	62	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
4	63	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
4	64	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
5	13	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
5	19	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
5	25	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
6	3	01/90 RFD	SLEEVED	Design 1	HTS-P	+11.00	
6	5	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
6	38	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
6	37	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
6	62	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
6	65	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
6	79	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
7	9	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
7	11	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
7	15	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
7	34	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
7	39	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
7	57	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
7	62	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
7	78	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
7	101	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
8	9	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
8	28	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
8	42	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
8	62	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
8	77	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
8	82	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
9	2	01/90 RFD	SLEEVED	Design 1	HTS-P	+11.00	
9	13	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
9	35	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
9	37	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
9	57	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
9	69	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
9	75	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
9	79	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
9	80	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
9	83	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
10	17	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
10	28	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
10	29	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
10	31	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
10	32	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
10	40	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
10	63	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	

Plant: McGuire Unit 1

Steam Generator: D

Outages: 01/90 E360 01/90 RFD

QUERY: ATTACHMENT 8 TUBES PLUGGED OR REPAIRED

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
10	67	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
11	3	01/90 RFD	SLEEVED	Design 1	HTS-P	+11.00	
11	11	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
		01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
11	14	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
11	18	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
11	20	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
11	52	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
11	60	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
11	61	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
11	69	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
12	10	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
12	24	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
12	34	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
12	35	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
12	62	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
12	63	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
12	81	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
13	26	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
13	29	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
13	33	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
13	35	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
13	46	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
13	60	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
13	61	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
13	62	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
14	29	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
14	30	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
14	60	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
14	86	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
15	62	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
16	7	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
16	16	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
17	5	01/90 RFD	SLEEVED	Design 1	HTS-P	+11.00	
17	18	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
17	80	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
		01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
18	10	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
18	13	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
18	14	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
18	15	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
18	31	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
18	54	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
18	55	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
19	10	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
19	31	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
19	46	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
19	61	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
19	77	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
20	47	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
20	49	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
20	80	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
20	94	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
21	36	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
22	31	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	WELD	HTS-P		
22	50	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
22	57	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	WELD	HTS-P		
22	80	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
23	24	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
23	45	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
25	53	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
25	56	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	



Plant: McGuire UNIT 1

Steam Generator: D

Outages: 01/90 E360 01/90 RFD

QUERY: ATTACHMENT 8 TUBES PLUGGED OR REPAIRED

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
25	60	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	WELD	HTS-P		
26	51	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	WELD	HTS-P		
27	49	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
27	54	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
27	67	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
28	55	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
28	57	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
28	69	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
29	18	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
29	37	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	WELD	HTS-P		
29	61	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
30	45	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
30	47	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
30	52	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
31	50	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
31	75	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
31	84	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
32	30	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
32	52	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
32	67	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
32	80	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
33	43	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
33	81	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
34	31	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
35	27	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
35	33	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
35	51	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
35	54	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
35	66	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
35	67	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
35	75	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
36	43	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
36	51	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
37	20	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
38	18	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
38	27	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
38	77	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
39	27	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
40	47	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	WELD	HTS-P		
41	66	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
42	76	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
42	80	01/90 RFD	SLEEVED	Design 2	HTS-P	+17.50	
42	94	01/90 RFD	SLEEVED	Design 1	HTS-P	+11.00	
43	77	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
45	37	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
46	35	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
46	59	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
47	28	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
47	29	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
47	34	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		
47	43	01/90 RFD	PLUGGED	MECH	CTS-P		
		01/90 RFD	PLUGGED	MECH	HTS-P		

Plant: McGuire Unit 1

Steam Generator: D

Outages: 01/90 E360 01/90 RFD

QUERY: ATTACHMENT 8 TUBES PLUGGED OR REPAIRED

ROW	COL	OUTAGE	INDICATION	VALUE	VOLTS	ELEVATION	INCHES
48	39	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
48	61	01/90 RFD	SLEEVED	Design 1		HTS-P	+11.00
49	61	01/90 RFD	PLUGGED	MECH		CYS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	
49	72	01/90 RFD	PLUGGED	MECH		CTS-P	
		01/90 RFD	PLUGGED	MECH		HTS-P	

TOTAL TUBES FOUND = 178

TOTAL INDICATIONS FOUND = 208