

DUQUESNE LIGHT COMPANY
BEAVER VALLEY UNIT 1
REACTOR VESSEL INSERVICE INSPECTION
REFUELING OUTAGE CORE I-II

The areas listed below were examined as required by the plant Technical Specification and the 1974 Edition of Section XI of the ASME Boiler and Pressure Code with Addenda through Summer 1975 utilizing the Westinghouse remotely operated tool.

VESSEL-TOOL INTERFACE PARAMETERS

- (a) Vessel head alignment pins located at 0, 90, 180 and 270 degrees vessel axis.
- (b) Closure head guide studs located in stud holes #5, #21, and #37 on 171.25 inch pitch circle diameter.
- (c) Tool aligned on pin at 90 degrees, other two legs at 210 and 330 degrees.

EXAMINATION REQUIREMENTS

IWB-2600 Item B1.3

VESSEL TO FLANGE WELD

Thirty percent of the total length of the weld to be examined. Examine from centerline of stud hole #8 at 43.45 degrees axis, clockwise around to stud hole #13 at 74.68 degrees vessel axis, and from stud hole #40 at 242.07 degrees to stud hole #52 at 316.55 degrees vessel axis (105 degrees total).

IWB-2600 Item B1.4

OUTLET NOZZLE TO SHELL WELD

Examine nozzle to shell weld and nozzle protrusion of Loop 1 and 2 outlet nozzles. Centerline of nozzles located 82.86 inches from top surface of flange.

Outlet nozzles located at 25.03 and 144.90 degrees vessel axes.

APPENDIX A
CALIBRATION REQUIREMENTS

AREA TO BE EXAMINED (STEP 6.3)	SEARCH UNIT		CAL. BLOCK IDENTITY (6.3.3)*	WATER PATH DISTANCE (6.3.4)*	CALIBRATION 6.6.6*	REFLECTOR 6.3.7*	IDENTITIES 6.3.8*	MANIPULATOR ORIENTATION 6.3.3*
	INCIDENT ANGLE (6.3.1)*	REFRACTED ANGLE						
Outlet Nozzle to Vessel Weld	0°	0°	BV1-27	11"	Hole C	Hole B	Hole A	Vertical
	4°	16°L	BV1-27	11"	Hole C	Hole B	Hole A	Vertical
Nozzle Inside Radius	23°	60°	BV1-23	12"	Hole D	Hole E	N/A	Vertical
Flange to Vessel Weld	0°	0°	CWE-RV-1	8"	Hole B	Hole C	Hole D	Horizontal
	1°	4°L	CWE-RV-1	8"	Hole B	Hole C	Hole D	Horizontal
	3°	11°L	CWE-RV-1	8"	Hole B	Hole C	Hole D	Horizontal
Ligaments	0°	0°	BV1-27	9 1/2"	Hole A	Hole B	Hole D	Horizontal
Safe-End Weld	0°	0°	Figure 2	5"	Hole A	Hole B	Hole C	Vertical
	10 1/2°	45°L	Figure 2	5"	Hole A	Hole B	Hole C	Vertical

* See Procedure WMF-95044-P-001, Appendix E, Part 1, for referenced paragraphs.