

## PLANT SYSTEMS

### 3/4.7.9 HYDRAULIC SNUBBERS

#### LIMITING CONDITION FOR OPERATION

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3.7.9.1 All hydraulic snubbers listed in Table 3.7-3 shall be OPERABLE.

APPLICABILITY: MODES 1, 2, 3 and 4.

ACTION:

With one or more hydraulic snubbers inoperable, replace or restore the inoperable snubber(s) to OPERABLE status within 72 hours or be in at least HOT STANDBY within the next 6 hours and in COLD SHUTDOWN within the following 30 hours.

#### SURVEILLANCE REQUIREMENTS

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4.7.9.1 Hydraulic snubbers will be demonstrated OPERABLE by performance of the following augmented inservice inspection program and the requirements of Specification 4.0.5.

- a. Each hydraulic snubber with seal material fabricated from ethylene propylene or other materials demonstrated compatible with the operating environment and approved as such by the NRC, shall be determined OPERABLE at least once after not less than 4 months but within 6 months of initial criticality and in accordance with the inspection schedule of Table 4.7-4 thereafter, by a visual inspection of the snubber. Visual inspections of the snubber shall include, but are not necessarily limited to, inspection of the hydraulic fluid reservoirs, fluid connections, and linkage connections to the piping and anchors. Initiation of the Table 4.7-4 inspection schedule shall be made assuming the unit was previously at the 6 month inspection interval.
- b. Each hydraulic snubber with seal material not fabricated from ethylene propylene or other materials demonstrated compatible with the operating environment shall be determined OPERABLE at least once per 31 days by a visual inspection of the snubber. Visual inspection of the snubbers shall include but are not necessarily limited to, inspection of the hydraulic fluid reservoirs, fluid connections, and linkage connections to the piping and anchors.

Table 3.7-3

SAFETY RELATED HYDRAULIC SNUBBERS\*

CRYSTAL RIVER - UNIT 3

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<u>SNUBBER NO.</u>	<u>SYSTEM SNUBBER INSTALLED ON, LOCATION** AND ELEVATION</u>		<u>ACCESSIBLE OR INACCESSIBLE (A or I)</u>	<u>HIGH RADIATION ZONE**** (Yes or No)</u>	<u>ESPECIALLY DIFFICULT TO REMOVE (Yes or No)</u>
Decay Heat Removal System					
DHH-17	RB	110'-6"	I	No	No
DHH-18	RB	110'-6"	I	No	No
DHH-19	RB	109'-0"	I	No	No
DHH-20	RB2	115'-0"	I	Yes	No
DHH-21	RB2	117'-0"	I	Yes	Yes
DHH-22	RB2	117'-0"	I	Yes	Yes
DHH-23	RB	110'-6"	I	No	Yes
DHH-24	RB	109'-3"	I	No	No
DHH-25	RB	110'-6"	I	No	Yes
DHH-26H	RB	110'-6"	I	No	No
DHH-26V	RB	110'-6"	I	No	No
DHH-27	RB	110'-6"	I	No	Yes
DHH-35	RB2	152'-5"	I	Yes	No
DHH-36	RB2	152'-5"	I	Yes	No
DHH-37	RB2	159'-7"	I	Yes	Yes
DHH-38	RB2	160'-1"	I	Yes	Yes
DHH-39	RB2	165'-9"	I	Yes	No
DHH-661	AB	86'-6"	A	Yes	No
DHR-18	AB	84'-7"	A	Yes	No
DHR-21	AB	103'-6"	A	No	No
DHR-24U	AB	129'-6"	A	No	No
DHR-24L	AB	129'-6"	A	No	No
DHR-28	AB	134'-4"	A	No	No
DHR-31	AB	84'-9"	A	Yes	No
DHR-37	AB	85'-6"	A	Yes	No
DHR-49	AB	85'-6"	A	Yes	No

CRYSTAL RIVER - UNIT 3

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Table 3.7-3

SAFETY RELATED HYDRAULIC SNUBBERS\*

SNUBBER NO.	SYSTEM SNUBBER INSTALLED ON, LOCATION** AND ELEVATION		ACCESSIBLE OR INACCESSIBLE (A or I)	HIGH RADIATION ZONE**** (Yes or No)	ESPECIALLY DIFFICULT TO REMOVE (Yes or No)
Emergency Feedwater System					
EFH-14U	RB	115'-0"	I	No	No
EFH-14L	RB	115'-0"	I	No	No
EFH-15U	RB	115'-0"	I	No	No
EFH-15L	RB	115'-0"	I	No	No
EFH-27	RB2	145'-9"	I	Yes	Yes
EFH-28	RB2	145'-9"	I	Yes	Yes
EFH-92	IB	140'-0"	I	No	No
EFH-93	IB	131'-8"	I	No	No
EFH-94	IB	131'-8"	A	No	No
EFH-95	IB	140'-0"	A	No	No
EFH-96	IB	141'-3"	A	No	No
EFH-106	IB	141'-3"	I	No	No
EFH-107	IB	141'-3"	A	No	No
EFH-108	IB	141'-3"	A	No	No
EFH-109	IB	133'-0"	A	No	No
EFH-110	IB	133'-0"	I	No	No
EFH-141	IB	126'-6"	A	No	No
EFH-143	IB	133'-6"	A	No	No
EFH-144	IB	141'-3"	I	No	No

CRYSTAL RIVER - UNIT 3

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Table 3.7-3

## SAFETY RELATED HYDRAULIC SNUBBERS\*

SNUBBER NO.	SYSTEM SNUBBER INSTALLED ON, LOCATION** AND ELEVATION		ACCESSIBLE OR INACCESSIBLE (A or I)	HIGH RADIATION ZONE**** (Yes or No)	ESPECIALLY DIFFICULT TO REMOVE (Yes or No)
Feedwater System (Continued)					
FWH-149	IB	133'-0"	I	No	No
FWH-150	IB	133'-0"	A	No	No
FWH-151	IB	131'-0"	A	No	No
FWH-152	IB	131'-0"	A	No	No
FWH-153	IB	131'-0"	I	No	No
FWH-154	IB	131'-0"	I	No	No
FWH-155	IB	131'-0"	I	No	No
FWH-156	IB	131'-0"	I	No	No
FWH-157	IB	136'-0"	I	No	No
FWH-158	IB	136'-0"	I	No	No
FWH-159	IB	136'-0"	I	No	No
FWH-160	IB	136'-0"	A	No	No
FWH-161	IB	136'-0"	A	No	No
FWH-162	IB	142'-0"	I	No	No
FWH-163	IB	136'-0"	A	No	No
FWH-164	IB	136'-0"	A	No	No
FWH-165	IB	134'-0"	A	No	No
FWH-166	IB	134'-0"	I	No	No
FWH-167	IB	134'-0"	I	No	No
FWH-168	IB	134'-0"	A	No	No
FWH-169	IB	134'-0"	I	No	No
FWH-170	IB	134'-0"	A	No	No
FWH-171	IB	119'-0"	A	No	No



CRYSTAL RIVER - UNIT 3

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Table 3.7-3

SAFETY RELATED HYDRAULIC SNUBBERS\*

SNUBBER NO.	SYSTEM SNUBBER INSTALLED ON, LOCATION** AND ELEVATION		ACCESSIBLE OR INACCESSIBLE (A or I)	HIGH RADIATION ZONE**** (Yes or No)	ESPECIALLY DIFFICULT TO REMOVE (Yes or No)
Main Steam System					
MSH-117	IB	122'-0"	A	No	No
MSH-118	IB	122'-0"	A	No	No
MSH-119	IB	122'-0"	A	No	No
MSH-120	IB	122'-0"	A	No	No
MSH-121	IB	122'-0"	A	No	No
MSH-122	IB	122'-0"	A	No	No
MSH-123	IB	122'-0"	A	No	No
MSH-124	IB	122'-0"	A	No	No
MSH-125	IB	122'-0"	I	No	No
MSH-126	IB	122'-0"	I	No	No
MSH-128	IB	122'-0"	A	No	No
MSH-139	RB	133'-0"	I	No	No
MSH-147	RB	139'-0"	I	No	Yes
MSH-149	RB	123'-0"	I	No	No
MSH-150	RB	123'-0"	I	No	No
MSH-156	RB	154'-0"	I	No	Yes
MSH-159	RB	148'-0"	I	No	Yes
MSH-160	RB	142'-0"	I	No	No
MSH-161	RB	154'-0"	I	No	No
MSH-162	RB	132'-0"	I	No	Yes
MSH-163	RB	136'-0"	I	No	Yes
MSH-164	RB	123'-0"	I	No	No
MSH-165	RB	123'-0"	I	No	No
MSH-166	RB	148'-0"	I	No	Yes
MSH-167	RB	148'-0"	I	No	Yes

Table 3.7-3

## SAFETY RELATED HYDRAULIC SNUBBERS\*

SNUBBER NO.	SYSTEM SNUBBER INSTALLED ON, LOCATION** AND ELEVATION	ACCESSIBLE OR INACCESSIBLE (A or I)	HIGH RADIATION ZONE*** (Yes or No)	ESPECIALLY DIFFICULT TO REMOVE (Yes or No)
Main Steam System (Continued)				
MSH-168	RB 142'-0"	I	No	Yes
MSH-169	RB 148'-0"	I	No	Yes
MSH-170	RB 142'-0"	I	No	Yes
MSH-205	IB 132'-0"	I	No	No
MSH-206	IB 136'-0"	I	No	No
MSH-207	IB 136'-0"	I	No	No
MSH-208	IB 130'-0"	A	No	No
MSH-209	IB 130'-0"	A	No	No
MSH-210	IB 122'-0"	A	No	No
MSH-211	IB 109'-0"	A	No	No
MSH-212	IB 134'-0"	I	No	No
MSH-213	IB 130'-0"	I	No	No
MSH-214	IB 115'-0"	A	No	No
MSH-227	IB 122'-0"	I	No	No
MSH-232	IB 120'-0"	I	No	No
MSH-240	IB 122'-0"	I	No	No
MSH-243	RB 147'-0"	I	No	No
MSH-248	IB 136'-0"	A	No	No
MSH-249	IB 136'-0"	A	No	No
MSH-250	IB 111'-0"	A	No	No
MSH-251	IB 109'-0"	A	No	No
MSH-252	IB 136'-0"	A	No	No
MSH-253	IB 104'-0"	A	No	No
MSH-254	IB 104'-0"	A	No	No
MSH-255	IB 105'-0"	A	No	No

TABLE 4.7-4  
HYDRAULIC SNUBBER INSPECTION SCHEDULE

<u>NUMBER OF SNUBBERS FOUND INOPERABLE DURING INSPECTION OR DURING INSPECTION INTERVAL (*)</u>	<u>NEXT REQUIRED INSPECTION INTERVAL (**, +)</u>
0	18 months $\pm$ 25%
1	12 months $\pm$ 25%
2	6 months $\pm$ 25%
3 or 4	124 days $\pm$ 25%
5, 6, or 7	62 days $\pm$ 25%
Greater than or equal to 8	31 days $\pm$ 25%

\* Snubbers may be categorized into two groups, "accessible" and "inaccessible". This categorization shall be based upon the snubber's accessibility for inspection during reactor operation. These two groups may be inspected independently according to the above schedule

\*\* The required inspection interval shall not be lengthened more than one step at a time. Following the 1983 refueling outage, the first inservice visual inspection of accessible snubbers shall be performed after 4 months but within 10 months of commencing POWER OPERATION. Subsequent intervals shall be determined by the above Table.

+ For the duration of Cycle Five, as many inaccessible snubbers as possible shall be visually inspected during any mid-cycle outage(s). These inspections should not increase the duration of the outage(s).