Table 4-125. LS1 Burnup and TH Feedback Parameters Assembly H5

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)			
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8	
1	0.000		0.7396	0.021	628.6	0.7396	
2	0.000		0.7396	0.079	852.8	0.7396	
3	0.000		0.7376	0.109	926.0	0.7376	
4	0.000	Data	0.7008	0.126	1000.9	0.7008	
5	0.000	Not	0.6499	0.133	1033.7	0.6499	
6	0.000	Required	0.5928	0.136	1048.0	0.5928	
7	0.000		0.5371	0.137	1052.9	0.5371	
8	0.000		0.4875	0.139	1062.6	0.4875	
9	0.000		0.4442	0.148	1107.7	0.4442	
10	0.000		0.4066	0.150	1118.0	0.4066	
11	0.000		0.3741	0.152	1128.4	0.3741	
12	0.000		0.3458	0.154	1138.9	0.3458	
13	0.000		0.3211	0.156	1149.5	0.3211	
14	0.000		0.2995	0.156	1149.5	0.2995	
15	0.000		0.2806	0.153	1133.6	0.2806	
16	0.000		0.2643	0.148	1107.7	0.2643	
17	0.000		0.2502	0.141	1072.5	0.2502	
18	0.000		0.2384	0.126	1000.9	0.2384	
19	0.000		0.2285	0.118	964.9	0.2285	
20	0.000		0.2199	0.109	926.0	0.2199	
21	0.000		0.2124	0.100	888.8	0.2124	
22	0.000		0.2063	0.084	826.6	0.2063	
23	0.000		0.2015	0.067	765.4	0.2015	
24	0.000		0.1986	0.025	632.7	0.1986	
25	0.000		0.1975	0.017	609.9	0.1975	

Table 4-126. LS1 Burnup and TH Feedback Parameters Assembly H6

Node No.	Statepoint 10 (BOC Cy 8) Burnup (GWd/MTU) 0.00 Cy 8	Fuel Temp. (K) 0.00 Cy 8	Mod. Dens. (g/cm^3) 0.00 Cy 8	Statepoint 11 (3.67 EFPD Cy 8) Burnup (GWd/MTU) 3.67 Cy 8	Fuel Temp. (K) 3.67 Cy 8	Mod. Dens. (g/cm^3) 3.67 Cy 8
1	0.000		0.7396	0.022	632.0	0.7396
2	0.000		0.7396	0.083	870.5	0.7396
3	0.000		0.7364	0.114	947.4	0.7364
4	0.000	Data	0.6980	0.131	1024.2	0.698
5	0.000	Not	0.6457	0.137	1052.9	0.6457
6	0.000	Required	0.5883	0.138	1057.7	0.5883
7	0.000		0.5332	0.138	1057.7	0.5332
8	0.000		0.4849	0.139	1062.6	0.4849
9	0.000		0.4430	0.146	1097.5	0.4430
10	0.000		0.4068	0.146	1097.5	0.4068
11	0.000		0.3760	0.144	1087.4	0.3760
12	0.000		0.3497	0.141	1072.5	0.3497
13	0.000		0.3271	0.138	1057.7	0.3271
14	0.000		0.3078	0.134	1038.4	0.3078
15	0.000		0.2910	0.129	1014.8	0.2910
16	0.000		0.2764	0.123	987.3	0.2764
17	0.000		0.2639	0.115	951.8	0.2639
18	0.000		0.2534	0.102	897.0	0.2534
19	0.000		0.2446	0.093	861.0	0.2446
20	0.000		0.2370	0.086	834.1	0.2370
21	0.000		0.2305	0.078	804.4	0.2305
22	0.000		0.2250	0.066	761.9	0.2250
23	0.000		0.2207	0.052	715.2	0.2207
24	0.000		0.2181	0.020	618.4	0.2181
25	0.000		0.2170	0.013	598.7	0.2170

Table 4-127. LS1 Burnup and TH Feedback Parameters Assembly H7

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.019	621.8	0.7396
2	0.000		0.7396	0.070	814.0	0.7396
3	0.000		0.7396	0.094	921.0	0.7396
4	0.000	Data	0.7173	0.109	926.0	0.7173
5	0.000	Not	0.6788	0.116	956.1	0.6788
6	0.000	Required	0.6329	0.119	969.3	0.6329
7	0.000		0.5846	0.121	978.2	0.5846
8	0.000		0.5376	0.123	987.3	0.5376
9	0.000		0.4943	0.130	1019.5	0.4943
10	0.000		0.4555	0.130	1019.5	0.4555
11	0.000		0.4225	0.129	1014.8	0.4225
12	0.000		0.3942	0.127	1005.5	0.3942
13	0.000		0.3696	0.124	991.8	0.3696
14	0.000		0.3484	0.120	973.8	0.3484
15	0.000		0.3300	0.116	956.1	0.3300
16	0.000		0.3140	0.111	934.5	0.3140
17	0.000		0.3001	0.105	909.3	0.3001
18	0.000		0.2884	0.093	861.0	0.2884
19	0.000		0.2785	0.086	834.1	0.2785
20	0.000		0.2699	0.080	811.7	0.2699
21	0.000		0.2623	0.073	786.4	0.2623
22	0.000		0.2561	0.062	748.3	0.2561
23	0.000		0.2511	0.049	705.6	0.2511
24	0.000		0.2481	0.018	612.7	0.2481
25	0.000		0.2469	0.012	596.0	0.2469

Table 4-128. LS1 Burnup and TH Feedback Parameters Assembly H8

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.021	628.6	0.7396
2	0.000		0.7396	0.081	861.6	0.7396
3	0.000		0.7378	0.110	930.3	0.7378
4	0.000	Data	0.7016	0.127	1005.5	0.7016
5	0.000	Not	0.6517	0.134	1038.4	0.6517
6	0.000	Required	0.5958	0.136	1048.0	0.5958
7	0.000		0.5411	0.136	1048.0	0.5411
8	0.000		0.4925	0.137	1052.9	0.4925
9	0.000		0.4499	0.145	1092.5	0.4499
10	0.000		0.4131	0.145	1092.5	0.4131
11	0.000		0.3817	0.144	1087.4	0.3817
12	0.000		0.3547	0.141	1072.5	0.3547
13	0.000		0.3316	0.139	1062.6	0.3316
14	0.000		0.3116	0.135	1043.2	0.3116
15	0.000		0.2944	0.130	1019.5	0.2944
16	0.000		0.2795	0.124	991.8	0.2795
17	0.000		0.2667	0.116	956.1	0.2667
18	0.000		0.2560	0.102	897.0	0.2560
19	0.000		0.2471	0.093	861.0	0.2471
20	0.000		0.2394	0.086	834.1	0.2394
21	0.000		0.2328	0.077	800.8	0.2328
22	0.000		0.2273	0.065	758.5	0.2273
23	0.000		0.2230	0.051	712.0	0.2230
24	0.000		0.2204	0.019	615.6	0.2204
25	0.000		0.2194	0.012	596.0	0.2194

Table 4-129. LS1 Burnup and TH Feedback Parameters Assembly H9

Node No.	Statepoint 10 (BOC Cy 8) Burnup (GWd/MTU) 0.00 Cy 8	Fuel Temp. (K) 0.00 Cy 8	Mod. Dens. (g/cm^3) 0.00 Cy 8	Statepoint 11 (3.67 EFPD Cy 8) Burnup (GWd/MTU) 3.67 Cy 8	Fuel Temp. (K) 3.67 Cy 8	Mod. Dens. (g/cm^3) 3.67 Cy 8
1	0.000		0.7396	0.020	625.2	0.7396
2	0.000		0.7396	0.077	844.0	0.7396
3	0.000		0.7382	0.106	913.4	0.7382
4	0.000	Data	0.7015	0.125	996.4	0.7015
5	0.000	Not	0.6495	0.136	1048.0	0.6495
6	0.000	Required	0.5898	0.143	1082.4	0.5898
7	0.000		0.5305	0.148	1107.7	0.5305
8	0.000		0.4777	0.152	1128.4	0.4777
9	0.000		0.4320	0.162	1181.8	0.4320
10	0.000		0.3929	0.162	1181.8	0.3929
11	0.000		0.3599	0.161	1176.4	0.3599
12	0.000		0.3322	0.158	1160.2	0.3322
13	0.000		0.3088	0.156	1149.5	0.3088
14	0.000		0.2886	0.153	1133.6	0.2886
15	0.000		0.2711	0.149	1112.8	0.2711
16	0.000		0.2559	0.146	1097.5	0.2559
17	0.000		0.2425	0.141	1072.5	0.2425
18	0.000		0.2310	0.131	1024.2	0.2310
19	0.000		0.2210	0.127	1005.5	0.2210
20	0.000		0.2121	0.122	982.7	0.2121
21	0.000		0.2042	0.113	943.1	0.2042
22	0.000		0.1976	0.096	872.8	0.1976
23	0.000		0.1924	0.077	800.8	0.1924
24	0.000		0.1894	0.029	644.4	0.1894
25	0.000		0.1880	0.019	615.6	0.1880

Table 4-130. LS1 Burnup and TH Feedback Parameters Assembly H10

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.020	625.2	0.7396
2	0.000		0.7396	0.076	839.7	0.7396
3	0.000		0.7396	0.104	969.3	0.7396
4	0.000	Data	0.7073	0.120	973.8	0.7073
5	0.000	Not	0.6609	0.128	1010.2	0.6609
6	0.000	Required	0.6074	0.131	1024.2	0.6074
7	0.000		0.5537	0.132	1028.9	0.5537
8	0.000		0.5047	0.134	1038.4	0.5047
9	0.000		0.4612	0.142	1077.4	0.4612
10	0.000		0.4233	0.143	1082.4	0.4233
11	0.000		0.3908	0.143	1082.4	0.3908
12	0.000		0.3625	0.143	1082.4	0.3625
13	0.000		0.3380	0.143	1082.4	0.3380
14	0.000		0.3166	0.141	1072.5	0.3166
15	0.000		0.2981	0.138	1057.7	0.2981
16	0.000		0.2819	0.133	1033.7	0.2819
17	0.000		0.2680	0.125	996.4	0.2680
18	0.000		0.2563	0.112	938.8	0.2563
19	0.000		0.2465	0.103	901.0	0.2465
20	0.000		0.2381	0.095	868.9	0.2381
21	0.000		0.2308	0.086	834.1	0.2308
22	0.000		0.2248	0.072	782.9	0.2248
23	0.000		0.2201	0.057	731.6	0.2201
24	0.000		0.2173	0.022	624.1	0.2173
25	0.000		0.2162	0.014	601.5	0.2162

Table 4-131. LS1 Burnup and TH Feedback Parameters Assembly H11

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.018	618.5	0.7396
2	0.000		0.7396	0.068	805.6	0.7396
3	0.000		0.7396	0.093	916.3	0.7396
4	0.000	Data	0.7183	0.108	921.8	0.7183
5	0.000	Not	0.6799	0.116	956.1	0.6799
6	0.000	Required	0.6339	0.120	973.8	0.6339
7	0.000		0.5850	0.123	987.3	0.5850
8	0.000		0.5373	0.125	996.4	0.5373
9	0.000		0.4930	0.133	1033.7	0.4930
10	0.000		0.4535	0.134	1038.4	0.4535
11	0.000		0.4200	0.133	1033.7	0.4200
12	0.000		0.3912	0.131	1024.2	0.3912
13	0.000		0.3661	0.128	1010.2	0.3661
14	0.000		0.3444	0.125	996.4	0.3444
15	0.000		0.3257	0.120	973.8	0.3257
16	0.000		0.3095	0.115	951.8	0.3095
17	0.000		0.2955	0.107	917.6	0.2955
18	0.000		0.2839	0.094	864.9	0.2839
19	0.000		0.2742	0.086	834.1	0.2742
20	0.000		0.2659	0.080	811.7	0.2659
21	0.000		0.2586	0.072	782.9	0.2586
22	0.000		0.2525	0.061	744.9	0.2525
23	0.000		0.2477	0.049	705.6	0.2477
24	0.000		0.2448	0.018	612.7	0.2448
25	0.000		0.2437	0.011	593.2	0.2437

Table 4-132. LS1 Burnup and TH Feedback Parameters Assembly H12

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.022	632.0	0.7396
2	0.000		0.7396	0.085	879.5	0.7396
3	0.000		0.7355	0.116	956.1	0.7355
4	0.000	Data	0.6959	0.133	1033.7	0.6959
5	0.000	Not	0.6426	0.139	1062.6	0.6426
6	0.000	Required	0.5846	0.140	1067.5	0.5846
7	0.000		0.5294	0.139	1062.6	0.5294
8	0.000		0.4813	0.140	1067.5	0.4813
9	0.000		0.4396	0.147	1102.6	0.4396
10	0.000		0.4037	0.147	1102.6	0.4037
11	0.000		0.3731	0.145	1092.5	0.3731
12	0.000		0.3469	0.143	1082.4	0.3469
13	0.000		0.3244	0.140	1067.5	0.3244
14	0.000		0.3050	0.136	1048.0	0.3050
15	0.000		0.2883	0.131	1024.2	0.2883
16	0.000		0.2738	0.125	996.4	0.2738
17	0.000		0.2613	0.117	960.5	0.2613
18	0.000		0.2507	0.104	905.2	0.2507
19	0.000		0.2420	0.096	872.8	0.2420
20	0.000		0.2344	0.088	841.7	0.2344
21	0.000		0.2278	0.080	811.7	0.2278
22	0.000		0.2223	0.067	765.4	0.2223
23	0.000		0.2179	0.053	718.5	0.2179
24	0.000		0.2154	0.020	618.4	0.2154
25	0.000		0.2143	0.013	598.7	0.2143

Table 4-133. LS1 Burnup and TH Feedback Parameters Assembly H13

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.021	628.6	0.7396
2	0.000		0.7396	0.078	848.4	0.7396
3	0.000		0.7387	0.107	917.6	0.7387
4	0.000	Data	0.7035	0.124	991.8	0.7035
5	0.000	Not	0.6543	0.132	1028.9	0.6543
6	0.000	Required	0.5984	0.135	1043.2	0.5984
7	0.000		0.5432	0.136	1048.0	0.5432
8	0.000		0.4937	0.138	1057.7	0.4937
9	0.000		0.4502	0.147	1102.6	0.4502
10	0.000		0.4125	0.148	1107.7	0.4125
11	0.000		0.3800	0.149	1112.8	0.3800
12	0.000		0.3519	0.149	1112.8	0.3519
13	0.000		0.3277	0.148	1107.7	0.3277
14	0.000		0.3066	0.147	1102.6	0.3066
15	0.000		0.2883	0.143	1082.4	0.2883
16	0.000		0.2725	0.137	1052.9	0.2725
17	0.000		0.2590	0.128	1010.2	0.2590
18	0.000		0.2477	0.112	938.8	0.2477
19	0.000		0.2384	0.103	901.0	0.2384
20	0.000		0.2305	0.094	864.9	0.2305
21	0.000		0.2237	0.085	830.3	0.2237
22	0.000		0.2180	0.072	782.9	0.2180
23	0.000		0.2135	0.057	731.6	0.2135
24	0.000		0.2108	0.022	624.1	0.2108
25	0.000		0.2097	0.014	601.5	0.2097

Table 4-134. LS1 Burnup and TH Feedback Parameters Assembly H14

Node No.	Statepoint 10 (BOC Cy 8) Burnup (GWd/MTU) 0.00 Cy 8	Fuel Temp. (K) 0.00 Cy 8	Mod. Dens. (g/cm^3) 0.00 Cy 8	Statepoint 11 (3.67 EFPD Cy 8) Burnup (GWd/MTU) 3.67 Cy 8	Fuel Temp. (K) 3.67 Cy 8	Mod. Dens. (g/cm^3) 3.67 Cy 8
1	0.000		0.7396	0.019	621.8	0.7396
2	0.000		0.7396	0.071	818.3	0.7396
3	0.000		0.7396	0.098	940.1	0.7396
4	0.000	Data	0.7144	0.114	947.4	0.7144
5	0.000	Not	0.6728	0.122	982.7	0.6728
6	0.000	Required	0.6237	0.125	996.4	0.6237
7	0.000		0.5730	0.126	1000.9	0.5730
8	0.000		0.5250	0.128	1010.2	0.5250
9	0.000		0.4815	0.135	1043.2	0.4815
10	0.000		0.4429	0.136	1048.0	0.4429
11	0.000		0.4103	0.134	1038.4	0.4103
12	0.000		0.3824	0.131	1024.2	0.3824
13	0.000		0.3582	0.128	1010.2	0.3582
14	0.000		0.3374	0.124	991.8	0.3374
15	0.000		0.3194	0.119	969.3	0.3194
16	0.000		0.3039	0.113	943.1	0.3039
17	0.000		0.2907	0.105	909.3	0.2907
18	0.000		0.2796	0.092	857.1	0.2796
19	0.000		0.2704	0.083	822.8	0.2704
20	0.000		0.2626	0.076	797.2	0.2626
21	0.000		0.2557	0.069	772.3	0.2557
22	0.000		0.2500	0.058	734.9	0.2500
23	0.000		0.2455	0.046	696.1	0.2455
24	0.000		0.2428	0.017	609.9	0.2428
25	0.000		0.2417	0.011	593.2	0.2417

Table 4-135. LS1 Burnup and TH Feedback Parameters Assembly H15

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.022	632.0	0.7396
2	0.000		0.7396	0.085	879.5	0.7396
3	0.000		0.7348	0.117	960.5	0.7348
4	0.000	Data	0.6941	0.134	1038.4	0.6941
5	0.000	Not	0.6395	0.140	1067.5	0.6395
6	0.000	Required	0.5804	0.141	1072.5	0.5804
7	0.000		0.5246	0.141	1072.5	0.5246
8	0.000		0.4762	0.142	1077.4	0.4762
9	0.000		0.4345	0.149	1112.8	0.4345
10	0.000		0.3985	0.150	1118.0	0.3985
11	0.000		0.3676	0.149	1112.8	0.3676
12	0.000		0.3410	0.148	1107.7	0.3410
13	0.000		0.3181	0.147	1102.6	0.3181
14	0.000		0.2982	0.145	1092.5	0.2982
15	0.000		0.2809	0.141	1072.5	0.2809
16	0.000		0.2659	0.134	1038.4	0.2659
17	0.000		0.2531	0.126	1000.9	0.2531
18	0.000		0.2425	0.111	934.5	0.2425
19	0.000		0.2335	0.102	897.0	0.2335
20	0.000		0.2259	0.093	861.0	0.2259
21	0.000		0.2193	0.084	826.6	0.2193
22	0.000		0.2138	0.071	779.4	0.2138
23	0.000		0.2095	0.056	728.3	0.2095
24	0.000		0.2069	0.021	621.2	0.2069
25	0.000		0.2059	0.014	601.5	0.2059

Table 4-136. LS1 Burnup and TH Feedback Parameters Assembly H16

Node No.	Statepoint 10 (BOC Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 11 (3.67 EFPD Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.023	635.4	0.7396
2	0.000		0.7396	0.086	884.0	0.7396
3	0.000		0.7342	0.118	964.9	0.7342
4	0.000	Data	0.6926	0.135	1043.2	0.6926
5	0.000	Not	0.6369	0.141	1072.5	0.6369
6	0.000	Required	0.5772	0.142	1077.4	0.5772
7	0.000		0.5212	0.141	1072.5	0.5212
8	0.000		0.4729	0.142	1077.4	0.4729
9	0.000		0.4314	0.150	1118.0	0.4314
10	0.000		0.3955	0.150	1118.0	0.3955
11	0.000		0.3646	0.150	1118.0	0.3646
12	0.000		0.3380	0.151	1123.2	0.3380
13	0.000		0.3149	0.151	1123.2	0.3149
14	0.000		0.2948	0.149	1112.8	0.2948
15	0.000		0.2773	0.146	1097.5	0.2773
16	0.000		0.2621	0.140	1067.5	0.2621
17	0.000		0.2491	0.131	1024.2	0.2491
18	0.000		0.2382	0.116	956.1	0.2382
19	0.000		0.2291	0.107	917.6	0.2291
20	0.000		0.2213	0.098	880.8	0.2213
21	0.000		0.2146	0.088	841.7	0.2146
22	0.000		0.2091	0.074	790.0	0.2091
23	0.000		0.2048	0.059	738.2	0.2048
24	0.000		0.2022	0.022	624.1	0.2022
25	0.000		0.2011	0.014	601.5	0.2011

Table 4-137. LS1 Burnup and TH Feedback Parameters Assembly H17

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.019	621.8	0.7396
2	0.000		0.7396	0.074	831.1	0.7396
3	0.000		0.7396	0.102	959.5	0.7396
4	0.000	Data	0.7101	0.119	969.3	0.7101
5	0.000	Not	0.6652	0.127	1005.5	0.6652
6	0.000	Required	0.6130	0.130	1019.5	0.613
7	0.000		0.5600	0.131	1024.2	0.5600
8	0.000		0.5111	0.133	1033.7	0.5111
9	0.000		0.4673	0.141	1072.5	0.4673
10	0.000		0.4290	0.142	1077.4	0.4290
11	0.000		0.3966	0.140	1067.5	0.3966
12	0.000		0.3686	0.138	1057.7	0.3686
13	0.000		0.3445	0.135	1043.2	0.3445
14	0.000		0.3239	0.132	1028.9	0.3239
15	0.000		0.3060	0.127	1005.5	0.3060
16	0.000		0.2907	0.120	973.8	0.2907
17	0.000		0.2775	0.111	934.5	0.2775
18	0.000		0.2666	0.097	876.8	0.2666
19	0.000		0.2576	0.088	841.7	0.2576
20	0.000		0.2498	0.081	815.4	0.2498
21	0.000		0.2432	0.073	786.4	0.2432
22	0.000		0.2376	0.062	748.3	0.2376
23	0.000		0.2332	0.049	705.6	0.2332
24	0.000		0.2306	0.018	612.7	0.2306
25	0.000		0.2294	0.012	596.0	0.2294

Table 4-138. LS1 Burnup and TH Feedback Parameters Assembly H18

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.019	621.8	0.7396
2	0.000		0.7396	0.074	831.1	0.7396
3	0.000		0.7390	0.103	901.0	0.7390
4	0.000	Data	0.7033	0.123	987.3	0.7033
5	0.000	Not	0.6519	0.135	1043.2	0.6519
6	0.000	Required	0.5917	0.143	1082.4	0.5917
7	0.000		0.5314	0.149	1112.8	0.5314
8	0.000		0.4774	0.155	1144.2	0.4774
9	0.000		0.4305	0.165	1198.4	0.4305
10	0.000		0.3906	0.166	1203.9	0.3906
11	0.000		0.3570	0.165	1198.4	0.3570
12	0.000		0.3287	0.163	1187.3	0.3287
13	0.000		0.3047	0.162	1181.8	0.3047
14	0.000		0.2839	0.163	1187.3	0.2839
15	0.000		0.2654	0.165	1198.4	0.2654
16	0.000		0.2489	0.164	1192.8	0.2489
17	0.000		0.2346	0.159	1165.5	0.2346
18	0.000		0.2224	0.144	1087.4	0.2224
19	0.000		0.2122	0.134	1038.4	0.2122
20	0.000		0.2034	0.125	996.4	0.2034
21	0.000		0.1959	0.114	947.4	0.1959
22	0.000		0.1896	0.097	876.8	0.1896
23	0.000		0.1847	0.079	808.1	0.1847
24	0.000		0.1817	0.030	647.3	0.1817
25	0.000		0.1805	0.020	618.4	0.1805

Table 4-139. LS1 Burnup and TH Feedback Parameters Assembly J1

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.018	618.3	0.7396
2	0.000		0.7396	0.065	792.4	0.7396
3	0.000		0.7396	0.089	896.5	0.7396
4	0.000	Data	0.7198	0.105	908.0	0.7198
5	0.000	Not	0.6819	0.114	945.9	0.6819
6	0.000	Required	0.6362	0.118	963.3	0.6362
7	0.000		0.5875	0.120	972.2	0.5875
8	0.000		0.5395	0.123	985.6	0.5395
9	0.000		0.4949	0.132	1027.1	0.4949
10	0.000		0.4547	0.134	1036.5	0.4547
11	0.000		0.4200	0.137	1050.9	0.4200
12	0.000		0.3895	0.140	1065.5	0.3895
13	0.000		0.3622	0.143	1080.3	0.3622
14	0.000		0.3379	0.145	1090.3	0.3379
15	0.000		0.3167	0.142	1075.3	0.3167
16	0.000		0.2985	0.136	1046.1	0.2985
17	0.000		0.2829	0.128	1008.4	0.2829
18	0.000		0.2700	0.113	941.6	0.2700
19	0.000		0.2593	0.104	903.9	0.2593
20	0.000		0.2502	0.095	867.7	0.2502
21	0.000		0.2425	0.085	829.4	0.2425
22	0.000		0.2361	0.071	778.6	0.2361
23	0.000		0.2311	0.057	731.0	0.2311
24	0.000		0.2280	0.023	626.8	0.2280
25	0.000		0.2267	0.015	604.2	0.2267

Table 4-140. LS1 Burnup and TH Feedback Parameters Assembly J2

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.018	618.3	0.7396
2	0.000		0.7396	0.064	788.3	0.7396
3	0.000		0.7396	0.088	891.9	0.7396
4	0.000	Data	0.7202	0.104	903.9	0.7202
5	0.000	Not	0.6829	0.112	937.4	0.6829
6	0.000	Required	0.6374	0.117	959.0	0.6374
7	0.000		0.5886	0.120	972.2	0.5886
8	0.000		0.5404	0.124	990.1	0.5404
9	0.000		0.4955	0.132	1027.1	0.4955
10	0.000		0.4551	0.134	1036.5	0.4551
11	0.000		0.4202	0.137	1050.9	0.4202
12	0.000		0.3895	0.140	1065.5	0.3895
13	0.000		0.3620	0.144	1085.3	0.3620
14	0.000		0.3376	0.145	1090.3	0.3376
15	0.000		0.3161	0.144	1085.3	0.3161
16	0.000		0.2975	0.140	1065.5	0.2975
17	0.000		0.2815	0.134	1036.5	0.2815
18	0.000		0.2678	0.122	981.1	0.2678
19	0.000		0.2563	0.115	950.3	0.2563
20	0.000		0.2463	0.108	920.5	0.2463
21	0.000		0.2377	0.097	875.6	0.2377
22	0.000		0.2307	0.082	818.2	0.2307
23	0.000		0.2252	0.065	757.8	0.2252
24	0.000		0.2218	0.026	635.4	0.2218
25	0.000		0.2204	0.018	612.6	0.2204

Table 4-141. LS1 Burnup and TH Feedback Parameters Assembly J3

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.020	625.0	0.7396
2	0.000		0.7396	0.070	813.2	0.7396
3	0.000		0.7396	0.095	924.4	0.7396
4	0.000	Data	0.7143	0.111	933.1	0.7143
5	0.000	Not	0.6728	0.119	967.8	0.6728
6	0.000	Required	0.6235	0.124	990.1	0.6235
7	0.000		0.5721	0.126	999.2	0.5721
8	0.000		0.5233	0.129	1013.0	0.5233
9	0.000		0.4788	0.137	1050.9	0.4788
10	0.000		0.4394	0.139	1060.6	0.4394
11	0.000		0.4056	0.141	1070.4	0.4056
12	0.000		0.3760	0.142	1075.3	0.3760
13	0.000		0.3501	0.142	1075.3	0.3501
14	0.000		0.3275	0.142	1075.3	0.3275
15	0.000		0.3078	0.139	1060.6	0.3078
16	0.000		0.2908	0.133	1031.8	0.2908
17	0.000		0.2761	0.126	999.2	0.2761
18	0.000		0.2638	0.112	937.4	0.2638
19	0.000		0.2536	0.103	899.8	0.2536
20	0.000		0.2448	0.095	867.7	0.2448
21	0.000		0.2372	0.085	829.4	0.2372
22	0.000		0.2311	0.071	778.6	0.2311
23	0.000		0.2262	0.057	731.0	0.2262
24	0.000		0.2232	0.023	626.8	0.2232
25	0.000		0.2219	0.016	607.0	0.2219

Table 4-142. LS1 Burnup and TH Feedback Parameters Assembly J4

Node No.	Statepoint 10 (BOC Cy 8) Burnup (GWd/MTU) 0.00 Cy 8	Fuel Temp. (K) 0.00 Cy 8	Mod. Dens. (g/cm^3) 0.00 Cy 8	Statepoint 11 (3.67 EFPD Cy 8) Burnup (GWd/MTU) 3.67 Cy 8	Fuel Temp. (K) 3.67 Cy 8	Mod. Dens. (g/cm^3) 3.67 Cy 8
1	0.000		0.7396	0.020	625.0	0.7396
2	0.000		0.7396	0.070	813.2	0.7396
3	0.000		0.7396	0.097	933.9	0.7396
4	0.000	Data	0.7125	0.114	945.9	0.7125
5	0.000	Not	0.6692	0.123	985.6	0.6692
6	0.000	Required	0.6175	0.129	1013.0	0.6175
7	0.000		0.5637	0.132	1027.1	0.5637
8	0.000		0.5132	0.135	1041.3	0.5132
9	0.000		0.4679	0.144	1085.3	0.4679
10	0.000		0.4284	0.145	1090.3	0.4284
11	0.000		0.3948	0.145	1090.3	0.3948
12	0.000		0.3658	0.144	1085.3	0.3658
13	0.000		0.3408	0.143	1080.3	0.3408
14	0.000		0.3192	0.141	1070.4	0.3192
15	0.000		0.3003	0.138	1055.7	0.3003
16	0.000		0.2839	0.133	1031.8	0.2839
17	0.000		0.2697	0.127	1003.8	0.2697
18	0.000		0.2576	0.116	954.6	0.2576
19	0.000		0.2474	0.108	920.5	0.2474
20	0.000		0.2385	0.100	887.6	0.2385
21	0.000		0.2309	0.090	848.3	0.2309
22	0.000		0.2247	0.075	792.8	0.2247
23	0.000		0.2197	0.060	741.0	0.2197
24	0.000		0.2168	0.024	629.6	0.2168
25	0.000		0.2155	0.016	607.0	0.2155

Table 4-143. LS1 Burnup and TH Feedback Parameters Assembly J5

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.018	618.3	0.7396
2	0.000		0.7396	0.062	780.2	0.7396
3	0.000		0.7396	0.086	882.9	0.7396
4	0.000	Data	0.7205	0.103	899.8	0.7205
5	0.000	Not	0.6823	0.115	950.3	0.6823
6	0.000	Required	0.6340	0.125	994.6	0.634
7	0.000		0.5802	0.134	1036.5	0.5802
8	0.000		0.5264	0.142	1075.3	0.5264
9	0.000		0.4767	0.152	1126.0	0.4767
10	0.000		0.4335	0.153	1131.2	0.4335
11	0.000		0.3975	0.152	1126.0	0.3975
12	0.000		0.3668	0.150	1115.7	0.3668
13	0.000		0.3407	0.148	1105.4	0.3407
14	0.000		0.3185	0.145	1090.3	0.3185
15	0.000		0.2993	0.141	1070.4	0.2993
16	0.000		0.2826	0.137	1050.9	0.2826
17	0.000		0.2682	0.130	1017.7	0.2682
18	0.000		0.2559	0.119	967.8	0.2559
19	0.000		0.2455	0.111	933.1	0.2455
20	0.000		0.2365	0.103	899.8	0.2365
21	0.000		0.2287	0.093	859.9	0.2287
22	0.000		0.2223	0.079	807.2	0.2223
23	0.000		0.2173	0.063	751.0	0.2173
24	0.000		0.2142	0.026	635.4	0.2142
25	0.000		0.2129	0.017	609.8	0.2129

Table 4-144. LS1 Burnup and TH Feedback Parameters Assembly J6

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.021	628.4	0.7396
2	0.000		0.7396	0.072	821.6	0.7396
3	0.000		0.7396	0.100	948.3	0.7396
4	0.000	Data	0.7070	0.119	967.8	0.7070
5	0.000	Not	0.6587	0.131	1022.4	0.6587
6	0.000	Required	0.6012	0.139	1060.6	0.6012
7	0.000		0.5421	0.146	1095.3	0.5421
8	0.000		0.4880	0.152	1126.0	0.4880
9	0.000		0.4409	0.162	1179.2	0.4409
10	0.000		0.4006	0.162	1179.2	0.4006
11	0.000		0.3667	0.161	1173.8	0.3667
12	0.000		0.3381	0.159	1163.0	0.3381
13	0.000		0.3140	0.156	1147.0	0.3140
14	0.000		0.2932	0.154	1136.4	0.2932
15	0.000		0.2752	0.152	1126.0	0.2752
16	0.000		0.2594	0.148	1105.4	0.2594
17	0.000		0.2456	0.143	1080.3	0.2456
18	0.000		0.2339	0.131	1022.4	0.2339
19	0.000		0.2238	0.124	990.1	0.2238
20	0.000		0.2150	0.116	954.6	0.2150
21	0.000		0.2075	0.104	903.9	0.2075
22	0.000		0.2013	0.089	844.5	0.2013
23	0.000		0.1964	0.071	778.6	0.1964
24	0.000		0.1934	0.029	644.1	0.1934
25	0.000		0.1920	0.020	618.2	0.1920

Table 4-145. LS1 Burnup and TH Feedback Parameters Assembly J7

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.019	621.6	0.7396
2	0.000		0.7396	0.065	792.4	0.7396
3	0.000		0.7396	0.090	901.1	0.7396
4	0.000	Data	0.7196	0.106	912.1	0.7196
5	0.000	Not	0.6818	0.114	945.9	0.6818
6	0.000	Required	0.6362	0.118	963.3	0.6362
7	0.000		0.5877	0.120	972.2	0.5877
8	0.000		0.5401	0.123	985.6	0.5401
9	0.000		0.4958	0.131	1022.4	0.4958
10	0.000		0.4558	0.133	1031.8	0.4558
11	0.000		0.4215	0.135	1041.3	0.4215
12	0.000		0.3912	0.138	1055.7	0.3912
13	0.000		0.3641	0.141	1070.4	0.3641
14	0.000		0.3400	0.142	1075.3	0.3400
15	0.000		0.3190	0.139	1060.6	0.3190
16	0.000		0.3009	0.134	1036.5	0.3009
17	0.000		0.2855	0.125	994.6	0.2855
18	0.000		0.2728	0.111	933.1	0.2728
19	0.000		0.2621	0.101	891.7	0.2621
20	0.000		0.2531	0.093	859.9	0.2531
21	0.000		0.2455	0.082	818.2	0.2455
22	0.000		0.2391	0.069	771.6	0.2391
23	0.000		0.2342	0.055	724.4	0.2342
24	0.000		0.2312	0.022	623.9	0.2312
25	0.000		0.2299	0.015	604.2	0.2299

Table 4-146. LS1 Burnup and TH Feedback Parameters Assembly J8

Node No.	Statepoint 10 (BOC Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 11 (3.67 EFPD Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.020	625.0	0.7396
2	0.000		0.7396	0.070	813.2	0.7396
3	0.000		0.7396	0.097	933.9	0.7396
4	0.000	Data	0.7125	0.114	945.9	0.7125
5	0.000	Not	0.6689	0.123	985.6	0.6689
6	0.000	Required	0.6169	0.129	1013.0	0.6169
7	0.000		0.5628	0.133	1031.8	0.5628
8	0.000		0.5119	0.136	1046.1	0.5119
9	0.000		0.4663	0.145	1090.3	0.4663
10	0.000		0.4266	0.147	1100.4	0.4266
11	0.000		0.3928	0.147	1100.4	0.3928
12	0.000		0.3637	0.146	1095.3	0.3637
13	0.000		0.3386	0.145	1090.3	0.3386
14	0.000		0.3169	0.143	1080.3	0.3169
15	0.000		0.2980	0.140	1065.5	0.2980
16	0.000		0.2815	0.136	1046.1	0.2815
17	0.000		0.2671	0.131	1022.4	0.2671
18	0.000		0.2548	0.121	976.6	0.2548
19	0.000		0.2442	0.115	950.3	0.2442
20	0.000		0.2349	0.108	920.5	0.2349
21	0.000		0.2269	0.098	879.6	0.2269
22	0.000		0.2202	0.083	821.9	0.2202
23	0.000		0.2150	0.066	761.3	0.2150
24	0.000		0.2119	0.027	638.3	0.2119
25	0.000		0.2105	0.018	612.6	0.2105

Table 4-147. LS1 Burnup and TH Feedback Parameters Assembly J9

Node No.	Statepoint 10 (BOC Cy 8) Burnup (GWd/MTU) 0.00 Cy 8	Fuel Temp. (K) 0.00 Cy 8	Mod. Dens. (g/cm^3) 0.00 Cy 8	Statepoint 11 (3.67 EFPD Cy 8) Burnup (GWd/MTU) 3.67 Cy 8	Fuel Temp. (K) 3.67 Cy 8	Mod. Dens. (g/cm^3) 3.67 Cy 8
1	0.000		0.7396	0.019	621.6	0.7396
2	0.000		0.7396	0.066	796.5	0.7396
3	0.000		0.7396	0.090	901.1	0.7396
4	0.000	Data	0.7189	0.106	912.1	0.7189
5	0.000	Not	0.6808	0.114	945.9	0.6808
6	0.000	Required	0.6347	0.118	963.3	0.6347
7	0.000		0.5856	0.121	976.6	0.5856
8	0.000		0.5376	0.124	990.1	0.5376
9	0.000		0.4931	0.132	1027.1	0.4931
10	0.000		0.4531	0.134	1036.5	0.4531
11	0.000		0.4188	0.136	1046.1	0.4188
12	0.000		0.3886	0.139	1060.6	0.3886
13	0.000		0.3615	0.142	1075.3	0.3615
14	0.000		0.3374	0.143	1080.3	0.3374
15	0.000		0.3164	0.141	1070.4	0.3164
16	0.000		0.2981	0.137	1050.9	0.2981
17	0.000		0.2825	0.130	1017.7	0.2825
18	0.000		0.2692	0.118	963.3	0.2692
19	0.000		0.2581	0.109	924.7	0.2581
20	0.000		0.2486	0.101	891.7	0.2486
21	0.000		0.2404	0.090	848.3	0.2404
22	0.000		0.2337	0.076	796.4	0.2337
23	0.000		0.2285	0.060	741.0	0.2285
24	0.000		0.2253	0.024	629.6	0.2253
25	0.000		0.2240	0.016	607.0	0.2240

Table 4-148. LS1 Burnup and TH Feedback Parameters Assembly J10

Node No.	Statepoint 10 (BOC Cy 8) Burnup (GWd/MTU) 0.00 Cy 8	Fuel Temp. (K) 0.00 Cy 8	Mod. Dens. (g/cm^3) 0.00 Cy 8	Statepoint 11 (3.67 EFPD Cy 8) Burnup (GWd/MTU) 3.67 Cy 8	Fuel Temp. (K) 3.67 Cy 8	Mod. Dens. (g/cm^3) 3.67 Cy 8
1	0.000		0.7396	0.023	635.2	0.7396
2	0.000		0.7396	0.079	851.7	0.7396
3	0.000		0.7388	0.107	916.3	0.7388
4	0.000	Data	0.7042	0.124	990.1	0.7042
5	0.000	Not	0.6561	0.131	1022.4	0.6561
6	0.000	Required	0.6017	0.133	1031.8	0.6017
7	0.000		0.5480	0.133	1031.8	0.5480
8	0.000		0.4997	0.134	1036.5	0.4997
9	0.000		0.4572	0.141	1070.4	0.4572
10	0.000		0.4205	0.141	1070.4	0.4205
11	0.000		0.3891	0.140	1065.5	0.3891
12	0.000		0.3620	0.138	1055.7	0.3620
13	0.000		0.3386	0.136	1046.1	0.3386
14	0.000		0.3185	0.132	1027.1	0.3185
15	0.000		0.3009	0.128	1008.4	0.3009
16	0.000		0.2858	0.122	981.1	0.2858
17	0.000		0.2728	0.115	950.3	0.2728
18	0.000		0.2617	0.102	895.7	0.2617
19	0.000		0.2525	0.094	863.8	0.2525
20	0.000		0.2446	0.086	833.1	0.2446
21	0.000		0.2377	0.076	796.4	0.2377
22	0.000		0.2321	0.064	754.4	0.2321
23	0.000		0.2277	0.051	711.5	0.2277
24	0.000		0.2250	0.021	621.1	0.2250
25	0.000		0.2238	0.014	601.4	0.2238

Table 4-149. LS1 Burnup and TH Feedback Parameters Assembly J11

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.020	625.0	0.7396
2	0.000		0.7396	0.068	804.8	0.7396
3	0.000		0.7396	0.093	915.0	0.7396
4	0.000	Data	0.7177	0.108	920.5	0.7177
5	0.000	Not	0.6791	0.116	954.6	0.6791
6	0.000	Required	0.6330	0.120	972.2	0.633
7	0.000		0.5843	0.121	976.6	0.5843
8	0.000		0.5370	0.123	985.6	0.5370
9	0.000		0.4934	0.131	1022.4	0.4934
10	0.000		0.4544	0.132	1027.1	0.4544
11	0.000		0.4211	0.131	1022.4	0.4211
12	0.000		0.3923	0.130	1017.7	0.3923
13	0.000		0.3672	0.128	1008.4	0.3672
14	0.000		0.3454	0.125	994.6	0.3454
15	0.000		0.3264	0.122	981.1	0.3264
16	0.000		0.3099	0.117	959.0	0.3099
17	0.000		0.2957	0.110	928.9	0.2957
18	0.000		0.2837	0.098	879.6	0.2837
19	0.000		0.2736	0.090	848.3	0.2736
20	0.000		0.2649	0.083	821.9	0.2649
21	0.000		0.2575	0.074	789.2	0.2575
22	0.000		0.2513	0.062	747.7	0.2513
23	0.000		0.2465	0.049	705.1	0.2465
24	0.000		0.2436	0.020	618.2	0.2436
25	0.000		0.2422	0.013	598.6	0.2422

Table 4-150. LS1 Burnup and TH Feedback Parameters Assembly J12

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.018	618.3	0.7396
2	0.000		0.7396	0.065	792.4	0.7396
3	0.000		0.7396	0.090	901.1	0.7396
4	0.000	Data	0.7167	0.108	920.5	0.7167
5	0.000	Not	0.6755	0.119	967.8	0.6755
6	0.000	Required	0.6241	0.130	1017.7	0.6241
7	0.000		0.5680	0.139	1060.6	0.5680
8	0.000		0.5134	0.146	1095.3	0.5134
9	0.000		0.4641	0.157	1152.3	0.4641
10	0.000		0.4218	0.157	1152.3	0.4218
11	0.000		0.3863	0.156	1147.0	0.3863
12	0.000		0.3562	0.154	1136.4	0.3562
13	0.000		0.3308	0.151	1120.8	0.3308
14	0.000		0.3090	0.148	1105.4	0.3090
15	0.000		0.2903	0.145	1090.3	0.2903
16	0.000		0.2739	0.140	1065.5	0.2739
17	0.000		0.2598	0.135	1041.3	0.2598
18	0.000		0.2477	0.124	990.1	0.2477
19	0.000		0.2372	0.118	963.3	0.2372
20	0.000		0.2281	0.111	933.1	0.2281
21	0.000		0.2202	0.100	887.6	0.2202
22	0.000		0.2137	0.085	829.4	0.2137
23	0.000		0.2086	0.068	768.1	0.2086
24	0.000		0.2055	0.028	641.2	0.2055
25	0.000		0.2041	0.019	615.4	0.2041

Table 4-151. LS1 Burnup and TH Feedback Parameters Assembly J13

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.019	621.6	0.7396
2	0.000		0.7396	0.066	796.5	0.7396
3	0.000		0.7396	0.090	901.1	0.7396
4	0.000	Data	0.7186	0.106	912.1	0.7186
5	0.000	Not	0.6800	0.114	945.9	0.6800
6	0.000	Required	0.6334	0.119	967.8	0.6334
7	0.000		0.5838	0.122	981.1	0.5838
8	0.000		0.5354	0.125	994.6	0.5354
9	0.000		0.4905	0.134	1036.5	0.4905
10	0.000		0.4503	0.136	1046.1	0.4503
11	0.000		0.4159	0.137	1050.9	0.4159
12	0.000		0.3858	0.139	1060.6	0.3858
13	0.000		0.3592	0.140	1065.5	0.3592
14	0.000		0.3359	0.139	1060.6	0.3359
15	0.000		0.3155	0.137	1050.9	0.3155
16	0.000		0.2977	0.134	1036.5	0.2977
17	0.000		0.2822	0.129	1013.0	0.2822
18	0.000		0.2689	0.121	976.6	0.2689
19	0.000		0.2573	0.117	959.0	0.2573
20	0.000		0.2469	0.112	937.4	0.2469
21	0.000		0.2380	0.101	891.7	0.2380
22	0.000		0.2306	0.086	833.1	0.2306
23	0.000		0.2248	0.068	768.1	0.2248
24	0.000		0.2214	0.028	641.2	0.2214
25	0.000		0.2198	0.018	612.6	0.2198

Table 4-152. LS1 Burnup and TH Feedback Parameters Assembly A1

	Datapoint 1 (BOC Cy 4)			Datapoint 2 (208.6 EFPD Cy 4)			Datapoint 3 (BOC Cy 5)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 4	0.00 Cy 4	0.00 Cy 4	208.6 Cy 4	208.6 Cy 4	208.6 Cy 4	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5
1	0.000		0.7396	1.138	625.7	0.7396	2.348	648.5	0.7396
2	0.000		0.7114	5.303	880.5	0.7285	11.025	1030.2	0.7191
3	0.000		0.5096	8.046	1080.4	0.5776	15.483	1196.5	0.5460
4	0.000	Data	0.3693	8.975	1165.0	0.4124	16.395	1194.6	0.3890
5	0.000	Not	0.3046	8.508	1121.4	0.3271	15.843	1184.1	0.3089
6	0.000	Required	0.2659	7.694	1049.4	0.2740	14.752	1151.2	0.2575
7	0.000		0.2424	6.420	946.2	0.2399	12.433	1034.8	0.2238
8	0.000		0.2272	5.025	846.2	0.2172	9.571	893.0	0.2021
9	0.000		0.2211	2.032	665.1	0.2074	3.882	680.4	0.1930
10	0.000		0.2199	1.275	625.7	0.2057	2.411	633.2	0.1915
	Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6
1	3.826	634.7	0.7396	4.920	617.6	0.7396	6.576	663.9	0.7396
2	17.892	931.7	0.7206	22.522	805.6	0.7238	28.912	998.1	0.7223
3	23.710	1004.9	0.5562	29.448	861.4	0.5743	36.381	1022.1	0.5714
4	24.840	1020.5	0.4042	31.340	911.1	0.4298	38.154	1011.7	0.4286
5	24.107	1007.5	0.3247	31.059	942.1	0.3505	37.508	980.2	0.3505
6	22.618	979.5	0.2733	29.893	964.9	0.2975	35.818	937.1	0.2983
7	19.371	917.9	0.2389	26.586	960.6	0.2615	31.798	881.5	0.2625
8	14.390	792.2	0.2152	20.012	855.1	0.2352	23.936	790.4	0.2368
9	5.618	637.8	0.2051	7.729	659.9	0.2235	9.205	640.8	0.2254
10	3.403	605.1	0.2029	4.588	616.2	0.2201	5.417	606.0	0.2222

Table 4-152. LS1 Burnup and TH Feedback Parameters Assembly A1 (Continued)

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	7.566	661.5	0.7396	8.240	601.5	0.7396	8.517	588.9	0.7396
2	32.470	948.5	0.7223	34.751	694.4	0.7240	35.646	648.0	0.7246
3	40.215	965.1	0.5726	43.233	734.0	0.5840	44.443	675.4	0.5887
4	41.957	961.0	0.4307	45.604	774.8	0.4495	47.202	715.1	0.4589
5	41.247	952.3	0.3529	45.040	784.6	0.3725	46.897	742.8	0.3842
6	39.468	940.4	0.3006	43.140	776.5	0.3187	45.162	761.1	0.3310
7	35.231	912.3	0.2647	38.578	755.0	0.2815	40.620	763.3	0.2938
8	26.585	818.5	0.2389	29.049	699.8	0.2543	30.680	719.0	0.2659
9	10.220	651.0	0.2275	11.078	608.2	0.2414	11.667	616.0	0.2520
10	5.986	611.4	0.2243	6.426	586.0	0.2367	6.725	589.7	0.2461

	Statepoint 10 (495.2, EOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	8.841	580.3	0.7396
2	36.627	618.0	0.7253
3	45.695	631.4	0.5933
4	48.973	661.3	0.4694
5	49.228	695.1	0.4005
6	48.090	732.8	0.3524
7	44.014	763.7	0.3184
8	33.678	737.6	0.2909
9	12.789	624.0	0.2753
10	7.289	593.3	0.2666

Table 4-153. LS1 Burnup and TH Feedback Parameters Assembly A2

	Datapoint 1 (BOC Cy 4)			Datapoint 2 (208.6 EFPD Cy 4)			Datapoint 3 (BOC Cy 5)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 4	0.00 Cy 4	0.00 Cy 4	208.6 Cy 4	208.6 Cy 4	208.6 Cy 4	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5
1	0.000		0.7396	1.234	631.5	0.7396	2.242	633.1	0.7396
2	0.000		0.7147	5.642	905.9	0.7267	10.483	938.3	0.7250
3	0.000		0.5212	7.961	1072.4	0.5741	14.556	1097.7	0.5658
4	0.000	Data	0.3835	8.446	1115.6	0.4155	15.199	1115.6	0.4091
5	0.000	Not	0.3196	7.791	1057.7	0.3346	14.346	1093.2	0.3293
6	0.000	Required	0.2807	6.822	977.5	0.2846	12.992	1051.1	0.2785
7	0.000		0.2565	5.596	885.3	0.2523	10.980	970.5	0.2447
8	0.000		0.2416	4.371	802.8	0.2305	8.544	859.8	0.2221
9	0.000		0.2354	1.748	650.1	0.2213	3.443	669.9	0.2126
10	0.000		0.2342	1.090	616.4	0.2197	2.117	626.2	0.2110
	Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6
1	3.537	625.1	0.7396	4.573	614.5	0.7396	5.818	636.9	0.7396
2	16.627	883.7	0.7266	21.098	795.8	0.7288	25.936	869.2	0.7293
3	22.163	961.8	0.5784	27.685	847.8	0.5938	32.954	885.6	0.5996
4	23.094	981.5	0.4272	29.316	892.6	0.4509	34.619	888.2	0.4598
5	22.121	973.3	0.3472	28.786	922.2	0.3715	33.953	878.0	0.3804
6	20.350	945.1	0.2949	27.327	943.8	0.3178	32.253	860.1	0.3264
7	17.346	881.7	0.2595	24.214	936.3	0.2805	28.757	832.4	0.2888
8	12.944	769.2	0.2350	18.258	835.9	0.2532	21.797	764.7	0.2614
9	5.032	631.3	0.2247	7.001	653.0	0.2412	8.311	631.8	0.2492
10	3.023	601.4	0.2224	4.127	612.5	0.2380	4.848	600.3	0.2457

Table 4-153. LS1 Burnup and TH Feedback Parameters Assembly A2 (Continued)

Node No.	Statepoint 7 (BOC Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 8 (193.2 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 9 (306.8 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	6.558	634.7	0.7396	7.375	610.5	0.7396	7.719	595.9	0.7396
2	28.611	834.2	0.7298	31.566	748.1	0.7310	32.752	684.0	0.7315
3	35.853	846.6	0.6035	39.668	786.3	0.6131	41.218	710.1	0.6181
4	37.618	858.5	0.4659	42.195	839.7	0.4807	44.092	747.3	0.4898
5	36.985	862.4	0.3867	41.802	857.3	0.4009	43.895	769.1	0.4111
6	35.269	860.5	0.3324	39.957	847.9	0.3449	42.201	786.3	0.3551
7	31.635	844.1	0.2945	35.898	817.3	0.3055	38.204	793.5	0.3155
8	24.084	777.8	0.2668	27.202	740.8	0.2765	29.126	750.6	0.2863
9	9.182	638.0	0.2544	10.269	620.6	0.2633	10.975	626.8	0.2723
10	5.328	603.7	0.2508	5.899	592.9	0.2590	6.263	595.5	0.2673

Node No.	Statepoint 10 (495.2, EOC Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	8.214	591.1	0.7396
2	34.321	657.7	0.7320
3	43.139	670.2	0.6240
4	46.607	706.5	0.5025
5	46.983	743.3	0.4283
6	45.878	783.1	0.3746
7	42.311	813.4	0.3355
8	32.682	775.1	0.3052
9	12.325	636.9	0.2902
10	6.961	600.6	0.2837

Table 4-154. LS1 Burnup and TH Feedback Parameters Assembly A3

	Datapoint 1 (BOC Cy 4)			Datapoint 2 (208.6 EFPD Cy 4)			Datapoint 3 (BOC Cy 5)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 4	0.00 Cy 4	0.00 Cy 4	208.6 Cy 4	208.6 Cy 4	208.6 Cy 4	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5
1	0.000		0.7396	1.059	621.0	0.7396	2.091	634.9	0.7396
2	0.000		0.7249	4.939	871.5	0.7314	10.006	986.2	0.7259
3	0.000		0.5512	7.583	1040.3	0.5969	14.640	1150.9	0.5696
4	0.000	Data	0.4057	8.410	1112.3	0.4343	15.505	1155.4	0.4112
5	0.000	Not	0.3360	7.758	1054.8	0.3481	14.562	1121.4	0.3293
6	0.000	Required	0.2939	6.736	970.8	0.2954	13.080	1070.1	0.2776
7	0.000		0.2683	5.466	876.0	0.2620	10.919	977.5	0.2437
8	0.000		0.2526	4.300	798.2	0.2395	8.476	860.2	0.2218
9	0.000		0.2464	1.725	648.9	0.2297	3.399	668.4	0.2124
10	0.000		0.2452	1.074	615.6	0.2280	2.093	625.7	0.2110
	Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6
1	4.005	658.0	0.7396	5.454	637.1	0.7396	6.535	626.4	0.7396
2	18.820	1075.0	0.7170	24.915	901.3	0.7187	29.059	817.1	0.7206
3	24.656	1141.2	0.5453	31.969	967.7	0.5552	36.758	850.1	0.5667
4	25.428	1133.6	0.3944	33.380	1014.7	0.4082	38.389	866.2	0.4247
5	24.138	1106.0	0.3168	32.495	1045.9	0.3305	37.398	858.4	0.3467
6	22.031	1057.9	0.2670	30.715	1071.7	0.2791	35.422	844.1	0.2946
7	18.634	969.7	0.2339	27.153	1058.7	0.2438	32.652	903.8	0.2621
8	13.693	814.8	0.2135	20.122	908.3	0.2203	25.151	869.0	0.2389
9	5.285	644.6	0.2054	7.664	673.1	0.2110	9.518	661.9	0.2273
10	3.200	610.1	0.2042	4.566	624.5	0.2092	5.583	616.0	0.2242

Table 4-154. LS1 Burnup and TH Feedback Parameters Assembly A3 (Continued)

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	7.761	687.6	0.7396	8.538	608.0	0.7396	8.875	595.2	0.7396
2	33.177	1029.7	0.7194	35.814	717.1	0.7214	36.903	667.8	0.7222
3	41.017	1024.8	0.5645	44.508	764.7	0.5767	45.975	701.5	0.5822
4	42.638	1023.4	0.4234	46.808	810.6	0.4419	48.674	743.8	0.4518
5	41.643	1022.8	0.3461	45.969	821.6	0.3645	48.078	771.0	0.3759
6	39.604	1013.9	0.2940	43.778	810.9	0.3107	46.038	788.1	0.3223
7	36.479	964.5	0.2611	40.181	778.6	0.2755	42.401	783.5	0.2862
8	28.052	847.9	0.2376	30.744	713.9	0.2504	32.502	732.5	0.2602
9	10.657	662.4	0.2261	11.620	613.9	0.2381	12.273	621.9	0.2474
10	6.234	618.5	0.2233	6.734	589.2	0.2339	7.071	593.1	0.2424

	Statepoint 10 (495.2, EOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	9.290	586.0	0.7396
2	38.151	633.9	0.7231
3	47.558	650.4	0.588
4	50.851	685.7	0.4642
5	50.873	724.2	0.3938
6	49.453	765.1	0.344
7	46.188	790.7	0.3087
8	35.768	755.4	0.2819
9	13.529	631.6	0.2680
10	7.711	597.5	0.2609

Table 4-155. LS1 Burnup and TH Feedback Parameters Assembly A4

	Datapoint 1 (BOC Cy 4)			Datapoint 2 (208.6 EFPD Cy 4)			Datapoint 3 (BOC Cy 5)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 4	0.00 Cy 4	0.00 Cy 4	208.6 Cy 4	208.6 Cy 4	208.6 Cy 4	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5
1	0.000		0.7396	1.093	623.0	0.7396	2.270	646.0	0.7396
2	0.000		0.7124	5.140	868.6	0.7270	10.831	1027.3	0.7205
3	0.000		0.5107	7.944	1071.5	0.5822	15.511	1212.6	0.5474
4	0.000	Data	0.3693	8.884	1156.3	0.4173	16.432	1210.3	0.3899
5	0.000	Not	0.3043	8.277	1100.5	0.3319	15.578	1180.0	0.3101
6	0.000	Required	0.2656	7.364	1021.5	0.2800	14.184	1123.4	0.2602
7	0.000		0.2421	6.276	935.2	0.2462	12.090	1013.9	0.2275
8	0.000		0.2270	4.970	842.5	0.2227	9.438	885.8	0.2055
9	0.000		0.2209	2.018	664.4	0.2124	3.860	679.8	0.1960
10	0.000		0.2197	1.265	625.2	0.2107	2.400	633.1	0.1945
	Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6
1	3.700	632.2	0.7396	4.716	613.4	0.7396	6.411	666.5	0.7396
2	17.552	921.7	0.7221	21.904	788.6	0.7252	28.337	1002.0	0.7233
3	23.569	992.9	0.5593	28.975	840.6	0.5782	35.666	1001.0	0.5751
4	24.683	1006.6	0.4070	30.857	889.4	0.4345	37.353	984.3	0.4336
5	23.684	996.3	0.3278	30.339	921.6	0.3561	36.565	961.6	0.3563
6	21.879	967.8	0.2769	28.889	946.1	0.3039	34.738	930.9	0.3046
7	18.842	906.0	0.2428	25.806	942.9	0.2678	31.164	892.5	0.2687
8	14.128	785.0	0.2189	19.563	843.4	0.2410	23.720	806.4	0.2423
9	5.537	635.2	0.2084	7.551	655.2	0.2285	9.101	644.9	0.2302
10	3.353	603.5	0.2061	4.476	613.3	0.2249	5.344	608.1	0.2268

Table 4-155. LS1 Burnup and TH Feedback Parameters Assembly A4 (Continued)

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	7.550	677.8	0.7396	8.734	634.1	0.7396	9.332	623.3	0.7396
2	32.264	1001.2	0.7223	36.451	824.7	0.7239	38.528	777.5	0.7248
3	39.710	994.2	0.5736	45.082	899.9	0.5817	47.784	841.3	0.5867
4	41.336	985.6	0.4333	47.285	946.1	0.4424	50.268	876.8	0.4489
5	40.497	978.6	0.3565	46.377	940.4	0.3642	49.434	886.4	0.3702
6	38.572	965.1	0.3048	43.997	904.0	0.3112	47.061	887.3	0.3166
7	34.711	927.0	0.2688	39.348	844.3	0.2743	42.211	861.4	0.2792
8	26.427	825.2	0.2424	29.756	754.4	0.2476	31.957	782.2	0.2520
9	10.138	653.0	0.2305	11.363	628.1	0.2357	12.208	639.9	0.2401
10	5.930	612.9	0.2272	6.599	598.1	0.2323	7.061	604.4	0.2364

	Statepoint 10 (495.2, EOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	10.221	616.5	0.7396
2	41.282	729.5	0.7261
3	51.134	760.8	0.5944
4	54.332	810.4	0.4617
5	54.085	853.8	0.3843
6	52.231	894.1	0.3303
7	47.595	911.3	0.2920
8	36.314	832.7	0.2633
9	13.921	657.9	0.2508
10	7.992	613.4	0.2467

Table 4-156. LS1 Burnup and TH Feedback Parameters Assembly A5

	Datapoint 1 (BOC Cy 4)			Datapoint 2 (208.6 EFPD Cy 4)			Datapoint 3 (BOC Cy 5)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 4	0.00 Cy 4	0.00 Cy 4	208.6 Cy 4	208.6 Cy 4	208.6 Cy 4	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5
1	0.000		0.7396	1.108	623.9	0.7396	2.280	645.6	0.7396
2	0.000		0.7129	5.195	872.6	0.7295	10.770	1014.4	0.7209
3	0.000		0.5113	7.979	1074.5	0.5818	15.408	1195.6	0.5502
4	0.000	Data	0.3691	8.865	1154.6	0.4171	16.351	1202.6	0.3921
5	0.000	Not	0.3041	8.215	1095.0	0.3323	15.493	1177.2	0.3120
6	0.000	Required	0.2653	7.173	1005.8	0.2810	14.081	1133.6	0.2615
7	0.000		0.2419	5.944	910.4	0.2483	12.022	1041.5	0.2282
8	0.000		0.2268	4.804	831.2	0.2255	9.450	902.2	0.2065
9	0.000		0.2209	1.944	660.5	0.2154	3.808	681.3	0.1972
10	0.000		0.2197	1.213	622.6	0.2137	2.351	633.3	0.1957
	Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6
1	4.006	647.9	0.7396	5.842	659.0	0.7396	7.551	667.5	0.7396
2	18.781	1013.4	0.7182	26.155	994.6	0.7162	32.254	972.7	0.7161
3	24.942	1102.6	0.5439	33.334	1048.6	0.5432	40.081	1005.8	0.5463
4	25.967	1109.1	0.3903	34.875	1089.8	0.3941	41.763	1018.1	0.3996
5	24.753	1081.3	0.3125	34.041	1121.4	0.3170	40.698	998.0	0.3227
6	22.734	1035.7	0.2627	32.301	1145.1	0.2662	38.549	963.5	0.2719
7	19.596	960.0	0.2294	28.892	1122.3	0.2309	34.794	935.2	0.2376
8	14.748	819.3	0.2077	21.786	950.3	0.2074	26.260	828.7	0.2135
9	5.776	648.3	0.1987	8.487	689.7	0.1979	10.177	652.7	0.2037
10	3.502	612.0	0.1972	5.088	634.8	0.1962	6.033	612.2	0.2016

Table 4-156. LS1 Burnup and TH Feedback Parameters Assembly A5 (Continued)

Node No.	Statepoint 7 (BOC Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 8 (193.2 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 9 (306.8 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	8.338	639.6	0.7396	8.977	599.3	0.7396	9.199	583.1	0.7396
2	34.872	827.3	0.7173	37.000	684.7	0.7185	37.715	630.1	0.7191
3	43.123	863.6	0.5527	45.921	720.1	0.5589	46.930	655.7	0.5625
4	45.028	891.0	0.4081	48.291	749.6	0.4157	49.656	691.0	0.4218
5	44.036	900.1	0.3310	47.398	755.9	0.3380	49.059	721.8	0.3447
6	41.980	912.0	0.2801	45.205	747.1	0.2862	47.039	740.3	0.2923
7	38.760	983.3	0.2472	41.557	720.0	0.2521	43.317	732.4	0.2573
8	29.424	879.9	0.2219	31.429	672.5	0.2263	32.792	691.0	0.2308
9	11.405	670.7	0.2114	12.141	601.7	0.2155	12.656	609.2	0.2197
10	6.714	621.1	0.2087	7.109	583.7	0.2125	7.383	587.4	0.2163

Node No.	Statepoint 10 (495.2, EOC Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	9.496	578.6	0.7396
2	38.605	612.6	0.7197
3	48.104	627.0	0.5671
4	51.309	654.4	0.4307
5	51.160	681.0	0.3559
6	49.597	709.2	0.3046
7	46.161	727.3	0.2693
8	35.265	704.0	0.2422
9	13.633	616.0	0.2303
10	7.899	590.7	0.2259

Table 4-157. LS1 Burnup and TH Feedback Parameters Assembly A6

	Datapoint 1 (BOC Cy 4)			Datapoint 2 (208.6 EFPD Cy 4)			Datapoint 3 (BOC Cy 5)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 4	**0.00 Cy 4**	**0.00 Cy 4**	**208.6 Cy 4**	**208.6 Cy 4**	**208.6 Cy 4**	**0.00 Cy 5**	**0.00 Cy 5**	**0.00 Cy 5**
1	0.000		0.7396	1.121	624.7	0.7396	2.171	636.3	0.7396
2	0.000		0.7196	5.296	880.0	0.7280	10.596	985.7	0.7237
3	0.000		0.5323	7.836	1061.6	0.5846	15.007	1164.4	0.5594
4	0.000	Data	0.3917	8.407	1112.0	0.4240	15.476	1152.3	0.4031
5	0.000	Not	0.3259	7.691	1049.0	0.3414	14.430	1114.1	0.3242
6	0.000	Required	0.2860	6.670	965.6	0.2909	12.948	1062.9	0.2743
7	0.000		0.2615	5.424	873.1	0.2585	10.844	974.1	0.2413
8	0.000		0.2466	4.288	797.4	0.2365	8.453	859.2	0.2197
9	0.000		0.2408	1.722	648.8	0.2270	3.389	668.0	0.2106
10	0.000		0.2395	1.073	615.5	0.2253	2.086	625.3	0.2092
	Datapoint 4 (239.5 EFPD Cy 5)			**Datapoint 5 (BOC Cy 6)**			**Datapoint 6 (196.1 Cy 6)**		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	239.5 Cy 5	**239.5 Cy 5**	**239.5 Cy 5**	**0.00 Cy 6**	**0.00 Cy 6**	**0.00 Cy 6**	**196.1 Cy 6**	**196.1 Cy 6**	**196.1 Cy 6**
1	3.547	629.3	0.7396	4.616	616.3	0.7396	5.858	636.7	0.7396
2	17.117	908.4	0.7247	21.575	795.2	0.7272	26.266	858.0	0.7281
3	22.846	977.6	0.5702	28.239	839.8	0.5867	33.277	868.4	0.5944
4	23.503	990.8	0.4195	29.664	888.6	0.4450	34.789	874.8	0.4560
5	22.323	981.4	0.3408	28.977	921.6	0.3671	34.026	869.1	0.3781
6	20.414	952.3	0.2896	27.421	945.9	0.3146	32.291	856.0	0.3250
7	17.290	886.7	0.2552	24.245	942.3	0.2783	28.817	834.5	0.2882
8	12.891	771.3	0.2316	18.306	842.2	0.2516	21.894	767.9	0.2612
9	4.961	630.5	0.2216	6.947	653.9	0.2396	8.268	632.4	0.2489
10	2.981	601.0	0.2195	4.089	612.7	0.2363	4.812	600.4	0.2453

Table 4-157. LS1 Burnup and TH Feedback Parameters Assembly A6 (Continued)

Node No.	Statepoint 7 (BOC Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 8 (193.2 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 9 (306.8 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	6.571	631.8	0.7396	8.000	650.3	0.7396	8.778	643.3	0.7396
2	28.743	810.8	0.7288	34.006	908.9	0.7285	36.835	872.7	0.7285
3	35.966	822.1	0.5995	42.440	990.7	0.5985	45.990	953.7	0.5991
4	37.645	841.5	0.4637	44.422	1017.3	0.4614	48.195	985.9	0.4617
5	36.960	850.8	0.3859	43.383	986.3	0.3831	47.221	995.4	0.3829
6	35.247	853.3	0.3324	40.912	923.2	0.3299	44.644	979.9	0.3292
7	31.679	842.2	0.2952	36.268	840.9	0.2933	39.498	909.8	0.2923
8	24.189	778.8	0.2677	27.448	749.8	0.2667	29.764	795.7	0.2657
9	9.143	638.4	0.2552	10.367	628.1	0.2547	11.254	643.9	0.2539
10	5.292	603.7	0.2514	5.982	599.3	0.2511	6.486	608.2	0.2505

Node No.	Statepoint 10 (495.2, EOC Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	10.001	638.7	0.7396
2	40.685	807.4	0.7291
3	50.495	842.8	0.6038
4	53.419	898.5	0.4691
5	53.025	946.3	0.3901
6	50.959	990.5	0.3352
7	45.900	998.3	0.2965
8	34.755	881.5	0.2684
9	13.216	672.6	0.2561
10	7.588	622.9	0.2527

Table 4-158. LS1 Burnup and TH Feedback Parameters Assembly A7

	Datapoint 1 (BOC Cy 4)			Datapoint 2 (208.6 EFPD Cy 4)			Datapoint 3 (BOC Cy 5)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 4	0.00 Cy 4	0.00 Cy 4	208.6 Cy 4	208.6 Cy 4	208.6 Cy 4	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5
1	0.000		0.7396	1.160	627.0	0.7396	2.419	652.3	0.7396
2	0.000		0.7128	5.477	893.6	0.7270	11.512	1065.3	0.7163
3	0.000		0.5106	8.353	1107.9	0.5680	16.144	1240.7	0.5333
4	0.000	Data	0.3683	9.251	1191.6	0.4017	16.977	1232.6	0.3763
5	0.000	Not	0.3032	8.639	1133.6	0.3182	16.197	1211.5	0.2982
6	0.000	Required	0.2644	7.636	1044.5	0.2674	14.824	1166.6	0.2488
7	0.000		0.2409	6.252	933.5	0.2352	12.393	1048.5	0.2167
8	0.000		0.2258	4.864	835.3	0.2137	9.466	898.2	0.1962
9	0.000		0.2200	1.953	660.9	0.2043	3.801	680.2	0.1875
10	0.000		0.2188	1.228	623.4	0.2028	2.362	633.0	0.1861
	Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6
1	4.231	652.5	0.7396	6.035	657.1	0.7396	6.920	614.0	0.7396
2	19.748	1030.2	0.7144	26.907	978.2	0.7139	30.259	761.4	0.7171
3	25.776	1110.4	0.5306	34.037	1038.4	0.5346	38.627	836.1	0.5521
4	26.660	1114.4	0.3780	35.539	1087.5	0.3861	40.879	891.1	0.4092
5	25.545	1088.1	0.3019	34.835	1121.5	0.3101	40.191	892.3	0.3312
6	23.655	1048.9	0.2531	33.226	1145.4	0.2600	38.298	870.9	0.2788
7	20.498	996.4	0.2206	29.823	1124.7	0.2254	34.431	837.1	0.2427
8	15.514	863.6	0.1990	22.690	960.0	0.2018	26.250	766.1	0.2182
9	6.108	663.9	0.1902	8.933	695.5	0.1922	10.299	634.8	0.2078
10	3.719	621.0	0.1887	5.379	638.3	0.1905	6.125	601.7	0.2046

Table 4-158. LS1 Burnup and TH Feedback Parameters Assembly A7 (Continued)

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	7.571	625.4	0.7396	8.028	588.0	0.7396	8.218	579.8	0.7396
2	32.476	780.5	0.7186	33.959	645.7	0.7199	34.555	618.4	0.7204
3	41.110	798.8	0.5598	43.061	669.2	0.5686	43.840	633.7	0.5720
4	43.548	819.7	0.4198	46.080	703.7	0.4370	47.134	660.0	0.4440
5	42.976	833.1	0.3422	45.820	722.9	0.3634	47.121	684.5	0.3737
6	41.147	840.7	0.2895	44.062	727.3	0.3114	45.573	706.0	0.3240
7	37.220	833.7	0.2533	39.973	717.2	0.2744	41.579	715.9	0.2881
8	28.517	775.6	0.2283	30.606	677.4	0.2478	31.943	688.3	0.2615
9	11.203	641.0	0.2177	11.941	601.8	0.2349	12.430	606.8	0.2472
10	6.619	604.9	0.2138	6.988	582.3	0.2286	7.232	584.7	0.2392

	Statepoint 10 (495.2, EOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	8.443	574.2	0.7396
2	35.222	599.9	0.7210
3	44.665	607.6	0.5754
4	48.300	626.5	0.4515
5	48.703	650.3	0.3859
6	47.667	680.6	0.3421
7	44.147	709.8	0.3119
8	34.323	698.2	0.2879
9	13.333	611.9	0.2720
10	7.677	586.9	0.2606

Table 4-159. LS1 Burnup and TH Feedback Parameters Assembly A8

Node No.	Datapoint 1 (BOC Cy 4) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Datapoint 2 (208.6 EFPD Cy 4) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Datapoint 3 (BOC Cy 5) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 4	0.00 Cy 4	0.00 Cy 4	208.6 Cy 4	208.6 Cy 4	208.6 Cy 4	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5
1	0.000		0.7396	0.975	616.0	0.7396	2.087	641.0	0.7396
2	0.000		0.7206	4.685	852.3	0.7325	10.198	1036.0	0.7226
3	0.000		0.5325	7.497	1033.3	0.6029	15.007	1205.6	0.5603
4	0.000	Data	0.3875	8.464	1117.2	0.4389	15.891	1195.4	0.4037
5	0.000	Not	0.3199	7.799	1058.3	0.3510	14.908	1157.0	0.3221
6	0.000	Required	0.2795	6.761	972.7	0.2978	13.450	1108.4	0.2707
7	0.000		0.2552	5.581	884.1	0.2642	11.444	1018.9	0.2369
8	0.000		0.2404	4.556	814.7	0.2404	9.044	887.9	0.2153
9	0.000		0.2342	1.835	654.7	0.2298	3.614	675.5	0.2060
10	0.000		0.2330	1.139	618.9	0.2280	2.221	629.7	0.2045

Node No.	Datapoint 4 (239.5 EFPD Cy 5) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Datapoint 5 (BOC Cy 6) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Datapoint 6 (196.1 Cy 6) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6
1	3.923	653.8	0.7396	5.319	634.2	0.7396	7.015	666.6	0.7396
2	18.686	1049.6	0.7169	24.624	890.5	0.7190	30.724	972.9	0.7184
3	24.815	1124.4	0.5442	32.003	958.7	0.5557	38.596	992.5	0.5572
4	25.655	1120.8	0.3933	33.471	1004.5	0.4087	40.218	1005.8	0.4125
5	24.332	1094.1	0.3154	32.534	1033.9	0.3307	39.079	988.4	0.3350
6	22.239	1045.8	0.2655	30.739	1057.1	0.2793	36.910	957.0	0.2837
7	18.992	958.3	0.2324	27.303	1042.4	0.2440	33.188	933.8	0.2492
8	14.147	808.3	0.2117	20.402	896.6	0.2203	24.910	831.0	0.2250
9	5.462	642.9	0.2031	7.791	670.6	0.2106	9.468	652.0	0.2150
10	3.302	609.0	0.2018	4.638	623.1	0.2087	5.575	611.7	0.2129

Table 4-159. LS1 Burnup and TH Feedback Parameters Assembly A8 (Continued)

Node No.	Statepoint 7 (BOC Cy 7) Burnup (GWd/MTU) 0.00 Cy 7	Fuel Temp. (K) 0.00 Cy 7	Mod. Dens. (g/cm^3) 0.00 Cy 7	Statepoint 8 (193.2 EFPD Cy 7) Burnup (GWd/MTU) 193.2 Cy 7	Fuel Temp. (K) 193.2 Cy 7	Mod. Dens. (g/cm^3) 193.2 Cy 7	Statepoint 9 (306.8 EFPD Cy 7) Burnup (GWd/MTU) 306.8 Cy 7	Fuel Temp. (K) 306.8 Cy 7	Mod. Dens. (g/cm^3) 306.8 Cy 7
1	7.803	639.8	0.7396	8.401	596.7	0.7396	8.626	583.4	0.7396
2	33.380	831.9	0.7194	35.428	679.8	0.7206	36.167	632.4	0.7211
3	41.620	861.5	0.5628	44.285	711.8	0.5687	45.308	657.1	0.5724
4	43.462	888.4	0.4202	46.560	738.9	0.4278	47.911	689.6	0.4336
5	42.399	897.9	0.3426	45.603	745.7	0.3496	47.178	712.7	0.3557
6	40.320	909.3	0.2912	43.421	739.1	0.2973	45.138	727.7	0.3031
7	37.131	980.1	0.2581	39.866	716.2	0.2631	41.544	723.6	0.2681
8	28.058	877.9	0.2326	30.034	670.7	0.2371	31.350	686.3	0.2415
9	10.672	668.5	0.2218	11.380	600.2	0.2260	11.868	606.7	0.2301
10	6.243	620.0	0.2192	6.620	582.7	0.2230	6.878	586.0	0.2268

Node No.	Statepoint 10 (495.2, EOC Cy 7) Burnup (GWd/MTU) 495.2 Cy 7	Fuel Temp. (K) 495.2 Cy 7	Mod. Dens. (g/cm^3) 495.2 Cy 7
1	8.891	576.6	0.7396
2	36.978	608.1	0.7217
3	46.377	621.1	0.5765
4	49.440	647.2	0.4422
5	49.160	673.9	0.3671
6	47.571	701.4	0.3156
7	44.264	719.4	0.2803
8	33.729	698.1	0.2532
9	12.784	612.6	0.2410
10	7.357	588.7	0.2366

Table 4-160. LS1 Burnup and TH Feedback Parameters Assembly A9

Node No.	Datapoint 1 (BOC Cy 4) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Datapoint 2 (208.6 EFPD Cy 4) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Datapoint 3 (BOC Cy 5) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 4	0.00 Cy 4	0.00 Cy 4	208.6 Cy 4	208.6 Cy 4	208.6 Cy 4	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5
1	0.000		0.7396	1.061	621.1	0.7396	2.231	645.4	0.7396
2	0.000		0.7176	5.010	876.9	0.7306	10.620	1046.9	0.7202
3	0.000		0.5253	7.806	1059.6	0.5895	15.277	1200.7	0.5524
4	0.000	Data	0.3812	8.809	1149.3	0.4236	16.268	1199.3	0.3950
5	0.000	Not	0.3139	8.303	1102.7	0.3362	15.668	1187.8	0.3134
6	0.000	Required	0.2737	7.381	1023.0	0.2825	14.524	1161.2	0.2609
7	0.000		0.2495	6.027	916.6	0.2485	12.185	1050.3	0.2267
8	0.000		0.2344	4.740	827.0	0.2259	9.361	900.0	0.2053
9	0.000		0.2282	1.907	658.5	0.2160	3.750	679.9	0.1963
10	0.000		0.2270	1.192	621.5	0.2143	2.319	632.6	0.1949

Node No.	Datapoint 4 (239.5 EFPD Cy 5) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Datapoint 5 (BOC Cy 6) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Datapoint 6 (196.1 Cy 6) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6
1	4.112	656.2	0.7396	5.725	646.3	0.7396	7.421	666.6	0.7396
2	19.149	1052.6	0.7153	25.734	936.0	0.7164	31.969	984.4	0.7167
3	25.156	1130.1	0.5385	32.938	1002.0	0.5459	39.703	1007.3	0.5492
4	26.191	1133.6	0.3865	34.616	1051.2	0.3974	41.318	1001.9	0.4025
5	25.240	1105.6	0.3086	34.085	1084.7	0.3194	40.473	975.1	0.3251
6	23.502	1059.9	0.2581	32.702	1113.9	0.2676	38.623	936.8	0.2735
7	20.207	990.7	0.2245	29.345	1108.9	0.2320	34.606	885.2	0.2380
8	15.103	845.3	0.2031	22.139	950.0	0.2081	26.150	796.4	0.2141
9	5.921	657.6	0.1945	8.662	691.2	0.1986	10.205	644.5	0.2045
10	3.600	617.7	0.1931	5.201	635.5	0.1968	6.065	607.9	0.2024

Table 4-160. LS1 Burnup and TH Feedback Parameters Assembly A9 (Continued)

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	8.517	673.1	0.7396	9.034	591.7	0.7396	9.254	582.9	0.7396
2	35.693	971.8	0.7169	37.316	654.1	0.7183	37.983	625.3	0.7189
3	43.677	984.4	0.5512	45.909	685.7	0.5611	46.807	645.0	0.5649
4	45.273	981.8	0.4057	48.225	729.7	0.4247	49.439	675.8	0.4327
5	44.366	973.3	0.3286	47.651	750.9	0.3509	49.117	701.4	0.3619
6	42.408	958.5	0.2770	45.733	753.5	0.2990	47.405	722.9	0.3119
7	38.116	922.2	0.2413	41.239	740.6	0.2623	43.007	733.2	0.2760
8	28.833	822.4	0.2173	31.201	694.0	0.2367	32.682	703.1	0.2504
9	11.251	653.9	0.2075	12.093	607.4	0.2248	12.642	612.3	0.2374
10	6.655	613.2	0.2053	7.080	585.2	0.2202	7.355	587.5	0.2310

	Statepoint 10 (495.2, EOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	9.529	577.3	0.7396
2	38.769	606.7	0.7195
3	47.802	617.0	0.5689
4	50.840	639.9	0.4415
5	50.990	667.4	0.3760
6	49.833	701.1	0.3317
7	45.919	731.7	0.3007
8	35.341	715.7	0.2769
9	13.663	618.4	0.2623
10	7.863	590.3	0.2526

Table 4-161. LS1 Burnup and TH Feedback Parameters Assembly A10

	Datapoint 1 (BOC Cy 4)			Datapoint 2 (208.6 EFPD Cy 4)			Datapoint 3 (BOC Cy 5)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 4	0.00 Cy 4	0.00 Cy 4	208.6 Cy 4	208.6 Cy 4	208.6 Cy 4	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5
1	0.000		0.7396	1.254	632.7	0.7396	2.414	644.7	0.7396
2	0.000		0.7123	5.818	919.6	0.7247	11.420	1017.2	0.7192
3	0.000		0.5117	8.374	1109.4	0.5614	15.708	1184.1	0.5410
4	0.000	Data	0.3727	8.942	1161.9	0.4003	16.300	1186.9	0.3846
5	0.000	Not	0.3090	8.231	1096.4	0.3204	15.360	1159.4	0.3076
6	0.000	Required	0.2705	7.165	1005.2	0.2718	13.871	1110.4	0.2590
7	0.000		0.2469	5.833	902.4	0.2406	11.640	1013.3	0.2268
8	0.000		0.2319	4.555	814.8	0.2196	8.971	881.3	0.2058
9	0.000		0.2259	1.819	653.8	0.2105	3.590	675.0	0.1969
10	0.000		0.2247	1.138	618.8	0.2089	2.218	629.6	0.1955
	Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6
1	4.152	648.5	0.7396	5.547	634.1	0.7396	7.287	669.6	0.7396
2	19.380	1009.5	0.7172	25.210	883.2	0.7194	31.476	987.2	0.7190
3	25.083	1090.2	0.5394	32.197	953.5	0.5525	39.004	1011.0	0.5543
4	25.804	1100.2	0.3871	33.574	1001.1	0.4046	40.457	1017.7	0.4080
5	24.559	1076.7	0.3111	32.709	1029.8	0.3280	39.356	997.2	0.3318
6	22.483	1032.8	0.2624	30.916	1051.8	0.2777	37.180	964.8	0.2813
7	19.088	951.5	0.2298	27.321	1036.4	0.2429	33.087	924.3	0.2465
8	14.026	805.6	0.2084	20.246	894.1	0.2189	24.733	829.5	0.2224
9	5.409	641.6	0.1997	7.721	669.8	0.2089	9.425	653.5	0.2124
10	3.272	607.8	0.1982	4.592	622.4	0.2068	5.550	612.8	0.2102

Table 4-161. LS1 Burnup and TH Feedback Parameters Assembly A10 (Continued)

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	8.366	671.2	0.7396	8.914	593.6	0.7396	9.136	583.1	0.7396
2	35.065	953.0	0.7191	36.849	663.7	0.7205	37.545	628.1	0.7211
3	42.904	974.2	0.5564	45.373	700.0	0.5670	46.310	648.7	0.5709
4	44.455	987.7	0.4111	47.734	750.6	0.4310	48.974	678.4	0.4390
5	43.366	989.3	0.3349	47.046	777.0	0.3577	48.519	702.1	0.3685
6	41.173	987.1	0.2842	44.912	781.0	0.3062	46.598	724.4	0.3189
7	36.945	968.5	0.2491	40.448	765.3	0.2696	42.275	739.6	0.2834
8	27.735	860.1	0.2246	30.356	709.4	0.2433	31.932	713.1	0.2575
9	10.592	665.0	0.2145	11.518	611.9	0.2314	12.102	615.5	0.2446
10	6.209	619.2	0.2122	6.682	587.8	0.2271	6.974	589.0	0.2386

	Statepoint 10 (495.2, EOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	9.452	579.8	0.7396
2	38.469	614.7	0.7218
3	47.474	626.5	0.5755
4	50.575	651.4	0.4489
5	50.605	680.1	0.3838
6	49.252	715.3	0.3395
7	45.412	746.4	0.3079
8	34.767	727.0	0.2831
9	13.188	622.0	0.2690
10	7.521	592.4	0.2601

Table 4-162. LS1 Burnup and TH Feedback Parameters Assembly A11

	Datapoint 1 (BOC Cy 4)			Datapoint 2 (208.6 EFPD Cy 4)			Datapoint 3 (BOC Cy 5)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 4	0.00 Cy 4	0.00 Cy 4	208.6 Cy 4	208.6 Cy 4	208.6 Cy 4	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5
1	0.000		0.7396	1.378	640.2	0.7396	2.637	652.3	0.7396
2	0.000		0.7136	6.350	961.9	0.7193	12.424	1069.6	0.7134
3	0.000		0.5143	8.979	1165.7	0.5376	16.682	1229.6	0.5184
4	0.000	Data	0.3742	9.460	1212.3	0.3778	17.125	1224.8	0.3644
5	0.000	Not	0.3099	8.667	1136.3	0.3013	16.093	1195.3	0.2907
6	0.000	Required	0.2712	7.483	1031.7	0.2551	14.404	1135.2	0.2445
7	0.000		0.2476	5.942	910.5	0.2260	11.778	1016.4	0.2144
8	0.000		0.2327	4.497	811.0	0.2069	8.852	876.0	0.1949
9	0.000		0.2267	1.797	652.7	0.1986	3.549	673.7	0.1868
10	0.000		0.2255	1.135	618.7	0.1972	2.211	629.3	0.1854
	Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6
1	4.026	630.0	0.7396	4.959	608.9	0.7396	6.680	668.3	0.7396
2	18.734	894.5	0.7180	22.670	763.9	0.7219	29.035	996.0	0.7200
3	24.351	966.0	0.5432	29.407	819.3	0.5661	36.259	1014.9	0.5636
4	25.107	987.6	0.3938	31.020	872.5	0.4265	37.914	1018.6	0.4255
5	23.962	979.7	0.3185	30.387	906.1	0.3517	37.036	997.3	0.3509
6	21.886	953.4	0.2702	28.690	931.8	0.3020	34.950	964.4	0.3011
7	18.344	894.2	0.2383	25.127	930.3	0.2683	31.097	940.7	0.2678
8	13.391	776.8	0.2156	18.683	834.5	0.2426	23.265	836.3	0.2420
9	5.176	633.0	0.2056	7.130	652.3	0.2303	8.833	653.4	0.2300
10	3.135	602.2	0.2030	4.218	611.5	0.2261	5.178	613.0	0.2262

Table 4-162. LS1 Burnup and TH Feedback Parameters Assembly A11 (Continued)

Node No.	Statepoint 7 (BOC Cy 7) Burnup (GWd/MTU) 0.00 Cy 7	Fuel Temp. (K) 0.00 Cy 7	Mod. Dens. (g/cm^3) 0.00 Cy 7	Statepoint 8 (193.2 EFPD Cy 7) Burnup (GWd/MTU) 193.2 Cy 7	Fuel Temp. (K) 193.2 Cy 7	Mod. Dens. (g/cm^3) 193.2 Cy 7	Statepoint 9 (306.8 EFPD Cy 7) Burnup (GWd/MTU) 306.8 Cy 7	Fuel Temp. (K) 306.8 Cy 7	Mod. Dens. (g/cm^3) 306.8 Cy 7
1	7.495	642.6	0.7396	8.115	598.1	0.7396	8.319	581.2	0.7396
2	31.879	854.9	0.7208	33.995	684.0	0.7219	34.669	626.0	0.7224
3	39.483	885.9	0.5682	42.255	718.5	0.5739	43.199	649.5	0.5774
4	41.303	906.7	0.4314	44.550	748.5	0.4380	45.848	684.3	0.4441
5	40.471	912.4	0.3564	43.815	754.8	0.3621	45.456	719.7	0.3688
6	38.464	922.7	0.3064	41.675	746.2	0.3109	43.517	741.2	0.3170
7	35.151	995.5	0.2737	37.949	720.1	0.2772	39.720	733.5	0.2821
8	26.491	887.6	0.2467	28.515	673.5	0.2499	29.893	692.5	0.2540
9	10.063	670.9	0.2342	10.790	601.2	0.2373	11.300	608.7	0.2411
10	5.866	621.8	0.2304	6.258	583.5	0.2333	6.529	587.1	0.2368

Node No.	Statepoint 10 (495.2, EOC Cy 7) Burnup (GWd/MTU) 495.2 Cy 7	Fuel Temp. (K) 495.2 Cy 7	Mod. Dens. (g/cm^3) 495.2 Cy 7
1	8.614	578.5	0.7396
2	35.577	613.8	0.7231
3	44.383	627.5	0.5819
4	47.497	654.2	0.4528
5	47.535	679.7	0.3797
6	46.052	707.7	0.3287
7	42.552	726.6	0.2934
8	32.373	704.4	0.2647
9	12.263	615.2	0.2512
10	7.041	590.5	0.2461

Table 4-163. LS1 Burnup and TH Feedback Parameters Assembly A12

	Datapoint 1 (BOC Cy 4)			Datapoint 2 (208.6 EFPD Cy 4)			Datapoint 3 (BOC Cy 5)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 4	0.00 Cy 4	0.00 Cy 4	208.6 Cy 4	208.6 Cy 4	208.6 Cy 4	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5
1	0.000		0.7396	1.126	625.0	0.7396	2.435	656.2	0.7396
2	0.000		0.7175	5.218	874.2	0.7287	11.410	1083.2	0.7161
3	0.000		0.5275	7.928	1070.0	0.5797	15.807	1252.1	0.5357
4	0.000	Data	0.3852	8.889	1156.8	0.4159	16.632	1234.8	0.3819
5	0.000	Not	0.3180	8.396	1111.2	0.3307	15.840	1197.4	0.3041
6	0.000	Required	0.2775	7.531	1035.5	0.2782	14.399	1129.0	0.2551
7	0.000		0.2530	6.303	937.3	0.2443	12.033	1005.5	0.2233
8	0.000		0.2378	4.966	842.2	0.2214	9.285	872.6	0.2024
9	0.000		0.2313	2.023	664.7	0.2113	3.787	674.5	0.1934
10	0.000		0.2300	1.273	625.6	0.2096	2.364	630.3	0.1919
	Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6
1	4.258	653.1	0.7396	5.555	628.7	0.7396	7.255	666.9	0.7396
2	19.615	1027.7	0.7140	24.906	847.5	0.7175	31.181	987.9	0.7175
3	25.156	1088.2	0.5334	31.672	912.3	0.5512	38.471	1010.3	0.5533
4	26.006	1090.1	0.3844	33.315	967.4	0.4071	40.049	1004.6	0.4105
5	24.943	1069.3	0.3084	32.724	1001.9	0.3306	39.175	980.4	0.3344
6	22.968	1029.6	0.2598	31.113	1029.5	0.2801	37.159	946.8	0.2840
7	19.560	956.8	0.2280	27.598	1021.3	0.2459	33.133	906.2	0.2496
8	14.448	811.7	0.2066	20.603	889.8	0.2215	24.938	818.7	0.2253
9	5.623	642.3	0.1975	7.907	668.4	0.2108	9.565	650.9	0.2147
10	3.425	608.1	0.1958	4.718	621.2	0.2082	5.650	611.5	0.2120

Table 4-163. LS1 Burnup and TH Feedback Parameters Assembly A12 (Continued)

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	8.445	683.5	0.7396	9.084	599.3	0.7396	9.316	584.2	0.7396
2	35.203	1015.2	0.7170	37.346	685.7	0.7182	38.098	633.7	0.7188
3	42.688	1018.9	0.5531	45.531	722.9	0.5593	46.601	661.7	0.5632
4	44.220	1012.3	0.4112	47.509	751.2	0.4186	48.931	696.9	0.4247
5	43.291	1004.4	0.3355	46.655	756.1	0.3421	48.323	722.5	0.3483
6	41.178	990.7	0.2850	44.404	747.1	0.2907	46.219	738.3	0.2964
7	36.862	951.1	0.2505	39.724	724.1	0.2554	41.507	734.8	0.2605
8	27.783	841.4	0.2261	29.830	674.9	0.2303	31.210	692.8	0.2348
9	10.673	659.6	0.2155	11.403	601.4	0.2195	11.912	608.7	0.2235
10	6.280	616.7	0.2129	6.671	583.4	0.2166	6.941	587.1	0.2202

	Statepoint 10 (495.2, EOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	9.603	578.0	0.7396
2	38.967	611.4	0.7194
3	47.770	626.7	0.5677
4	50.590	654.7	0.4336
5	50.432	681.5	0.3596
6	48.783	709.6	0.3087
7	44.403	730.7	0.2729
8	33.718	706.2	0.2464
9	12.876	615.2	0.2342
10	7.449	590.3	0.2299

Table 4-164. LS1 Burnup and TH Feedback Parameters Assembly B1

	Datapoint 1 (BOC Cy 4)			Datapoint 2 (208.6 EFPD Cy 4)			Datapoint 3 (BOC Cy 5)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 4	0.00 Cy 4	0.00 Cy 4	208.6 Cy 4	208.6 Cy 4	208.6 Cy 4	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5
1	0.000		0.7396	1.016	618.6	0.7396	2.254	650.9	0.7396
2	0.000		0.7246	5.013	878.2	0.7301	11.289	1128.8	0.7153
3	0.000		0.5482	8.063	1084.0	0.5819	15.942	1254.7	0.5351
4	0.000	Data	0.4006	9.153	1184.4	0.4138	16.804	1225.6	0.3803
5	0.000	Not	0.3301	8.389	1112.6	0.3280	15.839	1200.5	0.3016
6	0.000	Required	0.2880	7.219	1011.2	0.2772	14.347	1161.5	0.2522
7	0.000		0.2629	5.804	901.3	0.2456	12.073	1063.8	0.2198
8	0.000		0.2478	4.592	818.0	0.2240	9.291	908.4	0.1995
9	0.000		0.2419	1.816	653.9	0.2145	3.603	676.4	0.1912
10	0.000		0.2406	1.124	618.3	0.2129	2.203	629.7	0.1900
	Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6
1	4.084	653.7	0.7396	5.717	647.7	0.7396	7.424	667.6	0.7396
2	19.285	1013.6	0.7145	25.688	924.1	0.7162	31.490	948.5	0.7164
3	25.334	1093.4	0.5348	32.979	993.2	0.5442	39.401	979.3	0.5483
4	26.357	1106.0	0.3832	34.607	1039.1	0.3959	41.214	995.1	0.4028
5	25.079	1081.6	0.3061	33.729	1070.8	0.3188	40.348	996.2	0.3264
6	22.989	1036.6	0.2570	31.957	1096.6	0.2683	38.266	969.9	0.2752
7	19.685	963.8	0.2244	28.514	1085.4	0.2334	34.183	917.8	0.2398
8	14.644	823.1	0.2032	21.358	928.8	0.2098	25.779	825.4	0.2164
9	5.586	649.2	0.1949	8.224	686.3	0.2005	9.986	657.0	0.2074
10	3.354	612.1	0.1934	4.885	632.4	0.1986	5.879	614.9	0.2052

Table 4-164. LS1 Burnup and TH Feedback Parameters Assembly B1 (Continued)

Node No.	Statepoint 7 (BOC Cy 7) Burnup (GWd/MTU) 0.00 Cy 7	Fuel Temp. (K) 0.00 Cy 7	Mod. Dens. (g/cm^3) 0.00 Cy 7	Statepoint 8 (193.2 EFPD Cy 7) Burnup (GWd/MTU) 193.2 Cy 7	Fuel Temp. (K) 193.2 Cy 7	Mod. Dens. (g/cm^3) 193.2 Cy 7	Statepoint 9 (306.8 EFPD Cy 7) Burnup (GWd/MTU) 306.8 Cy 7	Fuel Temp. (K) 306.8 Cy 7	Mod. Dens. (g/cm^3) 306.8 Cy 7
1	8.112	629.4	0.7396	8.463	581.5	0.7396	8.605	574.9	0.7396
2	33.722	782.8	0.7178	34.804	622.4	0.7187	35.229	602.1	0.7191
3	42.130	827.6	0.5558	43.620	643.1	0.5622	44.188	614.3	0.5647
4	44.236	862.1	0.4129	46.245	672.8	0.4241	47.011	632.6	0.4291
5	43.455	872.5	0.3364	45.771	691.0	0.3485	46.701	648.3	0.3549
6	41.384	873.8	0.2848	43.823	698.4	0.2963	44.913	663.8	0.3035
7	37.546	904.7	0.2503	39.898	693.1	0.2608	41.096	674.5	0.2683
8	28.907	876.0	0.2275	30.704	660.6	0.2368	31.746	659.2	0.2441
9	11.283	677.5	0.2180	11.954	598.3	0.2265	12.360	599.4	0.2333
10	6.602	625.0	0.2152	6.946	581.0	0.2227	7.152	581.4	0.2287

Node No.	Statepoint 10 (495.2, EOC Cy 7) Burnup (GWd/MTU) 495.2 Cy 7	Fuel Temp. (K) 495.2 Cy 7	Mod. Dens. (g/cm^3) 495.2 Cy 7
1	8.797	572.1	0.7396
2	35.771	592.7	0.7195
3	44.870	599.8	0.5676
4	47.964	614.8	0.4355
5	47.971	632.5	0.3646
6	46.562	654.4	0.3160
7	43.081	674.3	0.2824
8	33.574	665.0	0.2582
9	13.095	602.7	0.2468
10	7.525	583.0	0.2406

Table 4-165. LS1 Burnup and TH Feedback Parameters Assembly B2

	Datapoint 1 (BOC Cy 4)			Datapoint 2 (208.6 EFPD Cy 4)			Datapoint 3 (BOC Cy 5)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 4	**0.00 Cy 4**	**0.00 Cy 4**	**208.6 Cy 4**	**208.6 Cy 4**	**208.6 Cy 4**	**0.00 Cy 5**	**0.00 Cy 5**	**0.00 Cy 5**
1	0.000		0.7396	1.363	639.5	0.7396	2.694	658.1	0.7396
2	0.000		0.7098	6.539	979.0	0.7167	12.857	1098.2	0.7097
3	0.000		0.5032	9.281	1197.2	0.5262	16.899	1221.3	0.5090
4	0.000	Data	0.3643	9.849	1254.1	0.3658	17.461	1220.6	0.3561
5	0.000	Not	0.3015	8.980	1168.0	0.2903	16.472	1205.6	0.2833
6	0.000	Required	0.2638	7.728	1054.2	0.2452	14.888	1165.4	0.2377
7	0.000		0.2409	6.200	930.8	0.2169	12.522	1069.7	0.2075
8	0.000		0.2261	4.761	829.3	0.1979	9.521	913.9	0.1876
9	0.000		0.2203	1.866	656.6	0.1896	3.710	680.3	0.1793
10	0.000		0.2192	1.163	620.2	0.1884	2.276	631.9	0.1780
	Datapoint 4 (239.5 EFPD Cy 5)			**Datapoint 5 (BOC Cy 6)**			**Datapoint 6 (196.1 Cy 6)**		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	239.5 Cy 5	**239.5 Cy 5**	**239.5 Cy 5**	**0.00 Cy 6**	**0.00 Cy 6**	**0.00 Cy 6**	**196.1 Cy 6**	**196.1 Cy 6**	**196.1 Cy 6**
1	3.989	625.3	0.7396	4.840	604.6	0.7396	5.885	624.3	0.7396
2	18.509	853.6	0.7163	21.888	732.5	0.7207	26.112	823.4	0.7225
3	23.844	919.1	0.5416	28.209	779.4	0.5662	34.481	967.4	0.5757
4	24.833	947.2	0.3948	30.067	830.8	0.4312	37.095	1032.2	0.4392
5	23.824	945.9	0.3200	29.633	866.7	0.3582	36.522	1019.7	0.3631
6	21.941	926.1	0.2716	28.171	894.1	0.3088	34.496	971.2	0.3114
7	18.831	879.1	0.2391	25.107	897.2	0.2746	30.666	909.2	0.2761
8	14.047	776.5	0.2155	19.062	818.2	0.2481	23.218	807.0	0.2497
9	5.343	633.4	0.2052	7.274	651.4	0.2363	8.851	646.6	0.2381
10	3.183	601.6	0.2020	4.239	610.4	0.2312	5.124	609.1	0.2335

Table 4-165. LS1 Burnup and TH Feedback Parameters Assembly B2 (Continued)

Node No.	Statepoint 7 (BOC Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 8 (193.2 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 9 (306.8 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	6.971	672.3	0.7396	8.053	627.7	0.7396	8.780	637.8	0.7396
2	29.836	973.0	0.7220	33.628	796.4	0.7239	36.162	834.6	0.7245
3	38.303	964.9	0.5757	43.471	885.3	0.5850	46.819	926.7	0.5878
4	40.808	950.1	0.4399	46.774	948.7	0.4502	50.461	974.7	0.4528
5	40.211	946.9	0.3641	46.103	942.6	0.3721	49.898	990.5	0.3739
6	38.168	944.6	0.3124	43.559	902.4	0.3187	47.166	963.2	0.3199
7	34.163	921.7	0.2767	38.587	829.7	0.2819	41.644	887.7	0.2826
8	25.925	826.0	0.2502	29.058	742.2	0.2550	31.303	787.9	0.2557
9	9.924	656.6	0.2386	11.160	628.9	0.2437	12.095	648.7	0.2445
10	5.727	614.5	0.2343	6.423	599.7	0.2395	6.963	611.6	0.2405

Node No.	Statepoint 10 (495.2, EOC Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	10.193	651.9	0.7396
2	40.371	835.5	0.7253
3	51.410	850.0	0.5924
4	55.499	884.6	0.4595
5	55.540	933.9	0.3808
6	53.454	989.6	0.3261
7	48.184	1012.3	0.2874
8	36.579	905.3	0.2589
9	14.348	690.6	0.2473
10	8.255	633.8	0.2434

Table 4-166. LS1 Burnup and TH Feedback Parameters Assembly B3

	Datapoint 1 (BOC Cy 4)			Datapoint 2 (208.6 EFPD Cy 4)			Datapoint 3 (BOC Cy 5)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 4	0.00 Cy 4	0.00 Cy 4	208.6 Cy 4	208.6 Cy 4	208.6 Cy 4	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5
1	0.000		0.7396	1.356	639.1	0.7396	2.489	642.8	0.7396
2	0.000		0.7165	6.329	961.4	0.7197	11.765	1000.1	0.7175
3	0.000		0.5257	8.741	1145.1	0.5415	15.558	1124.8	0.5362
4	0.000	Data	0.3867	9.197	1188.7	0.3830	16.151	1140.8	0.3819
5	0.000	Not	0.3219	8.419	1115.3	0.3064	15.296	1131.8	0.3065
6	0.000	Required	0.2825	7.298	1017.7	0.2599	13.863	1096.3	0.2586
7	0.000		0.2583	5.846	904.5	0.2304	11.596	1008.9	0.2269
8	0.000		0.2434	4.442	808.2	0.2109	8.810	878.0	0.2057
9	0.000		0.2373	1.742	650.0	0.2025	3.449	671.0	0.1969
10	0.000		0.2361	1.083	616.2	0.2012	2.109	626.3	0.1954
	Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6
1	4.208	647.7	0.7396	5.697	639.6	0.7396	7.484	673.0	0.7396
2	19.361	984.3	0.7172	25.363	895.9	0.7191	31.595	985.5	0.7187
3	24.667	1071.5	0.5402	32.037	973.1	0.5514	38.955	1022.3	0.5529
4	25.470	1087.6	0.3885	33.422	1016.3	0.4034	40.341	1022.4	0.4064
5	24.304	1063.8	0.3129	32.587	1041.7	0.3272	39.262	1001.0	0.3305
6	22.284	1020.4	0.2644	30.800	1060.0	0.2770	37.070	966.6	0.2803
7	18.940	945.8	0.2318	27.172	1037.9	0.2424	32.860	919.3	0.2456
8	13.864	806.1	0.2100	20.019	890.9	0.2183	24.419	824.1	0.2216
9	5.269	641.8	0.2012	7.605	671.2	0.2086	9.341	655.5	0.2120
10	3.154	607.5	0.1996	4.492	623.4	0.2066	5.474	614.3	0.2098

Table 4-166. LS1 Burnup and TH Feedback Parameters Assembly B3 (Continued)

Node No.	Statepoint 7 (BOC Cy 7) Burnup (GWd/MTU) 0.00 Cy 7	Fuel Temp. (K) 0.00 Cy 7	Mod. Dens. (g/cm^3) 0.00 Cy 7	Statepoint 8 (193.2 EFPD Cy 7) Burnup (GWd/MTU) 193.2 Cy 7	Fuel Temp. (K) 193.2 Cy 7	Mod. Dens. (g/cm^3) 193.2 Cy 7	Statepoint 9 (306.8 EFPD Cy 7) Burnup (GWd/MTU) 306.8 Cy 7	Fuel Temp. (K) 306.8 Cy 7	Mod. Dens. (g/cm^3) 306.8 Cy 7
1	8.603	675.9	0.7396	8.955	581.6	0.7396	9.095	574.6	0.7396
2	35.205	957.0	0.7188	36.270	621.5	0.7196	36.680	600.6	0.7200
3	42.967	991.1	0.5547	44.444	642.4	0.5609	45.015	614.4	0.5634
4	44.442	1003.7	0.4090	46.368	668.0	0.4199	47.172	636.2	0.4252
5	43.362	1003.5	0.3331	45.501	680.4	0.3449	46.496	654.5	0.3518
6	41.136	998.6	0.2826	43.328	683.6	0.2939	44.476	669.5	0.3013
7	36.736	972.4	0.2476	38.825	677.5	0.2582	40.040	676.2	0.2658
8	27.423	861.2	0.2232	29.015	648.9	0.2331	30.026	656.2	0.2405
9	10.552	669.4	0.2136	11.134	593.6	0.2226	11.517	597.3	0.2295
10	6.164	622.1	0.2114	6.463	578.6	0.2194	6.658	580.4	0.2254

Node No.	Statepoint 10 (495.2, EOC Cy 7) Burnup (GWd/MTU) 495.2 Cy 7	Fuel Temp. (K) 495.2 Cy 7	Mod. Dens. (g/cm^3) 495.2 Cy 7
1	9.255	570.1	0.7396
2	37.125	587.2	0.7203
3	45.602	594.7	0.5659
4	48.039	610.0	0.4311
5	47.690	628.3	0.3613
6	46.053	650.2	0.3141
7	41.956	670.1	0.2809
8	31.796	661.6	0.2563
9	12.211	600.5	0.2444
10	7.010	581.9	0.2385

Table 4-167. LS1 Burnup and TH Feedback Parameters Assembly B4

	Datapoint 1 (BOC Cy 4)			Datapoint 2 (208.6 EFPD Cy 4)			Datapoint 3 (BOC Cy 5)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 4	0.00 Cy 4	0.00 Cy 4	208.6 Cy 4	208.6 Cy 4	208.6 Cy 4	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5
1	0.000		0.7396	1.027	619.2	0.7396	2.253	650.0	0.7396
2	0.000		0.7269	5.033	879.8	0.7300	11.257	1122.4	0.7160
3	0.000		0.5579	8.118	1088.8	0.5807	15.959	1249.9	0.5358
4	0.000	Data	0.4084	9.224	1191.3	0.4119	16.859	1223.5	0.3801
5	0.000	Not	0.3361	8.415	1115.1	0.3263	15.834	1196.6	0.3015
6	0.000	Required	0.2931	7.191	1009.0	0.2759	14.244	1152.6	0.2524
7	0.000		0.2674	5.726	895.7	0.2446	11.885	1052.0	0.2202
8	0.000		0.2520	4.481	810.7	0.2236	9.085	899.7	0.2001
9	0.000		0.2459	1.768	651.4	0.2143	3.518	673.9	0.1919
10	0.000		0.2446	1.095	616.8	0.2129	2.150	628.2	0.1907
	Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6
1	4.101	654.7	0.7396	5.800	651.4	0.7396	7.569	671.8	0.7396
2	19.352	1021.0	0.7145	26.004	942.0	0.7155	32.209	983.1	0.7158
3	25.437	1100.0	0.5336	33.301	1009.7	0.5408	40.308	1030.2	0.5441
4	26.483	1111.7	0.3816	34.961	1057.1	0.3924	41.963	1029.8	0.3969
5	25.169	1089.0	0.3048	34.087	1092.5	0.3156	40.809	1005.1	0.3204
6	23.047	1048.5	0.2559	32.309	1121.1	0.2653	38.557	964.8	0.2701
7	19.835	987.1	0.2233	28.888	1103.8	0.2304	34.415	906.7	0.2352
8	14.875	848.8	0.2021	21.751	940.1	0.2069	25.937	809.1	0.2117
9	5.712	658.9	0.1937	8.430	690.4	0.1977	10.094	651.5	0.2025
10	3.435	618.0	0.1923	5.023	635.1	0.1959	5.964	612.1	0.2005

Table 4-167. LS1 Burnup and TH Feedback Parameters Assembly B4 (Continued)

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	8.678	674.8	0.7396	8.964	577.6	0.7396	9.082	572.4	0.7396
2	35.781	951.7	0.7162	36.636	609.5	0.7170	36.981	594.5	0.7173
3	44.296	987.7	0.5468	45.479	626.0	0.5522	45.948	605.2	0.5543
4	46.027	998.3	0.4005	47.647	650.4	0.4109	48.301	622.2	0.4155
5	44.868	997.7	0.3241	46.768	666.4	0.3366	47.591	638.0	0.3429
6	42.583	993.0	0.2735	44.622	674.5	0.2861	45.605	653.4	0.2935
7	38.225	963.3	0.2383	40.239	673.1	0.2505	41.328	663.7	0.2586
8	28.861	851.7	0.2144	30.438	648.0	0.2258	31.382	649.7	0.2339
9	11.280	667.1	0.2052	11.851	593.0	0.2154	12.209	595.0	0.2228
10	6.639	620.8	0.2031	6.926	578.0	0.2119	7.105	578.9	0.2182

	Statepoint 10 (495.2, EOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	9.225	569.1	0.7396
2	37.377	584.4	0.7176
3	46.455	590.3	0.5566
4	49.035	602.7	0.4205
5	48.601	618.0	0.3512
6	46.958	637.3	0.3053
7	43.018	656.8	0.2732
8	32.994	652.3	0.2498
9	12.843	597.2	0.2377
10	7.423	580.1	0.2311

Table 4-168. LS1 Burnup and TH Feedback Parameters Assembly B5

	Datapoint 1 (BOC Cy 4)			Datapoint 2 (208.6 EFPD Cy 4)			Datapoint 3 (BOC Cy 5)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 4	0.00 Cy 4	0.00 Cy 4	208.6 Cy 4	208.6 Cy 4	208.6 Cy 4	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5
1	0.000		0.7396	1.115	624.5	0.7396	2.106	632.0	0.7396
2	0.000		0.7257	5.299	900.7	0.7295	10.361	961.9	0.7251
3	0.000		0.5572	7.828	1062.7	0.5836	14.558	1114.9	0.5663
4	0.000	Data	0.4151	8.469	1119.7	0.4222	15.199	1114.8	0.4095
5	0.000	Not	0.3462	7.743	1055.2	0.3393	14.272	1092.1	0.3295
6	0.000	Required	0.3041	6.708	969.9	0.2887	12.877	1052.7	0.2788
7	0.000		0.2782	5.399	872.3	0.2564	10.776	971.2	0.2451
8	0.000		0.2623	4.197	792.3	0.2349	8.329	857.3	0.2228
9	0.000		0.2559	1.662	645.8	0.2258	3.274	664.6	0.2138
10	0.000		0.2547	1.027	613.4	0.2242	1.994	622.6	0.2123
	Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6
1	3.769	644.7	0.7396	5.348	644.6	0.7396	6.353	621.7	0.7396
2	17.867	977.7	0.7222	24.199	919.0	0.7221	28.023	794.7	0.7243
3	23.520	1060.3	0.5607	31.063	985.8	0.5647	35.971	859.9	0.5775
4	24.392	1077.9	0.4078	32.510	1029.0	0.4160	37.706	881.1	0.4327
5	23.184	1056.6	0.3291	31.663	1057.1	0.3376	36.725	871.1	0.3535
6	21.212	1014.2	0.2784	29.921	1075.5	0.2855	34.689	849.4	0.3003
7	18.048	941.0	0.2443	26.430	1049.7	0.2494	30.868	825.7	0.2638
8	13.346	804.0	0.2221	19.611	898.2	0.2250	23.399	781.8	0.2399
9	5.051	639.9	0.2133	7.425	673.1	0.2155	8.886	640.2	0.2297
10	3.011	606.3	0.2119	4.373	624.5	0.2137	5.276	610.0	0.2287

Table 4-168. LS1 Burnup and TH Feedback Parameters Assembly B5 (Continued)

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	7.168	642.8	0.7396	7.519	581.5	0.7396	7.664	575.2	0.7396
2	30.779	844.9	0.7246	31.903	624.8	0.7255	32.354	604.6	0.7258
3	39.476	923.0	0.5811	40.966	643.1	0.5869	41.551	615.8	0.5893
4	41.487	959.3	0.4371	43.474	671.5	0.4477	44.262	634.8	0.4527
5	40.553	965.6	0.3577	42.826	688.4	0.3692	43.788	651.3	0.3758
6	38.512	965.0	0.3039	40.893	694.8	0.3150	42.010	666.5	0.3222
7	34.513	941.1	0.2668	36.822	690.6	0.2771	38.043	676.8	0.2846
8	26.206	837.7	0.2420	27.982	659.4	0.2514	29.031	659.9	0.2586
9	10.006	660.9	0.2316	10.655	597.2	0.2402	11.055	598.8	0.2469
10	5.938	619.6	0.2310	6.267	580.2	0.2383	6.468	580.9	0.2441

	Statepoint 10 (495.2, EOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	7.850	571.8	0.7396
2	32.901	593.0	0.7262
3	42.218	599.0	0.5920
4	45.200	613.9	0.4589
5	45.049	632.1	0.3854
6	43.654	654.1	0.3347
7	40.030	674.4	0.2990
8	30.867	665.5	0.2734
9	11.776	602.0	0.2609
10	6.829	582.4	0.2560

Table 4-169. LS1 Burnup and TH Feedback Parameters Assembly B6

	Datapoint 1 (BOC Cy 4)			Datapoint 2 (208.6 EFPD Cy 4)			Datapoint 3 (BOC Cy 5)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 4	0.00 Cy 4	0.00 Cy 4	208.6 Cy 4	208.6 Cy 4	208.6 Cy 4	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5
1	0.000		0.7396	1.116	624.6	0.7396	2.178	637.4	0.7396
2	0.000		0.7151	5.381	887.4	0.7286	10.738	992.4	0.7224
3	0.000		0.5204	7.952	1073.5	0.5784	14.903	1140.5	0.5566
4	0.000	Data	0.3816	8.591	1131.0	0.4167	15.528	1138.7	0.4005
5	0.000	Not	0.3174	7.842	1063.8	0.3345	14.584	1116.3	0.3215
6	0.000	Required	0.2787	6.801	977.2	0.2846	13.249	1083.1	0.2715
7	0.000		0.2550	5.636	889.1	0.2526	11.449	1015.2	0.2378
8	0.000		0.2405	4.570	816.5	0.2301	9.088	891.6	0.2151
9	0.000		0.2344	1.809	653.6	0.2203	3.561	674.0	0.2057
10	0.000		0.2332	1.113	617.7	0.2186	2.164	627.9	0.2042
	Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6
1	4.413	675.9	0.7396	6.112	651.4	0.7396	7.386	639.0	0.7396
2	20.175	1127.0	0.7111	26.601	925.8	0.7131	31.086	843.1	0.7152
3	25.235	1169.4	0.5290	33.001	1002.4	0.5388	38.560	909.2	0.5499
4	25.737	1159.1	0.3809	34.261	1060.7	0.3935	40.685	979.7	0.4085
5	24.488	1134.1	0.3062	33.467	1097.6	0.3179	40.362	1020.4	0.3320
6	22.662	1095.1	0.2579	31.936	1122.1	0.2675	38.585	998.9	0.2791
7	19.974	1028.2	0.2248	29.070	1107.3	0.2319	34.872	928.5	0.2416
8	15.298	874.4	0.2035	22.474	961.1	0.2079	26.813	819.8	0.2164
9	5.911	666.2	0.1949	8.834	700.9	0.1983	10.567	655.4	0.2066
10	3.545	622.2	0.1936	5.252	640.7	0.1966	6.239	614.5	0.2046

Table 4-169. LS1 Burnup and TH Feedback Parameters Assembly B6 (Continued)

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	8.295	652.9	0.7396	8.625	580.2	0.7396	8.758	573.9	0.7396
2	34.068	873.1	0.7160	35.110	620.1	0.7170	35.512	599.9	0.7174
3	42.004	914.9	0.5544	43.468	641.6	0.5608	44.013	612.2	0.5632
4	44.246	930.0	0.4144	46.235	671.6	0.4255	46.960	628.8	0.4303
5	43.920	929.5	0.3379	46.244	691.5	0.3500	47.120	643.1	0.3562
6	42.109	925.1	0.2848	44.600	701.5	0.2965	45.638	658.8	0.3035
7	38.223	903.0	0.2469	40.670	698.9	0.2579	41.845	672.2	0.2656
8	29.437	816.3	0.2212	31.324	665.8	0.2311	32.373	659.9	0.2388
9	11.658	658.2	0.2113	12.351	599.5	0.2200	12.759	599.6	0.2272
10	6.892	618.8	0.2098	7.245	581.5	0.2173	7.451	581.4	0.2235

	Statepoint 10 (495.2, EOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	8.942	571.6	0.7396
2	36.042	592.0	0.7178
3	44.688	599.4	0.5661
4	47.891	613.6	0.4365
5	48.340	629.7	0.3654
6	47.223	650.7	0.3156
7	43.787	671.7	0.2796
8	34.197	664.8	0.2533
9	13.493	602.7	0.2409
10	7.823	583.0	0.2353

Table 4-170. LS1 Burnup and TH Feedback Parameters Assembly B7

	Datapoint 1 (BOC Cy 4)			Datapoint 2 (208.6 EFPD Cy 4)			Datapoint 3 (BOC Cy 5)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 4	0.00 Cy 4	0.00 Cy 4	208.6 Cy 4	208.6 Cy 4	208.6 Cy 4	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5
1	0.000		0.7396	1.075	622.1	0.7396	2.292	649.3	0.7396
2	0.000		0.7132	5.275	879.6	0.7286	11.254	1060.0	0.7172
3	0.000		0.5122	8.202	1096.1	0.5743	15.682	1204.3	0.5399
4	0.000	Data	0.3703	9.164	1185.4	0.4073	16.575	1195.7	0.3834
5	0.000	Not	0.3056	8.465	1119.5	0.3229	15.775	1183.3	0.3043
6	0.000	Required	0.2671	7.390	1025.4	0.2723	14.493	1158.4	0.2544
7	0.000		0.2439	6.108	923.7	0.2404	12.505	1077.7	0.2211
8	0.000		0.2291	4.923	840.1	0.2180	9.800	924.9	0.1995
9	0.000		0.2232	1.949	661.0	0.2082	3.831	682.9	0.1905
10	0.000		0.2220	1.203	622.2	0.2067	2.338	633.3	0.1891
	Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6
1	3.717	632.1	0.7396	4.643	608.7	0.7396	6.338	666.8	0.7396
2	17.457	888.7	0.7208	21.178	752.0	0.7245	27.399	984.5	0.7230
3	23.066	948.0	0.5598	27.814	801.7	0.5811	34.556	1006.8	0.5777
4	24.293	970.7	0.4094	29.904	854.2	0.4414	36.577	1000.8	0.4390
5	23.437	966.8	0.3301	29.615	890.7	0.3637	36.061	981.4	0.3620
6	21.818	944.1	0.2786	28.408	918.3	0.3109	34.501	951.9	0.3097
7	19.049	893.8	0.2438	25.639	918.3	0.2740	31.370	922.6	0.2729
8	14.470	784.4	0.2193	19.668	829.4	0.2463	24.225	835.2	0.2454
9	5.525	636.2	0.2091	7.533	655.2	0.2348	9.317	658.2	0.2340
10	3.285	603.3	0.2065	4.395	612.9	0.2307	5.400	615.5	0.2304

Table 4-170. LS1 Burnup and TH Feedback Parameters Assembly B7 (Continued)

Node No.	Statepoint 7 (BOC Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 8 (193.2 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 9 (306.8 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	7.494	680.0	0.7396	7.981	589.9	0.7396	8.170	579.7	0.7396
2	31.226	988.1	0.7221	32.821	652.5	0.7233	33.412	618.1	0.7238
3	38.645	1002.0	0.5759	40.771	679.7	0.5824	41.589	637.6	0.5857
4	40.692	1005.6	0.4377	43.251	705.7	0.4468	44.349	664.6	0.4526
5	40.171	1004.9	0.3610	42.866	714.0	0.3696	44.164	684.5	0.3760
6	38.559	997.6	0.3086	41.219	711.9	0.3163	42.655	698.7	0.3225
7	35.196	965.4	0.2716	37.641	698.8	0.2784	39.101	701.2	0.2843
8	27.198	857.4	0.2442	29.000	661.0	0.2503	30.173	672.1	0.2556
9	10.525	669.1	0.2328	11.189	598.0	0.2385	11.637	603.2	0.2434
10	6.089	622.0	0.2294	6.437	581.2	0.2346	6.671	583.9	0.2391

Node No.	Statepoint 10 (495.2, EOC Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	8.386	573.6	0.7396
2	34.052	598.3	0.7242
3	42.426	608.4	0.5890
4	45.553	628.9	0.4601
5	45.761	651.4	0.3868
6	44.669	676.1	0.3352
7	41.438	695.8	0.2976
8	32.257	680.4	0.2685
9	12.464	607.8	0.2557
10	7.097	585.9	0.2502

Table 4-171. LS1 Burnup and TH Feedback Parameters Assembly B8

	Datapoint 1 (BOC Cy 4)			Datapoint 2 (208.6 EFPD Cy 4)			Datapoint 3 (BOC Cy 5)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 4	0.00 Cy 4	0.00 Cy 4	208.6 Cy 4	208.6 Cy 4	208.6 Cy 4	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5
1	0.000		0.7396	1.263	633.4	0.7396	2.605	659.0	0.7396
2	0.000		0.7123	6.087	942.2	0.7208	12.486	1108.0	0.7110
3	0.000		0.5097	9.015	1171.6	0.5402	16.761	1237.6	0.5143
4	0.000	Data	0.3680	9.857	1254.9	0.3754	17.566	1232.9	0.3595
5	0.000	Not	0.3033	9.077	1177.3	0.2964	16.682	1219.7	0.2847
6	0.000	Required	0.2649	7.899	1069.0	0.2492	15.181	1180.0	0.2380
7	0.000		0.2416	6.416	947.2	0.2195	12.826	1079.4	0.2071
8	0.000		0.2267	4.951	842.1	0.1996	9.775	919.9	0.1870
9	0.000		0.2207	1.949	661.0	0.1911	3.823	682.3	0.1786
10	0.000		0.2196	1.215	622.9	0.1896	2.352	633.4	0.1773
	Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6
1	4.710	668.7	0.7396	6.411	651.5	0.7396	8.014	660.7	0.7396
2	21.287	1075.5	0.7084	27.676	923.2	0.7111	33.267	930.4	0.7132
3	26.692	1136.3	0.5120	34.417	999.3	0.5257	41.007	993.6	0.5350
4	27.467	1133.9	0.3620	35.919	1055.0	0.3788	42.658	1006.5	0.3889
5	26.285	1110.0	0.2890	35.181	1090.8	0.3048	41.633	981.9	0.3141
6	24.311	1073.1	0.2424	33.515	1116.2	0.2562	39.473	941.0	0.2647
7	21.155	1013.9	0.2110	30.210	1103.9	0.2225	35.433	883.4	0.2305
8	15.916	870.0	0.1901	23.059	958.8	0.1990	26.972	790.4	0.2067
9	6.184	666.7	0.1816	9.102	700.6	0.1896	10.656	645.4	0.1974
10	3.734	622.3	0.1802	5.439	640.6	0.1878	6.308	608.2	0.1951

Table 4-171. LS1 Burnup and TH Feedback Parameters Assembly B8 (Continued)

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	8.991	660.3	0.7396	9.180	571.7	0.7396	9.257	568.2	0.7396
2	36.441	897.9	0.7144	37.004	593.1	0.7149	37.229	583.0	0.7151
3	44.609	935.4	0.5407	45.408	605.2	0.5445	45.714	590.3	0.5460
4	46.327	944.2	0.3956	47.496	625.3	0.4042	47.928	601.7	0.4073
5	45.290	942.5	0.3205	46.751	641.5	0.3325	47.314	613.7	0.3374
6	43.085	936.6	0.2708	44.725	651.5	0.2840	45.431	627.0	0.2906
7	38.856	912.2	0.2362	40.525	653.2	0.2495	41.349	638.1	0.2575
8	29.617	818.7	0.2120	30.942	633.9	0.2246	31.684	630.3	0.2331
9	11.724	656.1	0.2027	12.210	588.5	0.2138	12.496	588.6	0.2216
10	6.906	614.0	0.2001	7.150	575.7	0.2096	7.292	575.6	0.2163

	Statepoint 10 (495.2, EOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	9.357	566.4	0.7396
2	37.506	577.7	0.7154
3	46.071	582.2	0.5476
4	48.447	591.0	0.4111
5	48.035	602.0	0.3436
6	46.429	617.3	0.3004
7	42.643	633.9	0.2709
8	32.941	631.8	0.2485
9	12.994	589.8	0.2363
10	7.540	576.2	0.2288

Table 4-172. LS1 Burnup and TH Feedback Parameters Assembly B9

	Datapoint 1 (BOC Cy 4)			Datapoint 2 (208.6 EFPD Cy 4)			Datapoint 3 (BOC Cy 5)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 4	0.00 Cy 4	0.00 Cy 4	208.6 Cy 4	208.6 Cy 4	208.6 Cy 4	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5
1	0.000		0.7396	1.186	628.8	0.7396	2.541	660.0	0.7396
2	0.000		0.7096	5.734	914.3	0.7241	12.196	1115.4	0.7120
3	0.000		0.5060	8.495	1122.5	0.5563	16.174	1229.2	0.5225
4	0.000	Data	0.3683	9.345	1203.2	0.3924	16.856	1208.1	0.3699
5	0.000	Not	0.3049	8.724	1143.5	0.3111	16.082	1189.2	0.2943
6	0.000	Required	0.2668	7.796	1059.8	0.2616	14.775	1143.9	0.2466
7	0.000		0.2436	6.553	957.7	0.2295	12.618	1041.9	0.2151
8	0.000		0.2286	5.135	854.7	0.2078	9.748	900.1	0.1941
9	0.000		0.2226	2.034	665.5	0.1984	3.856	678.8	0.1852
10	0.000		0.2214	1.265	625.4	0.1968	2.370	631.4	0.1839
	Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6
1	4.409	655.8	0.7396	6.272	660.8	0.7396	8.044	672.0	0.7396
2	20.297	1021.5	0.7122	27.234	963.0	0.7127	33.299	970.9	0.7137
3	25.653	1100.2	0.5256	33.756	1027.9	0.5321	40.639	1019.2	0.5376
4	26.388	1104.3	0.3756	35.107	1076.3	0.3856	42.027	1022.5	0.3921
5	25.260	1076.8	0.3009	34.381	1109.3	0.3107	41.075	1002.7	0.3170
6	23.387	1034.3	0.2531	32.786	1132.7	0.2613	39.067	967.5	0.2673
7	20.291	968.0	0.2211	29.444	1112.2	0.2270	35.085	915.6	0.2327
8	15.253	831.9	0.1994	22.278	950.6	0.2032	26.629	820.6	0.2090
9	5.913	652.6	0.1904	8.716	694.7	0.1937	10.479	657.1	0.1995
10	3.559	613.8	0.1888	5.191	637.2	0.1918	6.189	615.1	0.1974

Table 4-172. LS1 Burnup and TH Feedback Parameters Assembly B9 (Continued)

Node No.	Statepoint 7 (BOC Cy 7) Burnup (GWd/MTU) 0.00 Cy 7	Fuel Temp. (K) 0.00 Cy 7	Mod. Dens. (g/cm^3) 0.00 Cy 7	Statepoint 8 (193.2 EFPD Cy 7) Burnup (GWd/MTU) 193.2 Cy 7	Fuel Temp. (K) 193.2 Cy 7	Mod. Dens. (g/cm^3) 193.2 Cy 7	Statepoint 9 (306.8 EFPD Cy 7) Burnup (GWd/MTU) 306.8 Cy 7	Fuel Temp. (K) 306.8 Cy 7	Mod. Dens. (g/cm^3) 306.8 Cy 7
1	9.138	673.2	0.7396	9.366	574.0	0.7396	9.459	569.8	0.7396
2	36.785	939.8	0.7144	37.461	599.4	0.7151	37.726	586.9	0.7153
3	44.611	985.5	0.5412	45.560	613.3	0.5457	45.931	596.2	0.5475
4	46.115	1001.8	0.3963	47.432	633.4	0.4057	47.963	610.8	0.4095
5	45.158	1001.1	0.3211	46.720	647.1	0.3330	47.406	625.1	0.3388
6	43.092	992.9	0.2710	44.781	654.3	0.2836	45.616	639.1	0.2908
7	38.892	962.9	0.2362	40.568	653.6	0.2486	41.498	648.3	0.2566
8	29.601	857.4	0.2121	30.912	633.1	0.2237	31.713	636.0	0.2318
9	11.708	671.1	0.2026	12.185	588.0	0.2129	12.489	590.2	0.2203
10	6.890	623.1	0.2003	7.128	575.4	0.2091	7.279	576.4	0.2155

Node No.	Statepoint 10 (495.2, EOC Cy 7) Burnup (GWd/MTU) 495.2 Cy 7	Fuel Temp. (K) 495.2 Cy 7	Mod. Dens. (g/cm^3) 495.2 Cy 7
1	9.565	566.8	0.7396
2	38.019	578.5	0.7156
3	46.317	583.8	0.5492
4	48.538	594.0	0.4137
5	48.212	606.6	0.3457
6	46.719	623.1	0.3013
7	42.904	640.3	0.2706
8	33.066	637.3	0.2475
9	13.023	591.8	0.2351
10	7.543	577.1	0.2281

Table 4-173. LS1 Burnup and TH Feedback Parameters Assembly B10

	Datapoint 1 (BOC Cy 4)			Datapoint 2 (208.6 EFPD Cy 4)			Datapoint 3 (BOC Cy 5)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 4	**0.00 Cy 4**	**0.00 Cy 4**	**208.6 Cy 4**	**208.6 Cy 4**	**208.6 Cy 4**	**0.00 Cy 5**	**0.00 Cy 5**	**0.00 Cy 5**
1	0.000		0.7396	1.354	639.0	0.7396	2.676	657.4	0.7396
2	0.000		0.7101	6.498	975.6	0.7171	12.787	1094.9	0.7101
3	0.000		0.5040	9.250	1194.1	0.5274	16.853	1219.4	0.5101
4	0.000	Data	0.3648	9.845	1253.7	0.3666	17.448	1219.5	0.3568
5	0.000	Not	0.3018	8.996	1169.5	0.2908	16.488	1205.6	0.2837
6	0.000	Required	0.2640	7.757	1056.7	0.2454	14.928	1166.6	0.2380
7	0.000		0.2409	6.233	933.3	0.2169	12.572	1071.5	0.2076
8	0.000		0.2261	4.784	830.8	0.1978	9.556	915.0	0.1876
9	0.000		0.2203	1.874	657.0	0.1896	3.722	680.5	0.1793
10	0.000		0.2191	1.167	620.4	0.1883	2.283	632.1	0.1780
	Datapoint 4 (239.5 EFPD Cy 5)			**Datapoint 5 (BOC Cy 6)**			**Datapoint 6 (196.1 Cy 6)**		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	239.5 Cy 5	**239.5 Cy 5**	**239.5 Cy 5**	**0.00 Cy 6**	**0.00 Cy 6**	**0.00 Cy 6**	**196.1 Cy 6**	**196.1 Cy 6**	**196.1 Cy 6**
1	3.970	625.2	0.7396	4.821	604.6	0.7396	5.812	620.8	0.7396
2	18.441	853.7	0.7165	21.824	732.7	0.7209	25.700	798.3	0.7235
3	23.794	918.9	0.5424	28.160	779.4	0.5668	33.149	865.8	0.5801
4	24.808	946.4	0.3953	30.036	830.4	0.4316	35.249	882.4	0.4465
5	23.825	944.9	0.3202	29.624	866.1	0.3583	34.681	870.8	0.3717
6	21.964	925.0	0.2717	28.181	893.3	0.3088	32.927	847.8	0.3207
7	18.867	878.2	0.2391	25.128	896.2	0.2745	29.503	821.3	0.2855
8	14.075	776.1	0.2155	19.079	817.6	0.2480	22.818	778.4	0.2592
9	5.353	633.3	0.2051	7.280	651.3	0.2363	8.741	640.2	0.2472
10	3.188	601.5	0.2020	4.242	610.3	0.2311	5.150	610.3	0.2435

Table 4-173. LS1 Burnup and TH Feedback Parameters Assembly B10 (Continued)

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	6.617	641.8	0.7396	7.711	628.5	0.7396	8.455	639.7	0.7396
2	28.540	855.2	0.7239	32.457	805.4	0.7254	35.102	849.1	0.7259
3	36.755	936.3	0.5831	42.064	896.1	0.5912	45.540	944.5	0.5930
4	39.068	964.4	0.4492	45.191	961.9	0.4576	49.007	993.7	0.4588
5	38.513	966.1	0.3738	44.519	952.1	0.3798	48.426	1007.3	0.3802
6	36.728	962.0	0.3219	42.108	901.5	0.3263	45.783	973.1	0.3262
7	33.105	935.4	0.2858	37.446	823.7	0.2893	40.496	887.0	0.2889
8	25.588	833.3	0.2590	28.619	735.7	0.2623	30.773	777.4	0.2621
9	9.854	660.3	0.2469	11.051	626.8	0.2505	11.930	643.4	0.2505
10	5.813	619.7	0.2439	6.482	598.2	0.2474	6.985	608.2	0.2474

	Statepoint 10 (495.2, EOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	9.961	658.3	0.7396
2	39.640	861.4	0.7262
3	50.383	869.4	0.5960
4	54.237	899.9	0.4636
5	54.262	950.2	0.3851
6	52.278	1008.3	0.3302
7	47.183	1025.8	0.2913
8	36.054	905.8	0.2630
9	14.166	689.5	0.2508
10	8.263	633.0	0.2478

Table 4-174. LS1 Burnup and TH Feedback Parameters Assembly C1

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.543	638.0	0.7396	2.776	625.1	0.7396
2	0.000		0.7237	6.921	935.2	0.7237	12.707	879.7	0.7261
3	0.000		0.5668	8.859	1050.2	0.5668	16.503	991.1	0.5793
4	0.000	Data	0.4168	9.145	1071.8	0.4168	17.324	1031.4	0.4328
5	0.000	Not	0.3380	8.722	1040.1	0.3380	17.100	1046.8	0.3526
6	0.000	Required	0.2868	8.005	988.7	0.2868	16.468	1053.4	0.2983
7	0.000		0.2524	6.768	906.6	0.2524	14.728	1014.9	0.2601
8	0.000		0.2308	4.489	773.8	0.2308	10.134	856.9	0.2350
9	0.000		0.2228	1.599	631.6	0.2228	3.659	657.3	0.2255
10	0.000		0.2214	0.963	603.8	0.2214	2.150	616.2	0.2237
	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	3.734	618.5	0.7396	4.763	665.6	0.7396	6.044	640.4	0.7396
2	17.204	842.3	0.7268	21.228	1014.4	0.7245	26.388	899.8	0.7252
3	23.423	1021.2	0.5855	27.552	1005.6	0.5811	34.077	994.5	0.5839
4	25.024	1091.7	0.4376	28.985	981.9	0.4360	35.849	1024.4	0.4384
5	24.548	1068.1	0.3548	28.440	972.5	0.3548	34.959	994.0	0.3570
6	23.211	1005.0	0.2992	27.044	964.4	0.3000	32.829	932.4	0.3023
7	20.576	930.5	0.2612	24.186	934.8	0.2621	28.906	850.0	0.2648
8	14.395	813.7	0.2364	17.182	834.2	0.2372	20.590	759.4	0.2403
9	5.132	640.6	0.2268	6.139	650.2	0.2274	7.376	628.7	0.2308
10	2.973	605.7	0.2250	3.534	610.6	0.2256	4.223	599.2	0.2290
	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	6.810	641.9	0.7396	8.192	649.4	0.7396	8.196	572.9	0.7396
2	29.412	898.7	0.7254	33.993	863.4	0.7257	34.007	602.6	0.7257
3	37.812	979.8	0.5847	42.949	891.0	0.5887	42.969	620.1	0.5888
4	39.667	992.0	0.4394	45.386	938.5	0.4466	45.414	641.9	0.4468
5	38.764	990.0	0.3582	44.994	982.4	0.3656	45.026	653.7	0.3658
6	36.728	1003.9	0.3033	43.375	1019.9	0.3099	43.408	657.7	0.3101
7	32.431	949.9	0.2654	39.092	1021.2	0.2707	39.124	654.7	0.2709
8	23.153	825.1	0.2407	28.384	900.3	0.2445	28.410	635.1	0.2447
9	8.325	649.8	0.2311	10.338	675.5	0.2343	10.347	587.8	0.2345
10	4.757	610.9	0.2292	5.884	624.2	0.2323	5.889	576.7	0.2324

Table 4-175. LS1 Burnup and TH Feedback Parameters Assembly C2

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.704	646.6	0.7396	3.158	637.3	0.7396
2	0.000		0.7188	7.471	973.7	0.7188	14.154	942.7	0.7197
3	0.000		0.5447	9.512	1100.0	0.5447	18.059	1060.1	0.5513
4	0.000	Data	0.3928	9.823	1124.7	0.3928	18.836	1097.6	0.4025
5	0.000	Not	0.3163	9.321	1085.3	0.3163	18.536	1114.4	0.3250
6	0.000	Required	0.2674	8.500	1024.0	0.2674	17.821	1123.2	0.2732
7	0.000		0.2348	7.184	933.6	0.2348	16.058	1086.6	0.2368
8	0.000		0.2143	4.795	790.6	0.2143	11.138	902.6	0.2131
9	0.000		0.2066	1.743	638.1	0.2066	4.105	672.1	0.2040
10	0.000		0.2053	1.060	608.0	0.2053	2.444	625.3	0.2024
	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	4.364	634.3	0.7396	5.065	630.5	0.7396	5.870	609.7	0.7396
2	19.250	888.6	0.7222	21.946	836.1	0.7236	25.148	754.2	0.7256
3	23.902	929.9	0.5663	26.968	866.1	0.5751	31.189	814.1	0.5883
4	24.607	924.2	0.4214	27.762	876.9	0.4333	33.539	932.8	0.4554
5	24.092	907.2	0.3440	27.239	875.9	0.3557	33.808	998.3	0.3750
6	23.019	880.0	0.2912	26.115	869.8	0.3024	32.462	979.1	0.3174
7	20.722	840.8	0.2541	23.651	849.7	0.2649	29.224	915.3	0.2769
8	14.653	763.0	0.2308	16.977	781.7	0.2415	20.948	797.7	0.2514
9	5.368	629.1	0.2210	6.228	636.9	0.2313	7.582	635.2	0.2402
10	3.139	598.9	0.2183	3.608	602.7	0.2282	4.333	601.1	0.2367
	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	6.173	591.6	0.7396	6.943	608.7	0.7396	6.952	589.0	0.7396
2	26.332	677.3	0.7267	28.940	719.4	0.7283	28.969	646.1	0.7283
3	32.847	721.4	0.5962	36.097	753.8	0.6065	36.136	673.5	0.6067
4	35.460	749.6	0.4677	39.333	796.4	0.4837	39.379	698.9	0.4838
5	35.819	759.6	0.3882	40.180	831.7	0.4051	40.228	703.2	0.4052
6	34.545	767.7	0.3307	39.436	871.8	0.3474	39.485	704.2	0.3475
7	31.332	770.5	0.2904	36.588	900.5	0.3063	36.634	695.7	0.3064
8	23.234	791.4	0.2683	27.646	836.3	0.2819	27.682	664.9	0.2820
9	8.427	639.8	0.2559	10.123	656.8	0.2688	10.137	601.7	0.2689
10	4.802	605.0	0.2521	5.729	613.1	0.2649	5.736	582.2	0.2649

Table 4-176. LS1 Burnup and TH Feedback Parameters Assembly C3

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.827	653.2	0.7396	3.266	636.5	0.7396
2	0.000		0.7140	8.029	1014.5	0.7140	14.568	932.1	0.7174
3	0.000		0.5279	9.846	1126.6	0.5279	18.136	1039.9	0.5451
4	0.000	Data	0.3794	9.990	1138.2	0.3794	18.813	1082.1	0.3988
5	0.000	Not	0.3058	9.489	1098.4	0.3058	18.576	1103.7	0.3227
6	0.000	Required	0.2585	8.683	1037.4	0.2585	17.949	1118.6	0.2715
7	0.000		0.2268	7.369	945.8	0.2268	16.272	1088.9	0.2355
8	0.000		0.2068	4.938	798.5	0.2068	11.370	908.5	0.2117
9	0.000		0.1992	1.794	640.4	0.1992	4.193	673.9	0.2026
10	0.000		0.1980	1.094	609.5	0.1980	2.496	626.1	0.2008
	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	4.255	620.5	0.7396	4.796	613.9	0.7396	6.086	641.0	0.7396
2	18.716	816.8	0.7216	20.813	766.5	0.7237	26.020	903.7	0.7244
3	23.176	868.1	0.5682	25.669	799.7	0.5798	32.337	1007.1	0.5820
4	24.020	880.6	0.4278	26.697	820.4	0.4439	33.819	1047.9	0.4433
5	23.628	869.0	0.3499	26.364	827.1	0.3661	33.246	1026.1	0.3644
6	22.693	846.5	0.2966	25.433	827.5	0.3121	31.598	963.9	0.3105
7	20.563	814.4	0.2592	23.207	816.7	0.2742	28.276	876.2	0.2732
8	14.639	747.1	0.2358	16.787	762.6	0.2510	20.433	775.3	0.2500
9	5.376	624.8	0.2257	6.178	631.8	0.2404	7.496	633.2	0.2398
10	3.139	596.2	0.2223	3.571	599.5	0.2361	4.305	601.6	0.2360
	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	6.831	639.5	0.7396	8.230	650.5	0.7396	8.238	585.8	0.7396
2	28.918	881.3	0.7249	33.486	862.5	0.7252	33.514	643.9	0.7252
3	35.991	967.9	0.5838	41.203	897.1	0.5881	41.242	675.8	0.5882
4	37.583	983.9	0.4447	43.399	946.7	0.4512	43.447	702.1	0.4514
5	37.008	983.7	0.3655	43.323	990.0	0.3717	43.372	708.5	0.3719
6	35.499	1004.1	0.3112	42.230	1027.6	0.3162	42.277	700.0	0.3163
7	31.879	960.9	0.2733	38.676	1033.8	0.2767	38.718	684.2	0.2769
8	23.124	840.8	0.2496	28.546	915.7	0.2510	28.577	651.8	0.2511
9	8.506	655.6	0.2392	10.633	682.4	0.2401	10.644	593.3	0.2401
10	4.872	613.9	0.2356	6.071	628.3	0.2366	6.077	579.5	0.2368

Table 4-177. LS1 Burnup and TH Feedback Parameters Assembly C4

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.788	651.1	0.7396	3.261	638.4	0.7396
2	0.000		0.7159	7.765	995.0	0.7159	14.392	938.4	0.7180
3	0.000		0.5344	9.686	1113.8	0.5344	18.110	1050.4	0.5461
4	0.000	Data	0.3843	9.956	1135.4	0.3843	18.953	1096.4	0.3987
5	0.000	Not	0.3091	9.491	1098.5	0.3091	18.777	1120.3	0.3219
6	0.000	Required	0.2609	8.711	1039.4	0.2609	18.165	1134.4	0.2702
7	0.000		0.2286	7.428	949.7	0.2286	16.419	1096.2	0.2339
8	0.000		0.2082	4.993	801.6	0.2082	11.455	910.6	0.2102
9	0.000		0.2005	1.817	641.4	0.2005	4.227	674.5	0.2010
10	0.000		0.1992	1.107	610.1	0.1992	2.517	626.5	0.1993
	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	4.628	644.8	0.7396	5.419	640.0	0.7396	6.261	612.0	0.7396
2	20.217	948.2	0.7194	23.311	885.8	0.7207	26.479	752.0	0.7235
3	24.829	1002.8	0.5549	28.341	921.8	0.5622	32.555	813.6	0.5790
4	25.534	990.9	0.4093	29.062	923.9	0.4185	33.952	862.4	0.4418
5	24.976	958.8	0.3326	28.444	916.3	0.3417	33.419	868.8	0.3633
6	23.844	917.0	0.2809	27.225	905.1	0.2895	31.957	850.7	0.3088
7	21.398	863.7	0.2447	24.561	878.0	0.2530	28.778	813.7	0.2704
8	15.142	774.4	0.2215	17.611	797.7	0.2297	20.695	738.4	0.2460
9	5.541	631.9	0.2120	6.442	640.6	0.2199	7.490	618.4	0.2349
10	3.243	600.6	0.2098	3.738	604.9	0.2172	4.281	591.4	0.2309
	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	6.629	598.4	0.7396	7.118	590.7	0.7396	7.126	585.8	0.7396
2	27.802	692.1	0.7247	29.416	655.8	0.7261	29.443	641.8	0.7261
3	34.343	735.3	0.5872	36.400	678.3	0.5964	36.437	668.9	0.5965
4	36.116	776.9	0.4550	38.820	718.3	0.4732	38.866	696.8	0.4733
5	35.762	797.6	0.3773	39.064	757.3	0.4010	39.113	705.3	0.4012
6	34.405	809.9	0.3223	38.274	796.2	0.3485	38.322	704.2	0.3486
7	31.200	807.0	0.2835	35.430	822.0	0.3099	35.476	697.9	0.3100
8	22.652	754.1	0.2589	26.287	780.3	0.2848	26.324	668.9	0.2849
9	8.187	625.9	0.2469	9.528	636.3	0.2716	9.542	601.7	0.2716
10	4.640	595.0	0.2419	5.326	599.9	0.2646	5.333	582.2	0.2647

Table 4-178. LS1 Burnup and TH Feedback Parameters Assembly C5

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.519	636.8	0.7396	2.661	620.2	0.7396
2	0.000		0.7251	6.719	921.4	0.7251	12.026	847.9	0.7284
3	0.000		0.5758	8.520	1025.2	0.5758	15.648	953.9	0.5925
4	0.000	Data	0.4277	8.826	1047.7	0.4277	16.601	1000.8	0.4485
5	0.000	Not	0.3480	8.457	1020.7	0.3480	16.483	1019.7	0.3668
6	0.000	Required	0.2957	7.805	974.8	0.2957	15.957	1029.3	0.3108
7	0.000		0.2604	6.653	899.3	0.2604	14.353	995.4	0.2713
8	0.000		0.2381	4.442	771.2	0.2381	9.937	847.4	0.2453
9	0.000		0.2298	1.575	630.6	0.2298	3.576	654.5	0.2353
10	0.000		0.2284	0.944	603.0	0.2284	2.090	614.3	0.2334
	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	3.913	637.3	0.7396	4.669	636.3	0.7396	5.339	601.2	0.7396
2	17.450	914.8	0.7281	20.454	874.3	0.7284	23.330	741.7	0.7305
3	21.798	954.8	0.5946	25.133	899.2	0.5983	29.371	815.4	0.6125
4	22.586	941.3	0.4535	25.930	900.5	0.4594	30.943	871.7	0.4801
5	22.186	918.8	0.3731	25.489	895.3	0.3794	30.381	862.6	0.3977
6	21.270	888.6	0.3179	24.492	885.3	0.3240	28.843	823.2	0.3394
7	19.113	847.7	0.2789	22.130	860.3	0.2849	25.647	766.0	0.2982
8	13.495	765.9	0.2534	15.858	785.9	0.2593	18.553	713.7	0.2726
9	4.837	629.0	0.2434	5.694	636.7	0.2490	6.706	616.5	0.2622
10	2.789	599.1	0.2412	3.260	602.9	0.2466	3.897	596.4	0.2613
	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	5.944	624.0	0.7396	7.483	660.2	0.7396	7.491	585.8	0.7396
2	25.770	837.1	0.7302	30.929	910.9	0.7288	30.957	642.8	0.7288
3	32.553	902.6	0.6129	38.122	926.0	0.6099	38.160	672.0	0.6100
4	34.536	959.4	0.4814	40.502	959.4	0.4796	40.549	701.1	0.4798
5	34.796	1086.2	0.3989	41.208	998.6	0.3973	41.258	709.6	0.3974
6	33.324	1095.6	0.3382	40.312	1051.7	0.3362	40.361	708.5	0.3363
7	29.380	980.1	0.2957	36.584	1072.3	0.2923	36.630	698.9	0.2925
8	21.197	835.0	0.2697	26.971	945.2	0.2640	27.008	667.9	0.2642
9	7.673	651.5	0.2591	9.934	690.6	0.2524	9.948	601.7	0.2526
10	4.441	611.8	0.2581	5.725	633.1	0.2512	5.733	585.0	0.2513

Table 4-179. LS1 Burnup and TH Feedback Parameters Assembly C6

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.775	650.4	0.7396	3.644	660.7	0.7396
2	0.000		0.7151	7.869	1002.7	0.7151	16.029	1056.3	0.7094
3	0.000		0.5301	9.873	1128.7	0.5301	19.568	1155.2	0.5183
4	0.000	Data	0.3799	10.073	1144.9	0.3799	20.146	1188.4	0.3733
5	0.000	Not	0.3059	9.515	1100.4	0.3059	19.803	1207.7	0.3000
6	0.000	Required	0.2587	8.715	1039.7	0.2587	19.074	1214.2	0.2510
7	0.000		0.2268	7.509	955.1	0.2268	17.275	1161.8	0.2164
8	0.000		0.2064	5.138	809.8	0.2064	12.189	951.6	0.1938
9	0.000		0.1985	1.870	643.8	0.1985	4.508	685.9	0.1849
10	0.000		0.1973	1.138	611.4	0.1973	2.698	633.5	0.1835

	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	5.498	677.1	0.7396	6.526	665.5	0.7396	7.714	634.3	0.7396
2	23.391	1088.0	0.7078	27.188	981.5	0.7090	31.624	842.9	0.7123
3	27.738	1137.2	0.5162	32.132	1043.8	0.5215	38.414	974.1	0.5365
4	28.118	1117.8	0.3731	32.557	1050.6	0.3785	39.671	1047.1	0.3941
5	27.438	1085.6	0.3011	31.814	1041.3	0.3062	38.679	1024.6	0.3185
6	26.134	1032.9	0.2529	30.408	1026.4	0.2576	36.519	959.3	0.2676
7	23.435	955.8	0.2191	27.485	994.4	0.2235	32.418	866.0	0.2321
8	16.799	838.1	0.1970	19.998	883.9	0.2011	23.468	763.6	0.2093
9	6.210	653.3	0.1884	7.430	669.8	0.1922	8.728	632.1	0.2004
10	3.665	613.3	0.1868	4.356	622.0	0.1904	5.087	601.4	0.1984

	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (EOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	8.463	640.0	0.7396	9.892	652.6	0.7396
2	34.402	865.3	0.7137	38.835	851.7	0.7154
3	42.216	989.7	0.5423	47.373	892.6	0.5510
4	43.750	1031.4	0.3993	49.582	948.1	0.4108
5	42.766	1032.5	0.3229	49.184	999.1	0.3341
6	40.530	1021.0	0.2713	47.476	1047.7	0.2816
7	35.915	946.2	0.2353	42.977	1058.7	0.2444
8	25.992	820.2	0.2122	31.618	932.8	0.2197
9	9.703	652.3	0.2034	11.965	690.6	0.2102
10	5.645	613.1	0.2012	6.934	633.4	0.2079

Table 4-180. LS1 Burnup and TH Feedback Parameters Assembly C7

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.791	651.3	0.7396	3.407	646.4	0.7396
2	0.000		0.7153	7.845	1000.9	0.7153	15.084	983.9	0.7150
3	0.000		0.5314	9.814	1124.0	0.5314	18.783	1094.0	0.5344
4	0.000	Data	0.3807	10.091	1146.4	0.3807	19.553	1135.2	0.3871
5	0.000	Not	0.3059	9.600	1107.1	0.3059	19.339	1159.0	0.3115
6	0.000	Required	0.2581	8.825	1047.9	0.2581	18.733	1173.7	0.2608
7	0.000		0.2258	7.628	963.1	0.2258	17.073	1134.1	0.2250
8	0.000		0.2051	5.241	815.6	0.2051	12.076	936.3	0.2015
9	0.000		0.1971	1.934	646.7	0.1971	4.500	682.2	0.1925
10	0.000		0.1958	1.182	613.3	0.1958	2.694	631.3	0.1909

	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	5.150	669.6	0.7396	5.960	642.0	0.7396	7.123	632.7	0.7396
2	22.049	1049.9	0.7121	25.087	878.8	0.7136	29.547	844.7	0.7164
3	26.517	1094.8	0.5311	30.029	922.0	0.5395	36.284	971.6	0.5521
4	27.204	1087.1	0.3873	30.799	932.6	0.3976	37.873	1043.5	0.4103
5	26.576	1048.7	0.3130	30.154	930.5	0.3229	36.999	1022.7	0.3329
6	25.386	997.2	0.2635	28.990	934.0	0.2732	35.065	956.4	0.2810
7	23.197	952.8	0.2301	27.287	1000.0	0.2414	32.063	854.3	0.2474
8	16.633	834.5	0.2068	19.857	887.0	0.2171	23.219	756.4	0.2231
9	6.137	649.7	0.1975	7.324	666.8	0.2069	8.584	630.0	0.2131
10	3.611	610.6	0.1956	4.268	619.0	0.2043	4.979	600.3	0.2105

	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (EOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	7.898	642.9	0.7396	9.367	655.3	0.7396
2	32.482	886.4	0.7174	37.144	869.9	0.7186
3	40.215	1009.0	0.5558	45.485	901.7	0.5625
4	42.085	1051.9	0.4131	47.917	948.1	0.4224
5	41.260	1059.7	0.3350	47.664	998.0	0.3443
6	39.125	1028.5	0.2826	46.105	1051.0	0.2909
7	35.442	929.7	0.2484	42.482	1056.6	0.2548
8	25.657	809.8	0.2241	31.289	933.3	0.2290
9	9.532	649.7	0.2143	11.803	691.2	0.2187
10	5.525	612.0	0.2117	6.825	634.0	0.2160

Table 4-181. LS1 Burnup and TH Feedback Parameters Assembly C8

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.788	651.1	0.7396	3.262	638.4	0.7396
2	0.000		0.7160	7.773	995.6	0.7160	14.406	938.9	0.7181
3	0.000		0.5348	9.701	1115.0	0.5348	18.135	1051.2	0.5465
4	0.000	Data	0.3846	9.972	1136.7	0.3846	18.981	1097.3	0.3991
5	0.000	Not	0.3094	9.505	1099.6	0.3094	18.804	1121.4	0.3222
6	0.000	Required	0.2612	8.725	1040.4	0.2612	18.191	1135.5	0.2705
7	0.000		0.2289	7.439	950.5	0.2289	16.443	1097.2	0.2342
8	0.000		0.2085	5.001	802.0	0.2085	11.473	911.3	0.2105
9	0.000		0.2007	1.819	641.5	0.2007	4.232	674.6	0.2012
10	0.000		0.1995	1.108	610.1	0.1995	2.520	626.6	0.1996
	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	4.625	644.5	0.7396	5.414	639.8	0.7396	6.257	612.1	0.7396
2	20.215	946.8	0.7196	23.305	885.3	0.7208	26.478	752.3	0.7237
3	24.846	1002.0	0.5555	28.354	921.3	0.5628	32.570	813.8	0.5796
4	25.561	990.8	0.4099	29.087	923.6	0.4192	33.979	862.6	0.4424
5	25.005	959.0	0.3331	28.474	916.3	0.3422	33.452	869.0	0.3639
6	23.873	917.2	0.2814	27.255	905.3	0.2900	31.991	851.0	0.3093
7	21.426	864.0	0.2452	24.591	878.2	0.2535	28.812	814.0	0.2709
8	15.164	774.7	0.2219	17.636	798.0	0.2301	20.724	738.7	0.2465
9	5.547	632.0	0.2124	6.449	640.7	0.2203	7.498	618.5	0.2353
10	3.247	600.6	0.2101	3.741	604.9	0.2176	4.286	591.5	0.2313
	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	6.626	598.6	0.7396	7.116	590.8	0.7396	7.124	585.8	0.7396
2	27.802	692.3	0.7248	29.416	655.8	0.7262	29.443	640.8	0.7262
3	34.359	735.4	0.5877	36.415	678.2	0.5969	36.452	667.4	0.5970
4	36.143	776.9	0.4556	38.847	718.3	0.4738	38.893	696.8	0.4739
5	35.796	797.7	0.3779	39.099	757.3	0.4016	39.147	705.3	0.4017
6	34.441	810.2	0.3229	38.312	796.4	0.3490	38.361	705.3	0.3491
7	31.236	807.2	0.2839	35.470	822.3	0.3104	35.516	697.9	0.3105
8	22.683	754.3	0.2593	26.323	780.7	0.2853	26.360	668.9	0.2854
9	8.197	626.1	0.2474	9.539	636.4	0.2720	9.553	601.7	0.2721
10	4.644	594.9	0.2423	5.331	600.0	0.2650	5.338	582.2	0.2652

Table 4-182. LS1 Burnup and TH Feedback Parameters Assembly C9

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.646	643.5	0.7396	2.955	629.3	0.7396
2	0.000		0.7200	7.361	965.9	0.7200	13.496	903.6	0.7227
3	0.000		0.5510	9.261	1080.6	0.5510	17.230	1015.4	0.5644
4	0.000	Data	0.4014	9.458	1095.9	0.4014	17.926	1053.8	0.4178
5	0.000	Not	0.3249	8.988	1059.9	0.3249	17.657	1069.8	0.3396
6	0.000	Required	0.2754	8.229	1004.5	0.2754	16.988	1077.0	0.2869
7	0.000		0.2423	6.944	918.0	0.2423	15.182	1036.2	0.2499
8	0.000		0.2215	4.584	779.0	0.2215	10.404	868.2	0.2257
9	0.000		0.2138	1.629	633.0	0.2138	3.744	660.0	0.2165
10	0.000		0.2126	0.984	604.7	0.2126	2.206	617.8	0.2147
	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	4.725	671.4	0.7396	5.849	676.0	0.7396	7.193	644.6	0.7396
2	20.881	1090.3	0.7168	25.106	1044.8	0.7155	30.099	886.5	0.7175
3	25.378	1135.1	0.5479	30.055	1086.6	0.5449	36.377	977.1	0.5545
4	25.729	1101.5	0.4047	30.370	1081.3	0.4024	37.022	1005.5	0.4121
5	25.014	1059.7	0.3300	29.570	1068.1	0.3282	35.902	977.8	0.3363
6	23.752	1006.7	0.2798	28.202	1052.3	0.2782	33.890	924.5	0.2852
7	21.155	940.5	0.2445	25.318	1010.6	0.2428	30.117	855.8	0.2497
8	14.881	828.7	0.2209	18.060	881.5	0.2188	21.477	760.1	0.2259
9	5.360	648.5	0.2119	6.536	665.7	0.2097	7.733	626.5	0.2166
10	3.126	610.8	0.2104	3.797	620.2	0.2081	4.445	597.0	0.2145
	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	7.856	630.4	0.7396	8.740	616.1	0.7396	8.748	585.8	0.7396
2	32.472	813.2	0.7188	35.296	733.9	0.7207	35.322	640.8	0.7207
3	39.510	896.3	0.5614	43.098	776.8	0.5727	43.134	666.6	0.5729
4	40.491	941.8	0.4201	44.942	838.4	0.4383	44.986	691.5	0.4385
5	39.441	951.6	0.3434	44.601	893.0	0.3630	44.649	703.2	0.3632
6	37.386	945.5	0.2915	43.099	938.0	0.3100	43.147	702.1	0.3102
7	33.287	901.1	0.2552	39.145	950.2	0.2722	39.190	692.6	0.2723
8	23.836	800.4	0.2310	28.554	859.7	0.2463	28.589	660.9	0.2465
9	8.594	641.3	0.2214	10.378	661.9	0.2360	10.391	598.9	0.2361
10	4.914	605.0	0.2192	5.877	615.1	0.2329	5.883	579.5	0.2330

Table 4-183. LS1 Burnup and TH Feedback Parameters Assembly C10

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.732	648.1	0.7396	3.532	656.8	0.7396
2	0.000		0.7170	7.625	984.8	0.7170	15.523	1035.2	0.7119
3	0.000		0.5373	9.686	1113.8	0.5373	19.223	1141.7	0.5257
4	0.000	Data	0.3859	9.975	1136.9	0.3859	19.953	1180.0	0.3793
5	0.000	Not	0.3106	9.459	1096.0	0.3106	19.676	1201.3	0.3047
6	0.000	Required	0.2624	8.708	1039.1	0.2624	19.009	1209.0	0.2547
7	0.000		0.2296	7.651	964.6	0.2296	17.374	1158.0	0.2195
8	0.000		0.2082	5.401	824.7	0.2082	12.467	952.6	0.1963
9	0.000		0.1997	2.012	650.2	0.1997	4.687	687.7	0.1872
10	0.000		0.1984	1.228	615.3	0.1984	2.815	634.8	0.1856

	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	5.266	669.0	0.7396	6.485	686.6	0.7396	7.593	629.1	0.7396
2	22.521	1053.1	0.7112	26.916	1071.1	0.7102	31.070	821.7	0.7129
3	26.941	1093.4	0.5265	31.649	1091.3	0.5257	37.358	926.4	0.5398
4	27.487	1076.0	0.3822	32.129	1081.4	0.3826	38.498	980.9	0.3994
5	26.825	1040.7	0.3087	31.394	1070.3	0.3096	37.613	968.1	0.3245
6	25.665	997.4	0.2594	30.125	1053.7	0.2605	36.601	990.2	0.2760
7	23.532	955.4	0.2248	27.666	1006.5	0.2259	33.102	904.7	0.2385
8	17.280	852.9	0.2019	20.427	877.5	0.2029	24.222	785.5	0.2139
9	6.452	656.8	0.1927	7.643	667.1	0.1936	9.031	637.1	0.2041
10	3.805	614.5	0.1908	4.482	620.7	0.1918	5.249	603.3	0.2017

	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (EOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	8.019	604.6	0.7396	8.985	621.5	0.7396
2	32.727	728.3	0.7147	35.877	756.3	0.7171
3	39.826	812.6	0.5498	43.747	800.0	0.5620
4	41.334	857.6	0.4124	46.003	854.8	0.4294
5	40.509	865.2	0.3367	45.767	900.7	0.3537
6	39.373	849.6	0.2865	45.047	934.7	0.3017
7	35.596	815.5	0.2481	41.620	964.4	0.2626
8	26.613	803.2	0.2252	31.980	910.7	0.2389
9	10.112	662.5	0.2165	12.344	688.8	0.2294
10	5.857	617.7	0.2136	7.146	633.4	0.2266

Table 4-184. LS1 Burnup and TH Feedback Parameters Assembly C11

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.581	640.1	0.7396	3.263	650.1	0.7396
2	0.000		0.7224	6.998	940.5	0.7224	14.427	998.4	0.7173
3	0.000		0.5596	9.088	1067.4	0.5596	18.264	1111.1	0.5445
4	0.000	Data	0.4069	9.515	1100.3	0.4069	19.195	1153.9	0.3963
5	0.000	Not	0.3280	9.081	1067.0	0.3280	19.040	1178.3	0.3186
6	0.000	Required	0.2772	8.393	1016.2	0.2772	18.492	1190.7	0.2662
7	0.000		0.2426	7.499	954.1	0.2426	17.076	1145.5	0.2294
8	0.000		0.2193	5.459	828.0	0.2193	12.432	945.9	0.2051
9	0.000		0.2101	2.060	652.4	0.2101	4.709	686.4	0.1956
10	0.000		0.2086	1.253	616.4	0.2086	2.823	634.0	0.1939

	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	4.296	623.3	0.7396	5.161	647.9	0.7396	6.548	647.4	0.7396
2	19.015	849.2	0.7212	22.386	922.3	0.7206	27.827	923.0	0.7214
3	24.207	938.0	0.5637	28.425	1018.6	0.5648	35.355	1030.5	0.5675
4	25.178	941.2	0.4174	29.519	1036.0	0.4189	36.928	1074.7	0.4206
5	24.692	914.8	0.3384	28.969	1026.8	0.3402	36.094	1048.3	0.3413
6	23.688	879.8	0.2846	27.878	1014.3	0.2864	34.304	986.1	0.2876
7	21.772	843.0	0.2471	25.669	973.3	0.2485	30.883	887.4	0.2502
8	16.352	789.9	0.2239	19.289	852.1	0.2247	22.920	774.3	0.2266
9	6.143	638.4	0.2131	7.247	659.1	0.2138	8.603	635.3	0.2162
10	3.712	609.1	0.2124	4.367	618.8	0.2136	5.125	602.8	0.2155

	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (EOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	7.351	646.0	0.7396	8.779	652.5	0.7396
2	30.904	906.1	0.7219	35.503	864.9	0.7226
3	39.225	999.6	0.5693	44.430	896.5	0.5749
4	40.948	1022.3	0.4224	46.811	950.7	0.4311
5	40.101	1020.1	0.3429	46.517	999.0	0.3515
6	38.260	1012.5	0.2890	45.147	1042.2	0.2967
7	34.404	949.4	0.2514	41.382	1050.7	0.2577
8	25.526	830.2	0.2276	31.071	925.9	0.2321
9	9.626	656.9	0.2172	11.858	688.8	0.2214
10	5.706	615.2	0.2164	6.969	631.9	0.2201

Table 4-185. LS1 Burnup and TH Feedback Parameters Assembly C12

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.815	652.6	0.7396	3.248	636.2	0.7396
2	0.000		0.7144	7.985	1011.2	0.7144	14.496	930.1	0.7178
3	0.000		0.5295	9.817	1124.3	0.5295	18.085	1038.2	0.5465
4	0.000	Data	0.3809	9.967	1136.3	0.3809	18.772	1080.7	0.4002
5	0.000	Not	0.3070	9.466	1096.5	0.3070	18.536	1102.4	0.3238
6	0.000	Required	0.2595	8.661	1035.7	0.2595	17.909	1117.2	0.2726
7	0.000		0.2278	7.348	944.4	0.2278	16.235	1087.6	0.2364
8	0.000		0.2077	4.925	797.8	0.2077	11.344	907.7	0.2125
9	0.000		0.2001	1.790	640.2	0.2001	4.185	673.7	0.2034
10	0.000		0.1989	1.090	609.3	0.1989	2.488	626.0	0.2017
	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	4.228	619.9	0.7396	4.767	613.7	0.7396	6.054	640.8	0.7396
2	18.613	814.5	0.7220	20.698	765.2	0.7240	25.894	902.8	0.7247
3	23.097	866.0	0.5697	25.576	798.2	0.5811	32.232	1006.0	0.5832
4	23.960	879.1	0.4292	26.626	819.1	0.4454	33.734	1046.6	0.4446
5	23.574	867.9	0.3512	26.301	826.1	0.3675	33.172	1025.1	0.3657
6	22.643	845.7	0.2977	25.375	826.7	0.3133	31.531	963.1	0.3116
7	20.517	813.8	0.2602	23.156	816.0	0.2753	28.217	875.6	0.2742
8	14.607	746.7	0.2368	16.751	762.2	0.2520	20.392	774.9	0.2510
9	5.366	624.7	0.2267	6.168	631.8	0.2414	7.485	633.1	0.2408
10	3.130	596.2	0.2233	3.561	599.4	0.2371	4.294	601.5	0.2370
	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	6.798	639.4	0.7396	8.196	650.5	0.7396	8.204	585.8	0.7396
2	28.786	880.5	0.7252	33.341	861.5	0.7255	33.369	643.8	0.7255
3	35.878	966.8	0.5851	41.078	896.1	0.5892	41.117	673.5	0.5894
4	37.491	982.9	0.4460	43.296	945.8	0.4525	43.344	702.1	0.4527
5	36.928	982.7	0.3667	43.233	989.1	0.3729	43.282	707.4	0.3730
6	35.426	1003.2	0.3123	42.147	1026.7	0.3173	42.194	701.0	0.3174
7	31.815	960.2	0.2743	38.603	1032.9	0.2777	38.645	684.2	0.2778
8	23.080	840.4	0.2505	28.493	915.0	0.2519	28.525	652.8	0.2520
9	8.494	655.5	0.2401	10.620	682.3	0.2409	10.632	596.1	0.2410
10	4.861	613.9	0.2365	6.059	628.2	0.2375	6.065	579.5	0.2376

Table 4-186. LS1 Burnup and TH Feedback Parameters Assembly C13

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.574	639.7	0.7396	3.251	649.8	0.7396
2	0.000		0.7225	6.965	938.2	0.7225	14.371	996.7	0.7174
3	0.000		0.5602	9.057	1065.1	0.5602	18.212	1109.4	0.5449
4	0.000	Data	0.4073	9.488	1098.2	0.4073	19.148	1152.2	0.3966
5	0.000	Not	0.3284	9.056	1065.1	0.3284	18.993	1176.4	0.3189
6	0.000	Required	0.2775	8.370	1014.5	0.2775	18.447	1188.8	0.2664
7	0.000		0.2428	7.479	952.8	0.2428	17.035	1143.6	0.2295
8	0.000		0.2196	5.445	827.2	0.2196	12.402	944.7	0.2053
9	0.000		0.2104	2.056	652.2	0.2104	4.699	686.1	0.1957
10	0.000		0.2089	1.250	616.3	0.2089	2.816	633.8	0.1941

	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	4.036	607.7	0.7396	4.907	648.5	0.7396	6.318	649.0	0.7396
2	17.979	778.3	0.7213	21.322	918.6	0.7218	26.933	937.3	0.7221
3	24.125	936.5	0.5689	27.642	922.6	0.5731	34.518	1025.5	0.5734
4	26.056	1019.3	0.4238	29.517	915.3	0.4300	36.778	1060.8	0.4293
5	25.788	1009.3	0.3412	29.246	914.9	0.3484	36.294	1041.2	0.3479
6	24.662	960.2	0.2846	28.111	913.7	0.2921	34.456	979.2	0.2924
7	22.495	900.0	0.2457	25.782	893.3	0.2532	30.978	886.0	0.2542
8	16.467	799.9	0.2210	19.053	810.9	0.2283	22.741	778.1	0.2297
9	6.137	638.7	0.2102	7.099	646.1	0.2173	8.465	635.8	0.2192
10	3.606	603.9	0.2076	4.136	608.0	0.2144	4.901	603.2	0.2164

	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (EOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	7.121	646.0	0.7396	8.524	650.8	0.7396
2	30.012	906.3	0.7226	34.574	861.9	0.7232
3	38.274	982.8	0.5750	43.412	891.1	0.5802
4	40.589	990.8	0.4309	46.280	936.2	0.4390
5	40.075	986.3	0.3497	46.260	978.5	0.3580
6	38.232	985.6	0.2942	44.875	1019.6	0.3019
7	34.409	936.7	0.2559	41.142	1027.8	0.2624
8	25.332	828.3	0.2312	30.689	910.5	0.2363
9	9.469	655.1	0.2207	11.606	683.0	0.2254
10	5.469	614.0	0.2181	6.676	628.7	0.2226

Table 4-187. LS1 Burnup and TH Feedback Parameters Assembly C14

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.583	640.2	0.7396	2.878	628.5	0.7396
2	0.000		0.7224	7.047	943.9	0.7224	13.078	896.5	0.7244
3	0.000		0.5611	9.015	1061.9	0.5611	16.910	1009.8	0.5717
4	0.000	Data	0.4104	9.322	1085.3	0.4104	17.736	1049.6	0.4242
5	0.000	Not	0.3321	8.882	1052.0	0.3321	17.493	1065.2	0.3446
6	0.000	Required	0.2815	8.143	998.4	0.2815	16.838	1071.8	0.2910
7	0.000		0.2475	6.880	913.8	0.2475	15.066	1032.1	0.2533
8	0.000		0.2262	4.566	778.0	0.2262	10.380	867.7	0.2287
9	0.000		0.2182	1.635	633.2	0.2182	3.771	661.0	0.2193
10	0.000		0.2169	0.987	604.9	0.2169	2.225	618.6	0.2176
	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	4.487	660.7	0.7396	5.491	662.9	0.7396	6.074	595.8	0.7396
2	19.729	1020.8	0.7214	23.492	976.7	0.7208	25.622	684.6	0.7232
3	23.998	1035.3	0.5654	28.013	989.6	0.5660	30.969	729.9	0.5826
4	24.503	1006.9	0.4218	28.456	980.8	0.4239	32.197	780.9	0.4524
5	23.905	976.5	0.3448	27.780	970.2	0.3474	31.790	799.2	0.3773
6	22.800	939.5	0.2927	26.553	953.6	0.2954	30.504	795.2	0.3230
7	20.432	892.8	0.2561	23.897	915.9	0.2587	27.530	773.6	0.2841
8	14.406	797.3	0.2320	17.064	819.2	0.2345	19.774	714.8	0.2588
9	5.187	637.5	0.2226	6.147	645.9	0.2249	7.052	610.7	0.2469
10	3.012	603.8	0.2208	3.546	608.3	0.2230	4.004	587.0	0.2426
	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	6.318	585.4	0.7396	6.644	580.4	0.7396	6.665	629.0	0.7396
2	26.477	643.8	0.7240	27.545	623.0	0.7250	27.624	823.4	0.7250
3	32.133	670.8	0.5889	33.497	637.6	0.5958	33.600	903.3	0.5959
4	33.705	705.6	0.4649	35.560	666.2	0.4797	35.673	944.1	0.4798
5	33.527	729.6	0.3929	35.903	697.7	0.4149	36.015	939.8	0.4149
6	32.413	748.3	0.3399	35.353	733.4	0.3676	35.454	897.9	0.3676
7	29.510	756.2	0.3013	32.878	761.7	0.3323	32.962	825.9	0.3322
8	21.433	721.7	0.2764	24.430	737.3	0.3085	24.490	745.3	0.3085
9	7.632	615.1	0.2634	8.715	621.8	0.2939	8.738	627.3	0.2938
10	4.294	588.8	0.2572	4.834	592.0	0.2849	4.847	598.9	0.2848

Table 4-188. LS1 Burnup and TH Feedback Parameters Assembly C15

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.716	647.2	0.7396	3.493	655.5	0.7396
2	0.000		0.7176	7.526	977.6	0.7176	15.284	1024.0	0.7127
3	0.000		0.5414	9.468	1096.6	0.5414	18.878	1130.8	0.5297
4	0.000	Data	0.3915	9.708	1115.5	0.3915	19.601	1172.5	0.3840
5	0.000	Not	0.3161	9.247	1079.6	0.3161	19.396	1195.3	0.3089
6	0.000	Required	0.2675	8.589	1030.4	0.2675	18.822	1202.7	0.2584
7	0.000		0.2339	7.736	970.2	0.2339	17.410	1153.7	0.2226
8	0.000		0.2112	5.659	839.8	0.2112	12.789	956.9	0.1987
9	0.000		0.2021	2.141	656.1	0.2021	4.873	690.6	0.1892
10	0.000		0.2006	1.304	618.6	0.2006	2.926	636.4	0.1876
	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	5.086	659.6	0.7396	6.171	671.7	0.7396	6.912	605.7	0.7396
2	22.024	1029.1	0.7126	26.090	1020.6	0.7126	29.082	739.8	0.7162
3	26.915	1124.1	0.5298	31.288	1040.9	0.5321	35.708	828.3	0.5523
4	27.581	1118.6	0.3841	31.815	1020.5	0.3877	36.903	877.3	0.4140
5	26.901	1073.4	0.3099	31.036	1006.4	0.3139	35.954	864.6	0.3372
6	25.617	1009.5	0.2604	29.653	992.4	0.2644	34.066	827.6	0.2844
7	23.243	929.3	0.2257	27.004	954.9	0.2296	30.706	778.2	0.2471
8	17.047	813.3	0.2025	19.908	843.1	0.2064	22.893	731.9	0.2243
9	6.417	644.5	0.1932	7.486	655.9	0.1970	8.607	622.4	0.2143
10	3.793	608.0	0.1914	4.393	614.0	0.1950	5.077	598.9	0.2131
	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (EOC Cy 7)					
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)			
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7			
1	7.365	607.5	0.7396	8.806	653.4	0.7396			
2	30.896	746.1	0.7179	35.493	864.8	0.7190			
3	38.284	825.5	0.5613	43.597	905.2	0.5676			
4	39.760	860.2	0.4251	45.753	961.8	0.4333			
5	38.912	873.2	0.3477	45.478	1012.6	0.3554			
6	38.212	1043.8	0.2965	45.041	1036.7	0.3025			
7	34.738	1024.8	0.2567	41.550	1035.2	0.2618			
8	25.722	858.5	0.2313	31.089	911.2	0.2351			
9	9.651	658.9	0.2208	11.797	683.6	0.2242			
10	5.649	614.4	0.2190	6.850	628.4	0.2221			

Table 4-189. LS1 Burnup and TH Feedback Parameters Assembly C16

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.693	646.0	0.7396	3.305	646.2	0.7396
2	0.000		0.7193	7.358	965.7	0.7193	14.492	975.9	0.7175
3	0.000		0.5466	9.445	1094.9	0.5466	18.369	1090.4	0.5437
4	0.000	Data	0.3938	9.843	1126.3	0.3938	19.308	1135.5	0.3946
5	0.000	Not	0.3166	9.375	1089.5	0.3166	19.123	1159.8	0.3172
6	0.000	Required	0.2672	8.627	1033.2	0.2672	18.542	1174.4	0.2652
7	0.000		0.2338	7.532	956.5	0.2338	17.046	1140.0	0.2285
8	0.000		0.2121	5.285	818.1	0.2121	12.246	945.0	0.2042
9	0.000		0.2036	1.985	649.0	0.2036	4.642	686.8	0.1949
10	0.000		0.2022	1.212	614.6	0.2022	2.785	634.1	0.1933

	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	5.053	670.0	0.7396	6.139	671.8	0.7396	7.544	648.6	0.7396
2	21.699	1073.0	0.7142	25.767	1021.1	0.7138	30.934	900.5	0.7159
3	26.381	1121.7	0.5362	30.964	1072.3	0.5365	37.477	993.4	0.5460
4	27.017	1092.5	0.3905	31.591	1071.0	0.3915	38.383	1018.0	0.4013
5	26.433	1055.4	0.3156	30.928	1058.9	0.3170	37.345	985.2	0.3255
6	25.277	1004.2	0.2654	29.656	1041.7	0.2669	35.362	926.0	0.2744
7	22.957	935.5	0.2300	27.037	998.7	0.2314	31.774	851.3	0.2388
8	16.720	828.4	0.2065	19.857	876.3	0.2077	23.212	755.9	0.2152
9	6.299	650.8	0.1973	7.494	667.5	0.1984	8.705	627.3	0.2056
10	3.723	611.7	0.1956	4.403	621.0	0.1967	5.065	597.7	0.2034

	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (EOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	8.240	634.1	0.7396	9.192	620.6	0.7396
2	33.419	827.3	0.7172	36.441	747.5	0.7192
3	40.760	916.4	0.5529	44.587	793.3	0.5645
4	41.999	962.5	0.4091	46.680	855.7	0.4269
5	41.038	973.6	0.3324	46.418	910.6	0.3512
6	38.979	962.6	0.2805	44.905	956.1	0.2983
7	34.975	905.4	0.2440	40.995	964.0	0.2603
8	25.554	798.5	0.2200	30.338	864.9	0.2345
9	9.580	642.7	0.2102	11.425	665.5	0.2240
10	5.547	606.1	0.2079	6.553	617.5	0.2208

Table 4-190. LS1 Burnup and TH Feedback Parameters Assembly C17

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.693	646.0	0.7396	3.141	637.0	0.7396
2	0.000		0.7191	7.437	971.3	0.7191	14.098	941.1	0.7199
3	0.000		0.5457	9.487	1098.1	0.5457	18.021	1059.0	0.5522
4	0.000	Data	0.3937	9.805	1123.3	0.3937	18.806	1096.7	0.4033
5	0.000	Not	0.3171	9.303	1083.9	0.3171	18.506	1113.4	0.3256
6	0.000	Required	0.2681	8.482	1022.7	0.2681	17.790	1122.2	0.2737
7	0.000		0.2354	7.170	932.7	0.2354	16.030	1085.4	0.2373
8	0.000		0.2149	4.788	790.1	0.2149	11.120	901.9	0.2135
9	0.000		0.2071	1.740	637.9	0.2071	4.099	672.0	0.2044
10	0.000		0.2059	1.058	607.9	0.2059	2.440	625.2	0.2028
	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	4.341	633.9	0.7396	5.040	630.3	0.7396	6.142	628.7	0.7396
2	19.175	887.1	0.7225	21.866	835.5	0.7239	26.185	834.1	0.7254
3	23.848	928.6	0.5672	26.909	865.4	0.5759	32.794	940.8	0.5846
4	24.568	923.4	0.4222	27.716	876.1	0.4341	34.404	1008.7	0.4428
5	24.054	906.7	0.3446	27.197	875.4	0.3563	33.663	989.4	0.3627
6	22.983	879.5	0.2917	26.075	869.3	0.3030	31.790	926.7	0.3080
7	20.690	840.5	0.2547	23.616	849.3	0.2654	28.254	844.1	0.2704
8	14.632	762.8	0.2312	16.954	781.5	0.2420	20.241	751.5	0.2469
9	5.361	629.1	0.2214	6.220	636.8	0.2318	7.398	625.5	0.2366
10	3.134	598.9	0.2188	3.603	602.7	0.2286	4.259	597.4	0.2335
	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (495.2, EOC Cy 7)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	6.553	603.0	0.7396	7.849	643.5	0.7396	7.857	585.8	0.7396
2	27.882	732.8	0.7267	32.189	841.9	0.7271	32.213	632.7	0.7271
3	35.291	816.1	0.5925	39.992	857.1	0.5969	40.025	657.5	0.5970
4	37.320	867.9	0.454	42.450	890.5	0.4613	42.494	688.4	0.4615
5	36.651	877.0	0.3732	42.387	940.0	0.3809	42.435	702.1	0.3811
6	34.576	851.3	0.317	40.966	996.7	0.3239	41.014	702.1	0.3241
7	30.540	791.1	0.2780	37.105	1012.5	0.2831	37.151	695.7	0.2833
8	21.839	715.4	0.2539	27.094	902.1	0.2567	27.130	666.9	0.2569
9	7.983	615.6	0.2436	10.043	678.4	0.2454	10.056	598.9	0.2455
10	4.684	601.0	0.2422	5.910	629.8	0.2447	5.917	582.2	0.2448

Table 4-191. LS1 Burnup and TH Feedback Parameters Assembly C18

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.723	647.6	0.7396	3.519	656.6	0.7396
2	0.000		0.7172	7.594	982.6	0.7172	15.473	1033.6	0.7122
3	0.000		0.5383	9.663	1112.0	0.5383	19.188	1140.6	0.5265
4	0.000	Data	0.3867	9.958	1135.6	0.3867	19.923	1178.9	0.3800
5	0.000	Not	0.3113	9.443	1094.8	0.3113	19.648	1200.3	0.3053
6	0.000	Required	0.2630	8.693	1038.0	0.2630	18.982	1207.8	0.2552
7	0.000		0.2302	7.640	963.8	0.2302	17.351	1157.0	0.2199
8	0.000		0.2087	5.394	824.4	0.2087	12.452	952.0	0.1967
9	0.000		0.2002	2.010	650.1	0.2002	4.682	687.6	0.1875
10	0.000		0.1989	1.226	615.2	0.1989	2.811	634.7	0.1861

	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	5.248	668.7	0.7396	6.464	686.3	0.7396	7.497	624.3	0.7396
2	22.458	1051.8	0.7115	26.844	1069.8	0.7104	30.708	800.5	0.7133
3	26.895	1092.3	0.5273	31.595	1090.2	0.5264	36.977	900.5	0.5416
4	27.449	1075.3	0.3829	32.086	1080.5	0.3833	38.206	959.8	0.4022
5	26.789	1040.1	0.3092	31.354	1069.5	0.3102	37.375	951.5	0.3273
6	25.632	996.8	0.2599	30.087	1053.0	0.2610	36.389	975.3	0.2786
7	23.503	954.9	0.2252	27.633	1005.9	0.2263	32.925	893.5	0.2406
8	17.261	852.6	0.2023	20.405	877.2	0.2033	24.104	779.0	0.2158
9	6.446	656.8	0.1930	7.636	667.0	0.1940	8.988	635.1	0.2058
10	3.800	614.4	0.1912	4.477	620.7	0.1922	5.219	602.0	0.2032

	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (EOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	7.910	603.2	0.7396	8.878	621.6	0.7396
2	32.305	721.7	0.7150	35.474	757.6	0.7174
3	39.393	806.4	0.5516	43.270	796.8	0.5636
4	41.052	858.9	0.4156	45.602	845.8	0.4322
5	40.311	870.4	0.3398	45.458	891.9	0.3567
6	39.143	847.3	0.2891	44.760	930.0	0.3044
7	35.339	805.9	0.2500	41.344	962.8	0.2647
8	26.415	793.9	0.2269	31.781	910.6	0.2409
9	10.037	659.4	0.2182	12.273	689.0	0.2313
10	5.808	615.9	0.2152	7.102	633.7	0.2284

Table 4-192. LS1 Burnup and TH Feedback Parameters Assembly C19

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.713	647.1	0.7396	3.387	649.7	0.7396
2	0.000		0.7182	7.509	976.5	0.7182	14.934	998.0	0.7156
3	0.000		0.5422	9.569	1104.5	0.5422	18.695	1107.0	0.5370
4	0.000	Data	0.3900	9.906	1131.4	0.3900	19.490	1145.6	0.3890
5	0.000	Not	0.3137	9.403	1091.7	0.3137	19.231	1166.8	0.3129
6	0.000	Required	0.2650	8.611	1032.1	0.2650	18.575	1178.7	0.2618
7	0.000		0.2323	7.398	947.7	0.2323	16.922	1140.8	0.2257
8	0.000		0.2114	5.061	805.4	0.2114	11.965	941.2	0.2022
9	0.000		0.2034	1.861	643.4	0.2034	4.464	684.1	0.1931
10	0.000		0.2021	1.133	611.2	0.2021	2.671	632.5	0.1915
	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	4.289	615.0	0.7396	4.805	611.4	0.7396	5.496	602.5	0.7396
2	18.806	796.9	0.7204	20.810	756.2	0.7226	23.799	739.6	0.7255
3	23.596	857.9	0.5630	25.973	786.8	0.5751	30.243	817.6	0.5919
4	24.687	879.8	0.4214	27.254	807.9	0.4384	32.195	866.2	0.4609
5	24.288	869.4	0.3430	26.932	816.5	0.3605	31.755	857.5	0.3805
6	23.309	845.7	0.2893	25.977	819.3	0.3062	30.288	820.4	0.3233
7	21.188	812.6	0.2517	23.777	810.4	0.2680	27.286	765.5	0.2827
8	15.193	744.5	0.2282	17.297	758.0	0.2448	19.981	713.0	0.2590
9	5.620	623.4	0.2177	6.400	629.8	0.2337	7.408	616.2	0.2477
10	3.294	595.2	0.2141	3.710	598.2	0.2289	4.335	595.8	0.2444
	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	6.116	625.7	0.7396	7.652	660.0	0.7396	7.659	582.5	0.7396
2	26.232	820.7	0.7255	31.268	900.6	0.7251	31.293	635.6	0.7251
3	33.333	890.4	0.5942	38.745	913.1	0.5949	38.780	661.3	0.5950
4	35.697	946.6	0.4646	41.496	945.2	0.4665	41.540	690.5	0.4666
5	36.102	1075.2	0.3845	42.375	986.2	0.3863	42.422	700.0	0.3865
6	34.720	1087.4	0.3249	41.601	1041.7	0.3265	41.647	697.9	0.3266
7	31.002	977.4	0.2829	38.125	1064.6	0.2832	38.170	691.5	0.2833
8	22.618	834.2	0.2584	28.359	942.3	0.2564	28.394	663.8	0.2566
9	8.380	652.0	0.2469	10.662	691.8	0.2443	10.675	598.9	0.2445
10	4.875	611.4	0.2439	6.160	633.1	0.2414	6.167	582.2	0.2415

Table 4-193. LS1 Burnup and TH Feedback Parameters Assembly C20

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.632	642.8	0.7396	3.216	644.6	0.7396
2	0.000		0.7207	7.246	957.9	0.7207	14.522	986.9	0.7179
3	0.000		0.5509	9.404	1091.6	0.5509	18.525	1106.6	0.5436
4	0.000	Data	0.3976	9.788	1121.9	0.3976	19.270	1136.8	0.3946
5	0.000	Not	0.3200	9.273	1081.6	0.3200	18.913	1150.5	0.3179
6	0.000	Required	0.2705	8.446	1020.1	0.2705	18.130	1154.3	0.2667
7	0.000		0.2375	7.137	930.5	0.2375	16.217	1103.6	0.2309
8	0.000		0.2169	4.746	787.9	0.2169	11.148	906.7	0.2077
9	0.000		0.2091	1.708	636.5	0.2091	4.065	671.9	0.1989
10	0.000		0.2079	1.035	606.9	0.2079	2.420	625.3	0.1975

	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	5.099	679.1	0.7396	6.121	664.8	0.7396	7.327	635.5	0.7396
2	22.079	1107.2	0.7124	25.882	982.2	0.7129	30.316	842.9	0.7153
3	26.771	1144.8	0.5314	31.107	1035.3	0.5348	37.068	947.1	0.5470
4	27.382	1131.5	0.3863	31.760	1041.5	0.3904	38.386	1003.2	0.4043
5	26.759	1105.6	0.3121	31.082	1033.4	0.3162	37.876	1018.2	0.3294
6	25.410	1052.8	0.2626	29.642	1020.2	0.2664	35.879	970.0	0.2773
7	22.551	970.3	0.2282	26.583	992.0	0.2318	31.699	879.8	0.2411
8	15.830	843.5	0.2056	19.038	884.9	0.2088	22.685	775.4	0.2177
9	5.766	653.2	0.1970	6.976	668.9	0.1999	8.309	634.0	0.2086
10	3.389	613.4	0.1956	4.072	621.3	0.1984	4.813	601.9	0.2065

	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (EOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	7.735	602.7	0.7396	8.704	621.7	0.7396
2	31.892	719.3	0.7169	35.021	754.9	0.7192
3	39.388	795.0	0.5565	43.280	798.0	0.5683
4	41.097	842.0	0.4176	45.799	857.2	0.4344
5	40.661	851.1	0.3419	45.957	903.8	0.3584
6	38.591	842.0	0.2887	44.469	951.9	0.3042
7	34.050	798.6	0.2513	40.265	981.0	0.2657
8	24.386	726.3	0.2274	29.548	894.2	0.2402
9	8.959	621.6	0.2183	11.025	678.7	0.2303
10	5.265	603.4	0.2180	6.460	628.1	0.2298

Table 4-194. LS1 Burnup and TH Feedback Parameters Assembly C21

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.372	629.0	0.7396	2.586	624.1	0.7396
2	0.000		0.7299	6.068	878.5	0.7299	11.698	888.2	0.7301
3	0.000		0.5974	8.066	992.9	0.5974	15.660	987.5	0.5979
4	0.000	Data	0.4476	8.629	1033.2	0.4476	16.791	1030.0	0.4509
5	0.000	Not	0.3636	8.309	1010.1	0.3636	16.659	1044.6	0.3671
6	0.000	Required	0.3086	7.668	965.5	0.3086	16.066	1048.3	0.3102
7	0.000		0.2715	6.526	891.3	0.2715	14.360	1005.5	0.2703
8	0.000		0.2480	4.381	767.9	0.2480	9.933	851.0	0.2442
9	0.000		0.2393	1.578	630.7	0.2393	3.632	657.0	0.2342
10	0.000		0.2378	0.944	603.0	0.2378	2.132	616.3	0.2325
	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	4.150	657.7	0.7396	5.122	659.4	0.7396	6.023	615.8	0.7396
2	18.512	1066.4	0.7241	22.381	991.8	0.7230	25.824	770.9	0.7254
3	23.107	1068.1	0.5793	27.260	1009.0	0.5768	31.728	831.6	0.5911
4	23.840	1031.8	0.4371	27.848	988.6	0.4360	32.774	865.1	0.4555
5	23.284	994.6	0.3583	27.164	970.8	0.3582	31.989	857.6	0.3763
6	22.127	947.6	0.3046	25.858	950.6	0.3050	30.338	832.4	0.3212
7	19.631	885.6	0.2667	23.059	911.2	0.2674	26.982	793.3	0.2824
8	13.787	785.6	0.2416	16.401	814.3	0.2423	19.192	719.9	0.2567
9	4.996	634.6	0.2321	5.937	644.2	0.2327	6.860	611.7	0.2458
10	2.897	602.6	0.2305	3.422	607.5	0.2311	3.901	588.1	0.2429
	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (495.2, EOC Cy 7)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	6.384	597.7	0.7396	6.805	586.4	0.7396	6.819	605.4	0.7396
2	27.135	690.8	0.7266	28.547	643.5	0.7277	28.596	713.2	0.7277
3	33.542	738.2	0.5989	35.413	667.2	0.6071	35.477	755.4	0.6073
4	35.035	788.1	0.4687	37.616	710.5	0.4863	37.689	785.4	0.4866
5	34.468	813.7	0.3902	37.710	753.3	0.4145	37.782	784.2	0.4148
6	32.903	823.9	0.3344	36.738	793.8	0.3618	36.806	770.1	0.3620
7	29.445	811.8	0.2947	33.631	818.8	0.3227	33.691	742.6	0.3230
8	21.085	747.1	0.2684	24.635	774.6	0.2959	24.680	692.8	0.2961
9	7.511	621.7	0.2567	8.782	632.4	0.2823	8.798	607.3	0.2825
10	4.235	592.8	0.2529	4.879	597.6	0.2763	4.887	585.0	0.2765

Table 4-195. LS1 Burnup and TH Feedback Parameters Assembly C22

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.934	659.0	0.7396	3.737	657.0	0.7396
2	0.000		0.7090	8.342	1038.1	0.7090	16.268	1037.4	0.7071
3	0.000		0.5122	10.184	1154.0	0.5122	19.795	1147.9	0.5116
4	0.000	Data	0.3659	10.280	1162.0	0.3659	20.345	1187.7	0.3682
5	0.000	Not	0.2948	9.775	1120.9	0.2948	20.069	1208.3	0.2961
6	0.000	Required	0.2491	9.076	1066.6	0.2491	19.426	1213.4	0.2478
7	0.000		0.2182	8.054	992.4	0.2182	17.815	1161.3	0.2137
8	0.000		0.1976	5.688	841.6	0.1976	12.881	961.5	0.1908
9	0.000		0.1892	2.149	656.5	0.1892	4.917	692.4	0.1817
10	0.000		0.1878	1.321	619.4	0.1878	2.970	637.7	0.1801
	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	5.145	647.4	0.7396	6.001	646.9	0.7396	6.883	614.6	0.7396
2	22.175	955.2	0.7110	25.437	907.7	0.7129	28.858	769.2	0.7158
3	26.830	1030.4	0.5270	30.531	946.7	0.5360	35.114	840.0	0.5524
4	27.353	1028.1	0.3834	31.054	946.7	0.3935	37.191	962.4	0.4179
5	26.661	991.8	0.3099	30.301	938.6	0.3196	37.154	1023.5	0.3408
6	25.431	943.0	0.2605	28.980	926.8	0.2698	35.504	994.4	0.2866
7	23.026	881.0	0.2260	26.335	896.2	0.2347	31.951	918.8	0.2485
8	16.722	784.7	0.2033	19.282	808.0	0.2118	23.264	798.5	0.2237
9	6.294	635.3	0.1936	7.238	644.5	0.2017	8.638	637.7	0.2126
10	3.731	602.4	0.1912	4.250	607.0	0.1989	5.007	602.8	0.2092
	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (495.2, EOC Cy 7)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	7.253	598.7	0.7396	8.191	619.7	0.7396	8.196	576.1	0.7396
2	30.283	702.9	0.7174	33.352	750.8	0.7196	33.369	610.5	0.7196
3	37.123	759.6	0.5618	40.932	792.1	0.5737	40.956	628.8	0.5738
4	39.436	786.2	0.4306	43.874	837.3	0.4467	43.904	648.8	0.4469
5	39.445	791.4	0.3535	44.359	873.6	0.3697	44.393	658.7	0.3699
6	37.834	796.0	0.2990	43.250	913.5	0.3146	43.284	659.7	0.3148
7	34.221	789.1	0.2606	39.922	936.9	0.2754	39.954	652.7	0.2756
8	25.620	799.7	0.2385	30.289	855.8	0.2511	30.313	630.2	0.2513
9	9.531	644.4	0.2266	11.368	665.1	0.2389	11.377	587.8	0.2390
10	5.514	608.4	0.2230	6.534	618.3	0.2352	6.539	576.7	0.2353

Table 4-196. LS1 Burnup and TH Feedback Parameters Assembly C23

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	2.003	662.8	0.7396	3.794	656.3	0.7396
2	0.000		0.7070	8.642	1061.3	0.7070	16.466	1029.1	0.7068
3	0.000		0.5050	10.372	1169.6	0.5050	19.844	1136.1	0.5100
4	0.000	Data	0.3595	10.403	1172.2	0.3595	20.356	1177.8	0.3669
5	0.000	Not	0.2895	9.882	1129.5	0.2895	20.085	1200.1	0.2952
6	0.000	Required	0.2444	9.173	1074.0	0.2444	19.458	1207.5	0.2469
7	0.000		0.2135	8.091	995.0	0.2135	17.840	1160.3	0.2128
8	0.000		0.1932	5.687	841.6	0.1932	12.911	963.7	0.1899
9	0.000		0.1851	2.125	655.4	0.1851	4.890	692.3	0.1808
10	0.000		0.1838	1.302	618.5	0.1838	2.942	637.3	0.1792
	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	5.607	674.3	0.7396	6.684	670.8	0.7396	8.053	646.2	0.7396
2	23.720	1077.5	0.7066	27.638	999.0	0.7077	32.646	887.6	0.7108
3	28.086	1144.3	0.5110	32.459	1040.9	0.5164	39.179	1011.9	0.5297
4	28.425	1127.2	0.3683	32.752	1034.1	0.3741	39.993	1058.9	0.3863
5	27.683	1082.1	0.2972	31.938	1023.6	0.3028	38.826	1026.6	0.3125
6	26.393	1021.7	0.2498	30.582	1014.1	0.2550	36.639	954.9	0.2631
7	23.879	945.9	0.2165	27.876	987.1	0.2214	32.714	858.9	0.2285
8	17.366	827.1	0.1942	20.431	867.6	0.1988	23.854	760.4	0.2059
9	6.521	649.3	0.1853	7.674	663.6	0.1897	8.964	631.6	0.1969
10	3.863	610.8	0.1835	4.512	618.3	0.1878	5.235	601.0	0.1947
	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (EOC Cy 7)					
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)			
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7			
1	8.793	639.0	0.7396	10.048	640.8	0.7396			
2	35.340	854.1	0.7124	39.242	810.9	0.7145			
3	42.816	965.8	0.5365	47.574	861.6	0.5474			
4	43.932	1009.9	0.3932	49.477	924.1	0.4078			
5	42.815	1017.6	0.3183	48.953	974.3	0.3326			
6	40.492	997.1	0.2680	47.149	1020.8	0.2813			
7	36.000	916.9	0.2328	42.728	1027.4	0.2446			
8	26.195	798.4	0.2098	31.487	905.3	0.2199			
9	9.859	644.6	0.2008	11.954	680.5	0.2102			
10	5.741	608.3	0.1985	6.919	627.1	0.2076			

Table 4-197. LS1 Burnup and TH Feedback Parameters Assembly C24

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.906	657.5	0.7396	3.657	654.0	0.7396
2	0.000		0.7104	8.332	1037.3	0.7104	16.042	1020.2	0.7099
3	0.000		0.5150	10.153	1151.4	0.5150	19.485	1124.2	0.5182
4	0.000	Data	0.3677	10.236	1158.3	0.3677	20.026	1163.4	0.3735
5	0.000	Not	0.2963	9.712	1115.9	0.2963	19.748	1185.2	0.3006
6	0.000	Required	0.2503	8.984	1059.7	0.2503	19.115	1193.6	0.2515
7	0.000		0.2188	7.902	981.8	0.2188	17.555	1151.9	0.2167
8	0.000		0.1981	5.552	833.6	0.1981	12.749	961.8	0.1934
9	0.000		0.1900	2.059	652.4	0.1900	4.800	691.1	0.1842
10	0.000		0.1887	1.257	616.6	0.1887	2.878	636.4	0.1827

	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	5.480	675.0	0.7396	6.543	669.3	0.7396	7.284	605.7	0.7396
2	23.273	1075.3	0.7089	27.163	995.0	0.7098	30.103	736.4	0.7135
3	27.420	1114.3	0.5186	31.740	1033.0	0.5234	36.109	824.7	0.5446
4	27.753	1094.2	0.3755	32.030	1026.8	0.3809	37.114	877.0	0.4084
5	27.022	1052.1	0.3036	31.216	1014.8	0.3088	36.191	868.8	0.3331
6	25.784	998.5	0.2554	29.885	1001.5	0.2603	34.406	835.4	0.2811
7	23.416	931.5	0.2215	27.300	971.5	0.2261	31.144	787.9	0.2443
8	17.118	821.0	0.1987	20.091	856.4	0.2031	23.188	739.0	0.2216
9	6.390	647.0	0.1896	7.498	659.4	0.1939	8.652	624.2	0.2117
10	3.771	609.3	0.1878	4.391	615.8	0.1919	5.092	599.8	0.2104

	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (EOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	7.726	606.3	0.7396	9.134	651.2	0.7396
2	31.809	733.8	0.7153	36.189	847.7	0.7169
3	38.555	809.9	0.5541	43.717	893.1	0.5621
4	39.868	847.3	0.4204	45.758	953.0	0.4303
5	39.067	862.8	0.3446	45.541	1004.2	0.3537
6	38.512	1037.8	0.2946	45.256	1028.7	0.3018
7	35.222	1031.6	0.2551	41.997	1031.8	0.2612
8	26.109	870.2	0.2297	31.519	914.7	0.2346
9	9.739	663.1	0.2192	11.925	686.0	0.2237
10	5.684	616.2	0.2172	6.906	629.6	0.2214

Table 4-198. LS1 Burnup and TH Feedback Parameters Assembly C25

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.512	636.4	0.7396	3.252	653.4	0.7396
2	0.000		0.7245	6.759	924.2	0.7245	14.488	1021.9	0.7166
3	0.000		0.5681	8.928	1055.4	0.5681	18.371	1133.6	0.5432
4	0.000	Data	0.4148	9.381	1089.9	0.4148	19.189	1165.0	0.3957
5	0.000	Not	0.3348	8.916	1054.5	0.3348	18.909	1181.3	0.3184
6	0.000	Required	0.2835	8.150	998.9	0.2835	18.195	1185.9	0.2665
7	0.000		0.2491	6.947	918.0	0.2491	16.361	1131.6	0.2301
8	0.000		0.2275	4.718	786.2	0.2275	11.424	927.4	0.2066
9	0.000		0.2191	1.721	637.1	0.2191	4.227	679.2	0.1975
10	0.000		0.2178	1.041	607.2	0.2178	2.523	629.9	0.1960
	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	4.378	629.2	0.7396	5.085	631.1	0.7396	6.334	638.3	0.7396
2	19.372	871.9	0.7202	22.136	844.4	0.7218	26.977	874.3	0.7223
3	24.473	950.8	0.5609	27.628	876.9	0.5696	33.833	967.3	0.5739
4	25.494	967.6	0.4153	28.718	885.4	0.4268	35.494	1016.6	0.4324
5	24.936	944.7	0.3365	28.161	885.6	0.3480	35.114	1032.5	0.3541
6	23.742	906.6	0.2832	26.934	881.6	0.2944	33.329	983.5	0.2991
7	21.256	857.5	0.2462	24.287	861.9	0.2571	29.545	890.7	0.2612
8	15.067	771.5	0.2230	17.462	789.6	0.2338	21.170	779.5	0.2376
9	5.523	630.9	0.2132	6.402	638.6	0.2235	7.720	633.2	0.2272
10	3.234	599.8	0.2107	3.712	603.5	0.2204	4.442	601.3	0.2242
	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (495.2, EOC Cy 7)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	6.766	605.3	0.7396	7.798	625.9	0.7396	7.803	576.1	0.7396
2	28.698	735.7	0.7238	32.090	773.6	0.7255	32.109	617.6	0.7255
3	36.274	809.4	0.5823	40.334	809.8	0.5917	40.360	637.5	0.5918
4	38.293	852.9	0.4439	43.106	865.7	0.4575	43.141	662.8	0.4577
5	37.970	860.1	0.3647	43.381	913.1	0.3780	43.420	676.0	0.3782
6	36.108	850.4	0.3089	42.116	963.1	0.3211	42.156	678.0	0.3213
7	31.977	808.3	0.2699	38.357	995.7	0.2807	38.396	673.9	0.2809
8	22.930	732.6	0.2457	28.256	907.5	0.2545	28.287	649.8	0.2546
9	8.382	622.7	0.2354	10.507	682.3	0.2432	10.518	593.3	0.2434
10	4.899	603.9	0.2339	6.125	629.8	0.2418	6.131	579.5	0.2420

Table 4-199. LS1 Burnup and TH Feedback Parameters Assembly C26

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.514	636.5	0.7396	3.034	641.0	0.7396
2	0.000		0.7246	6.768	924.8	0.7246	13.802	968.7	0.7210
3	0.000		0.5684	8.931	1055.6	0.5684	17.869	1091.5	0.5561
4	0.000	Data	0.4149	9.394	1090.9	0.4149	18.689	1121.1	0.4070
5	0.000	Not	0.3348	8.928	1055.4	0.3348	18.354	1132.1	0.3286
6	0.000	Required	0.2834	8.146	998.7	0.2834	17.563	1131.3	0.2762
7	0.000		0.2491	6.870	913.2	0.2491	15.591	1074.4	0.2398
8	0.000		0.2277	4.543	776.8	0.2277	10.622	885.2	0.2162
9	0.000		0.2197	1.614	632.3	0.2197	3.830	664.9	0.2072
10	0.000		0.2185	0.970	604.1	0.2185	2.266	621.2	0.2057
	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	4.168	629.7	0.7396	5.408	689.0	0.7396	6.874	652.7	0.7396
2	18.656	869.6	0.7222	23.179	1091.4	0.7183	28.750	934.0	0.7192
3	23.515	914.2	0.5694	28.244	1094.9	0.5602	35.028	1017.2	0.5639
4	24.374	917.3	0.4260	29.041	1085.1	0.4188	35.921	1025.9	0.4219
5	23.809	899.5	0.3474	28.426	1077.6	0.3416	34.873	987.7	0.3445
6	22.718	876.7	0.2943	27.234	1062.2	0.2893	32.949	926.7	0.2923
7	21.550	939.7	0.2609	25.663	1003.6	0.2559	30.262	841.3	0.2586
8	15.933	890.4	0.2377	19.051	873.9	0.2325	22.203	742.8	0.2354
9	5.684	661.8	0.2260	6.850	664.8	0.2211	7.967	622.2	0.2245
10	3.285	616.0	0.2232	3.949	619.6	0.2185	4.559	595.0	0.2218
	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	7.446	620.4	0.7396	8.307	614.6	0.7396	8.313	579.3	0.7396
2	30.872	782.5	0.7206	33.724	735.8	0.7224	33.746	625.6	0.7225
3	37.902	862.7	0.5711	41.554	781.2	0.5821	41.585	651.5	0.5823
4	39.227	919.3	0.4312	43.723	841.8	0.4487	43.764	680.1	0.4489
5	38.506	965.0	0.3532	43.573	885.5	0.3714	43.617	690.5	0.3716
6	36.596	967.1	0.2996	42.167	926.2	0.3170	42.211	689.4	0.3172
7	33.411	898.4	0.2640	39.065	933.0	0.2795	39.104	677.0	0.2797
8	24.463	788.8	0.2400	28.958	842.8	0.2536	28.989	648.9	0.2538
9	8.787	637.5	0.2290	10.492	657.3	0.2422	10.503	593.3	0.2424
10	5.003	602.7	0.2263	5.920	612.6	0.2388	5.925	576.7	0.2389

Table 4-200. LS1 Burnup and TH Feedback Parameters Assembly C27

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.381	629.5	0.7396	2.667	628.0	0.7396
2	0.000		0.7293	6.160	884.5	0.7293	12.185	896.1	0.7282
3	0.000		0.5927	8.231	1004.6	0.5927	16.225	1017.2	0.5877
4	0.000	Data	0.4419	8.750	1042.1	0.4419	17.212	1053.3	0.4397
5	0.000	Not	0.3586	8.380	1015.2	0.3586	16.982	1064.4	0.3575
6	0.000	Required	0.3043	7.690	967.0	0.3043	16.296	1064.8	0.3018
7	0.000		0.2679	6.499	889.6	0.2679	14.477	1016.4	0.2630
8	0.000		0.2451	4.322	764.8	0.2451	9.916	853.7	0.2377
9	0.000		0.2366	1.553	629.6	0.2366	3.608	657.1	0.2282
10	0.000		0.2353	0.932	602.5	0.2353	2.126	616.5	0.2265
	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	3.839	632.2	0.7396	4.509	627.3	0.7396	5.699	634.5	0.7396
2	17.354	894.2	0.7285	20.025	833.1	0.7293	24.849	873.0	0.7291
3	22.369	954.2	0.5928	25.416	863.8	0.5990	31.804	982.9	0.5996
4	23.339	952.8	0.4478	26.479	875.1	0.4573	33.525	1040.9	0.4569
5	22.812	928.8	0.3664	25.958	875.8	0.3762	32.772	1019.9	0.3747
6	21.680	894.0	0.3111	24.795	872.1	0.3206	31.024	969.2	0.3190
7	19.267	849.9	0.2726	22.242	855.2	0.2818	27.343	878.7	0.2806
8	13.434	763.4	0.2479	15.786	784.8	0.2570	19.354	770.1	0.2560
9	4.829	626.9	0.2379	5.671	635.3	0.2465	6.940	630.5	0.2458
10	2.797	597.7	0.2358	3.253	601.6	0.2439	3.963	600.3	0.2434
	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	6.420	636.9	0.7396	7.804	649.5	0.7396	7.813	589.0	0.7396
2	27.716	877.2	0.7291	32.350	867.7	0.7290	32.379	650.1	0.7290
3	35.566	983.8	0.5994	40.680	889.2	0.6018	40.720	676.5	0.6020
4	37.570	1026.1	0.4562	43.207	931.7	0.4614	43.255	701.0	0.4616
5	36.864	1033.3	0.3736	43.074	980.8	0.3789	43.124	708.5	0.3791
6	34.916	1003.1	0.3176	41.699	1032.5	0.3220	41.747	701.0	0.3221
7	30.683	924.2	0.2792	37.693	1053.7	0.2817	37.736	688.4	0.2818
8	21.871	819.1	0.2544	27.590	940.4	0.2546	27.623	655.8	0.2547
9	7.910	651.8	0.2441	10.167	690.3	0.2433	10.179	596.1	0.2434
10	4.518	612.8	0.2417	5.803	633.1	0.2408	5.809	579.5	0.2409

Table 4-201. LS1 Burnup and TH Feedback Parameters Assembly C28

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.934	659.0	0.7396	3.737	657.0	0.7396
2	0.000		0.7090	8.345	1038.3	0.7090	16.274	1037.7	0.7071
3	0.000		0.5122	10.188	1154.4	0.5122	19.804	1148.3	0.5115
4	0.000	Data	0.3658	10.285	1162.4	0.3658	20.353	1188.0	0.3681
5	0.000	Not	0.2947	9.779	1121.3	0.2947	20.077	1208.6	0.2961
6	0.000	Required	0.2490	9.081	1067.0	0.2490	19.434	1213.7	0.2477
7	0.000		0.2182	8.058	992.7	0.2182	17.822	1161.6	
8	0.000		0.1976	5.692	841.9	0.1976	12.888	961.7	0.1908
9	0.000		0.1891	2.150	656.6	0.1891	4.919	692.5	0.1816
10	0.000		0.1878	1.322	619.4	0.1878	2.972	637.7	0.1800

	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	5.142	647.2	0.7396	5.997	646.8	0.7396	6.881	614.7	0.7396
2	22.173	954.5	0.7110	25.434	907.6	0.7129	28.861	769.6	0.7158
3	26.833	1030.0	0.5271	30.533	946.6	0.5360	35.120	840.3	0.5524
4	27.360	1028.0	0.3834	31.059	946.5	0.3935	37.200	962.8	0.4179
5	26.669	991.8	0.3099	30.307	938.4	0.3196	37.165	1023.9	0.3408
6	25.438	942.9	0.2605	28.988	926.8	0.2698	35.516	994.7	0.2866
7	23.033	881.0	0.2260	26.343	896.2	0.2347	31.961	919.1	0.2484
8	16.729	784.7	0.2033	19.289	808.0	0.2118	23.274	798.6	0.2236
9	6.296	635.3	0.1936	7.239	644.4	0.2017	8.639	637.7	0.2126
10	3.733	602.4	0.1912	4.252	607.0	0.1989	5.009	602.8	0.2092

	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (495.2, EOC Cy 7)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	7.251	598.7	0.7396	8.190	619.7	0.7396	8.195	576.1	0.7396
2	30.288	703.1	0.7174	33.360	751.0	0.7196	33.377	610.5	0.7197
3	37.132	759.8	0.5618	40.943	792.3	0.5737	40.967	628.8	0.5738
4	39.447	786.4	0.4306	43.887	837.5	0.4467	43.917	648.8	0.4469
5	39.457	791.5	0.3535	44.374	873.8	0.3697	44.407	658.7	0.3699
6	37.846	796.1	0.2989	43.265	913.7	0.3145	43.300	660.7	0.3147
7	34.232	789.2	0.2606	39.937	937.2	0.2754	39.968	651.7	0.2755
8	25.631	799.7	0.2384	30.302	856.0	0.2511	30.327	631.2	0.2512
9	9.533	644.5	0.2266	11.370	665.1	0.2388	11.379	587.8	0.2389
10	5.516	608.4	0.2230	6.537	618.3	0.2351	6.541	573.9	0.2353

Table 4-202. LS1 Burnup and TH Feedback Parameters Assembly C29

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.882	656.2	0.7396	3.675	656.4	0.7396
2	0.000		0.7113	8.241	1030.5	0.7113	16.177	1038.2	0.7093
3	0.000		0.5171	10.163	1152.3	0.5171	19.701	1141.6	0.5158
4	0.000	Data	0.3690	10.265	1160.7	0.3690	20.188	1175.2	0.3709
5	0.000	Not	0.2971	9.707	1115.5	0.2971	19.842	1194.0	0.2983
6	0.000	Required	0.2511	8.929	1055.6	0.2511	19.134	1200.3	0.2497
7	0.000		0.2198	7.738	970.6	0.2198	17.432	1155.4	0.2153
8	0.000		0.1997	5.328	820.6	0.1997	12.492	959.6	0.1923
9	0.000		0.1918	1.963	648.0	0.1918	4.677	689.7	0.1834
10	0.000		0.1906	1.198	614.0	0.1906	2.806	635.8	0.1819
	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	5.454	672.1	0.7396	6.217	637.0	0.7396	7.299	627.4	0.7396
2	23.197	1055.2	0.7077	26.076	858.6	0.7098	30.006	805.5	0.7133
3	27.449	1096.1	0.5164	30.923	917.1	0.5271	36.073	882.3	0.5449
4	27.822	1085.3	0.3748	31.440	935.8	0.3874	37.016	915.3	0.4080
5	27.262	1065.4	0.3036	30.852	932.1	0.3152	36.211	898.2	0.3332
6	26.051	1020.1	0.2550	29.563	921.9	0.2658	34.425	860.4	0.2816
7	23.514	949.4	0.2207	27.186	943.1	0.2325	31.246	802.9	0.2461
8	17.170	842.7	0.1989	20.510	901.2	0.2115	23.305	720.1	0.2235
9	6.423	655.7	0.1903	7.711	676.2	0.2020	8.690	614.7	0.2133
10	3.795	614.4	0.1885	4.516	624.6	0.1996	5.037	590.3	0.2099
	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (495.2, EOC Cy 7)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	7.656	597.3	0.7396	8.212	594.9	0.7396	8.218	579.3	0.7396
2	31.253	684.0	0.7147	33.039	666.4	0.7166	33.060	624.5	0.7166
3	37.870	736.4	0.5536	40.268	699.1	0.5649	40.298	648.6	0.5651
4	39.354	797.2	0.4227	42.538	749.4	0.4429	42.577	676.0	0.4431
5	39.065	860.1	0.3501	42.836	789.4	0.3740	42.879	687.4	0.3742
6	37.456	882.6	0.2972	41.775	828.6	0.3224	41.818	688.4	0.3226
7	33.986	845.7	0.2592	38.571	848.3	0.2840	38.613	683.2	0.2841
8	25.311	759.7	0.2348	29.080	789.8	0.2580	29.114	657.8	0.2582
9	9.407	627.8	0.2237	10.830	641.0	0.2458	10.842	596.1	0.2460
10	5.413	596.6	0.2195	6.157	603.1	0.2399	6.164	582.2	0.2401

Table 4-203. LS1 Burnup and TH Feedback Parameters Assembly C30

	Datapoint 3 (BOC Cy 5)			Datapoint 4 (239.5 EFPD Cy 5)			Datapoint 5 (BOC Cy 6)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 5	0.00 Cy 5	0.00 Cy 5	239.5 Cy 5	239.5 Cy 5	239.5 Cy 5	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6
1	0.000		0.7396	1.397	630.3	0.7396	3.077	650.0	0.7396
2	0.000		0.7283	6.245	890.0	0.7283	13.832	1011.0	0.7191
3	0.000		0.5857	8.495	1023.5	0.5857	17.929	1132.8	0.5528
4	0.000	Data	0.4320	9.088	1067.4	0.4320	18.852	1161.1	0.4049
5	0.000	Not	0.3490	8.663	1035.7	0.3490	18.568	1173.5	0.3260
6	0.000	Required	0.2956	7.912	982.2	0.2956	17.806	1172.6	0.2730
7	0.000		0.2600	6.709	902.8	0.2600	15.874	1110.8	0.2362
8	0.000		0.2377	4.521	775.4	0.2377	10.956	908.9	0.2127
9	0.000		0.2292	1.646	633.7	0.2292	4.038	673.6	0.2035
10	0.000		0.2278	0.992	605.1	0.2278	2.407	626.7	0.2020

	Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7
1	4.962	679.2	0.7396	6.070	674.3	0.7396	7.541	653.0	0.7396
2	21.542	1122.4	0.7128	25.672	1030.4	0.7125	31.116	923.4	0.7145
3	26.289	1156.2	0.5363	30.828	1065.7	0.5364	37.784	1032.8	0.5439
4	26.876	1122.9	0.3927	31.365	1058.0	0.3936	38.663	1064.2	0.4000
5	26.129	1078.7	0.3178	30.547	1047.4	0.3190	37.445	1027.6	0.3243
6	24.753	1022.8	0.2676	29.105	1037.8	0.2690	35.165	955.1	0.2737
7	21.998	952.8	0.2327	26.156	1009.8	0.2339	31.015	860.5	0.2385
8	15.495	833.2	0.2098	18.688	883.3	0.2107	22.123	761.2	0.2157
9	5.680	649.9	0.2011	6.864	666.5	0.2017	8.126	630.1	0.2068
10	3.339	611.4	0.1997	4.009	620.1	0.2003	4.711	599.9	0.2051

	Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (EOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	495.2 Cy 7	495.2 Cy 7	495.2 Cy 7
1	8.229	633.2	0.7396	9.395	634.8	0.7396
2	33.634	831.4	0.7158	37.336	796.0	0.7178
3	41.171	930.6	0.5505	45.724	846.1	0.5609
4	42.421	983.2	0.4073	47.769	908.0	0.4219
5	41.450	1019.9	0.3308	47.364	955.1	0.3451
6	39.081	1006.6	0.279	45.526	1001.6	0.2924
7	34.328	920.6	0.2428	40.892	1012.3	0.2551
8	24.488	801.2	0.2196	29.673	896.5	0.2301
9	9.008	643.3	0.2106	11.017	675.3	0.2204
10	5.204	607.1	0.2088	6.321	623.7	0.2181

Table 4-204. LS1 Burnup and TH Feedback Parameters Assembly D1

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.481	652.5	0.7396	2.432	657.4	0.7396
2	0.000		0.7110	7.017	1057.5	0.7110	11.451	1079.5	0.7099
3	0.000		0.5221	8.202	1143.0	0.5221	13.118	1126.8	0.5205
4	0.000	Data	0.3788	8.028	1125.7	0.3788	12.714	1090.3	0.3794
5	0.000	Not	0.3088	7.405	1066.2	0.3088	11.886	1059.0	0.3101
6	0.000	Required	0.2640	6.605	994.8	0.2640	10.858	1025.3	0.2648
7	0.000		0.2345	5.365	894.1	0.2345	9.097	952.5	0.2342
8	0.000		0.2153	3.908	790.1	0.2153	6.645	829.8	0.2140
9	0.000		0.2078	1.236	627.9	0.2078	2.130	640.2	0.2062
10	0.000		0.2067	0.725	600.6	0.2067	1.232	606.1	0.2050

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	3.586	632.3	0.7396	4.397	647.2	0.7396	6.011	665.7	0.7396
2	17.007	934.2	0.7143	20.629	987.2	0.7140	26.580	981.7	0.7137
3	20.554	1079.6	0.5374	25.143	1115.6	0.5370	31.503	995.6	0.5408
4	20.639	1127.1	0.3916	25.462	1155.6	0.3904	32.123	1023.1	0.3980
5	19.391	1086.1	0.3177	24.326	1175.2	0.3155	31.526	1074.3	0.3233
6	17.438	1001.4	0.2700	22.094	1127.2	0.2667	29.957	1140.8	0.2732
7	14.273	885.9	0.2385	18.139	1001.5	0.2345	26.167	1158.0	0.2382
8	10.099	763.4	0.2181	12.755	837.7	0.2140	19.002	988.6	0.2143
9	3.239	621.9	0.2104	4.120	643.5	0.2062	6.351	689.1	0.2050
10	1.853	595.7	0.2091	2.353	607.9	0.2049	3.618	632.2	0.2034

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	6.035	639.5	0.7396
2	26.671	873.0	0.7137
3	31.617	954.9	0.5411
4	32.246	993.3	0.3983
5	31.648	984.2	0.3236
6	30.069	941.4	0.2733
7	26.262	874.8	0.2383
8	19.071	773.9	0.2144
9	6.375	630.4	0.2051
10	3.630	596.2	0.2035

Table 4-205. LS1 Burnup and TH Feedback Parameters Assembly D2

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.714	668.0	0.7396	2.887	681.9	0.7396
2	0.000		0.7006	7.817	1136.2	0.7006	13.024	1209.4	0.6966
3	0.000		0.4939	8.654	1189.1	0.4939	14.158	1225.8	0.4850
4	0.000	Data	0.3560	8.405	1163.3	0.3560	13.643	1179.6	0.3495
5	0.000	Not	0.2896	7.805	1104.0	0.2896	12.841	1146.2	0.2841
6	0.000	Required	0.2468	7.051	1034.0	0.2468	11.849	1107.9	0.2412
7	0.000		0.2181	5.882	934.7	0.2181	10.125	1024.2	0.2118
8	0.000		0.1991	4.387	823.3	0.1991	7.473	871.8	0.1926
9	0.000		0.1915	1.409	637.3	0.1915	2.428	651.6	0.1849
10	0.000		0.1904	0.831	606.2	0.1904	1.416	612.9	0.1839

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	4.161	640.2	0.7396	4.716	618.7	0.7396	5.385	602.3	0.7396
2	18.727	946.6	0.7040	21.067	809.9	0.7076	23.625	716.3	0.7116
3	21.240	1046.2	0.5124	24.412	902.8	0.5292	27.832	766.0	0.5512
4	20.782	1051.5	0.3745	24.312	951.8	0.3933	28.636	830.0	0.4273
5	19.565	1013.8	0.3052	23.181	964.0	0.3220	28.236	885.9	0.3589
6	17.895	955.3	0.2596	21.478	959.4	0.2744	27.110	932.7	0.3097
7	15.231	880.2	0.2295	18.521	918.6	0.2426	24.345	948.8	0.2751
8	10.925	763.4	0.2087	13.316	805.4	0.2202	17.960	855.1	0.2493
9	3.478	618.7	0.2001	4.239	632.1	0.2112	5.794	648.9	0.2389
10	1.979	592.6	0.1980	2.382	599.1	0.2085	3.192	606.8	0.2347

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	5.397	598.9	0.7396
2	23.680	736.1	0.7117
3	27.914	823.8	0.5517
4	28.732	875.9	0.4279
5	28.333	878.6	0.3593
6	27.203	866.6	0.3101
7	24.467	990.2	0.2755
8	18.066	922.3	0.2496
9	5.830	666.1	0.2392
10	3.211	616.0	0.2350

Table 4-206. LS1 Burnup and TH Feedback Parameters Assembly D3

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.142	630.4	0.7396	2.019	649.4	0.7396
2	0.000		0.7237	5.659	936.0	0.7237	9.800	1034.1	0.7196
3	0.000		0.5671	7.501	1075.1	0.5671	12.133	1082.1	0.5559
4	0.000	Data	0.4148	7.817	1105.0	0.4148	12.225	1048.1	0.4097
5	0.000	Not	0.3356	7.297	1056.3	0.3356	11.534	1022.8	0.3337
6	0.000	Required	0.2852	6.513	986.9	0.2852	10.562	996.0	0.2841
7	0.000		0.2524	5.297	888.8	0.2524	8.864	930.8	0.2509
8	0.000		0.2313	3.876	787.9	0.2313	6.523	819.1	0.2290
9	0.000		0.2230	1.233	627.7	0.2230	2.107	638.4	0.2205
10	0.000		0.2218	0.721	600.4	0.2218	1.215	605.0	0.2192

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	3.149	630.8	0.7396	3.952	646.3	0.7396	5.533	663.4	0.7396
2	15.346	933.3	0.7209	19.038	998.0	0.7192	25.044	986.7	0.7175
3	19.549	1077.7	0.5601	24.170	1121.0	0.5547	30.533	995.9	0.5548
4	20.122	1124.3	0.4107	24.930	1152.9	0.4052	31.575	1021.6	0.4098
5	19.037	1086.0	0.3325	23.947	1170.8	0.3269	31.112	1070.8	0.3322
6	17.213	1007.7	0.2822	21.859	1125.4	0.2760	29.651	1133.4	0.2801
7	14.115	891.6	0.2491	17.995	1003.6	0.2426	25.960	1151.4	0.2439
8	10.039	767.6	0.2279	12.750	844.6	0.2215	18.983	987.2	0.2194
9	3.244	623.4	0.2197	4.158	646.7	0.2131	6.389	689.1	0.2096
10	1.856	596.7	0.2185	2.380	610.1	0.2119	3.650	632.5	0.2081

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	5.545	598.9	0.7396
2	25.095	719.0	0.7176
3	30.606	787.9	0.5551
4	31.662	841.9	0.4103
5	31.245	1047.4	0.3329
6	29.798	1108.9	0.2806
7	26.086	1004.6	0.2443
8	19.072	852.5	0.2197
9	6.420	651.0	0.2099
10	3.667	610.3	0.2084

Table 4-207. LS1 Burnup and TH Feedback Parameters Assembly D4

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	**0.00 Cy 6**	**0.00 Cy 6**	**196.1 Cy 6**	**196.1 Cy 6**	**196.1 Cy 6**	**0.00 Cy 7**	**0.00 Cy 7**	**0.00 Cy 7**
1	0.000		0.7396	1.592	659.9	0.7396	2.827	688.8	0.7396
2	0.000		0.7059	7.302	1084.7	0.7059	12.705	1244.5	0.6971
3	0.000		0.5114	8.234	1146.2	0.5114	13.881	1251.1	0.4901
4	0.000	Data	0.3717	8.080	1130.8	0.3717	13.478	1206.9	0.3546
5	0.000	Not	0.3029	7.555	1080.2	0.3029	12.768	1175.5	0.2881
6	0.000	Required	0.2582	6.912	1021.6	0.2582	11.892	1137.0	0.2441
7	0.000		0.2277	6.045	947.8	0.2277	10.445	1047.2	0.2140
8	0.000		0.2066	4.689	845.0	0.2066	7.891	886.2	0.1941
9	0.000		0.1979	1.512	643.0	0.1979	2.578	655.9	0.1858
10	0.000		0.1967	0.887	609.2	0.1967	1.501	615.4	0.1847

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	**193.2 Cy 7**	**193.2 Cy 7**	**306.8 Cy 7**	**306.8 Cy 7**	**306.8 Cy 7**	**0.00 Cy 8**	**0.00 Cy 8**	**0.00 Cy 8**
1	3.928	628.9	0.7396	4.431	613.1	0.7396	5.158	606.1	0.7396
2	17.699	887.6	0.7062	19.860	787.9	0.7099	22.667	733.1	0.7141
3	20.333	989.9	0.5246	23.228	866.4	0.5416	26.812	777.2	0.5629
4	20.378	1029.5	0.3872	23.534	900.3	0.4069	27.840	828.6	0.4381
5	19.559	1019.8	0.3154	22.762	906.6	0.3335	27.617	870.1	0.3661
6	18.171	975.0	0.2672	21.388	908.4	0.2840	26.751	910.5	0.3155
7	15.806	900.0	0.2342	18.873	888.6	0.2499	24.463	929.2	0.2794
8	11.577	779.1	0.2117	13.943	802.1	0.2262	18.459	845.3	0.2526
9	3.716	623.5	0.2026	4.491	633.4	0.2166	6.035	648.2	0.2421
10	2.109	595.0	0.2004	2.517	599.6	0.2136	3.326	606.8	0.2379

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	**3.67 Cy 8**	**3.67 Cy 8**
1	5.170	598.9	0.7396
2	22.722	736.2	0.7142
3	26.899	842.0	0.5633
4	27.943	904.5	0.4386
5	27.725	925.8	0.3665
6	26.913	1189.2	0.3158
7	24.608	1099.2	0.2795
8	18.563	912.1	0.2526
9	6.073	672.2	0.2421
10	3.347	621.7	0.2379

Table 4-208. LS1 Burnup and TH Feedback Parameters Assembly D5

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.139	630.3	0.7396	2.015	649.3	0.7396
2	0.000		0.7238	5.647	934.9	0.7238	9.782	1033.2	0.7197
3	0.000		0.5676	7.490	1074.1	0.5676	12.117	1081.4	0.5564
4	0.000	Data	0.4153	7.809	1104.3	0.4153	12.213	1047.5	0.4101
5	0.000	Not	0.3360	7.291	1055.7	0.3360	11.524	1022.2	0.3340
6	0.000	Required	0.2855	6.507	986.5	0.2855	10.553	995.5	0.2844
7	0.000		0.2528	5.292	888.5	0.2528	8.856	930.3	0.2511
8	0.000		0.2316	3.872	787.7	0.2316	6.517	818.9	0.2293
9	0.000		0.2233	1.232	627.7	0.2233	2.105	638.3	0.2207
10	0.000		0.2221	0.720	600.4	0.2221	1.214	605.0	0.2195

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	3.142	630.6	0.7396	3.944	646.2	0.7396	5.524	663.3	0.7396
2	15.317	932.4	0.7210	19.003	997.0	0.7193	25.008	986.6	0.7176
3	19.523	1076.7	0.5606	24.140	1120.2	0.5551	30.500	995.7	0.5551
4	20.102	1123.5	0.4111	24.905	1152.2	0.4056	31.545	1021.1	0.4101
5	19.019	1085.2	0.3328	23.926	1170.2	0.3272	31.084	1070.2	0.3325
6	17.198	1007.1	0.2825	21.840	1124.8	0.2763	29.625	1132.8	0.2804
7	14.102	891.3	0.2494	17.978	1003.0	0.2429	25.936	1150.7	0.2442
8	10.030	767.4	0.2282	12.738	844.2	0.2217	18.965	986.7	0.2196
9	3.240	623.3	0.2200	4.154	646.7	0.2133	6.383	689.0	0.2098
10	1.854	596.7	0.2187	2.377	610.0	0.2121	3.646	632.5	0.2083

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	5.536	598.9	0.7396
2	25.059	719.0	0.7177
3	30.573	786.1	0.5555
4	31.633	845.8	0.4107
5	31.218	1045.7	0.3331
6	29.772	1107.2	0.2809
7	26.062	1003.0	0.2445
8	19.054	850.0	0.2199
9	6.414	651.0	0.2101
10	3.663	610.3	0.2085

Table 4-209. LS1 Burnup and TH Feedback Parameters Assembly D6

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	**0.00 Cy 6**	**0.00 Cy 6**	**196.1 Cy 6**	**196.1 Cy 6**	**196.1 Cy 6**	**0.00 Cy 7**	**0.00 Cy 7**	**0.00 Cy 7**
1	0.000		0.7396	1.424	648.8	0.7396	2.424	662.8	0.7396
2	0.000		0.7116	6.901	1046.7	0.7116	11.594	1121.6	0.7081
3	0.000		0.5203	8.434	1166.3	0.5203	13.556	1160.7	0.5134
4	0.000	Data	0.3731	8.407	1163.6	0.3731	13.226	1111.1	0.3708
5	0.000	Not	0.3017	7.758	1099.6	0.3017	12.367	1078.4	0.3013
6	0.000	Required	0.2567	6.886	1019.4	0.2567	11.270	1044.5	0.2564
7	0.000		0.2274	5.549	908.4	0.2274	9.394	968.0	0.2262
8	0.000		0.2086	4.020	797.8	0.2086	6.828	838.1	0.2065
9	0.000		0.2012	1.276	630.0	0.2012	2.197	642.7	0.1989
10	0.000		0.2001	0.751	602.0	0.2001	1.276	607.7	0.1978

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	**193.2 Cy 7**	**193.2 Cy 7**	**306.8 Cy 7**	**306.8 Cy 7**	**306.8 Cy 7**	**0.00 Cy 8**	**0.00 Cy 8**	**0.00 Cy 8**
1	3.656	637.4	0.7396	4.234	621.3	0.7396	5.177	620.2	0.7396
2	17.346	950.8	0.7124	19.924	840.0	0.7152	23.598	794.6	0.7186
3	20.755	1057.1	0.5307	24.115	928.2	0.5440	28.621	843.5	0.5623
4	20.899	1102.2	0.3862	24.400	947.7	0.4008	29.545	892.9	0.4258
5	19.970	1095.4	0.3129	23.443	943.9	0.3263	29.065	931.8	0.3511
6	18.262	1038.1	0.2652	21.713	940.8	0.2776	27.814	972.7	0.3007
7	15.277	942.1	0.2333	18.546	915.6	0.2450	24.831	989.0	0.2660
8	10.810	799.6	0.2124	13.365	824.9	0.2232	18.358	882.4	0.2410
9	3.428	628.6	0.2045	4.271	639.9	0.2148	5.986	658.2	0.2316
10	1.947	598.3	0.2031	2.399	603.5	0.2129	3.321	613.0	0.2289

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	**3.67 Cy 8**	**3.67 Cy 8**
1	5.195	619.0	0.7396
2	23.670	796.2	0.7186
3	28.715	869.2	0.5627
4	29.650	914.2	0.4262
5	29.169	908.6	0.3514
6	27.911	878.6	0.3010
7	24.916	830.5	0.2662
8	18.419	749.5	0.2412
9	6.006	618.9	0.2318
10	3.332	593.4	0.2291

Table 4-210. LS1 Burnup and TH Feedback Parameters Assembly D7

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.763	671.3	0.7396	2.924	680.5	0.7396
2	0.000		0.6955	8.166	1172.8	0.6955	13.344	1204.2	0.6936
3	0.000		0.4756	9.275	1255.3	0.4756	14.848	1237.8	0.4733
4	0.000	Data	0.3369	9.012	1226.7	0.3369	14.339	1194.8	0.3365
5	0.000	Not	0.2720	8.343	1157.2	0.2720	13.491	1164.5	0.2720
6	0.000	Required	0.2306	7.466	1072.1	0.2306	12.423	1133.3	0.2301
7	0.000		0.2035	6.095	952.2	0.2035	10.540	1053.9	0.2015
8	0.000		0.1859	4.441	827.2	0.1859	7.677	890.7	0.1829
9	0.000		0.1790	1.428	638.4	0.1790	2.503	656.7	0.1756
10	0.000		0.1780	0.850	607.2	0.1780	1.470	615.9	0.1745

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	4.410	654.3	0.7396	4.849	606.2	0.7396	5.756	617.8	0.7396
2	19.920	1024.9	0.6995	21.827	757.6	0.7025	25.331	782.0	0.7074
3	22.783	1128.2	0.4926	25.416	833.4	0.5091	29.940	845.0	0.5322
4	22.182	1119.0	0.3536	25.215	884.1	0.3768	30.527	906.4	0.4061
5	20.757	1063.5	0.2864	24.857	1039.5	0.3159	30.567	939.1	0.3417
6	18.792	982.9	0.2427	23.184	1083.2	0.2675	29.353	978.7	0.2918
7	15.655	881.0	0.2134	19.381	980.6	0.2323	25.701	992.1	0.2559
8	11.069	759.3	0.1941	13.650	828.5	0.2096	18.581	877.7	0.2307
9	3.566	619.4	0.1866	4.388	637.9	0.2010	6.070	656.3	0.2212
10	2.057	593.9	0.1854	2.496	602.4	0.1986	3.399	612.0	0.2180

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	5.771	608.9	0.7396
2	25.386	735.4	0.7075
3	30.017	802.4	0.5327
4	30.617	849.6	0.4067
5	30.655	845.7	0.3422
6	29.434	820.4	0.2922
7	25.776	793.4	0.2563
8	18.636	728.0	0.2310
9	6.088	613.1	0.2216
10	3.409	590.6	0.2183

Table 4-211. LS1 Burnup and TH Feedback Parameters Assembly D8

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.476	652.2	0.7396	2.424	657.1	0.7396
2	0.000		0.7113	6.996	1055.5	0.7113	11.421	1078.1	0.7101
3	0.000		0.5229	8.186	1141.3	0.5229	13.094	1125.7	0.5212
4	0.000	Data	0.3794	8.017	1124.6	0.3794	12.697	1089.3	0.3800
5	0.000	Not	0.3093	7.396	1065.4	0.3093	11.873	1058.3	0.3106
6	0.000	Required	0.2645	6.597	994.2	0.2645	10.846	1024.7	0.2652
7	0.000		0.2349	5.359	893.6	0.2349	9.087	952.0	0.2346
8	0.000		0.2157	3.904	789.8	0.2157	6.639	829.5	0.2143
9	0.000		0.2081	1.234	627.8	0.2081	2.128	640.2	0.2065
10	0.000		0.2071	0.724	600.6	0.2071	1.231	606.1	0.2053

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	3.574	632.1	0.7396	4.383	647.0	0.7396	5.997	665.7	0.7396
2	16.964	933.1	0.7145	20.579	986.1	0.7142	26.531	981.8	0.7138
3	20.518	1078.5	0.5381	25.103	1114.9	0.5376	31.460	995.4	0.5413
4	20.612	1126.2	0.3922	25.432	1154.9	0.3909	32.088	1022.6	0.3985
5	19.369	1085.3	0.3182	24.301	1174.6	0.3159	31.495	1073.7	0.3237
6	17.420	1000.8	0.2704	22.072	1126.5	0.2670	29.928	1140.1	0.2735
7	14.258	885.4	0.2389	18.120	1000.9	0.2349	26.140	1157.2	0.2384
8	10.089	763.1	0.2184	12.741	837.4	0.2143	18.983	988.1	0.2145
9	3.235	621.8	0.2107	4.116	643.5	0.2065	6.344	689.0	0.2052
10	1.850	595.6	0.2094	2.350	607.9	0.2052	3.613	632.1	0.2036

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	6.020	636.0	0.7396
2	26.619	859.2	0.7138
3	31.576	961.6	0.5416
4	32.218	1024.4	0.3987
5	31.631	1050.1	0.3239
6	30.058	1024.6	0.2736
7	26.251	940.1	0.2386
8	19.064	816.5	0.2146
9	6.374	648.0	0.2053
10	3.629	607.5	0.2037

Table 4-212. LS1 Burnup and TH Feedback Parameters Assembly D9

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.686	666.2	0.7396	2.728	667.4	0.7396
2	0.000		0.7009	7.794	1134.0	0.7009	12.550	1131.8	0.7008
3	0.000		0.4925	8.798	1204.1	0.4925	13.990	1172.2	0.4940
4	0.000	Data	0.3530	8.574	1180.6	0.3530	13.530	1133.2	0.3557
5	0.000	Not	0.2863	7.925	1115.7	0.2863	12.691	1102.9	0.2891
6	0.000	Required	0.2438	7.096	1038.1	0.2438	11.671	1073.2	0.2459
7	0.000		0.2158	5.827	930.4	0.2158	9.969	1009.4	0.2165
8	0.000		0.1975	4.257	814.2	0.1975	7.299	866.3	0.1969
9	0.000		0.1903	1.357	634.5	0.1903	2.356	649.7	0.1894
10	0.000		0.1892	0.801	604.6	0.1892	1.371	611.6	0.1882

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	4.041	642.8	0.7396	4.816	643.2	0.7396	6.290	656.0	0.7396
2	18.688	985.1	0.7064	22.183	968.1	0.7084	27.632	936.8	0.7101
3	22.044	1140.2	0.5113	26.556	1102.7	0.5171	32.787	984.2	0.5276
4	21.874	1169.7	0.3672	26.466	1116.1	0.3718	33.285	1037.7	0.3855
5	20.520	1117.7	0.2968	25.071	1109.2	0.3003	32.421	1088.8	0.3130
6	18.504	1024.0	0.2515	23.077	1112.9	0.2540	30.882	1134.7	0.2646
7	15.377	903.9	0.2216	19.394	1024.3	0.2228	27.192	1134.2	0.2309
8	10.985	779.0	0.2021	13.758	852.6	0.2025	19.751	966.1	0.2078
9	3.560	627.1	0.1948	4.483	647.5	0.1950	6.613	683.0	0.1991
10	2.049	598.7	0.1935	2.570	609.8	0.1937	3.771	628.6	0.1975

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	6.302	598.9	0.7396
2	27.676	699.0	0.7102
3	32.850	755.4	0.5280
4	33.364	810.5	0.3861
5	32.503	820.3	0.3136
6	30.960	806.7	0.2651
7	27.263	779.1	0.2314
8	19.804	721.3	0.2083
9	6.631	613.1	0.1996
10	3.780	587.9	0.1979

Table 4-213. LS1 Burnup and TH Feedback Parameters Assembly D10

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.372	645.4	0.7396	2.245	649.0	0.7396
2	0.000		0.7165	6.521	1011.1	0.7165	10.627	1028.8	0.7157
3	0.000		0.5447	7.566	1081.3	0.5447	12.178	1079.1	0.5430
4	0.000	Data	0.4038	7.359	1061.9	0.4038	11.781	1050.2	0.4032
5	0.000	Not	0.3335	6.849	1016.0	0.3335	11.069	1020.4	0.3328
6	0.000	Required	0.2866	6.166	957.8	0.2866	10.154	987.5	0.2855
7	0.000		0.2548	5.043	869.7	0.2548	8.522	919.2	0.2530
8	0.000		0.2340	3.712	776.8	0.2340	6.286	810.9	0.2315
9	0.000		0.2258	1.186	625.2	0.2258	2.036	636.3	0.2230
10	0.000		0.2246	0.694	599.0	0.2246	1.175	603.9	0.2218

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	3.610	646.2	0.7396	4.400	644.8	0.7396	5.868	655.6	0.7396
2	17.093	1015.0	0.7143	20.684	982.5	0.7146	26.180	941.0	0.7153
3	20.464	1163.9	0.5360	25.075	1119.2	0.5365	31.233	977.8	0.5439
4	20.451	1204.0	0.3910	25.199	1142.7	0.3901	31.866	1023.6	0.4006
5	19.315	1159.8	0.3181	24.034	1137.5	0.3164	31.242	1075.0	0.3262
6	17.406	1062.5	0.2709	21.883	1097.0	0.2683	29.686	1134.6	0.2760
7	14.226	927.7	0.2399	18.016	990.1	0.2366	25.975	1150.8	0.2411
8	10.069	785.7	0.2205	12.679	832.0	0.2168	18.898	986.0	0.2175
9	3.246	627.4	0.2127	4.113	642.2	0.2090	6.327	688.1	0.2081
10	1.859	599.0	0.2117	2.351	607.2	0.2079	3.602	631.4	0.2067

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	5.889	629.2	0.7396
2	26.259	821.9	0.7154
3	31.335	898.5	0.5442
4	31.978	941.2	0.4010
5	31.351	928.4	0.3265
6	29.787	893.6	0.2763
7	26.063	843.3	0.2414
8	18.962	757.5	0.2177
9	6.349	624.6	0.2084
10	3.614	596.2	0.2069

Table 4-214. LS1 Burnup and TH Feedback Parameters Assembly D11

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.662	664.5	0.7396	2.755	673.0	0.7396
2	0.000		0.7022	7.750	1129.6	0.7022	12.729	1169.5	0.6999
3	0.000		0.4972	8.609	1184.6	0.4972	13.922	1192.8	0.4928
4	0.000	Data	0.3593	8.274	1150.1	0.3593	13.290	1143.0	0.3567
5	0.000	Not	0.2932	7.631	1087.4	0.2932	12.419	1106.3	0.2912
6	0.000	Required	0.2506	6.829	1014.4	0.2506	11.360	1066.5	0.2482
7	0.000		0.2223	5.582	910.9	0.2223	9.550	984.9	0.2190
8	0.000		0.2039	4.088	802.4	0.2039	6.973	847.4	0.1999
9	0.000		0.1965	1.301	631.4	0.1965	2.246	644.8	0.1924
10	0.000		0.1955	0.767	602.8	0.1955	1.307	609.0	0.1913

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	3.942	634.5	0.7396	4.395	607.7	0.7396	4.971	596.3	0.7396
2	18.143	922.1	0.7074	20.106	764.2	0.7108	22.379	697.6	0.7145
3	20.701	1018.6	0.5227	23.463	849.7	0.5406	26.578	745.6	0.5619
4	20.079	1019.5	0.3849	23.286	907.2	0.4073	27.291	806.8	0.4420
5	18.768	980.9	0.3152	22.170	933.9	0.3361	26.790	852.1	0.3738
6	17.030	924.4	0.2692	20.433	934.0	0.2877	25.567	892.0	0.3248
7	14.220	847.5	0.2383	17.308	891.5	0.2548	22.649	908.7	0.2903
8	10.036	737.9	0.2171	12.232	782.4	0.2316	16.471	824.7	0.2642
9	3.167	611.7	0.2088	3.847	624.5	0.2225	5.231	639.0	0.2534
10	1.801	588.9	0.2068	2.159	595.0	0.2196	2.872	601.5	0.2486

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	4.984	602.2	0.7396
2	22.435	736.3	0.7146
3	26.656	809.7	0.5624
4	27.383	860.1	0.4425
5	26.928	1069.2	0.3743
6	25.718	1129.9	0.3250
7	22.777	1017.1	0.2904
8	16.562	857.7	0.2642
9	5.261	648.0	0.2534
10	2.888	607.5	0.2487

Table 4-215. LS1 Burnup and TH Feedback Parameters Assembly D12

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.773	672.0	0.7396	2.867	673.1	0.7396
2	0.000		0.6950	8.134	1169.3	0.6950	13.083	1164.6	0.6949
3	0.000		0.4764	9.169	1243.8	0.4764	14.677	1226.1	0.4773
4	0.000	Data	0.3384	9.006	1226.0	0.3384	14.353	1198.1	0.3399
5	0.000	Not	0.2729	8.517	1174.8	0.2729	13.691	1168.9	0.2744
6	0.000	Required	0.2304	7.712	1095.4	0.2304	12.667	1132.9	0.2314
7	0.000		0.2025	6.271	966.8	0.2025	10.707	1052.5	0.2024
8	0.000		0.1845	4.581	837.2	0.1845	7.881	898.5	0.1831
9	0.000		0.1773	1.489	641.7	0.1773	2.604	660.4	0.1755
10	0.000		0.1764	0.889	609.3	0.1764	1.534	618.1	0.1744

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	3.735	613.9	0.7396	4.091	597.3	0.7396	4.625	593.6	0.7396
2	17.050	808.7	0.7049	18.587	715.7	0.7085	20.695	686.9	0.7126
3	20.000	896.9	0.5225	22.134	774.3	0.5412	24.896	722.5	0.5627
4	20.356	951.6	0.3904	22.815	812.2	0.4155	26.256	767.3	0.4492
5	19.796	960.1	0.3192	22.365	825.4	0.3438	26.341	804.6	0.3815
6	18.464	934.6	0.2707	21.130	837.3	0.2945	25.636	843.5	0.3327
7	15.801	879.2	0.2380	18.486	839.8	0.2619	23.337	869.7	0.2993
8	11.389	767.1	0.2143	13.560	779.1	0.2377	17.582	808.7	0.2725
9	3.670	619.6	0.2043	4.370	626.4	0.2265	5.720	637.1	0.2602
10	2.094	592.4	0.2007	2.450	594.8	0.2211	3.140	600.2	0.2529

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	4.638	602.2	0.7396
2	20.754	748.0	0.7127
3	24.983	843.8	0.5632
4	26.357	894.8	0.4496
5	26.440	889.4	0.3818
6	25.731	871.9	0.3330
7	23.459	993.1	0.2995
8	17.689	925.2	0.2727
9	5.757	669.2	0.2602
10	3.160	618.9	0.2530

Table 4-216. LS1 Burnup and TH Feedback Parameters Assembly D13

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.723	668.6	0.7396	2.867	678.6	0.7396
2	0.000		0.6998	7.818	1136.3	0.6998	12.883	1184.3	0.6970
3	0.000		0.4916	8.707	1194.5	0.4916	14.154	1215.8	0.4856
4	0.000	Data	0.3532	8.522	1175.3	0.3532	13.790	1184.7	0.3488
5	0.000	Not	0.2864	7.967	1119.7	0.2864	13.082	1159.1	0.2825
6	0.000	Required	0.2433	7.262	1053.1	0.2433	12.205	1131.1	0.2389
7	0.000		0.2141	6.183	959.3	0.2141	10.685	1062.4	0.2089
8	0.000		0.1946	4.660	842.9	0.1946	7.974	900.4	0.1889
9	0.000		0.1868	1.506	642.7	0.1868	2.611	659.5	0.1810
10	0.000		0.1857	0.890	609.3	0.1857	1.526	617.3	0.1799

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	3.980	629.7	0.7396	4.496	614.5	0.7396	5.183	603.5	0.7396
2	17.893	888.9	0.7061	20.098	793.2	0.7096	22.748	722.5	0.7138
3	20.609	990.1	0.5213	23.563	874.1	0.5382	26.992	766.6	0.5597
4	20.550	1016.9	0.3831	23.795	912.3	0.4026	27.997	820.9	0.4351
5	19.608	996.3	0.3118	22.914	920.7	0.3297	27.706	865.2	0.3644
6	18.174	948.9	0.2642	21.473	919.6	0.2806	26.779	905.9	0.3143
7	15.746	876.8	0.2315	18.833	891.2	0.2466	24.348	922.9	0.2784
8	11.452	765.1	0.2091	13.765	795.9	0.2230	18.205	839.6	0.2519
9	3.684	619.9	0.2003	4.435	631.2	0.2136	5.939	645.9	0.2414
10	2.098	593.1	0.1979	2.493	598.4	0.2105	3.278	605.5	0.2368

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	5.196	602.2	0.7396
2	22.806	744.4	0.7139
3	27.113	992.8	0.5601
4	28.160	1198.4	0.4354
5	27.861	1147.3	0.3643
6	26.924	1095.1	0.3141
7	24.478	1021.6	0.2783
8	18.300	873.6	0.2517
9	5.973	660.0	0.2412
10	3.297	616.0	0.2366

Table 4-217. LS1 Burnup and TH Feedback Parameters Assembly D14

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.709	667.7	0.7396	2.881	681.8	0.7396
2	0.000		0.7008	7.799	1134.3	0.7008	13.000	1208.3	0.6967
3	0.000		0.4943	8.640	1187.6	0.4943	14.139	1224.9	0.4853
4	0.000	Data	0.3563	8.395	1162.3	0.3563	13.628	1178.8	0.3498
5	0.000	Not	0.2899	7.797	1103.2	0.2899	12.828	1145.4	0.2843
6	0.000	Required	0.2470	7.043	1033.4	0.2470	11.838	1107.4	0.2413
7	0.000		0.2183	5.875	934.2	0.2183	10.114	1023.5	0.2120
8	0.000		0.1993	4.383	823.0	0.1993	7.465	871.4	0.1927
9	0.000		0.1917	1.407	637.2	0.1917	2.425	651.5	0.1851
10	0.000		0.1906	0.830	606.2	0.1906	1.415	612.9	0.1841

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	4.157	640.3	0.7396	4.713	618.9	0.7396	5.381	602.2	0.7396
2	18.708	947.1	0.7041	21.051	810.3	0.7077	23.607	716.2	0.7117
3	21.220	1046.2	0.5125	24.393	902.8	0.5293	27.811	766.0	0.5513
4	20.764	1051.2	0.3747	24.292	951.5	0.3934	28.615	829.9	0.4274
5	19.549	1013.5	0.3053	23.163	963.7	0.3221	28.217	885.8	0.3590
6	17.880	955.0	0.2596	21.461	959.1	0.2745	27.092	932.5	0.3098
7	15.217	880.0	0.2296	18.506	918.4	0.2426	24.328	948.6	0.2752
8	10.915	763.3	0.2087	13.305	805.2	0.2202	17.947	855.0	0.2493
9	3.475	618.7	0.2002	4.236	632.1	0.2112	5.791	648.9	0.2389
10	1.977	592.5	0.1981	2.380	599.1	0.2086	3.189	606.8	0.2347

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	5.393	598.9	0.7396
2	23.663	737.4	0.7118
3	27.894	822.9	0.5518
4	28.711	874.6	0.4279
5	28.314	878.6	0.3594
6	27.185	866.6	0.3101
7	24.450	991.5	0.2755
8	18.053	922.3	0.2496
9	5.827	666.1	0.2392
10	3.209	618.9	0.2350

Table 4-218. LS1 Burnup and TH Feedback Parameters Assembly D15

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.499	653.7	0.7396	2.525	665.6	0.7396
2	0.000		0.7103	7.123	1067.5	0.7103	11.912	1137.6	0.7066
3	0.000		0.5230	8.002	1123.4	0.5230	13.111	1158.6	0.5138
4	0.000	Data	0.3843	7.656	1089.8	0.3843	12.446	1106.5	0.3773
5	0.000	Not	0.3159	7.068	1035.5	0.3159	11.611	1068.3	0.3100
6	0.000	Required	0.2714	6.354	973.5	0.2714	10.614	1026.3	0.2656
7	0.000		0.2415	5.208	882.1	0.2415	8.875	944.0	0.2353
8	0.000		0.2218	3.846	785.8	0.2218	6.516	822.0	0.2154
9	0.000		0.2140	1.229	627.5	0.2140	2.106	638.7	0.2076
10	0.000		0.2129	0.722	600.5	0.2129	1.222	605.5	0.2065

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	3.849	643.5	0.7396	4.493	628.5	0.7396	5.364	615.4	0.7396
2	17.994	979.8	0.7108	20.809	871.3	0.7134	24.197	773.7	0.7169
3	20.654	1089.7	0.5279	24.317	971.0	0.5395	28.614	828.0	0.5592
4	20.060	1096.6	0.3871	23.918	999.5	0.3987	28.998	887.8	0.4266
5	18.792	1055.5	0.3166	22.638	997.7	0.3266	28.284	933.9	0.3543
6	17.044	988.2	0.2705	20.808	985.5	0.2789	26.937	975.2	0.3046
7	14.175	895.3	0.2396	17.595	936.5	0.2467	23.843	985.7	0.2699
8	10.081	771.0	0.2194	12.557	815.5	0.2252	17.451	874.7	0.2448
9	3.204	621.3	0.2116	3.998	635.2	0.2170	5.640	653.9	0.2353
10	1.822	594.5	0.2103	2.252	601.5	0.2155	3.126	610.4	0.2327

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	5.377	602.2	0.7396
2	24.250	725.9	0.7170
3	28.689	796.9	0.5596
4	29.086	847.0	0.4272
5	28.374	853.5	0.3548
6	27.023	834.2	0.3050
7	23.916	788.7	0.2702
8	17.503	717.0	0.2451
9	5.657	610.3	0.2356
10	3.139	599.0	0.2332

Table 4-219. LS1 Burnup and TH Feedback Parameters Assembly D16

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.775	672.1	0.7396	2.869	673.1	0.7396
2	0.000		0.6949	8.136	1169.5	0.6949	13.087	1164.9	0.6947
3	0.000		0.4760	9.167	1243.5	0.4760	14.674	1226.0	0.4768
4	0.000	Data	0.3381	9.003	1225.7	0.3381	14.349	1198.0	0.3395
5	0.000	Not	0.2726	8.515	1174.6	0.2726	13.687	1168.7	0.2741
6	0.000	Required	0.2301	7.710	1095.2	0.2301	12.663	1132.7	0.2311
7	0.000		0.2022	6.270	966.7	0.2022	10.705	1052.3	0.2021
8	0.000		0.1843	4.580	837.2	0.1843	7.879	898.3	0.1829
9	0.000		0.1771	1.489	641.7	0.1771	2.604	660.4	0.1752
10	0.000		0.1761	0.890	609.3	0.1761	1.534	618.0	0.1741

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	3.822	619.3	0.7396	4.252	605.2	0.7396	5.386	632.9	0.7396
2	17.588	848.7	0.7028	19.624	772.7	0.7071	24.023	849.7	0.7113
3	20.635	948.2	0.5135	23.466	858.2	0.5328	28.744	903.6	0.5494
4	21.885	1090.7	0.3822	24.810	870.1	0.4020	30.535	940.4	0.4195
5	21.858	1151.9	0.3076	24.713	861.1	0.3256	30.813	972.7	0.3421
6	20.262	1095.3	0.2569	23.094	858.1	0.2745	29.653	1013.7	0.2897
7	17.055	981.5	0.2233	19.720	837.3	0.2409	26.485	1032.7	0.2542
8	12.201	823.7	0.2006	14.828	833.5	0.2209	20.161	909.8	0.2307
9	3.971	636.1	0.1918	4.872	645.4	0.2114	6.780	669.6	0.2204
10	2.286	602.6	0.1899	2.808	609.9	0.2097	3.884	621.6	0.2187

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	5.408	632.6	0.7396
2	24.118	888.2	0.7113
3	28.879	1048.1	0.5495
4	30.683	1113.8	0.4195
5	30.958	1096.7	0.3421
6	29.795	1084.9	0.2897
7	26.612	1012.2	0.2542
8	20.254	865.5	0.2306
9	6.815	663.1	0.2203
10	3.904	618.9	0.2186

Table 4-220. LS1 Burnup and TH Feedback Parameters Assembly D17

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.710	667.8	0.7396	2.917	685.7	0.7396
2	0.000		0.6995	7.822	1136.8	0.6995	13.136	1228.6	0.6943
3	0.000		0.4902	8.767	1200.9	0.4902	14.443	1256.0	0.4786
4	0.000	Data	0.3519	8.550	1178.1	0.3519	14.023	1220.0	0.3428
5	0.000	Not	0.2855	8.000	1123.0	0.2855	13.306	1191.1	0.2775
6	0.000	Required	0.2425	7.291	1055.8	0.2425	12.378	1154.6	0.2345
7	0.000		0.2135	6.202	960.8	0.2135	10.730	1066.5	0.2050
8	0.000		0.1940	4.704	846.1	0.1940	8.025	901.2	0.1855
9	0.000		0.1861	1.528	643.9	0.1861	2.643	660.4	0.1776
10	0.000		0.1849	0.905	610.1	0.1849	1.550	618.1	0.1766

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	4.336	649.8	0.7396	4.945	624.7	0.7396	5.696	607.6	0.7396
2	19.468	1002.4	0.7007	22.035	838.7	0.7045	24.888	736.3	0.7089
3	22.109	1101.6	0.5001	25.564	941.5	0.5166	29.368	792.7	0.5395
4	21.600	1092.9	0.3616	25.393	989.9	0.3788	30.123	860.5	0.4122
5	20.359	1043.7	0.2933	24.238	1002.7	0.3085	29.675	916.6	0.3432
6	18.645	974.0	0.2485	22.455	992.5	0.2617	28.451	963.6	0.2945
7	15.945	888.6	0.2189	19.373	937.8	0.2303	25.507	975.6	0.2603
8	11.521	766.3	0.1985	13.973	812.7	0.2085	18.803	869.6	0.2350
9	3.717	620.0	0.1901	4.506	634.8	0.1996	6.142	653.6	0.2250
10	2.131	593.5	0.1882	2.553	600.8	0.1972	3.413	609.6	0.2212

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	5.720	639.5	0.7396
2	24.982	881.2	0.7090
3	29.487	976.0	0.5397
4	30.251	1015.0	0.4124
5	29.802	1010.3	0.3433
6	28.568	967.9	0.2945
7	25.605	885.7	0.2604
8	18.873	781.0	0.2350
9	6.166	630.4	0.2251
10	3.427	601.8	0.2213

Table 4-221. LS1 Burnup and TH Feedback Parameters Assembly D18

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.592	659.9	0.7396	2.828	688.9	0.7396
2	0.000		0.7059	7.302	1084.7	0.7059	12.709	1245.2	0.6971
3	0.000		0.5114	8.234	1146.2	0.5114	13.884	1251.5	0.4901
4	0.000	Data	0.3718	8.081	1130.8	0.3718	13.481	1207.3	0.3546
5	0.000	Not	0.3029	7.556	1080.3	0.3029	12.770	1175.7	0.2881
6	0.000	Required	0.2582	6.913	1021.7	0.2582	11.894	1137.2	0.2441
7	0.000		0.2277	6.046	947.8	0.2277	10.446	1047.3	0.2140
8	0.000		0.2066	4.689	845.0	0.2066	7.892	886.3	0.1941
9	0.000		0.1979	1.512	643.0	0.1979	2.578	655.9	0.1857
10	0.000		0.1967	0.887	609.2	0.1967	1.501	615.4	0.1847

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	3.930	628.9	0.7396	4.433	613.1	0.7396	5.160	606.1	0.7396
2	17.704	887.7	0.7062	19.866	788.0	0.7098	22.671	733.0	0.7141
3	20.337	990.0	0.5246	23.232	866.4	0.5415	26.815	777.1	0.5628
4	20.380	1029.5	0.3872	23.536	900.3	0.4068	27.842	828.6	0.4381
5	19.562	1019.8	0.3154	22.765	906.6	0.3334	27.621	870.1	0.3661
6	18.174	975.0	0.2672	21.391	908.6	0.2840	26.755	910.5	0.3155
7	15.808	900.0	0.2342	18.875	888.6	0.2499	24.467	929.3	0.2794
8	11.578	779.1	0.2117	13.944	802.1	0.2262	18.461	845.4	0.2526
9	3.716	623.5	0.2026	4.492	633.5	0.2166	6.036	648.2	0.2421
10	2.110	595.0	0.2004	2.517	599.5	0.2136	3.327	606.8	0.2379

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	5.183	636.1	0.7396
2	22.766	888.3	0.7141
3	26.936	985.1	0.5630
4	27.972	1024.4	0.4382
5	27.751	1027.6	0.3661
6	26.877	988.9	0.3154
7	24.569	902.1	0.2793
8	18.534	786.9	0.2525
9	6.062	636.2	0.2421
10	3.341	601.8	0.2379

Table 4-222. LS1 Burnup and TH Feedback Parameters Assembly D19

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.639	663.0	0.7396	2.829	683.8	0.7396
2	0.000		0.7041	7.566	1110.9	0.7041	12.903	1232.6	0.6976
3	0.000		0.5051	8.347	1157.7	0.5051	13.881	1231.2	0.4897
4	0.000	Data	0.3677	8.023	1125.1	0.3677	13.212	1171.5	0.3557
5	0.000	Not	0.3009	7.435	1069.0	0.3009	12.383	1131.9	0.2906
6	0.000	Required	0.2575	6.714	1004.2	0.2575	11.370	1085.8	0.2477
7	0.000		0.2284	5.576	910.4	0.2284	9.588	991.2	0.2185
8	0.000		0.2091	4.175	808.4	0.2091	7.067	848.3	0.1995
9	0.000		0.2012	1.342	633.6	0.2012	2.295	645.6	0.1918
10	0.000		0.2002	0.790	604.0	0.2002	1.337	609.6	0.1908

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	4.335	655.7	0.7396	4.966	627.1	0.7396	5.818	614.2	0.7396
2	19.647	1040.8	0.7021	22.355	857.0	0.7056	25.614	764.5	0.7099
3	21.994	1146.1	0.5029	25.633	967.6	0.5180	29.918	827.3	0.5402
4	21.162	1129.7	0.3647	25.124	1015.2	0.3799	30.296	895.1	0.4106
5	19.735	1071.6	0.2973	23.824	1034.7	0.3103	29.574	942.7	0.3404
6	17.840	991.7	0.2534	21.841	1021.3	0.2642	28.093	986.0	0.2922
7	14.825	890.5	0.2241	18.351	951.6	0.2330	24.716	996.1	0.2588
8	10.525	763.8	0.2049	13.005	816.2	0.2124	17.955	879.2	0.2346
9	3.361	619.6	0.1974	4.152	635.0	0.2043	5.815	655.1	0.2254
10	1.922	593.7	0.1961	2.349	601.3	0.2027	3.235	611.0	0.2226

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	5.838	625.7	0.7396
2	25.690	811.4	0.7100
3	30.017	891.3	0.5406
4	30.406	932.6	0.4110
5	29.683	926.9	0.3407
6	28.194	894.9	0.2925
7	24.804	842.0	0.2590
8	18.020	758.7	0.2348
9	5.837	624.6	0.2255
10	3.247	596.2	0.2228

Table 4-223. LS1 Burnup and TH Feedback Parameters Assembly D20

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.506	654.2	0.7396	2.557	668.3	0.7396
2	0.000		0.7106	7.081	1063.4	0.7106	11.956	1151.9	0.7060
3	0.000		0.5256	7.886	1112.1	0.5256	13.025	1163.5	0.5135
4	0.000	Data	0.3874	7.554	1080.1	0.3874	12.366	1110.2	0.3779
5	0.000	Not	0.3188	6.993	1028.7	0.3188	11.563	1072.5	0.3107
6	0.000	Required	0.2740	6.319	970.5	0.2740	10.605	1030.2	0.2661
7	0.000		0.2438	5.223	883.1	0.2438	8.905	946.1	0.2357
8	0.000		0.2237	3.895	789.1	0.2237	6.574	823.0	0.2158
9	0.000		0.2157	1.253	628.8	0.2157	2.136	639.2	0.2078
10	0.000		0.2145	0.735	601.1	0.2145	1.239	605.8	0.2067

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	3.916	645.8	0.7396	4.652	638.8	0.7396	5.960	644.6	0.7396
2	18.330	1006.5	0.7090	21.650	942.0	0.7111	26.609	895.1	0.7134
3	21.050	1137.2	0.5209	25.258	1053.4	0.5282	31.086	949.2	0.5409
4	20.786	1177.7	0.3789	24.973	1050.0	0.3851	31.315	994.0	0.4011
5	19.739	1152.6	0.3076	23.817	1033.1	0.3131	30.572	1031.8	0.3278
6	17.932	1069.5	0.2614	21.968	1026.6	0.2661	29.136	1071.0	0.2788
7	14.852	947.5	0.2308	18.534	973.9	0.2345	25.743	1075.0	0.2447
8	10.591	802.0	0.2113	13.343	849.6	0.2138	18.915	930.0	0.2210
9	3.410	631.0	0.2036	4.334	647.6	0.2059	6.278	671.8	0.2119
10	1.951	600.5	0.2027	2.464	609.1	0.2048	3.543	621.7	0.2104

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	5.981	629.2	0.7396
2	26.690	833.6	0.7135
3	31.194	926.8	0.5412
4	31.434	976.6	0.4014
5	30.691	972.1	0.3281
6	29.245	928.5	0.2790
7	25.835	860.2	0.2448
8	18.981	764.5	0.2212
9	6.301	627.5	0.2121
10	3.555	596.2	0.2105

Table 4-224. LS1 Burnup and TH Feedback Parameters Assembly D21

Node No.	Datapoint 5 (BOC Cy 6) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Datapoint 6 (196.1 Cy 6) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 7 (BOC Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.747	670.3	0.7396	2.881	677.5	0.7396
2	0.000		0.6967	8.021	1157.4	0.6967	13.125	1191.3	0.6945
3	0.000		0.4819	8.952	1220.5	0.4819	14.495	1232.3	0.4780
4	0.000	Data	0.3449	8.718	1195.6	0.3449	14.069	1198.8	0.3421
5	0.000	Not	0.2797	8.183	1141.0	0.2797	13.361	1169.7	0.2771
6	0.000	Required	0.2372	7.440	1069.7	0.2372	12.398	1133.4	0.2343
7	0.000		0.2086	6.226	962.9	0.2086	10.690	1056.6	0.2049
8	0.000		0.1897	4.685	844.7	0.1897	8.043	905.9	0.1853
9	0.000		0.1820	1.535	644.3	0.1820	2.672	662.4	0.1774
10	0.000		0.1809	0.913	610.6	0.1809	1.570	619.2	0.1763

Node No.	Statepoint 8 (193.2 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 9 (306.8 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 10 (BOC Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	3.623	605.9	0.7396	4.086	608.8	0.7396	5.634	661.1	0.7396
2	16.822	789.1	0.7050	19.078	799.1	0.7091	24.923	972.0	0.7097
3	20.002	911.6	0.5270	23.215	908.1	0.5430	29.772	1013.5	0.5456
4	20.146	957.8	0.3943	23.549	934.0	0.4100	30.621	1061.7	0.4127
5	19.118	931.3	0.3211	22.546	937.5	0.3352	30.135	1112.7	0.3370
6	17.501	879.9	0.2717	22.247	1145.2	0.2868	30.066	1136.1	0.2863
7	14.893	813.6	0.2383	19.474	1115.3	0.2488	27.234	1130.1	0.2470
8	11.284	749.1	0.2172	14.417	899.9	0.2238	20.402	965.3	0.2206
9	3.749	620.2	0.2085	4.784	658.4	0.2142	6.951	685.2	0.2102
10	2.237	598.1	0.2086	2.807	614.3	0.2135	4.030	629.9	0.2092

Node No.	Statepoint 11 (3.67 EFPD Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	5.647	602.2	0.7396
2	24.975	725.0	0.7098
3	29.845	788.8	0.5460
4	30.707	839.3	0.4133
5	30.223	843.1	0.3375
6	30.147	819.1	0.2867
7	27.307	788.6	0.2474
8	20.456	724.7	0.2209
9	6.970	616.0	0.2106
10	4.039	587.9	0.2095

Table 4-225. LS1 Burnup and TH Feedback Parameters Assembly E1

Node No.	Datapoint 5 (BOC Cy 6) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Datapoint 6 (196.1 Cy 6) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 7 (BOC Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.558	657.5	0.7396	2.828	692.7	0.7396
2	0.000		0.7076	7.180	1072.4	0.7076	12.760	1276.5	0.6964
3	0.000		0.5187	8.033	1125.8	0.5187	13.747	1262.7	0.4915
4	0.000	Data	0.3818	7.600	1083.9	0.3818	12.901	1189.8	0.3590
5	0.000	Not	0.3140	7.114	1039.2	0.3140	12.180	1150.6	0.2941
6	0.000	Required	0.2693	6.520	987.1	0.2693	11.294	1103.6	0.2508
7	0.000		0.2387	5.646	915.5	0.2387	9.757	1004.8	0.2214
8	0.000		0.2175	4.451	827.6	0.2175	7.423	857.5	0.2021
9	0.000		0.2085	1.462	640.2	0.2085	2.473	650.8	0.1936
10	0.000		0.2072	0.857	607.6	0.2072	1.443	612.9	0.1924

Node No.	Statepoint 8 (193.2 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 9 (306.8 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 10 (BOC Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	3.600	607.7	0.7396	4.069	609.4	0.7396	5.558	657.0	0.7396
2	16.607	799.7	0.7068	18.860	798.8	0.7106	24.474	951.0	0.7115
3	19.288	913.9	0.5375	22.404	894.8	0.5524	28.795	998.0	0.5548
4	18.926	953.0	0.4075	22.212	917.6	0.4226	29.164	1050.0	0.4247
5	17.890	927.2	0.3347	21.204	921.4	0.3484	28.646	1097.5	0.3489
6	16.353	876.2	0.2852	21.009	1129.5	0.2996	28.650	1117.4	0.2975
7	13.926	811.0	0.2518	18.484	1110.9	0.2610	26.035	1108.4	0.2576
8	10.613	745.7	0.2304	13.736	898.4	0.2353	19.533	948.6	0.2306
9	3.536	619.4	0.2213	4.557	656.9	0.2254	6.624	679.1	0.2200
10	2.098	597.4	0.2212	2.656	613.2	0.2246	3.810	625.9	0.2190

Node No.	Statepoint 11 (3.67 EFPD Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	5.573	608.8	0.7396
2	24.531	739.9	0.7116
3	28.873	808.7	0.5553
4	29.257	862.4	0.4252
5	28.738	858.5	0.3493
6	28.734	827.7	0.2979
7	26.109	792.0	0.2579
8	19.588	726.8	0.2309
9	6.643	616.0	0.2202
10	3.820	590.6	0.2192

Table 4-226. LS1 Burnup and TH Feedback Parameters Assembly E2

Node No.	Datapoint 5 (BOC Cy 6) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Datapoint 6 (196.1 Cy 6) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 7 (BOC Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.572	658.5	0.7396	2.715	678.4	0.7396
2	0.000		0.7038	7.483	1102.6	0.7038	12.620	1196.6	0.6993
3	0.000		0.4957	9.039	1228.9	0.4957	14.486	1215.1	0.4881
4	0.000	Data	0.3514	8.792	1202.7	0.3514	13.886	1155.2	0.3487
5	0.000	Not	0.2835	8.181	1140.3	0.2835	13.071	1122.0	0.2825
6	0.000	Required	0.2403	7.300	1056.4	0.2403	11.975	1088.2	0.2394
7	0.000		0.2122	5.880	934.3	0.2122	10.013	1007.9	0.2104
8	0.000		0.1942	4.301	817.1	0.1942	7.316	862.8	0.1916
9	0.000		0.1870	1.391	636.3	0.1870	2.411	651.6	0.1842
10	0.000		0.1860	0.825	605.9	0.1860	1.414	613.2	0.1831

Node No.	Statepoint 8 (193.2 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 9 (306.8 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 10 (BOC Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	3.812	628.6	0.7396	4.292	610.6	0.7396	4.883	597.3	0.7396
2	17.597	885.9	0.7077	19.656	775.5	0.7113	21.965	699.9	0.7151
3	20.795	977.1	0.5231	23.575	851.7	0.5405	26.623	741.0	0.5614
4	20.421	996.6	0.3844	23.562	898.1	0.4057	27.447	798.0	0.4399
5	19.318	971.8	0.3136	22.559	911.5	0.3334	27.089	845.1	0.3713
6	17.669	926.0	0.2668	20.918	912.7	0.2850	25.997	887.3	0.3225
7	14.834	858.4	0.2357	17.879	885.6	0.2526	23.213	907.8	0.2886
8	10.540	748.2	0.2140	12.773	786.5	0.2292	17.073	828.9	0.2624
9	3.405	615.6	0.2053	4.114	627.2	0.2197	5.537	641.2	0.2511
10	1.944	590.8	0.2027	2.316	596.3	0.2163	3.048	602.5	0.2457

Node No.	Statepoint 11 (3.67 EFPD Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	4.897	605.5	0.7396
2	22.024	745.6	0.7151
3	26.703	813.1	0.5618
4	27.538	857.2	0.4403
5	27.225	1058.5	0.3717
6	26.144	1110.3	0.3227
7	23.336	992.0	0.2887
8	17.159	839.5	0.2624
9	5.566	645.0	0.2511
10	3.064	607.4	0.2458

Table 4-227. LS1 Burnup and TH Feedback Parameters Assembly E3

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.773	671.9	0.7396	2.901	676.8	0.7396
2	0.000		0.6962	8.141	1169.4	0.6962	13.190	1181.1	0.6952
3	0.000		0.4803	9.037	1229.0	0.4803	14.526	1222.2	0.4788
4	0.000	Data	0.3444	8.528	1175.4	0.3444	13.777	1180.8	0.3433
5	0.000	Not	0.2803	7.955	1118.0	0.2803	13.022	1150.7	0.2789
6	0.000	Required	0.2387	7.214	1048.4	0.2387	12.092	1120.1	0.2365
7	0.000		0.2108	5.988	943.0	0.2108	10.404	1049.1	0.2073
8	0.000		0.1923	4.490	830.5	0.1923	7.739	891.8	0.1880
9	0.000		0.1849	1.472	640.7	0.1849	2.580	659.7	0.1803
10	0.000		0.1838	0.876	608.6	0.1838	1.516	617.6	0.1792

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	4.221	643.2	0.7396	4.979	641.2	0.7396	6.418	653.5	0.7396
2	19.294	981.7	0.7019	22.704	955.2	0.7046	28.032	926.0	0.7075
3	22.595	1141.3	0.5001	27.097	1100.7	0.5084	33.201	972.6	0.5215
4	22.271	1184.9	0.3587	26.909	1123.2	0.3651	33.579	1023.5	0.3809
5	21.063	1138.4	0.2894	25.630	1111.4	0.2944	32.827	1073.4	0.3092
6	19.338	1061.3	0.2444	23.745	1085.0	0.2483	31.425	1121.5	0.2611
7	16.220	936.5	0.2141	20.062	997.3	0.2171	27.860	1133.5	0.2275
8	11.572	789.1	0.1942	14.363	854.2	0.1967	20.511	979.2	0.2042
9	3.841	630.2	0.1867	4.823	653.2	0.1891	7.059	689.4	0.1954
10	2.230	600.6	0.1854	2.791	613.5	0.1877	4.057	632.2	0.1937

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	6.427	589.1	0.7396
2	28.066	662.9	0.7075
3	33.250	708.6	0.5218
4	33.643	756.7	0.3815
5	32.894	769.4	0.3098
6	31.490	759.0	0.2616
7	27.918	735.2	0.2280
8	20.553	685.9	0.2047
9	7.072	599.0	0.1958
10	4.064	582.3	0.1941

Table 4-228. LS1 Burnup and TH Feedback Parameters Assembly E4

Node No.	Datapoint 5 (BOC Cy 6) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Datapoint 6 (196.1 Cy 6) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 7 (BOC Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.570	658.3	0.7396	2.712	678.3	0.7396
2	0.000		0.7040	7.478	1102.1	0.7040	12.612	1196.0	0.6994
3	0.000		0.4960	9.036	1228.6	0.4960	14.481	1214.9	0.4885
4	0.000	Data	0.3517	8.789	1202.4	0.3517	13.883	1155.1	0.3490
5	0.000	Not	0.2837	8.178	1140.1	0.2837	13.068	1121.9	0.2827
6	0.000	Required	0.2405	7.298	1056.2	0.2405	11.972	1088.1	0.2396
7	0.000		0.2125	5.877	934.1	0.2125	10.010	1007.8	0.2106
8	0.000		0.1945	4.299	817.0	0.1945	7.313	862.7	0.1918
9	0.000		0.1873	1.390	636.2	0.1873	2.410	651.6	0.1844
10	0.000		0.1862	0.825	605.9	0.1862	1.413	613.1	0.1833

Node No.	Statepoint 8 (193.2 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 9 (306.8 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 10 (BOC Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	3.810	628.6	0.7396	4.291	610.7	0.7396	4.882	597.3	0.7396
2	17.591	886.1	0.7078	19.651	775.6	0.7114	21.957	699.6	0.7151
3	20.789	977.1	0.5234	23.570	851.6	0.5407	26.615	740.8	0.5616
4	20.416	996.5	0.3847	23.555	897.9	0.4060	27.439	797.9	0.4402
5	19.313	971.6	0.3138	22.553	911.4	0.3336	27.082	845.0	0.3715
6	17.665	925.9	0.2671	20.914	912.5	0.2852	25.991	887.3	0.3227
7	14.830	858.4	0.2359	17.875	885.5	0.2528	23.209	907.7	0.2889
8	10.537	748.2	0.2142	12.770	786.5	0.2294	17.069	828.9	0.2626
9	3.404	615.6	0.2055	4.113	627.2	0.2199	5.537	641.2	0.2513
10	1.942	590.8	0.2029	2.314	596.3	0.2165	3.047	602.6	0.2459

Node No.	Statepoint 11 (3.67 EFPD Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	4.895	602.2	0.7396
2	22.015	745.6	0.7152
3	26.694	813.1	0.5620
4	27.530	858.5	0.4406
5	27.218	1058.5	0.3720
6	26.138	1110.3	0.3230
7	23.332	993.5	0.2889
8	17.156	840.6	0.2627
9	5.565	642.1	0.2513
10	3.063	607.4	0.2460

Table 4-229. LS1 Burnup and TH Feedback Parameters Assembly E5

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.737	669.5	0.7396	2.906	681.3	0.7396
2	0.000		0.6975	8.045	1159.5	0.6975	13.270	1212.1	0.6942
3	0.000		0.4826	9.028	1228.0	0.4826	14.708	1256.1	0.4758
4	0.000	Data	0.3461	8.505	1173.0	0.3461	13.936	1212.0	0.3403
5	0.000	Not	0.2818	7.945	1117.1	0.2818	13.177	1178.0	0.2764
6	0.000	Required	0.2400	7.199	1047.1	0.2400	12.188	1137.9	0.2341
7	0.000		0.2120	5.931	938.4	0.2120	10.335	1047.4	0.2052
8	0.000		0.1936	4.469	828.9	0.1936	7.696	889.1	0.1863
9	0.000		0.1861	1.473	640.8	0.1861	2.581	659.7	0.1786
10	0.000		0.1850	0.878	608.7	0.1850	1.522	618.0	0.1776

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	4.208	642.0	0.7396	4.980	642.8	0.7396	6.468	656.9	0.7396
2	19.303	975.3	0.7020	22.731	957.7	0.7047	28.154	934.3	0.7071
3	22.655	1128.9	0.5000	27.081	1088.2	0.5084	33.282	981.2	0.5205
4	22.262	1167.3	0.3585	26.779	1103.0	0.3653	33.584	1036.1	0.3803
5	21.052	1121.7	0.2894	25.520	1095.0	0.2949	32.837	1085.1	0.3088
6	19.188	1038.6	0.2444	23.732	1107.5	0.2489	31.478	1128.2	0.2607
7	15.967	921.4	0.2142	20.068	1036.7	0.2176	27.867	1133.6	0.2271
8	11.483	785.8	0.1946	14.404	871.2	0.1969	20.478	972.8	0.2038
9	3.836	629.9	0.1870	4.837	655.0	0.1892	7.036	687.1	0.1950
10	2.231	600.3	0.1856	2.798	614.0	0.1877	4.043	631.0	0.1932

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	6.482	605.5	0.7396
2	28.204	717.9	0.7072
3	33.353	781.5	0.5209
4	33.671	837.8	0.3810
5	32.925	842.9	0.3094
6	31.560	821.4	0.2612
7	27.941	793.3	0.2276
8	20.534	730.1	0.2042
9	7.055	616.0	0.1954
10	4.053	590.6	0.1937

Table 4-230. LS1 Burnup and TH Feedback Parameters Assembly E6

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.670	665.0	0.7396	2.739	670.2	0.7396
2	0.000		0.7003	7.827	1137.1	0.7003	12.694	1149.9	0.6996
3	0.000		0.4881	9.048	1230.0	0.4881	14.328	1186.4	0.4889
4	0.000	Data	0.3479	8.655	1188.4	0.3479	13.625	1134.8	0.3507
5	0.000	Not	0.2821	8.021	1124.5	0.2821	12.786	1102.2	0.2851
6	0.000	Required	0.2400	7.176	1045.0	0.2400	11.744	1071.7	0.2425
7	0.000		0.2125	5.828	930.2	0.2125	9.946	1005.7	0.2137
8	0.000		0.1945	4.278	815.5	0.1945	7.306	864.3	0.1945
9	0.000		0.1875	1.382	635.8	0.1875	2.404	651.8	0.1871
10	0.000		0.1864	0.820	605.6	0.1864	1.405	612.8	0.1859

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	3.842	629.0	0.7396	4.275	605.5	0.7396	4.793	592.6	0.7396
2	17.715	889.5	0.7078	19.580	752.7	0.7112	21.624	682.7	0.7147
3	20.667	979.7	0.5235	23.276	830.5	0.5416	26.078	725.0	0.5622
4	20.074	989.2	0.3861	23.128	886.5	0.4096	26.818	784.4	0.4448
5	18.862	957.4	0.3159	22.077	908.0	0.3380	26.428	831.7	0.3781
6	17.213	908.1	0.2695	20.436	909.1	0.2896	25.325	872.5	0.3295
7	14.509	839.4	0.2385	17.480	875.9	0.2567	22.605	890.9	0.2953
8	10.293	733.0	0.2164	12.420	774.3	0.2327	16.520	814.4	0.2685
9	3.315	611.1	0.2076	3.979	623.0	0.2229	5.317	636.3	0.2567
10	1.892	588.5	0.2051	2.239	594.0	0.2194	2.923	599.9	0.2509

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	4.805	598.9	0.7396
2	21.678	730.3	0.7148
3	26.193	968.5	0.5627
4	26.977	1173.8	0.4451
5	26.579	1129.1	0.3781
6	25.465	1076.2	0.3294
7	22.729	999.4	0.2950
8	16.612	861.3	0.2683
9	5.350	656.9	0.2565
10	2.941	613.1	0.2507

Table 4-231. LS1 Burnup and TH Feedback Parameters Assembly E7

Node No.	Datapoint 5 (BOC Cy 6) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Datapoint 6 (196.1 Cy 6) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 7 (BOC Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.772	671.9	0.7396	2.859	672.2	0.7396
2	0.000		0.6953	8.167	1172.3	0.6953	13.097	1160.7	0.6954
3	0.000		0.4775	9.122	1238.1	0.4775	14.602	1220.6	0.4787
4	0.000	Data	0.3418	8.624	1185.3	0.3418	13.894	1184.4	0.3428
5	0.000	Not	0.2781	8.108	1133.1	0.2781	13.186	1152.5	0.2785
6	0.000	Required	0.2363	7.360	1061.8	0.2363	12.198	1113.9	0.2359
7	0.000		0.2084	6.032	946.6	0.2084	10.362	1036.4	0.2069
8	0.000		0.1901	4.528	833.1	0.1901	7.793	893.7	0.1875
9	0.000		0.1827	1.497	642.1	0.1827	2.627	661.7	0.1797
10	0.000		0.1816	0.893	609.5	0.1816	1.547	618.9	0.1785

Node No.	Statepoint 8 (193.2 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 9 (306.8 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 10 (BOC Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	3.911	625.7	0.7396	4.356	606.8	0.7396	5.070	605.2	0.7396
2	17.902	872.2	0.7047	19.827	759.6	0.7085	22.592	730.2	0.7130
3	20.834	970.7	0.5166	23.454	831.6	0.5351	26.992	773.9	0.5574
4	20.810	1030.7	0.3812	23.711	866.8	0.4036	27.964	824.4	0.4355
5	20.181	1037.7	0.3105	23.134	873.5	0.3313	27.901	863.1	0.3642
6	18.754	998.5	0.2628	21.759	880.2	0.2825	27.046	904.0	0.3142
7	16.018	923.2	0.2304	18.982	874.9	0.2498	24.564	928.1	0.2798
8	11.612	788.2	0.2075	14.005	805.1	0.2262	18.550	847.3	0.2531
9	3.813	626.1	0.1983	4.603	634.8	0.2161	6.161	649.0	0.2418
10	2.184	596.5	0.1958	2.595	599.8	0.2123	3.411	607.1	0.2368

Node No.	Statepoint 11 (3.67 EFPD Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	5.094	639.5	0.7396
2	22.691	903.6	0.7130
3	27.116	996.0	0.5576
4	28.093	1022.4	0.4356
5	28.030	1017.7	0.3641
6	27.164	972.0	0.3142
7	24.663	886.7	0.2798
8	18.620	777.3	0.2531
9	6.186	633.3	0.2417
10	3.425	601.8	0.2368

Table 4-232. LS1 Burnup and TH Feedback Parameters Assembly E8

Node No.	Datapoint 5 (BOC Cy 6) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Datapoint 6 (196.1 Cy 6) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 7 (BOC Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.668	664.9	0.7396	2.807	678.0	0.7396
2	0.000		0.7007	7.832	1137.5	0.7007	12.965	1195.9	0.6970
3	0.000		0.4899	8.934	1217.9	0.4899	14.561	1246.7	0.4823
4	0.000	Data	0.3515	8.417	1164.0	0.3515	13.787	1201.7	0.3452
5	0.000	Not	0.2864	7.818	1104.8	0.2864	12.985	1167.2	0.2805
6	0.000	Required	0.2442	7.046	1033.2	0.2442	11.986	1130.1	0.2378
7	0.000		0.2161	5.782	926.4	0.2161	10.154	1042.6	0.2085
8	0.000		0.1977	4.346	820.2	0.1977	7.534	884.2	0.1895
9	0.000		0.1901	1.424	638.1	0.1901	2.512	657.8	0.1818
10	0.000		0.1890	0.847	607.0	0.1890	1.478	616.8	0.1807

Node No.	Statepoint 8 (193.2 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 9 (306.8 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 10 (BOC Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	4.170	646.0	0.7396	4.927	641.1	0.7396	6.347	652.2	0.7396
2	19.207	994.0	0.7029	22.602	952.9	0.7055	27.839	918.3	0.7084
3	22.710	1149.3	0.5009	27.173	1094.1	0.5094	33.188	964.9	0.5229
4	22.363	1193.4	0.3587	26.972	1118.4	0.3654	33.603	1020.0	0.3820
5	21.128	1148.8	0.2893	25.679	1108.6	0.2947	32.860	1071.9	0.3102
6	19.144	1053.3	0.2442	23.540	1083.2	0.2485	31.264	1125.9	0.2620
7	15.818	924.2	0.2142	19.596	988.0	0.2176	27.425	1136.7	0.2286
8	11.287	783.5	0.1950	13.886	830.6	0.1977	19.971	973.8	0.2055
9	3.751	629.0	0.1875	4.629	643.2	0.1901	6.813	686.2	0.1968
10	2.181	600.0	0.1863	2.680	607.8	0.1889	3.915	630.5	0.1951

Node No.	Statepoint 11 (3.67 EFPD Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	6.357	592.3	0.7396
2	27.880	686.7	0.7084
3	33.246	738.3	0.5232
4	33.677	792.0	0.3826
5	32.938	804.1	0.3108
6	31.337	788.4	0.2626
7	27.491	764.8	0.2292
8	20.021	708.2	0.2061
9	6.829	607.4	0.1972
10	3.923	585.1	0.1955

Table 4-233. LS1 Burnup and TH Feedback Parameters Assembly E9

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.625	662.0	0.7396	2.694	670.2	0.7396
2	0.000		0.7032	7.578	1111.7	0.7032	12.456	1152.1	0.7006
3	0.000		0.4976	8.732	1196.5	0.4976	14.229	1223.7	0.4916
4	0.000	Data	0.3580	8.329	1155.0	0.3580	13.633	1190.3	0.3527
5	0.000	Not	0.2915	7.836	1106.5	0.2915	12.952	1158.7	0.2865
6	0.000	Required	0.2480	7.106	1038.6	0.2480	11.982	1119.9	0.2427
7	0.000		0.2191	5.808	928.4	0.2191	10.113	1032.7	0.2127
8	0.000		0.2002	4.384	822.8	0.2002	7.569	883.7	0.1930
9	0.000		0.1924	1.449	639.5	0.1924	2.548	658.9	0.1849
10	0.000		0.1912	0.862	607.8	0.1912	1.501	617.5	0.1837

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	3.857	632.9	0.7396	4.278	604.2	0.7396	4.864	596.9	0.7396
2	17.699	907.6	0.7082	19.515	747.0	0.7115	21.813	699.1	0.7153
3	20.815	1001.1	0.5233	23.378	824.8	0.5412	26.468	743.8	0.5623
4	20.320	1010.1	0.3842	23.380	887.4	0.4083	27.335	803.0	0.4425
5	19.221	973.7	0.3134	22.590	929.0	0.3367	27.129	845.8	0.3736
6	17.573	917.7	0.2664	20.995	936.4	0.2872	26.048	885.4	0.3237
7	14.699	841.2	0.2346	17.782	890.6	0.2530	23.061	903.3	0.2887
8	10.559	733.1	0.2123	12.735	780.0	0.2284	16.931	821.3	0.2613
9	3.473	611.9	0.2033	4.158	625.0	0.2183	5.550	639.4	0.2494
10	1.999	589.1	0.2009	2.360	595.3	0.2149	3.082	602.0	0.2441

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	4.877	602.2	0.7396
2	21.870	740.8	0.7154
3	26.549	817.0	0.5628
4	27.428	863.7	0.4430
5	27.223	865.0	0.3740
6	26.137	845.5	0.3240
7	23.138	804.2	0.2890
8	16.986	726.9	0.2616
9	5.568	613.1	0.2497
10	3.095	599.0	0.2444

Table 4-234. LS1 Burnup and TH Feedback Parameters Assembly E10

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.740	669.7	0.7396	2.909	681.3	0.7396
2	0.000		0.6973	8.051	1160.1	0.6973	13.280	1212.7	0.6941
3	0.000		0.4823	9.030	1228.2	0.4823	14.711	1256.3	0.4755
4	0.000	Data	0.3458	8.505	1173.0	0.3458	13.937	1212.1	0.3401
5	0.000	Not	0.2816	7.945	1117.1	0.2816	13.177	1178.1	0.2762
6	0.000	Required	0.2398	7.199	1047.0	0.2398	12.188	1138.0	0.2340
7	0.000		0.2119	5.930	938.3	0.2119	10.334	1047.4	0.2050
8	0.000		0.1935	4.468	828.8	0.1935	7.695	889.0	0.1862
9	0.000		0.1859	1.473	640.8	0.1859	2.580	659.6	0.1785
10	0.000		0.1849	0.878	608.7	0.1849	1.522	618.0	0.1774

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	4.211	642.0	0.7396	4.984	642.9	0.7396	6.472	656.9	0.7396
2	19.314	975.4	0.7019	22.743	957.8	0.7046	28.166	934.3	0.7070
3	22.658	1129.0	0.4998	27.085	1088.2	0.5081	33.287	981.3	0.5202
4	22.261	1167.2	0.3583	26.778	1103.0	0.3650	33.584	1036.2	0.3801
5	21.050	1121.6	0.2892	25.519	1095.0	0.2947	32.836	1085.2	0.3086
6	19.187	1038.5	0.2442	23.730	1107.3	0.2488	31.476	1128.2	0.2605
7	15.965	921.4	0.2141	20.065	1036.6	0.2174	27.864	1133.6	0.2270
8	11.481	785.8	0.1945	14.401	871.1	0.1968	20.475	972.8	0.2037
9	3.836	629.9	0.1869	4.837	655.0	0.1890	7.035	687.0	0.1949
10	2.231	600.3	0.1856	2.798	614.0	0.1876	4.043	631.0	0.1932

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	6.486	605.5	0.7396
2	28.216	716.8	0.7071
3	33.358	780.7	0.5207
4	33.671	837.8	0.3807
5	32.924	842.9	0.3092
6	31.559	822.7	0.2611
7	27.939	793.2	0.2275
8	20.531	730.1	0.2041
9	7.054	616.0	0.1953
10	4.053	590.6	0.1935

Table 4-235. LS1 Burnup and TH Feedback Parameters Assembly E11

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.770	671.7	0.7396	2.856	672.1	0.7396
2	0.000		0.6954	8.161	1171.6	0.6954	13.086	1160.0	0.6955
3	0.000		0.4778	9.117	1237.6	0.4778	14.593	1220.0	0.4790
4	0.000	Data	0.3421	8.619	1184.7	0.3421	13.886	1184.0	0.3431
5	0.000	Not	0.2784	8.103	1132.6	0.2784	13.180	1152.2	0.2787
6	0.000	Required	0.2365	7.355	1061.3	0.2365	12.191	1113.5	0.2361
7	0.000		0.2086	6.026	946.1	0.2086	10.356	1036.2	0.2071
8	0.000		0.1903	4.523	832.8	0.1903	7.787	893.5	0.1877
9	0.000		0.1829	1.496	642.0	0.1829	2.625	661.6	0.1799
10	0.000		0.1818	0.892	609.4	0.1818	1.546	618.9	0.1788

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	3.907	625.6	0.7396	4.352	606.8	0.7396	5.065	605.1	0.7396
2	17.884	871.7	0.7048	19.807	759.4	0.7086	22.567	729.8	0.7131
3	20.820	970.2	0.5169	23.436	831.1	0.5354	26.969	773.6	0.5577
4	20.797	1030.2	0.3815	23.696	866.4	0.4039	27.943	824.1	0.4359
5	20.169	1037.3	0.3108	23.120	873.2	0.3316	27.884	862.8	0.3645
6	18.743	998.2	0.2630	21.746	879.9	0.2828	27.029	903.7	0.3146
7	16.008	922.9	0.2306	18.970	874.7	0.2501	24.549	927.9	0.2801
8	11.604	788.1	0.2077	13.995	804.9	0.2264	18.538	847.1	0.2534
9	3.811	626.1	0.1985	4.600	634.7	0.2163	6.158	649.0	0.2421
10	2.181	596.4	0.1960	2.592	599.8	0.2125	3.408	607.1	0.2371

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	5.089	639.5	0.7396
2	22.665	902.2	0.7131
3	27.092	991.4	0.5579
4	28.073	1022.5	0.4359
5	28.012	1014.6	0.3645
6	27.148	972.0	0.3145
7	24.648	886.8	0.2801
8	18.607	777.3	0.2533
9	6.182	630.3	0.2420
10	3.422	601.8	0.2370

Table 4-236. LS1 Burnup and TH Feedback Parameters Assembly E12

	Datapoint 5 (BOC Cy 6)			Datapoint 6 (196.1 Cy 6)			Statepoint 7 (BOC Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 6	0.00 Cy 6	0.00 Cy 6	196.1 Cy 6	196.1 Cy 6	196.1 Cy 6	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7
1	0.000		0.7396	1.669	664.9	0.7396	2.755	672.1	0.7396
2	0.000		0.6996	7.718	1125.9	0.6996	12.684	1167.0	0.6974
3	0.000		0.4892	8.894	1213.5	0.4892	14.378	1221.4	0.4853
4	0.000	Data	0.3499	8.722	1195.3	0.3499	13.955	1178.3	0.3480
5	0.000	Not	0.2823	8.419	1164.2	0.2823	13.455	1145.7	0.2815
6	0.000	Required	0.2378	7.679	1091.8	0.2378	12.474	1106.9	0.2373
7	0.000		0.2088	6.160	957.2	0.2088	10.386	1021.3	0.2076
8	0.000		0.1903	4.524	832.8	0.1903	7.648	876.1	0.1882
9	0.000		0.1828	1.500	642.3	0.1828	2.584	657.5	0.1804
10	0.000		0.1817	0.898	609.7	0.1817	1.529	616.8	0.1792

	Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)			Statepoint 10 (BOC Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8
1	3.899	631.6	0.7396	4.339	606.2	0.7396	5.348	624.5	0.7396
2	17.979	911.9	0.7033	20.051	776.8	0.7073	23.952	811.2	0.7119
3	21.335	1034.5	0.5099	24.348	881.6	0.5289	29.074	859.9	0.5482
4	21.383	1078.1	0.3739	24.717	924.2	0.3949	30.095	911.5	0.4180
5	20.578	1049.6	0.3034	23.919	925.0	0.3220	29.844	957.2	0.3439
6	19.826	1071.1	0.2606	22.962	897.5	0.2759	29.314	994.5	0.2944
7	16.498	961.1	0.2270	19.282	851.9	0.2415	26.044	1031.9	0.2585
8	11.691	803.7	0.2042	14.275	827.3	0.2209	20.188	957.9	0.2352
9	3.879	632.1	0.1953	4.913	658.2	0.2133	7.114	687.2	0.2256
10	2.244	600.6	0.1931	2.820	614.9	0.2105	4.082	632.0	0.2231

	Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	5.360	598.9	0.7396
2	24.000	709.9	0.7119
3	29.143	774.3	0.5486
4	30.178	822.6	0.4185
5	29.926	818.9	0.3444
6	29.387	790.8	0.2948
7	26.106	751.0	0.2589
8	20.232	691.1	0.2356
9	7.129	604.6	0.2259
10	4.089	582.3	0.2234

Table 4-237. LS1 Burnup and TH Feedback Parameters Assembly F1

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.476	653.0	0.7396	2.015	616.6	0.7396
2	0.000		0.7047	7.206	1081.6	0.7047	10.020	868.6	0.7084
3	0.000		0.4958	8.794	1210.8	0.4958	12.553	981.0	0.5192
4	0.000	Data	0.3519	8.612	1191.6	0.3519	12.552	1007.7	0.3809
5	0.000	Not	0.2841	7.811	1110.8	0.2841	12.733	1170.2	0.3166
6	0.000	Required	0.2423	6.616	1000.7	0.2423	11.582	1175.4	0.2651
7	0.000		0.2170	4.799	854.8	0.2170	8.547	980.5	0.2312
8	0.000		0.2020	3.285	750.7	0.2020	5.795	817.9	0.2116
9	0.000		0.1956	1.007	616.0	0.1956	1.797	634.3	0.2041
10	0.000		0.1957	0.653	597.1	0.1957	1.142	606.6	0.2034

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.215	636.8	0.7396	3.237	632.1	0.7396
2	15.548	940.0	0.7117	15.651	916.7	0.7118
3	19.105	1008.9	0.5346	19.237	1027.3	0.5349
4	19.525	1047.7	0.3978	19.665	1068.3	0.3979
5	19.958	1071.6	0.3281	20.097	1065.0	0.3282
6	19.173	1107.6	0.2755	19.304	1023.4	0.2756
7	15.937	1087.9	0.2396	16.049	942.6	0.2397
8	11.180	912.3	0.2157	11.259	807.3	0.2158
9	3.538	659.0	0.2067	3.564	635.7	0.2067
10	2.206	620.5	0.2053	2.222	607.2	0.2054

Table 4-238. LS1 Burnup and TH Feedback Parameters Assembly F2

Node No.	Statepoint 7 (BOC Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 8 (193.2 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 9 (306.8 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.324	642.9	0.7396	2.123	645.2	0.7396
2	0.000		0.7145	6.493	1013.7	0.7145	10.588	1059.3	0.7119
3	0.000		0.5257	8.311	1160.4	0.5257	13.445	1204.6	0.5161
4	0.000	Data	0.3736	8.381	1167.6	0.3736	13.426	1188.7	0.3656
5	0.000	Not	0.3006	7.675	1097.5	0.3006	12.533	1155.9	0.2934
6	0.000	Required	0.2557	6.546	994.6	0.2557	11.107	1105.8	0.2477
7	0.000		0.2284	4.803	854.9	0.2284	8.438	964.0	0.2189
8	0.000		0.2121	3.363	755.8	0.2121	5.858	816.0	0.2019
9	0.000		0.2055	1.043	617.9	0.2055	1.848	635.7	0.1949
10	0.000		0.2045	0.671	598.1	0.2045	1.181	608.5	0.1940

Node No.	Statepoint 10 (BOC Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 11 (3.67 EFPD Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.441	644.7	0.7396	3.467	645.8	0.7396
2	16.463	970.6	0.7122	16.581	987.5	0.7123
3	20.149	1022.7	0.5276	20.288	1060.9	0.5277
4	20.538	1060.8	0.3832	20.678	1065.0	0.3833
5	20.090	1104.1	0.3101	20.222	1032.8	0.3102
6	19.042	1142.4	0.2616	19.162	974.5	0.2616
7	16.068	1111.7	0.2289	16.169	895.0	0.2290
8	11.415	926.4	0.2066	11.485	777.2	0.2067
9	3.662	663.3	0.1979	3.684	624.2	0.1981
10	2.302	623.7	0.1965	2.315	598.8	0.1966

Table 4-239. LS1 Burnup and TH Feedback Parameters Assembly F3

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.264	639.0	0.7396	2.007	639.0	0.7396
2	0.000		0.7175	6.272	993.6	0.7175	10.119	1019.1	0.7160
3	0.000		0.5366	8.035	1132.5	0.5366	12.889	1155.2	0.5306
4	0.000	Data	0.3842	8.137	1142.8	0.3842	12.865	1133.4	0.3796
5	0.000	Not	0.3095	7.542	1084.7	0.3095	12.043	1095.7	0.3061
6	0.000	Required	0.2629	6.542	994.1	0.2629	10.770	1052.1	0.2592
7	0.000		0.2341	4.887	861.2	0.2341	8.340	938.2	0.2292
8	0.000		0.2166	3.414	759.1	0.2166	5.845	808.2	0.2108
9	0.000		0.2098	1.044	618.0	0.2098	1.826	633.6	0.2035
10	0.000		0.2088	0.667	597.9	0.2088	1.158	606.8	0.2026

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.196	636.0	0.7396	3.219	635.5	0.7396
2	15.576	933.8	0.7170	15.684	941.8	0.7171
3	19.223	989.3	0.5437	19.375	1130.4	0.5437
4	19.564	1022.3	0.3993	19.733	1223.7	0.3991
5	19.129	1058.3	0.3249	19.292	1190.1	0.3247
6	18.196	1091.2	0.2752	18.353	1154.0	0.2750
7	15.489	1064.5	0.2416	15.628	1063.8	0.2413
8	11.085	900.4	0.2182	11.185	889.0	0.2179
9	3.519	656.2	0.2093	3.553	659.3	0.2090
10	2.192	618.8	0.2077	2.213	621.3	0.2074

Table 4-240. LS1 Burnup and TH Feedback Parameters Assembly F4

Node No.	Statepoint 7 (BOC Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 8 (193.2 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 9 (306.8 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.297	641.1	0.7396	2.099	645.6	0.7396
2	0.000		0.7150	6.418	1006.9	0.7150	10.536	1063.1	0.7118
3	0.000		0.5258	8.389	1168.3	0.5258	13.613	1221.1	0.5145
4	0.000	Data	0.3716	8.574	1187.6	0.3716	13.735	1209.5	0.3624
5	0.000	Not	0.2975	7.880	1117.4	0.2975	12.874	1179.7	0.2895
6	0.000	Required	0.2522	6.702	1008.2	0.2522	11.427	1133.3	0.2435
7	0.000		0.2248	4.883	861.0	0.2248	8.640	981.6	0.2145
8	0.000		0.2087	3.412	759.0	0.2087	5.960	822.5	0.1977
9	0.000		0.2022	1.062	618.9	0.2022	1.884	637.3	0.1909
10	0.000		0.2012	0.684	598.8	0.2012	1.206	609.6	0.1900

Node No.	Statepoint 10 (BOC Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 11 (3.67 EFPD Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.534	652.6	0.7396	3.558	638.9	0.7396
2	16.803	1006.5	0.7103	16.913	952.3	0.7103
3	20.643	1053.0	0.5210	20.792	1110.2	0.5212
4	21.166	1091.7	0.3754	21.326	1171.9	0.3755
5	20.760	1137.4	0.3021	20.915	1143.3	0.3021
6	19.717	1179.5	0.2536	19.863	1101.8	0.2535
7	16.659	1151.4	0.2208	16.792	1036.1	0.2207
8	11.828	952.7	0.1989	11.926	883.3	0.1988
9	3.823	670.7	0.1903	3.856	656.3	0.1903
10	2.411	628.4	0.1889	2.432	621.3	0.1889

Table 4-241. LS1 Burnup and TH Feedback Parameters Assembly F5

Node No.	Statepoint 7 (BOC Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 8 (193.2 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 9 (306.8 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.308	641.9	0.7396	2.120	646.7	0.7396
2	0.000		0.7147	6.477	1012.2	0.7147	10.554	1055.9	0.7121
3	0.000		0.5248	8.357	1165.1	0.5248	13.450	1197.3	0.5161
4	0.000	Data	0.3703	8.652	1195.7	0.3703	13.652	1180.6	0.3641
5	0.000	Not	0.2953	8.125	1141.7	0.2953	12.954	1150.7	0.2908
6	0.000	Required	0.2487	7.087	1042.7	0.2487	11.777	1127.2	0.2440
7	0.000		0.2200	5.299	892.5	0.2200	9.223	1006.1	0.2138
8	0.000		0.2029	3.699	778.1	0.2029	6.478	850.9	0.1955
9	0.000		0.1962	1.142	623.3	0.1962	2.057	646.2	0.1882
10	0.000		0.1953	0.733	601.3	0.1953	1.312	614.8	0.1873

Node No.	Statepoint 10 (BOC Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 11 (3.67 EFPD Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.618	656.9	0.7396	3.632	605.2	0.7396
2	16.933	1017.1	0.7099	16.997	764.5	0.7101
3	20.531	1057.8	0.5210	20.618	838.4	0.5217
4	21.113	1094.7	0.3755	21.209	873.2	0.3764
5	20.848	1138.2	0.3020	20.939	856.2	0.3028
6	20.058	1178.7	0.2529	20.141	823.2	0.2536
7	17.352	1162.8	0.2193	17.422	775.0	0.2199
8	12.577	972.4	0.1965	12.625	704.1	0.1971
9	4.113	677.6	0.1877	4.128	604.4	0.1882
10	2.591	632.5	0.1863	2.599	584.9	0.1868

Table 4-242. LS1 Burnup and TH Feedback Parameters Assembly F6

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.271	639.4	0.7396	2.014	639.0	0.7396
2	0.000		0.7151	6.328	998.6	0.7151	10.094	1006.1	0.7150
3	0.000		0.5306	8.112	1140.2	0.5306	12.878	1139.9	0.5289
4	0.000	Data	0.3772	8.588	1189.1	0.3772	13.240	1120.7	0.3769
5	0.000	Not	0.2995	8.272	1156.5	0.2995	12.739	1090.1	0.3013
6	0.000	Required	0.2510	7.279	1060.3	0.2510	11.606	1067.7	0.2530
7	0.000		0.2213	5.501	908.2	0.2213	9.176	969.4	0.2221
8	0.000		0.2033	3.839	787.7	0.2033	6.544	841.5	0.2026
9	0.000		0.1963	1.173	625.0	0.1963	2.063	643.8	0.1951
10	0.000		0.1953	0.747	602.1	0.1953	1.301	612.5	0.1941

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.405	649.6	0.7396	3.432	649.3	0.7396
2	16.161	988.1	0.7138	16.281	998.6	0.7138
3	19.732	1036.5	0.5344	19.874	1076.9	0.5345
4	20.403	1065.7	0.3885	20.545	1078.2	0.3886
5	20.265	1101.1	0.3130	20.401	1047.2	0.3130
6	19.509	1139.1	0.2627	19.632	988.1	0.2628
7	16.940	1125.1	0.2284	17.043	900.5	0.2285
8	12.364	948.3	0.2049	12.434	777.2	0.2049
9	4.004	670.8	0.1959	4.027	627.0	0.1960
10	2.497	627.9	0.1944	2.511	601.6	0.1945

Table 4-243. LS1 Burnup and TH Feedback Parameters Assembly F7

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.244	637.7	0.7396	1.953	635.2	0.7396
2	0.000		0.7175	6.198	986.9	0.7175	9.859	990.1	0.7175
3	0.000		0.5385	7.957	1124.8	0.5385	12.626	1123.5	0.5371
4	0.000	Data	0.3855	8.250	1154.2	0.3855	12.796	1103.0	0.3853
5	0.000	Not	0.3086	7.831	1112.5	0.3086	12.158	1067.6	0.3099
6	0.000	Required	0.2604	6.890	1024.8	0.2604	11.002	1034.0	0.2618
7	0.000		0.2304	5.216	886.0	0.2304	8.660	936.7	0.2308
8	0.000		0.2121	3.633	773.7	0.2121	6.131	816.2	0.2114
9	0.000		0.2052	1.103	621.2	0.2052	1.913	636.2	0.2039
10	0.000		0.2042	0.702	599.7	0.2042	1.205	607.9	0.2029

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.162	637.4	0.7396	3.184	632.1	0.7396
2	15.354	937.2	0.7180	15.460	929.8	0.7181
3	18.994	992.4	0.5481	19.136	1081.1	0.5482
4	19.493	1022.0	0.4028	19.648	1145.0	0.4027
5	19.206	1054.7	0.3270	19.356	1122.3	0.3269
6	18.398	1088.2	0.2764	18.538	1071.7	0.2763
7	15.852	1068.7	0.2419	15.975	989.7	0.2418
8	11.465	907.9	0.2179	11.553	843.7	0.2179
9	3.649	658.7	0.2089	3.680	650.4	0.2088
10	2.263	620.2	0.2074	2.282	615.6	0.2072

Table 4-244. LS1 Burnup and TH Feedback Parameters Assembly F8

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.302	641.5	0.7396	2.112	646.5	0.7396
2	0.000		0.7149	6.454	1010.1	0.7149	10.520	1054.0	0.7123
3	0.000		0.5255	8.336	1163.0	0.5255	13.419	1195.4	0.5168
4	0.000	Data	0.3710	8.633	1193.8	0.3710	13.624	1179.0	0.3648
5	0.000	Not	0.2959	8.108	1140.0	0.2959	12.928	1149.3	0.2914
6	0.000	Required	0.2492	7.072	1041.3	0.2492	11.754	1125.8	0.2444
7	0.000		0.2205	5.286	891.5	0.2205	9.203	1005.0	0.2142
8	0.000		0.2033	3.690	777.5	0.2033	6.464	850.2	0.1959
9	0.000		0.1967	1.139	623.1	0.1967	2.053	646.1	0.1886
10	0.000		0.1957	0.731	601.2	0.1957	1.308	614.6	0.1876

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.606	656.7	0.7396	3.620	605.2	0.7396
2	16.881	1015.4	0.7101	16.944	762.2	0.7103
3	20.484	1056.3	0.5216	20.571	838.4	0.5223
4	21.072	1093.3	0.3762	21.167	869.2	0.3770
5	20.808	1136.8	0.3026	20.900	856.2	0.3033
6	20.020	1177.1	0.2534	20.103	823.2	0.2540
7	17.319	1161.4	0.2197	17.388	772.7	0.2203
8	12.551	971.4	0.1969	12.599	703.0	0.1975
9	4.106	677.5	0.1881	4.121	604.4	0.1886
10	2.585	632.4	0.1867	2.593	584.9	0.1871

Table 4-245. LS1 Burnup and TH Feedback Parameters Assembly F9

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.210	635.4	0.7396	1.963	640.1	0.7396
2	0.000		0.7186	6.128	980.7	0.7186	10.039	1029.5	0.7160
3	0.000		0.5396	8.036	1132.6	0.5396	12.980	1170.8	0.5298
4	0.000	Data	0.3848	8.322	1161.5	0.3848	13.108	1143.3	0.3777
5	0.000	Not	0.3080	7.813	1110.8	0.3080	12.405	1110.6	0.3031
6	0.000	Required	0.2602	6.784	1015.4	0.2602	11.364	1108.6	0.2549
7	0.000		0.2309	5.068	874.8	0.2309	8.937	997.9	0.2236
8	0.000		0.2132	3.579	770.0	0.2132	6.305	844.3	0.2046
9	0.000		0.2062	1.107	621.4	0.2062	1.989	643.0	0.1972
10	0.000		0.2053	0.708	600.0	0.2053	1.261	612.4	0.1962

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.436	655.2	0.7396	3.453	615.2	0.7396
2	16.499	1024.7	0.7120	16.576	815.6	0.7122
3	20.145	1065.8	0.5290	20.248	904.8	0.5296
4	20.555	1093.3	0.3838	20.669	947.9	0.3845
5	20.208	1129.0	0.3095	20.318	929.4	0.3101
6	19.467	1159.8	0.2596	19.566	888.0	0.2601
7	16.788	1134.0	0.2253	16.873	830.9	0.2257
8	12.108	947.0	0.2025	12.167	741.4	0.2029
9	3.911	669.7	0.1937	3.930	615.6	0.1941
10	2.450	627.5	0.1923	2.461	593.2	0.1927

Table 4-246. LS1 Burnup and TH Feedback Parameters Assembly F10

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.264	639.0	0.7396	2.007	639.0	0.7396
2	0.000		0.7175	6.272	993.6	0.7175	10.122	1019.6	0.7161
3	0.000		0.5368	8.035	1132.5	0.5368	12.889	1155.2	0.5307
4	0.000	Data	0.3844	8.135	1142.6	0.3844	12.862	1133.3	0.3798
5	0.000	Not	0.3097	7.540	1084.5	0.3097	12.040	1095.5	0.3062
6	0.000	Required	0.2631	6.540	993.9	0.2631	10.768	1052.0	0.2594
7	0.000		0.2343	4.885	861.0	0.2343	8.338	938.1	0.2293
8	0.000		0.2168	3.412	759.0	0.2168	5.842	808.1	0.2109
9	0.000		0.2100	1.043	617.9	0.2100	1.825	633.6	0.2037
10	0.000		0.2090	0.666	597.8	0.2090	1.157	606.8	0.2027

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.196	636.0	0.7396	3.218	632.1	0.7396
2	15.571	933.1	0.7171	15.678	938.8	0.7171
3	19.218	988.9	0.5439	19.370	1130.4	0.5440
4	19.560	1022.1	0.3996	19.729	1221.8	0.3994
5	19.126	1058.3	0.3252	19.289	1188.3	0.3249
6	18.194	1091.2	0.2755	18.350	1152.2	0.2752
7	15.487	1064.6	0.2418	15.626	1063.8	0.2415
8	11.083	900.4	0.2184	11.183	890.3	0.2181
9	3.519	656.3	0.2095	3.552	656.3	0.2091
10	2.191	618.8	0.2079	2.212	621.3	0.2076

Table 4-247. LS1 Burnup and TH Feedback Parameters Assembly F11

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.304	641.6	0.7396	2.089	643.7	0.7396
2	0.000		0.7155	6.434	1008.3	0.7155	10.466	1048.9	0.7133
3	0.000		0.5294	8.208	1149.9	0.5294	13.239	1186.2	0.5208
4	0.000	Data	0.3774	8.268	1156.0	0.3774	13.182	1165.5	0.3705
5	0.000	Not	0.3040	7.603	1090.5	0.3040	12.306	1129.4	0.2981
6	0.000	Required	0.2586	6.531	993.2	0.2586	10.968	1085.3	0.2521
7	0.000		0.2308	4.840	857.7	0.2308	8.433	957.9	0.2228
8	0.000		0.2140	3.395	757.8	0.2140	5.889	815.9	0.2051
9	0.000		0.2072	1.045	618.0	0.2072	1.848	635.6	0.1980
10	0.000		0.2062	0.668	597.9	0.2062	1.174	608.2	0.1971

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.365	641.8	0.7396	3.388	635.5	0.7396
2	16.192	957.3	0.7138	16.297	928.4	0.7139
3	19.809	1010.4	0.5330	19.936	1007.3	0.5333
4	20.145	1046.7	0.3890	20.276	1024.8	0.3892
5	19.694	1087.5	0.3156	19.819	995.5	0.3158
6	18.712	1122.9	0.2666	18.825	943.8	0.2668
7	15.882	1093.7	0.2335	15.977	869.6	0.2337
8	11.333	917.0	0.2108	11.398	759.7	0.2110
9	3.618	660.7	0.2020	3.638	618.5	0.2022
10	2.259	621.7	0.2005	2.271	596.0	0.2008

Table 4-248. LS1 Burnup and TH Feedback Parameters Assembly F12

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.328	643.2	0.7396	2.130	645.6	0.7396
2	0.000		0.7144	6.509	1015.2	0.7144	10.616	1061.1	0.7118
3	0.000		0.5251	8.321	1161.4	0.5251	13.460	1205.4	0.5155
4	0.000	Data	0.3732	8.385	1168.0	0.3732	13.431	1188.9	0.3652
5	0.000	Not	0.3002	7.677	1097.7	0.3002	12.536	1156.0	0.2931
6	0.000	Required	0.2554	6.547	994.7	0.2554	11.109	1105.9	0.2475
7	0.000		0.2282	4.804	855.0	0.2282	8.440	964.2	0.2187
8	0.000		0.2120	3.364	755.8	0.2120	5.859	816.0	0.2017
9	0.000		0.2053	1.043	617.9	0.2053	1.848	635.7	0.1948
10	0.000		0.2043	0.671	598.1	0.2043	1.182	608.6	0.1939

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.450	644.8	0.7396	3.476	645.8	0.7396
2	16.492	970.7	0.7121	16.610	986.0	0.7122
3	20.167	1022.9	0.5271	20.306	1062.1	0.5273
4	20.548	1061.3	0.3829	20.688	1068.3	0.3830
5	20.097	1104.5	0.3099	20.230	1034.4	0.3099
6	19.048	1142.8	0.2614	19.168	974.5	0.2615
7	16.072	1111.9	0.2287	16.173	896.3	0.2288
8	11.417	926.5	0.2065	11.487	777.2	0.2066
9	3.663	663.3	0.1978	3.685	624.2	0.1979
10	2.302	623.6	0.1964	2.316	601.6	0.1965

Table 4-249. LS1 Burnup and TH Feedback Parameters Assembly F13

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.304	641.6	0.7396	2.111	646.1	0.7396
2	0.000		0.7147	6.449	1009.8	0.7147	10.585	1066.0	0.7114
3	0.000		0.5246	8.411	1170.7	0.5246	13.646	1222.8	0.5134
4	0.000	Data	0.3705	8.587	1189.0	0.3705	13.754	1210.5	0.3615
5	0.000	Not	0.2967	7.891	1118.5	0.2967	12.890	1180.5	0.2888
6	0.000	Required	0.2515	6.712	1009.1	0.2515	11.442	1134.1	0.2428
7	0.000		0.2242	4.891	861.6	0.2242	8.652	982.2	0.2140
8	0.000		0.2082	3.417	759.3	0.2082	5.968	822.8	0.1972
9	0.000		0.2016	1.063	619.0	0.2016	1.887	637.5	0.1904
10	0.000		0.2006	0.686	598.9	0.2006	1.209	609.7	0.1895

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.551	653.0	0.7396	3.571	625.3	0.7396
2	16.867	1007.9	0.7099	16.955	859.2	0.7100
3	20.689	1054.2	0.5200	20.799	931.9	0.5205
4	21.198	1093.0	0.3745	21.313	950.8	0.3751
5	20.788	1138.6	0.3014	20.898	929.4	0.3019
6	19.742	1180.7	0.2530	19.842	888.0	0.2534
7	16.680	1152.3	0.2203	16.765	833.4	0.2207
8	11.842	953.3	0.1984	11.902	741.5	0.1988
9	3.827	670.7	0.1899	3.846	615.6	0.1902
10	2.415	628.4	0.1885	2.425	590.5	0.1889

Table 4-250. LS1 Burnup and TH Feedback Parameters Assembly F14

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.446	651.0	0.7396	2.194	639.5	0.7396
2	0.000		0.7086	7.005	1061.8	0.7086	10.785	1008.3	0.7103
3	0.000		0.5083	8.607	1191.1	0.5083	13.418	1147.6	0.5135
4	0.000	Data	0.3607	8.469	1176.7	0.3607	13.323	1155.1	0.3649
5	0.000	Not	0.2911	7.709	1100.8	0.2911	12.504	1144.9	0.2937
6	0.000	Required	0.2481	6.580	997.5	0.2481	11.059	1092.4	0.2484
7	0.000		0.2219	4.847	858.2	0.2219	8.388	950.7	0.2199
8	0.000		0.2061	3.341	754.4	0.2061	5.767	807.7	0.2027
9	0.000		0.1997	1.015	616.4	0.1997	1.786	632.6	0.1959
10	0.000		0.1988	0.649	596.9	0.1988	1.131	606.0	0.1949

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.326	632.2	0.7396	3.348	632.1	0.7396
2	15.874	902.7	0.7141	15.979	925.5	0.7141
3	19.524	969.4	0.5354	19.659	1045.2	0.5357
4	19.984	1018.7	0.3929	20.128	1091.6	0.3930
5	19.626	1061.8	0.3196	19.772	1101.7	0.3196
6	18.600	1102.5	0.2710	18.740	1071.7	0.2710
7	15.687	1079.0	0.2384	15.810	986.7	0.2384
8	11.109	908.6	0.2154	11.196	838.7	0.2154
9	3.512	658.1	0.2066	3.541	644.5	0.2066
10	2.179	619.6	0.2050	2.198	615.6	0.2049

Table 4-251. LS1 Burnup and TH Feedback Parameters Assembly F15

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.418	649.1	0.7396	2.193	642.5	0.7396
2	0.000		0.7096	6.877	1049.7	0.7096	10.807	1032.3	0.7095
3	0.000		0.5092	8.673	1198.0	0.5092	13.683	1182.4	0.5093
4	0.000	Data	0.3589	8.705	1201.4	0.3589	13.749	1188.3	0.3592
5	0.000	Not	0.2879	7.965	1125.9	0.2879	12.972	1181.8	0.2874
6	0.000	Required	0.2444	6.759	1013.4	0.2444	11.418	1122.2	0.2419
7	0.000		0.2181	4.909	862.9	0.2181	8.520	960.7	0.2137
8	0.000		0.2026	3.405	758.5	0.2026	5.852	810.2	0.1971
9	0.000		0.1962	1.054	618.5	0.1962	1.841	634.1	0.1905
10	0.000		0.1953	0.679	598.5	0.1953	1.175	607.2	0.1895

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.485	642.9	0.7396	3.506	628.7	0.7396
2	16.504	954.8	0.7114	16.598	882.6	0.7115
3	20.301	1014.8	0.5248	20.420	971.1	0.5253
4	20.846	1059.5	0.3802	20.971	997.0	0.3807
5	20.515	1102.8	0.3070	20.635	972.9	0.3074
6	19.401	1147.5	0.2589	19.510	926.6	0.2592
7	16.267	1123.5	0.2267	16.360	862.9	0.2271
8	11.512	935.1	0.2044	11.578	763.1	0.2047
9	3.694	665.6	0.1958	3.715	621.3	0.1961
10	2.317	624.8	0.1944	2.329	596.0	0.1946

Table 4-252. LS1 Burnup and TH Feedback Parameters Assembly F16

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.477	653.0	0.7396	2.202	637.0	0.7396
2	0.000		0.7060	7.221	1083.1	0.7060	10.984	1005.9	0.7080
3	0.000		0.4989	8.839	1215.7	0.4989	13.646	1147.0	0.5070
4	0.000	Data	0.3526	8.647	1195.3	0.3526	13.496	1154.2	0.3600
5	0.000	Not	0.2844	7.832	1112.8	0.2844	12.766	1168.9	0.2897
6	0.000	Required	0.2425	6.633	1002.2	0.2425	11.263	1117.4	0.2445
7	0.000		0.2169	4.810	855.6	0.2169	8.378	954.5	0.2162
8	0.000		0.2019	3.302	751.8	0.2019	5.713	806.0	0.1995
9	0.000		0.1957	1.017	616.5	0.1957	1.786	632.4	0.1930
10	0.000		0.1947	0.656	597.3	0.1947	1.140	606.2	0.1920

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.406	637.0	0.7396	3.432	645.8	0.7396
2	16.469	936.2	0.7112	16.590	1000.2	0.7113
3	20.109	1000.9	0.5262	20.252	1081.9	0.5263
4	20.406	1041.7	0.3841	20.552	1100.0	0.3841
5	20.047	1077.1	0.3118	20.189	1076.6	0.3118
6	18.934	1115.6	0.2639	19.064	1018.9	0.2639
7	15.784	1089.5	0.2321	15.891	919.9	0.2321
8	11.088	911.4	0.2098	11.161	789.1	0.2098
9	3.523	658.8	0.2013	3.548	632.8	0.2013
10	2.205	620.6	0.1997	2.220	604.4	0.1997

Table 4-253. LS1 Burnup and TH Feedback Parameters Assembly F17

Node No.	Statepoint 7 (BOC Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 8 (193.2 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 9 (306.8 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.333	643.5	0.7396	2.030	633.9	0.7396
2	0.000		0.7136	6.448	1009.5	0.7136	10.014	975.8	0.7148
3	0.000		0.5234	8.401	1169.6	0.5234	13.158	1138.5	0.5272
4	0.000	Data	0.3697	8.656	1196.2	0.3697	13.522	1157.0	0.3733
5	0.000	Not	0.2953	8.067	1135.9	0.2953	12.869	1146.2	0.2980
6	0.000	Required	0.2493	6.921	1027.8	0.2493	11.377	1088.8	0.2506
7	0.000		0.2217	5.065	874.6	0.2217	8.527	939.7	0.2212
8	0.000		0.2053	3.534	767.0	0.2053	5.887	799.0	0.2038
9	0.000		0.1986	1.100	621.0	0.1986	1.863	631.8	0.1969
10	0.000		0.1975	0.708	600.0	0.1975	1.189	605.9	0.1958

Node No.	Statepoint 10 (BOC Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 11 (3.67 EFPD Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.287	640.6	0.7396	3.308	628.7	0.7396
2	15.592	944.3	0.7160	15.693	910.9	0.7160
3	19.669	1005.1	0.5394	19.803	1040.6	0.5397
4	20.525	1050.6	0.3915	20.670	1091.5	0.3916
5	20.354	1097.0	0.3154	20.495	1074.9	0.3155
6	19.352	1146.6	0.2651	19.484	1028.1	0.2653
7	16.353	1131.4	0.2313	16.468	951.2	0.2314
8	11.703	948.0	0.2080	11.783	816.0	0.2081
9	3.798	670.4	0.1990	3.825	638.6	0.1991
10	2.387	628.0	0.1975	2.404	610.0	0.1976

Table 4-254. LS1 Burnup and TH Feedback Parameters Assembly F18

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.479	653.2	0.7396	2.019	616.7	0.7396
2	0.000		0.7046	7.221	1083.0	0.7046	10.041	869.3	0.7083
3	0.000		0.4955	8.808	1212.3	0.4955	12.572	981.8	0.5189
4	0.000	Data	0.3517	8.622	1192.7	0.3517	12.567	1008.4	0.3807
5	0.000	Not	0.2840	7.820	1111.6	0.2840	12.747	1171.1	0.3165
6	0.000	Required	0.2422	6.622	1001.3	0.2422	11.594	1176.5	0.2650
7	0.000		0.2169	4.804	855.1	0.2169	8.556	981.1	0.2310
8	0.000		0.2018	3.288	750.9	0.2018	5.800	818.1	0.2114
9	0.000		0.1955	1.008	616.0	0.1955	1.798	634.3	0.2041
10	0.000		0.1956	0.653	597.1	0.1956	1.143	606.7	0.2032

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.221	636.9	0.7396	3.243	632.1	0.7396
2	15.573	940.4	0.7116	15.675	913.9	0.7117
3	19.130	1009.3	0.5344	19.262	1027.3	0.5347
4	19.548	1048.4	0.3976	19.688	1069.9	0.3978
5	19.979	1072.3	0.3280	20.118	1061.7	0.3281
6	19.192	1108.3	0.2754	19.323	1023.4	0.2755
7	15.953	1088.6	0.2396	16.066	942.6	0.2396
8	11.191	912.7	0.2157	11.269	807.4	0.2157
9	3.541	659.1	0.2067	3.567	635.7	0.2067
10	2.208	620.6	0.2053	2.224	607.2	0.2053

Table 4-255. LS1 Burnup and TH Feedback Parameters Assembly G1

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.136	630.5	0.7396	1.866	637.4	0.7396
2	0.000		0.7248	5.395	917.0	0.7248	9.143	1003.5	0.7203
3	0.000		0.5642	7.630	1092.0	0.5642	12.742	1199.1	0.5444
4	0.000	Data	0.4044	8.262	1154.1	0.4044	13.403	1204.3	0.3871
5	0.000	Not	0.3224	7.669	1095.7	0.3224	12.629	1172.0	0.3079
6	0.000	Required	0.2721	6.576	996.2	0.2721	11.411	1150.4	0.2574
7	0.000		0.2417	4.916	862.8	0.2417	8.853	1007.3	0.2255
8	0.000		0.2240	3.318	752.5	0.2240	5.915	828.1	0.2073
9	0.000		0.2170	1.083	620.0	0.2170	1.945	641.0	0.2002
10	0.000		0.2159	0.710	600.1	0.2159	1.267	612.7	0.1993

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.392	658.7	0.7396	3.405	601.9	0.7396
2	15.812	1043.8	0.7134	15.874	754.5	0.7135
3	20.064	1079.8	0.5350	20.152	841.8	0.5356
4	21.093	1116.2	0.3864	21.195	898.1	0.3872
5	20.778	1163.4	0.3089	20.882	904.9	0.3096
6	19.965	1206.6	0.2571	20.066	891.3	0.2577
7	17.196	1184.2	0.2216	17.325	1017.8	0.2224
8	12.045	974.7	0.1989	12.154	930.5	0.1996
9	4.016	678.3	0.1901	4.052	665.2	0.1908
10	2.585	634.6	0.1889	2.606	621.2	0.1895

Table 4-256. LS1 Burnup and TH Feedback Parameters Assembly G2

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.230	636.6	0.7396	2.006	642.5	0.7396
2	0.000		0.7217	5.822	953.2	0.7217	9.872	1051.6	0.7168
3	0.000		0.5515	7.784	1106.6	0.5515	12.932	1205.8	0.5324
4	0.000	Data	0.3960	8.164	1144.1	0.3960	13.118	1171.2	0.3807
5	0.000	Not	0.3177	7.579	1087.0	0.3177	12.260	1124.3	0.3057
6	0.000	Required	0.2692	6.525	991.8	0.2692	10.968	1085.2	0.2578
7	0.000		0.2395	4.891	860.9	0.2395	8.520	962.2	0.2272
8	0.000		0.2219	3.312	752.1	0.2219	5.780	812.4	0.2091
9	0.000		0.2151	1.083	620.0	0.2151	1.909	637.6	0.2021
10	0.000		0.2141	0.712	600.2	0.2141	1.246	610.6	0.2012

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.410	650.4	0.7396	3.433	635.4	0.7396
2	16.225	1013.7	0.7134	16.336	951.4	0.7134
3	20.002	1055.7	0.5327	20.139	1050.1	0.5329
4	20.462	1082.0	0.3878	20.606	1087.0	0.3879
5	19.941	1115.3	0.3131	20.082	1072.1	0.3133
6	18.951	1146.0	0.2633	19.078	1007.1	0.2634
7	16.169	1112.3	0.2294	16.272	904.0	0.2295
8	11.282	921.3	0.2071	11.353	779.1	0.2072
9	3.719	662.9	0.1986	3.742	626.9	0.1987
10	2.386	624.6	0.1974	2.400	601.5	0.1975

Table 4-257. LS1 Burnup and TH Feedback Parameters Assembly G3

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.219	635.9	0.7396	1.954	638.0	0.7396
2	0.000		0.7217	5.712	943.7	0.7217	9.456	1002.7	0.7188
3	0.000		0.5518	7.853	1113.4	0.5518	12.887	1185.1	0.5387
4	0.000	Data	0.3929	8.419	1170.0	0.3929	13.471	1188.5	0.3819
5	0.000	Not	0.3130	7.867	1114.9	0.3130	12.722	1153.8	0.3041
6	0.000	Required	0.2633	6.967	1030.7	0.2633	11.564	1110.4	0.2549
7	0.000		0.2325	5.291	891.3	0.2325	9.053	981.3	0.2233
8	0.000		0.2143	3.515	765.5	0.2143	6.144	831.6	0.2043
9	0.000		0.2074	1.138	623.0	0.2074	2.052	645.9	0.1968
10	0.000		0.2063	0.748	602.1	0.2063	1.340	615.9	0.1958

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.387	652.3	0.7396	3.400	601.9	0.7396
2	15.736	1006.8	0.7153	15.797	754.5	0.7154
3	19.898	1050.2	0.5379	19.983	832.2	0.5385
4	20.891	1089.5	0.3883	20.990	884.6	0.3891
5	20.601	1135.4	0.3113	20.748	1109.0	0.3122
6	19.849	1177.7	0.2600	20.007	1158.5	0.2607
7	17.226	1166.0	0.2247	17.355	1016.8	0.2251
8	12.292	975.9	0.2010	12.379	842.2	0.2014
9	4.154	680.2	0.1919	4.182	641.4	0.1922
10	2.676	635.6	0.1906	2.694	612.7	0.1908

Table 4-258. LS1 Burnup and TH Feedback Parameters Assembly G4

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.049	624.9	0.7396	1.748	634.0	0.7396
2	0.000		0.7288	4.869	874.4	0.7288	8.338	960.6	0.7239
3	0.000		0.5886	6.973	1031.1	0.5886	11.844	1156.7	0.5660
4	0.000	Data	0.4311	7.806	1108.7	0.4311	12.933	1201.9	0.4090
5	0.000	Not	0.3444	7.381	1068.3	0.3444	12.397	1182.0	0.3249
6	0.000	Required	0.2899	6.568	995.4	0.2899	11.129	1104.8	0.2719
7	0.000		0.2560	4.969	866.8	0.2560	8.512	950.2	0.2387
8	0.000		0.2358	3.314	752.2	0.2358	5.770	810.5	0.2187
9	0.000		0.2279	1.075	619.6	0.2279	1.934	640.7	0.2105
10	0.000		0.2266	0.701	599.6	0.2266	1.260	612.9	0.2093

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.177	652.1	0.7396	3.199	632.0	0.7396
2	14.656	1010.4	0.7184	14.760	921.8	0.7184
3	18.758	1041.1	0.5554	18.888	1020.4	0.5555
4	20.067	1061.8	0.4071	20.206	1063.9	0.4073
5	20.021	1109.7	0.3261	20.170	1112.4	0.3262
6	19.305	1166.2	0.2720	19.449	1087.3	0.2720
7	16.644	1161.6	0.2345	16.765	980.0	0.2345
8	11.909	975.2	0.2095	11.993	828.1	0.2095
9	4.043	680.6	0.1998	4.071	641.4	0.1998
10	2.606	636.2	0.1983	2.623	609.9	0.1984

Table 4-259. LS1 Burnup and TH Feedback Parameters Assembly G5

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.128	630.0	0.7396	1.860	637.6	0.7396
2	0.000		0.7253	5.366	914.6	0.7253	9.111	1003.1	0.7206
3	0.000		0.5657	7.610	1090.1	0.5657	12.718	1198.5	0.5453
4	0.000	Data	0.4052	8.253	1153.2	0.4052	13.388	1203.3	0.3875
5	0.000	Not	0.3229	7.678	1096.5	0.3229	12.628	1170.5	0.3082
6	0.000	Required	0.2722	6.663	1003.7	0.2722	11.509	1152.4	0.2574
7	0.000		0.2411	5.023	870.8	0.2411	9.016	1015.7	0.2251
8	0.000		0.2230	3.379	756.5	0.2230	6.066	839.1	0.2063
9	0.000		0.2159	1.100	620.9	0.2159	2.005	645.1	0.1989
10	0.000		0.2149	0.722	600.7	0.2149	1.308	615.4	0.1979

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.399	659.6	0.7396	3.422	635.4	0.7396
2	15.830	1048.6	0.7133	15.939	945.4	0.7133
3	20.078	1083.5	0.5348	20.211	1032.1	0.5350
4	21.100	1118.4	0.3860	21.240	1067.1	0.3862
5	20.788	1164.5	0.3085	20.935	1098.8	0.3087
6	20.051	1205.3	0.2567	20.190	1062.6	0.2568
7	17.374	1185.6	0.2210	17.489	952.0	0.2211
8	12.255	979.8	0.1979	12.334	809.3	0.1980
9	4.106	680.1	0.1891	4.132	635.6	0.1892
10	2.647	635.8	0.1878	2.663	607.1	0.1880

Table 4-260. LS1 Burnup and TH Feedback Parameters Assembly G6

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.181	633.4	0.7396	1.947	641.4	0.7396
2	0.000		0.7241	5.550	930.0	0.7241	9.493	1034.3	0.7186
3	0.000		0.5618	7.596	1088.5	0.5618	12.733	1203.8	0.5396
4	0.000	Data	0.4051	8.011	1128.9	0.4051	13.070	1189.7	0.3860
5	0.000	Not	0.3256	7.352	1065.7	0.3256	12.201	1152.8	0.3092
6	0.000	Required	0.2769	6.255	968.7	0.2769	10.956	1127.8	0.2600
7	0.000		0.2474	4.651	843.2	0.2474	8.462	988.6	0.2289
8	0.000		0.2301	3.192	744.3	0.2301	5.721	819.8	0.2112
9	0.000		0.2230	1.055	618.5	0.2230	1.897	639.1	0.2042
10	0.000		0.2219	0.693	599.2	0.2219	1.239	611.7	0.2033

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.418	654.9	0.7396	3.440	632.0	0.7396
2	16.005	1028.6	0.7131	16.105	905.9	0.7132
3	19.939	1068.7	0.5341	20.067	1008.8	0.5344
4	20.639	1104.1	0.3881	20.778	1063.9	0.3884
5	20.188	1146.5	0.3121	20.338	1115.9	0.3123
6	19.274	1181.2	0.2612	19.421	1100.6	0.2613
7	16.435	1145.3	0.2266	16.563	1013.4	0.2266
8	11.465	941.5	0.2044	11.556	855.0	0.2045
9	3.806	668.7	0.1959	3.836	647.3	0.1960
10	2.450	628.6	0.1946	2.468	612.7	0.1947

Table 4-261. LS1 Burnup and TH Feedback Parameters Assembly G7

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.040	624.3	0.7396	1.813	642.2	0.7396
2	0.000		0.7294	4.889	876.0	0.7294	8.702	1013.3	0.7206
3	0.000		0.5893	6.990	1032.6	0.5893	12.160	1209.5	0.5552
4	0.000	Data	0.4307	7.802	1108.3	0.4307	13.192	1249.9	0.3995
5	0.000	Not	0.3442	7.323	1062.9	0.3442	12.616	1232.0	0.3168
6	0.000	Required	0.2907	6.327	974.8	0.2907	11.109	1142.2	0.2650
7	0.000		0.2579	4.698	846.7	0.2579	8.342	964.7	0.2331
8	0.000		0.2385	3.125	740.1	0.2385	5.535	805.3	0.2146
9	0.000		0.2306	1.016	616.4	0.2306	1.831	636.6	0.2069
10	0.000		0.2294	0.665	597.7	0.2294	1.197	610.4	0.2058

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.404	663.1	0.7396	3.426	632.0	0.7396
2	15.600	1066.1	0.7126	15.705	926.2	0.7126
3	19.430	1075.0	0.5398	19.578	1108.3	0.5399
4	20.570	1085.4	0.3944	20.735	1199.7	0.3943
5	20.481	1134.1	0.3154	20.639	1159.7	0.3153
6	19.581	1197.7	0.2627	19.730	1109.1	0.2626
7	16.703	1185.9	0.2265	16.836	1035.2	0.2264
8	11.710	978.6	0.2029	11.807	878.6	0.2027
9	3.936	680.4	0.1936	3.969	656.2	0.1935
10	2.545	636.3	0.1922	2.567	624.1	0.1921

Table 4-262. LS1 Burnup and TH Feedback Parameters Assembly G8

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.048	624.9	0.7396	1.746	633.9	0.7396
2	0.000		0.7288	4.867	874.2	0.7288	8.332	960.2	0.7240
3	0.000		0.5888	6.970	1030.8	0.5888	11.839	1156.4	0.5662
4	0.000	Data	0.4313	7.804	1108.5	0.4313	12.931	1201.8	0.4092
5	0.000	Not	0.3445	7.380	1068.2	0.3445	12.395	1181.9	0.3251
6	0.000	Required	0.2900	6.568	995.3	0.2900	11.127	1104.6	0.2720
7	0.000		0.2561	4.968	866.7	0.2561	8.510	950.1	0.2389
8	0.000		0.2359	3.313	752.2	0.2359	5.769	810.5	0.2188
9	0.000		0.2280	1.075	619.6	0.2280	1.933	640.6	0.2106
10	0.000		0.2268	0.701	599.6	0.2268	1.260	612.9	0.2093

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.176	652.1	0.7396	3.198	632.0	0.7396
2	14.651	1010.4	0.7184	14.755	923.3	0.7185
3	18.754	1041.2	0.5555	18.885	1021.5	0.5556
4	20.063	1061.7	0.4073	20.203	1067.2	0.4074
5	20.018	1109.6	0.3262	20.168	1114.2	0.3263
6	19.302	1166.0	0.2721	19.446	1089.0	0.2721
7	16.641	1161.5	0.2346	16.763	981.5	0.2346
8	11.907	975.1	0.2096	11.991	828.0	0.2096
9	4.042	680.6	0.1998	4.070	641.4	0.1998
10	2.605	636.1	0.1984	2.623	612.7	0.1984

Table 4-263. LS1 Burnup and TH Feedback Parameters Assembly G9

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.129	630.1	0.7396	1.888	630.1	0.7396
2	0.000		0.7248	5.264	906.2	0.7248	9.081	906.2	0.7193
3	0.000		0.5660	7.476	1077.4	0.5660	12.704	1077.4	0.5425
4	0.000	Data	0.4095	8.310	1158.9	0.4095	13.643	1158.9	0.3873
5	0.000	Not	0.3258	7.805	1108.8	0.3258	12.958	1108.8	0.3070
6	0.000	Required	0.2732	6.788	1014.8	0.2732	11.544	1014.8	0.2560
7	0.000		0.2414	5.081	875.2	0.2414	8.830	875.2	0.2245
8	0.000		0.2228	3.376	756.3	0.2228	5.912	756.3	0.2059
9	0.000		0.2155	1.096	620.7	0.2155	1.965	620.7	0.1984
10	0.000		0.2144	0.720	600.6	0.2144	1.287	600.6	0.1974

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.384	656.6	0.7396	3.408	638.8	0.7396
2	15.618	1031.0	0.7140	15.728	949.9	0.7141
3	19.865	1064.5	0.5365	19.998	1032.1	0.5367
4	21.118	1094.8	0.3890	21.256	1055.7	0.3892
5	20.915	1143.5	0.3108	21.048	1031.8	0.3110
6	20.003	1196.3	0.2586	20.124	976.7	0.2588
7	17.171	1183.8	0.2231	17.273	894.4	0.2233
8	12.125	981.8	0.1997	12.194	775.6	0.1999
9	4.083	681.1	0.1906	4.106	626.9	0.1908
10	2.639	636.5	0.1893	2.653	601.5	0.1894

Table 4-264. LS1 Burnup and TH Feedback Parameters Assembly G10

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.140	630.8	0.7396	1.872	637.6	0.7396
2	0.000		0.7247	5.408	918.1	0.7247	9.163	1004.6	0.7202
3	0.000		0.5636	7.641	1093.1	0.5636	12.758	1199.9	0.5439
4	0.000	Data	0.4039	8.270	1154.8	0.4039	13.413	1204.8	0.3866
5	0.000	Not	0.3220	7.676	1096.4	0.3220	12.638	1172.5	0.3075
6	0.000	Required	0.2717	6.583	996.9	0.2717	11.420	1150.8	0.2570
7	0.000		0.2414	4.922	863.2	0.2414	8.861	1007.7	0.2252
8	0.000		0.2237	3.322	752.7	0.2237	5.922	828.4	0.2070
9	0.000		0.2167	1.084	620.0	0.2167	1.947	641.1	0.1999
10	0.000		0.2157	0.711	600.1	0.2157	1.269	612.8	0.1990

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.401	658.9	0.7396	3.424	635.4	0.7396
2	15.843	1044.8	0.7132	15.951	940.9	0.7133
3	20.087	1080.6	0.5345	20.222	1042.9	0.5347
4	21.111	1117.1	0.3859	21.255	1087.0	0.3861
5	20.795	1164.2	0.3085	20.943	1107.3	0.3086
6	19.982	1207.4	0.2567	20.123	1075.5	0.2569
7	17.210	1184.7	0.2214	17.335	999.4	0.2215
8	12.055	975.0	0.1986	12.145	852.3	0.1987
9	4.019	678.4	0.1899	4.050	650.2	0.1899
10	2.587	634.6	0.1887	2.607	618.4	0.1887

Table 4-265. LS1 Burnup and TH Feedback Parameters Assembly G11

Node No.	Statepoint 7 (BOC Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 8 (193.2 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 9 (306.8 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.037	624.1	0.7396	1.808	642.0	0.7396
2	0.000		0.7295	4.875	874.9	0.7295	8.680	1012.0	0.7207
3	0.000		0.5897	6.975	1031.2	0.5897	12.137	1208.2	0.5557
4	0.000	Data	0.4311	7.790	1107.1	0.4311	13.173	1248.8	0.4000
5	0.000	Not	0.3446	7.312	1061.9	0.3446	12.598	1230.8	0.3172
6	0.000	Required	0.2911	6.317	973.9	0.2911	11.094	1141.3	0.2653
7	0.000		0.2582	4.690	846.2	0.2582	8.329	963.9	0.2333
8	0.000		0.2387	3.121	739.8	0.2387	5.526	804.8	0.2148
9	0.000		0.2309	1.015	616.3	0.2309	1.828	636.4	0.2072
10	0.000		0.2297	0.663	597.6	0.2297	1.195	610.4	0.2060

Node No.	Statepoint 10 (BOC Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 11 (3.67 EFPD Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.397	663.0	0.7396	3.419	632.0	0.7396
2	15.570	1065.3	0.7126	15.675	926.3	0.7127
3	19.401	1074.4	0.5401	19.549	1107.2	0.5402
4	20.543	1084.6	0.3946	20.708	1196.0	0.3946
5	20.455	1133.2	0.3156	20.613	1158.0	0.3155
6	19.556	1196.7	0.2629	19.705	1109.0	0.2628
7	16.680	1184.9	0.2266	16.813	1036.8	0.2266
8	11.693	977.9	0.2030	11.790	878.6	0.2029
9	3.931	680.2	0.1937	3.964	656.2	0.1937
10	2.542	636.2	0.1924	2.563	621.2	0.1922

Table 4-266. LS1 Burnup and TH Feedback Parameters Assembly G12

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.011	622.5	0.7396	1.756	639.1	0.7396
2	0.000		0.7300	4.758	884.1	0.7300	8.443	1020.2	0.7221
3	0.000		0.5933	6.903	1024.8	0.5933	11.966	1190.4	0.5610
4	0.000	Data	0.4357	7.752	1103.5	0.4357	13.041	1231.3	0.4054
5	0.000	Not	0.3483	7.290	1059.9	0.3483	12.559	1227.5	0.3215
6	0.000	Required	0.2937	6.333	975.3	0.2937	11.175	1152.3	0.2682
7	0.000		0.2604	4.730	849.0	0.2604	8.469	978.3	0.2353
8	0.000		0.2404	3.179	743.5	0.2404	5.688	817.2	0.2162
9	0.000		0.2325	1.041	617.7	0.2325	1.894	640.1	0.2083
10	0.000		0.2312	0.679	598.4	0.2312	1.236	612.7	0.2071

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.300	659.9	0.7396	3.322	632.0	0.7396
2	15.175	1049.9	0.7143	15.279	920.4	0.7143
3	19.191	1070.6	0.5453	19.330	1061.4	0.5454
4	20.454	1088.7	0.3992	20.604	1119.3	0.3993
5	20.429	1134.6	0.3190	20.575	1097.1	0.3190
6	19.597	1192.3	0.2652	19.735	1057.4	0.2652
7	16.797	1182.5	0.2283	16.927	1019.2	0.2283
8	11.894	981.2	0.2043	11.991	877.4	0.2043
9	4.016	681.4	0.1949	4.049	656.2	0.1949
10	2.592	636.7	0.1935	2.612	618.4	0.1935

Table 4-267. LS1 Burnup and TH Feedback Parameters Assembly G13

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.185	633.7	0.7396	1.965	643.0	0.7396
2	0.000		0.7219	5.554	930.3	0.7219	9.504	1035.3	0.7167
3	0.000		0.5530	7.748	1103.3	0.5530	13.054	1234.5	0.5319
4	0.000	Data	0.3976	8.504	1178.8	0.3976	13.865	1244.7	0.3780
5	0.000	Not	0.3160	7.965	1124.5	0.3160	13.142	1210.8	0.2996
6	0.000	Required	0.2651	6.829	1018.5	0.2651	11.608	1141.3	0.2499
7	0.000		0.2347	5.063	873.9	0.2347	8.807	979.0	0.2194
8	0.000		0.2170	3.356	755.0	0.2170	5.823	812.2	0.2018
9	0.000		0.2101	1.090	620.4	0.2101	1.918	637.8	0.1949
10	0.000		0.2090	0.718	600.5	0.2090	1.257	611.1	0.1939

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.479	657.9	0.7396	3.498	621.8	0.7396
2	16.081	1034.9	0.7121	16.169	858.6	0.7122
3	20.250	1067.7	0.5289	20.361	935.4	0.5294
4	21.399	1100.7	0.3822	21.516	960.2	0.3827
5	21.157	1149.5	0.3054	21.268	934.3	0.3059
6	20.142	1204.4	0.2543	20.242	887.4	0.2547
7	17.204	1189.8	0.2197	17.288	826.6	0.2201
8	12.023	980.9	0.1969	12.081	733.3	0.1973
9	4.023	680.4	0.1882	4.041	612.7	0.1885
10	2.598	635.9	0.1868	2.609	593.2	0.1872

Table 4-268. LS1 Burnup and TH Feedback Parameters Assembly G14

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.247	637.7	0.7396	1.963	635.9	0.7396
2	0.000		0.7207	5.776	949.1	0.7207	9.431	989.0	0.7189
3	0.000		0.5487	7.915	1119.5	0.5487	12.883	1173.5	0.5394
4	0.000	Data	0.3907	8.455	1173.8	0.3907	13.484	1184.2	0.3826
5	0.000	Not	0.3113	7.884	1116.6	0.3113	12.742	1154.3	0.3046
6	0.000	Required	0.2625	6.765	1012.8	0.2625	11.309	1101.8	0.2556
7	0.000		0.2331	5.038	872.0	0.2331	8.633	957.5	0.2251
8	0.000		0.2159	3.377	756.4	0.2159	5.743	800.2	0.2074
9	0.000		0.2091	1.100	620.9	0.2091	1.890	634.2	0.2005
10	0.000		0.2081	0.723	600.8	0.2081	1.232	608.3	0.1995

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.332	648.0	0.7396	3.354	632.0	0.7396
2	15.469	984.5	0.7165	15.575	930.6	0.7165
3	19.733	1035.1	0.5414	19.864	1021.5	0.5416
4	20.802	1079.6	0.3917	20.940	1057.4	0.3918
5	20.544	1127.6	0.3141	20.690	1097.1	0.3142
6	19.581	1176.3	0.2627	19.721	1067.4	0.2629
7	16.729	1158.0	0.2278	16.846	963.7	0.2279
8	11.695	959.1	0.2046	11.777	818.1	0.2047
9	3.896	674.5	0.1958	3.922	635.6	0.1958
10	2.503	632.0	0.1944	2.519	607.1	0.1946

Table 4-269. LS1 Burnup and TH Feedback Parameters Assembly G15

Node No.	Statepoint 7 (BOC Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 8 (193.2 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 9 (306.8 EFPD Cy 7) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.031	623.8	0.7396	1.734	634.4	0.7396
2	0.000		0.7300	4.807	888.2	0.7300	8.347	996.8	0.7236
3	0.000		0.5916	6.937	1027.9	0.5916	11.932	1178.4	0.5646
4	0.000	Data	0.4325	7.812	1109.3	0.4325	13.062	1224.1	0.4071
5	0.000	Not	0.3455	7.311	1061.9	0.3455	12.415	1197.7	0.3231
6	0.000	Required	0.2921	6.249	968.3	0.2921	10.798	1103.0	0.2709
7	0.000		0.2598	4.609	840.2	0.2598	8.011	930.7	0.2393
8	0.000		0.2406	3.072	736.7	0.2406	5.285	782.3	0.2212
9	0.000		0.2327	1.003	615.7	0.2327	1.748	630.0	0.2136
10	0.000		0.2313	0.658	597.3	0.2313	1.145	606.4	0.2124

Node No.	Statepoint 10 (BOC Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 11 (3.67 EFPD Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.320	662.8	0.7396	3.341	628.6	0.7396
2	15.306	1072.2	0.7141	15.406	905.9	0.7142
3	19.237	1078.3	0.5447	19.367	1020.4	0.5450
4	20.407	1082.1	0.3987	20.548	1072.1	0.3988
5	20.252	1131.2	0.3188	20.394	1080.3	0.3190
6	19.249	1195.5	0.2657	19.387	1055.8	0.2657
7	16.283	1176.6	0.2291	16.412	1014.6	0.2292
8	11.336	967.8	0.2056	11.430	869.6	0.2057
9	3.806	677.6	0.1964	3.838	653.2	0.1965
10	2.469	634.9	0.1950	2.489	618.4	0.1951

Table 4-270. LS1 Burnup and TH Feedback Parameters Assembly G16

	Statepoint 7 (BOC Cy 7)			Statepoint 8 (193.2 EFPD Cy 7)			Statepoint 9 (306.8 EFPD Cy 7)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 7	0.00 Cy 7	0.00 Cy 7	193.2 Cy 7	193.2 Cy 7	193.2 Cy 7	306.8 Cy 7	306.8 Cy 7	306.8 Cy 7
1	0.000		0.7396	1.054	625.2	0.7396	1.816	641.0	0.7396
2	0.000		0.7280	4.973	882.7	0.7280	8.812	1017.7	0.7199
3	0.000		0.5817	7.182	1050.1	0.5817	12.420	1221.9	0.5497
4	0.000	Data	0.4233	8.000	1127.7	0.4233	13.382	1248.5	0.3942
5	0.000	Not	0.3375	7.488	1078.4	0.3375	12.815	1238.2	0.3121
6	0.000	Required	0.2845	6.419	982.7	0.2845	11.306	1160.1	0.2602
7	0.000		0.2526	4.735	849.5	0.2526	8.482	979.5	0.2286
8	0.000		0.2337	3.173	743.1	0.2337	5.640	812.2	0.2106
9	0.000		0.2261	1.046	618.0	0.2261	1.878	638.2	0.2033
10	0.000		0.2249	0.688	598.9	0.2249	1.233	611.6	0.2022

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	3.394	662.2	0.7396	3.409	608.4	0.7396
2	15.718	1066.8	0.7119	15.789	789.7	0.7121
3	19.797	1085.3	0.5356	19.894	874.8	0.5362
4	20.949	1103.9	0.3895	21.055	914.6	0.3902
5	20.822	1148.6	0.3108	20.924	898.1	0.3114
6	19.855	1206.1	0.2584	19.947	858.4	0.2589
7	16.897	1191.7	0.2226	16.974	803.2	0.2231
8	11.853	982.0	0.1995	11.907	722.2	0.2000
9	3.994	681.0	0.1905	4.010	607.1	0.1910
10	2.591	636.9	0.1892	2.600	587.6	0.1896

Table 4-271. LS1 Burnup and TH Feedback Parameters Assembly H1

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)			
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8	
1	0.000		0.7396	0.020	625.2	0.7396	
2	0.000		0.7291	0.099	923.0	0.7291	
3	0.000		0.5836	0.131	1023.1	0.5836	
4	0.000	Data	0.4266	0.143	1080.7	0.4266	
5	0.000	Not	0.3402	0.142	1075.8	0.3402	
6	0.000	Required	0.2841	0.129	1015.3	0.2841	
7	0.000		0.2494	0.097	878.6	0.2494	
8	0.000		0.2286	0.068	768.7	0.2286	
9	0.000		0.2209	0.021	621.2	0.2209	
10	0.000		0.2197	0.013	598.7	0.2197	

Table 4-272. LS1 Burnup and TH Feedback Parameters Assembly H2

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)			
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8	
1	0.000		0.7396	0.020	625.2	0.7396	
2	0.000		0.7292	0.098	919.9	0.7292	
3	0.000		0.5831	0.132	1026.6	0.5831	
4	0.000	Data	0.4252	0.144	1089.1	0.4252	
5	0.000	Not	0.3378	0.146	1095.8	0.3378	
6	0.000	Required	0.2807	0.134	1037.3	0.2807	
7	0.000		0.2456	0.100	890.8	0.2456	
8	0.000		0.2248	0.069	773.4	0.2248	
9	0.000		0.2171	0.021	621.2	0.2171	
10	0.000		0.2160	0.014	601.5	0.2160	

Table 4-273. LS1 Burnup and TH Feedback Parameters Assembly H3

	Statepoint 10 (BOC Cy 8)						
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8	
1	0.000		0.7396	0.017	615.1	0.7396	
2	0.000		0.7338	0.086	864.0	0.7338	
3	0.000		0.6188	0.118	963.9	0.6188	
4	0.000	Data	0.4676	0.129	1014.8	0.4676	
5	0.000	Not	0.3785	0.123	985.8	0.3785	
6	0.000	Required	0.3214	0.108	922.1	0.3214	
7	0.000		0.2860	0.080	813.3	0.2860	
8	0.000		0.2645	0.056	727.8	0.2645	
9	0.000		0.2566	0.017	609.9	0.2566	
10	0.000		0.2554	0.010	590.4	0.2554	

Table 4-274. LS1 Burnup and TH Feedback Parameters Assembly H4

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)			
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8	
1	0.000		0.7396	0.015	608.5	0.7396	
2	0.000		0.7382	0.076	824.9	0.7382	
3	0.000		0.6474	0.106	915.7	0.6474	
4	0.000	Data	0.5017	0.118	964.9	0.5017	
5	0.000	Not	0.4097	0.112	937.5	0.4097	
6	0.000	Required	0.3502	0.098	881.1	0.3502	
7	0.000		0.3130	0.073	787.8	0.3130	
8	0.000		0.2903	0.051	711.4	0.2903	
9	0.000		0.2819	0.015	604.3	0.2819	
10	0.000		0.2807	0.009	587.7	0.2807	

Table 4-275. LS1 Burnup and TH Feedback Parameters Assembly H5

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)			
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8	
1	0.000		0.7396	0.021	628.6	0.7396	
2	0.000		0.7260	0.105	926.6	0.7260	
3	0.000		0.5668	0.136	1049.3	0.5668	
4	0.000	Data	0.4083	0.150	1118.0	0.4083	
5	0.000	Not	0.3222	0.155	1145.9	0.3222	
6	0.000	Required	0.2650	0.147	1104.6	0.2650	
7	0.000		0.2289	0.118	964.0	0.2289	
8	0.000		0.2067	0.084	826.9	0.2067	
9	0.000		0.1986	0.025	632.7	0.1986	
10	0.000		0.1975	0.017	609.9	0.1975	

Table 4-276. LS1 Burnup and TH Feedback Parameters Assembly H6

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)			
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8	
1	0.000		0.7396	0.022	632.0	0.7396	
2	0.000		0.7246	0.109	947.4	0.7246	
3	0.000		0.5631	0.138	1057.7	0.5631	
4	0.000	Data	0.4086	0.145	1094.1	0.4086	
5	0.000	Not	0.3282	0.138	1056.2	0.3282	
6	0.000	Required	0.2771	0.122	984.6	0.2771	
7	0.000		0.2450	0.094	864.0	0.2450	
8	0.000		0.2254	0.065	760.5	0.2254	
9	0.000		0.2181	0.020	618.4	0.2181	
10	0.000		0.2170	0.013	598.7	0.2170	

Table 4-277. LS1 Burnup and TH Feedback Parameters Assembly H7

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.019	621.8	0.7396
2	0.000		0.7322	0.091	887.0	0.7322
3	0.000		0.6085	0.120	972.7	0.6085
4	0.000	Data	0.4574	0.130	1017.9	0.4574
5	0.000	Not	0.3708	0.124	990.4	0.3708
6	0.000	Required	0.3147	0.111	933.3	0.3147
7	0.000		0.2789	0.086	835.6	0.2789
8	0.000		0.2565	0.061	746.8	0.2565
9	0.000		0.2481	0.018	612.7	0.2481
10	0.000		0.2469	0.012	596.0	0.2469

Table 4-278. LS1 Burnup and TH Feedback Parameters Assembly H8

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.021	628.6	0.7396
2	0.000		0.7264	0.106	932.5	0.7264
3	0.000		0.5703	0.136	1046.8	0.5703
4	0.000	Data	0.4149	0.145	1090.8	0.4149
5	0.000	Not	0.3327	0.138	1059.4	0.3327
6	0.000	Required	0.2802	0.123	989.1	0.2802
7	0.000		0.2475	0.094	864.0	0.2475
8	0.000		0.2277	0.064	757.1	0.2277
9	0.000		0.2204	0.019	615.6	0.2204
10	0.000		0.2194	0.012	596.0	0.2194

Table 4-279. LS1 Burnup and TH Feedback Parameters Assembly H9

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.020	625.2	0.7396
2	0.000		0.7264	0.103	917.9	0.7264
3	0.000		0.5619	0.145	1091.6	0.5619
4	0.000	Data	0.3949	0.162	1180.0	0.3949
5	0.000	Not	0.3099	0.156	1147.7	0.3099
6	0.000	Required	0.2565	0.145	1094.3	0.2565
7	0.000		0.2214	0.127	1004.2	0.2214
8	0.000		0.1981	0.095	872.2	0.1981
9	0.000		0.1894	0.029	644.4	0.1894
10	0.000		0.1880	0.019	615.6	0.1880

Table 4-280. LS1 Burnup and TH Feedback Parameters Assembly H10

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.020	625.2	0.7396
2	0.000		0.7288	0.100	927.6	0.7288
3	0.000		0.5817	0.131	1025.4	0.5817
4	0.000	Data	0.4251	0.143	1080.7	0.4251
5	0.000	Not	0.3391	0.142	1079.1	0.3391
6	0.000	Required	0.2826	0.132	1029.2	0.2826
7	0.000		0.2470	0.103	902.9	0.2470
8	0.000		0.2252	0.072	782.8	0.2252
9	0.000		0.2173	0.022	624.1	0.2173
10	0.000		0.2162	0.014	601.5	0.2162

Table 4-281. LS1 Burnup and TH Feedback Parameters Assembly H11

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.018	618.5	0.7396
2	0.000		0.7325	0.090	881.3	0.7325
3	0.000		0.6090	0.121	978.4	0.6090
4	0.000	Data	0.4555	0.133	1035.2	0.4555
5	0.000	Not	0.3672	0.128	1010.2	0.3672
6	0.000	Required	0.3102	0.114	947.7	0.3102
7	0.000		0.2747	0.087	836.9	0.2747
8	0.000		0.2529	0.061	744.5	0.2529
9	0.000		0.2448	0.018	612.7	0.2448
10	0.000		0.2437	0.011	593.2	0.2437

Table 4-282. LS1 Burnup and TH Feedback Parameters Assembly H12

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.022	632.0	0.7396
2	0.000		0.7237	0.111	956.4	0.7237
3	0.000		0.5595	0.139	1065.1	0.5595
4	0.000	Data	0.4055	0.146	1099.2	0.4055
5	0.000	Not	0.3254	0.140	1066.0	0.3254
6	0.000	Required	0.2745	0.124	993.7	0.2745
7	0.000		0.2424	0.096	873.2	0.2424
8	0.000		0.2226	0.067	765.2	0.2226
9	0.000		0.2154	0.020	618.4	0.2154
10	0.000		0.2143	0.013	598.7	0.2143

Table 4-283. LS1 Burnup and TH Feedback Parameters Assembly H13

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.021	628.6	0.7396
2	0.000		0.7273	0.103	919.3	0.7273
3	0.000		0.5724	0.135	1044.5	0.5724
4	0.000	Data	0.4142	0.148	1107.7	0.4142
5	0.000	Not	0.3287	0.148	1107.7	0.3287
6	0.000	Required	0.2732	0.136	1048.5	0.2732
7	0.000		0.2389	0.103	901.6	0.2389
8	0.000		0.2184	0.071	781.6	0.2184
9	0.000		0.2108	0.022	624.1	0.2108
10	0.000		0.2097	0.014	601.5	0.2097

Table 4-284. LS1 Burnup and TH Feedback Parameters Assembly H14

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.019	621.8	0.7396
2	0.000		0.7312	0.094	901.9	0.7312
3	0.000		0.5986	0.125	997.5	0.5986
4	0.000	Data	0.4449	0.135	1043.2	0.4449
5	0.000	Not	0.3593	0.128	1008.7	0.3593
6	0.000	Required	0.3047	0.112	940.6	0.3047
7	0.000		0.2709	0.084	825.7	0.2709
8	0.000		0.2504	0.058	734.4	0.2504
9	0.000		0.2428	0.017	609.9	0.2428
10	0.000		0.2417	0.011	593.2	0.2417

Table 4-285. LS1 Burnup and TH Feedback Parameters Assembly H15

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)		
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.022	632.0	0.7396
2	0.000		0.7228	0.112	959.5	0.7228
3	0.000		0.5552	0.141	1072.5	0.5552
4	0.000	Data	0.4002	0.149	1114.6	0.4002
5	0.000	Not	0.3191	0.147	1100.9	0.3191
6	0.000	Required	0.2667	0.134	1037.3	0.2667
7	0.000		0.2339	0.102	897.5	0.2339
8	0.000		0.2142	0.070	778.1	0.2142
9	0.000		0.2069	0.021	621.2	0.2069
10	0.000		0.2059	0.014	601.5	0.2059

Table 4-286. LS1 Burnup and TH Feedback Parameters Assembly H16

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)			
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8	
1	0.000		0.7396	0.023	635.4	0.7396	
2	0.000		0.7221	0.113	964.0	0.7221	
3	0.000		0.5520	0.142	1074.9	0.5520	
4	0.000	Data	0.3972	0.150	1118.0	0.3972	
5	0.000	Not	0.3159	0.150	1119.7	0.3159	
6	0.000	Required	0.2628	0.139	1063.1	0.2628	
7	0.000		0.2295	0.107	918.2	0.2295	
8	0.000		0.2095	0.074	790.0	0.2095	
9	0.000		0.2022	0.022	624.1	0.2022	
10	0.000		0.2011	0.014	601.5	0.2011	

Table 4-287. LS1 Burnup and TH Feedback Parameters Assembly H17

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)			
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8	
1	0.000		0.7396	0.019	621.8	0.7396	
2	0.000		0.7298	0.098	919.9	0.7298	
3	0.000		0.5873	0.130	1020.7	0.5873	
4	0.000	Data	0.4310	0.141	1072.5	0.4310	
5	0.000	Not	0.3457	0.135	1043.3	0.3457	
6	0.000	Required	0.2914	0.119	971.3	0.2914	
7	0.000		0.2580	0.089	844.6	0.2580	
8	0.000		0.2380	0.061	746.8	0.2380	
9	0.000		0.2306	0.018	612.7	0.2306	
10	0.000		0.2294	0.012	596.0	0.2294	

Table 4-288. LS1 Burnup and TH Feedback Parameters Assembly H17

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)			
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8	
1	0.000		0.7396	0.019	621.8	0.7396	
2	0.000		0.7273	0.100	906.5	0.7273	
3	0.000		0.5631	0.146	1095.7	0.5631	
4	0.000	Data	0.3927	0.165	1200.2	0.3927	
5	0.000	Not	0.3058	0.163	1185.5	0.3058	
6	0.000	Required	0.2496	0.163	1185.6	0.2496	
7	0.000		0.2127	0.134	1040.7	0.2127	
8	0.000		0.1901	0.097	877.4	0.1901	
9	0.000		0.1817	0.030	647.3	0.1817	
10	0.000		0.1805	0.020	618.4	0.1805	

Table 4-289. LS1 Burnup and TH Feedback Parameters Assembly J1

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)			
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8	
1	0.000		0.7396	0.018	618.3	0.7396	
2	0.000		0.7330	0.086	865.6	0.7330	
3	0.000		0.6113	0.119	966.8	0.6113	
4	0.000	Data	0.4566	0.134	1038.2	0.4566	
5	0.000	Not	0.3632	0.143	1078.7	0.3632	
6	0.000	Required	0.2994	0.135	1043.3	0.2994	
7	0.000		0.2598	0.104	904.4	0.2598	
8	0.000		0.2366	0.071	779.7	0.2366	
9	0.000		0.2280	0.023	626.8	0.2280	
10	0.000		0.2267	0.015	604.2	0.2267	

Table 4-290. LS1 Burnup and TH Feedback Parameters Assembly J2

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)			
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8	
1	0.000		0.7396	0.018	618.3	0.7396	
2	0.000		0.7331	0.085	861.4	0.7331	
3	0.000		0.6123	0.118	964.7	0.6123	
4	0.000	Data	0.4569	0.134	1038.2	0.4569	
5	0.000	Not	0.3630	0.143	1080.3	0.3630	
6	0.000	Required	0.2984	0.139	1062.4	0.2984	
7	0.000		0.2568	0.115	950.6	0.2568	
23	0.000		0.2312	0.081	817.2	0.2312	
24	0.000		0.2218	0.026	635.4	0.2218	
25	0.000		0.2204	0.018	612.6	0.2204	

Table 4-291. LS1 Burnup and TH Feedback Parameters Assembly J3

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)			
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8	
1	0.000		0.7396	0.020	625.0	0.7396	
2	0.000		0.7312	0.092	890.2	0.7312	
	0.000		0.5979	0.124	992.5	0.5979	
4	0.000	Data	0.4413	0.139	1060.6	0.4413	
5	0.000	Not	0.3512	0.142	1075.3	0.3512	
6	0.000	Required	0.2915	0.133	1030.5	0.2915	
7	0.000		0.2541	0.103	901.6	0.2541	
8	0.000		0.2315	0.071	779.7	0.2315	
9	0.000		0.2232	0.023	626.8	0.2232	
10	0.000		0.2219	0.016	607.0	0.2219	

Table 4-292. LS1 Burnup and TH Feedback Parameters Assembly J4

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)			
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8	
1	0.000		0.7396	0.020	625.0	0.7396	
2	0.000		0.7306	0.094	897.7	0.7306	
3	0.000		0.5909	0.130	1016.7	0.5909	
4	0.000	Data	0.4304	0.145	1088.6	0.4304	
5	0.000	Not	0.3419	0.143	1078.6	0.3419	
6	0.000	Required	0.2847	0.133	1030.4	0.2847	
7	0.000		0.2479	0.108	920.9	0.2479	
8	0.000		0.2251	0.075	794.0	0.2251	
9	0.000		0.2168	0.024	629.6	0.2168	
10	0.000		0.2155	0.016	607.0	0.2155	

Table 4-293. LS1 Burnup and TH Feedback Parameters Assembly J5

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)			
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8	
1	0.000		0.7396	0.018	618.3	0.7396	
2	0.000		0.7332	0.084	854.3	0.7332	
3	0.000		0.6057	0.129	1014.2	0.6057	
4	0.000	Data	0.4359	0.152	1127.7	0.4359	
5	0.000	Not	0.3420	0.148	1103.8	0.3420	
6	0.000	Required	0.2833	0.136	1046.3	0.2833	
7	0.000		0.2459	0.111	933.5	0.2459	
8	0.000		0.2228	0.078	806.1	0.2228	
9	0.000		0.2142	0.026	635.4	0.2142	
10	0.000		0.2129	0.017	609.8	0.2129	

Table 4-294. LS1 Burnup and TH Feedback Parameters Assembly J6

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)			
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8	
1	0.000		0.7396	0.021	628.4	0.7396	
2	0.000		0.7287	0.097	912.5	0.7287	
3	0.000		0.5725	0.142	1076.1	0.5725	
4	0.000	Data	0.4027	0.162	1177.4	0.4027	
5	0.000	Not	0.3151	0.156	1148.8	0.3151	
6	0.000	Required	0.2601	0.148	1103.9	0.2601	
7	0.000		0.2242	0.124	989.0	0.2242	
8	0.000		0.2017	0.088	842.3	0.2017	
9	0.000		0.1934	0.029	644.1	0.1934	
10	0.000		0.1920	0.020	618.2	0.1920	

Table 4-295. LS1 Burnup and TH Feedback Parameters Assembly J7

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)			
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8	
1	0.000		0.7396	0.019	621.6	0.7396	
2	0.000		0.7329	0.087	868.5	0.7329	
3	0.000		0.6115	0.119	966.8	0.6115	
4	0.000	Data	0.4577	0.133	1031.8	0.4577	
5	0.000	Not	0.3651	0.140	1067.1	0.3651	
6	0.000	Required	0.3018	0.133	1030.6	0.3018	
7	0.000		0.2627	0.102	894.9	0.2627	
8	0.000		0.2396	0.069	771.4	0.2396	
9	0.000		0.2312	0.022	623.9	0.2312	
10	0.000		0.2299	0.015	604.2	0.2299	

Table 4-296. LS1 Burnup and TH Feedback Parameters Assembly J8

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)			
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8	
1	0.000		0.7396	0.020	625.0	0.7396	
2	0.000		0.7306	0.094	897.7	0.7306	
3	0.000		0.5901	0.130	1019.1	0.5901	
4	0.000	Data	0.4286	0.146	1097.0	0.4286	
5	0.000	Not	0.3398	0.145	1088.6	0.3398	
6	0.000	Required	0.2822	0.136	1044.6	0.2822	
7	0.000		0.2447	0.115	949.1	0.2447	
8	0.000		0.2207	0.082	820.9	0.2207	
9	0.000		0.2119	0.027	638.3	0.2119	
10	0.000		0.2105	0.018	612.6	0.2105	

Table 4-297. LS1 Burnup and TH Feedback Parameters Assembly J9

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)			
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8	
1	0.000		0.7396	0.019	621.6	0.7396	
2	0.000		0.7327	0.087	869.9	0.7327	
3	0.000		0.6097	0.119	969.0	0.6097	
4	0.000	Data	0.4550	0.134	1036.5	0.4550	
5	0.000	Not	0.3625	0.141	1072.1	0.3625	
6	0.000	Required	0.2990	0.136	1046.3	0.2990	
7	0.000		0.2586	0.109	926.6	0.2586	
8	0.000		0.2342	0.075	795.2	0.2342	
9	0.000		0.2253	0.024	629.6	0.2253	
10	0.000		0.2240	0.016	607.0	0.2240	

Table 4-298. LS1 Burnup and TH Feedback Parameters Assembly J10

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)			
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8	
1	0.000		0.7396	0.023	635.2	0.7396	
2	0.000		0.7275	0.103	919.4	0.7275	
3	0.000		0.5764	0.133	1030.6	0.5764	
4	0.000	Data	0.4223	0.141	1068.8	0.4223	
5	0.000	Not	0.3397	0.135	1043.0	0.3397	
6	0.000	Required	0.2865	0.122	979.9	0.2865	
7	0.000		0.2529	0.094	864.2	0.2529	
8	0.000		0.2325	0.064	754.1	0.2325	
9	0.000		0.2250	0.021	621.1	0.2250	
10	0.000		0.2238	0.014	601.4	0.2238	

Table 4-299. LS1 Burnup and TH Feedback Parameters Assembly J11

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)			
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8	
1	0.000		0.7396	0.020	625.0	0.7396	
2	0.000		0.7323	0.090	880.1	0.7323	
3	0.000		0.6084	0.120	972.3	0.6084	
4	0.000	Data	0.4563	0.131	1023.9	0.4563	
5	0.000	Not	0.3683	0.128	1006.9	0.3683	
6	0.000	Required	0.3107	0.116	956.3	0.3107	
7	0.000		0.2741	0.090	849.9	0.2741	
8	0.000		0.2518	0.062	747.3	0.2518	
9	0.000		0.2436	0.020	618.2	0.2436	
10	0.000		0.2422	0.013	598.6	0.2422	

Table 4-300. LS1 Burnup and TH Feedback Parameters Assembly J12

	Statepoint 10 (BOC Cy 8)			Statepoint 11 (3.67 EFPD Cy 8)			
Node No.	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8	
1	0.000		0.7396	0.018	618.3	0.7396	
2	0.000		0.7320	0.088	871.3	0.7320	
3	0.000		0.5952	0.133	1035.3	0.5952	
4	0.000	Data	0.4241	0.157	1150.5	0.4241	
5	0.000	Not	0.3320	0.151	1120.9	0.3320	
6	0.000	Required	0.2747	0.140	1065.7	0.2747	
7	0.000		0.2377	0.118	962.2	0.2377	
8	0.000		0.2142	0.084	828.4	0.2142	
9	0.000		0.2055	0.028	641.2	0.2055	
10	0.000		0.2041	0.019	615.4	0.2041	

Table 4-301. LS1 Burnup and TH Feedback Parameters Assembly J13

Node No.	Statepoint 10 (BOC Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)	Statepoint 11 (3.67 EFPD Cy 8) Burnup (GWd/MTU)	Fuel Temp. (K)	Mod. Dens. (g/cm^3)
	0.00 Cy 8	0.00 Cy 8	0.00 Cy 8	3.67 Cy 8	3.67 Cy 8	3.67 Cy 8
1	0.000		0.7396	0.019	621.6	0.7396
2	0.000		0.7326	0.087	869.9	0.7326
3	0.000		0.6082	0.120	972.4	0.6082
4	0.000	Data	0.4522	0.136	1044.5	0.4522
5	0.000	Not	0.3603	0.139	1062.2	0.3603
6	0.000	Required	0.2985	0.133	1033.5	0.2985
7	0.000		0.2577	0.117	957.7	0.2577
8	0.000		0.2312	0.085	831.0	0.2312
9	0.000		0.2214	0.028	641.2	0.2214
10	0.000		0.2198	0.018	612.6	0.2198

Table 4-302. LS1 Heavy Metal Uranium Weights

SAS2H Nodes	Node Height (cm)	Type 8 B Fuel (g)	Type 9 A Fuel (g)	Type 10 C Fuel (g)	Type 11 D Fuel (g)	Type 12 E Fuel (g)	Type 1 G Fuel (g)	Type 2 F Fuel (g)	Type 4 J Fuel (g)	Type 5 H Fuel (g)
10 top	15.24	5903.5	5768.5	6122.4	6140.9	6137.0	5849.5	6098.1	5716.3	5972.3
9	15.24	7228.8	7210.7	7202.8	7224.6	7220.0	7162.7	7174.2	7145.4	7166.8
8	45.72	21686.4	21632.0	21608.4	21673.9	21659.9	21488.0	21522.7	21436.2	21500.4
7	45.72	21686.4	21632.0	21608.4	21673.9	21659.9	21488.0	21522.7	21436.2	21500.4
6	45.72	21686.4	21632.0	21608.4	21673.9	21659.9	21488.0	21522.7	21436.2	21500.4
5	45.72	21686.4	21632.0	21608.4	21673.9	21659.9	21488.0	21522.7	21436.2	21500.4
4	45.72	21686.4	21632.0	21608.4	21673.9	21659.9	21488.0	21522.7	21436.2	21500.4
3	60.96	28915.2	28842.6	28811.2	28898.5	28879.9	28650.6	28697.0	28581.6	21500.4
2	45.72	21686.4	21632.0	21608.4	21673.9	21659.9	21488.0	21522.7	21436.2	28667.2
1 bottom	15.24	7228.8	7210.7	7202.8	7224.6	7220.0	7162.7	7174.2	7145.4	7166.8
Total	381.0	179394.9	178824.3	178989.9	179532.0	179416.1	177753.3	178280.0	177205.8	177975.4
Rod Linear Mass (g/cm/rod)		7.90552	7.88567	7.87709	7.90095	7.89585	7.83318	7.84585	7.81430	7.83770

4.2 CONTROL BLADE HISTORY BY CYCLE

This section provides the control rod blade history for those fuel assemblies where control blades are inserted during core operation. Control of reactivity is accomplished by a combination of blade movements and integral burnable absorbers. The core contains 185 control blades. These movable blades are used to control the fission rate and fission density. Figure 2-1 indicates the cross sectional area of four assemblies and a control blade.

Figure 4-1 indicates a full core with a control blade map for a quarter-core. This map shows locations for control blade groups 9A, 9B, 9C, 9D, 9E, 10A, 10B, and 10C. Additionally, asymmetric blade insertions in Cycle 4 (396) and Cycle 7 (464) during normal plant operation are shown. For locations where the control blades group is not specified, the lower right-hand fuel location number in that block is used as a control group number. For convenience, the fuel assembly location number in lower 1/8 quadrant is kept the same as upper 1/8 quadrant to reflect blade symmetric insertion. In general, the control blades are moved in 1/8 core symmetry.

Figures 4-2 through 4-6 provide the location of fuel assemblies and the active control blades (quarter-core symmetric locations) during Cycles 4 through 8 operation. Shaded areas indicate the areas where control blades were inserted. Sixty-eight fuel assemblies are tracked in the vicinity of control blades locations. Sixty fuel assemblies are actually exposed to some portion of a control blade.

Table 4-303 lists those fuel assemblies that are in the vicinity of a control blade location in Cycles 4 through 7. Tables 4-304 through 4-308 summarize the control blade insertion history. These tables provide a listing of the controlled assemblies and the duration and "notches" withdrawn for each active control blade group. The zero (0) "notch" withdrawn implies that the blade is fully inserted. The forty-eight "notches" withdrawn means that the control blade is fully withdrawn. This condition is identified as double hyphen (--). The forty-eight "notch" withdrawn means 144 inches withdrawn. Each notch is 3 inches (7.62 cm) long. For a duration when the particular control blade group is not symmetric, it is identified with an asterisk (*) in the tables.

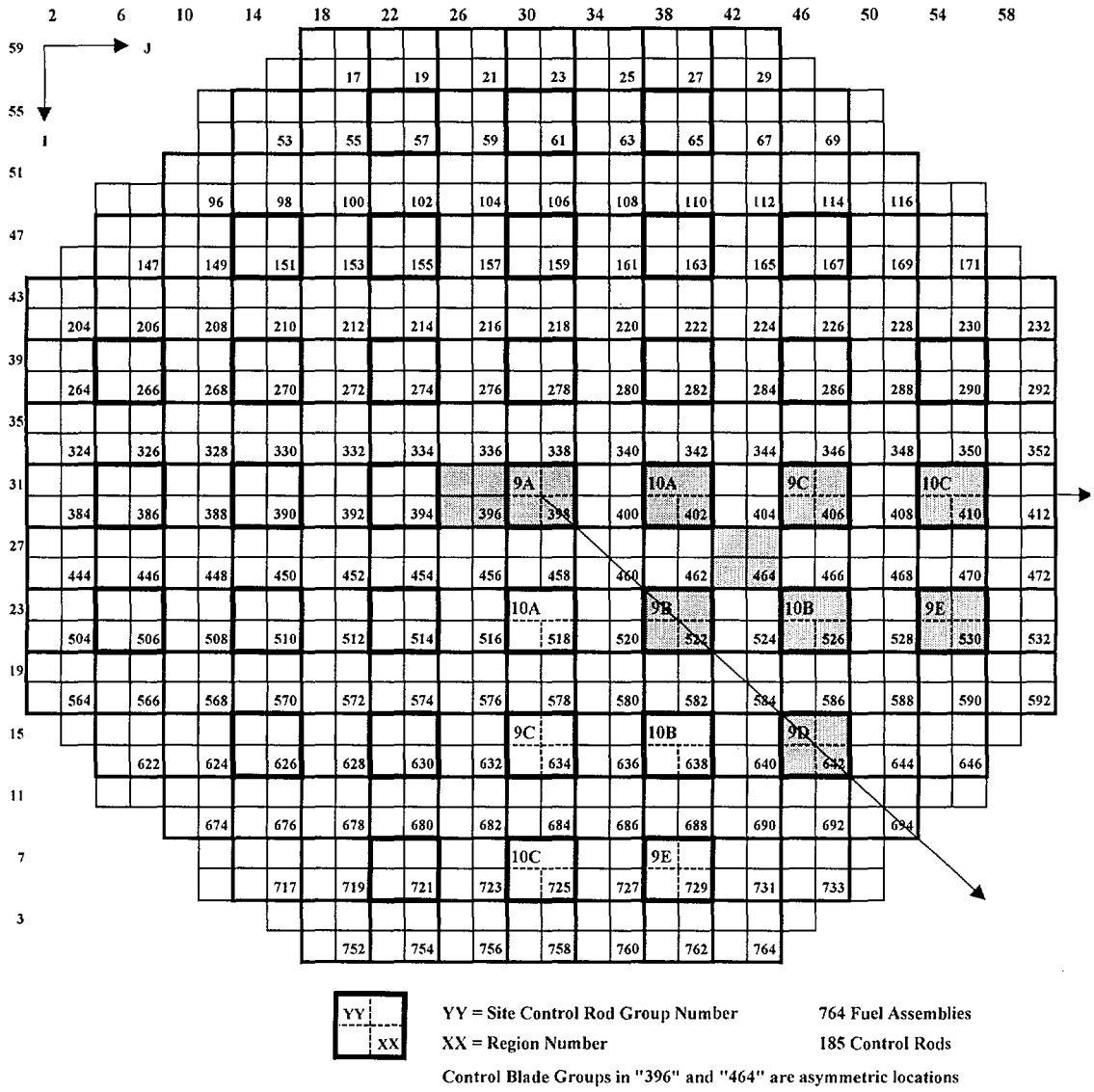

Figure 4-1. LS1 Full Core / Control Blade Map

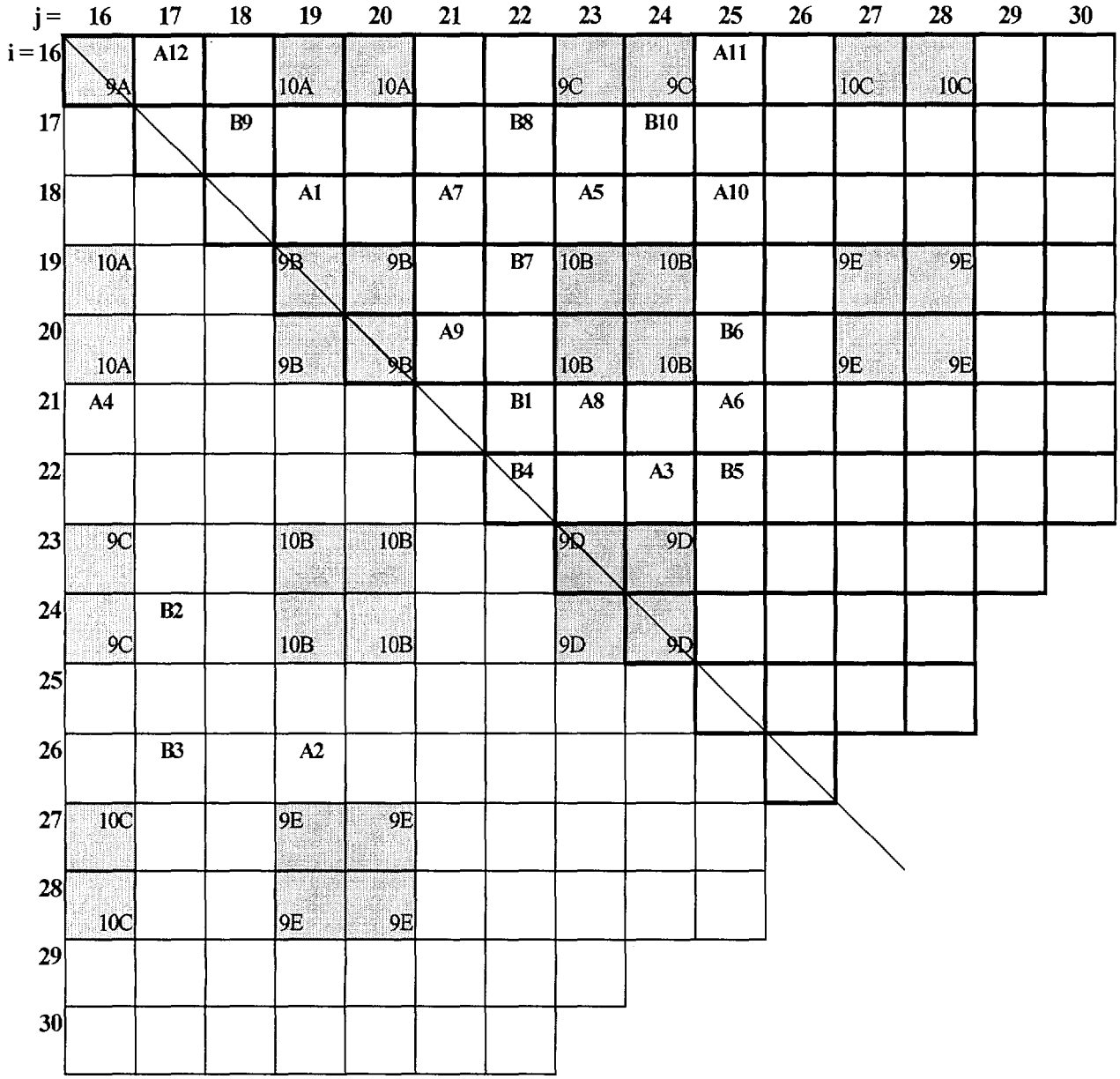

Figure 4-2. LS1 Cycle 4 Active Control Blade Locations

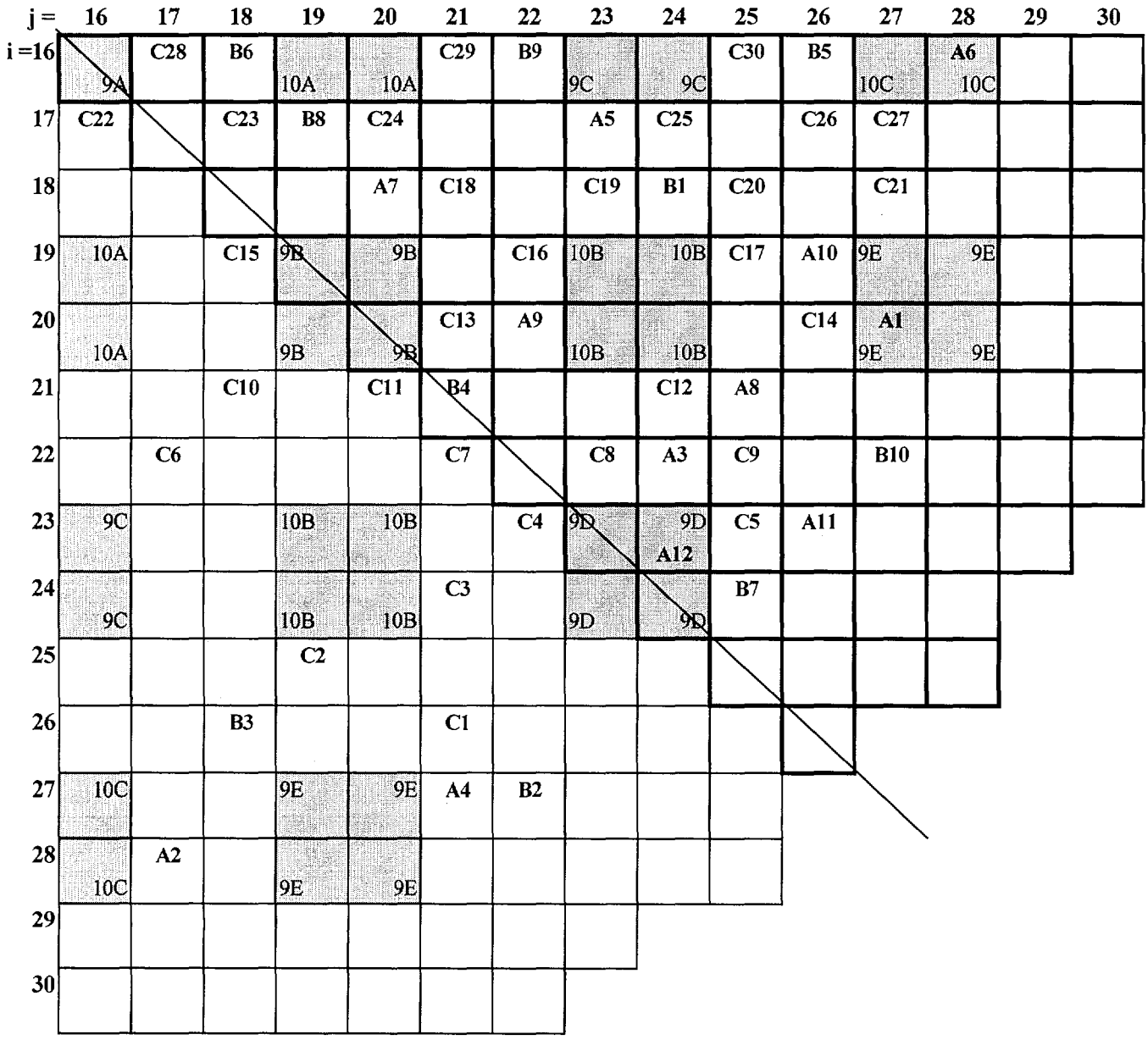

Figure 4-3. LS1 Cycle 5 Active Control Blade Locations

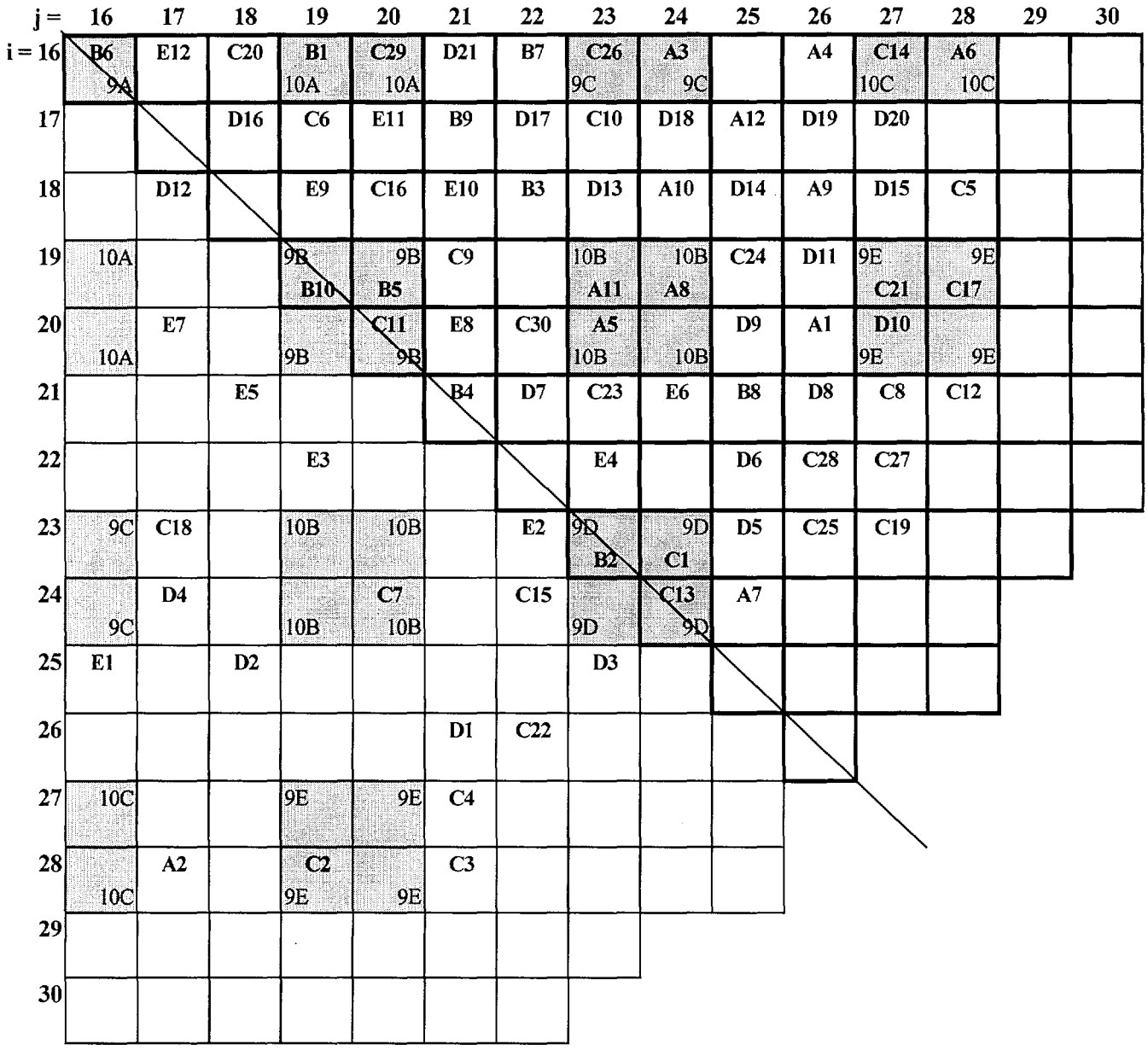

Figure 4-4. LS1 Cycle 6 Active Control Blade Locations

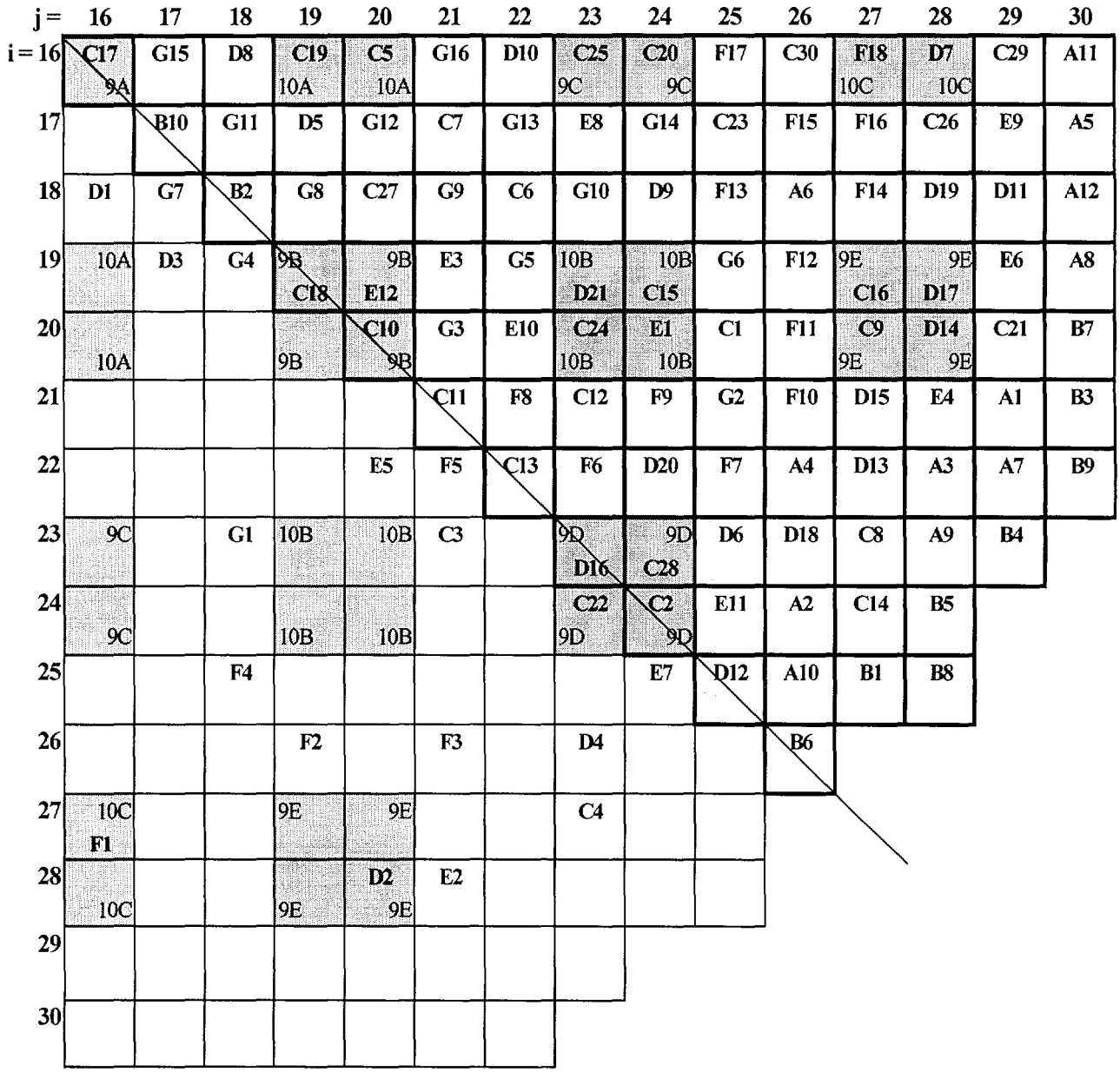

Figure 4-5. LS1 Cycle 7 Active Control Blade Locations

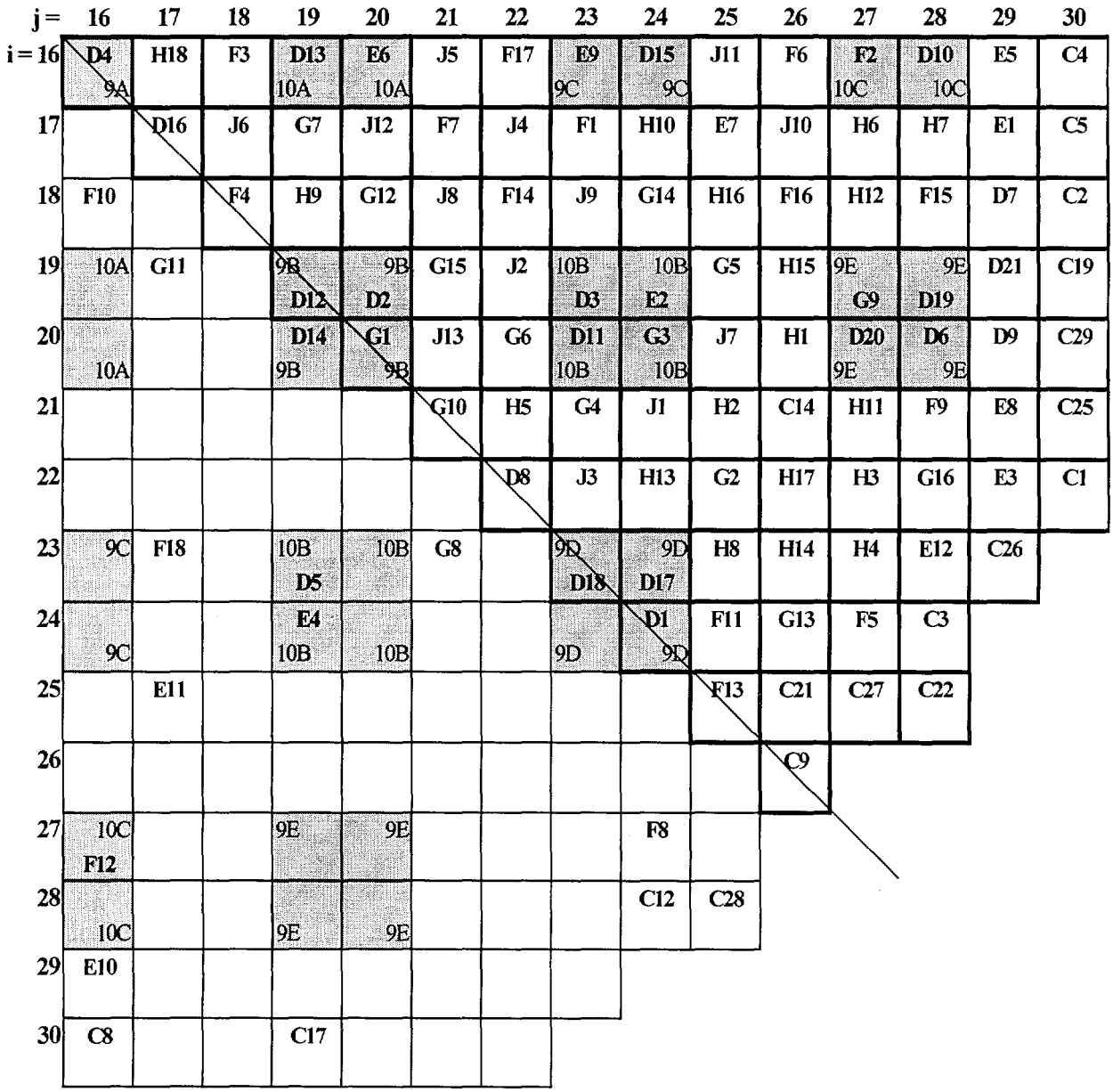

Figure 4-6. LS1 Cycle 8 Active Control Blade Locations

Table 4-303. LS1 Bladed Fuel Assemblies and Control Group

SAS2H ID	Initial Insertion	Fuel Type	Cycle 4	Cycle 5	Cycle 6	Cycle 7	Cycle 8
A1	Cycle 4	9		9E			
A3	Cycle 4	9			9C		
A5	Cycle 4	9			10B		
A6	Cycle 4	9		10C	10C		
A8	Cycle 4	9			10B		
A11	Cycle 4	9			10B		
A12	Cycle 4	9		9D			
B1	Cycle 4	8			10A		
B2	Cycle 4	8			9D		
B5	Cycle 4	8			9B		
B6	Cycle 4	8			9A		
B10	Cycle 4	8			9B		
C1	Cycle 5	10			9D		
C2	Cycle 5	10			9E	9D	
C5	Cycle 5	10				10A	
C6	Cycle 5	10				464	
C7	Cycle 5	10			10B	464	
C9	Cycle 5	10				9E	
C10	Cycle 5	10				9B	
C11	Cycle 5	10			9B		
C13	Cycle 5	10			9D		
C14	Cycle 5	10			10C		
C15	Cycle 5	10				10B	
C16	Cycle 5	10				9E	
C17	Cycle 5	10			9E	9A	
C18	Cycle 5	10				9B	
C19	Cycle 5	10				10A	
C20	Cycle 5	10				9C	
C21	Cycle 5	10			9E		
C22	Cycle 5	10				9D	
C24	Cycle 5	10				10B	
C25	Cycle 5	10				9C	
C26	Cycle 5	10			9C		
C28	Cycle 5	10				9D	
C29	Cycle 5	10			10A		

Table 4-303. LS1 Bladed Fuel Assemblies and Control Group (Continued)

SAS2H ID	Initial Insertion	Fuel Type	Cycle 4	Cycle 5	Cycle 6	Cycle 7	Cycle 8
D1	Cycle 6	11					9D
D2	Cycle 6	11				9E	9B
D3	Cycle 6	11					10B
D4	Cycle 6	11					9A
D5	Cycle 6	11					10B
D6	Cycle 6	11					9E
D7	Cycle 6	11				10C	
D10	Cycle 6	11			9E		10C
D11	Cycle 6	11					10B
D12	Cycle 6	11					9B
D13	Cycle 6	11					10A
D14	Cycle 6	11				9E	9B
D15	Cycle 6	11					9C
D16	Cycle 6	11				9D	
D17	Cycle 6	11				9E	9D
D18	Cycle 6	11					9D
D19	Cycle 6	11					9E
D20	Cycle 6	11					9E
D21	Cycle 6	11				10B	
E1	Cycle 6	12				10B	
E2	Cycle 6	12					10B
E4	Cycle 6	12					10B
E6	Cycle 6	12					10A
E9	Cycle 6	12					9C
E12	Cycle 6	12				9B	
F1	Cycle 7	2				10C	
F2	Cycle 7	2					10C
F12	Cycle 7	2					10C
F18	Cycle 7	2				10C	
G1	Cycle 7	1					9B
G3	Cycle 7	1					10B
G9	Cycle 7	1				464	9E
G13	Cycle 7	1				464	9E

Table 4-304. LS1 Control Blade Position Cycle 4
Control Blade Configuration in Notches Withdrawn

MWd/MTU	(J, I) =	30,31 9A	38,31 10A	46,31 9C	54,31 10C	38,23 9B	46,23 10B	54,23 9E	46,15 9D	26,31 396*
0.0 - 67.3		--	0	30	4	30	8	42	36	--
67.3 - 217.0		--	8	--	14	--	16	--	--	--
217.0 - 332.6		--	12	--	14	--	16	--	--	--
332.6 - 487.8		--	12	--	14	--	18	--	--	--
487.8 - 595.7		--	16	--	--	--	10	--	--	--
595.7 - 1179.1		--	16	--	--	--	12	--	--	--
1179.1 - 1523.7		--	14	--	--	--	12	--	--	--
1523.7 - 1699.8		--	16	--	--	--	10	--	--	--
1699.8 - 1936.0		--	14	--	--	--	10	--	--	--
1936.0 - 2239.5		--	14	--	--	--	10/8(1)	--	--	--
2239.5 - 2759.0		--	14	--	--	--	10	--	--	--
2759.0 - 3491.4		--	14	--	--	--	8	--	--	--
3491.4 - 3703.5		--	12	--	--	--	8	--	--	--
3703.5 - 3956.6		--	12	--	--	22	8	--	--	--
3956.6 - 4323.9		--	8	--	--	22	8	--	--	--
4323.9 - 4468.8		--	0	--	--	22	0	--	--	--
4468.8 - 4963.0		--	6	--	--	22	8	--	--	--
4963.0 - 5589.7		--	6	--	--	22	8	--	--	--
5589.7 - 6102.2		--	4	--	--	22	10	--	--	--
6102.2 - 6880.2		--	4	--	--	22	12	--	--	--
6880.2 - 6948.5		--	4	--	--	22	14	--	--	4(2)
6948.5 - 7148.8		--	0	--	--	22	14	--	--	--
7148.8 - 7379.9		--	0	--	--	--	14	--	--	--
7379.9 - 7800.5		--	8	--	--	--	14	--	--	--
7800.5 - 8032.6		--	6	--	--	--	18	--	--	--
8032.6 - 8352.5		--	12	--	--	--	18	--	--	--
8352.5 - 8515.0		--	6	--	--	--	--	--	--	--
8515.0 - 8679.5		--	12	--	--	--	--	--	--	--
8679.5 - 8931.6		--	16	--	--	--	--	--	--	--

(1) = "10" is symmetric in 1/8 core. "8" is symmetric in another 1/8 of core.
(2) = "4" is a single blade inserted for one time step (6880.2 to 6948.5).

Table 4-305. LS1 Control Blade Position Cycle 5
Control Blade Configuration in Notches Withdrawn

			Control Blade Group Number							
		(J, I) =	30,31	38,31	46,31	54,31	38,23	46,23	54,23	46,15
MWd/MTU			9A	10A	9C	10C	9B	10B	9E	9D
0.0	-	151.0	0	24	0	--	6	--	18	12
151.0	-	919.3	12	--	8	--	12	--	--	--
919.3	-	1242.3	12	--	6	--	12	--	--	--
1242.3	-	1451.7	--	--	0	--	12	--	--	--
1451.7	-	1779.1	--	--	0	--	10	--	--	--
1779.1	-	3585.8	--	--	0	--	8	--	--	--
3585.8	-	3787.1	--	--	0	--	4	--	--	--
3787.1	-	4239.3	--	--	0	--	0	--	--	--
4239.3	-	5006.1	10	--	0	--	10	--	--	--
5006.1	-	5559.6	0	--	0	--	10	--	--	--
5559.6	-	5745.7	--	6	--	--	--	12	--	--
5745.7	-	6027.4	--	6	--	--	--	12	--	--
6027.4	-	6652.3	--	8	--	--	--	12	--	--
6652.3	-	6710.5	--	0	--	12	--	0	--	--
6710.5	-	7068.3	--	8	--	--	--	12	--	--
7068.3	-	7494.8	--	8	--	--	--	14	--	--
7494.8	-	8053.6	--	10	--	--	--	16	--	--
8053.6	-	8218.8	--	12	--	--	--	16	--	--
8218.8	-	8424.8	--	4	--	--	--	--	--	--
8424.8	-	8677.7	--	8	--	--	--	--	--	--
8677.7	-	9067.7	--	12	--	--	--	--	--	--
9067.7	-	9239.9	0	12	--	--	--	--	--	--
9239.9	-	11207.9	--	--	--	--	--	--	--	--

Table 4-306. LS1 Control Blade Position Cycle 6
Control Blade Configuration in Notches Withdrawn

			Control Blade Group Number or Region Number							
		(J, I) =	30,31	38,31	46,31	54,31	38,23	46,23	54,23	46,15
MWd/MTU			9A	10A	9C	10C	9B	10B	9E	9D
0.0	-	92.9	0	24	0	--	0	36	24	0
92.9	-	211.4	0	30	8	--	8	--	--	24
211.4	-	295.9	0	24	8	--	0	36	--	10
295.9	-	373.0	30	--	12	--	8	--	--	30
373.0	-	435.6	10	24	10	--	8	30	--	10
435.6	-	550.2	36	--	12	--	8	--	--	36
550.2	-	930.5	36	--	12	--	10	--	--	36
930.5	-	1070.9	36	--	14	--	10	--	--	36
1070.9	-	1260.8	--	--	14	--	10	--	--	42
1260.8	-	1454.8	--	--	14	--	8	--	--	--
1454.8	-	1517.5	18	--	14	--	0	--	--	24
1517.5	-	1723.1	--	--	14	--	4	--	--	38
1723.1	-	2416.2	--	--	12	--	0	--	--	38
2416.2	-	2970.8	30	--	12	--	0	--	--	40
2970.8	-	3274.7	30	--	10	--	0	--	--	40
3274.7	-	3694.5	24	--	10	--	0	--	--	30
3694.5	-	4157.7	24	--	8	--	0	--	--	30
4157.7	-	4251.2	--	0	--	--	38	14	--	--
4251.2	-	4752.2	--	6	--	--	38	14	--	--
4752.2	-	4806.8	--	0	40	--	24	6	--	38
4806.8	-	5455.1	--	6	--	--	38	14	--	--
5455.1	-	5745.0	--	10	--	--	38	14	--	--
5745.0	-	6201.9	--	12	--	--	--	14	--	--
6201.9	-	6346.2	--	12	--	--	--	16	--	--
6346.2	-	6423.2	--	0	--	--	--	8	--	--
6423.2	-	7255.9	0	--	--	--	0	--	--	--
7255.9	-	7658.4	--	10	--	--	--	--	--	--

Table 4-307. LS1 Control Blade Position Cycle 7
Control Blade Configuration in Notches Withdrawn

		Control Blade Group Number or Region Number								
(J, I) =		30,31	38,31	46,31	54,31	38,23	46,23	54,23	46,15	42,27
MWd/MTU		9A	10A	9C	10C	9B	10B	9E	9D	464*
0.0	156.4	12	0	12	0	12	0	12	12	30
156.4	314.3	--	0	36	--	--	8	--	30	--
314.3	1056.1	--	0	--	--	--	10	--	30	--
1056.1	1315.4	--	0	--	--	--	8	--	30	--
1315.4	1830.8	--	0	--	--	--	6	--	30	--
1830.8	2099.3	--	0	--	--	--	4	--	30	--
2099.3	2488.6	--	0	--	--	--	0	--	30	--
2488.6	2902.8	--	8	--	--	--	0	--	18	--
2902.8	3071.4	--	8	--	--	20	0	--	--	--
3071.4	3603.0	--	0	--	--	20	0	--	--	--
3603.0	3769.7	--	0	24	--	18	0	--	--	--
3769.7	3865.0	--	0	24	--	18	0	--	24	--
3865.0	4619.4	--	4	24	--	20	0	--	24	--
4619.4	4728.4	0	--	0	--	6	18	--	0	--
4728.4	4925.0	0	--	0	--	6	18	--	0	--
4925.0	5119.5	0	--	0	24	6	18	--	0	--
5119.5	5725.7	0	24	0	24	6	18	--	8	--
5725.7	6308.4	0	24	0	24	4	18	--	8	--
6308.4	6771.8	0	24	0	24	6	18	--	8	--
6771.8	6911.8	0	30	0	--	0	20	--	0	--
6911.8	7082.2	0	30	0	--	6	20	--	0	--
7082.2	7190.8	0	--	0	--	0	20	--	0	--
7190.8	7312.2	0	--	0	--	8	20	--	0	--
7312.2	7507.3	0	--	4	--	10	20	--	0	--
7507.3	7778.3	0	--	0	--	6	--	24	0	--
7778.3	8014.5	0	--	0	--	6	--	--	0	--
8014.5	8281.2	0	--	0	--	10	--	--	0	--
8281.2	8351.7	0	--	0	--	12	--	--	6	--
8351.7	8522.2	0	--	0	--	12	--	--	10	--
8522.2	8644.1	8	--	0	--	12	--	--	12	--
8644.1	8907.2	0	--	0	--	8	--	--	--	--
8907.2	9358.5	--	--	6	--	0	--	--	--	--
9358.5	9676.2	--	--	12	--	4	--	--	--	--
9676.2	10062.0	--	--	--	--	0	--	--	--	--
10062.0	10498.7	--	--	--	--	8	--	--	--	--
10498.7	11885.9	--	--	--	--	--	--	--	--	--
11885.9	12119.9	0	--	--	--	--	--	--	--	--

Table 4-308. LS1 Control Blade Position Cycle 8
Control Blade Configuration in Notches Withdrawn

			Control Blade Group Number or Region Number							
		(J, I) =	30,31	38,31	46,31	54,31	38,23	46,23	54,23	46,15
MWd/MTU			9A	10A	9C	10C	9B	10B	9E	9D
0.0	-	89.8	20	36	0	--	12	24	--	--
89.8	-	190.6	20	36	0	--	0	18	--	--

Figure 4-7. Not Used.
Figure 4-8. Not Used.

Table 4-309. LS1 Step Lengths for SAS2H Depletion Calculations

Cycle	Range of EFPD	Relative DP or SP	Steps in DP or SP	Step Length (EFPD)
4	000.00 – 208.56	1	3	69.52
4	208.56 – 375.32	2	3	55.59
5	000.00 – 239.48	1	4	59.87
5	239.48 – 467.14	2	4	56.92
6	000.00 – 196.09	1	3	65.36
6	196.09 – 316.01	2	2	59.96
7	000.00 – 193.20	1	3	64.40
7	193.20 – 306.75	2	2	56.78
7	306.75 – 495.23	3	3	62.83
8	000.00 – 3.67	1	1	3.67

Table 4-309 summarizes the 'step length' in EFPD for SAS2H depletion calculations. Table 4-310 through 4-316 summarizes the control blade insertion history statement for each 'step' and specifies the nodes exposed to a blade. It specifies the top and bottom node seeing a blade. If any assembly is exposed to a blade, the blade insertion starts with the bottom node (node 1) and continues "up" the assembly until the required number of exposed nodes are "bladed". The node is identified as seeing a blade if the actual node is exposed to a blade more than one-half of the total step EFPD. If the blade exposure is equal or less than half, the step is considered as non-bladed. The control blade insertion is modeled in the burnup calculations for those assemblies where blades are inserted for more than ½ of the total step EFPD.

Description of the data given in Tables 4-310 through 4-316 is provided in the following paragraph. This example table uses information from assembly C1 to describe the control blade insertion history statement syntax. This description applies to all of the history statements for bladed fuel assemblies.

Example Assembly: C1
Bladed Cycle: 6
Number of Irradiation Steps: 3

Relative Cycle Blade is Inserted	Relative DP or SP in a Cycle	Relative Step Number	Nodes Exposed to Control Blade Bottom Node	Nodes Exposed to Control Blade Top Node	SAS2H Material Identifier
collapsed					11
2	1	1	1	3	11
2	1	2	1	2	11
2	1	3	1	2	11
non-collapsed					
2	1	1	1	6	
2	1	2	1	5	11
2	1	3	1	4	11

Table 4-310. LS1 File Control Blade History for "A" Assemblies

ASSEMBLY: A1
BLADED CYCLE: 5
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
0 : Number of irradiation steps with CRB inserted
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
0 : Number of irradiation steps with CRB inserted

ASSEMBLY: A3
BLADED CYCLE: 6
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
3 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 6 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 1 2 1 6 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 1 3 1 7 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
3 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 18 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 1 2 1 18 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 1 3 1 19 11 : Insertion history statement

ASSEMBLY: A5
BLADED CYCLE: 6
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 2 1 1 6 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 2 1 1 17 11 : Insertion history statement

ASSEMBLY: A6
BLADED CYCLE: 5
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
0 : Number of irradiation steps with CRB inserted
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
0 : Number of irradiation steps with CRB inserted

ASSEMBLY: A8
BLADED CYCLE:6
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 2 1 1 6 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 2 1 1 17 11 : Insertion history statement

ASSEMBLY: A11
BLADED CYCLE:6
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 2 1 1 6 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 2 1 1 17 11 : Insertion history statement

ASSEMBLY: A12
BLADED CYCLE:5
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
0 : Number of irradiation steps with CRB inserted
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
0 : Number of irradiation steps with CRB inserted

Table 4-311. LS1 Control Blade History for "B" Assemblies

ASSEMBLY: B1
BLADED CYCLE:6
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
2 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 2 1 1 7 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 2 2 1 6 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
2 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 2 1 1 19 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 2 2 1 18 11 : Insertion history statement

ASSEMBLY: B2
BLADED CYCLE:6
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
3 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 3 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 1 2 1 2 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 1 3 1 3 11 : Insertion history statement

```
************************************************
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
 3                  : Number of irradiation steps with CRB inserted
 1                  : Number of axial sections with CRB inserted in step
 3  1  1  1  6 11   : Insertion history statement
 1                  : Number of axial sections with CRB inserted in step
 3  1  2  1  5 11   : Insertion history statement
 1                  : Number of axial sections with CRB inserted in step
 3  1  3  1  9 11   : Insertion history statement
```

ASSEMBLY: B5

```
BLADED CYCLE:6
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
 5                  : Number of irradiation steps with CRB inserted
 1                  : Number of axial sections with CRB inserted in step
 3  1  1  1  7 11   : Insertion history statement
 1                  : Number of axial sections with CRB inserted in step
 3  1  2  1  7 11   : Insertion history statement
 1                  : Number of axial sections with CRB inserted in step
 3  1  3  1  9 11   : Insertion history statement
 1                  : Number of axial sections with CRB inserted in step
 3  2  1  1  2 11   : Insertion history statement
 1                  : Number of axial sections with CRB inserted in step
 3  2  2  1  9 11   : Insertion history statement
************************************************
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
 5                  : Number of irradiation steps with CRB inserted
 1                  : Number of axial sections with CRB inserted in step
 3  1  1  1 20 11   : Insertion history statement
 1                  : Number of axial sections with CRB inserted in step
 3  1  2  1 19 11   : Insertion history statement
 1                  : Number of axial sections with CRB inserted in step
 3  1  3  1 24 11   : Insertion history statement
 1                  : Number of axial sections with CRB inserted in step
 3  2  1  1  5 11   : Insertion history statement
 1                  : Number of axial sections with CRB inserted in step
 3  2  2  1 24 11   : Insertion history statement
```

ASSEMBLY: B6

```
BLADED CYCLE:  6
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
 3                  : Number of irradiation steps with CRB inserted
 1                  : Number of axial sections with CRB inserted in step
 3  1  1  1  3 11   : Insertion history statement
 1                  : Number of axial sections with CRB inserted in step
 3  1  3  1  4 11   : Insertion history statement
 1                  : Number of axial sections with CRB inserted in step
 3  2  2  1  9 11   : Insertion history statement
************************************************
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
 3                  : Number of irradiation steps with CRB inserted
 1                  : Number of axial sections with CRB inserted in step
 3  1  1  1  6 11   : Insertion history statement
 1                  : Number of axial sections with CRB inserted in step
 3  1  3  1 12 11   : Insertion history statement
 1                  : Number of axial sections with CRB inserted in step
 3  2  2  1 24 11   : Insertion history statement
```

ASSEMBLY: B10
BLADED CYCLE: 6
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
5 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 7 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 1 2 1 7 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 1 3 1 9 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 2 1 1 2 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 2 2 1 9 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
5 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 20 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 1 2 1 19 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 1 3 1 24 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 2 1 1 5 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 2 2 1 24 11 : Insertion history statement

Table 4-312. LS1 Control Blade History for "C" Assemblies

ASSEMBLY: C1
BLADED CYCLE: 6
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
3 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
2 1 1 1 3 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 1 2 1 2 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 1 3 1 2 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
3 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
2 1 1 1 6 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 1 2 1 5 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 1 3 1 4 11 : Insertion history statement

ASSEMBLY: C2
BLADED CYCLE: 6
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
0 : Number of irradiation steps with CRB inserted
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
0 : Number of irradiation steps with CRB inserted

ASSEMBLY: C2

BLADED CYCLE: 7

SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):

```
 6                : Number of irradiation steps with CRB inserted
1                 : Number of axial sections with CRB inserted in step
 3 1 1 1 3 11     : Insertion history statement
1                 : Number of axial sections with CRB inserted in step
 3 1 2 1 3 11     : Insertion history statement
1                 : Number of axial sections with CRB inserted in step
 3 1 3 1 4 11     : Insertion history statement
1                 : Number of axial sections with CRB inserted in step
 3 2 1 1 7 11     : Insertion history statement
1                 : Number of axial sections with CRB inserted in step
 3 2 2 1 9 11     : Insertion history statement
1                 : Number of axial sections with CRB inserted in step
 3 3 1 1 7 11     : Insertion history statement
**************************************************
```

SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):

```
 6                : Number of irradiation steps with CRB inserted
1                 : Number of axial sections with CRB inserted in step
 3 1 1 1 9 11     : Insertion history statement
1                 : Number of axial sections with CRB inserted in step
 3 1 2 1 9 11     : Insertion history statement
1                 : Number of axial sections with CRB inserted in step
 3 1 3 1 12 11    : Insertion history statement
1                 : Number of axial sections with CRB inserted in step
 3 2 1 1 20 11    : Insertion history statement
1                 : Number of axial sections with CRB inserted in step
 3 2 2 1 24 11    : Insertion history statement
1                 : Number of axial sections with CRB inserted in step
 3 3 1 1 20 11    : Insertion history statement
```

ASSEMBLY: C5

BLADED CYCLE: 7

SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):

```
 4                : Number of irradiation steps with CRB inserted
1                 : Number of axial sections with CRB inserted in step
 3 1 1 1 9 11     : Insertion history statement
1                 : Number of axial sections with CRB inserted in step
 3 1 2 1 9 11     : Insertion history statement
1                 : Number of axial sections with CRB inserted in step
 3 1 3 1 8 11     : Insertion history statement
1                 : Number of axial sections with CRB inserted in step
 3 2 2 1 4 11     : Insertion history statement
**************************************************
```

SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):

```
 4                : Number of irradiation steps with CRB inserted
1                 : Number of axial sections with CRB inserted in step
 3 1 1 1 24 11    : Insertion history statement
1                 : Number of axial sections with CRB inserted in step
 3 1 2 1 24 11    : Insertion history statement
1                 : Number of axial sections with CRB inserted in step
 3 1 3 1 22 11    : Insertion history statement
1                 : Number of axial sections with CRB inserted in step
 3 2 2 1 12 11    : Insertion history statement
```

ASSEMBLY: C6

BLADED CYCLE: 7

SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):

```
 0                : Number of irradiation steps with CRB inserted
```

```
************************************************
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
 0                  : Number of irradiation steps with CRB inserted

ASSEMBLY:     C7
BLADED CYCLE:   6
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
 1                  : Number of irradiation steps with CRB inserted
1                   : Number of axial sections with CRB inserted in step
 2 2 1 1 6 11    : Insertion history statement
************************************************
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
 1                  : Number of irradiation steps with CRB inserted
1                   : Number of axial sections with CRB inserted in step
 2 2 1 1 17 11   : Insertion history statement
ASSEMBLY:     C7
BLADED CYCLE:   7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
 0                  : Number of irradiation steps with CRB inserted
************************************************
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
 0                  : Number of irradiation steps with CRB inserted

ASSEMBLY:     C9
BLADED CYCLE:   7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
 0                  : Number of irradiation steps with CRB inserted
************************************************
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
 0                  : Number of irradiation steps with CRB inserted

ASSEMBLY:     C10
BLADED CYCLE:   7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
 5                  : Number of irradiation steps with CRB inserted
1                   : Number of axial sections with CRB inserted in step
 3 1 3 1 5 11    : Insertion history statement
1                   : Number of axial sections with CRB inserted in step
 3 2 1 1 7 11    : Insertion history statement
1                   : Number of axial sections with CRB inserted in step
 3 2 2 1 7 11    : Insertion history statement
1                   : Number of axial sections with CRB inserted in step
 3 3 1 1 7 11    : Insertion history statement
1                   : Number of axial sections with CRB inserted in step
 3 3 2 1 8 11    : Insertion history statement
************************************************
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
 5                  : Number of irradiation steps with CRB inserted
1                   : Number of axial sections with CRB inserted in step
 3 1 3 1 14 11   : Insertion history statement
1                   : Number of axial sections with CRB inserted in step
 3 2 1 1 21 11   : Insertion history statement
1                   : Number of axial sections with CRB inserted in step
 3 2 2 1 21 11   : Insertion history statement
1                   : Number of axial sections with CRB inserted in step
 3 3 1 1 19 11   : Insertion history statement
1                   : Number of axial sections with CRB inserted in step
 3 3 2 1 22 11   : Insertion history statement
```

ASSEMBLY: C11
BLADED CYCLE: 6
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
5 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
2 1 1 1 7 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 1 2 1 2 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 1 3 1 9 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 2 1 1 2 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 2 2 1 2 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
5 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
2 1 1 1 20 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 1 2 1 5 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 1 3 1 24 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 2 1 1 5 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 2 2 1 5 11 : Insertion history statement

ASSEMBLY: C13
BLADED CYCLE: 6
****
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
3 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
2 1 1 1 3 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 1 2 1 2 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 1 3 1 2 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
3 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
2 1 1 1 6 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 1 2 1 5 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 1 3 1 5 11 : Insertion history statement

ASSEMBLY: C15
BLADED CYCLE: 7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
5 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 7 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 1 2 1 7 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 1 3 1 9 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step

```
 3 2 1 1 5 11    : Insertion history statement
1                : Number of axial sections with CRB inserted in step
 3 2 2 1 5 11    : Insertion history statement
**************************************************
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
 5               : Number of irradiation steps with CRB inserted
1                : Number of axial sections with CRB inserted in step
 3 1 1 1 19 11   : Insertion history statement
1                : Number of axial sections with CRB inserted in step
 3 1 2 1 19 11   : Insertion history statement
1                : Number of axial sections with CRB inserted in step
 3 1 3 1 24 11   : Insertion history statement
1                : Number of axial sections with CRB inserted in step
 3 2 1 1 14 11   : Insertion history statement
1                : Number of axial sections with CRB inserted in step
 3 2 2 1 15 11   : Insertion history statement
```

ASSEMBLY: C16

```
BLADED CYCLE:  7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
 0               : Number of irradiation steps with CRB inserted
**************************************************
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
0                : Number of irradiation steps with CRB inserted
```

ASSEMBLY: C17

```
BLADED CYCLE:  6
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
 0               : Number of irradiation steps with CRB inserted
**************************************************
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
 0               : Number of irradiation steps with CRB inserted
```

ASSEMBLY: C17

```
BLADED CYCLE:  7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
 3               : Number of irradiation steps with CRB inserted
1                : Number of axial sections with CRB inserted in step
 3 2 1 1 9 11    : Insertion history statement
1                : Number of axial sections with CRB inserted in step
 3 2 2 1 9 11    : Insertion history statement
1                : Number of axial sections with CRB inserted in step
 3 3 1 1 9 11    : Insertion history statement
**************************************************
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
 3               : Number of irradiation steps with CRB inserted
1                : Number of axial sections with CRB inserted in step
 3 2 1 1 24 11   : Insertion history statement
1                : Number of axial sections with CRB inserted in step
 3 2 2 1 24 11   : Insertion history statement
1                : Number of axial sections with CRB inserted in step
 3 3 1 1 24 11   : Insertion history statement
```

ASSEMBLY: C18

```
BLADED CYCLE:  7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
 5               : Number of irradiation steps with CRB inserted
1                : Number of axial sections with CRB inserted in step
 3 1 3 1 5 11    : Insertion history statement
1                : Number of axial sections with CRB inserted in step
```

```
 3 2 1 1 7 11   : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 2 2 1 7 11   : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 3 1 1 7 11   : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 3 2 1 8 11   : Insertion history statement
************************************************
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
 5              : Number of irradiation steps with CRB inserted
1               : Number of axial sections with CRB inserted in step
 3 1 3 1 14 11  : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 2 1 1 21 11  : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 2 2 1 21 11  : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 3 1 1 19 11  : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 3 2 1 22 11  : Insertion history statement
```

ASSEMBLY: C19

```
BLADED CYCLE:  7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
 4              : Number of irradiation steps with CRB inserted
1               : Number of axial sections with CRB inserted in step
 3 1 1 1 9 11   : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 1 2 1 9 11   : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 1 3 1 8 11   : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 2 2 1 4 11   : Insertion history statement
************************************************
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
 4              : Number of irradiation steps with CRB inserted
1               : Number of axial sections with CRB inserted in step
 3 1 1 1 24 11  : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 1 2 1 24 11  : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 1 3 1 22 11  : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 2 2 1 12 11  : Insertion history statement
```

ASSEMBLY: C20

```
BLADED CYCLE:  7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
 5              : Number of irradiation steps with CRB inserted
1               : Number of axial sections with CRB inserted in step
 3 1 3 1 4 11   : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 2 1 1 9 11   : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 2 2 1 9 11   : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 3 1 1 9 11   : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 3 2 1 6 11   : Insertion history statement
************************************************
```

SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
5 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 3 1 12 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 2 1 1 24 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 2 2 1 24 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 3 1 1 24 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 3 2 1 16 11 : Insertion history statement

ASSEMBLY: C21
BLADED CYCLE: 6
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
0 : Number of irradiation steps with CRB inserted
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
0 : Number of irradiation steps with CRB inserted

ASSEMBLY: C22
BLADED CYCLE: 7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
6 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 3 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 1 2 1 3 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 1 3 1 4 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 2 1 1 7 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 2 2 1 9 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 3 1 1 7 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
6 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 9 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 1 2 1 9 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 1 3 1 12 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 2 1 1 20 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 2 2 1 24 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 3 1 1 19 11 : Insertion history statement

ASSEMBLY: C24
BLADED CYCLE: 7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
5 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 7 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step

```
 3 1 2 1 6 11   : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 1 3 1 9 11   : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 2 1 1 5 11   : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 2 2 1 5 11   : Insertion history statement
**************************************************
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
 5              : Number of irradiation steps with CRB inserted
1               : Number of axial sections with CRB inserted in step
 3 1 1 1 19 11  : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 1 2 1 18 11  : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 1 3 1 24 11  : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 2 1 1 14 11  : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 2 2 1 15 11  : Insertion history statement
```

ASSEMBLY: C25

```
BLADED CYCLE:  7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
 5              : Number of irradiation steps with CRB inserted
1               : Number of axial sections with CRB inserted in step
 3 1 3 1 4 11   : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 2 1 1 9 11   : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 2 2 1 9 11   : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 3 1 1 9 11   : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 3 2 1 5 11   : Insertion history statement
**************************************************
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
 5              : Number of irradiation steps with CRB inserted
1               : Number of axial sections with CRB inserted in step
 3 1 3 1 12 11  : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 2 1 1 24 11  : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 2 2 1 24 11  : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 3 1 1 24 11  : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 3 3 2 1 14 11  : Insertion history statement
```

ASSEMBLY: C26

```
BLADED CYCLE:  6
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
 3              : Number of irradiation steps with CRB inserted
1               : Number of axial sections with CRB inserted in step
 2 1 1 1 6 11   : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 2 1 2 1 6 11   : Insertion history statement
1               : Number of axial sections with CRB inserted in step
 2 1 3 1 6 11   : Insertion history statement
**************************************************
```

SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
3 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
2 1 1 1 18 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 1 2 1 18 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 1 3 1 18 11 : Insertion history statement

ASSEMBLY: C28
BLADED CYCLE: 7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
6 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 3 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 1 2 1 3 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 1 3 1 4 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 2 1 1 7 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 2 2 1 9 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 3 1 1 7 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
6 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 9 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 1 2 1 9 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 1 3 1 12 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 2 1 1 20 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 2 2 1 24 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
3 3 1 1 19 11 : Insertion history statement

ASSEMBLY: C29
BLADED CYCLE: 6
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
2 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
2 2 1 1 6 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 2 2 1 6 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
2 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
2 2 1 1 18 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 2 2 1 18 11 : Insertion history statement

Table 4-313. LS1 Control Blade History for "D" Assemblies

ASSEMBLY: D2
BLADED CYCLE: 7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
0 : Number of irradiation steps with CRB inserted
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
0 : Number of irradiation steps with CRB inserted

ASSEMBLY: D2
BLADED CYCLE: 8
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 6 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 18 11 : Insertion history statement

ASSEMBLY: D3
BLADED CYCLE: 8
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 4 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 12 11 : Insertion history statement

ASSEMBLY: D4
BLADED CYCLE: 8
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 5 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 14 11 : Insertion history statement

ASSEMBLY: D5
BLADED CYCLE: 8
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 4 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 12 11 : Insertion history statement

ASSEMBLY: D7
BLADED CYCLE: 7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
2 2 2 1 4 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
2 2 2 1 12 11 : Insertion history statement

ASSEMBLY: D10
BLADED CYCLE: 6
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
0 : Number of irradiation steps with CRB inserted
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
0 : Number of irradiation steps with CRB inserted

ASSEMBLY: D11
BLADED CYCLE: 8
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 4 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 12 11 : Insertion history statement

ASSEMBLY: D12
BLADED CYCLE: 8
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 6 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 18 11 : Insertion history statement

ASSEMBLY: D13
BLADED CYCLE: 8
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 3 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 6 11 : Insertion history statement

ASSEMBLY: D14
BLADED CYCLE: 7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
0 : Number of irradiation steps with CRB inserted
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
0 : Number of irradiation steps with CRB inserted

ASSEMBLY: D14
BLADED CYCLE: 8
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 6 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 18 11 : Insertion history statement

ASSEMBLY: D15
BLADED CYCLE: 8
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 9 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
3 1 1 1 24 11 : Insertion history statement

ASSEMBLY: D16
BLADED CYCLE: 7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
5 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
2 1 1 1 3 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 1 2 1 3 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 2 1 1 7 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 2 2 1 7 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 3 1 1 7 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
5 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
2 1 1 1 8 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 1 2 1 9 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 2 1 1 19 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 2 2 1 20 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 3 1 1 19 11 : Insertion history statement

ASSEMBLY: D17
BLADED CYCLE: 7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
0 : Number of irradiation steps with CRB inserted
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
0 : Number of irradiation steps with CRB inserted

ASSEMBLY: D21
BLADED CYCLE: 7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
5 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
2 1 1 1 7 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 1 2 1 6 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 1 3 1 9 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 2 1 1 5 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 2 2 1 5 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
5 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
2 1 1 1 19 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 1 2 1 19 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 1 3 1 24 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 2 1 1 14 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 2 2 1 15 11 : Insertion history statement

Table 4-314. LS1 Control Blade History for "E" Assemblies

ASSEMBLY: E1
BLADED CYCLE: 7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
5 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
2 1 1 1 7 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 1 2 1 6 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 1 3 1 9 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 2 1 1 5 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step
2 2 2 1 5 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
5 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
2 1 1 1 19 11 : Insertion history statement
1 : Number of axial sections with CRB inserted in step

```
 2  1  2  1 16 11   : Insertion history statement
 1                   : Number of axial sections with CRB inserted in step
 2  1  3  1 24 11   : Insertion history statement
 1                   : Number of axial sections with CRB inserted in step
 2  2  1  1 14 11   : Insertion history statement
 1                   : Number of axial sections with CRB inserted in step
 2  2  2  1 15 11   : Insertion history statement
```

ASSEMBLY: E2

```
BLADED CYCLE:  8
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
 1                   : Number of irradiation steps with CRB inserted
 1                   : Number of axial sections with CRB inserted in step
 3  1  1  1  4 11   : Insertion history statement
**************************************************
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
 1                   : Number of irradiation steps with CRB inserted
 1                   : Number of axial sections with CRB inserted in step
 3  1  1  1 12 11   : Insertion history statement
```

ASSEMBLY: E4

```
BLADED CYCLE:  8
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
 1                   : Number of irradiation steps with CRB inserted
 1                   : Number of axial sections with CRB inserted in step
 3  1  1  1  4 11   : Insertion history statement
**************************************************
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
 1                   : Number of irradiation steps with CRB inserted
 1                   : Number of axial sections with CRB inserted in step
 3  1  1  1 12 11   : Insertion history statement
```

ASSEMBLY: E6

```
BLADED CYCLE:  8
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
 1                   : Number of irradiation steps with CRB inserted
 1                   : Number of axial sections with CRB inserted in step
 3  1  1  1  3 11   : Insertion history statement
**************************************************
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
 1                   : Number of irradiation steps with CRB inserted
 1                   : Number of axial sections with CRB inserted in step
 3  1  1  1  6 11   : Insertion history statement
```

ASSEMBLY: E9

```
BLADED CYCLE:  8
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
 1                   : Number of irradiation steps with CRB inserted
 1                   : Number of axial sections with CRB inserted in step
 3  1  1  1  9 11   : Insertion history statement
**************************************************
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
 1                   : Number of irradiation steps with CRB inserted
 1                   : Number of axial sections with CRB inserted in step
 3  1  1  1 24 11      : Insertion history statement
```

ASSEMBLY: E12

```
BLADED CYCLE:  7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
 5                   : Number of irradiation steps with CRB inserted
```

```
1                   : Number of axial sections with CRB inserted in step
 2 1 3 1 5 11       : Insertion history statement
1                   : Number of axial sections with CRB inserted in step
 2 2 1 1 7 11       : Insertion history statement
1                   : Number of axial sections with CRB inserted in step
 2 2 2 1 7 11       : Insertion history statement
1                   : Number of axial sections with CRB inserted in step
 2 3 1 1 6 11       : Insertion history statement
1                   : Number of axial sections with CRB inserted in step
 2 3 2 1 8 11       : Insertion history statement
**************************************************
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
 5                  : Number of irradiation steps with CRB inserted
1                   : Number of axial sections with CRB inserted in step
 2 1 3 1 14 11      : Insertion history statement
1                   : Number of axial sections with CRB inserted in step
 2 2 1 1 21 11      : Insertion history statement
1                   : Number of axial sections with CRB inserted in step
 2 2 2 1 21 11      : Insertion history statement
1                   : Number of axial sections with CRB inserted in step
 2 3 1 1 18 11      : Insertion history statement
1                   : Number of axial sections with CRB inserted in step
 2 3 2 1 22 11      : Insertion history statement
```

Table 4-315. LS1 Control Blade History for "F" Assemblies

ASSEMBLY: F1

```
BLADED CYCLE:   7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
 2                  : Number of irradiation steps with CRB inserted
1                   : Number of axial sections with CRB inserted in step
 1 2 1 1 4 11       : Insertion history statement
1                   : Number of axial sections with CRB inserted in step
 1 2 2 1 4 11       : Insertion history statement
**************************************************
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
 2                  : Number of irradiation steps with CRB inserted
1                   : Number of axial sections with CRB inserted in step
 1 2 1 1 12 11      : Insertion history statement
1                   : Number of axial sections with CRB inserted in step
 1 2 2 1 12 11      : Insertion history statement
```

ASSEMBLY: F18

```
BLADED CYCLE:   7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
 2                  : Number of irradiation steps with CRB inserted
1                   : Number of axial sections with CRB inserted in step
 1 2 1 1 4 11       : Insertion history statement
1                   : Number of axial sections with CRB inserted in step
 1 2 2 1 4 11       : Insertion history statement
**************************************************
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
 2                  : Number of irradiation steps with CRB inserted
1                   : Number of axial sections with CRB inserted in step
 1 2 1 1 12 11      : Insertion history statement
1                   : Number of axial sections with CRB inserted in step
 1 2 2 1 12 11      : Insertion history statement
```

Table 4-316. LS1 Control Blade History for "G" Assemblies

ASSEMBLY: G1
BLADED CYCLE: 8
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
2 1 1 1 6 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
2 1 1 1 18 11 : Insertion history statement

ASSEMBLY: G3
BLADED CYCLE: 8
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
2 1 1 1 4 11 : Insertion history statement
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
1 : Number of irradiation steps with CRB inserted
1 : Number of axial sections with CRB inserted in step
2 1 1 1 12 11 : Insertion history statement

ASSEMBLY: G9
BLADED CYCLE: 7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
0 : Number of irradiation steps with CRB inserted
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
0 : Number of irradiation steps with CRB inserted

ASSEMBLY: G13
BLADED CYCLE: 7
SPACE INPUT-CRB INSERTION SECTION (COLLAPSED):
0 : Number of irradiation steps with CRB inserted
****
SPACE INPUT-CRB INSERTION SECTION (UNCOLLAPSED):
0 : Number of irradiation steps with CRB inserted

4.3 STATEPOINT CRITICAL CONDITION MEASUREMENTS

Measured critical conditions for 5 reactor startups (statepoints) are provided in Table 4-317. The data includes the BOC of Cycle 7 and two restarts during Cycle 7, and the BOC for Cycle 8 and one restart during Cycle 8. The cycle and statepoint number, the EFPDs during the cycle for which the startup occurred, and the elapsed time since reactor was shutdown, are provided for each statepoint. Figures 4-9 through 4-13 provide the blade positions for each statepoint when criticality was achieved.

Table 4-317. LS1 Statepoint Criticality Data

Point	Criticality Date (m-d-y)	Exposure (MWd/MTU)	EFPD	Down Time (h)	k_{eff}	Moderator Temperature (°F)	Period (s)
Cycle 7							
SP7	06-24-94	0.00	0.00	3024	1.00584	134.6	147
SP8	02-14-95	4728.4	193.20	120	1.00519	205.0	166
SP9	06-17-95	7507.28	306.75	140	1.00875	221.4	420
Cycle 8							
SP10	04-21-96	0.00	0.00	2064	1.00605	156.8	130
SP11	05-16-96	89.8	3.67	120	1.00574	172.4	327

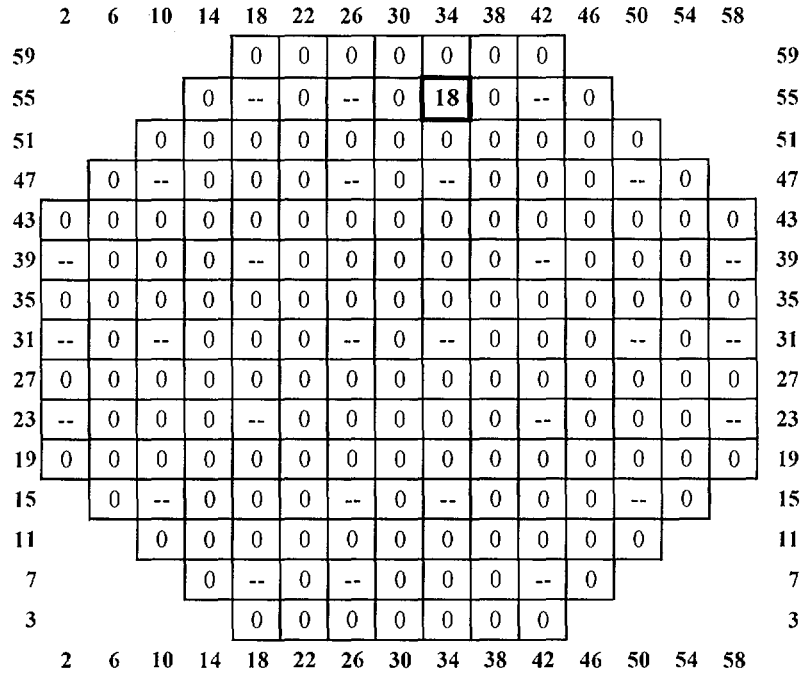

Figure 4-9. LS1 SP7 Criticality Control Blade Configuration in Notches Withdrawn (Cycle 7, 0.00 MWd/MTU)

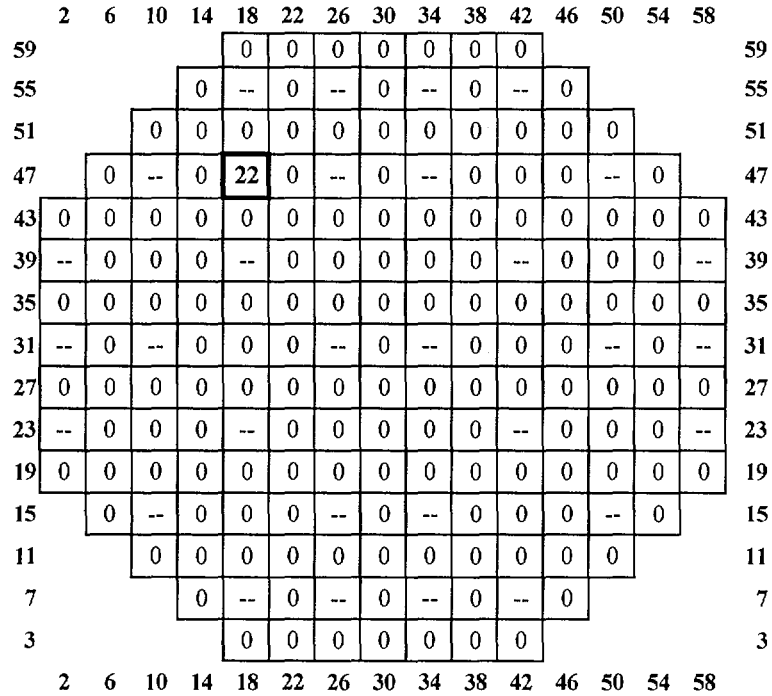

Figure 4-10. LS1 SP8 Criticality Control Blade Configuration in Notches Withdrawn (Cycle 7, 4728.36 MWd/MTU)

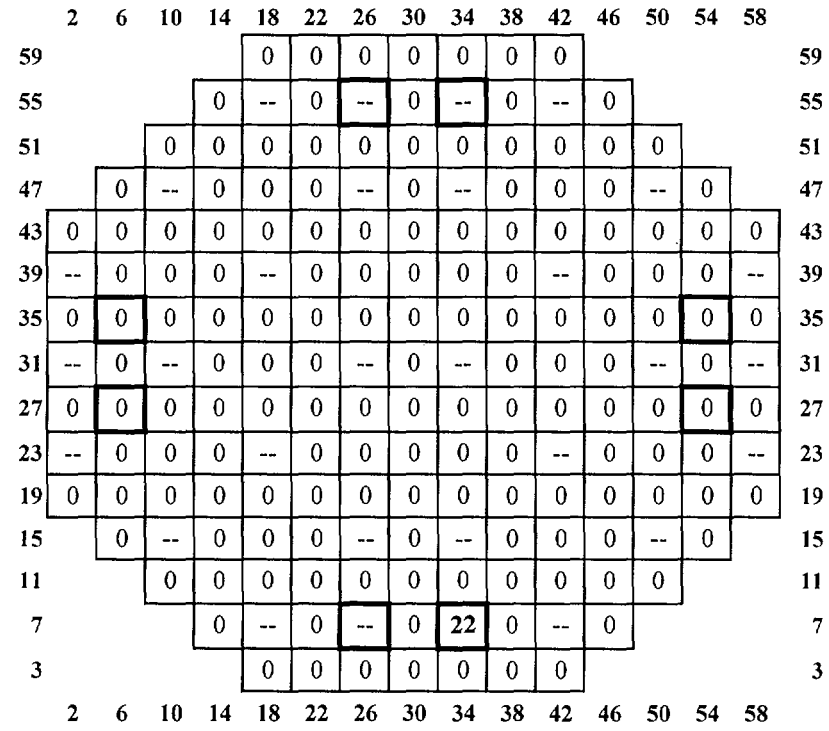

Figure 4-11. LS1 SP9 Criticality Control Blade Configuration in Notches Withdrawn (Cycle 7, 7507.3 MWd/MTU)

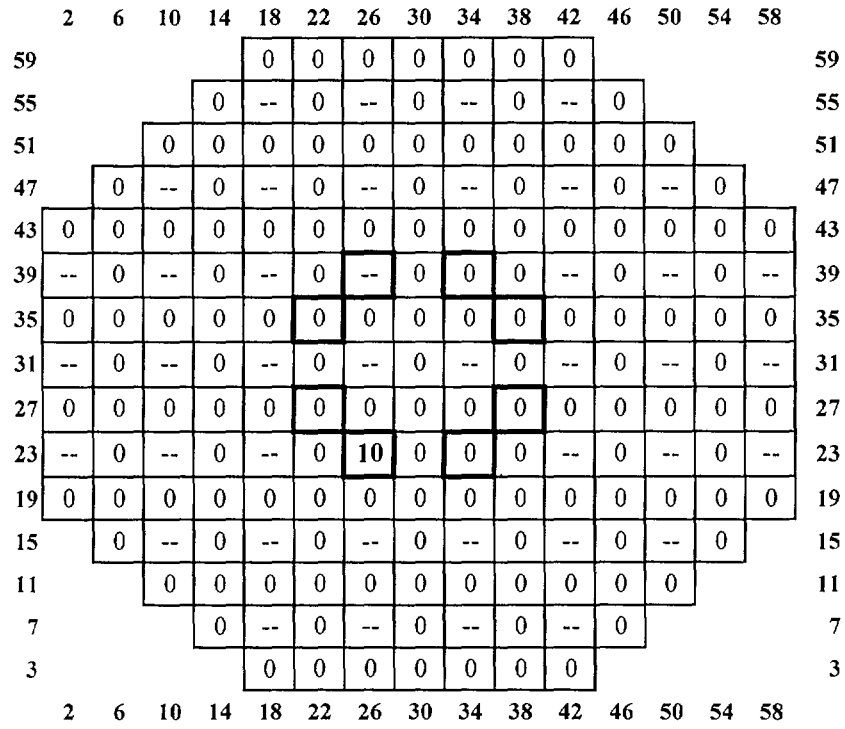

Figure 4-12. LS1 SP10 Criticality Control Blade Configuration in Notches Withdrawn (Cycle 8, 0.00 MWd/MTU)

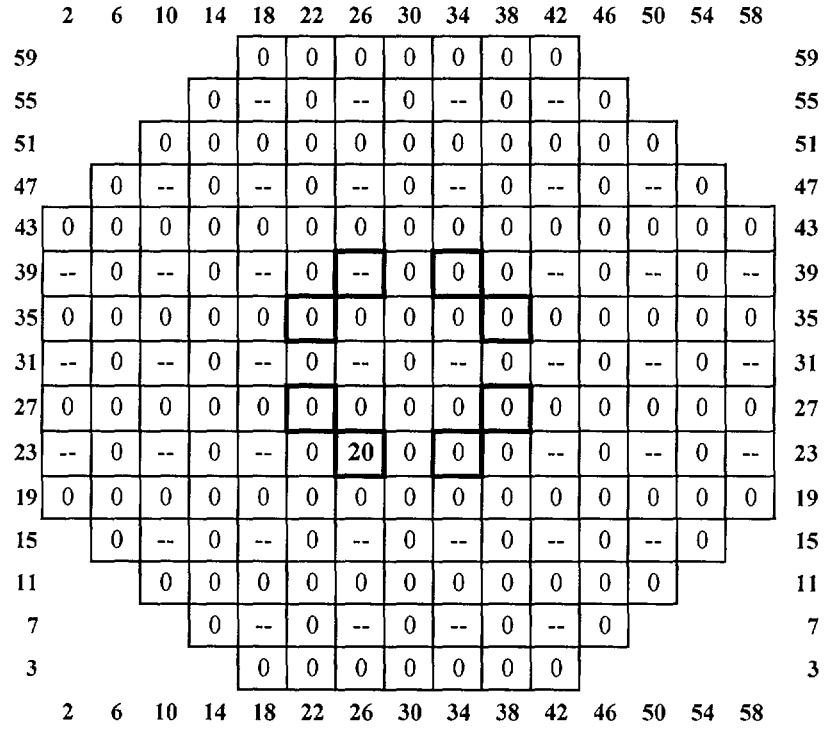

Figure 4-13. LS1 SP11 Criticality Control Blade Configuration in Notches Withdrawn (Cycle 8, 89.8 MWd/MTU)

5. CONCLUSIONS

This summary report contains the detailed information necessary to perform CRC analyses for the LaSalle Unit 1 reactor. CRC analyses based on the data contained in this report may be used to develop parts of the disposal criticality analysis methodology. The data reported herein has been identified with TBV-1349. Release of the TBV governing this data is required prior to its use in quality affecting activities and for use in analyses affecting procurement, construction, or fabrication.

6. REFERENCES

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