

**FINAL OUTLINES FOR THE
CLINTON POWER STATION INITIAL EXAMINATION –
AUGUST 2007**

Facility: <u>Clinton</u>		Date of Examination: <u>08/13/07</u>
Examination Level: RO <input checked="" type="checkbox"/> SRO <input type="checkbox"/>		Operating Test Number: <u>ILT0601-1</u>
Administrative Topic (See Note)	Type Code*	Describe activity to be performed
Conduct of Operations	S, N	Print Reading / G2.1.24 RO 2.8 Given a report of a tripped 480V breaker and a failure of any alarms, determine which annunciator should have alarmed.
Conduct of Operations	S, M	Perform Surveillance 9820.01 Power Distribution Limits with two thermal limits out of spec. / G2.1.33 RO 3.4
Equipment Control	S, D	Calculate Reactor Coolant Leakage per the surveillance procedure/ G2.2.12 RO 3.0
Radiation Control	D	Respond to an Alarming Dosimeter during the inplant walk through / G2.3.10 RO 2.9
Emergency Plan		
NOTE: All items (5 total) are required for SROs. RO applicants require only 4 items unless they are retaking only the administrative topics, when 5 are required.		
* Type Codes & Criteria: <ul style="list-style-type: none"> (C)ontrol room, (S)imulator, or Class(R)oom (D)irect from bank (≤ 3 for ROs; ≤ 4 for SROs & RO retakes) (N)ew or (M)odified from bank (≥ 1) (P)revious 2 exams (≤ 1; randomly selected) 		

Facility: Clinton

Date of Examination: 08/13/07

Examination Level: RO SRO

Operating Test Number: ILT0601-1

Administrative Topic (See Note)	Type Code*	Describe activity to be performed
Conduct of Operations	S, N	Print Reading / G2.1.24 SRO 3.1 Given a report of a tripped 480V breaker and a failure of any alarms, determine which annunciator should have alarmed.
Conduct of Operations	R, D	Review Surveillance 9820.01 Power Distribution Limits, one thermal limit is out of spec / G2.1.12 SRO 4.0
Equipment Control	R, D	Review surveillance for Reactor Coolant Leakage and recognize entry condition to Reactor Coolant leakage off-Normal / G2.2.12 SRO 3.4
Radiation Control	R, D	Respond to an Alarming Dosimeter during inplant walk through / G2.3.10 SRO 3.3
Emergency Plan	R, N	EAL Determination G2.4.41 SRO 4.1

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 (C)ontrol room, (S)imulator, or Class(R)oom
 (D)irect from bank (≤ 3 for ROs; ≤ 4 for SROs & RO retakes)
 (N)ew or (M)odified from bank (≥ 1)
 (P)revious 2 exams (≤ 1; randomly selected)

Facility: <u>Clinton</u>	Date of Examination: <u>08/13/07</u>
Exam Level: RO <input checked="" type="checkbox"/> SRO-I <input type="checkbox"/> SRO-U <input type="checkbox"/>	Operating Test Number: <u>ILT0601-1</u>

Control Room Systems[@] (8 for RO); (7 for SRO-I); (2 or 3 for SRO-U, including 1 ESF)

System / JPM Title	Type Code*	Safety Function
a. 211000A4.06 / Initiate SLC, RWCU Fails to Isolate	A, D, E, S	1
b. 209002A4.02 / Swap HPCS Suction, Storage Tank suction valve fails to auto close	A, D, S	2
c. 239001A4.02 / Control Reactor pressure using Steam Line Drains	D, S, L	3
d. 217000A4.01 / Shutdown RCIC Initiation Signal Clear	D, S	4
e. 219000A4.01 / Place RHR A in Suppression Pool Cooling, the RHR pump trips	A, D, S	5
f. 201005A4.03 / Use Alt Methods to Determine Rod Position	C, D, E, L	7
g. 300000A4.01 / Restore ADS Air Supply to Normal Source, normal source does not maintain pressure	A, N, S	8
h. 288000A4.01 / Startup CCP, auto fails must start manually	A, N, S	9

In-Plant Systems[@] (3 for RO); (3 for SRO-I); (3 or 2 for SRO-U)

i. 264000G2.1.30 / Reset A DG After Overspeed	D, R	6
j. 295028EA1.03 / Reset Shunt Trips to Restore Drywell Cooling	D, E, R	5
k. 295037EA1.03 / Defeating ARI Logic Trips	D, E	7

[@] All RO and SRO-I control room (and in-plant) systems must be different and serve different safety functions; all 5 SRO-U systems must serve different safety functions; in-plant systems and functions may overlap those tested in the control room.

*Type Codes	Criteria for RO / SRO-I / SRO-U
(A)lternate path	4-6 / 4-6 / 2-3
(C)ontrol room	
(D)irect from bank	≤ 9 / ≤ 8 / ≤ 4
(E)mergency or abnormal in-plant	≥ 1 / ≥ 1 / ≥ 1
(L)ow-Power / Shutdown	≥ 1 / ≥ 1 / ≥ 1
(N)ew or (M)odified from bank including 1(A)	≥ 2 / ≥ 2 / ≥ 1
(P)revious 2 exams	≤ 3 / ≤ 3 / ≤ 2 (randomly selected)
(R)CA	≥ 1 / ≥ 1 / ≥ 1
(S)imulator	

Facility: Clinton Date of Examination: 08/13/07
 Exam Level: RO SRO-I SRO-U Operating Test Number: ILT0601-1

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a. 211000A4.06 / Initiate SLC, RWCU Fails to Isolate	A, D, E, S	1
b. 209002A4.02 / Swap HPCS Suction, Storage Tank suction valve fails to auto close	A, D, S	2
c. 239001A4.02 / Control Reactor pressure using Steam Line Drains	D, S, L	3
d. 217000A4.01 / Shutdown RCIC Initiation Signal Clear	D, S	4
e. 219000A4.01 / Place RHR A in Suppression Pool Cooling, the RHR pump trips	A, D, S	5
f.		
g. 300000A4.01 / Restore ADS Air Supply to Normal Source, normal source does not maintain pressure	A, N, S	8
h. 288000A4.01 / Startup CCP, auto fails must start manually	A, N, S	9

In-Plant Systems[@] (3 for RO); (3 for SRO-I); (3 or 2 for SRO-U)

i. 264000G2.1.30 / Reset A DG After Overspeed	D, R	6
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(L)ow-Power / Shutdown	≥ 1 / ≥ 1 / ≥ 1
(N)ew or (M)odified from bank including 1(A)	≥ 2 / ≥ 2 / ≥ 1
(P)revious 2 exams	≤ 3 / ≤ 3 / ≤ 2 (randomly selected)
(R)CA	≥ 1 / ≥ 1 / ≥ 1
(S)imulator	

Facility: <u>Clinton</u>	Date of Examination: <u>08/13/07</u>
Exam Level: RO <input type="checkbox"/> SRO-I <input type="checkbox"/> SRO-U <input checked="" type="checkbox"/>	Operating Test Number: <u>ILT0601-1</u>

Control Room Systems[®] (8 for RO); (7 for SRO-I); (2 or 3 for SRO-U, including 1 ESF)

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a. 211000A4.06 / Initiate SLC, RWCU Fails to Isolate	A, D, E, S	1
b.		
c. 239001A4.02 / Control Reactor pressure using Steam Line Drains	D, S, L	3
d.		
e.		
f.		
g. 300000A4.01 / Restore ADS Air Supply to Normal Source, normal source does not maintain pressure (ESF)	A, N, S	8
h.		

In-Plant Systems[®] (3 for RO); (3 for SRO-I); (3 or 2 for SRO-U)

i.		
j. 295028EA1.03 / Reset Shunt Trips to Restore Drywell Cooling	D, E, R	5
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(A)ternate path	4-6 / 4-6 / 2-3
(C)ontrol room	
(D)irect from bank	≤ 9 / ≤ 8 / ≤ 4
(E)mergency or abnormal in-plant	≥ 1 / ≥ 1 / ≥ 1
(L)ow-Power / Shutdown	≥ 1 / ≥ 1 / ≥ 1
(N)ew or (M)odified from bank including 1(A)	≥ 2 / ≥ 2 / ≥ 1
(P)revious 2 exams	≤ 3 / ≤ 3 / ≤ 2 (randomly selected)
(R)CA	≥ 1 / ≥ 1 / ≥ 1
(S)imulator	

Facility Name: Clinton Power Station		Date of Exam: 08/13/2007																
Tier	Group	RO K/A Category Points											SRO-Only Points					
		K1	K2	K3	K4	K5	K6	A1	A2	A3	A4	G*	Total	A2	G*	Total		
1. Emergency & Abnormal Plant Evolutions	1	3	3	4	N/A			3	4	N/A			3	20	5	2	7	
	2	1	2	1	N/A			1	2	N/A			0	7	2	1	3	
	Tier Totals	4	5	5	N/A			4	6	N/A			3	27	7	3	10	
2. Plant Systems	1	3	3	2	1	2	3	2	2	3	3	2	26	3	2	5		
	2	1	1	1	2	1	1	1	1	1	1	1	12	0	3	3		
	Tier Totals	4	4	3	3	3	4	3	3	4	4	3	38	6	2	8		
3. Generic Knowledge and Abilities Categories					1	2	3	4					10	1	2	3	4	7
					2	3	2	3						2	2	1	2	

- Note:
- Ensure that at least two topics from every applicable K/A category are sampled within each tier of the RO and SRO-only outlines (i.e., except for one category in Tier 3 of the SRO-only outline, the "Tier Totals" in each K/A category shall not be less than two).
 - The point total for each group and tier in the proposed outline must match that specified in the table. The final point total for each group and tier may deviate by ±1 from that specified in the table based on NRC revisions. The final RO exam must total 75 points and the SRO-only exam must total 25 points.
 - Systems/evolutions within each group are identified on the associated outline; systems or evolutions that do not apply at the facility should be deleted and justified; operationally important, site-specific systems that are not included on the outline should be added. Refer to ES-401, Attachment 2, for guidance regarding the elimination of inappropriate K/A statements.
 - Select topics from as many systems and evolutions as possible; sample every system or evolution in the group before selecting a second topic for any system or evolution.
 - Absent a plant-specific priority, only those K/As having an importance rating (IR) of 2.5 or higher shall be selected. Use the RO and SRO ratings for the RO and SRO-only portions, respectively.
 - Select SRO topics for Tiers 1 and 2 from the shaded systems and K/A categories.
 - * The generic (G) K/As in Tiers 1 and 2 shall be selected from Section 2 of the K/A Catalog, but the topics must be relevant to the applicable evolution or system.
 - On the following pages, enter the K/A numbers, a brief description of each topic, the topics' importance ratings (IRs) for the applicable license level, and the point totals (#) for each system and category. Enter the group and tier totals for each category in the table above; if fuel handling equipment is sampled in other than Category A2 or G* on the SRO-only exam, enter it on the left side of Column A2 for Tier 2, Group 2 (Note #1 does not apply). Use duplicate pages for RO and SRO-only exams.
 - For Tier 3, select topics from Section 2 of the K/A catalog, and enter the K/A numbers, descriptions, IRs, and point totals (#) on Form ES-401-3. Limit SRO selections to K/As that are linked to 10 CFR 55.43.

ES-401	BWR Examination Outline						Form ES-401-1		
Emergency and Abnormal Plant Evolutions - Tier 1/Group 1 (RO)									
E/APE # / Name / Safety Function	K 1	K 2	K 3	A 1	A 2	G	K/A Topic(s)	IR	#
295001 Partial or Complete Loss of Forced Core Flow Circulation / 1 & 4						01. 32	Ability to explain and apply system limits and precautions.	3.4	1
295003 Partial or Complete Loss of AC / 6			0 2				Selective tripping	2.9	1
295004 Partial or Total Loss of DC Pwr / 6		0 3					D.C. bus loads	3.3	1
295005 Main Turbine Generator Trip / 3					0 6		Feedwater temperature	2.6	1
295006 SCRAM / 1					0 2		Control rod position	4.3	1
295016 Control Room Abandonment / 7			0 3				Disabling control room controls	3.5	1
295018 Partial or Total Loss of CCW / 8					0 1		Component temperatures	3.3	1
295019 Partial or Total Loss of Inst. Air / 8			0 3				Service air isolations: Plant-Specific	3.2	1
295021 Loss of Shutdown Cooling / 4	0 2						Thermal stratification	3.3	1
295023 Refueling Acc / 8				0 4			Radiation monitoring equipment	3.4	1
295024 High Drywell Pressure / 5					0 8		Drywell radiation levels	3.6	1
295025 High Reactor Pressure / 3			0 6				Alternate rod insertion: Plant-Specific	4.2	1
295026 Suppression Pool High Water Temp. / 5				0 3			Temperature monitoring	3.9	1
295027 High Containment Temperature / 5	0 1						Equipment environmental qualifications: Mark-III	2.5	1
295028 High Drywell Temperature / 5						01. 33	Ability to recognize indications for system operating parameters which are entry-level conditions for technical specifications.	3.4	1
295030 Low Suppression Pool Wtr Lvl / 5	0 3						Heat capacity	3.8	1
295031 Reactor Low Water Level / 2		0 8					Automatic depressurization system	4.2	1
295037 SCRAM Condition Present and Power Above APRM Downscale or Unknown / 1		0 1					RPS	4.2	1
295038 High Off-site Release Rate / 8						01. 30	Ability to locate and operate components, including local controls.	3.9	1
600000 Plant Fire On Site / 8				0 8			Fire fighting equipment used on each class of fire	2.6	1
K/A Category Totals:	3	3	4	3	4	3	Group Point Total:		20

ES-401	BWR Examination Outline						Form ES-401-1	
Emergency and Abnormal Plant Evolutions - Tier 1/Group 2 (RO)								
E/APE # / Name / Safety Function	K 1	K 2	K 3	A 1	A 2	G	K/A Topic(s)	IR #
295002 Loss of Main Condenser Vac / 3								0
295007 High Reactor Pressure / 3								0
295008 High Reactor Water Level / 2				0 7			Main turbine; Plant Specific	3.4 1
295009 Low Reactor Water Level / 2								0
295010 High Drywell Pressure / 5								0
295011 High Containment Temp / 5								0
295012 High Drywell Temperature / 5								0
295013 High Suppression Pool Temp. / 5								0
295014 Inadvertent Reactivity Addition / 1								0
295015 Incomplete SCRAM / 1	0 1						Shutdown margin	3.6 1
295017 High Off-site Release Rate / 9					0 5		Meteorological data	2.5 1
295020 Inadvertent Cont. Isolation / 5 & 7		0 4					RWCU system	3.1 1
295022 Loss of CRD Pumps / 1								0
295029 High Suppression Pool Wtr Lvl / 5			0 1				Emergency depressurization	3.5 1
295032 High Secondary Containment Area Temperature / 5								0
295033 High Secondary Containment Area Radiation Levels / 9								0
295034 Secondary Containment Ventilation High Radiation / 9								0
295035 Secondary Containment High Differential Pressure / 5		0 3					Off-site release rate	3.3 1
295036 Secondary Containment High Sump/Area Water Level / 5								0
500000 High CTMT Hydrogen Conc. / 5					0 1		Hydrogen monitoring system availability	3.1 1
K/A Category Totals:	1	2	1	1	2	0	Group Point Total:	7

ES-401	BWR Examination Outline Plant Systems - Tier 2/Group 1 (RO)											Form ES-401-1		
System # / Name	K 1	K 2	K 3	K 4	K 5	K 6	A 1	A 2	A 3	A 4	G	K/A Topic(s)	IR	#
203000 RHR/LPCI Injection Mode						0 7					1 3	Plant air systems; Plant Specific; Suppression pool level/temperature	2.7; 3.9	2
205000 Shutdown Cooling					0 3							Heat removal mechanisms	2.8	1
206000 HPCI														0
207000 Isolation (Emergency) Condenser														0
209001 LPCS			0 3									Emergency generators	2.9	1
209002 HPCS						0 4						Reactor pressure: BWR 5, 6	3.3	1
211000 SLC								0 3	0 8			Explosive valves indicating lights; Plant Specific; System initiation; Plant Specific	3.8; 4.2	2
212000 RPS	0 3											Recirculation system	3.4	1
215003 IRM		0 1										IRM channels/detectors	2.5	1
215004 Source Range Monitor						0 4						Control rod block status	3.5	1
215005 APRM / LPRM		0 2									01, 28	APRM channels; Knowledge of the purpose and function of major system components and controls.	2.6; 3.2	2
217000 RCIC				0 7								Alternate supplies of water	3.6	1
218000 ADS								0 5				ADS initiation signals present	4.2	1
223002 PCIS/Nuclear Steam Supply Shutoff			0 8								01, 23	Reactor vessel temperature; Ability to perform specific system and integrated plant procedures during different modes of plant operation	3.4; 3.9	2
239002 SRVs					0 2							Air (Nitrogen) supply; Plant Specific	3.4	1
259002 Reactor Water Level Control	0 1									0 1		RPS; All individual component controllers in the manual mode	3.8; 3.8	2
261000 SGTS									0 1			System flow	3.2	1
262001 AC Electrical Distribution	0 1											Emergency generators (diesel)	3.8	1
262002 UPS (AC/DC)									0 1			Transfer from preferred to alternate source	2.8	1
263000 DC Electrical Distribution		0 1										Major D.C. loads	3.1	1
264000 EDGs				0 5								Paralleling A.C. power sources	3.4	1
300000 Instrument Air								0 1				Air dryer and filter malfunctions	2.9	1
400000 Component Cooling Water					0 7							Breakers, relays, and disconnects	2.7	1
														0
K/A Category Totals:	3	3	2	1	2	3	2	2	3	3	2	Group Point Total:		26

ES-401	BWR Examination Outline													Form ES-401-1	
	Plant Systems - Tier 2/Group 2 (RO)														
System # / Name	K 1	K 2	K 3	K 4	K 5	K 6	A 1	A 2	A 3	A 4	G	K/A Topic(s)	IR	#	
201001 CRD Hydraulic		0 1										Pumps	2.9	1	
201002 RMCS														0	
201003 Control Rod and Drive Mechanism				0 7								Maintaining the control rod at a given location	3.2	1	
201004 RSCS														0	
201005 RCIS														0	
201006 RWM														0	
202001 Recirculation														0	
202002 Recirculation Flow Control									0 1			MG sets	3.3	1	
204000 RWCU				0 2								Piping over-pressurization protection; Plant-Specific	2.7	1	
214000 RPIS	0 6											RCIS; Plant-Specific	3.4	1	
215001 Traversing In-core Probe														0	
215002 RBM														0	
216000 Nuclear Boiler Inst.														0	
219000 RHR/LPCI; Torus/Pool Cooling Mode														0	
223001 Primary CTMT and Aux.														0	
226001 RHR/LPCI; CTMT Spray Mode														0	
230000 RHR/LPCI; Torus/Pool Spray Mode														0	
233000 Fuel Pool Cooling/Cleanup														0	
234000 Fuel Handling Equipment														0	
239001 Main and Reheat Steam														0	
239003 MSIV Leakage Control														0	
241000 Reactor/Turbine Pressure Regulator								0 1				Turbine high vibration	2.8	1	
245000 Main Turbine Gen. / Aux.			0 8									Reactor/turbine pressure control system; Plant-Specific	3.7	1	
250000 Reactor Condensate						0 1						System flow	2.9	1	
259001 Reactor Feedwater														0	
268000 Radwaste														0	
271000 Offgas								0 1				Automatic system isolations	3.3	1	
272000 Radiation Monitoring				0 1								Hydrogen injection operator's effect on process radiation indicators; Plant-Specific	3.2	1	
286000 Fire Protection														0	
288000 Plant Ventilation														0	
290001 Secondary CTMT										04 50		Ability to verify system alarm setpoints and operate controls identified in the alarm response manual.	3.3	1	
290003 Control Room HVAC														0	
290002 Reactor Vessel Internals					0 7							RWCU	2.8	1	
K/A Category Totals:	1	1	1	2	1	1	1	1	1	1	1	Group Point Total		12	

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Emergency and Abnormal Plant Evolutions - Tier 1/Group 1 (SRO)									
E/APE # / Name / Safety Function	K 1	K 2	K 3	A 1	A 2	G	K/A Topic(s)	IR	#
295001 Partial or Complete Loss of Forced Core Flow Circulation / 1 & 4									0
295003 Partial or Complete Loss of AC / 6									0
295004 Partial or Total Loss of DC Pwr / 6									0
295005 Main Turbine Generator Trip / 3					0 3		Turbine valve position	3.1	1
295006 SCRAM / 1					0 3		Reactor water level	4.2	1
295016 Control Room Abandonment / 7					0 1		Reactor power	4.1	1
295018 Partial or Total Loss of CCW / 8									0
295019 Partial or Total Loss of Inst. Air / 8					0 1		Instrument air system pressure	3.6	1
295021 Loss of Shutdown Cooling / 4									0
295023 Refueling Acc / 8									0
295024 High Drywell Pressure / 5									0
295025 High Reactor Pressure / 3						02. 22	Knowledge of limiting conditions for operations and safety limits.	4.1	1
295026 Suppression Pool High Water Temp. / 5						01. 14	Knowledge of system status criteria which require the notification of plant personnel.	3.3	1
295027 High Containment Temperature / 5									0
295028 High Drywell Temperature / 5									0
295030 Low Suppression Pool Wtr Lvl / 5									0
295031 Reactor Low Water Level / 2					0 1		Reactor water level	4.6	1
295037 SCRAM Condition Present and Power Above APRM Downscale or Unknown / 1									0
295038 High Off-site Release Rate / 9									0
800000 Plant Fire On Site / 8									0
K/A Category Totals:	0	0	0	0	5	2	Group Point Total:		7

ES-401	BWR Examination Outline							Form ES-401-1	
Emergency and Abnormal Plant Evolutions - Tier 1/Group 2 (SRO)									
E/APE # / Name / Safety Function	K 1	K 2	K 3	A 1	A 2	G	K/A Topic(s)	IR	#
295002 Loss of Main Condenser Vac / 3									0
295007 High Reactor Pressure / 3					0 1		Reactor pressure	4.1	1
295008 High Reactor Water Level / 2									0
295009 Low Reactor Water Level / 2									0
295010 High Drywell Pressure / 5									0
295011 High Containment Temp / 5						04. 30	Knowledge of which events related to system operations/status should be reported to outside agencies.	3.6	1
295012 High Drywell Temperature / 5					0 1		Drywell temperature	3.9	1
295013 High Suppression Pool Temp. / 5									0
295014 Inadvertent Reactivity Addition / 1									0
295015 Incomplete SCRAM / 1									0
295017 High Off-site Release Rate / 9									0
295020 Inadvertent Cont. Isolation / 5 & 7									0
295022 Loss of CRD Pumps / 1									0
295029 High Suppression Pool Wtr Lvl / 5									0
295032 High Secondary Containment Area Temperature / 5									0
295033 High Secondary Containment Area Radiation Levels / 9									0
295034 Secondary Containment Ventilation High Radiation / 9									0
295035 Secondary Containment High Differential Pressure / 5									0
295036 Secondary Containment High Sump/Area Water Level / 5									0
500000 High CTMT Hydrogen Conc. / 5									0
K/A Category Totals:	0	0	0	0	2	1	Group Point Total:		3

ES-401	BWR Examination Outline											Form ES-401-1		
Plant Systems - Tier 2/Group 1 (SRO)														
System # / Name	K 1	K 2	K 3	K 4	K 5	K 6	A 1	A 2	A 3	A 4	G	K/A Topic(s)	IR	#
203000 RHR/LPCI Injection														0
205000 Shutdown Cooling Mode														0
206000 HPCI														0
207000 Isolation (Emergency) Condenser														0
209001 LPCS											04 30	Knowledge of which events related to system operations/trip should be reported to outside agencies.	3.6	1
209002 HPCS														0
211000 SLC														0
212000 RPS														0
215003 IRM								0 1				Power supply degraded	3.2	1
215004 Source Range Monitor														0
215005 APRM / LPRM														0
217000 RCIC								0 5				D.C. power loss	3.3	1
218000 ADS														0
223002 PCIS/Nuclear Steam Supply Shutoff											02 22	Knowledge of limiting conditions for operations and safety limits.	4.1	1
230002 SRVs														0
259002 Reactor Water Level Control														0
261000 SGTS														0
262001 AC Electrical Distribution								0 5				Bus grounds	3.3	1
262002 UPS (AC/DC)														0
263000 DC Electrical Distribution														0
264000 EDGs														0
300000 Instrument Air														0
400000 Component Cooling Water														0
K/A Category Totals:	0	0	0	0	0	0	0	3	0	0	2	Group Point Total:		5

ES-401	BWR Examination Outline													Form ES-401-1	
Plant Systems - Tier 2/Group 2 (SRO)															
System # / Name	K	K	K	K	K	K	A	A	A	A	G	K/A Topic(s)		IR	#
	1	2	3	4	5	6	1	2	3	4					
201001 CRD Hydraulic															0
201002 RMCS															0
201003 Control Rod and Drive Mechanism															0
201004 RSCS															0
201005 RCIS															0
201006 RWM															0
202001 Recirculation															0
202002 Recirculation Flow Control															0
204000 RWCU															0
214000 RPIS								0	1			Failed reed switches	3.3	1	
215001 Traversing In-core Probe															0
215002 RBM															0
216000 Nuclear Boiler Inst.															0
219000 RHR/LPCI: Torus/Pool Cooling Mode															0
223001 Primary CTMT and Aux.															0
225001 RHR/LPCI: CTMT Spray Mode								1	3			High containment / drywell pressure	3.8	1	
230000 RHR/LPCI: Torus/Pool Spray Mode															0
233000 Fuel Pool Cooling/Cleanup								0	3			Low surge tank level/high level	3	1	
234000 Fuel Handling Equipment															0
239001 Main and Reheat Steam															0
239003 MSIV Leakage Control															0
241000 Reactor/Turbine Pressure Regulator															0
245000 Main Turbine Gen. / Aux.															0
256000 Reactor Condensate															0
259001 Reactor Feedwater															0
268000 Radwaste															0
271000 Offgas															0
272000 Radiation Monitoring															0
286000 Fire Protection															0
288000 Plant Ventilation															0
290001 Secondary CTMT															0
290003 Control Room HVAC															0
290002 Reactor Vessel Internals															0
K/A Category Totals:	0	0	0	0	0	0	0	3	0	0	0	Group Point Total			3

Facility Name: Clinton Power Station		Date of Exam: 08/13/2007		RO		SRO-Only	
Category	K/A #	Topic	IR	#	IR	#	
1. Conduct of Operations	2.1. 22	Ability to determine Mode of Operation.			3.3	1	
	2.1. 01	Knowledge of conduct of operations requirements.	3.7	1			
	2.1. 16	Ability to operate plant phone, paging system, and two-way radio.	2.9	1			
	2.1. 14	Knowledge of system status criteria which require the notification of plant personnel.			3.3	1	
	2.1.						
	2.1.						
	Subtotal				2		2
2. Equipment Control	2.2. 12	Knowledge of surveillance procedures.	3	1			
	2.2. 27	Knowledge of the refueling process.	2.6	1			
	2.2. 01	Ability to perform pre-startup procedures for the facility, including operating those controls associated with plant equipment that could affect reactivity.	3.7	1			
	2.2. 18	Knowledge of the process for managing maintenance activities during shutdown operations.			3.6	1	
	2.2. 23	Ability to track limiting conditions for operations.			3.8	1	
	2.2.						
Subtotal				3		2	
3. Radiation Control	2.3. 08	Knowledge of the process for performing a planned gaseous radioactive release.			3.2	1	
	2.3. 10	Ability to perform procedures to reduce excessive levels of radiation and guard against personnel exposure.	2.9	1			
	2.3. 02	Knowledge of facility ALARA program.	2.5	1			
	2.3.						
	2.3.						
	2.3.						
Subtotal				2		1	
4. Emergency Procedures / Plan	2.4. 32	Knowledge of operator response to loss of all annunciators.			3.5	1	
	2.4. 35	Knowledge of local auxiliary operator tasks during emergency operations including system geography and system implications.	3.3	1			
	2.4. 27	Knowledge of fire in the plant procedure.	3	1			
	2.4. 01	Knowledge of EOP entry conditions and immediate action steps.	4.3	1			
	2.4. 47	Ability to diagnose and recognize trends in an accurate and timely manner utilizing the appropriate control room reference material.			3.7	1	
	2.4.						
Subtotal				3		2	
Tier 3 Point Total					10		7