

August 31, 2006

Mr. Gary Van Middlesworth  
Vice-President  
Duane Arnold Energy Center  
3277 DAEC Road  
Palo, IA 52324-9785

SUBJECT: MID-CYCLE PERFORMANCE REVIEW AND INSPECTION PLAN -  
DUANE ARNOLD ENERGY CENTER

Dear Mr. Van Middlesworth

On August 7, 2006, the NRC staff completed its performance review of the Duane Arnold Energy Center for the first half of the calendar year 2006 assessment cycle. Our technical staff reviewed performance indicators (PIs) for the most recent quarter and inspection results over the previous 12 months. The purpose of this letter is to inform you of our assessment of your safety performance during this period and our plans for future inspections at your facility.

This performance review and enclosed inspection plan do not include physical protection information. A separate letter designated and marked as "Exempt from Public Disclosure in accordance with 10 CFR 2.390" will include the physical protection review and resultant inspection plan.

Plant performance for the most recent quarter at the Duane Arnold Energy Center was within the Licensee Response column of the NRC's Action Matrix, based on all inspection findings being classified as having very low safety significance (Green) and all PIs indicating performance at a level requiring no additional NRC oversight (Green). Therefore, we plan to conduct reactor oversight process (ROP) baseline inspections at your facility.

In our mid-cycle assessment letter dated August 30, 2005, (ML052420426), we advised you of a substantive cross-cutting issue in the area of human performance, involving inadequate procedure use and adherence. In our end-of-cycle assessment letter dated March 2, 2006, (ML060610458) we advised you of the continuation of this substantive cross-cutting issue. The mid-cycle assessment of this substantive cross-cutting issue included a review of inspection results over the 12-month period of July 1, 2005 to June 30, 2006. During this period, we observed improvement in the effectiveness of corrective action. We noted that you no longer meet the criteria for number of human performance findings during the assessment period, and that only one finding was identified in the last half of the assessment period having a human performance aspect. Based on the trends and the ongoing corrective actions that you implemented during the assessment period, we conclude that this cross-cutting issue is closed. We will continue to monitor your performance in this area during NRC baseline inspections.

The enclosed inspection plan details the inspections, less those related to physical protection scheduled through March 31, 2008. Significant inspections planned include a Triennial Fire Protection Inspection in September 2006, a Problem Identification and Resolution Inspection (PI&R) in April 2007, and a Component Design Basis Inspection in March 2008. The inspection plan is provided to allow for the resolution of any scheduling conflicts and personnel availability issues well in advance of inspector arrival onsite. Routine resident inspections are not listed due to their ongoing and continuous nature. The inspections in the last 9 months of the inspection plan are tentative and may be revised at the end-of-cycle review.

In accordance with 10 CFR 2.390 of the NRC's "Rules of Practice," a copy of this letter and its enclosure will be made available electronically for public inspection in the NRC Public Document Room or from the Publicly Available Records (PARS) component of NRC's document system (ADAMS), accessible from the NRC Web site at <http://www.nrc.gov/reading-rm/adams.html> (the Public Electronic Reading Room).

If circumstances arise which cause us to change the inspection plan, we will contact you to discuss the change as soon as possible. Please contact me at (630) 829-9629 with any questions you may have regarding this letter or the inspection plan.

Sincerely,

*/RA/*

Bruce Burgess, Chief  
Reactor Projects Branch 2  
Division of Reactor Projects

Docket No. 50-331  
License No. DPR-49

Enclosure:  
Duane Arnold Inspection/Activity Plan

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**Duane Arnold**  
**Inspection / Activity Plan**  
**09/01/2006 - 03/31/2008**

Unit Number	Inspection Activity	Title	No. of Staff on Site	Planned Dates Start	Planned Dates End	Inspection Type
	<b>FPI</b>	<b>- TRIENNIAL FIRE PROTECTION INSPECTION</b>	<b>4</b>			
1	IP 7111105T	Fire Protection [Triennial]		09/11/2006	09/29/2006	Baseline Inspections
	<b>71111.11</b>	<b>- LIC OPERATOR REQUAL PROGRAM EVALUATION</b>	<b>2</b>			
1	IP 7111111B	Licensed Operator Requalification Program		09/11/2006	09/15/2006	Baseline Inspections
	<b>71114</b>	<b>- BIENNIAL EP EXERCISE</b>	<b>1</b>			
1	IP 7111401	Exercise Evaluation		10/16/2006	10/20/2006	Baseline Inspections
1	IP 71151	Performance Indicator Verification		10/16/2006	10/20/2006	Baseline Inspections
	<b>BI</b>	<b>- ACCESS CONTROL AND PI VERIF</b>	<b>1</b>			
1	IP 7112101	Access Control to Radiologically Significant Areas		11/06/2006	11/17/2006	Baseline Inspections
1	IP 7112102	ALARA Planning and Controls		11/06/2006	11/17/2006	Baseline Inspections
1	IP 71151	Performance Indicator Verification		11/06/2006	11/17/2006	Baseline Inspections
	<b>7112102</b>	<b>- ALARA (OUTAGE) AND ACCESS CONTROL</b>	<b>1</b>			
1	IP 7112101	Access Control to Radiologically Significant Areas		02/12/2007	02/16/2007	Baseline Inspections
1	IP 7112102	ALARA Planning and Controls		02/12/2007	02/16/2007	Baseline Inspections
	<b>ISI</b>	<b>- ISI BASELINE INSPECTION</b>	<b>1</b>			
1	IP 7111111B	Licensed Operator Requalification Program		02/12/2007	02/16/2007	Baseline Inspections
	<b>PI&amp;R</b>	<b>- PI&amp;R BIENNIAL</b>	<b>3</b>			
1	IP 71152B	Identification and Resolution of Problems		04/02/2007	04/20/2007	Baseline Inspections
	<b>7112202</b>	<b>- RADWASTE &amp; TRANSPORTATION</b>	<b>1</b>			
1	IP 7112202	Radioactive Material Processing and Transportation		04/02/2007	04/06/2007	Baseline Inspections
	<b>HEATSINK</b>	<b>- HEAT SINK INSPECTION</b>	<b>1</b>			
1	IP 7111107B	Heat Sink Performance		04/23/2007	04/27/2007	Baseline Inspections
	<b>EP BI</b>	<b>- BASELINE EP INSPECTION</b>	<b>1</b>			
1	IP 7111402	Alert and Notification System Testing		07/09/2007	07/13/2007	Baseline Inspections
1	IP 7111403	Emergency Response Organization Augmentation Testing		07/09/2007	07/13/2007	Baseline Inspections
1	IP 7111405	Correction of Emergency Preparedness Weaknesses and Deficiencies		07/09/2007	07/13/2007	Baseline Inspections
1	IP 71151-EP01	Drill/Exercise Performance		07/09/2007	07/13/2007	Baseline Inspections
1	IP 71151-EP02	ERO Drill Participation		07/09/2007	07/13/2007	Baseline Inspections
1	IP 71151-EP03	Alert & Notification System		07/09/2007	07/13/2007	Baseline Inspections
	<b>MAINRULE</b>	<b>- MAINTENANCE RULE INSPECTION</b>	<b>1</b>			
1	IP 7111112B	Maintenance Effectiveness		08/06/2007	08/10/2007	Baseline Inspections
	<b>7112203</b>	<b>- REMP AND PI VERIFICATION</b>	<b>2</b>			
1	IP 7112203	Radiological Environmental Monitoring Program (REMP) And Radioactive Material Control P		09/10/2007	09/14/2007	Baseline Inspections
1	IP 71151	Performance Indicator Verification		09/10/2007	09/14/2007	Baseline Inspections

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				Start	End	
	<b>ISFSI</b>	<b>- ISFSI INSPECTION</b>	<b>1</b>			
1	IP 60855.1	Operation of an Independent Spent Fuel Storage Installation at Operating Plants		10/01/2007	10/05/2007	Other Routine
	<b>MOD5059</b>	<b>- MODIFICATIONS/50.59 INSPECTION</b>	<b>2</b>			
1	IP 7111102	Evaluation of Changes, Tests, or Experiments		10/01/2007	10/19/2007	Baseline Inspections
1	IP 7111117B	Permanent Plant Modifications		10/01/2007	10/19/2007	Baseline Inspections
	<b>7112101</b>	<b>- ACCESS CONTROL, ALARA &amp; PI VERIFICATION</b>	<b>1</b>			
1	IP 7112101	Access Control to Radiologically Significant Areas		10/29/2007	11/02/2007	Baseline Inspections
1	IP 7112102	ALARA Planning and Controls		10/29/2007	11/02/2007	Baseline Inspections
1	IP 71151	Performance Indicator Verification		10/29/2007	11/02/2007	Baseline Inspections
	<b>FY 2008</b>	<b>- DUANE ARNOLD INIT PREP 11/2007</b>	<b>3</b>			
1	W90144	OL - INITIAL EXAM - DUANE ARNOLD - NOV/DEC 2007		11/26/2007	11/30/2007	Not Applicable
	<b>FY 2008</b>	<b>- DUANE ARNOLD INIT EXAM 12/2007</b>	<b>3</b>			
1	W90144	OL - INITIAL EXAM - DUANE ARNOLD - NOV/DEC 2007		12/10/2007	12/14/2007	Not Applicable
	<b>CDBI</b>	<b>- COMPONENT DESIGN BASES INSPECTION</b>	<b>4</b>			
1	IP 7111121	Component Design Bases Inspection		03/03/2008	04/04/2008	Baseline Inspections