

**DWIGHT LOOK COLLEGE OF  
ENGINEERING**



Department of Nuclear Engineering

August 21, 2012

ATTN: Document Control Desk  
U.S. Nuclear Regulatory Commission  
Washington, DC 20555-0001

Docket No. 50-059

SUBJECT: 2012 Annual Report Facility License R-23

Enclosed please find the 2012 Annual Report for the Texas A&M AGN-201M Training Reactor, College Station, TX 77843. If you have any questions, please do not hesitate to contact me at: (979) 845-4161, or email at [y-haasan@tamu.edu](mailto:y-haasan@tamu.edu).

Sincerely,

A handwritten signature in black ink, appearing to read 'Yassin A. Hassan', written over a horizontal line.

Yassin A. Hassan  
Professor and Interim Department Head  
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ANNUAL OPERATING REPORT

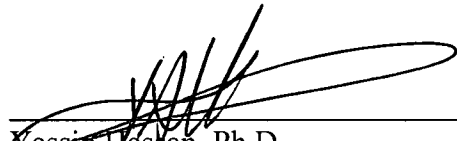
of the

TEXAS A&M UNIVERSITY AGN-201M TRAINING REACTOR

NRC LICENSE R-23

JUNE 1, 2011 – MAY 31, 2012

DEPARTMENT OF NUCLEAR ENGINEERING  
TEXAS A&M UNIVERSITY  
College Station, Texas 77843 - 3133

  
Cassin Hassan, Ph.D. 8-21-2012  
Interim Department Head Date

## 1. SUMMARY

This report is intended to detail the pertinent activities related to the Texas A&M University AGN-201M training facility operated by the Department of Nuclear Engineering during the period of 1 June 2011 until 31 May 2012. The contents of this report are intended to comply with the requirements of 10CFR50 section 50.59 and Section 6.9.1 of the Technical Specifications for this facility under license R-23.

The main function of this facility is to provide an operating nuclear system to be used in support of the requirements of Nuclear Engineering courses, as a research tool, and for operator training as well as preventive maintenance. During this reporting period, the AGN-201M reactor was only operated on a limited basis while submitting and awaiting approval of License Amendment No. 14. Additionally, the facility added another reactor operator and one senior reactor operator. Since August 2010 the AGN-201M has been performing its main function with the addition of student workers who have received SRO and/or RO licenses.

## 2. OPERATIONAL SUMMARY

<u>Total Hours Critical:</u>	7:57
<u>Total Watt Hours of Operation:</u>	10.91
<u>Average Power Level of Operations (Watts):</u>	1.48E00
<u>Number of Reactor Startups:</u>	17

### **3. UNSCHEDULED SHUTDOWNS**

**28 Mar. 2012:** Spurious SCRAM due to loose SCRAM circuit card. Upon locating cause of SCRAM, the circuit card was securely inserted into circuit board. No additional action required.

**29 Mar. 2012:** Spurious SCRAM due to loose SCRAM circuit card. Upon locating cause of SCRAM, the circuit card was securely inserted into circuit board. No additional action required.

### **4. MAJOR SAFETY RELATED CORRECTIVE MAINTENANCE**

No major safety related corrective maintenance was performed during this reporting period.

### **5. (a) FACILITY CHANGES**

No significant changes to the facility were made during this reporting period.

### **(b) CHANGES TO PLANS AND PROCEDURES**

No changes to plans or procedures were made during this reporting period.

### **(c) NEW EXPERIMENTS OR TESTS**

No new experiments or tests were performed during this reporting period.

### **6. SUMMARY OF SAFETY EVALUATIONS**

No changes, tests or experiments were performed during this reporting period, which meet the criteria of 10CFR50 paragraph 50.59 requiring a safety evaluation.

**7. SUMMARY OF RADIOACTIVE EFFLUENTS RELEASED**

No liquid or solid radioactive were released during this reporting period.

**8. ENVIRONMENTAL RADIOLOGICAL SURVEYS**

No environmental radiological surveys were performed outside this facility during this reporting period.

**9. RADIATION EXPOSURE**

During calendar year 2011 all of the exposures were reported to be less than 0.100 rem or no measurable dose.