



16-October-2020

Project Number: 99902080

US Nuclear Regulatory Commission  
ATTN: Document Control Desk  
Washington, D.C. 20555-0001

**SUBJECT:           ATOMIC ALCHEMY VERSATILE ISOTOPE PRODUCTION REACTOR  
QUALITY ASSURANCE PROGRAM DESCRIPTION**

ENCLOSURES:       1) AAO-VIPR-20-QAPD(NP) Rev 0, Atomic Alchemy Inc. Topical  
Report: Quality Assurance Program Description (QAPD)  
2) Basis for Submittal of the QAPD as a Topical Report

Atomic Alchemy intends to apply for a Class 103 construction permit in accordance with 10 CFR Part 50 (hereinafter 10CFR50) for a Non-Power Production or Utilization Facility (NPUF). In preparation for the application submittal, Atomic Alchemy is hereby submitting its Quality Assurance Program Description (QAPD) Topical Report for NRC review and approval which can be found in Enclosure 1. The bases for the exemption of Criterion B in section 4.2 of LIC-500 can be found in Enclosure 2.

In order to help increase the efficiency of the licensing process, Atomic Alchemy discussed the concept of an early topical report submittal of the QAPD with the NRC staff during a conference call on September 4<sup>th</sup>, 2020. The intent of this early submittal is to provide information regarding the Atomic Alchemy's QA approach to the facility design, procurement, construction, and operation to obtain early NRC review and opinions.

Commitments made by Atomic Alchemy in this topical report are identified in the QAPD, Part IV, Table 2.

If there are any questions or a need for additional information, please contact Mr. Michael Grochowski at [regulatory@atomicalchemy.us](mailto:regulatory@atomicalchemy.us).

Sincerely,

Thomas Eiden  
CEO, Atomic Alchemy Inc.

Cc:

Nuclear Regulatory Commission:

**William (Duke) Kennedy**, Project Manager

Non-Power Production and Utilization Facilities Licensing Branch

Division of Advanced Reactors and Non-Power Production and Utilization Facilities (NPUFs)

Office of Nuclear Reactor Regulation

**Greg Casto**, Branch Chief

Non-Power Production and Utilization Facilities Licensing Branch

Division of Advanced Reactors and Non-Power Production and Utilization Facilities (NPUFs)

Office of Nuclear Reactor Regulation

Atomic Alchemy Inc.

**Michael Grochowski**, Regulatory Affairs & Compliance Licensing Manager