



**UNITED STATES
NUCLEAR REGULATORY COMMISSION**
WASHINGTON, D.C. 20555-0001

**SAFETY EVALUATION REPORT
Docket No. 71-9390
Model No. OPTIMUS® - L Package
Certificate of Compliance No. 9390
Revision No. 1**

SUMMARY

By letter dated September 9, 2020 (Agencywide Documents Access and Management System {ADAMS} Accession No. ML20266G182), NAC International (NAC or the applicant) submitted an application for certificate of Compliance (CoC) No. 9390 for the Model No. OPTIMUS®-L package. The applicant then submitted a revised application “The OPTImal Modular Universal Shipping Cask Safety Analysis Report, Revision No. 0”, dated November 12, 2021 (ADAMS Accession No. ML21316A180) which superseded all previous submittals.

On December 16, 2021, the U.S. Nuclear Regulatory Commission staff issued Certificate of Compliance No. 9390, Revision No. 0, for the Model No. OPTIMUS-L package (Agencywide Documents Access and Management System Package Accession No. ML21344A047). On December 19, 2021, staff noted an inadvertent typographical error in Table 3 of the certificate and notified the applicant immediately.

EVALUATION

Condition No. 5(b)(2)(v) of the CoC included a Table that described sample maximum loading for key nuclides for a package centered on a trailer. In that Table, the Cf-252 activity limit per package configuration for the 1-inch SIA inside the CCV cavity was erroneously shown as 1.289×10^2 Ci while the correct number is 1.289×10^{-2} Ci. The staff noted this inadvertent typographical error in the CoC, as soon as the CoC was issued, while the corresponding SER did in fact correctly represent the activity limits, as shown below.

Table 3 - TRU Waste and IFW Activity Limits for Key Isotopes

Isotope	Activity Limits (Ci) per package configuration		
	No SIA inside the CCV cavity	1-inch SIA inside the CCV cavity	2¼-inch SIA inside the CCV cavity
Co-60	8.197×10^{-2}	1.632×10^{-1}	4.284×10^{-1}
Cs-137	2.527×10^2	1.299×10^3	9.245×10^3
Ba-137m	3.846×10^{-1}	1.018	3.995
Cf-252	1.217×10^{-2}	1.289×10^{-2}	1.469×10^{-2}
Cm-244	3.819×10^2	4.074×10^2	4.654×10^2

Staff corrected Table 3 in the CoC accordingly. Staff did not have to revise the SER issued for Revision No. 0 of the certificate.

CONDITIONS

The following change was made to the certificate:

Condition No, 5(b)(2)(v) includes the revised Table 3 with the corrected value of 1.289×10^{-2} Ci for Cf-252.

CONCLUSION

Based on the statements and representations in the application, the staff finds that the design has been adequately described and evaluated and that the Model No. OPTIMUS-L package meets the requirements of 10 CFR Part 71.

Issued with CoC No. 9390, Revision No. 1.