

August 28, 2008

Mr. Steven E. Sisley, Manager
Licensing/Regulatory Compliance
EnergySolutions Spent Fuel Division
2105 S. Bascom Ave., Suite 316
Campbell, CA 95008

SUBJECT: CERTIFICATE OF COMPLIANCE NO. 9320, REV. 1, FOR THE MODEL NO.
MIDUS PACKAGE

Dear Mr. Sisley:

As requested by your application dated June 20, 2008, enclosed is Certificate of Compliance No. 9320, Revision No. 1, for the Model No. MIDUS package. Changes made to the enclosed certificate are indicated by vertical lines in the margin. The staff's Safety Evaluation Report is also enclosed.

EnergySolutions Spent Fuel Division has been registered as the holder for this Certificate. The approval constitutes authority to use the package for shipment of radioactive material and for the package to be shipped in accordance with the provisions of 49 CFR 173.471.

If you have any questions regarding this certificate, please contact me or Nancy Osgood of my staff at (301) 492-3300.

Sincerely,

/RA/

Eric J. Benner, Chief
Licensing Branch
Division of Spent Fuel Storage and Transportation
Office of Nuclear Material Safety
and Safeguards

Docket No. 71-9320
TAC No. L24227

Enclosures: 1. Certificate of Compliance
No. 9320, Rev. No. 1
2. Safety Evaluation Report

cc w/encls: R. Boyle, Department of Transportation
J. Shuler, Department of Energy

August 28, 2008

Mr. Steven E. Sisley, Manager
Licensing/Regulatory Compliance
EnergySolutions Spent Fuel Division
2105 S. Bascom Ave., Suite 316
Campbell, CA 95008

SUBJECT: CERTIFICATE OF COMPLIANCE NO. 9320, REV. 1, FOR THE MODEL NO.
MIDUS PACKAGE

Dear Mr. Sisley:

As requested by your application dated June 20, 2008, enclosed is Certificate of Compliance No. 9320, Revision No. 1, for the Model No. MIDUS package. Changes made to the enclosed certificate are indicated by vertical lines in the margin. The staff's Safety Evaluation Report is also enclosed.

EnergySolutions Spent Fuel Division has been registered as the holder for this Certificate. The approval constitutes authority to use the package for shipment of radioactive material and for the package to be shipped in accordance with the provisions of 49 CFR 173.471.

If you have any questions regarding this certificate, please contact me or Nancy Osgood of my staff at (301) 492-3300.

Sincerely,

/RA/

Eric J. Benner, Chief
Licensing Branch
Division of Spent Fuel Storage and Transportation
Office of Nuclear Material Safety
and Safeguards

Docket No. 71-9320
TAC No. L24227

- Enclosures:
1. Certificate of Compliance No. 9320, Rev. No. 1
 2. Safety Evaluation Report

cc w/encls: R. Boyle, Department of Transportation
J. Shuler, Department of Energy

Distribution: (Closes L24227)

Filename: G:/SFST/PART 71 CASEWORK/9320.R1.doc and 9320.R1.LTR&SER.doc

OFC	SFST	E	SFST		SFST
NAME	NLOsgood		MRDeBose		EJBenner
DATE	08/27/08		08/28/08		08/28/08

C=Without attachment/enclosure E=With attachment/enclosure N=No copy **OFFICIAL RECORD COPY**

SAFETY EVALUATION REPORT
Docket No. 71-9320
Model No. MIDUS Package
Certificate of Compliance No. 9320
Revision No. 1

SUMMARY

By application dated June 20, 2008, EnergySolutions Spent Fuel Division requested an amendment to Certificate of Compliance No. 9320, for the Model No. MIDUS package. EnergySolutions requested changes to (1) the packaging description that would clarify certain dunnage may be used, and (2) changes in the periodic and maintenance leakage testing. EnergySolutions provided an updated application that incorporated the requested changes. The updated application supersedes in its entirety the previous revision of the application dated March 20, 2007.

The Certificate of Compliance has been revised as requested by the applicant. Based on the statements and representations in the application, the staff concluded that these changes do not affect the ability of the package to meet the requirements of 10 CFR Part 71.

EVALUATION

EnergySolutions provided an updated package application by letter dated June 20, 2008. The applicant also requested the following changes to the package:

- Optional use of polymeric dunnage between the cask assembly and the overpack to minimize scuffing and other wear.
- Modifications to the leakage test performed periodically and after certain maintenance activities, including containment seal replacement.

The applicant provided revised pages in the package application. The optional use of polymeric dunnage does not affect the package performance under normal or accident conditions, nor does it serve a safety function. The dunnage is intended to reduce scuffing and wear between the metal components of the cask assembly and the overpack. The optional use of this dunnage does not affect the safe performance of the package. Condition No. 6(a) of the certificate has been revised to clarify that polymeric dunnage may be placed in the space between the cask assembly and the overpack.

The applicant provided a revised Section 8.2.2, which describes the leakage tests performed periodically (at least annually) and after certain maintenance activities, including containment seal replacement. The revisions to the leakage test description are minor in nature, and address operational changes, including use of a reduced partial pressure of the helium in the cask cavity. The reduced partial pressure is considered when evaluating the measured leakage. This method is consistent with ANSI N14.5-1997, Leakage Tests on Packages for Shipment. The minimum test sensitivity and the acceptance standard (1×10^{-7} ref-cm³/s) for the tests were not changed. Based on this the staff agrees that the changes are acceptable.

CONCLUSIONS

The Certificate of Compliance has been amended as requested by the applicant. The certificate has been revised to reference the updated package application, which superseded the previous revision of the application. Condition No. 6(a) has been revised to clarify that polymeric dunnage may be placed in the space between the cask assembly and the overpack. Condition No. 8 has been added that allows use of the previous edition of the certificate for a period of approximately one year.

The staff agrees that these changes do not affect the ability of the package to meet the requirements of 10 CFR Part 71.

Issued with Certificate of Compliance No. 9320,
Revision No. 1, on August 28, 2008.