

71-3086



U.S. Department of Transportation
**Pipeline and Hazardous Materials
Safety Administration**

1200 New Jersey Avenue, SE
Washington, DC 20590

MAR 26 2014

Mark Lombard, Director
Division of Spent Fuel Storage and Transportation
Office of Nuclear Material Safety and Safeguards (NMSS)
U.S. Nuclear Regulatory Commission
11601 Landsdown Street
Mail Stop 3WFN-14-C28
North Bethesda, MD 20852

Dear Mr. Lombard:

In accordance with the Memorandum of Understanding between our agencies, I request that you review the enclosed Argentine Certificate of Approval No. RA-099-B(U)F-96, Revision 2, for the MG1 package and make a recommendation concerning our revalidation of the package for import and export use.

I am enclosing a disc with the files supplied by our applicant, Edlow International Company, supporting their request for revalidation.

I request you provide an estimate of the time needed to complete your review. If you have any questions or need any additional safety information, please feel free to contact Michael Conroy of my staff at (202) 366-3597 or via email at Michael.Conroy@dot.gov.

Sincerely,

A handwritten signature in black ink, appearing to read "Richard Boyle".

Richard Boyle
Sciences Branch
Division of Engineering and Research
Office of Hazardous Materials Safety

Enclosures

NMSS01



de: T.P. Silfria Susana Real

Traductora - Perito - Intérprete



-TRADUCCIONES BUENOS AIRES®-

Desde 1981



Suipacha 472, 8° P. Of. 813, Bs. As. Argentina. Telefax: 4326-0812

e-mail: tradbsas@ciudad.com.ar

silfriasusanareal@yahoo.com

SUSANA REAL
TORA PÚBLICA
INGLES
- F° 462, Cap. Fed.
C.T.P.C.B.A. N° 1552
C° 33 Prov. Bs. As.

-----TRADUCCIÓN PÚBLICA-----

[All of the characters, words, phrases, and sentences herein written in italics and between brackets, including this one, are the certified translator's own.]-----

[Heading] "2013 – The Year Paying Homage to the Bicentenary of the 1813 General Constituent Assembly" -----

ARN No. *[There follows a blank]* /13-----

THE NUCLEAR REGULATORY AUTHORITY *[In Spanish: "Autoridad Regulatoria Nuclear", abbreviation: "ARN"]*. UNDER THE AUTHORITY OF THE NATIONAL PRESIDENT'S OFFICE -----

[Foot] RA99B(U)F-96-R2. Effective date: 15/06/2012 -----

COMPETENT AUTHORITY'S APPROVAL CERTIFICATE -----

CONCERNING THE DESIGN OF B(U)-TYPE PACKAGE FOR FISSIONABLE SUBSTANCE CONTENTS, MODEL MG1 -----

RA/0099/B(U)F-96 (Revision 2) -----

It is hereby certified that the package, together its authorized radioactive contents, as described in paragraphs 4, 5, 6, and 7 below, complies with the regulatory requirements related to B(U)-Type Packages for fissionable substance contents set forth by AR 10.16.1 Standard, Revision 2, "Transportation of Radioactive Materials"¹, for its being transported by sea,

¹ "Regulations for the Safe Transport of Radioactive Materials", 2009 Edition, Collection of Safety Standards N° TS-R-1 from the International Atomic Energy Agency (IAEA).

land, and air .-----

1. COMPETENT AUTHORITY'S IDENTIFICATION MARK: -----

RA/0099/B(U)F-96 -----

2. ISSUANCE DATE: **August 12, 2013**-----

3. EXPIRATION DATE: **July 31, 2018**-----

4. PACKAGE IDENTIFICATION: -----

Model: **MG1**. Series Numbers: **01, 02, 03, 04, 05, 06, 07, and 08**.-----

5. PACKAGING DESCRIPTION: -----

The packaging is constituted by a cylindrical primary container. The walls of said container are two stainless steel plates with an intermediate insulating ceramics layer. The bases of such container are shut-down by means of two steel bolted covers. Different types of holding grids are fitted inside the cylinder, as appropriate to the type of contents to be transported. The aforesaid set is linked to an external cylindrical steel carcass. The ends of said carcass are shut-down with two types of steel bolted covers, according to the type of material to be transported.-----

The approximate external dimensions of the package are as follows: 2.90 m long and 0.90 m diameter. The gross mass of the package is of 744 kg. See attached graphs in Annex 1. -----

6. AUTHORIZED RADIOACTIVE CONTENTS: -----

The design of the package is authorized for the charge options as follows: -

6.1 MTR-type Non-irradiated combustible elements or MTR-type non-irradiated controlling elements, containing uranium as enriched up to 20% in U-235. The U-235 total mass should not be heavier than 2910 g. -----

RA/0099/B(U)-F-96
Revision 2
AR 10.16.1
Standard
Revision 2
"Transportation of Radioactive Materials"⁽¹⁾

6.2 Non-irradiated bar-type fuel elements containing uranium enriched up to 2.8%, in U-235. The U-235 total mass should not be heavier than 3880

g.-----

7. CRITICALITY SAFETY INDEX (CSI): -----

For both authorized radioactive contents, as indicated in paragraph 6 above, the CRITICALITY SAFETY INDEX (CSI) is equal to zero; CSI = 0.

RA/0099/B(U)-F-96 (Revision 2) ARN. Page 2 of 4 -----

8. SHIPPING AND MAINTENANCE: -----

8.1 The package should be inspected and maintained according to the INVAP S.E.'S Inspection and Maintenance Manual for MG1 Model Package, CDAD-1001-3MSGC-006-A, pursuant to AR 10.16.1 Standard, Revision 2, "Transportation of Radioactive Materials"⁽¹⁾. -----

8.2 The package should be prepared for its being transported by land, sea or air, according to INVAP S.E.'S Operation Manual for MG1 Model Package, CDAD-1001-3MSGC-005-B, and pursuant to AR 10.16.1 Standard, Revision 2, "Transportation of Radioactive Materials"⁽¹⁾. -----

8.3 With regard to each shipment, the sender should give the Nuclear Regulatory Authority notice of: a) the details of the pertinent shipment, at least 2 working days' in advance, by means of form F-TMR-09 Rev. 3 or such other form as may replace it, and b) any event or accident that might take place throughout the transportation. -----

8.4 The carrier should be appropriately knowledgeable on the instructions to follow in emergency cases. The carrier should hold, on board, Intervention file No. 127, as included in the applicable regulations. -----

9. QUALITY ASSURANCE-----

The package should be inspected, maintained, prepared for shipment and transported in compliance with INVAP S.E.'S Quality and Environmental Assurance Manual, CDAD-1001-3MSGC-001, INVAP S.E.'S pertinent quality assurance documents, and the applicable requirements derived from AR 10.16.1(1) Standard. -----

10. This certificate does not exempt the sender from complying with any requirement set forth by the Government of any country from/ through/whereto the package be transported. -----

11. This certificate is issued according to Section VIII, paragraphs 802, 808, 814, and 833 of AR 10.16.1 Standard, Revision 2, "Transportation of Radioactive Materials"⁽¹⁾, and as requested by INVAP S.E. from the Republic of Argentina. -----

NOTE: Revision 2 modifies Revision 1 with regard to packages series numbers 07 and 08, as included, modification of authorized radioactive contents, the ISC, and issue and expiration dates. -----

Revision 1 modifies the Original Version with regard to compliance with Revision 2 of AR 10.16.1 Standard, packages series numbers 02 to 06 as included, and issue and expiration dates. -----

Call System of Intervention in Radiological Emergencies (Sky Tel) TEL. 4597-9000 mentioning PIN number 1110886 -----

CERTIFIED BY: -----

SIGNATURE AND NAME: [There appears a signature below which is a seal reading as follows:] Eng. Hugo VICENS. Radiological, Safety and Safeguards Manager. -----

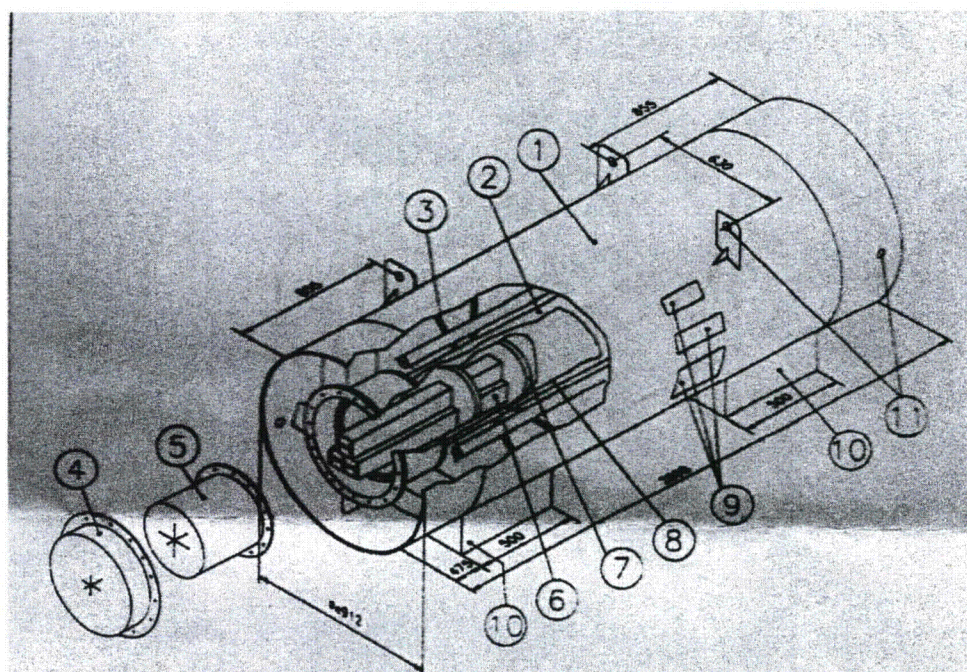
DATE: [Seal] August 12, 2013 -----

NUCLEAR REGULATORY AUTHORITY [AUTORIDAD REGULATORIA
NUCLEAR] (ARN). [Domicile] Av. Del Libertador 8250 - (1429) - Buenos
Aires – Republic of Argentina. TEL.: (54 11) 6323-1722/1708. FAX: (54 11)
6323-1771/1798-----

(1) "Regulations for the Safe Transport of Radioactive Materials", 2009 Edition,
Collection of Safety Standards N° TS-R-1 from the International Atomic Energy
Agency (IAEA). -----

ANNEX 1 -----

RA/0099/B(U)-F-96 (Revision 2) ARN. Page 3 of 4 -----

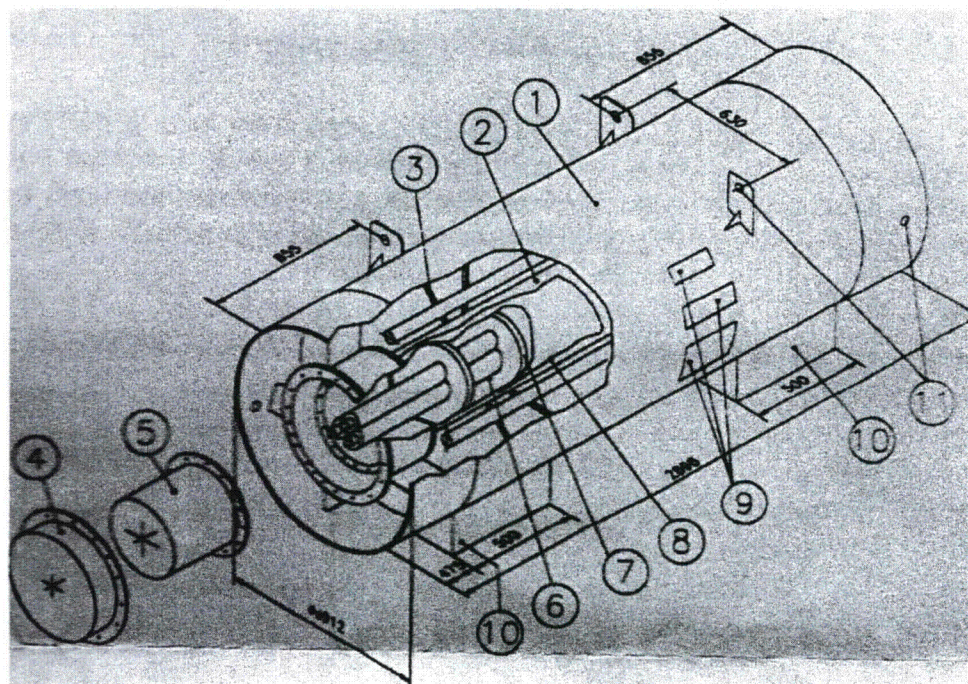


1. CONTAINER BODY-----
2. THERMAL SHIELDING -----
3. BODY REINFORCEMENTS (TRANSVERSAL PLATES AND
LONGITUDINAL PIPES)-----

4. EXTERNAL COVER (16 HEXAGONAL-HEAD SCREWS, M8X20).-----
5. INTERNAL COVER (16 HEXAGONAL-HEAD SCREWS, M8X20);-----
6. FUEL BAR OR CONTROL BAR, MTR TYPE -----
7. BAR SUPPORTS -----
8. INTERNAL CYLINDER -----
9. IDENTIFICATION, WARNING, DESIGN, AND CONSTRUCTION
 PLATES -----
10. SUPPORTING BASIS-----
11. PEEPHOLES-----

Name		Date	Signature	INVAP MG1
Projected by	R.A.G.	01.08.08	[There appears a signature]	
Drawn by	R.A.G.	01.08.08	[There appears a signature]	
Revised by	R.S.	06.08.08	[There appears a signature]	
Revised by				No.0908GU013ASIN025A
Approved by	J.C.O.	07.08.08	[There appears a signature]	
Scale 1: 5 (1:2.5)	MG1 B(U)F-TYPE FUELS MTR FUEL CONTAINER			Pattern document
				Replaces
				Replaced by
				Electronic file: 0908- GU01-3ASIN-025-A

RA/0099/B(U)-F-96 (Revision 2) ARN. Page 4 of 4-----

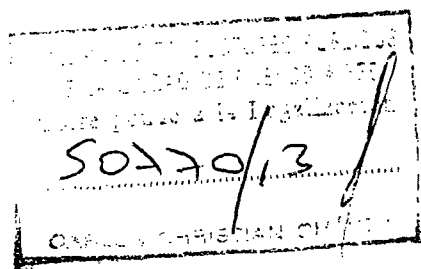


1. CONTAINER BODY-----
2. THERMAL SHIELDING -----
3. BODY REINFORCEMENTS (TRANSVERSAL PLATES AND
LONGITUDINAL PIPES)-----
4. EXTERNAL COVER (16 HEXAGONAL-HEAD SCREWS, M8X20). ----
5. INTERNAL COVER (16 HEXAGONAL-HEAD SCREWS, M8X20); ----
6. FUEL BAR OR CONTROL BAR, MTR TYPE -----
7. BAR SUPPORTS -----
8. INTERNAL CYLINDER -----
9. IDENTIFICATION, WARNING, DESIGN, AND CONSTRUCTION
PLATES -----
10. SUPPORTING BASIS -----
11. PEEPHOLES-----

Name		Date	Signature	INVAP
Projected by	R.A.G.	01.08.08	[There appears a	

			signature]	MG1
Drawn by	R.A.G.	01.08.08	[There appears a signature]	
Revised by	R.S.	06.08.08	[There appears a signature]	
Revised by				No.0908GU013ASIN026A
Approved by	J.C.O.	07.08.08	[There appears a signature]	
Scale 1: 5 (1:2.5)	MG1 TYPE B(U) FUEL MTR AND MR-5 FUELS CONTAINER			Pattern document
				Replaces
				Replaced by
				Electronic file: 0908- GU01-3ASIN-025-A

I HEREBY CERTIFY that this translation is a true and correct English version of the pertinent part of the attached document in Spanish. Buenos Aires, August 15, 2013. *[In Spanish only for authentication purposes:]* ES TRADUCCIÓN FIEL al idioma inglés de la parte pertinente del documento adjunto, redactada en idioma castellano, que he tenido a la vista y a la cual me remito en Buenos Aires a los 15 días de agosto de 2013.-----



SILVIA SUSANA REAL
TRADUCTORA PÚBLICA
INGLÉS
Mat. T° VII - F° 458. Cep. Fed.
Inscripción O.T.P.C.B.A. N° 1562
Mat. T° VIII F° 38. Prov. Bo. Ato.



173354 50770
16/08/2013