SUPERIOR INDUSTRIAL X-RAY	QUALITY ASSURANCE PROGRAM	SECTION 7	REV. NO
COMPANY		PAGE 1	OF 27
SIX	SHIPMENT OF RADIOACTIVE MATERIAL IN RADIOGRAPHIC EXPOSURE DEVICE	DATE July	10,1981
		O oto	Freme

1. SCOPE

Superior Industrial X-Ray Company pursuant to 10 CFR 71, is responsible for shipment of radiographic material in industrial radiographic devices.

2. ORGANIZATION

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PDR ADOCK 07100439

- a) The Radiation Protection Officer and the Quelity Assurance Manager are responsible for auditing and ensuring Quality Assurance Records are maintained.
- b) The Radiation Safety Training Instructor is responsible fo training and certification. (See Attachment A).
- c) Th radiographers are responsible for handling, storing and shipping of radioactive material in radiographic exposure devices.
- 3. QUALITY ASSURANCE PROGRAM
 - a) Radiographers are trained in their responsibilities according to Superior Industrial X-Ray Company's Operating and Emergency Procedures, Section II, Rev.2, 2.3.4.
 - b) The Quality Assurance Program will emphasize control of characteristics of the package critical to safety.
 - c) Manufacturer's Certificate of Compliance from the United States Nuclear Regulatory Commission will be maintained. These include Technical Operations, Model 533, 660 and 714 radiographic exposure devices. (See Attachments 5, C and D). Changers - (See Attachment E).
 - d) U.S.N.R.C. Certificate of Compliance for Technical Operations Model 650 source changer is also included. (See Attachment E).

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SUPERIOR INDUSTRIAL X-RAY	QUALITY ASSURANCE PROGRAM	SECTION 7	REV. NO
COMPANY		PAGE 2	OF 27
SIX)	SHIPMENT OF RADIOACTIVE MATERIAL IN RADIOGRAPHIC EXPOSURE DEVICE	DATE July 10,1981	
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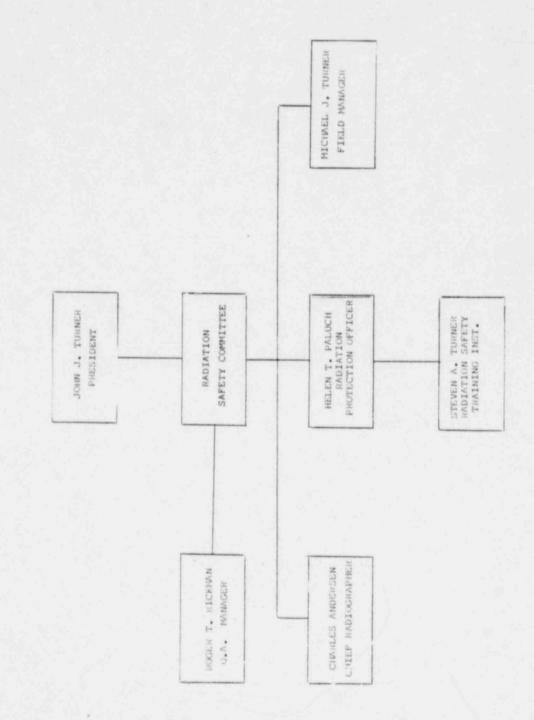
- 4. DOCUMENT CONTROL
 - a) The Chief Radiographer will control all quality related activities by written instructions as stated in the Superior Industrial X-Ray Company's Radioactive Materials Manual 2.3.3.
 - b) Packaging, shipping and handling instructions from the manufacturer will be maintained by the Chief Radiographer. The Chief Radiographer will also ensure that quality related activities are conducted with the latest applicable drawings, instructions and procedures.
- 5. HANDLING, SHIPPING, TRANSPORTATION AND STORAGE
 - Radiography personnel will handle, ship, transport and store radioactive packages in accordance with the procedures in Superior Industrial X-Ray Company's Radioactive Materials Manual.
 - B) Radiography personnel will determine the completeness of package inspections and presence of manufacturer's certificate before shipment. (See Attachment F).
- 6. INSPECTIONS, SURVEYS AND MAINTENANCE REPORT
 - Daily surveys, inspections and maintenance reports on radiographic exposure devices will be maintained by the radiographer. (See Attachment G).
 - b) Quality inspection and maintenance reports will be maintained by the Chief Radiographer. (See Attachment H).
 - c) A log will be maintained by the Chief Radiographer for indicating the operating status, inspection and maintenance of radiographic exposure devices. (See Attachment I).

SUPERIOR INDUSTRIAL X-RAY	QUALITY ASSURANCE PROGRAM	SECTION 7	REV. NO.
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(SIX)	SHIPMENT OF RADIOACTIVE MATERIAL IN RADIOGRAPHIC EXPOSURE DEVICES	DATE	10,1981
Six		APPROVED BY	Jun

- 7. QUALITY ASSURANCE RECORDS
 - a) The Quality Assurance Manager will be responsible for completing the Internal Audit Reports at least quarterly. (See Attachment J).
 - b) The Field Manager, Chief Radiographer or Quality Assurance Manager will be responsible for completing the field audits. Field audits will be done under field conditions. (See Attachment K).
 - c) Any deficiency or nonconformance in either audit will be reported to the Radiation Safety Committee. The Radiation Safety Committee will institute the corrective action reports.
- 8. AUDITS
 - a) Audits will be performed according to predetermined checklists and frequency of audits will be based on relative significance of activity.
 - b) Results of these audits will be reported to managemer. for evaluation and any deficiencies will be quickly corrected.
 - c) Auditor(s) will not have responsibility in the activity being audited at the particular time of audit.

SUPERIOR INDUSTRIAL X-RAY	QUALITY ASSURANCE PROGRAM	SECTION 7	REV. NO
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SIX	SHIPMENT OF RADIOACTIVE MATERIAL IN RADIOGRAPHIC EXPOSURE DEVICE	DATE	10,1981
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ATTACHMENT A



SUPERIOR INDUSTRIAL X-RAY	ou	ALITY ASS	URANCE PROC	RAM	SECT	ION 7	REV. NO.
COMPANY					PAGE	5	OF 27
SIX			RADIOACTIVE MA PHIC EXPOSURE D	the second second second	DATE	Julv	10,1981
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	10.00	ATTAC	HMENT B 1		0	0	
(12	NAC 618		AR REGULATORY COMMISSION				
	FR 71 Cartificats Number	For Ra	adioactive Materials Peckages	a (d) Pare No.	1.(a) Total No. Pages		
1.(0)	9039	5	USA/9039/B()	1	2		
	Maserials Requis Transportation C 2.05) The packaging a Federal Regulate	tions (49 CFR 170-189 and 14) langerour Cargoes Regulation: (4 nd contents described in item 5 ons, Part 71, "Packaging of Rad	293a, 173.394, 173.395, and 173.396 of II CFR 1033 and Sections 146-19-10a and 46 CFR 146-1491, as amended. below, meets the safety station is set forth floactin. Materials for Transport and Trans	146-19-100 of the C	e 10. Code of		
	2.1cl This certificate d Transportation o will be transport	toes not relieve the consignor fro r othe rapilicable regulatory age	om compliance with any requirement of th ancies, accluding the government of any co	e regulations of the U untry through or into	S. Department of which the package		
1 7	his certificate is issued on	the basis of a safety analysis rep	point of the package design or application-				
North	ilal Present by (Na nical Operations nest Industrial ington, MA 0180	, Inc. Park	LIDI Title and identification of report or Technical Operations, I April 11, 1980.		on dated		
/~ •. C	ONGITIONS This cartificate is condit in item 5 below.		3.1cl Decker No. 71-9039 requirements of Subpart D of 10 CFR 71.	as applicable, and the	conditions specified		
5. 0	escription of Packaging an	d Authorized Canteries, Model I	Number, Fissile Class, Other Conditions, an	d Relevances:			
	(a) Packaging		이 집에 가격했다.				
	(1) Model	No.: 715					
	(2) Descr	iption					
	an MS bolt; a mol pack	-27683-2, 18-gage s 1.5 inches of Mil- ded rubberized hair	or radiographic devices. steel drum; 14-gage clamp -I-2781 or Mil-2819 high t r filler material. Overal 15.5-inch diameter by 24-i 15. pounds	closure ring emperature in 1 dimensions	fastened by a sulation; and of the over-		

(3) Drawings

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The radiographic devices, as secondary packaging authorized for use in the overpack are constructed in accordance with the following Technical Operation Inc. Drawing Nos.:

Model No.	Drawing Nos.
533 616 644 713	053301, Rev. B 061699, Rev. 0 064400, Rev. I C71301, Rev. 0 053301, Rev. B

SUPERIOR INDUSTRIAL X-RAY	QUALITY ASSURANCE PROGRAM	SZC.	7	REV. NO.
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	ATTACHMENT B 2	U.	00	

Page 2 - Certificate No. 9039 - Revision No. 5 - Docket No. 71-9039

(₂. (b) Contents

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(1) Type and form of material

Iridium-192 as sealed sources that meet the requirements of special form defined in §71.4(o) of 10 CFR Part 71.

- (2) Maximum quantity of material per package
 - (i) 120 curies contained in the Model No. 533, Model No. 644 or Model No. 713 radiographic device.
 - (ii) 240 curies contained in the Model No. 616 radiographic device.
- Source assemblies for use in this packaging are limited in those assemblies as identified in Technical Operations, Inc. Drawing No. C42400, Rev. F, Sheet 2, and 6. Sheet 3 of 3.
- 7. Separate molded filters shall be used for each model type radiographic device to ensure a snug fit within the overpack.
- Nameplates shall a fabricated of materials capable of resisting the fire test of 10 CFR Part 71 and mailtaining their legibility. 8.

The packaging authorized by this certificate is hereby approved for use under the general license provisions of 10 CFR §71.12(b).

10. Expiration date: August 31, 1985.

REFERENCE

Technical Operations, Inc. application dated April 11, 1980.

FOR THE U.S. NUCLEAR REGULATORY COMMISSION

her

Charles 5. Has church Churles E. MacDonald, Chief Transportation Certification Branch Division of Fuel Cycle and Material Safety

AUG 1 9 1980 Date:

QUALITY ASSURANCE PROGRAM	SECTION 7	REV. NO.	
SHIPMENT OF RADIOACTIVE MATERIAL	PAGE 7 DATE	OF 27	
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	SHIPMENT OF RADIOACTIVE MATERIAL IN RADIOGRAPHIC EXPOSURE DEVICE	QUALITY ASSURANCE PROGRAM 7 PAGE 7 SHIPMENT OF RADIOACTIVE MATERIAL 7 IN RADIOGRAPHIC EXPOSURE DEVICE July APPROVED BY Offer	

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U.S. NUCLEAR REGULATORY COMMISSION CERTIFICATE OF COMPLIANCE For Radioactive waterials Packages

1.(a) Certifi	sate Number 9027	1.(b) Revision No.	1.1c) Package Identification No. USA/9027/8()	1.(d) Pages No.	1.(a) Total No. Page
2. PREAME	ILE				
2.(a)	Materials Regulations (a, 173.394, 173.395, and 173.396 of the 1 1031 and Sections 146-19-10a and 14 SFR 146-1491, as amended.		
2.(ъ)	The packaging and cor Federal Regulations, P Certain Conditions."	ntents described in item 5 bek art 71, "Packaging of Radioac	ow, meets the safety standards set forth i rime. Materials for Transport and Transpo	n Subpart C of Title preasion of Radioact	e 10, Code of ive Material Under
2.(e)	This certificate does no Transportation or othe will be transported.	or relieve the consignor from o r coolicable regulatory agencie	compliance with any requirement of the es, including the government of any coun	regulations of the U itry thro: gh or into	S. Department of which the package

3.(a) Prepared by (Name and address): 3.(b) Title and identification of report or application: Technical Operations, Inc. consolidated application dated November 29, 1979. Technical Operations, Inc. 40 North Avenue Burlington, MA 01803 3.1cl Docket No. 71-9027

4. CONDITIONS

International This certificate is conditional upon the fulfilling of the requirements of Subpart D of 10 CFR 71, as applicable, and the conditions specified in item 5 below.

5. Description of Packaging and Authorized Contents, Model Number, Fissile Class, Other Conditions, and References.

- (a) Packaging
 - (1) Models Nos.: 741 and 741E
 - (2) Description

A steel encased, uranium shielded Gamma Ray Projector. Primary components consist of an outer steel shell, internal bracing, polyurethane potting material, depleted uranium shield, and a Zircalloy "S" tube. The contents are securely positioned in the Zircalloy "S" tube by a source cable locking device and shipping plug. Tamper-proof seals are provided on the packaging and a 1/4-inch thick steel shipping plate is bolted over the source locking mechanism for additional protection during transport. The total weight of the package is approximately 300 pounds.

QUALITY ASSURANCE PROGRAM	SECT	TION	REV. NO.
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SHIPMENT OF RADIOACTIVE MATERIAL IN RADIOGRAPHIC EXPOSURE DEVICE	DATE	July	10,1981
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	SHIPMENT OF RADIOACTIVE MATERIAL	QUALITY ASSURANCE PROGRAM 7 PAGE PAGE SHIPMENT OF RADIOACTIVE MATERIAL DATE IN RADIOGRAPHIC EXPOSURE DEVICE APPROV	SHIPMENT OF RADIOACTIVE MATERIAL IN RADIOGRAPHIC EXPOSURE DEVICE July APPROVED BY

Page 2 - Certificate No. 9027 - Revision No. 2 - Docket No. 71-9027

- 5.) (a) Packaging (continued)
 - (3) Drawings

The packaging is constructed in accordance with the following Technical Operations, Inc. Drawings:

74190, Sheets 1 through 5 66025, Sheets 2 and 3

- (b) Contents
 - (1) Type and form of material

Cobalt-60 or iridium-192 as sealed sources which meet the requirements of special form as defined in \$71.4(0) of 10 CFR Part 71.

(2) Maximum quantity of material per package

33 curies of cobalt-60; or 240 curies of iridium-192

The backage authorized by this certificate is hereby approved for use under the general license provisions of Paragraph 71.12(b) of 10 CFR Part 71. 6

7. Expiration date: January 31, 1985.

REFERENCE

Technical Operations, Inc. consolidated application dated November 29, 1979.

FOR THE U.S. NUCLEAR REGULATORY COMMISSION

Charles 5. Mas Quall Charles E. MacDonald, Chief Transportation Certification Branch Division of Fuel Cycle and Material Safety

Date: JAN 1 6 1980

SUPERIOR INDUSTRIAL X-RAY	QUALITY ASSURANCE PROGRAM	SECTION 7	REV. NO.
COMPANY	CUTOMENT OF PARTOACTUR MATERIAL	PAGE 9	OF 27
(SIX)	SHIPMENT OF RADIOACTIVE MATERIAL IN RADIOGRAPHIC EXPOSURE DEVICE	DATE July	10,1981
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112-73) 0 CFR 71

U.S. NUCLEAR REGULATORY COMMISSION CERTIFICATE OF COMPLIANCE For Redisective Materials Packages

1.(a) Certificate Num 9033	- 1.0	b) Revision No. 3	1.(c) Package Identification USA/9033/B()	n Sea. 1.(d) Pages No.	1. lel Total No. I 2
2. PREAMBLE						
Materiak	Regulations (49 CFR	170-189 and 14 CFR	173.394, 173.395, and 173.39 1031 and Sections 146-19-10a R 146-1491, as amended.	of the Depart and 146-19-	ment of Tran 100 of the D	hippriation Haza lepariment of
P ecta rai	aging and contents des Regulations, Part 71, "7	cribed in item 5 below Packaging of Radioacti	w, meets the safety standards set we Materials for Transport and	Insponation	of Redioacti	e 10, Code of ive Material Und
	San agricitarias					
Transpor	ificate does not relieve	the consignor from co ble regulatory agencies	impliance with any requirement , including the government of an	o the regulation the country three	ans of the U. sugh or into	5. Department o which the packa
Transport will be	ifictte does not relieve tation or other applicat ransported.	ble regulatory agencies	, including the government of an	to country three	ans of the U. sugh at into	5. Department o which the packa
Transpor will be 3. This certificate is in	ifictte does not relieve tation or other applicat ransported.	afety analysis report o	impliance with any requirement, including the government of an of the package design or applicat Title and identification of repo	is country thro	ough ar inta i	5. Department o which the packa
Transpor will be 3. This constituent is in 3.(a) Precoved Sechnical Operation for thwest Indu:	ificite does not relieve tensor of other applicat responded. wed on the basis of a s by (Name and address) itions, Inc.	afety analysis report o E 3.(b) Te da	, including the government of an	n spolicatio Inc. app	стпі та Прис	which the packa

J. Description of Packaging and Authorized Contents, Model Number, Fissile Class, Other Conditions, and References.

(a) Packaging

- (1) Model Nos.: 660 and 660E
- (2) Description

A steel encased, uranium shielded Gamma Ray Projector. Primary components consist of an outer steel shell, polyurethane potting material, uranium shield, Zircalloy or Titanium "S" tube, and end plugs. The contents are securely positioned in the "S" tube by a source cable locking device and shipping plug. Tamper-proof seals are provided on the packaging. The maximum total weight of the package is approximately 48 pounds.

(3) Drawings

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The packaging is constructed in accordance with the Technical Operations, Inc. Drawings Nos. 66025, Rev. A, Sheets 1, 2, and 3.

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SUPERIOR NDUSTRIAL X-RAY	QUALITY ASSURANCE PROGRAM	SECTION 7	REV. NO
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" Fage 2 - Certificate No. 9033 - Revision No. 3 - Docket No. 71-9033

0 (b) Contents

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(1) Type and form of material

Iridium-192 sources which meet the requirements of special form as defined in \$71.4(o) of 10 CFR Part 71.

(2) Maximum quantity of material per package

120 curies

- The source assembly for use with this packaging is limited to Technical Operations, Inc. Model No. A424-9 as shown in Technical Operations, Inc. Drawing No. C42400, Sheet 2 of 3, Rev. F.
- The name plate shall be fabricated of materials cipable of resisting the fire test of 10 CFR Part 71 and maintaining their legibility.
- The package authorized by this certificate is hereby approved for use under general license provisions of Paragraph 71.12(b) of 10 CFR Part 71.
- 9. Expiration date: July 31, 1984.

REFERENCES

Technical Operations, Inc. application dated November 8, 1974. Supplements dated: December 15, 1978 and June 15, 1979.

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FOR THE U.S. NUCLEAR REGULATORY COMMISSION

Charle J. Huy Dould

Charles E. MacDonald, Chief Traisportation Certification Branch Division of Fuel Cycle and Material Safety

Date: JUL 2 5 1979

(C)

SUPERIOR INDUSTRIAL X-RAY COMPANY	QUALITY	ASSURA	NCE PROGR	АМ	SECTION 7	REV. NO. 1
COMPANY					PAGE 11	OF 27
(SIX)			IOACTIVE MATER EXPOSURE DEV:		DATE	y 10,1981
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	A	TACHMENT	<u>E 1</u>	'		
1. No. 1	m NAC 618					
	112-73) O CFR 71	CERTIFICA	EGULATORY COMMISSION TE OF COMPLIANCE clive Materials Peckages			
<u> </u>		For Maplos	crive materials Packages			
1	(a) Certificate Number 9032	1.05) Revision No. 2	1.(c) Package Identif cation No. USA/9032/8()	1 (g) Pagas No.	1 (a) Total No. Pagas	
2	PREAMBLE					
	materials megulations (49	CFR 170-189 and 14 CFR Cargost Reputations (46 C)	173.394, 173.395, and 173.396 of the 1031 and Sections 146-19-10a and 1 R 146-149), as amended.	e Department of Tran 46-19-100 of the D	isportation Hazaidous lepartment of	
	2 (b) The seck aging and conten Federal Regulations, Part Cartain Conditions,"	ns described in item 5 belo 71, "Packaging of Radioact	 meets the salety standards set forth we Materials for Transport and Transp 	in Subpert C of Title pression of Redinact	10, Code of we Material Under	
	2.1cl This certificate does not in Transportation or other ac will be transported.	elieve the consignor from co oficable regulatory spancies	impliance with any requirement of the including the government of any court	regulations of the U. http://http://www.into	S. Department of which the package	
1	This certificate is issued on the basis	of a salety analysis (arrows)	d the numbers day as an employment			
	3.(a) Prepared by (Name and ad		Title and identification of report or a	polication:		
Tec	hnical Operations, Inc.		hnical Operations, Inc.			
Rac	liation Products Divisio		ed August 8, 1979.		1	
	thwest Industrial Park lington, Massachusetts	01803	Docket No 71 - 9032		6 a. 1 a. 1 a. 1 a. 1	
	CONDITIONS	the second se	ments of Subpart D of 10 CFR 71, as	applicable, and the c	conditions specified	
3	Description of Packaging and Authori	and Contents, Model Numb	er, Fissile Class, Other Conditions, and	References		

- (a) Packaging
 - (1) Model No.: Model 650
 - (2) Description

A steel encased, uranium shielded, Iridium-192 source changer. Primary components consist of an outer steel shell, polyurethane potting material, uranium shield, Titanium "U" tube, and source holdown assembly. The source holdown assembly secures the source assembly in position within the crimped "U" tube. Tamper-proof seals and a padlock are provided on the packaging. Total weight of the package is approximately 70 pounds.

(3) Drawings

The packaging is constructed in accordance with the Technical Operations, Inc. Drawing No. 65002, Rev. A, Sheets 1, 2 and 3 of 3.

SUPER'OR INDUSTRIAL X-RAY	QUALITY ASSURANCE PROGRAM	SECTION 7	REV. NO.	
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Page 2 - Certificate No. 9032 - Revision No. 2 - Docket No. 71-9032

- 5. (b) Contents
 - (1) Type and form of material

Iridium-192 as sealed sources which meet the requirements of special form as defined in \$71.4(o) of 10 CFR Part 71.

(2) Maximum quantity of material per package

240 Curies

- 6. The source shall be secured in the shielded position of the packaging by the source assembly. The source assembly must be fabricated of materials capable of resisting a 1475°F fire environment for one-half hour and maintaining their positioning function. The cable of the source assembly must engage the source holdown assembly. The flexible cable of of the source assembly must be of sufficient length and diameter to provide positive positioning of the source at the crimp of the "U" tube.
- The nameplates shall be fabricated of materials capable of resisting the fire test of 10 CFR Part 71 and maintaining their legibility.
- The package authorized by this certificate is hereby approved for use under the general license provisions of Paragraph 71.12(b) of 10 CFR Part 71.
- 9. Expiration date: September 30, 1984.

REFERENCE

Technical Operations, Inc. application dated August 8, 1979.

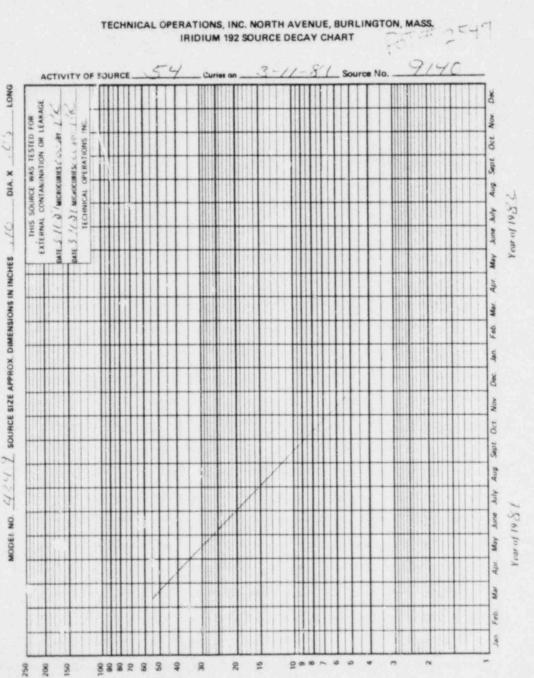
FOR THE U.S. NUCLEAR REGULATORY COMMISSION

Charles S. Hear ta el

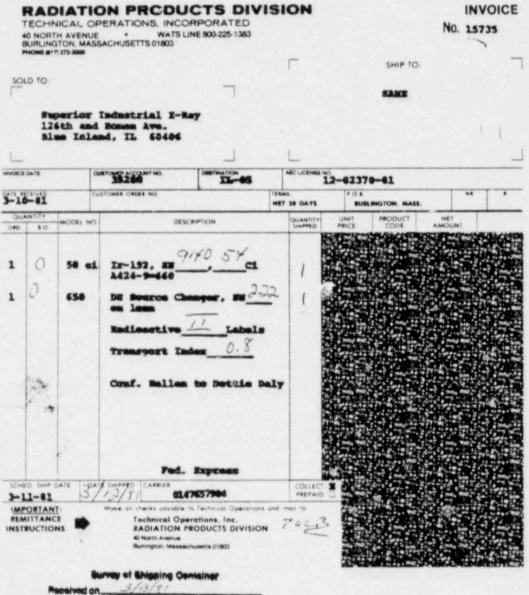
Charles E. MacDonald, Chief Transportation Certification Branch Office of Nuclear Material Safety and Safeguards

SEP 1 7 1979 Date:

SUPERIOR INDUSTRIAL X-RAY	QUALITY ASSURANCE PROGRAM	SEC	REV. NO	
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QUALITY ASSURANCE PROGRAM		7	1
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SUPERIOR INDUSTRIAL X-RAY	QUALITY ASSURANCE PROGRAM	SECTION 7	REV.NO
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N.D.E. WORK PEQUEST

Customer:	Date Called:	Date Work Needed:	
Starting Time From Shop:	Number Of Mer	n: Work Order Number:	
Person Requesting Work: _	F	Phone: Report To:	
N.D.E. Method:	Code:	Job Duration:	
Pipe DIA:	Material Thickness:	Number Of Welds/Pieces	
Remarks:			
Assigned Personnel:			

SUPERIOR INDUSTRIAL X-RAY	QUALITY ASSURANCE PROGRAM		TION 7	REV.N	
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ATTACHMENT F 4

SHIPPING PAPERS

A/C 312/389-5100

SUPERIOR INDUSTRIAL X-RAY CO.

126TH & HOMAN AVENUE, BLUE ISLAND, ILLINOIS

DATE ____

RADIOACTIVE DEVICE - NOS

NO. of PACKAGES	DESCRIPTION	MATERIAL	CURIES	
	MODEL 533	IRIDIUM-192		
	MODEL 660	IRIDIUM-192		
	MODEL 741	COBALT-60		

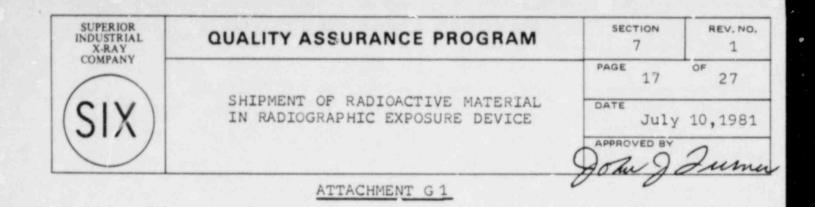
Special Form Material

Radioactive Yellow III(Label Applied) Transport Index _____ mr/hr at 3 feet Type "8" Package

The RADIOACTIVE MATERIALS listed above are owned by Superior Industrial X-Ray Company located at 126th & Homan Avenue, Blue Island, Illinois 60406 under FEDERAL N.R.C. LICENSE No. 12-2370-1.

The MATERIAL listed is in SOLID SATE encapsulated by Technical Operations, Inc., Burlington, Massachusettes for purposes of INDUSTRIAL RADIOGRAPHY. This MATERIAL is being transported as a tool in a COMPANY VEHICLE to and from temporary job sites.

The SHIPPING CONTAINER is a LICENSED and APPROVED PRO-JECTOR properly labeled as CLASS_3 MATERIALS.



a.

SUPERIOR INDUSTRIAL X-RAY COMPANY UTILIZATION LOG

HAME	MONTH						YEAR					
LOCATION	DATE	SOURCE STRENGTH	POT NUMBER	REEL NUMBER	METER NUMBER	INSPEC. OF EQUIPMENT- DAILY CHECK	EXPOSURES	TOTAL TIME IN MINUTES	SURVEY OF AREA MR's AT BOUNDARY	POT SURVEY AFTERLOCKING	DOSIMETER READING AT END OF DAY	OPERATORS
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SUPERIOR INDUSTRIAL X-RAY	QUALITY ASSURANCE PROGRAM	SEC	REV. NO.		
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SUPERIOR INDUSTRIAL X-RAY COMPANY

DAILY TRUCK UTILIZATION LOG

AM E	•		MON TH		YEAR	
DATE	TRUCK	READING in mr's CAB	READING in mr's left/side	READING in mr's right/side	READING in mr's BACK	OPERATOR
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SUPERIOR INDUSTRIAL X-RAY	QUALITY ASS	URANCE PROGRAM	SECTION	REV. NO
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6	SHIPMENT OF	RADIOACTIVE MATERIAL	DATE	21
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	<u>^</u>	TTACHMENT H 1		
		RLY INSPECTION OF REEL ASSEMBLY		
· · · ·	REEL SERIAL #			
	1st QUARTER	DATE	INSPECTED	
DETV	e dear Dox	freedom of operation	and the second sec	_
Driv	e control cable	cuts-wear-dents		-
DEIV	e control connector	wear-alignment		_
	INSPECTOR	DATE DUE		
	2nd QUARTER	DATE I	NSPECTED	
	C LUCL DUX	freedom of operacion	the second s	
Driv	e control cable	cuts - wear - dents		
	mments	wear - alignment		
	INSPECTOR	DATE DUE		
	3rd QUARTER	DATE I	NSPECTED	
Hand	cranck mechanism	freedom of operation		
Cont	rol Conduit	wear - lubrication		
DEIV	e control connector	wear - alignment		
C				
	INSPECTOR	DATE DUE		
				_
and the second	4th QUARTER		NSPECTED	
OLTA6	s degt dox	<pre> freedom of operation wear -> lubrication</pre>	And an other statement of the statement	
UFIVE	control cable	dirt - wear - kicks	station of the local division of the local d	_
Co	omments	wear - alignment		
		DATE DUE		

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UPERIOR DUSTRIAL X-RAY OMPANY	QUALITY ASSU	RANCE PROGRAM	/	1
SIX)		ADIOACTIVE MATERIA IC EXPOSURE DEVICE	Ju	ly 10,1
	ATTAC	HMENT H 2	John	Jon
		EQUIPMENT INSPECTION CH		_
	1st QUA	RTER DATE	INSPECTED	
Handl Sourc Lock Case Sourc Safet	e studs e outlet	 looseness = must be ti wear-dents-threads === freedom of oper. must dents-cracks-proper has alignment-wear-frayed wear-dirt-frayed cable 	ght turn by hand ndling cable strands strands	
	INSPECTOR		ATE DUE	
Source Lock Case Source Safet	e studs	 attached & secured-ripp looseness - must be tiq wear-dents-threads freedom of oper.must to dents-cracks-proper har alignment-wear-frayed cable 	arn by hand adling able strands strands	
_	INSPECTOR		ATE DUE	
Handl Sourc Lock Case Sourc Safet	<u>3rd QU</u> e studs e outlet and lock pluger shield	attached & secured-ripp looseness - must be tig wear-dents-threads freedom of oper.must tu dents-cracks-proper har alignment-wear-frayed co wear-dirt-frayed cable	the strands	
	INSPECTOR	p		
	4th QU	ARTER	TE INSPECTED	
Handl	e studs	attached & secured-ripp	ht	_
Handl Sourc Lock Case Sourc Safet	e outlet and lock plunger shield e pigtail connector y plug ctor cap	freedom of oper.must tu dents-cracks-proper har alignment-wear-frayed o wear-dirt-frayed cable	rn by hand dling able strands strands	

SUPERIOR INDUSTRIAL X-RAY	QUALITY ASSURANCE PROGRAM	SEC	TION 7	REV. NO
COMPANY		PAGE	21	OF 27
SIX)	SHIPMENT OF RADIOACTIVE MATERIAL IN RADIOGRAPHIC EXPOSURE DEVICE	DATE	DATE July 10,1	10,1981
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	ATTACHMENT I 1	0	-	

QUARTERLY REEL INSPECTION RECORD

REEL #	1st Guarter	2nd Quarter	3rd Guarter	4th Quarter	REMARKS
#1				an genter	
#2					+
#3	retired				+
#4	retired				+
#5					+
#6	retired				+
#7	retired				
#8					+
#9					
#10					
#11					
#12					
#13					
#14					
#15					
#16					
#17					
#18					
#19					
#20					
#21					
				and the state	

QUALITY ASSURANCE PROGRAM		7	1
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SHIPMENT OF RADIOACTIVE MATERIAL IN RADIOGRAPHIC EXPOSURE DEVICE	DATE	10,198	
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		SHIPMENT OF RADIOACTIVE MATERIAL DATE IN RADIOGRAPHIC EXPOSURE DEVICE	22 SHIPMENT OF RADIOACTIVE MATERIAL DATE

QUARTERLY POT INSPECTION RECORD

POT #	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter	remark
# 1490					
# 267					
# 276					
# 297				+	
# 307					
# 340					
# 442					
# 448				+	
# 500					
2547					
# 151				+	
				1	
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SUPERIOR INDUSTRIAL X-RAY	QUALITY ASSURANCE PROGRAM	SEC	TION 7	REV. NO
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SUPERIOR INDUSTRIAL X-RAY	RADIOACTIVE MATERIALS MANUAL	SECTION	REV. NO.
COMPANY	MANAGEMENT	PAGE 2	3
(SIX)	8	August	7, 1979
\smile	ADMINISTRATIVE PROCEDURES	John 9	Furn

INTERNAL AUDIT CHEC .IST

		YES	NO	CORRECTIVE ACTION
1.	Are the Operating and Emergency Pro- dures up-to-date?			
2.	Are all radiographic personnel's ex- amination records up-to-date?			
3.	Has the Radiation Protection Officer administer control and corrective			
	action in an emergency situation?			
4.	lias he reviewed the Field Managers field audits and taken corrective action if needed?			
	이야한 것은 것 같아요. 이상 이 것 같아요. 이상 것 같아요.		-	
5.	Are his records as to receipt of the Radiation and Safety Control Manual complete and up=to=date?	<u>-</u>	·	
6.	Has he seen to it that all the respon- sibilities delegated to him have been carried out in accordance with appli-			
	cable NRC Regulations?			
7.	Are the records describing the procure- ment and disposal of by-product material current and up-to-date?			
8.	Are storage facilities adequate and pro- perly maintained?			
9.	** ****			
2.	Is leak testing system and maintenance of records properly performed?			
0.	Are all radiographic materials given a quarterly inventory and properly docu- mented?			

SUFERIOR INDUSTRIAL X-RAY	QUALITY ASSURANCE PROGRAM	SEC	TION 7	REV. NO
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SIX)	SHIPMENT OF RADIOACTIVE MATERIAL IN RADIOGRAPHIC EXPOSURE DEVICE	DATE	July 10,198	10,1981
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	SUPERIOR INDUSTRIAL X-RAY	RADIOACTIVE MATERIALS M	ANUAL	SECTION 6	REV. NO.
(SIX	MANAGEMENT & ADMINISTRATIVE PROCEDU	IRES	PAGE 3 DATE August August	° 3 27. 1979 Fulm
IN	TERNAL AU	DIT CHECKLIST - cont'd:	YES		RECTIVE
11.		survey meters calibrated y and properly documented?			
12.		adiation badge system adequate, posted and documented?		14	
13.		ization logs fully completed, and up-to-date?	_		_
14.	Is all e	quipment in working order?	_		
15.		survey meters in working d within calibration period?	_		
16.		d audits performed at quar- tervals?			_
.7.	Are fiel	d audits properly documented?			
.8.		deficiencies noted in field orrected?			-

COMMENTS:

Cuality Assurance Manager

DATE

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	PAGE	25	of 27
SHIPMENT OF RADIOACTIVE MATERIAL IN RADIOGRAPHIC EXPOSURE DEVICE	DATE	July	10,1981
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		SHIPMENT OF RADIOACTIVE MATERIAL IN RADIOGRAPHIC EXPOSURE DEVICE	25 SHIPMENT OF RADIOACTIVE MATERIAL DATE

SUPERI INDUSTR X-RA COMPAN	RADIOACTIVE MATERIALS	MANUAL	SECTION 2	REV. NO
(SI)	MANAGEMENT & ADMINISTRATIVE PROCI	EDURES	PAGE 7 DATE AUGUST 2 APPROVED BY	9 27, 1979 Furn
	FIELD INSPECTION FOR RADIATION SAFETY & QUALIT		0 0	
	RAPHER	- DATE		-
		- Items check	ed and appr	oved
a. b.	Vey Meter Calibration date Proper use	b		
2. Per	Working ordersonnel Monitors			
a. b.	Pilm badge worn properly Dosimeter worn properly			
a.	Utilization log			
	Truck log	· · · · · · · · · · · · · · · · · · ·		
	Proper surveillance Ropes and/or signs Radiation levels in accordance with Operating and Emergency Procedures			
d.	Source locked after each exposure	d		
	and Procedures			
	N.R.C. License CFR-10 Parts 19,20 & 34			
	Company Operating and Emergency Procedures	c		

QUALITY ASSURANCE PROGRAM	SEC	7 7	REV. NO.
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	SHIPMENT OF RADIOACTIVE MATERIAL IN RADIOGRAPHIC EXPOSURE DEVICE	OUALITY ASSURANCE PROGRAM	SHIPMENT OF RADIOACTIVE MATERIAL IN RADIOGRAPHIC EXPOSURE DEVICE July

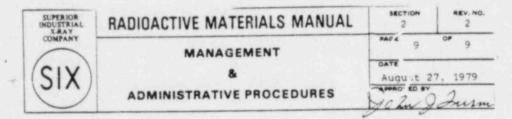
COMPA	RIAL	RADIOACT	IVE MATER	IALS MAN	JAL		2	REV.N
SIX		MANAGEMENT & ADMINISTRATIVE PROCEDURES			5	PAGE 8 OF 5 DATE August 27, 15 Adroved by John John		7, 197
FIELD :	INSPEC	TION cont'd	a					
6. Equ	uipmen	t Condition						
	Statements and a statement of the state	and the second sec	11. A. 1999	а.				
			es					
			ables					
. Vel	hicle							
		erly posted	"CAUTION RAD	TOACTTUE MAT	FRIALS			
			"RADIOACTIVE			-	and the state of the state	the same of the local division of the local
			ehicle					
8. <u>Cor</u>	rments	on Inspecti	on and Gener		lts			
3. <u>Cor</u>	rments	on Inspecti	on and Gener		Lts			
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	ciliti Chem:	es	of change,	al Work Hab	Check	if a	ccepta	ble
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l. <u>Fa</u> . a. b.	ciliti Chem temp Film Shim	es icals, date erature type s, similar r	of change, Expiration d	al Work Hab	Check			
1. <u>Fac</u> a. b. c.	ciliti Chem temp Film Shim	es icals, date erature type s, similar r screens, cr	of change, Expiration d adiographica	al Work Hab; ate lly oxidized	Check			
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ATTACHMENT K 3



FIELD INSPECTION cont'd:

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