U.S. Department of Health and Human Services

Centers for Disease Control and Prevention National Institute for Occupational Safety and Health

OMB Number: 0920-0639

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Special Exposure Cohort Petition — Form B

Use or this form and disclosure of Social Security Number are voluntary. Fallure to use this form or disclose — this number will not result in the denial or any right; benefit, or privilege to which you may be entitled.

General Instructions on Completing this Form (complete instructions are available in a separate packet):

Except for signatures, please PRINT all information clearly and neatly on the form.

Please read each of Parts A — G in this form and complete the parts appropriate to you. If there is more than one petitioner, then each petitioner should complete those sections of parts A - C of the form that apply to them. Additional copies of the first two pages of this form are provided at the end of the form for this purpose. A maximum of three petitioners is allowed.

If you need more space to provide additional information, use the continuation page provided at the end of the form and attach the completed continuation page(s) to Form B.

if you have questions about the use of this form, please call the following NIOSH toll-free phone number and

		☐ A Labor Organization,		Start at D	on Page 3
		Or An Energy Employee (c	urrent or former),	Start at C	on Page 2
Įf y ar		☐ A Survivor (of a former E		Start at B	on Page 2
`		☑ A Representative (of a c	urrent or former Energy Employe	e), Start at A	on Page 1
Α	Rep Surv	resentative Information — vivor(s) to petition on beha	Complete Section A if you are all of a class.	authorized by a	an Employee or
.1	Are	you a contact person for	an organization? 🔉 Yes (Go to	A.2) 🗆 1	No (Go to A.3)
.3	BUI Nan Pos	panization Information: RITINGTON ATOMIC ENERGY THE OF Organization Ition of Contact Person The Of Petition Representat	COMMISSION PLANT FORMER I	NORKERS PROG	RAM
	Mr./	Mrs./Ms. First Name	Middle Initial	Last N	ame
.4	Add	iress:			
	Stre		Apt#	<u></u>	P.O. Box
	City	SI	ate Zip Co	ode	······································
5	Tele	ephone Number: ()			
6	Ema	ail Address:			
7	1	Check the box at left to indic petition by the survivor(s) or form for this purpose is prov	cate you have attached to the bac employee(s) indicated in Parts B	k of this form wo or C of this for	ritten authorization n. An authorizatior

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Special Exposure Cohort Petition — Form B

В	Survivor Information — Complete	Section B if you are	a Survivor or repres	enting a Survivor.
B.1	Name of Survivor:			
	Mr./Mrs./Ms. First Name	Middle Initial	Last	Name
B.2	Social Security Number of Survivo	or:		
B.3	Address of Survivor:			
	Charact		8 3 - 41	50.5
	Street		Apt#	P.O. Box
	City State		Zip Code	
B.4	Telephone Number of Survivor:	<u> </u>		
B.5	Email Address of Survivor:		· · · · · · · · · · · · · · · · · · ·	j
B.6	Relationship to Employee:	☐ Spouse ☐ Grandparent	☐ Son/Daughter ☐ Grandchild	☐ Parent
С	Employee Information — Complet	e Section C UNLESS	you are a labor org	anization.
C.1	Name of Employee:			
	Mr./Mrs./Ms. First Name	Middle Initial	Lasi	Name
C.2	Former Name of Employee (e.g., n	naiden name/legal nan		, 1 -1 , 1, 1
		•	<u> </u>	
	Mr./Mrs./Ms. First Name	Middle Initial	Last I	Name
C.3	Social Security Number of Employ	/ee:		
C.4	Address of Employee (if living):			
	Street	······································	Apt #	P.O. Box
	City State	·	Zip Code	
C.5	Telephone Number of Employee:		<u> </u>	_
C.6	Email Address of Employee:	**		
C.7 C.7a	Employment Information Related (Employee Number (if known):	to Petition		
C.7b	Dates of Employment: Start		_ End _	- -
C.7c	Employer Name: MASON &	HANGER SILAS	MASON COMPANY	<u> </u>
C.7d	Work Site Location: MIDDLET	•		
0.7-		IAAP aka BAEC	P	······································
C.7e	Supervisor's Name:			
		erentaria en la esta e		

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)	Labor Organization Information — Complete Sec	ction D ONLY if you are a la	bor organization.
.1	Labor Organization Information:		
	Name of Organization		
	Position of Contact Person		
).2	Name of Petition Representative:		
0.3	Address of Petition Representative:		
	Street	Apt #	P.O. Box
	City State	Zip Code	<u> </u>
4	Telephone Number of Petition Representative:	(
5	Email Address of Petition Representative:		
6	Period during which labor organization represent please attach documentation): Start	nted employees covered by	/ this petition
.7	Identity of other labor organizations that may re employees (if known):	present or have represente	ed this class of

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Genovante

List job titles and/o name any individua included in this cla	job duties of employees included in the class. In addition, you so other than petitioners identified on this form who you believes: An ALL
Employment Dates	elevant to this petition:
Start	End
Start	End
Start	End
s the petition base	on one or more unmonitored, unrecorded, or inadequately moncidents?:
s the petition base recorded exposure if yes, provide the o	on one or more unmonitored, unrecorded, or inadequately monicidents?: 口 Yes
s the petition base recorded exposure f yes, provide the o	ncidents?: ☐ Yes
s the petition base recorded exposure f yes, provide the o	ncidents?: • Yes • No
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s the petition base ecorded exposure f yes, provide the o	ncidents?: ☐ Yes

U.S. Department of Health and Human Services **Special Exposure Cohort Petition** Centers for Disease Control and Prevention under the Energy Employees Occupational iliness Compensation Act National Institute for Occupational Safety and Health OMB Number: 0920-0639 Expires: 05/31/2007 Special Exposure Cohort Petition - Form B Page 5 of 7 Basis for Proposing that Records and Information are Inadequate for Individual Dose – Complete Section F. Complete at least one of the following entries in this section by checking the appropriate box and providing the required information related to the selection. You are not required to complete more than one entry. B I/We have attached either documents or statements provided by affidavit that indicate that radiation exposures and radiation doses potentially incurred by members of the proposed class, that relate to this petition, were not monitored, either through personal monitoring or through area monitoring. (Attach documents and/or affidavits to the back of the petition form.) Describe as completely as possible, to the extent it might be unclear, how the attached documentation and/or affidavit(s) indicate that potential radiation exposures were not monitored. SEE ATTACHED EIGHT PAGES M I/ We have attached either documents or statements provided by affidavit that indicate that F.2 radiation monitoring records for members of the proposed class have been lost, falsified, or destroyed; or that there is no information regarding monitoring, source, source term, or process from the site where the employees worked. (Attach documents and/or affidavits to the back of the petition form.) Describe as completely as possible, to the extent it might be unclear, how the attached documentation and/or affidavit(s) indicate that radiation monitoring records for members of the proposed class have been lost, altered illegally, or destroyed. THIS TOPIC IS COVERED IN THE EIGHT PAGES ATTACHED TO THIS FORM.

Part Eta centimied on the following page:

Special Exposure Cohort Petition U.S. Department of Health and Human Services Centers for Disease Control and Prevention under the Energy Employees Occupational National Institute for Occupational Safety and Health Illness Compensation Act Expires: 05/31/2007 OMB Number: 0920-0639 Special Exposure Cohort Petition — Form B Page 6 of 7 [2] I/We have attached a report from a health physicist or other individual with expertise in radiation dose reconstruction documenting the limitations of existing DOE or AWE records on radiation exposures at the facility, as relevant to the petition. The report specifies the basis for believing these documented limitations might prevent the completion of dose reconstructions for members of the class under 42 CFR Part 82 and related NIOSH technical implementation quidelines. (Attach report to the back of the petition form.) [2] I/We have attached a scientific or technical report, issued by a government agency of the F.4 Executive Branch of Government or the General Accounting Office, the Nuclear Regulatory Commission, or the Defense Nuclear Facilities Safety Board, or published in a peer-reviewed journal, that identifies dosimetry and related information that are unavailable (due to either a lack of monitoring or the destruction or loss of records) for estimating the radiation doses of employees covered by the petition. (Attach report to the back of the petition form.) Signature of Person(s) Submitting this Petition — Complete Section G. All Petitioners should sign and date the petition. A maximum of three persons may sign the petition. Signature Date Signature Date Signature Any person who knowingly makes any false statement, misrepresentation, concealment of Notice: fact or any other act of fraud to obtain compensation as provided under EEOICPA or who knowingly accepts compensation to which that person is not entitled is subject to civil or administrative remedies as well as felony criminal prosecution and may, under appropriate criminal provisions, be punished by a fine or imprisonment or both. I affirm that the information provided on this form is accurate and true. **SEC Petition** Send this form to: Office of Compensation Analysis and Support 4676 Columbia Parkway, MS-C-47

Cincinnati, OH 45226

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Public Burden Statement

Public reporting burden for this collection of information is estimated to average 300 minutes per response, including time for reviewing instructions, gathering the information needed, and completing the form. If you have any comments regarding the burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden, send them to CDC Reports Clearance Officer, 1600 Clifton Road, MS-E-11, Atlanta GA, 30333; ATTN:PRA 0920-XXXX. Do not send the completed petition form to this address. Completed petitions are to be submitted to NIOSH at the address provided in these instructions. Persons are not required to respond to the information collected on this form unless it displays a currently valid OMB number.

Privacy Act Advisement

In accordance with the Privacy Act of 1974, as amended (5 U.S.C. § 552a), you are hereby notified of the following:

The Energy Employees Occupational Illness Compensation Program Act (42 U.S.C. §§ 7384-7385) (EEOICPA) authorizes the President to designate additional classes of employees to be included in the Special Exposure Cohort (SEC). EEOICPA authorizes HHS to implement its responsibilities with the assistance of the National Institute for Occupational Safety (NIOSH), an Institute of the Centers for Disease Control and Prevention. Information obtained by NIOSH in connection with petitions for including additional classes of employees in the SEC will be used to evaluate the petition and report findings to the Advisory Board on Radiation and Worker Health and HHS.

Records containing identifiable information become part of an existing NIOSH system of records under the Privacy Act, 09-20-147 "Occupational Health Epidemiological Studies and EEOICPA Program Records. HHS/CDC/NIOSH." These records are treated in a confidential manner, unless otherwise compelled by law. Disclosures that NIOSH may need to mak... for the processing of your petition or other purposes are listed below.

NIOSH may need to disclose personal identifying information to: (a) the Department of Energy, other federal agencies, other government or private entities and to private sector employers to permit these entities to retrieve records required by NIOSH; (b) identified witnesses as designated by NIOSH so that these individuals can provide information to assist with the evaluation of SEC petitions; (c) contractors assisting NIOSH; (d) collaborating researchers, under certain limited circumstances to conduct further investigations; (e) Federal, state and local agencies for law enforcement purposes; and (f) a Member of Congress or a Congressional staff member in response to a verified inquiry.

This notice applies to all forms and informational requests that you may receive from NIOSH in connection with the evaluation of an SEC petition.

Use of the NIOSH petition forms (A and B) is voluntary but your provision of information required by these forms is mandatory for the consideration of a petition, as specified under 42 CFR Part 83. Petitions that fail to provide required information may not be considered by HHS.

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Special Exposure Cohort Petition	Claimant ID #2 DOL Batch #:	J.S. Department of Health ar	nd Human Services
under the Energy Employees Occupational Illness Compensation Act	DOLD.O. #	National Institute for Occupa	e Control and Prevention ational Safety and Health
Special Exposure Cohort Petition — F	ASOVHROBIN B mno	OMB Number: 0920-0639 Appendi	Expires: 05/31/2007 ix — Continuation Page
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I would like to give a bit more background and detail regarding the rationale behind the Petition for Special Exposure Cohort Status for the Iowa Army Ammunition Plant, IAAP/BAECP, workforce.

Background

Throughout the DOE collaborative agreement. Former Worker Program for AEC/DOE contract workers in the Middletown, Iowa, IAAP there have been amazing opportunities to hear the firsthand accounts of these IAAP workers as regards their tasks and exposures. Energy workers located at the Iowa Army Ammunition Plant (also known as the Burlington Atomic Energy Commission Plant) were exposed to uranium, plutonium, and tritium, (and possibly other radionuclides), in the course of assembling and disabling nuclear weapons from 1947 until 1974.

This DOE facility (one of only two in our country doing these particular tasks) was responsible for assembly, disassembly and repair operations of various nuclear weapons from various sources. The process involved assembly of weapons components arriving from other facilities, manufacture of high explosives components of said weapons and a variety of repair or modifications processes. By workers' memories it would appear that teardown and repair work was a large portion of the work at times and that such work was often done on weapons initially assembled at Pantex.

A large fraction of these IAAP workers worked directly with or in very close proximity to hand held radioactive plutonium "pits" of these weapons. These were the innermost radioactive or fissile components of atomic bombs consisting of critical masses of plutonium and other metals with unstable nuclei selected for their properties of emitting "radioactivity". Many of these workers report holding the pits in their hands with only cotton gloves with rare or no radiation monitoring and little or no shielding from the radiation, (no glove boxes or lead aprons).

Personal interviews of production workers also indicate those even if badges were provided, they often were not worn by the workers in the bays but were left either in their lockers or on a main storage board so they would not lose them. It should be noted that when badges were worn as directed, it would have been at the lapel thus placing the film badge at a greater distance from the pit than the workers' torso and pelvis would have been. In addition, only a small minority (approximately 20 percent) of the Line 1 workforce (Line 1 was the designated DOE line) were ever issued badges and there were periods when none or very few individuals were monitored.

The NIOSH Site Profile provides documentation that the radiation exposure assessment was incomplete and inadequate. Exposure data is sorely lacking and the Health Physicists made a variety of assumptions in the site profile process. Where data are non-existent, extrapolations of exposure where made using other facilities from other eras involved in other manufacturing processes.

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According to the NIOSH, no records have been located that indicate any individual monitoring of internal doses of radionuclides (i.e. plutonium, uranium or tritium) occurred between 1947 and 1975. No wrist or finger monitor data exist for these workers. Furthermore, between 1947 and 1955, no dosimetry badges at all have been located to indicate the doses of external penetrating radiation to which such workers were exposed. Finally, records indicate that only 8 to 23 workers in a workforce of over 1,000 were monitored for external radiation doses between 1955 and 1962. Even at the high point of screening at the Iowa Army Ammunition plant from 1970 until 1975, only 20 - 25 percent of the workforce were screened for exposure to external radiation and none have records for internal dosages.

It appears that there is on one hand a scientific rationale to strongly suspect that handling of plutonium or mixed fissile material pits would have put this workforce at increased risk of cancer from ionizing radiation. On the other hand, there is insufficient documentation of past radiation sources and processes to reconstruct past radiation dose with any validity for these workers. If doses are reconstructed based on poorly documented processes that occurred 28 to over 54 years ago, the number and magnitude of assumptions needed to arrive at a "reconstructed" or estimated dose surely precludes the validity of such an estimate.

The following paragraphs list just some of the deficiencies that make accurate or even worst case retrospective dose assessment impossible with any degree of confidence. A major concern is that there is so very little information documenting even the record keeping procedures and methods that were historically used to censor data and administratively assign dose.

External Radiation Exposure Assessment Problems

Several area monitoring records have been located that document the potential for high external radiation exposure even though the location of these area measurements were not in proximity to the actual immediate work area where higher exposures took place. Data from area monitoring in this facility documents cases of exposure in excess of OSHA standards. The 23-39-21 Yard C storage building had a yearly average of 18.2.rem. The 1-73 storage and receiving building had a yearly average of 16.9 rem. The 23-39-21 Yard C storage building had a yearly average and receiving building, which replaced the 1-73 storage area, and receiving building had a yearly average of 11.7 rem. The 23-39-7 Yard C storage building had a yearly average of 7.8 rem. It would appear obvious that workers in such areas would be in significantly closer proximity to the radiation sources than monitors on the walls

Unfortunately, documentation is non-existent regarding even general protocols for area, or even personal, exposure monitoring.

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No records have been found that document the radiation sources, source term, uniformity of exposures, potential for airborne dispersion, radiation energy spectrum, particle size distribution, etc. that were in the work area with the employees on a day-to-day basis at the plant. Detailed information of this type with chemical form of the radionuclide would be required to validly reconstruct past radiation exposure. It is understandable because of the tight security that much of this information was not maintained.

Reports indicated occasional sampling for Cesium-137, but no work process ever reported use of this radionuclide. There may have been other exposure scenarios without documentation.

There were 20 plus years when virtually <u>no one</u> was regularly monitored and thereafter monitoring was was still limited to subsets of employees leaving out large groups of exposed workers, (i.e. those doing disassembly tasks who apparently were never monitored). Film badge records for external whole body radiation only exist for the years of 1965, 1966 and the years 1968 to 1975. Technicians checking the explosive wave lenses by X-ray wore most of the film badges. No data is available on work related diagnostic x-ray and gamma sources, which were a large part of the quality assurance process.

YEAR	PEOPLE
1965	46
1966	51
1967	
1968	176
1969	211
1970	288
1971	399
1972	432
1973	400
1974	173
1975	33

There are no records of hand and arm exposures. Hand and arms would undoubtedly get more external radiation exposure followed by pelvis and torso.

In many cases, the external dose records indicate readings of zero. It is unknown whether this indicated no significant readings above minimum detectable levels or whether there were other problems with the data (such as a missing detector, etc).

Only about 20% of the workforce identified as Line 1 workers were ever issued film badges-by estimates. The limited monitoring points out the minimal recognition regarding safety since all the work force was at an increased risk of exposure.

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Several groups of employees, who worked in close proximity to the fissile material, or pits, were only occasionally, and often never, provided film badges to document external radiation exposure. These groups include: The Physical Security Management Staff who were responsible for receiving and supervising transport and storage of pits and gases. The Safety Department personnel, the transport staff, a variety of tradesmen, (largely mechanics who performed a variety of tasks in the production areas) and guards of the Physical Security Department who roamed the entire area.

Personal interviews of production workers also indicate that even if badges were provided, they often were not worn by these workers in the bays, with the supervisors' knowledge, but were left either in their lockers or on a main storage board.

For the years where radiation reports are available, the accuracy and the precision of the readings are very questionable.

The radiation detectors used during the time period of work at IAAP were not very accurate and poorly reflected actual employee exposure in most cases. A report* as recent as 1981 of controlled exposures indicated that film dosimetry lacked both precision and accuracy and yielded underestimates of true neutron exposure approaching 80% in some instances. The film from the 1950s through mid 1970s produced even less accurate and precise estimates of the true personal exposure. For example, a study** of film detector performance performed by Pacific Northwest Laboratories for the Atomic Energy Commission as late as the mid 1960s documented that the relative error of the film badge for common types of x-ray and neutron exposure exceeded 500%.

By report from senior Health Physicists involved with AEC work during this era, spot checks of the film in the radiation records files indicated that the original reads were suspect. In this spot check it was determined that neutron doses may have been under reported by a factor of 5 to 10 times. There are reportedly several news paper articles on this topic in the Rocky Mountain News Paper probably in the 1993 - 1996 time frame. Reportedly as a result of questions regarding accuracy of neutron detectors at Rocky Flats DOE-RFFO felt that is was imperative to initiate the Neutron Dose Reconstruction Project (NDRP).

*Sims, C.S., Swaja, R.E. personnel Dosimetry Intercomparisons Studies at the Health Physics Research Reactor: A Summary (1974-1980). Health Physics, 42(1): 3-18, 1982.

**Larson, H.V, Unruh, C.M., Beetle T.M., Keene, A.R. Factors Involved in Establishing Film Dosimeter Performance Criteria, in Radiation Dose Measurements, Their Purpose, Interpretation, and Required Accuracy in Radiological Protection. European Nuclear Energy Agency, pp. 191- 208, 1967.

There are no reports of radiation detector calibrations or the existence of calibration films (e.g., films with well-documented delivered neutron doses). These are required to assess the accuracy of the detectors. The wife of the primary on-site detector repairman/calibrator reported that her husband died at an early age from cancer.

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No documentation exists concerning where the background/control dosimeters were stored and how background subtraction for detectors was performed and validated.

There are no records documenting whether or not a single generic background track density was used for all buildings and all personnel.

There are no records to indicate how much surface area of the film from the badge was evaluated. This would help determine the precision of the measurements.

There are no records regarding whether any neutron spectra measurements were made in the areas where the workers handled the material to assure that the detectors could measure all the relevant spectra.

No routine dose rate survey data has been located from either the radiation monitors or health physics technicians using gamma dose rate instruments and neutron dose rate instruments.

No data are available to indicate that adjustments were made to account for dosimeter responses to low energy radiation.

Curiously, not one radiation related incident or investigation report was included in the IAAP plant records for the entire period 1945 to 1975. Perhaps more disturbing is that there are records documenting contamination such as the collection and transport of clothes to Pantex for plutonium contamination, but no information regarding personal exposure to the people wearing the clothes. The question of whether plutonium exposure was possible given this history of possible clothing contamination and worker histories of early weapons handling is troublesome. The implication of no radiation incidents is that monitoring was not as rigorous and potential for risk was much greater than reported in the original site profile for this site.

Internal Radiation Exposure Assessment Problems

Internal radiation dose assessment is an essential part of retrospective radiation dose assessment. However, no documents have been located to either document protocols to assess internal doses (analytical methods, detection limits, interferences) or that report findings.

While we have first hand accounts that workers were monitored for internal body burdens, no radiation dose estimates related to internal radionuclide body burdens were ever entered into any of the dose records for the workers.

There must have been significant potential for internal exposure since at least one technician reported performing urinalysis since the early 1950s. However, the technician indicated the urine was only monitored for tritium.

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The frequency and/or results of urine testing is not available.

The relationship of urine sampling time in relation to time at exposure was also not documented.

Surrogate information for internal dosimetry such as records from air monitor measurements or contamination monitors are non existent.

There is some qualitative data regarding removable radioactive contamination both from various indoor work sites on Line 1 swiped in June 2000, and more worrisome, pages of historically positive swipe tests from the containers in which the pits arrived. There are also records on the site documenting that soil was tested for plutonium contamination, however results of these tests have not been found.

However, given this information -

- No documentation has been found that nasal smears were ever taken for plutonium, or any other radionuclide, to assess possible inhalation.
- No documentation has been found documenting the results from in vivo measurements.
- No documentation has been found that urine or fecal analyses were performed for plutonium or other radionuclide.
- No documentation is found regarding the solubility of the potential inhaled or ingested compounds.
- Personal employee records do not contain external dose in the vast majority of cases and internal dose data has not appeared in any records reviewed.

The majority of the exposed work force was not routinely monitored, especially prior to 1968. IT appears that throughout the history of the facilities' operations, radiation monitoring was inadequate in that neutron radiation monitoring was not performed; biological monitoring (urine, nasal swabs, etc.) was not performed; no extremity monitoring (ring or bracelet monitors) was performed.

Several area monitoring levels indicate exposure levels at the wall which exceed OSHA exposure limits and the proximity of workers to pits and weapons would be expected to be much closer than the area monitors were to the radioactive materials. Entire workforces (job groups) were not monitored at all including guards, disassembly workers and other respondents from the cohort who report working with pits but never being monitored. The adequacy of the badges used is called into question by the lack of available SOPs, QA and validation data and personal discussion with senior health physicists.

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The differences in exposure levels reported between IAAP workers and Pantex workers suggest a technological or monitoring problem, as do the increased exposure levels seen at the IAAP from 62-67 as compared to after 1968. The explanations proffered by the health physicist at the NIOSH/DOL meeting with workers in Burlington reflect an obvious bias that the difference in exposures documented could only reflect a difference in dose with no acknowledgement of a potential for technologic or reader error. The possibility of underestimation of dose seems to be real based upon technologic limitations, lack of validation and variability noted in the data. It does not appear to be possible to recreate the range and scope of potential exposures to this workforce without concurrent exposure data from this site with adequate quality assurance nor relevant scientific experimental data with adequate controls. The fact that there has never been a radiation incident report in over 25 years of operation is odd and implies a lack of recognition and or reporting as well as insufficient exposure monitoring.

Certainly the fact that there was no health physicist per se at the IAAP is telling especially given the large staff devoted to Environmental Health and Safety at the Pantex plant currently. Reportedly there are seventy, (70), plus technologic staff devoted to radiation safety at Pantex not to mention Industrial Hygiene and other EH&S staff. This large number of radiation safety staff seems to reflect a great change in the recognition of the hazard and risk imposed by this work.

This workforce reported never using lead aprons when near or handling pits. The NIOSH site profile for the Pantex site reports on page 15 of 17 (ORAU-TX8S-0013-2) that workers wore lead aprons because: "Direct handling of pits can result in high dose rates." This strikes us as a clear assumption by this Health Physicist author of increased risk associated with handling pits without worker protection at Pantex, a situation that was the norm at the IAAP.

What badge data is available is suspect for several reasons as noted above (lack of validation etc., inconsistency with PANTEX, inconsistency over time, vast majority exposed not monitored, etc). In addition, these badges were worn on lapels at a greater distance from the pit than the workers' abdomens, pelvis and arms.

Similarly what neutron dose data exists may have been underestimating exposure due to neutron fading (monthly or multi-month monitoring as opposed to weekly or biweekly lengths of monitoring).

The site profile appears to rely too strongly on too few respondents, too few and possibly the wrong individuals and/or too few job tasks monitored (disassembly).

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Continuation Page — Photocopy and complete as necessary.

The issue of "cladding" or shielding is unsettling. From worker interviews it appears likely that not all pits were "clad" in beryllium and/or depleted uranium. There may well be situations by which workers would have had potential for exposure to poorly clad pits. One was in the assembly of the Mark 6 weapons during which workers reported handling a hollow sphere in the core of the assembly and handling a threaded cap that could close this central portion of the assembly. They stated that this assembly unit required an "initiator unit for arming" which was placed in flight. These workers reported running their bare hands along the inside of this hollow sphere to ensure it's smoothness and cleanliness. In addition by workers' report, the reported frequent dismantling of pits apparently may have - in some early configurations - involved removal of the metallic hemispheres covering the pits in addition to removal of the high explosive "lens" coverings. Certainly the heat emanating from these pits as described routinely by these workers implies at least internal alpha radiation in these pits and presumably poorly characterized neutron and gamma radiation as well. The additional questions of the efficacy of the various forms of cladding and the potential of beryllium elements of the cladding to act as neutron sources themselves or even just to slow neutrons down may have significant undetermined impact on the risk to workers from jonizing radiation.

This special energy cohort is a predominantly elderly group of retirees, many with high rates of suspected work-related diseases including reported cases of Glioblastoma, Other Brain Cancer, Leukemia, Lymphoma, Thyroid, Lung, and Bladder Cancers and Pneumoconiosis in addition to the expected plethora of more common diseases. Approximately twenty-five of these workers have died in the last year and a half. We have had over 500 claims for radiation induced cancers arise from our facility and none have been accepted yet on the argument that there is not sufficient evidence for radiation exposure. Many of these workers will not survive the anticipated process of dose reconstruction. These claimants and their families are seeing their faith in their governments' intentions eroded by the current process which is operating so slowly that claimants are dying much faster than claims are being processed.

On the basis of these concerns regarding the completeness, adequacy, and accuracy of both the available exposure assessment records and work practices and on the rational assumption of risk based upon direct handling of plutonium pits and pit containing weapons, we suggest that dose reconstruction cannot yield valid information. Special Exposure Cohort Status ought to be granted to this IAAP cohort who routinely worked in close proximity to radioactive sources and became ill

Sincerely,

"OFFICIAL SEAL" Anthony S. Jovanovich Notary Public, State of Illinois DuPage County

My Commission Expires 11/20/2007

and out

RB.

Special Exposure Cohort Petition under the Energy Employees Occupational

U.S. Department of Health and Human Services

Centers for Disease Control and Prevention

National Institute for Occupational Safety and Health

cial	Exposure Cohort Petition — Forn	I D			
,	Survivor Information — Complete	Section B if you	u are a Survivor	or repres	enting a Su
	Name of Survivor	,			,
	MITANISTAIS. LIPST IASTIC .	Middle	nitial	Last	Name
<u> </u>	Social Security Number of Survivo	or:			1
;	Address of Survivor:			,	•
	Stree	· .	Apt#	,	P.O. Box
	· -	3		;	
	State	ž.	VVUC	÷	
4	Telephone Number of Survivor:	Ĺ		'	
5	Email Address of Survivor:				M Danami
5	Relationship to Employee:	☐ Spouse☐ Grandparer	☐ Son/Dant ☐ Grand		M Parent
4 6					
		E STATE OF S			
7-20	Employee Information — Comple	* _ສ (ເລີ່ວມ _ີ te Section C UN		labor ord	anization.
1	Employee Information — Comple			labor org	ganization.
1	Employee Information — Comple Name of Employee	te Section C UN	ILESS you are a		
1	Name of Employees Mr./Mrs./ws. Hirst Name	te Section C UN	ILESS you are a		ganization. Name
.1	Name of Employees	te Section C UN	ILESS you are a	/ Last /other):	Name
	Mr./Mrs./ws. Hirst Name Former Name of Employee (e.g.,	te Section C UN	ILESS you are a Initial gal name change	/ Last /other):	
.2	Mr./Mrs./ws. Hirst Name Former Name of Employee (e.g.,	te Section C UN Middle maiden name/leg	ILESS you are a Initial gal name change	/ Last /other):	Name
.2	Mr./Mrs./ms. First Name Former Name of Employee (e.g., Sam e Mr./Mrs./Ms. First Name Social Security Number of Employee Address of Employee (if living):	te Section C UN Middle maiden name/leg	ILESS you are a Initial gal name change	/ Last /other):	Name
.2	Mr./Mrs./ms. Hirst Name Former Name of Employee (e.g., Sam & Mr./Mrs./Ms. First Name Social Security Number of Employee	te Section C UN Middle maiden name/leg	ILESS you are a Initial gal name change	/ Last /other):	Name
.2	Mr./Mrs./ws. First Name Former Name of Employee (e.g., Sam e Mr./Mrs./Ms. First Name Social Security Number of Employee (if living):	Middle maiden name/lec Middle	ILESS you are a Initial Initial Initial	/ Last /other): Last	Name
2 .3 .4	Mr./Mrs./ms. First Name Former Name of Employee (e.g., Sam e Mr./Mrs./Ms. First Name Social Security Number of Employee (if living): Address of Employee (if living):	Middle maiden name/leg Middle	ILESS you are a Initial gal name change/ Initial Apt #	/ Last /other): Last	Name
.3 .4	Mr./Mrs./ms. First Name Former Name of Employee (e.g., Sam e Mr./Mrs./Ms. First Name Social Security Number of Employee (if living): Address of Employee (if living): Street City State Telephone Number of Employee:	Middle maiden name/leg Middle	ILESS you are a Initial gal name change/ Initial Apt #	/ Last /other): Last	Name
2 3 4 5 .6	Mr./Mrs./ms. First Name Former Name of Employee (e.g., Sam e Mr./Mrs./Ms. First Name Social Security Number of Employee (if living): Address of Employee (if living): Alegad Street City State Telephone Number of Employee: Email Address of Employee: Employment Information Related	Middle maiden name/leg	ILESS you are a Initial gal name change/ Initial Apt #	/ Last /other): Last	Name
.5 .6 .7	Mr./Mrs./ms. First Name Former Name of Employee (e.g., Sam e Mr./Mrs./Ms. First Name Social Security Number of Employee Address of Employee (if living): Street City State Telephone Number of Employee: Email Address of Employee: Employment Information Related Employee Number (if known):	Middle maiden name/leg Middle byee:	ILESS you are a Initial gal name change/ Initial Apt # Zip Code	/ Last /other): Last	Name P.O. Box
.2 .3 .4 .5 .7 .7a .7b	Mr./Mrs./ws. First Name Former Name of Employee (e.g., Sam e Mr./Mrs./Ms. First Name Social Security Number of Employee Address of Employee (if living): Street City State Telephone Number of Employee: Employment Information Related Employee Number (if known): Dates of Employment: Start	Middle maiden name/leg Middle oyee:	ILESS you are a Initial gal name change/ Initial Apt # Zip Code	/ Last	Name
.2 .3 .4 .5 .6 .7 .7a .7b	Mr./Mrs./ms. First Name Former Name of Employee (e.g., Sam e Mr./Mrs./Ms. First Name Social Security Number of Employee Address of Employee (if living): Street City State Telephone Number of Employee: Employment Information Related Employee Number (if known): Dates of Employment: Start Employer Name: Atomic	Middle maiden name/leg Middle oyee:	ILESS you are a Initial gal name change/ Initial Apt # Zip Code	/ Last	Name P.O. Box
3.1 3.2 3.3 3.4 3.5 5.6 3.7 5.7a 5.7b 5.7c 5.7d	Mr./Mrs./ms. First Name Former Name of Employee (e.g., Sam e Mr./Mrs./Ms. First Name Social Security Number of Employee (if living): Address of Employee (if living): Street City State Telephone Number of Employee: Employment Information Related Employee Number (if known): Dates of Employment: Start Employer Name:	Middle maiden name/leg Middle byee:	Initial gal name change initial Apt # Zip Code	/ Last	Name P.O. Box

Name or Social Security Number of First Petitioner:

U.S. Department of Health and Human Services

Centers for Disease Control and Prevention National Institute for Occupational Safety and Health

OMB Number: 0920-0639

Expires: 05/31/2007

aı	Exposure Cohort Petition — Form B
	Brancard Definition of Employee Class Covered by Petition — Complete Section E.
	Name of DOE or AWE Facility: <u>Atomic Energy Commission Plant</u>
	Locations at the Facility relevant to this petition:
	Middle Town Ia.
	List job titles and/or job duties of employees included in the class. In addition, you can list name any individuals other than petitioners identified on this form who you believe should included in this class:
	Employment Dates relevant to this petition:
	Start End
	Start End
	Start End
	Is the petition based on one or more unmonitored, unrecorded, or inadequately monitored recorded exposure incidents?: Yes No
	He had no monitoring, no records. He was there and saw the test fires. Walked Threw the apea afterwards. Brought the metical home in the cuff of his parts, He wore his own clothes. No protection at all.
	own clothes. No protection at all.
	Go to Pariff Fig. 1

U.S. Department of Health and Human Services

Centers for Disease Control and Prevention National Institute for Occupational Safety and Health

OMB Number: 0920-0639

Expires: 05/31/2007

pecia	il Ex	posure Cohort Petition — Form B	Page 5 of 7		
Sure as sold	Bas	sis for Proposing that Records and Information are inadequate for individual Dose mplete Section F.			
Comp he red	quire	at least one of the following entries in this section by checking the appropriate box and additional information related to the selection. You are not required to complete more than one expectation.	intry.		
₹.1	a	I/We have attached either documents or statements provided by affidavit that indicate the radiation exposures and radiation doses potentially incurred by members of the propose that relate to this petition, were not monitored, either through personal monitoring or thromonitoring.			
		(Attach documents and/or affidavits to the back of the petition form.)			
		Describe as completely as possible, to the extent it might be unclear, how the attached documentation and/or affidavit(s) indicate that potential radiation exposures were not meaning the complete of the com	onitored.		
F.2	33	I/ We have attached either documents or statements provided by affidavit that indicate radiation monitoring records for members of the proposed class have been lost, falsified destroyed; or that there is no information regarding monitoring, source, source term, or from the site where the employees worked.	d, or		
		(Attach documents and/or affidavits to the back of the petition form.)			
		Describe as completely as possible, to the extent it might be unclear, how the attached documentation and/or affidavit(s) indicate that radiation monitoring records for member proposed class have been lost, altered illegally, or destroyed.	l rs of the		
		They did not provide these safetys To There employees.			
	70.45				
<u> </u>		Part F is continued on the following page.			

U.S. Department of Health and Human Services

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Special	Exposure	Cohort Petition	- Form B

F.3 🚨	I/We have attached a report from a health physicist or other individual with expertise in radiation dose reconstruction documenting the limitations of existing DOE or AWE records on radiation exposures at the facility, as relevant to the petition. The report specifies the basis for believing these documented limitations might prevent the completion of dose reconstructions for members of the class under 42 CFR Part 82 and related NIOSH technical implementation guidelines.
-------	---

(Attach report to the back of the petition form.)

F.4 I/We have attached a scientific or technical report, issued by a government agency of the Executive Branch of Government or the General Accounting Office, the Nuclear Regulatory Commission, or the Defense Nuclear Facilities Safety Board, or published in a peer-reviewed journal, that identifies dosimetry and related information that are unavailable (due to either a lack of monitoring or the destruction or loss of records) for estimating the radiation doses of employees covered by the petition.

(Attach report to the back of the petition form.)

G	Signature of Person(s) Submitting this Petit	ion — Complete Section G.

AII	Petitioners) should sign and	date the petition.	A maximum of thre	e persons	may sign ti	ne petition.
	Leftfoliai biorform miser and			-		

Signature 7

Sionature

Šr ∖aure

6-10-04 Date

6-12-04 Date

Notice:

Any person who knowingly makes any false statement, misrepresentation, concealment of fact or any other act of fraud to obtain compensation as provided under EEOICPA or who knowingly accepts compensation to which that person is not entitled is subject to civil or administrative remedies as well as felony criminal prosecution and may, under appropriate criminal provisions, be punished by a fine or imprisonment or both. I affirm that the information provided on this form is accurate and true.

Send this form to:

SEC Petition

Office of Compensation Analysis and Support

NIOSH

4676 Columbia Parkway, MS-C-47

Cincinnati, OH 45226

If there are additional peritioners they must complete the Appendix Forms for additional peritioner.

The Appendix forms are located at the end of this document.

These notarized paper are to be added to file of his Special Cohort Exposure. There is one for the F-1 and one for the E-5. His file number is

Thank vou

08-09-04P03:43 RCVD

My dad worked on line 1 at the I.A.A.P. as a sewitness to many test firers of nuclear weapons. Afer the firers he would walk threw the area. He would lay on the floor, where there was dust from the weapons, that was everywhere. He would come home from work with that dust all over his clothes. I remember one time in the 1960,s he came home from work and told me to get something small, so he could put this gray powder in that was in his pants cuff. I did know what to get him to put it in and dad told to get a pop cap. I fold one and, he He put the gray powder in it and set it on the window sill. He told us never to touch it. I thought he said it was C5. He He said it was very dangerous. They did not supply dad with work clothes. He wore his own clothes.

I can not tell you about any of dad coworkers. They are dead from cancer.

Thank you



My dad

to him. He had no way of knowing if he got to much radiation.
He worked in all the area of line 1. He had clearence to the
whole line because he was a

badge to determine how much radiation he got. They did not
offer him one. I do not know why they would not issue a badge.
They are still cleaning up line 1. They are now talking about
burning the building. The radiation is still there. So how can
they say he didn, get radiation, when it is still out their
after all these years? How can they judge someone when they
have no proof? How can they compare someone to another person
when they didn, t do the same work or be in the same plant?
The way you can treat my dad fair is put him on the Special
Cohora Exposure and approve him.

Thank you



unde	ecial Exposure Cohort Petition or the Energy Employees Occupational ss Compensation Act	U.S	U.S. Department of Health and Human Services Centers for Disease Control and Prevention National Institute for Occupational Safety and Health			
Spe	ecial Exposure Cohort Petition — F	orm B	OMB Number: 0920-0639	Expires: 05/31/2007 Page 2 of 1		
B	Survivor Information — Comple		are a Survivor or repre	senting a Survivor.		
B.1	Name of Survivor		· · · · · · · · · · · · · · · · · · ·			
	Mr Mrs./Ms. I not realle	Miadle Initi				
B.2			al Last	Name		
B.3						
	ξ					
	\$		Δn+ #	P.O. Box		
	City	e - 	ANTTONA			
B.4	Telephone Number of Survivor:		<u> </u>			
B.5	Email Address of Survivor:					
В.6	Relationship to Employee:	☐ Spouse ☐ Grandparent	☐ Son/Daughter☐ Grandchild	☐ Parent		
		Conto Para D				
C	Employee Information — Comple	ete Section C UNLES	SS you are a labor org	anization.		
C.1	Name of Et '		•	,		
	Mr/Mrs./Ms. First Name	Middle Initia	1 1851	vame		
C.2	Former Name of Employee (e.g.,	maiden name/legal na				
	Mr./Mrs./Ms. First Name	Middle Initia	Last I	iame		
C.3	Social Security Number of Emplo)yee:		· · · · · · · · · · · · · · · · · · ·		
C.4	Address of Emp					
	Stre		Ant#	P.O. Box		
	City State					
C.5	Telephone Number of Employee:		Zip Code	1		
C.6	Email Address of Employee:	N/A	<u> </u>	-		
C.7 C.7a	Employment Information Related Employee Number (if known):	to Petition		-		
C.7b	Dates of Employment: Start		End	ŧ.		
C.7c	Employer Name: MASO?	V HANGER	Sig AR MAY	ONT TA THE		
C.7d	Work Site Location: BURLIN	·	C. PLANT.	TARY		
).7e	Supervisor's Name:					
Park X		Goto Part E				
-		Contraction of the Party of the				

Name or Social Security Number of First Petitioner: