

## SUPPORTING STATEMENT

### ENVIRONMENTAL PROTECTION AGENCY

#### A. JUSTIFICATION

##### 1. IDENTIFICATION OF INFORMATION COLLECTION

a) Title: NESHAP for Radionuclides (40 CFR part 61, subparts B, K, R and W) (Renewal)

EPA Number 1100.15 OMB Control Number 2060-0191

b) Short Characterization

On December 15, 1989, pursuant to Section 112 of the Clean Air Act as amended in 1977 (42 USC 1857), the EPA promulgated NESHAPs to control radionuclide emissions from several source categories. The regulations were published in 54 FR 51653, and are codified at 40 CFR Part 61 subparts B, K, R, and W, and impose the following radionuclide dose and emission standards:

Subpart B--Underground Uranium Mines	- 10 mrem/yr
Subpart K--Elemental Phosphorous Plants	- 2 curies/yr
Subpart R--Phosphogypsum Stacks	- 20 pCi/m <sup>2</sup> -s
Subpart W--Uranium Mill Tailings	- 20 pCi/m <sup>2</sup> -s

Originally there were seven subparts B, H, I, K, R, T and W--that were published in the December 15, 1989 Federal Register (54 FR 51653). Since the 1989 notice, subparts I and T are no longer regulated by EPA. Due to petitions for reconsideration, EPA rescinded subpart T as it applies to owners and operators or uranium mill tailings disposal sites licensed by NRC or an affected Agreement State on July 15, 1994, 59 FR 36280. Subpart I as it applies to NRC-

licensed facilities was rescinded on December 30, 1996 (61 FR 68971) because in the 1990 Clean Air Act amendments, Congress directed EPA to stop regulating radionuclide emissions from NRC licensed facilities if EPA determines that the NRC regulatory program protects the public health with an ample margin of safety. After careful review, EPA determined that public health would be protected with an ample margin of safety by NRC's program. Subpart H does not require an ICR because it covers Federal facilities, which are not subject to the Paperwork Reduction Act. The existing subpart I of the radionuclide NESHAP now only applies to non-DOE federal facilities not licensed by NRC. The non-DOE federal facilities not licensed by NRC, namely, DoD facilities, are expected to have emissions below 1% of the standards and are therefore not subject to the reporting requirements.

Information collected is used by EPA to ensure that public health continues to be protected from the hazards of airborne radionuclides by compliance with these standards. If the information were not collected, it is unlikely that a violation of these standards would be identified and, thus, there would be no corrective action initiated to bring the facilities back into compliance. Compliance is demonstrated through emission testing and/or dose calculation. All facilities are required to calculate, monitor, and maintain their records for 5 years. The rationale for the 5 year record keeping requirement is from 40 CFR part 61, Section 61.95. In some cases, they also report their results to EPA.

## **2. NEED FOR AND USE OF THE COLLECTION**

### (a) Need/Authority for the Collection

In the context of the Clean Air Act (42 USC 1857), Section 114 authorizes the

Administrator of EPA to require any person who owns or operates any emission source or who is subject to any requirements of the Act to:

- Establish and maintain records
- Make reports, install, use, and maintain monitoring equipment or method
- Sample emissions in accordance with EPA-prescribed locations, intervals and methods
- Provide information as may be requested

(b) Practical Utility/Users

EPA's regional offices use the information collected to ensure that public health continues to be protected from the hazards of radionuclides by compliance with health based standards.

EPA's compliance monitoring activities vary widely. EPA could issue a letter requesting information about compliance or could conduct a full scale investigation, including on-site inspections.

When EPA first learns of a compliance problem, EPA attempts to remedy the problem by holding informal discussions with the owner/operator of the source. If it is not possible to remedy the problem informally, formal action is taken. EPA's Clean Air Act Compliance Enforcement Guidance Manual identifies the Agency's informal and formal enforcement operating procedures.

### **3. NON-DUPLICATION, CONSULTATIONS AND OTHER COLLECTION CRITERIA**

(a) Non-duplication

In accordance with 40 CFR Part 61, the specific information requested by this notice is not

currently collected by any other office within EPA or any other governmental agency.

(b) Public Notice Required Prior to ICR Submission to OMB

On July 31, 2015 (80 FR 45655), EPA requested comments on specific aspects of this ICR, with a 60 day comment period which closed on September 30, 2015. EPA received one comment.

(c) Consultations

In developing the regulations, EPA gathered extensive background information on the affected facilities. In addition to background information collected from the regulated sources, public comments were received during the rulemaking process and they are contained in the public docket. Since the rules were promulgated, there have been opportunities for dialogue between EPA and affected facilities which have resulted in changes to the rules, memorandums of understanding, and rescissions. EPA contacted Air Division and/or Radiation Protection staff in all EPA Regions to obtain latest tally for the number of facilities subjected to the reporting requirements. In the preparation of the 2015 ICR, EPA contacted NRC and assumes that the information obtained then is still current. As a result of these consultations and the provision in the Clean Air Act Amendments, EPA was able to eliminate duplication of effort between EPA and NRC in instances where EPA determined that the NRC program could provide protection of the public health with an ample margin of safety.

(d) Effects of Less Frequent Collection

All reporting is annually or less frequent than annually.

(e) General Guidelines

This ICR meets OMB's collection guidelines, the Agency received one comment during the

comment period which ended September 30, 2015, and does not duplicate another collection.

(f) Confidentiality

This section does not apply because this ICR does not request information of confidential nature.

(g) Sensitive Questions

This section is not applicable because this ICR does not request sensitive information.

**4. THE RESPONDENTS AND THE INFORMATION REQUESTED**

(a) Respondents NAICS Codes

The NAICS Codes associated with the activity of the respondents are:

Elemental Phosphorous - 325180 (previously designated as 325188)

Phosphogypsum Stacks - 212392

Underground Uranium Mines - 212291

Uranium Mill Tailings - 212291

(b) Information Requested

Descriptions of the reporting requirements are listed separately for each subpart.

**Reporting**

**Subpart B - Underground Uranium Mines**

The mine owner or operator shall annually calculate and report the results of the compliance calculations and the input parameters used in making the calculation. The compliance calculations include using 40 CFR part 61, Appendix B, Method 115 to calculate the source terms used in the program COMPLY-R which calculates the dose. The report shall cover

the emissions of a calendar year and shall be sent to EPA by March 31 of the following year.

Each report shall also include the following information:

- (1) The name and location of the mine (including latitude and longitude),
- (2) The name of the person responsible for the operation of the facility and the name of the person preparing the report (if different),
- (3) The results of the emissions testing conducted and the dose calculated using the procedures in Section 61.23,
- (4) A list of the stacks or vents or other points where radioactive materials are released to the atmosphere, including their location, diameter, flow rate, effluent temperature and release height,
- (5) A description of the effluent controls that are used on each stack, vent, or other release point and the effluent controls used inside the mine, and an estimate of the efficiency of each control method or device,
- (6) Distances from the points of release to the nearest residence, school, business or office and the nearest farms producing vegetables, milk and meat,
- (7) The values used for all other user-supplied input parameters for the computer model and the source of these data,
- (8) Each report shall be signed and dated by a corporate officer in charge of the facility and contain the following declaration immediately above the signature line: "I certify under penalty of law that I have personally examined and am familiar with the information submitted herein and based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the submitted information is true,

accurate and complete. I am aware that there are significant penalties for submitting false information including the possibility of fine and imprisonment. See 18 U.S.C. 1001."

In order to complete the Subpart B reporting requirements respondents will:

- a. read and understand the regulatory provision,
- b. perform radon-222 emission measurements as required in Appendix B, Method 115,
- c. perform data analysis including Method 115 source term calculations and COMPLY-R dose calculation,
- d. prepare and submit report.

For recordkeeping requirements, all facilities are required to calculate, monitor, and maintain their records for five years and upon request be made available for inspection by the Administrator, or his/her authorized representative. (See Table B)

### **Subpart K - Elemental Phosphorus Plants**

Each owner or operator of an elemental phosphorus plant shall test emissions from the plant annually according to the procedures in Section 61.123 and using the test methods in Section 61.125.

Each owner or operator of an elemental phosphorus plant shall furnish the Administrator with a written report on the results of the emission test within 60 days of conducting the test.

The report must provide the following information:

- (1) The name and location of the facility (including latitude and longitude),
- (2) The name of the person responsible for the operation of the facility and the name of

the person preparing the report (if different),

(3) A description of the effluent controls that are used on each stack, vent or other release point and an estimate of the efficiency of each device,

(4) The results of the testing, including the results of each sampling run completed,

(5) The values used in calculating the emissions and the source of these data,

(6) Each report shall be signed and dated by a corporate officer in charge of the facility and contain the following declaration immediately above the signature line: "I certify under penalty of law that I have personally examined and am familiar with the information submitted herein and based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the submitted information is true, accurate and complete. I am aware that there are significant penalties for submitting false information including the possibility of fine and imprisonment. See, 18 U.S.C. 1001."

In order to complete these reporting requirements respondents will:

- a. read and understand the regulatory provision,
- b. perform the emission monitoring and test procedures in Section 61.125,
- c. perform data analysis including calculation of annual emission rate,
- d. prepare and submit the report to EPA.

For recordkeeping requirements, all facilities are required to calculate, monitor, and maintain their records for five years and upon request be made available for inspection by the Administrator, or his/her authorized representative. (See Table K)



## **Subpart R - Phosphogypsum Stacks**

Sixty days following the date at which a stack becomes an inactive stack the owners or operators of the inactive phosphogypsum stack shall test the stack in accordance with the procedures described in 40 CFR part 61, Appendix B, Method 115. This is a one-time report. However, if an owner or operator removes phosphogypsum from an inactive stack, the owner shall test the stack once a year for every year in which phosphogypsum is removed from the stack.

EPA Regional Offices' Air Program contacts shall be notified at least 30 days prior to an emission test so that EPA may, at its option, observe the test. Ninety days after the testing is required, the owner or operator shall provide EPA with a report detailing the actions taken and the results of the radon-222 flux testing. Each report shall also include the following information:

- (1) The name and location of the facility,
- (2) A list of the stacks at the facility including the size and dimensions of the stack,
- (3) The name of the person responsible for the operation of the facility and the name of the person preparing the report (if different),
- (4) A description of the control measures taken to decrease the radon flux from the source and any actions taken to insure the long term effectiveness of the control measures, and
- (5) The results of the testing conducted, including the results of each measurement,
- (6) Each report shall be signed and dated by a corporate officer in charge of the facility and contain the following declaration immediately above the signature line: "I certify

under penalty of law that I have personally examined and am familiar with the information submitted herein and based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the submitted information is true, accurate and complete. I am aware that there are significant penalties for submitting false information including the possibility of fine and imprisonment. See 18 U.S.C. 1001."

Also, the owner or operator of the stack from which the phosphogypsum is removed shall determine annually the average radium-226 concentration at the location in the stack from which the phosphogypsum will be removed as provided by Section 61.207. Each distributor, retailer, or reseller who distributes phosphogypsum for use in agriculture shall prepare certification documents which conform to the requirements of Section 61.208.

The owner or operator of a stack from which phosphogypsum will be removed and distributed in commerce pursuant to Section 61.204, Section 61.205, or Section 61.206 shall prepare a certification document for each quantity of phosphogypsum which is distributed in commerce which includes:

- (1) The name and address of the owner or operator,
- (2) The name and address of the purchaser or recipient of the phosphogypsum,
- (3) The quantity (in pounds) of phosphogypsum sold or transferred,
- (4) The date of sale or transfer,
- (5) The average radium-226 concentration, in pCi/g, of the phosphogypsum to Section 61.207, and
- (6) The signature of the person who prepared the certification.

Each distributor, retailer, or reseller who purchases or receives phosphogypsum for

subsequent resale or transfer shall prepare a certification document for each quantity of phosphogypsum which is resold or transferred which includes:

- (1) The name and address of the owner or operator,
- (2) The name and address of the purchaser or recipient of the phosphogypsum,
- (3) The quantity (in pounds) of phosphogypsum sold or transferred,
- (4) The date of resale or transfer,
- (5) A description of the intended end use for the phosphogypsum,
- (6) A copy of each certification document which accompanied the phosphogypsum at the time it was purchased or received by the distributor, retailer, or reseller, and
- (7) The signature of the person who prepared the certification. Submission of certification documents to EPA is not a requirement.

In order to complete these reporting requirements respondents will:

- a. read and understand the regulatory provision,
- b. perform the radon flux testing in Section 61.203,
- c. perform radium-226 sampling and measurement procedures in Section 61.207 (if required),
- d. perform data analysis including Method 115 radon flux or radium-226 concentration calculations,
- e. prepare and submit the report and prepare a certification document if required.

For record keeping requirements, all facilities are required to calculate, monitor, and maintain their records for five years and upon request be made available for inspection by the Administrator, or his/her authorized representative. (See Tables R1 and R2. Table R-1 reflects

what stacks are subject to the initial flux monitoring required Section 61.203 at closure. Table R-2 reflects required flux monitoring and/or Ra-226 sampling required if phosphogypsum is removed from a closed stack as required by Section 61.207.)

### **Subpart W - Uranium Mill Tailings**

The owners or operators of operating existing mill impoundments shall report the results of the compliance calculations required in Section 61.253 and the input parameters used in making the calculation or each calendar year shall be sent to EPA by March 31 of the following year. Each report shall also include the following information:

- (1) The name and location of the mill,

- (2) The name of the person responsible for the operation of the facility and the name of the person preparing the report (if different),
- (3) The results of the testing conducted, including the results of each measurement,
- (4) Each report shall be signed and dated by a corporate officer in charge of the facility and contain the following declaration immediately above the signature line: "I certify under penalty of law that I have personally examined and am familiar with the information submitted herein and based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the submitted information is true, accurate and complete. I am aware that there are significant penalties for submitting false information including the possibility of fine and imprisonment. See 18 U.S.C. 1001."

In order to complete these reporting requirements respondents will:

- a. read and understand the regulatory provision,
- b. perform testing required in 40 CFR part 61, Appendix B, Method 115,
- c. perform data analysis including Method 115 radon flux calculations,
- d. prepare and submit the report to EPA.

For record keeping requirements, all facilities are required to calculate, monitor, and maintain their records for five years and upon request be made available for inspection by the Administrator, or his/her authorized representative. (See Table W)

### **Record Keeping**

The record keeping requirements of each subpart are similar and have been summarized in the paragraph below.

The owner or operator of the facility must maintain records documenting the source of

input parameters including the results of all measurements upon which they are based, the calculations and/or analytical methods used to derive values for input parameters, and the procedure used to determine compliance. This documentation should be sufficient to allow an independent auditor to verify the accuracy of the determination made concerning the facility's compliance with the standard. These records must be kept at the mill or facility for at least five years and, upon request, be made available for inspection by the Administrator, or his/her authorized representative.

**5. THE INFORMATION COLLECTED -- AGENCY ACTIVITIES, COLLECTION METHODOLOGY, AND INFORMATION MANAGEMENT**

(a) Agency Activities

Information being collected is pursuant to Federal regulation. Agency activities consist of reviewing owner or operator test reports and maintaining files. EPA contacted all ten EPA Regional Offices to get the total number of mining facilities subjected to NESHAPs monitoring and reporting requirements at 40 CFR Part 61, Subparts B, K R and W. The total number of facilities has increased from 47 to 52 between 2012 and 2015. There are two Subpart B, one Subpart K, 45 Subpart R and four Subpart W facilities subjected to the reporting requirements.

(b) Collection Methodology and Management

The Office of Radiation and Indoor Air and the EPA regional offices have planned and allocated resources for the efficient and effective management and use of this information.

Records must be maintained documenting the source of input parameters including the results of all measurements upon which they are based, the calculations and/or analytical methods used to derive values for input parameters, and the procedure used to determine

effective dose equivalent. This documentation should be sufficient to allow an independent auditor to verify the accuracy of the determination made concerning the facility's compliance with the standard. These records must be kept at the site of the facility for at least five years and, upon request, be made available for inspection by the Administrator, or the Administrator's authorized representative.

The Agency has determined that the annual report review and periodic on site inspection is the most effective method to insure compliance. EPA regional office staff review facility annual reports to determine if compliance with the regulatory standards are being maintained. Verification of data is accomplished by recalculation of dose using computer models and conducting site inspections or witnessing an emission test.

(c) Small Entity Flexibility

None of the regulations covered by this ICR are applicable to small entities.

(d) Collection Schedule

For some subparts, annual reports are required to provide yearly certification of compliance with a health based standard; therefore, less frequent reporting was not considered an option to reduce burden because of the yearly stipulation in the rule. However, for other subparts (such as subpart R), it was determined during rulemaking that less frequent reports were adequate to protect public health.

## **6. ESTIMATING THE BURDEN AND COST OF THE COLLECTION**

Burden and costs estimates have been calculated separately for each subpart. Respondent labor rates are based on 'mean' values from the 2014 data of the US Department of Labor, Bureau of Labor Statistics (BLS) for the mining industrial sector. These national industry-

specific occupational employment and wage estimates are calculated with data collected from employers of all sizes, in metropolitan and non-metropolitan areas in every State and the District of Columbia, in NAICS 212200 - Mining (except Oil and Gas) and NAICS 325100 – Basic Chemical Manufacturing. The hourly rates for three labor categories reported for the above two NAICS codes were obtained from the 2014 Occupational Employment Statistics published by the Bureau of Labor Statistics (BLS). The reported rates were adjusted for overhead costs by multiplying with a factor of 1.5 to estimate the loaded hourly labor rate. This loaded hourly labor rate for 2014 then was increased by 1% to account for inflation from 2014 to 2015. The labor key is as follows: Management (Mgmt) (\$104/hr); Technical (Tech) was based on the mean salary for “all production operations” (\$62/hr) in the mining sector which includes mining engineers, environmental engineers and geologists. Clerical (Cler) (\$27/hr) was based on the hourly labor rates for secretary and information clerk in the mining sector in the 2014 BLS data.

The tables representing each subpart are listed below with their reporting requirement information. (Note: Subpart R has 2 tables; Table 1 represents the 14 stacks required to complete a one-time report and Table 2 represents the 10 stacks that potentially have to conduct radon flux testing every year if phosphogypsum is removed from the stacks.)

## **B -- Underground Uranium Mines**

In order to complete Subpart B reporting requirements respondents will:

- a. read and understand the regulatory provision,
- b. perform radon-222 emission measurements as required in 40 CFR part 61, Appendix B, Method 115,
- c. perform data analysis including Method 115 source term calculations and dose calculation using an approved model for concentration calculations,



- d. prepare and submit report.
- The estimated capital/start-up cost includes the monitoring equipment needed to perform Method 115 testing for one mine.
- Capital/start-up burden includes understanding regulatory provisions and installation of equipment for emission testing.
- Estimated annual costs related to testing include calibration, and repairs costs.
- Estimated annual burden hours collecting emission data from monitoring equipment and performing data analysis and calculations, report preparation and data management.
- Based on reports received during the current reporting period, only two mines at this time are mechanically venting and required to submit a report.

**Table B - Information Collection Activity**

**Hours and Costs for Underground Uranium Mines**

**Total Hours and Costs**

<b>Subpart B-- Underground Uranium Mines</b>	<b>Manager \$104/hour</b>	<b>Technica l \$62/hour</b>	<b>Clerical \$27/hour</b>	<b>Respond. hours/ year</b>	<b>Labor cost/year/R espond.</b>	<b>Capital/ startup cost</b>	<b>O &amp; M Cost</b>	<b>Number of Respondents</b>	<b>Total hours/ year</b>	<b>Tot Labor cost/ year</b>
<b>Reporting</b>										
Read and understand the regulatory provision (Mgmt)	10			10	\$1,040			2	20	\$2,080
Perform emission monitoring (Tech.)		160		160	\$9,920		\$10,600	2	320	\$19,840
Perform data analysis (Technical)		40		40	\$2,480			2	80	\$4,960
Prepare report (Mgmt)	10			10	\$1,040			2	20	\$2,080
<b>Record Keeping</b>										
File and maintain data (Clerical)			10	10	\$270			2	20	\$540
<b>TOTAL</b>	20	200	10	230	\$14,750		\$10,600	2	460	\$29,500

**Assumptions:**

1. **Capital/startup cost: = \$0**
2. **Annual cost (O & M): 2 facilities x \$5,300 = \$10,600**

## **K--Elemental Phosphorus Plants**

In order to complete these reporting requirements respondents will:

- a. read and understand the regulatory provision,
- b. perform the emission monitoring and test procedures in Section 61.125,
- c. perform data analysis including calculation of annual emission rate,
- d. prepare and submit the report to EPA.

- It is estimated that 1 facility will complete these reporting requirements.

- The estimated cost for a contractor to complete testing is \$5,559.

## **R- Phosphogypsum**

In order to complete these reporting requirements respondents will:

- a. read and understand the regulatory provision,
- b. perform the radon flux testing in Section 61.203,
- c. perform radium-226 sampling and measurement procedures in Section 61.207 (if required),
- d. perform data analysis including Method 115 radon flux or radium-226
- e. prepare and submit the report and certification document if required.

- It is estimated that the testing materials for 300 flux measurements and the analysis is obtained from a contract source at a cost of \$37/measurement.

- It is estimated that it will take four days for two people to place, collect and ship 300 samples to a testing lab.

**Table K - Information Collection Activity**

**Hours and Costs for Elemental Phosphorus**

**Total Hours and Costs**

<b>Subpart K-- Elemental Phosphorus Plants</b>	<b>Manager \$104/hour</b>	<b>Technical \$62/hour</b>	<b>Cleric al \$27/ hour</b>	<b>Respon. hours/ year</b>	<b>Labor cost/year</b>	<b>Capital/ startup cost</b>	<b>O &amp; M Cost</b>	<b>Number of Respondents</b>	<b>Total hours/ year</b>	<b>Total Labor cost/ year</b>
<b>Reporting</b>										
Read and understand the regulatory provision (Mgmt)	10			10	\$1,040			1	10	\$1,040
Perform emission monitoring (Tech.)		240		240	\$14,880		\$5,300	1	240	\$14,880
Perform data analysis (Technical)		8		8	\$496			1	8	\$496
Prepare report (Mgmt)	10			10	\$1,040			1	10	\$1,040
<b>Record Keeping</b>										
File and maintain data (Clerical)			10	10	\$270			1	10	\$270
<b>TOTAL</b>	20	248	10	278	\$17,726		\$5,300	1	278	\$17,726

**Assumptions:**

**1. Capital/start up cost: 0 facilities x \$0 = \$0**

**2. Annual cost (O & M): 1 facilities x \$5,300 = \$5,300**

**Table R1 - Information Collection Activity**

**Hours and Costs for Phosphogypsum Stack**

**Total Hours and Costs**

<b>Subpart R-- Phosphogypsum Stacks</b>	<b>Manager \$104/ hour</b>	<b>Technica l \$62/hour</b>	<b>Clerical \$27/ hour</b>	<b>Respond . Hours/ year</b>	<b>Labor cost/year/ Respond.</b>	<b>Capital / startup cost</b>	<b>O &amp; M Cost</b>	<b>Number of Respondents</b>	<b>Total hours/ year</b>	<b>Tot Labor cost/ year</b>
<b>Reporting</b>										
Read and understand the regulatory provision (Mgmt)	10			10	\$1,040			14	140	\$14,560
Perform emission monitoring (Tech.)		64		64	\$3,968		\$275,800	14	896	\$55,552
Perform data analysis (Technical)		12		12	\$744			14	168	\$10,416
Prepare report (Mgmt)	10			10	\$1,040			14	140	\$14,560
<b>Record Keeping</b>										
File and maintain data (Clerical)			10	10	\$270			14	140	\$3,780
<b>TOTAL</b>	20	76	10	106	\$7,062	\$0	\$275, 800	14	1,484	\$98,868

**Assumptions:**

- 1. Capital/start up cost: 45 facilities x \$0 = \$0; (Table 2) 10 facilities x \$0 = \$0**
  - 2. Annual cost (O & M): 14 facilities x \$19,700 = \$275,800; (Table R2) 10 facilities x \$885 x 2 = \$17,700**
- Total O & M for Tables R1 & R2 = \$293,500**

**Table R2 - Information Collection Activity**

**Hours and Cost Per Respondent**

**Total Hours and Costs**

<b>Subpart R-- Phosphogypsum Stacks</b>	<b>Manager \$104/ hour</b>	<b>Technical \$62/hour</b>	<b>Clerical \$27/ hour</b>	<b>Respond. Hours/ year</b>	<b>Labor cost/year/R espond.</b>	<b>Capital/ startup cost</b>	<b>O &amp; M Cost</b>	<b>Number of Respond.</b>	<b>Total hours/ year</b>	<b>Tot Labor cost/ year</b>
<b>Reporting</b>										
Read and understand the regulatory provision (Mgmt)	10			10	\$1040			10	100	\$10,400
Perform radon flux testing (Tech.)		64		64	\$3968		\$8,850	10	640	\$39,680
Perform radium-226 sampling and measurement procedures (Tech.)		20		20	\$1,240		\$8,850	10	200	\$12,400
Prepare data analysis (Tech.)		12		12	\$744			10	120	\$7,440
Prepare report and certification papers (Mgmt)	10			10	\$1,040			10	100	\$10,400
<b>Record Keeping</b>										
File and maintain data (Clerical)			10	10	\$ 270			10	100	\$2,700
<b>TOTAL</b>	20	96	10	126	\$8,302		\$17,700	10	1,260	\$83,020

**Assumptions:**

**1. Capital/start up cost: 45 facilities x \$0 = \$0; (Table 2) 10 facilities x \$0 = \$0**

**2. Annual cost (O & M): 14 facilities x \$19,700 = \$275,800 (Table R2) 10 facilities x \$885 x 2 = \$17,700.**

**Total O & M for Tables R1 & R2 = \$ 293,500**

- It is estimated that the testing materials for 300 flux measurements and the analysis is obtained from a contract source at a cost of \$37/measurement.
- It is estimated that it will take four days for two people to place, collect and ship 300 samples to a testing lab.
- It is estimated that out of 45 stacks, those that have not closed yet (14) may require to complete this one-time report.
- It is estimated that 10 phosphogypsum stacks may have to conduct radon flux testing every year if phosphogypsum is removed from the stack. For these stacks, the radium-226 concentration must also be determined and included in certification papers. Radon flux measurements for these sites will be as discussed above. Section 61.207 requires a minimum of 30 samples from each area where phosphogypsum is being removed from the stack. Additional sampling is required where the concentrations approach 10 pCi/g Ra-226. Therefore, we conservatively estimate that 100 samples per stack will be necessary to document radium-226 concentrations and that radium analysis will be at \$100 per sample from a contract source. It is estimated that it will take two people three days to collect, prepare and ship the samples.

### **W--Uranium Mill Tailings**

In order to complete these reporting requirements respondents will:

- a. read and understand the regulatory provision,
- b. perform radon flux testing required in 40 CFR part 61, Appendix B, Method 115,
- c. perform data analysis including Method 115 radon flux calculations,
- d. prepare and submit the report to EPA.



- It is estimated that the testing materials for 300 measurements and the analysis is obtained from a contract source at a cost of \$37/measurement.
- It is estimated that it will take one day for two people to place 300 canisters and one for two people to collect the canisters and ship them to a testing lab.
- It is estimated that 4 facilities will file a report annually.
- The estimated cost for a contractor to complete the testing is \$2,834.

**Table W - Information Collection Activity**

**Hours and Cost Per Respondent**

**Total Hours and Costs**

<b>Subpart W-- Uranium Mill Tailings Piles</b>	<b>Manager \$104/hour</b>	<b>Technical \$62/hour</b>	<b>Clerical \$27/hour</b>	<b>Respond. Hours/ year</b>	<b>Labor cost/year/ Respond.</b>	<b>Capital/ startup cost</b>	<b>O &amp; M Cost</b>	<b>Number of Respond.</b>	<b>Total hours/ year</b>	<b>Tot Labor cost/ year</b>
<b>Reporting</b>										
Read and understand the regulatory provision (Mgmt)	10			10	\$1,040			4	40	\$4,160
Perform radon flux testing (Tech.)		32		32	\$1,984		\$11,200	4	128	\$7,936
Perform data analysis (Technical)		12		12	\$ 744			4	48	\$2,976
Prepare report (Mgmt)	10			10	\$1,040			4	40	\$4,160
<b>Record Keeping</b>										
File and maintain data (Clerical)			10	10	\$ 270			4	40	\$1,080
<b>TOTAL</b>	20	44	10	74	\$5,078		\$11,200	4	296	\$20,312

**Assumptions:**

- 1. Capital/start up cost: 4 facilities x \$0 = \$0**
- 2. Annual cost (O & M): 4 facilities x \$2,800 = \$11,200**

**SUMMARY OF BURDEN ESTIMATE FOR RESPONDENTS**

No of Respondents	Subpart	Capital/Start-up Cost	(O & M) Cost	Annual Burden Hours	Annual Costs
2	B	\$0.00	\$10,600	460	\$29,500
1	K	\$0.00	\$5,300	278	\$17,726
14*	R1 R2	\$0.00 \$0.00	\$275,800 \$ 17,700	1,484 1,260	\$98,868 \$83,020
4	W	\$0.00	\$11,200	296	\$20,312
21	<b>TOTALS</b>	\$0.00	\$ 320,600	3,778	\$249,426

\* Assumes that the potential for all operational stacks to close and then potentially remove Ra-226. This is a conservative assumption, as only one stack currently removes Ra-226 for agricultural use.

Average annual burden per response:  $3,778/21 = 179.9$ . For capital with a 20-year life, and assuming 5% discount rate, the annualized cost is 8.02% of the capital cost.

**Total Annualized capital/start up cost:  $\$0 \times 8.02\% = \$0$**

**Total Annualized Capital and O&M Costs:  $\$0 + \$320,600 = \$320,600$ .**

**ESTIMATED AGENCY BURDEN AND COST**

The burden to the EPA is only for reviewing the reports submitted by the regulated community to ensure that emissions and dose are within the limits set by the regulations. The main burden is on the regulated community as they have to monitor emissions, compile the data, and submit the necessary reports for compliance purposes. The estimated agency burden and costs are as shown

in the table below. Agency salaries were found in 2015 General Schedule Salary Table. The data for review of reports for compliance was based on the salary scale for GS-13, step 5 (Tech), with a multiplier of 1.5 to include overhead; this resulted in \$60/hr. For the Clerical category, the salary scale for a GS-9, step 5 (Cler) was used with a multiplier of 1.6 to account for overhead; this resulted in \$35/hr.

**SUMMARY OF BURDEN ESTIMATE FOR THE AGENCY**

<b>AGENCY</b>	Capital/Start-Up Burden Hours	Capital/Start-up Cost	Annual Burden Hrs per Report	Annual Costs per Report
Review reports for compliance verification (Tech)			6@ \$60/hr	\$360
File reports (Cler)			4@ \$35/hr	\$140
SUB-TOTAL	0	0	10	\$500
<b>TOTAL</b> for 21 respondents			210	\$105,000

**Burden Statement:** The annual public reporting and record keeping burden for this collection of information is estimated to average 180 hours per response. Burden means the total time, effort, or financial resources expended by persons to generate, maintain, retain, or disclose or provide information to or for a Federal agency. This includes the time needed to review instructions; develop, acquire, install, and utilize technology and systems for the purposes of collecting, validating, and verifying information, processing and maintaining information, and disclosing and providing information; adjust the existing ways to comply with any previously applicable instructions and requirements; train personnel to be able to respond to a collection of information; search data sources; complete and review the collection of information; and transmit or otherwise disclose the information. An agency may not conduct or sponsor, and a

person is not required to respond to, a collection of information unless it displays a currently valid OMB control number. The OMB control numbers for EPA's regulations are listed in 40 CFR part 9 and 48 CFR chapter 15.

To comment on the Agency's need for this information, the accuracy of the provided burden estimates, and any suggested methods for minimizing respondent burden, including the use of automated collection techniques, EPA has established a public docket for this ICR under Docket ID EPA-OAR-2005-0017, which is available for public viewing at the Office of Indoor Air and Radiation Docket in the EPA Docket Center (EPA/DC), EPA West, Room B102, 1301 Constitution Ave., NW, Washington, DC. The EPA Docket Center Public Reading Room is open from 8:30 a.m. to 4:30 p.m., Monday through Friday, excluding legal holidays. The telephone number for the Reading Room is (202) 566-1744, and the telephone number for the Office of Indoor Air and Radiation Docket is (202) 566-1742. An electronic version of the public docket is available through [www.regulations.gov](http://www.regulations.gov).

Also, you can send comments to the Office of Information and Regulatory Affairs, Office of Management and Budget, 725 17th Street, NW, Washington, DC 20503, Attention: Desk Officer for EPA. Please include the EPA Docket ID EPA-HQ-OAR-2003-0085 and OMB Control Number 2060-0191 in any correspondence.