DR template reviews – Assessment of NIOSH approach and findings versus observations

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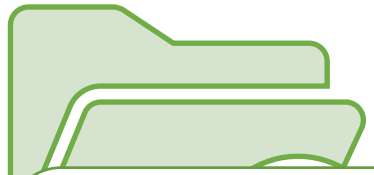
Background information

- In February 2023, SPR began tasking SC&A with the review of NIOSH's DR methodology documents and DR templates
- Using the current review protocol (slide 3), SC&A has reviewed two sites:
  - Amchitka Island Nuclear Explosion Site (December 18, 2023)
  - Albuquerque Operations Office (AOO) (October 25, 2023)
- SC&A previously reviewed Peek Street Facility (January 29, 2019)
- SC&A presented our reviews of Amchitka and AOO at the March 14, 2024, SPR meeting
- As a result of discussions at SPR meeting, SC&A held an internal meeting to assess:
  - NIOSH's DR template approach
  - appropriateness of identifying findings as opposed to observations

SC&A DR methodology & template review

Review:

- Completeness of data sources
- Consistency between DR guidance and data sources
- Technical accuracy of guidance
- Scientific basis and adequacy of data



Compare the DR methodology document to the DR template for consistency

Review four to five cases adjudicated using the DR methodology guidance and template and track professional judgements

DR methodology document and template examples

- Since most Board members have not seen the DR methodology document and DR template, SC&A sent an email showing an example of these documents for Amchitka
- For this site, the DR methodology document consists of two pages
- The DR template is a 22-page DR report with color-coding to assist the dose reconstructor in completing the reconstruction

NIOSH's philosophy on performing DRs for claims where DR templates are employed

- Hierarchy of documents:
  - DR report is the final document
  - Current template is most up-to-date guidance
  - DR methodology document may be used to supplement template guidance
- DR templates are not technical basis documents (TBDs) and will likely not fit the needs for all potential claims at a specific site
- Use of templates typically requires professional judgement that should be justified and documented in the DR report

SC&A's concerns with NIOSH's approach to DR for sites with DR templates

- Each DR should be equal across all sites, whether large or small, and should receive the same amount of accountability, clarity, traceability, and scrutiny
- For consistency and auditing purposes, the DR report for a specific claim cannot be the final approved document
- NIOSH needs to identify one official DR instruction document, which is maintained current and used for a small site, i.e., a document equivalent to a large site TBD
- SC&A understands that case-specific methodology may be needed for a single claim at a small site, but when there is a second claim, the DR should mirror the methods of the first with deviations clearly documented
- Does NIOSH review each previously-adjudicated claim at a site with DR template guidance to ensure all claims were performed consistently?

Findings versus observations in reviewing DR claims and NIOSH technical guidance documents

When reviewing DR claims under the SDRR and SPR:

- Findings are generally identified when the dose reconstructor did not follow the appropriate technical guidance or doses are calculated incorrectly
- Observations include:
  - Inability of SC&A to reproduce NIOSH's doses within a reasonable range
  - Inconsistencies between DR report statements and actual data used or derived
  - Clarity needed to understand NIOSH's assumptions or methodology

When reviewing technical guidance documents under the SPR:

- Findings are generally identified when SC&A does not agree with NIOSH's DR methodology or assumptions
- Observations include:
  - Inconsistencies in technical guidance documents
  - Recommendations for improvements/clarity in technical guidance documents
  - Incorrect reference

Proposed SC&A approach for identifying findings and observations for claims using DR templates

- If the DR template is the official guidance document, SC&A will review that document for technical accuracy
- Identification of findings and observations will be consistent with SC&A's review of other technical guidance documents
- If the DR template is the official guidance document, discrepancies between the DR template and DR guidance document will generally be considered observations unless SC&A concludes that the difference may lead to an error in the DR
- When reviewing associated cases, SC&A's findings and observations will be consistent with our SCDRR and SPR DR reviews

Questions?