1.0 Description

On 11/24/2004 the external section of the Technical Basis Document (TBD) for the Oak Ridge Gaseous Diffusion Plant (K-25) was issued (ORAUT-TKBS-0009-6). This TBD contained a tabulation of the dose received by K-25 monitored workers that was to be used as co-worker dose for unmonitored workers. On 5/31/2005 ORAUT-OTIB-0026 was issued which increased the external co-worker values to account for missed dose. Some of these values were decreased in Revision 00 Page Change 1 to this document issued 7/29/2005. This document was again revised with Page Change 2 on 11/15/2006. This revision incorporated provisions of ORAUT-OTIB-0052 for unmonitored construction trades workers potentially exposed to radiation. These provisions however, were in place since ORAUT-OTIB-0052 was issued on 8/31/2006.

Other revisions have been made to documents pertaining to K-25 but these revisions did not affect the dose reconstruction methodology.

2.0 Issue Evaluation

The revisions to the external co-worker model would affect any claim completed before 5/21/2005 that used this data. Since this data was not available until 11/24/2004, cases completed prior to that do not need to be evaluated.

ORAUT-OTIB-0052 provides a method to estimate the external dose for construction trade workers who were unmonitored but likely exposed to greater than ambient radiation levels. The method is to multiply the external co-worker dose by 1.4. Therefore, the
issuance of ORAUT-OTIB-0052 on 8/31/2006 has the potential to affect any construction trade worker claims completed with external co-worker data prior to the date of 8/31/2006. Since this co-worker data was not available until 11/24/2004, cases completed prior to that would have been evaluated ambient levels of radiation or had dosimetry data and are therefore, not affected.

3.0 Plan for Resolution or Corrective Action
There were 432 claims completed by NIOSH between 11/24/2004 and 8/31/2006 that resulted in a POC less than 50%. This does not include claims that may have been submitted in that time frame but subsequently returned to NIOSH for any reason. All these claims will be reviewed by NIOSH to determine if external co-worker data was used. NIOSH will request that DOL return those claims completed before 5/21/2005 determined to have been completed using external co-worker data. NIOSH will also request the return of those claims completed with external co-worker data between 5/21/2005 and 8/31/2006 if they are deemed a Construction Trades worker. DOL will be provided with documentation for the remaining claims indicating the claim did not meet these criteria.