

VALIDATION

? Other, defined in COMMENTS column(historical)
 = Validated result, which is detected and unqualified
 E E= J-The analyte was positively identified; the associated numerical value is the approximate concentration of the analyte in the sample.
 EJ E= J-The analyte was positively identified; the associated numerical value is the approximate concentration of the analyte in the sample.
 J The analyte was positively identified; the associated numerical value is the approximate concentration of the analyte in the sample.
 N The analysis indicates the presence of an analyte for which there is presumptive evidence to make a "tentative identification."
 NJ Presumptively present at an estimated quantity (use with TICS only).
 U The analyte was analyzed for, but was not detected above the reported sample quantitation limit.
 UJ Analyte, compound or nuclide not detected above the reported detection limit, and the reported detection limit is approximated due to quality deficiency.
 X Not validated; Refer to the RSLTQUAL field for more information
 XV Not validated; Refer to the RSLTQUAL field for more information

RSLTQUAL

Laboratory added no qualification
 * ANION/METAL/RADS/OTHIN/TCLPMET: Duplicate analysis was not within control limits; DI FURA/HERB/PPCB/SVOA/TCLPHRB/TCLPVOA/TCLPSVL/TCLPPST/VOA: Surrogate values outside of control limits; ALL ANALYSIS TYPES: Duplicate analysis not within control limits (pre-05/30/03 definition)
 < Numerical value reported was less than the requested reporting limit (e.g. MDL, MDA, RRL, IDL).
 B ANION/METAL/OTHIN/TCLPMET/WETCHEM: Value was less than the CRDL (Contract Required Detection Limit) or RRL (Required Reporting Limit) specified, but greater than or equal to the IDL (Instrument Detection Limit)/MDL (Method Detection Limit); DI FURA/HERB/PPCB/SVOA/TCLPHRB/TCLPVOA/TCLPSVL/TCLPPST/VOA/OTHOR: Compound was found in the associated blank as well as in the sample; DI FURA/HERB/PPCB/RADS/SVOA/VOA: Found in blank/sample (pre-05/30/03 definition)
 E ANION/METAL/OTHIN/TCLPMET: Estimated, matrix interference; DI FURA/HERB/OTHOR/PPCB/SVOA/TCLPHRB/TCLPVOA/TCLPSVL/TCLPPST/VOA: Concentration exceeds calibration range of the instrument
 J ALL ANALYSIS TYPES: Estimated Quantitation; ANION/DI FURA/HERB/PHYS/PPCB/RADS/SVOA/VOA: Estimated, TIC (Tentatively Identified Compound) or < specified detection limit (pre-05/30/03 definition)
 N ANION/METAL/OTHIN/TCLPMET/WETCHEM: Spike recovery not within control limits; SVOA/VOA: Applied to TIC (Tentatively Identified Compound) results that are reported as specific compounds based on a mass spectral library search; ALL ANALYSIS TYPES: Test was terminated prematurely (pre-05/30/03 definition); ANION/METAL: Spike recovery not within control limits (pre-05/30/03 definition); SVOA/VOA: Applied to TIC (Tentatively Identified Compound) results that are reported as specific compounds based on a mass spectral library search - does not apply to TICs reported as general classes of compounds (pre-05/30/03 definition)
 S METAL/TCLPMET: Determined by Method of Standard Additions; DI FURA: Signal-to-noise ratio of the confirmation ion does not meet 2.5 S/N requirement but peak was determined to be positive in the judgement of the GC/MS analyst
 T RADS: Tracer recovery is < 20% or > 105%
 U ALL ANALYSIS TYPES EXCEPT RADS: Not detected; RADS: Value reported is < MDA and/or TPU.
 W METAL: Post-digestion spike for AA(Atomic Absorption) out of control limit
 X DI FURA/HERB/PPCB/SVOA/TCLPHRB/TCLPVOA/TCLPSVL/TCLPPST/VOA: Used when more than five qualifiers are required for a result
 Y Chemical yield exceeds acceptance limits

NON COMPLI CODE

B Result does not meet daily minimum permit limit
 I Result exceeds established criteria
 T Holding time exceeded for this analysis

ASSESSMENT

BL-TJ Result may be biased low; sample holding time exceeded, estimated
 U Not detected

USECNTRIC-C During the period from May 2004 to September 2009, the USEC-PGDP lab used method RL-7128-NITRIC for isotopic uranium analysis by alpha spec. Method RL-7128-NITRIC utilizes only nitric acid for dissolution rather than hydrofluoric/nitric acid. The use of nitric acid only is a less aggressive dissolution for isotopic uranium analysis by alpha spec. It has been demonstrated that Method RL-7128-NITRIC can only be utilized for isotopic uranium analysis of soil with activity greater than 10 pCi/g due to low recoveries below that level. Therefore, if the data from Method RL-7128-NITRIC will be screened against the background values reported in Background Levels of Selected Radionuclides and Metals in Soils and Geologic Media at the PGDP (1997), the following adjusted background values must be used: U-234: 1.73 pCi/g surface and 1.63 pCi/g subsurface, U-235: 0.10 pCi/g, and U-238: 0.40 pCi/g (Methods for Conducting Risk Assessments and Risk Evaluations at the Paducah Gaseous Diffusion Plant, Appendix E (2009)). Risk assessors may use data from this time period for comparison against other thresholds below 10 pCi/g without adjusting the values as long as the level of uncertainty and its impact on the risk assessment/evaluation are adequately discussed.
 No additional action is required for comparisons to thresholds above 10 pCi/g.