

<u>SUBJECT</u>		<u>DATE</u>
1394. RCRA Empty vs. DOT Empty	ENCORE	JUL 30, 2020
1395. RCRA Empty vs. DOT Empty II	ENCORE	AUG 6, 2020
1396. Empty Containers and the "Empty" Label	ENCORE	AUG 13, 2020
1397. Exceptions to Free Liquids in Landfills Prohibition	ENCORE	AUG 20, 2020
1398. Dust Suppression in Landfills with Nonhazardous Liquids	ENCORE	AUG 27, 2020
1399. Treated Hazardous Wastes Used as Dust Suppressant	ENCORE	SEP 3, 2020
1400. Regulatory Status of Used Oil Mixed with Diesel Fuel	ENCORE	SEP 10, 2020
1401. RCRA Liquids, Free Liquids, and Releasable Liquids	ENCORE	SEP 17, 2020
1402. Available Regulatory Relief from Underlying Hazardous Constituent (UHC) Requirements	ENCORE	SEP 24, 2020
1403. Smoke Detector Disposal and the NRC	ENCORE	OCT 1, 2020
1404. DOT Shipping of Damaged, Defective, or Recalled Lithium Batteries	ENCORE	OCT 8, 2020
1405. Conservative Declaration that Material is a Hazardous Waste	ENCORE	OCT 15, 2020
1406. Manifest Exception Report Submittal Timeframes – RCRA vs. TSCA	ENCORE	OCT 22, 2020
1407. Characteristic Ignitable, Corrosive or Reactive Debris and Macroencapsulation	ENCORE	OCT 29, 2020

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## TWO MINUTE TRAINING

**TO:** CH2M HILL PLATEAU REMEDIATION COMPANY

**FROM:** PAUL W. MARTIN, RCRA Subject Matter Expert  
CHPRC Environmental Protection, Hanford, WA

**SUBJECT:** CHARACTERISTIC IGNITABLE, CORROSIVE OR REACTIVE DEBRIS AND MACROENCAPSULATION

**DATE:** OCTOBER 29, 2020

<u>CHPRC Projects</u>	<u>CH PRC - Env. Protection</u>	<u>MSA</u>	<u>Hanford Laboratories</u>	<u>Other Hanford Contractors</u>	<u>Other Hanford Contractors</u>
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## TWO MINUTE TRAINING

**SUBJECT:** Characteristic Ignitable, Corrosive or Reactive Debris and Macroencapsulation

- Q:** [40 CFR 268.45](#)(a)(2), "Characteristic debris" states that hazardous debris that exhibits the characteristic of ignitability, corrosivity, or reactivity (ICR) "must be deactivated by treatment using one of the technologies identified in Table 1", "Alternative Treatment Standards For Hazardous Debris". If a customer has an ICR debris destined for macroencapsulation, must the debris be deactivated, i.e., the characteristic removed, using a technology from Table 1 before macroencapsulation - again per Table 1; or can the debris be deactivated via any type of dilution and then macroencapsulated per Table 1?
- A:** WARNING: This will be a "Hang on to your hat; read it three times; and on the third time, read it real slow," - Two Minute Training.

As background, in the [August 18, 1992, Federal Register](#) on page 37236, EPA stated,

*"EPA is not providing the option of treating by existing treatment standards (40 CFR 268.40) for these (ICR debris) wastes. This is because the existing treatment standard (for non-debris waste) for most ignitable, corrosive, or reactive wastes can be achieved by deactivation involving any type of dilution. Since this is the very result that the Agency is seeking to avoid, EPA is indicating in the rule that this option is not for this one class of debris" - (ICR).*

EPA did not add "DEACT" to Table 1 of 40 CFR 268.45 and is not allowing generators to impermissibly dilute ICR debris waste and then claim that the formerly ICR debris has met the Land Disposal Restriction (LDR) treatment standard. Under this scenario, the generator would have no need to use an alternative treatment standard of debris in Table 1 of 40 CFR 268.45 since the impermissible dilution deactivated the ICR debris.

However, the customer could permissibly dilute ICR waste by any means and then macroencapsulate per Table 1, thus ultimately meeting a required LDR treatment standard. The customer is not diluting the ICR debris to meet a designated LDR treatment standard as would be the case with an ICR non-debris waste having the treatment standard of deactivation (DEACT). The customer is diluting an ICR waste merely to remove the ICR characteristics prior to meeting a required alternative LDR treatment standard in Table 1, e.g., macroencapsulation for debris. Since the customer's debris is no longer ICR characteristic, the requirement of 40 CFR 268.45(a)(2) [deactivate the ICR] no longer applies. The customer is not claiming to meet an LDR standard via dilution since EPA specifically prohibits dilution to meet an LDR standard for ICR debris waste. Therefore, the customer's deactivated debris remains subject to LDR and once treated by a Table 1 method, e.g., macroencapsulation, would meet the required LDR treatment standard.

### SUMMARY:

- ICR characteristic debris must be deactivated per Table 1 of 40 CFR 268.45 when meeting an LDR alternative treatment standard.
- Impermissible dilution - other than a Table 1 method - is prohibited for ICR debris in terms of meeting LDR.
- Any type of dilution could be used for ICR debris if the deactivated debris is ultimately treated via a required alternative treatment standard in Table 1 of 40 CFR 268.45, such as macroencapsulation.

Nothing is attached to the e-mail. If you have any questions, contact me at [Paul W Martin@rl.gov](mailto:Paul_W_Martin@rl.gov) or at (509) 376-6620.

**FROM:** Paul W. Martin

**DATE:** 10/29/2020

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