Environmental Professionals Organization of Connecticut
P.O. Box 176
Amston, Connecticut 06231-0176
Phone: (860) 537-0337, Fax: (860) 603-2075

Release Based Clean-up Regulation Questions
February 6, 2024

22a-134tt-1 – Definitions and Miscellaneous Provisions

(a) Definitions

EPOC Board Questions:

General Questions*:*

As the regulations require an affirmatory obligation for the parties listed below, which are subject to penalties, can you provide a definition for both:

- *Creator/creating*?
- *Maintainer/maintaining*?

The Statute and proposed regulations require that *the remediation of a release satisfies the standards* in the definition of *verification* in both cases, and *certification* for the latter. Can *satisfies* be defined? Also, can the language *satisfies the standards* be used to replace all other locations where the terminology *in compliance with* is used?

Can *data* be defined as "any written documentation, including but not limited to laboratory analysis reports, field sampling notes, field screening results, previously completed reports, photographs, files at regulatory agencies including but not limited to spill reports, inspections, notices of violations or orders to abate pollution"? Defining data in this way will meet the Statutory intent of not requiring reporting for "data" obtained prior to the effective date of the regulations.

Line 33 (13): Does the definition of "background concentrations" intentionally exclude anthropogenic constituents such as PFAS? Part B of the definition includes language that background concentrations must either be naturally occurring or minimally affected by human influences at concentrations equal to or less than criteria specified in the RBCRs. As an example, PFAS do not have criteria specified in the RBCRs, and if they did, it is not certain that background concentrations would be at or below those values. Can this definition be reworded to account for the fact that PFAS (and potentially other constituents) will likely be detected at anthropogenic background concentrations that exceed criteria calculated for these substances?

Line 124 (46): Does the definition of existing release need to be modified so it is consistent with Section 22a-134tt-2 – Discovery of a Release?

Line 128: (48) Full Characterization: Please provide intent for defining full characterization to require delineation to non-detect concentrations? This may be difficult, costly, or impossible to achieve. In the case of a well-developed conceptual site model, delineation to ND is unnecessary. We are not aware of any other State requiring this level of characterization. The current Site Characterization Guidance document does not require delineation to non-detect, but instead a valid conceptual model of the nature, magnitude and extent of a release. Could this concept be used in the definition instead of delineation to non-detect? Or could we have it both ways, that is characterized to a point where a valid conceptual release model is obtained OR non detect/background?

Line 159 (61): Can the definition of Historically Impacted Material be expanded and made clearer as to what is and is not Historically Impacted Material?

Line 174 (67): Based on the definition of Impervious Surface, is bituminous concrete now acceptable to render soil environmentally isolated or for use as an engineered control to prevent infiltration?

Line 273 (95): Under the definition of Parcel-wide investigation, the SCGD is referenced. Is this the existing SCGD or a yet to be written SCGD?

Line 462: Will the definition of "Verification" under CGS 22a-134 need to be revised accordingly as it currently relates to TA sites?

Line 462 (158) Verification: Please describe the definition of Verification as its use seems to differ from an LEP Verification filing after a site has been fully investigated and remediated per the Site Characterization Guidance Document. For example, an LEP now files a "Verification" for a Tier Assignment filing (which is an administrative process, not a cleanup).

EPOC Member Questions:

Line 226 (79): Will the concept of "managed multifamily" create an environmental justice issue? Just last month, the city of East Hartford was unable to locate a "professional property management company" in order fix a boiler in a building that had been without heat for several days.

Line 352 (125): Why did this definition change from the previous "*containment, removal, mitigation or abatement of pollution, a potential source of pollution or a substance which poses a risk to human health or the environment and includes but is not limited to reduction of pollution by natural attenuation."*

Line 358 (127): Can DEEP clarify where colleges and universities fall under these definitions? What are the spacial limits of a "dormitory?"

Line 358 (127): Public Roadway Definition – does this include Private Roadways, i.e., for instance in developments or private neighborhoods where Town or State does not own/maintain the roadway? Note that these could also include condominiums or similar).

(b) Construction of Regulations

EPOC Member Questions:

Line 491: (b) Construction of Regulations:
The proposed regulations lack a section which addresses applicability. The current RSRs address this in section 22a-133k-1(b). Given the contentious issues that have arisen in the past regarding the "applicability " question - which ultimately spurred the Department to issue its "Affirmative Responsibility to Clean up Pollution in Connecticut" notice- the proposed RBCRs need a section which explicitly addresses applicability in such a manner that the applicability of the RBCRs are clear and unambiguous.

(c) Use of Form Prescribed by the Commissioner

EPOC Board Questions:

Line 512: Can the term "certification" used for materials provided on forms be changed to avoid confusion with a PEP certification?

(d) General Requirements for Analytical Data

No Questions

(e) Significant Existing Releases

EPOC Board Questions:

Lines 636 & 638: Can the term *contamination* be defined or could a defined term be used in its place.

Line 654: Can *toxic air contaminant* be defined? Confirm any detection associated with releases is reportable as a SER?

Line 654: Did the Department intend to limit potential sources of indoor air contaminants to industrial settings only? Sources of indoor air contaminants are also found in commercial and/or residential settings.

Line 654: Should there be a provision distinguishing background substances in indoor from storage of chemicals, gasoline, suits freshly back from the dry-cleaner, etc.?

General Questions: The SER requirements are more stringent than the existing SEH requirements. Does the Department have the resources to handle a significant increase in reporting?

For example:

- *Line 637:* Any detection exceeding the GWPC within 500 feet of a potable well requires reporting. This previously was 500 feet up gradient and 200 feet in any other direction.

- *Line 640*: Industrial/commercial surficial soil reduced from 30 times to 15 times the DEC.

- *Line 652*: The detection of any VOC in soil vapor at a concentration exceeding the applicable standard

- *Line 654*: The detection of any toxic indoor contaminant associated with a release

- *Line 657:* The detection of a release in groundwater at a concentration exceeding 10 times the SWPC or NAPL at any location within 500 feet of surface water.

(f) Criteria and Land Uses

EPOC Board Questions:

Lines 660-665: Please provide the intent for this section? Why does there need to be a distinction between *current use of land* versus determining applicable criteria for soil remediation? Also why is just soil remediation referred to?

(g) Licensing of Permitted Environmental Professionals

EPOC Board Questions:

Line 666: Why would you not place the requirements for PEPs in regulation to be public noticed and approved by the legislature as part of the formal regulatory review process?

EPOC Member Questions:

Line 666: (g) Licensing of Permitted Environmental Professionals
Can an entity that creates and/or manages a release use its own internal personnel to act as a PEP? Note that current LEP regulations do not allow this practice as it is considered a potential conflict of interest.

Can an LEP act as a PEP, i.e., can an LEP submit a certification in situations where a PEP may certify? If an LEP can do this and the certification is subsequently found by the commissioner to be deficient, is there any impact on the LEPs license since the document submitted was a certification and not a stamped LEP verification?

Line 666: Why are PEP's not required to take any continued education credits or classes to confirm their knowledge is still relevant to changes in prevailing standards?

22a-134tt-2 – Discovery of Releases

(a) Discovery of an Existing Release

EPOC Board Questions:

Line 684: Can the Department insert a framework to better define how commonly used industry categorizations under the ASTM Phase I standard (e.g. Recognized Environmental Conditions [RECs], Controlled RECs, Historical RECs, and de-minimis conditions) fit into the concept of discovery of a release?

Line 686: Can *created or is maintaining* be defined as these actions lead to an affirmative obligation that is subject to penalties?

Line 688: To help avoid confusion can the words *data available or obtained before* be replaced with a*ctual or constructive knowledge available or obtained before*? Alternatively, can data be defined to include all materials generated associated with investigating and remediating releases. The fact that actual knowledge is defined as " the results of laboratory analysis" suggests there are more types of data than just laboratory analytical data.

Line 703: Would a homeowner have constructive knowledge of a release if they were to discover buried bricks, ash, or similar non-native materials while digging a hole to install a fencepost? What if they discovered paint chips in an area adjacent to their house? What if they had a fire on their property or a backyard fire pit? Would the homeowner in any of these situations be required to perform analytical testing to rebut the presumption that a release has occurred?

Line 704: This is very subjective, who interprets this - DEEP?, the courts?

Line 708: For reference, Line 248 defines *multiple lines of evidence as* two *or more observable facts*. At line 708, constructive knowledge is defined as *multiple lines of evidence indicate* and then lists examples. Based on the definition, if any two multiple lines of evidence exist does the person have constructive knowledge? If only one line of evidence exists, do they not have constructive knowledge?

EPOC Member Questions:

Line 690: Road salt is a legitimate concern in parts of the State. Would the owner of a home or business, under the draft language as written, have actual knowledge of a release if they applied road salt to their property?

Are road salts an incidental source required for the maintenance of roadways and use of vehicles and therefore not subject to discovery or reporting?

22a-134tt-2(a)(1) Discovery of an Existing Release: The language states that "a release shall not be deemed discovered if the only evidence of such release is data available or generated before the date when regulations are first adopted". Does this mean that if new data is generated to further characterize a release known under this condition it would then become "discovered" and subject to these regulations?

(b) Existing Releases Discovered by the Commissioner or Other Persons

Line 762: Why is this constructive knowledge and not actual knowledge? Lab data is actual knowledge.

(c) Discovery of a Significant Existing Release

No Questions

(d) Existing Releases from Regulated Underground Storage Tank Systems

No Questions

(e) Discovery of Emergent Reportable Releases

EPOC Member Questions:

Are there any releases that do not have to be reported under the new regulations? If so, what ones and which regs indicate same?

Are there any releases for which testing of soil or water is not required? If so, what ones, and which regs indicate same?

Are there any releases that a professional is not required for a response, whether a PEP or LEP?

(f) Naturally Occurring Metals at the Time of Discovery

EPOC Board Questions:

Line 794: If you collect three samples and the concentrations for metals fall between the low and high values provided what is the actual background value? Is it the high value in the table or the value detected in the site background sample?

Line 799: Same as above except is the background concentration the highest value detected in the five soil samples?

Line 806: Same as above, except is the background concentration the highest value detected in the seven soil samples?

Line 837: Look up numbers in table for lead are too low for surficial soil samples collected in developed areas. Can lead be addressed separately from other metals due to the exemption for remediation from motor vehicle exhaust?
EPOC Member Questions:

Line 802: Outlier analysis
What is the allowed method for performing a valid "outlier analysis"? Is a simple tabular sorting or graphical presentation of data adequate or is a more rigorous statistical method required? The requirement for demonstrating an outlier needs to be clarified/specified.

22a-134tt-3 – Reporting Newly Discovered Existing Releases

(a) Report Required, Discovery By a Creator or Maintainer

EPOC Board Questions:

Line 852: Please confirm that the 72-hour clock begins when the creator/maintainer obtains actual or constructive knowledge?

Line 858: Please confirm that the imminent risk for 2-hour reporting is limited to the presence of NAPL in the potable well? Also is it just the presence of a constituent with a GWPC or does the concentration have to exceed the GWPC?

Line 864: Can you explain the intent of requiring 2-hour reporting for any SER within 500 feet of a residence. For example, if there is a soil vapor exceedance at a commercial property 400 feet away from a residence, why should there be a decrease in reporting time? Similarly, if 10 times the SWPC is exceeded at a commercial property within 500 feet of a surface water body, why should the reporting time be shortened to 2 hours if there is a residence 400 feet away.

Line 865: Can the *and* be changed to *or* to avoid confusion?

Line 867: Can examples of imminent risk to a surface water body be better defined or could examples be provided?

Line 876: Please confirm no reporting requirements for soil vapor, indoor air or surface water?

Line 876: Can applicable numeric clean-up criteria be better defined. For example, is it the current existing use that applies for the DEC?

Lind 897: Please confirm that it is the Department's intent that no matter how low a concentration of a constituent is detected it will require characterization and verification and if not characterized/verified, reporting at 366 days following discovery?

Line 907: Would it make more sense to have all the exemptions in one spot, that is include the less than 2 cubic yards of petroleum exemption with these.

Line 913: How does the Department propose to address the application of road salt or other deicing chemicals? Is application in accordance with guidelines not a release?

Line 917: Please describe the Department's intent for this exemption? Does this include lead paint and PCB impacted building materials?

EPOC Member Questions:

How would the RBCRs handle a situation where a due diligence Phase I/II/III was completed for a prospective purchase/sale, and say 25 release areas of a variety of flavors were identified in the process?

Would each one follow an individual track according to its flavor, or is there a way to combine/group the follow-on characterization and remediation work for all the release areas of the same flavor? Or for example, could the owner enter the site in a VRP and do a site-wide characterization and remediation, similar to a PTA site?

Are there any releases that do not have to be reported under the new regulations? If so, what ones and which regs indicate same?

(b) Report contents and process

No Questions

(c) Reports of Significant Existing Releases When the Person Who Discovers Such Release Did Not Create And Is Not Maintaining The Release

EPOC Board Questions:

Lines 1026, 1030 and 1037: One hour reporting will be difficult to implement. Is this one hour no matter what time of day or day of week? Can notify be better defined? Email, phone call, knock on door, or all of the above? Does the person have to confirm notice was received?

Line 1039: Is two-hour reporting for the creator/maintainer even possible if there are two one-hour reporting requirements before they get notified?

Line 1046: Is there enough time under the two-hour reporting scenario for the original discoverer to obtain confirmation if there are two one-hour reporting times before the creator/maintainer is even notified?

Line 1046: What happens if a person who discovered a significant existing release cannot contact or cannot get hold of the creator or maintainer within the one-hour timeframe for reporting the

condition? Based on the short reporting timeframe, it may be a relatively common outcome. Some work may occur in remote areas and/or during non-standard times. The person who discovered the significant existing release may need to track down information for the creator or maintainer. Finally, the creator or maintainer may not be immediately available.

If this section remains as written, DEEP will routinely get two to three notifications for the same release, is that efficient?

EPOC Member Questions:

Line 1003: should "designed" actually be "designated"

Line 1020: (2) Is the one-hour time frame intended to be during business hours? For instance, if a junior employee checks their email on a Saturday afternoon and opens a laboratory report indicating soil concentrations exceeding 15-times the DEC, would the one-hour requirement start immediately? Or at the start of the Monday business day?

Line 1046: In the situation of a person who discovers and subsequently reports a release to the person who created or is maintaining a release (aka "the responsible party"), what is the burden (i.e., what effort) for this first person to determine if the responsible party actually did make a report to the commissioner - particularly if this first person is an LEP or a PEP? What specific effort(s) are required? and What would be the consequences to this first person if they did not pursue whether or not the responsible party made the required notification?

Line 1046: (4) How would the person who "discovers" but does not "maintain" a release confirm that an SEH notification was made? Should an LEP be required to keep track of and confirm that a property owner has fulfilled their obligations?

Line 1046: Does this section mean that an LEP is obligated to report a release? If so, within a time period of less than 2 hours (if the release isn't report in one hour or less)?

(d) Reports of Existing Releases Discovered on Transfer Act Site

EPOC Member Questions:

Line 1074: (2) To which party does the liability to address the release fall (regardless of whether it's done under the Transfer Act or RBCR)? The certifying party or the maintainer?

22a-134tt-4 – Characterization of Discovered Releases

(a) Requirement to Characterize Nature and Extent of a Release

EPOC Board Questions:

Line 1094: Please confirm that the Department will require the characterization of any detection of "polluted soil" or a "groundwater plume", with no lower bound for this requirement? Note

that the definition of both terms only requires the presence of a substance above its laboratory reporting limit. We are aware of no other State or Federal regulatory program that has this requirement.

Confirm that when a release is discovered by constructive knowledge sampling must be conducted to confirm a release has occurred and if so, it must be characterized?

Lines 1113 and 1127: Can the commissioner specify prevailing standards? Are prevailing standards a legal term? LEPs are held to prevailing standards for liability purposes.

Is it appropriate for the Commissioner to set prevailing standards without going through the official regulatory review process including public comment?

Line 1113: Is Commissioner approval required for determining when characterization has been achieved, provided that delineation has not been performed to ND in all directions? When would this approval be granted? Is DEEP going to have the resources to review investigation reports to make this determination?

Lines 1114 and 1117: Can the Department identify their intent? When are there situations where full characterization would not be required and why is full characterization not required for PEP closure?

Line 1121: This section says no verification or certification can be completed without full characterization, but directly above it says PEP's do not need to characterize. Are these in conflict with each other?

EPOC Member Questions:

Would DEEP consider changing the definition of "Full characterization" of a release from "to the points at which it is no longer detected" to "to the degree necessary for remedial decision making and demonstrating compliance with the remediation standards for soil and groundwater"?

Line 1093 (a): This section indicates that the commissioner can identify releases for which a full characterization is not required, but then indicates that no closure report can be verified/certified without a full characterization. Can the DEEP clarify its intent?

(b) Identification of Prevailing Standards and Guidelines

EPOC Board Questions:

Line 1136: Will CT DEEP require that guidance documents from other organizations (other states, federal agencies, industry groups) be submitted for approval as prevailing standards and guidelines? It seems that this will create a lot of work for CT DEEP, especially for methods that are rapidly evolving (e.g. PFAS).

Line 1156: At this point there is another PEP characterization requirement, Is this in conflict with those mentioned above?

<u>EPOC Member Questions:</u>

Line 1156: re: "a release remediation closure report certified by a PEP shall contain only such characterization necessary...
The language here suggests that the requirements of a PEP's closure report for those situations identified in section 22a-134tt-8 may be less stringent than those required to be submitted by an LEP for the same situations. Both the PEP and the LEP should be held to the same standard in these situations, i.e., there should not be a higher bar for an LEP.

22a-134tt-5 – Immediate Actions

(a) Immediate Action Required

No Questions

(b) Emergencies and Exigent Conditions

No Questions

(c) Time to Begin Required Immediate Actions

No Questions

(d) Required Immediate Actions

<u>EPOC Board Questions:</u>

Line 1234: Does removing an emergent release from the land and waters of the state to the maximum extent practicable include:

- Removal and replacement of oil-soaked asphalt or concrete that remains after treatment with absorbent material?
- Removal of all impacted soil or sediment to the point that background concentrations are achieved?

Line 1254: “complete characterization” is not defined can this be changed to full characterization?

Line 1256: Immediate response actions are required, in some cases as soon as practicable and in other cases within specified timeframes upon discovery of an emergent reportable release or a significant existing release. What should a creator or maintainer do in a hypothetical situation

where they do not know if or how they can afford to pay for those actions? It may take time to work out those details (e.g. working with insurance company, etc.). This could be especially difficult for homeowners.

EPOC Member Questions:

In Section 22a-134tt-5(d)(2) – page 36 – "Full characterization" (which is a defined term) and "complete characterization" (which is not a defined term) are both used in the same paragraph. Are they different, or did you intend to use "full characterization" both times? If different, please add a definition for "complete characterization".

(e) Required Immediate Actions for an Emergent Reportable Release

EPOC Board Questions:

Lines 1267 and 1272: What is the intent of having two paragraphs can these be made into 1 paragraph

Lines 1316 & 1471: Can impacting groundwater be defined? Any detection?

Line 1349: Can emergent releases be remediated to numeric clean-up criteria, or do they need to be remediated to background? If remediated to clean-up criteria does an LEP have to verify?

EPOC Member Questions:

22a-134tt-5(E)(3) & (5)A: does a phone call to a remediation contractor or perhaps to other persons constitute initiating remediation within 2 hrs.?

Please Clarify 22a-134tt-5(e)(1-5) Emergent Reportable Release and Significant Existing Releases Timeframes for actions to be taken. In this section it reads like:

1) Release identified in Potable Well above GWPC, then install a treatment system within 15 days or connect to public water no other choice

2) Groundwater monitoring well above GWPC within 500 feet of a public or private well, then install a physical barrier to prevent migration of release (sheet piling, interceptor trench, slurry wall?)

3) 2 hours after discovery of release initiate remediation (assume dig it up) to applicable Direct Exposure Criteria

4) Release of VOCs within 30 feet of building, then install SSDS or SVE system

It reads like there is no choice but to do these things. Is that really the case?

Line 1269: In practice, identifying AND sampling AND submitting samples within a 36-hour time frame may not be attainable in many circumstances. A 72-hour time period would be may realistic. The use of the 36-hour requirement in other related sections of the RBCRs should also be reviewed for implementability.

(f) Required Immediate Actions for a Significant Existing Release

EPOC Board Questions:

Line 1509: Can applicable direct exposure criterion be defined. Is this based on current use or use for remediation?

Line 1540: Is there a typo here?

Line 1548: Can toxic air substance be defined?

EPOC Member Questions:

22a-134tt-5(f)(3)(B)(ii) - page 42: Is an EUR a "relevant provision" that must be met within 90 days?

(g) Certification by a PEP or Verification by an LEP

EPOC Board Questions:

Line 1589: Can the Department elaborate on what they mean by "satisfy the standards specified in the clean-up standards and such clean-up standards require LEP verification? Are these the baseline clean-up criteria or any of the self implementing options that do not require commissioner approval?

Line 1594: Does this prohibit facility staff, municipal fire responders, can no longer address releases on their own without obtaining a 22a-454 permit?

EPOC Member Questions:
22a-134tt-5(g)(1): can "persistent groundwater impact" be added to the definitions?

(h) Immediate Action Transition-Points

No Questions

(i) Remediation of Remaining Substances Released

No Questions

(j) Immediate Action Plan

No Questions

(k) Immediate Action Report

22a-134tt-5(k)(1): middle of page 48 – typo? Emergency should be emergent?

22a-134tt-6 – Tiers

(a) Requirement to Tier Releases

No Questions

(b) Establishment of Cleanup Tiers

No Questions

(c) Tier Assignment

EPOC Member Questions:

22a-134tt-6 and Tier 1A form: Are all Tier 1As for VOC impacts at a minimum? If not, then for a no-VOC release, one would check "No" for 1c, and then the releases would be tiered as 1A, when it may not need to be.

Based on the way the Tiers structure is written, it appears that Tier 1A will become a default and a significant number of releases will end up here, was this the DEEP's intent? Additionally, the draft Tier Checklist form indicates that a number of characterization activities must occur, otherwise the release is a Tier 1A, is it the DEEP's intent to require extensive characterization for even small/low risk releases?

(d) Cleanup Oversight

No Questions

(e) Deadlines for Remediation

EPOC Board Questions:

Line 1889: Are the deadlines for remediation or tier reassignments universally realistic? Some of the remediation deadlines will be significantly shorter than those in the Transfer Act. This may create a situation where a lot of deadline extensions are requested (some of which will require CT DEEP review and approval).

EPOC Member Questions:

Lines 1883 & 1886: "qualified professional"
What/Who is a "qualified professional". Needs to be defined in the definition section. Is DEEP intending to create a third level of professional - PEP, LEP, QEP?

(f) Fees

EPOC Board Questions:

Line 1929: Some remediation projects may have a lot of individual releases. Will the department create a mechanism to bundle releases to avoid or reduce the need to pay multiple fees for one property? Bundling releases would also allow for consolidation of submittals and communication.

22a-134tt-7 – General Cleanup Standards Provisions

(a) Time-frames for Issuance of Approvals by the Commissioner

EPOC Board Questions:

Section Questions:

Annual fees and timetables for completion are being proposed by the Department. If there are going to be annual fees and timetables for completion for moving from one tier to the next, can the regulations include timetables for issuance of approvals and if that time frame is not met, annual fees and timetables for completion will be suspended until approval or disapproval is provided?

Does the Department have plans for adding resources to promote the success of this program?

EPOC Member Questions:

22a-134tt-7(a) Timeframes. DEEP allows for its timeframes that DEEP "shall make best efforts within available resources… and take into account available resources and the complexity.." Can DEEP consider using this type of language also for LEP and Creator/Maintainer timeframes? Some of the very short time frames will be very hard to meet in some or many circumstances (e.g., immediate, 1 hr., 2 hr., etc..).

(b) Environmental Use Restrictions

No Questions

(c) Financial Assurance

No Questions

(d) Public Participation

EPOC Member Questions:
Line 2094: This section suggests that a public notice of remediation needs to be made for EACH release assigned a tier? This seems overly burdensome and could lead to public confusion at complex sites where multiple individual releases are present and are being remediated simultaneously. There should be a provision allowing such sites to make a single public notice which could list out the specific locations/releases that are undergoing remediation.

(e) Other Requirements (mislabeled as "d" in the draft regs)

EPOC Member Questions:

Li*ne 2157*: (d) Other Requirements
The designation should be (e) Other Requirements

22a-134tt-8 – Releases Certified as Closed by a Permitted Environmental Professional

(a) Emergent Reportable Releases Certified as Closed by a Permitted Environmental Professional

EPOC Board Questions:

Line 2166: Is a PEP required to investigate a release in accordance with prevailing standards and guidelines, and/or perform delineation to a specified level (e.g. ND) prior to providing a certification?

Line 2168: Can the word *approximate* be removed? It means different things to different people in different situations.

Line 2174: Is the Department comfortable with releases of oil to a surface water body being certified by PEPs if the release has the potential to impact soil or wetlands adjacent to the surface water body if the spill is of sufficient volume to reach the edge of the surface water body or travel to the edge with the current?

Line 2185: What is the performance standard for soil being removed and properly disposed? Is it all impacted soil, i.e. to background? Or removal until a baseline clean-up criteria is reached?

EPOC Member Questions:

22a-134tt-8(a)(1)(C)(ii) & D – page 62: how soluble is soluble? be more descriptive as to how a PEP would know if a release has or has not contacted surface water, and be clear as to when an LEP would be required to make that determination.

(b) Releases of Home Heating Fuel on Residential Properties

EPOC Member Questions:

22a-134tt-8(b)(1)(A)(iii) – bottom of page 63: If the owner or occupant hired the oil company that caused the release, did the owner or occupant cause the release? Can clarifying text be added?

22a-134tt-8(b)(1)(B) – define dwelling units. House?, garage? Shed?. What about limited access due to trees, walkways, utilities, property boundaries, etc..?

22a-134tt-8(b)(1)(C) – groundwater remediation by homeowners for leaking fuel oil USTs? OK, but very expensive for homeowners, and have you told the Governor?

22a-134tt-8(b)(1)(A)(iii) Releases of Home Heating Fuel on Residential Properties: The language states that "A release shall be determined to have been created by the owner of such a parcel…if the release would not have occurred but for the actions or inactions of such person or if such person owns, leases, or is otherwise in possession of the equipment that causes the release". Does this language mean that if a contractor is performing or performed work on equipment owned by a homeowner and thus causes a release that this release is deemed created by the owner? Even though it was the actions of the contractor?

Line 2224: As written, this section seems to imply that it is the resident/owner who is the responsible party when in reality – it is usually the fuel company or tank company who is responsible. How is this addressed when it is the fuel company who created the release?

22a-134tt-9 – Cleanup Remediation Standards for Soil

(a) Soil Criteria

EPOC Member Questions:

22a-134tt-9(a)(5) (pg, 81) – can an LEP calculate a risk-based alternative DEC *for just one* substance?

(b) Direct Exposure Criteria

EPOC Member Questions:
Line 2385: "...free of gaps or cracks..."
Even the most well-maintained parking lots or roadways will have gaps or cracks, which often develop surprisingly shortly after installation. To be entirely "free" of gaps or cracks is an

unrealistic standard. Suggest the use of "predominantly free" or some other more appropriate language.

22a-134tt-9(b)(3)(C): A requirement of using the “permit-by-rule” inaccessible soil for compliance is that the VOCs do not exceed the applicable DEC within 30 feet of a building and pollutants may not exceed the I/C DEC and 15 times the applicable DEC if such soil is less than 1 foot in depth. In determining if soil exceeds these criteria, do individual sample results need to be considered, or can a 95% UCL be utilized to establish soil is less than the required DEC criteria?

(c) Pollutant Mobility Criteria

No Questions

(d) Alternative Soil Criteria and Alternative Dilution or Dilution Attenuation Factor

No Questions

(e) Determining Compliance with the Soil Criteria

No Questions

(f) Soil Criteria Variances

No Questions

(g) Non-aqueous Phase Liquids

No Questions

(h) Use of Polluted Soil and Reuse of Treated Soil

No Questions

(i) Additional Remediation of Polluted Soil

No Questions

(j) Conditional Exemption for Historically Impacted Material

EPOC Member Questions:

22a-134tt-9(j) and (j)(1)– page 94: “Historically impacted material” is defined as material that will be managed in accordance with this section, and this section does not further explain what this material is, but says e.g., that it has been determined through tier characterization that

historically impacted material is present. Is this circular? Is DEEP's intention to allow ANY type of material to be managed in accordance with this section. If not, please clarify.

22a-134tt-9(j)(5) refers to "polluted material. Is this supposed to be the same as or different than "Historically impacted material"?

22a-134tt-9(j): Conditional Exemption for Historically Impacted Material: Does this "permit-by-rule provide relief from the requirements to meet the DEC and PMC to achieve compliance with the RBCRs for "Historically Impacted Material". If so, does this relief apply to all depths? Understanding no SERs can exist.

22a-134tt-9(j): While this section is a great addition to the regulations, is it still applicable to sites that are currently in the CTA or subject to the RSRs? Section 22a-134tt-9(j)(1)(B) states that "it has been determined, through tier characterization, there is historically impacted material on the parcel and it is not prudent to remove such material". Can only sites that go through Tier Characterization utilize this exemption?

General Questions:

Why does the condition prohibit relocation of historic polluted fill to a different parcel?

Is it the intent of this provision to prohibit relocation of historic polluted fill to a different parcel in all cases or just through the use of permit by rule?

Relocation of historic polluted fill to multiple parcels happens all the time on Brownfields redevelopment project through the use of soil management and design techniques to take excess soil generated by construction activities in one area and relocate it to different areas often on multiple parcels that comprise Brownfields redevelopment sites. It is a cost savings option that uses the capping solutions that exist in the current regulations to achieve regulatory requirements. If excess historic polluted soil on Brownfields projects can no longer be reused on adjacent parcels or other parcels to raise grades and must be disposed of off-site at permitted facilities, many Brownfields projects in urban and environmental justice areas will be cost prohibitive and remain undeveloped.

(k) Conditional Exemption for Dredge Spoils

EPOC Member Questions:

General Questions:

Please explain the requirements associated with a DEEP issued permit to allow upland placement of sediment to occur.

What is the anticipated level of effort associated with permit preparation?
What are the anticipated post construction obligations of the permittee after the sediment has been placed?

22a-134tt-10 – Cleanup Standards for Groundwater

(a) Groundwater Criteria

No Questions

(b) Alternative Surface-Water Protection Criteria

No Questions

(c) Volatilization Criteria

No Questions

(d) Groundwater Protection Criteria

No Questions

(e) Technical Impracticability Variance

No Questions

(f) Conditional Exemption for Incidental Sources

No Questions

(g) Conditional Exemption for Groundwater Polluted with Pesticides

No Questions

(h) Applying the Groundwater Criteria

No Questions

(i) Additional Polluting Substances

No Questions

(j) Additional Remediation of Groundwater

No Questions

22a-134tt-11 – Certification and Verification

(a) Release records requiring Certification or Verification

EPOC Member Questions:

Line 4631: PEP certification
Is it possible for a PEP to certify a release and clean-up without taking analytical samples to establish the extent of the release and/or confirm the remediation? If that is possible, then an LEP doing this same work should also be able to certify or verify this clean-up without taking samples, i.e., the LEP should not be held to a higher standard than a PEP in these situations.

(b) Form of Certification or Verification

No Questions

22a-134tt-12 – Release Remediation Closure Report

EPOC Member Questions:

The first sentence of 22a-134tt-12 (and perhaps other places too) refers to "a release to the land AND waters of the state..", meaning here that the release strictly had to impact BOTH the land *and* the waters for the requirement to apply, when I think DEEP may mean in this context "a release to the land AND/OR waters of the state.." Also, should State be capitalized, since the reference is strictly to the State of Connecticut?

22a-134tt-12(5) pg 123 – Unless WHAT is rejected? Please clarify

Line 4667: Release Remediation Closure Report
This section is very bare-bones as it currently exists. Throughout the RBCRs there is reference to the importance of the remediation closure report. In DEEP's public presentations on the draft RBCRs, they have indicated that much will ride on this report. Accordingly, this section needs to be significantly bolstered so that the requirements of the closure report are clear. Although subsequent guidance could be issued to provide more detailed information, the depth and breadth of the closure report needs to be made clear within in the RBCRs.

Line 4673: "subsection (c)" of this section
Where is "subsection (c)" of THIS section?

22a-134tt-13 – Audits

(a) Audit of Release Records

EPOC Member Questions:

22a-134tt-13(a)(1)(b) pg 125: more than 180 days after submission *of a release record*?

22a-134tt-13(g)(2) pg 129 Does this mean there is no end to the timeframe that DEEP can audit a release record? That's fine if that's what DEEP is saying, just checking what DEEP is saying so I can tell the creators and maintainers and the purchasers and the bankers, etc.

22a-134tt-13: Audits: Will the department issue "Letters of No Audit" prior to the 180 days deadline to commence either a focused or full audit if they determine they don't intend to audit a Verification?

Line 4727: (a) If an LEP will "verify" individual documents, will there still be the concept of an LEP-of-record for the overall release? How would the audit process work if multiple LEPs verified documents used to document a release-based cleanup?

Line 4727: Will the audit regulations be applicable to a release record that was not required to be submitted per 22a-134tt-12?

<u>General Questions</u>:

Why do the Audits (Screening, Focused, Full) include long 180-day timeframes by which DEEP can perform an audit? Is there any mechanism by which an interested party (buyer or seller) can know if a release record is deemed compliant by DEEP? Absence of shorter timeframes will lead to uncertainty, which could negatively impact property transfer and economic conditions particularly in urban and environmental justice areas where conditions often are more complicated because of the presence of historic fill and widespread impacted groundwater plumes.

(b) Screening Audit

No Questions

(c) Focused Audit

No Questions

(d) Full Audit

No Questions

(e) Reopened Verifications and Certifications

No Questions

(f) Verification Necessary After Rejection

No Questions

(g) Frequency of Audits

No Questions

Appendices

1 - Tier Checklist

EPOC Member Questions:

Will the requirement to perform a Scoping Level Eco Risk Assessment as part of every release, pretty much come to the conclusion that there could be risk and therefore the majority of the releases will be subject to performing a site specific eco risk assessment for most every release?

What is the department's current and anticipated future capacity to review/process/evaluate what looks like a major increase in Ecological Risk Assessments (Scoping, Screening, Site Specific) risk assessments with one or more of these risk assessments essentially mandated to occur as a result of the Tier selection process for every release? Will the department acknowledge that the current capacity to review eco risk assessments is currently "slow" and often an issue for moving cleanup progress on sites forward?

Follow up question. Emerging contaminant requirements in the future will drive more sampling for PFAS. As PFAS are detected in different media, given extremely low detection and cleanup limits how will incorporating PFAS into eco risk assessments not quickly become cost prohibitive for the many municipalities, non profits, private residential homeowners, etc. that will be subject to these regulations?

Tier Classification: A Tier 1A indicator is the completion of a Scoping level ecological risk assessment, drinking water receptor survey and vapor intrusion receptor survey. If any of these are determined to not be warranted based characterization data, is there exemption to complete them to not be Tier 1A classified?

Tier Classification: Tier 1B indicators include "compliance" with volatilization criteria or GWPC when a vapor intrusion or drinking water receptor pathway is present. Does compliance in this instance mean compliance established through 4 quarters of GW monitoring in accordance with 22a-134tt-10(h)? Or that characterization data indicates Vol. criteria and GWPC criteria are not exceeded.

2 - Direct Exposure Criteria for Soil

No Questions

3 - Pollutant Mobility Criteria for Soil

No Questions

4 - Groundwater Protection Criteria

No Questions

5 - Surface Water Protection Criteria for Substances in Groundwater

No Questions

6 - Volatilization Criteria for Groundwater

No Questions

7 - Volatilization Criteria for Soil Vapor

No Questions

8 - Equations, Terms, and Values for Calculating Release-Specific Direct Exposure Criteria, Pollutant Mobility Criteria, Groundwater Protection Criteria, Surface Water Protection Criteria, and Volatilization Criteria, for Additional Polluting Substances and Alternative Volatilization Criteria.

No Questions

9 - Equations, Terms, and Values for Calculating Release-Specific Alternative Pollutant Mobility Criteria

No Questions

10 - Potential Alternative Groundwater Protection Criteria Map, dated December 22, 2020

No Questions

11/12 - Managed Multifamily Residential & Passive Recreation Direct Exposure Criteria for Soil

EPOC Member Questions:

Line 5470: Appendix 11 Managed Multifamily Residential Direct Exposure Criteria for Soil
Line 5474: Appendix 12 Passive Recreation Direct Exposure Criteria for Soil

In a number of instances, the criteria proposed for both of these new exposure situations are LOWER than or equal to the current Residential DEC. This seems counter-intuitive to the intent of creating these new criteria to address these lower-exposure and/or less sensitive exposure situations. Particularly concerning are the lower criteria for benzene and benzo(a)pyrene which are commonly clean-up drivers for VOC releases and state-wide sites impacted by SVOCs, and the proposed criteria for lead and arsenic which are unchanged and are common drivers for cleaning up urban sites.

Also, the Multifamily DEC for hexavalent chromium is listed as "0". It is not possible to obtain a lab report that indicates a value of "0" for any analytical constituent. A numerical standard >0 needs to be provided.

Non Section Specific Questions

<u>EPOC Board and Member Questions:</u>
Why are the Fast Track Additional Polluting Substances for already established constituents not incorporated into these regulations, so they could be promulgated into the regulations and therefore the practice of separately apply for the APS as a separate process could stop?

Environmental Professionals Organization of Connecticut
P.O. Box 176
Amston, Connecticut 06231-0176
Phone: (860) 537-0337, Fax: (860) 603-2075

Additional Questions Received from EPOC Members
February 6, 2024
(Listed by line item of proposed regulations from DEEP's website)

- 1 - 22a-134tt-1 – Stature should be 22a, not 2a.

- 84 - (31) "DEC" – Why isn't 22a-134tt-9(d)(5) "LEP-calculated DEC" referenced in this definition?

- 99 - (35) "Drinking water supply well" – Why is this definition so broad, and include irrigation, agricultural, and industrial supply wells? A "public drinking water supply well" (118) is clearly defined as servicing multiple dwellings.

- 112 - (40) "Environmentally Isolated Soil" – Why doesn't his definition include provisions to apply to the seasonal low in a GA groundwater classification area.

- 124 - (46) "Existing release" – This definition seems contrary to the CT DEEP stance that samples collected during due diligence prior to the promulgation of the new regulations would not constitute the discovery of a release. Should it read "a release discovered after the promulgation of the RBCRs or something similar?

- 200 - (73) "I/C DEC" – Why isn't 22a-134tt-9(d)(5) "LEP-calculated DEC" referenced in this definition?

- 277 (96) would passive recreation include beaches, lakes, and ponds without housing structures.

- 284 - (99) "PEP" – The draft regulations indicate PEP means a person authorized by a permit issued pursuant to Section 22a-454; however, recent training by CT DEEP staff have indicated a PEP would be a licensed individual, not a "permitted" individual. CT DEEP had previously indicated they were opposed to creating a new license. Which is it, a license or a permit?

- 292 - (103) "PMC" – This section specifically lists an LEP-calculated PMC, whereas the DEC definitions do not. This should be rectified.

- 358 - (127) "Residential activity" – Why has this definition been updated to specifically exclude passive outdoor recreation areas?

- 364- (128) "RDEC" – Why isn't 22a-134tt-9(d)(5) "LEP-calculated DEC" referenced in this definition?

- 374 - (131) “Screening level ecological risk assessment” – Why does this definition indicate “confirmed pathway from a release to ecological receptors through results of laboratory analysis of representative samples.” What if the samples discount a pathway? Shouldn’t the word “confirmed” be changed to “evaluated, or just include an evaluation if ecological receptors are present, and then a Site-specific ecological risk assessment include the results of laboratory samples?” Would a Sensitive Receptor Survey qualify as a “screening level ecological risk assessment”? Does the Department plan for a Guidance Document to fully describe specifically what should be conducted for both levels of risk assessment?

- 431 - (152) “Tier Characterization” – Does the Department feel that this definition is consistent with the definition of “Characterization” (19) which is defined as determining the nature and extent of a release in accordance with prevailing standards and guidelines. Why is the definition of “Characterization” so vague and reference a Guidance Document not yet developed?

- 462 - (158) “Verification” This definition points back to the LEP regulations to mean the written opinion of an LEP on a form prescribed by the Commissioner. In Section 22a-134tt-1(c)(I), it indicates” a signed certification by the person submitting the form, and, if provided on the form, a certification by an LEP. Which is it? Are LEPs “certifying” of “verifying”? Is a PEP supposed to be listed here as well?

- 666-667 (g) Licensing of Permitted Environmental Professionals
  We suggest to use the term “Permit” or “Certificate” as the credential for the PEP, rather than licensing, to avoid confusion with "Licensed" Environmental Professional.

- 667 (1) Do you anticipate these credentials will change based on who is in office as the commissioner? Why not define the credentials in the regulations like the LEP requirements?

- 672 (A) what level of training and education will be required for a PEP license? Will there be continuing education requirements?

- 678 (3) Will a board be established, similar to the LEP board to monitor activities of the PEP and insure they are maintaining the appropriate credentials for the permit?

- 703 - (3)(A) “Constructive Knowledge” – Can the Department please elaborate on how Phase II-level soil and groundwater data, collected as commissioned by the potential buyer of a parcel, will not be considered “discovered” by the “creator” or “maintainer” (the property owner) as these data are typically shared and used for the basis on liability transfers and depreciation of value from the purchase price. This ambiguity appears to be asking for legal challenges and a lot of administrative burden.

- 773 - (d) “Existing Releases from USTs” – What happens if petroleum hydrocarbons are detected in soil or groundwater from a petroleum UST site, but other sources of potential

releases of petroleum (i.e. waste oil ASTs, bay drains, septic field). How is the LEP to differentiate if this is a release from a UST regulated under 22a-449(d) or the RBCRs?

- 773 (d) Existing Releases from Regulated Underground Storage Tank Systems. This section states that if the source of a historic release was from a "UST system" regulated by 22a-449(d) (UST Regulations), such a release shall not be considered as "discovered" (and therefore not subject to the requirements of the RBCRs). What is the mechanism/process to be able to utilize the RBCRs at a UST release site?

- 799 - (3)(f)(1)(C) and (D) -"Outlier analysis" – Will the Department be developing specific guidance on how to perform an "Outlier analysis?" Shouldn't the statistical method be outlined in the regulation?
- 808 (D) What type of outlier analysis will be acceptable to CT DEEP?

- 813 - (3)(f)(1)(E) – It appears the CT DEEP did not revise the reference "background concentrations for metals", as proposed by EPOC. These values do not represent true background conditions for shallow soils (0-1 foot below ground surface), which represent a "worst case" sample for surficial releases. These background values are likely to have numerous "releases" discovered, and money spent, only to document the detected concentrations are truly representative of site-specific background and did not represent a release. Does the Department expect a large volume of reported releases based solely on metals concentrations in soil samples only to have no remediation required? What is an LEP to do if low level metals are detected in groundwater? Report everything over the minimum laboratory reporting limit as a release? This section seems to be extremely problematic and should be revisited, and not approved as written. Will the CT DEEP be establishing exactly what metals are required to be assessed for specific AOCs? What happens when you have an 8,000 square foot service station and AOCs basically cover the Site and there are not locations absent a potential release?

- 837 - There are many metals on this list that don't have established criteria or APS criteria. Is CT DEEP planning on establishing criteria? Are they planning on creating a list of industry operations they expect to see these analyzed in?

- 837 (f) Naturally Occurring Metals at the Time of Discovery
  The proposed range for background metals values for arsenic are between 3 mg/kg and 6 mg/kg. Naturally occurring arsenic in soil can range from 0.1 mg/kg to 40+ mg/kg. The Residential Direct Exposure Criteria is 10 mg/kg. It is suggested that the naturally occurring background concentrations subject to the RBCRs not be set below current RSR criteria.
  Secondly, why were groundwater values for naturally occurring metals not included in this section?

- 874 - (2)(A)(i) – What is a "reportable concentration?" 2 cubic yards is a very small quantity of soil. What type of evidence is required to demonstrate < 2 cubic yards?
  884 - Can you provide a definition for "subsurface structure" listed under 22a-134tt-3(2)(ii)?

- 884 (ii) Please define "subsurface structures".

- 887 - (2)(A)(iii) – What if a VOC compound is detected in soil that would not be considered a Constituent of Concern for the Site?

- 892 - (2)(B) – Why is only an LEP listed and not both an LEP and PEP?

- 892 - (2)(B) – Does the <2 cubic yard threshold in (2)(A)(i) apply here as well? Should a PEP also be referenced in addition to an LEP?

- 987 (ii) Is CT DEEP anticipating that a "Receptor Survey" will be conducted in 7 days? Sometimes it takes several weeks to gather all of the data included in a survey.

- 1023 (A) Please clarify. Will the LEP be required to report the SER is the owner/maintainer do not?

- 1084-1090 (d) Reports of Existing Releases Discovered on Transfer Act Site.
  For releases covered under the Transfer Act and any newly discovered existing releases on the site, since it appears they will not be subject to the RBCRs, will there be a Tiering requirement and any associated fees for Transfer Act Sites?

- 1160-1808, 22a-134tt-5 – Immediate Actions.
  Will this section be the replacement for the Significant Environmental Hazard (SEH) Program?

- 1256-1579 (e) Required Immediate Actions for an Emergent Reportable Release and (f) Required Immediate Actions for a Significant Existing Release.
  It is suggested that the distances to potable wells that require immediate action (sampling) should remain consistent in all scenarios listed in this section, and in line with the current SEH requirements (i.e. 200 feet in any direction and 500 feet downgradient).
  For instance:
  1272-1273 (e)(1)(C) specifies 200ft/500ft distances;
  1267-1268 (e)(1)(B) does not specify distances;
  1316-1317 (e)(2) specifies 500ft in any direction;
  1324-1325 (e)(2)(B) does not specify distances;
  1428 (f)(1)(B) specifies within 500ft;
  1437 (f)(1)(D) specifies 200ft/500ft;
  1464 (f)(1)(E)(iv) specifies within 200ft;
  1476 (f)(2)(A) specifies within 500ft;
  1481 (f)(2)(B) specifies 200ft/500ft;
  1494-1495 (f)(2)(D)(ii) (typo - should say (iii)) Specifies 200ft/500ft.

- 1269, 1274, 1326, 1429, 1477 - It is often difficult to gain access to to sample private wells. Certain immediate actions in these subsections require sampling within strict timeframes (2 days, 3 days, etc.). What is the process if access to those properties cannot

be obtained within those timeframes? If access is denied for sampling, will CT DEEP compel the property owners to allow access for sampling?

- 1826 (c) Tier Assignment.
  If two or more separate releases are assigned to a Tier and impact the same areas (i.e. very close AOCs, comingled soil and gw impacts), can comingled Tiered releases be combined and remediated together in accordance with the RBCRs?
  Can the smaller (extent and magnitude) of a comingled release be closed out with the rationale that the smaller release will be remediated with the larger (extent and magnitude) release?

- 1929-1962 (f) Fees.
  The Tier assignment fees are reasonable, but charging the same amount each year as an Annual Fee or extension requests seems excessive. It is suggested to eliminate Annual Tier Fees, unless it is a DEEP-led site.
  If two or more separate releases are assigned to a Tier and impact the same areas (i.e. very close AOCs, comingled soil and gw impacts), does EACH release require a separate Annual Fee?

- 1952-1954 subsection (f)(3)(A) – Typo? The subsections referenced here should be (e)(6)(A) and (e)(6)(B) rather than (e)(6)(i) and (e)(6)(ii).

- 1955-1956 subsection (f)(3)(B) – Typo? The subsections referenced here should be (e)(6)(C) rather than (e)(6)(iii).

- 2046-2051 (c)(2) Financial Assurance.
  Suggest to add a "Self Insured" option as an instrument to satisfy the financial assurance requirements of this subsection.

- 2380-2432 subsection (b)(3)(C) in Conditional Exemptions for Inaccessible Soil.
  Instead of requiring 5 year inspections under the Permit by Rule, it is suggested that the owner is required to report only if there are any changes to the relevant site conditions, in addition to the Affidavit of Facts.

- 2388-2394 subsection (b)(3)(D)(i)(IV) in Conditional Exemptions for Inaccessible Soil.
  As currently proposed in the DRAFT RBCRs, can the owner complete the required 5-year inspections, or do the inspection forms require certification by an LEP/PEP?

- 2362-2432 subsection (b)(3)(C) in Conditional Exemptions for Inaccessible Soil.
  For sites currently in the Transfer Act, can the Permit by Rule for Conditional Exemptions for Inaccessible Soil be utilized as part of the Transfer Act Verification Process once the RBCRs are adopted?

- 3587-3679 (j) Conditional Exemption for Historically Impacted Material.
  How does Conditional Exemption of Historically Impacted Material differ from the

Widespread Polluted Fill Variance in section 22a-134tt-9(f)(1)? Is Historically Impacted Material considered fill or related to historical releases onsite?

- 3587-3678 (j) Conditional Exemption for Historically Impacted Material.
  Instead of requiring 5 year inspections under the Permit by Rule, it is suggested that the owner is required to report only if there are any changes to the relevant site conditions, in addition to the Affidavit of Facts.

- 3610-3611 (j)(2)(A)(ii) Conditional Exemption for Historically Impacted Material.
  As currently proposed in the DRAFT RBCRs, can the owner complete the required 5-year inspections, or do the inspection forms require certification by an LEP/PEP?

- 3587-3679 (j) Conditional Exemption for Historically Impacted Material.
  For sites currently in the Transfer Act, can the Permit by Rule for Historically Impacted Material be utilized as part of the Transfer Act Verification Process once the RBCRs are adopted?

- 4751-4765 (b) Screening Audit
  If a Screening Audit is conducted, it is suggested that the RP will be notified if the Screening Audit is Accepted by DEEP, so that the RP may close out the project.

- 4934 - Can you indicate the percentages of audits that will be conducted on PEPs? The presentation material offered by the CT DEEP at various organization's meetings listed the percentages of audits for LEP submitted documents, but was curiously absent any numbers for PEPs. One would think it would be a very high percentage to test out this proposed new role.

- Why aren't the APS being incorporated/adopted into the RCBRs?

1. The legislative history of Public Act 20-09 references improvements to the economy as a driver for new regulations at least thirty times. How will the new regulations spur economic development as compared to the existing Remediation Standard Regulations?
2. How many sites does DEEP anticipate will be placed into the program in the first year?
3. How many additional personnel will DEEP require to administer this new program?
4. If spills occur indoors and there is no path to the environment (such as a crack in flooring, floor drains, etc.) do such spills need to be reported and remediated in accordance with the new regulations? If so, why?
5. If spills occur outdoors in a sealed, contained enclosure (such as a lined berm) and there is no path to the environment (such as a crack in the berm, floor drains, etc.) do such spills need to be reported and remediated in accordance with the new regulations? If so, why?
6. Did you examine neighboring states like NY, NJ, MA, etc. as well as federal spill reporting requirements for lower bounds/reportable quantities for the reporting and remediation of spills? If not, why not?
7. Assuming you examined neighboring states like NY, NJ, MA, etc. as well as federal spill reporting requirements, why were the options for lower bounds/reportable quantities for the reporting and remediation of spills not included in the regulations as they are in other jurisdictions?
8. Did you examine neighboring states like NY, NJ, MA, etc. as well as federal requirements for the investigation and reporting of historic releases? If not, why not?
9. Assuming you examined neighboring states like NY, NJ, MA, etc. as well as federal requirements for the investigation and reporting of historic releases why was a lower bound for concentrations of contaminants not incorporated into the draft regulations?
10. Approximately how many spills are currently reported and remediated from single family homes? Approximately how many spills will be anticipated to be reported and remediated from single family homes under the new program?
11. With respect to the discovery of historic contamination, approximately how many single family homes are currently placed annually into a DEEP remediation program, either through regulatory requirements or voluntary programs?Approximately how many single family homes are estimated to be put into the new regulatory program as a result of the implementation of new regulations?
12. What allowances/exemptions are allowed for contamination found at single family homes under federal requirements and/or neighboring states such as NY, NJ or MA? What are the anticipated impacts to Connecticut's economy as a result of requirements that are stricter than neighboring jurisdictions?
13. Release characterization and the development of a conceptual site model are some of the most important elements of the investigation and remediation of historic releases. Why were such elements not included in the draft regulations?

Lee D. Hoffman (He/Him/His)
Attorney

Pullman & Comley LLC

CTDEEP Release Based Regulations

Questions/Comments

1. Soil is generated and stockpiled at our substations related to trenching for conduit installation, replacement of various equipment (transformers, breakers, etc.), or other projects that require soil excavation. All active and decommissioned substation projects that can't be cleaned up in 120 days will be Tier sites and will require characterization (under proposed RCBR). It is not feasible to completely delineate impacts within an active substation. Are any exceptions being considered for the investigation, remediation, and reporting of releases at active utilities?

2. Even if cleaned up in 120 days, under the proposed RCBRs, we are now required to submit a "Release Remediation Closure Report" verified by an LEP. Will this pull this site into the Voluntary Remediation Program?

3. What percentage of New/Historic Release Reports will be audited?

4. During significant storm events, the Utilities handle a large number of spills (sometimes hundreds in a 24 hour period). Will all of these need to be reported, regardless of quantity? Can we have an in house PEP handle the reporting?

5. What are the requirements to be a PEP?

6. We are concerned about gaining access to properties during due diligence for property transfers, or even for off-site delineation of plumes. During the CTDEEP presentation, this subject was mentioned and it was suggested that the requirement to report a "new/historic release" would depend on how the access was written up. Can you clarify?

7. When gas lines are being installed, or replaced in a public roadway, we often come across impacted/polluted soil. In many cases we do not know the source of the impacts. Will the utility be exempt from reporting every waste characterization sample with detections above background? To report every waste characterization of a miles long line install/replacement is not realistic.

8. Regarding the PEP provision, DEEP has stated that this will apply to individuals including inhouse staff. As it is currently proposed this is tied to a CGS 22a-454 permit/license, which is more applicable to companies. Please provide specific requirements for obtaining individual PEP authorization, including any minimum education, training or experience qualifications.

9. Will there be any minor or incidental releases that do not require PEP or LEP review and signoff?

10. Are there any requirements for new releases that are not considered an "emergent reportable release"?

11. Are there any considerations for limiting need for well analysis when releases are limited to roadway and cleaned in 12-24 hour window? Or for emergent releases under certain quantities?

12. Are full well receptor surveys viewed as necessary for determining wells within 500 feet of release? Are there mapping tools sufficient for this exercise?

Ken Collette

Eversource

Graham and Brendan,

Thank you again for providing the opportunity to ask these questions. As we have discussed, I think the stakeholder comments that DEEP ultimately receives will be much more constructive with the benefit of these question-and-answer sessions. I am also grateful that you have spent so much time speaking with various stakeholder groups and taking questions at the presentations. Some of these questions will be familiar, but I think there is value in getting them on the record in a full Working Group meeting, so all Working Group members have the same set of assumptions moving forward.

Applicability and Definitions

- What is the Department's understanding of what it means to be a person "maintaining" a release? Why was that not included in the definitions (or defined anywhere else)?

- I assume the present site owner would constitute the person "maintaining" the release during their period of ownership. Suppose the owner discovers a condition they did not cause, reports it, initiates remediation timely, and otherwise does everything right during their ownership period. Now suppose there is a sale. Is the new owner now the maintainer of the previously-reported release? Does the former owner bear any responsibility (following the sale) for the release they discovered and reported but did not create?

- How does the Department intend for the most minor releases, which are nonetheless reportable under §22a-450, to be addressed? If the Department intends for these draft regulations not to apply to a subset of reportable releases that are indoors or to impervious surfaces (and therefore arguably not to the "land and waters of the state"), please specify with precision which releases will be subject to these draft regulations.

- Conn. Gen. Stat. § 22a-133pp(7) defines "remediation" to include "determining the nature and extent of a release, in accordance with prevailing standards and guidelines" (i.e., characterization), in addition to the activities commonly captured when the word "remediation" is used in common parlance (i.e., the "containment, removal and mitigation of such release, and includes, but is not limited to, the reduction of pollution by monitored natural attenuation…"). In each instance the draft regs use the word "remediation" does the Department intend for that to include characterization? For example, when there is a requirement that remediation commences within two hours, would that be satisfied if the characterization phase commences within two hours? Would there be benefit in teasing out these two concepts?

Discovery

- In draft RCSA § 22a-134tt-2(a)(2), "actual knowledge" is said to exist if the creator/maintainer of the release knows of the "presence of substances in or on the land and waters of the state" identified by the detection of "concentrations of such substances above the laboratory reporting limit." What was the basis for deciding that actual knowledge exists upon the detection of constituents at <u>any level at all</u>, potentially well below any reporting level or remediation standard? What level of characterization will be required to document that there is no required reporting or remediation?

- Would the identification of a REC in a Phase I constitute constructive knowledge of a release? What if there is old data in the filing cabinet related to such potential release?

Characterization

- The definition of "tier characterization" includes the concept that "a release of polluted material that is discovered on a parcel currently used only for industrial/commercial activity may be characterized only to the extent needed to determine that it is prudent to remediate the polluted

material using the conditional exemption for historically impacted material, pursuant to section 22a-134t-9(j) of the RBCRs;" (p. 13, l. 443-46). Does historically impacted material on residential property (i.e., not eligible for permit by rule) need to be delineated to non-detect even when there is historically impacted material over a large area?

- One of the applicability conditions for the conditional exemption for historically impacted material is "it has been determined, through tier characterization, there is historically impacted material on the parcel and it is not prudent to remove such material;" (Draft RCSA § 22a-134tt-9(j)(1)(B)). Isn't this circular in light of the requirement that characterization is only required to the extent necessary to determine that it is prudent to use the conditional exemption for historically impacted material?

- How does the Department expect responsible parties to demonstrate that no SERs are present in the historically impacted material? (Draft RCSA § 22a-1234tt-9(j)(6)(C). Wouldn't that require proving a negative? How does this relate to the requirement that characterization is only necessary to the extent required to determine that use of the conditional exemption is prudent?

- "Tier characterization of a release shall be completed as soon as practicable, but not later than 1 year after discovery of such release." 22a-134tt-4(a)(3) (p. 32, l. 1119-20). What is the rationale for requiring tier characterization as soon as practicable (i.e., money is no object) when the tiering deadline is one year after discovery/occurrence of the release?

- What is the rationale for requiring delineation to non-detect for "full characterization?" As long as the area that must be actively addressed and/or monitored is identified, what is the benefit to "full characterization" as presently set forth? In other words, what benefit is there to human health in the environment by finding the non-detect edge of impacts rather than finding an edge at 10% of the RSRs, 25%, or 50%?

- At § 22a-134tt-4(b)(4) the draft regs say that "[n]otwithstanding the requirements of this section, a release remediation closure report certified by a PEP shall contain only such characterization necessary to demonstrate compliance with the applicable provisions of section 22a-134tt-8 of the RBCRs." What level of characterization will be required when an LEP verifies such a release (i.e., a release that would have been eligible for certification by a PEP)?

SERs and ERRs

- Reporting would be required within 2 hours of discovery for SERs considered "imminent hazards" including an SER discovered "within 500 feet of a residential activity, playground, recreation area or park." What is the rationale for requiring 2-hour reporting for SERs identified on the basis of soil contamination (15x DEC) within 500 feet of a residential use? Under present-day Conn. Gen. Stat. § 22a-6u(d)(1) such conditions are subject to a 90-day reporting period.

- For drinking water wells impacted by ERRs and SERs, an appropriate treatment system must be installed within 15 days of discovery that such well has been impacted, or the well must be replaced with a connection to an unimpacted public water supply system within 30 days. (22a-134tt-5(e)(1)(G); 22a-134tt-5(f)(1)(E)(iii). How were these timelines chosen? Are these timelines realistic? Why is there no provision for bottled water to be supplied while a connection to public water is being designed and constructed?

- Should the "and" in line 1668 be an "or" instead? Does the Department intend for an SER transition point to include both installation of a treatment system AND connection to a public water supply?

- When does the Department intend to require immediate action plans to be submitted? (draft RCSA §22a-134tt-5(j).

- For ERRS, an immediate action report must be submitted upon the earlier of 1) the release's assignment to a tier, or 2) submission of the remediation closure report. For SERs, the immediate action report must be submitted upon the earlier of 1) a deadline specified by the Commissioner (when?); 2) not more than 60 days after completion of the immediate actions; or 3) "not more than 1 year following discovery of an emergent reportable release or a significant existing release." (draft RCSA § 22a-134-5(k)(1)). Why not have the immediate action report due as part of the remediation closure report or tier checklist (whichever comes first) for both types of releases?

PEPs

- Subcommittee 10 recommended that LEPs close out all releases that impact groundwater. Why does DEEP propose to allow PEPs to certify release that have any impact to groundwater, assuming such impact is not persistent? (See draft RCSA § 22a-134tt-5(g)(1)(B)). Will PEPs be adequately trained to determine that groundwater impacts are not persistent?

- In draft RCSA § 22a-134tt-1(g), it says that DEEP will consider a person's training and education, professional experience, and credentials in determining whether to issue a PEP license to such person. What is the Department's thinking on the specific levels of education, experience and credentials that will be required? Why are those levels not specified in the draft regulations?

- How will the Department expect PEPs to determine where to place the well "immediately downgradient" of the release? Will PEPs have the level of training and experience to identify the appropriate location immediately downgradient? (See draft RCSA § 22a-134tt-8(a)(3)(B).

Additional required information

- When with the draft release characterization guidance document be developed? Will a draft be developed before the regs go to public notice?

- When with the draft release remediation closure report form be developed? Will a draft be developed before the regs go to public notice?

I look forward to continuing productive discussions.

Emilee

Hi –

Thank you for the conversation earlier this week. As a member of the transfer act working group, please find questions related to the proposed regulations.

1. Can DEEP clarify that no new or additional requirements are placed upon the transfer of residential real estate by the new transfer act regulations?
2. Additionally, can you please explain any differences and any benefits related to residential properties consisting of 1- 4 residential dwelling units related to the new regulations and requirements?

Our conversation led us to believe the answer will be that no new requirements with be placed upon residential real estate and any spills which do occur will be documented by DEEP in a much simpler manner than the currently process, but it will be helpful to have those answers in writing.

Thank you for your hard work,

Jim

Good Afternoon!

Below are a number of initial questions related to the draft regulations. Thank you for your attention and consideration.

1. Why do the draft regulations not include a definition for “maintainer” when the term is so important to understanding a person’s obligations under the regulations and the term has a long and convoluted caselaw history?

2. Has the Department considered whether it intends for a “maintainer” to always be a “maintainer” or if there will be an ability to cease qualifying as a “maintainer” (e.g., sell property)?

3. For an Immediate Action (22a-134tt-5), it requires “each person who created or is maintaining such release shall take immediate action . . . .” Does that mean that if the maintainer takes all the necessary actions but the creator does not, that the creator would be in violation of this requirement? Has the department considered rephrasing such wording to something such as “one or more persons who…”? (*See* Lines 1204, 1228)

4. The term “to the maximum extent practicable” is used in several places where persons are being required to take quick action (*See* Lines 1234, 1363, 1550, 1632, 1648), but the definition of that term includes the phrase “that the commissioner deems reasonable”. How is a person who is working quickly to comply with its immediate action obligations supposed to know what the commissioner deems reasonable?

5. Can 22a-134tt-1(e) be clarified to make it clear that the list of scenarios is an exhaustive list of Significant Existing Releases? (*See* Line 851)

6. As written, the trigger for having actual knowledge is knowing “of the presence of substances in or on the land and waters of the state” where “substances” means “an element, compound or material which, when added to air, water, soil, or sediment, may alter the physical, chemical, biological or other characteristic of such air, water, soil or sediment.” This is further compounded by subsection (A), which only requires such substances to be “above the laboratory reporting limit”, which itself does not necessarily indicate a release that violates the RSRs or is a threat to human health or the environment. Why does 22a-134tt-2(a)(2) not have any minimum threshold? (*See* Line 690)

7. Depending on the situation and individual, environmental attorneys could be deemed to have “specialized knowledge or training”. If they obtain knowledge of a SER would they be obligated by this law to disclose client confidential information? This presents a significant public policy consideration that should not be taken lightly. Did the Department consider the implication on an attorney’s duty of confidentiality to its client when drafting 22a-134tt-2(c)? (*See* Line 764)

8. In 22a-134tt-3(a)(1)(B)(i), is the regulated community to interpret “impacting” to mean above any amount, above laboratory detection, or above reporting criteria? (*See* Line 858)

9. For 22a-134tt-3(a)(1)(B)(iii), is the 500 feet from a property line where a residential activity, playground, recreation area, or park is present or from the actual activity? It appears it would be the former, based on 22a-134tt-1(f), but for such an important determination it could be clearer. (*See* Line 864)

10. If 22a-134tt-3(a)(2)(B) was in effect today, would it require the reporting of any release of PFAS, no matter the amount? (*See* Line 892)

11. Why does 22a-134tt-3(a)(2)(D)(iii) use “original intended use” and (iv) uses “still in use”? (*See* Line 917)

12. Is it the Department’s realistic expectation that a person will be in a position to submit a report containing all of the information listed in 22a-134tt-3(b)(1)? The use of “shall contain”, without any exception for reasonably available or obtainable, or that can be obtained without hindering that person’s response to the release would set well intentioned persons up for enforcement, non-compliance, or threats of the same. For example, (vii) uses “if such information is known”. Why is that phrase not included in (A) so it applies to all of the listed information? (*See* Line 930)

    a. “Silly” example, but Greenwich does not make its land records available online, so how is a person to find the map, block and lot number of a parcel in Greenwich in less than two hours (especially if after business hours for the clerk) and the regulations do not include an exception for unknown map, block and lot number, only an unknown address?

13. 22a-134tt-3(b)(1)(A)(xiii) requires the results of laboratory analysis identifying “each substance” present at greater than an applicable cleanup standard. Why is this requirement broader than the substances believed or known to be released? This could drastically expand a response/investigation. *See* 22a-134tt-5(f)(2)(D)(ii) where “for substances associated with the release” is included and would be appropriate in many other places throughout the RBCRs (e.g., 22a-134tt-5(f)(5)(i)(III)). (*See* Line 976)

14. The requirement in 22a-134tt-3(b)(1)(B)(i) appears circular – a person is required to report a SER by the timeframe in (a)(1), but then also required to submit “all known information” (very broad requirement) if not all information required by subdivision (1) is available at the time a report must be provided by the timeframe in (a)(1), which is the original reporting timeframe. Could the Department simply this language/requirement and create more precise guidelines for the reasonable amount of information a person is required to submit? (*See* Line 984)

15. How is a person to know under 22a-134tt-3(b)(1)(B)(ii) when a report is “incomplete”? (*See* Line 987)

16. Why does 22a-134tt-5(c)(1) use “if practicable” and (2) uses “or as soon as is practicable”? (*See* Line 1208 and 1212)

17. In 22a-134tt-5(e)(2)(B) “parcel adjacent” is used (Line 1324), whereas in the rest of the section distances in feet are used. The term is used in other places as well (Line 1267, 1427, 1475). Was this done intentionally to limit or expand the universe of where persons should be identifying wells? If so, it could be very limiting (definition of parcel includes any tract of land, which could include a roadway deeded to a municipality [e.g., 25 feet wide]) or very expansive (an adjacent parcel could be several thousands of acres).

18. Was it the Department’s intention to make 22a-134tt-5(e)(2)(E) apply to any release regardless of volume or concentration? (*see* “any…well impacted by <u>a release</u>”, where release is defined to be *any* spill, etc. regardless of volume or concentration) (*See* Line 1345)

19. What is intended to be covered by the use of the terms “occupied or in use” in 22a-134tt-5(e)(4)(A) and (f)(4)(A)? No definition is provided and those terms are not used together anywhere in Title 22a or RCSA 22a and the former would seem to be a subset of the latter. (*See* Lines 1363, 1550)

20. Under 22a-134tt-5(f)(1)(B) how is a person to collect samples 2 days after “such release” if they do not yet have actual or constructive knowledge of such release? Was it the Department’s intent to tie this requirement to discovery and not the release itself? (*See* Line 1427)

21. Under 22a-134tt-5(f)(1) would a person have the opportunity to demonstrate that the impacts to wells being observed are coming from another source before being required to take such significant actions? (*See* Line 1420)

22. 22a-134tt-5(g)(1)(B) uses the term "persistent groundwater impact" whereas in the definitions there is a term "persistent impact to groundwater" – are these intended to be the same? (*See* Line 1588)

23. Do the requirements of 22a-134tt-5 apply to any drinking water well, even those not actively being used or that have been abandoned? (*See* Line 1160)

24. Why in 22a-134tt-5(j)(4) does it state that the Commissioner "<u>may</u> review the immediate action plan, and <u>may</u> approve or reject such plan, in writing"? Shouldn't the regulated community get confirmation, one way or the other, whether a plan is sufficient and a timeline for expecting a response? (*See* Line 1733)

25. In 22a-134tt-5(k)(2)(F) the term "any substances still present" is used. Does an Immediate Action response for a spill of substance X require the person undertaking the response to investigate/sample for <u>all</u> substances to prove that there are not "any substances" still present? Some might say, prove the negative? (*See* Line 1776)

26. Why has no timeline or deadline been provided in 22a-134tt-5(k)(4) for the Department to audit immediate action reports? Similarly, why has no timeline or deadline been provided in 22a-134tt-6(c)(4) for auditing tier assignments? There is the potential to create substantial confusion, unrest, and uncertainty if the Department is not going to acknowledge acceptance of each report or tiering, but also not provide a date by which an audit/rejection must be issued.

27. Is subsection (B) of 22a-134tt-5(k)(4) meant to be referencing itself? (*See* Line 1800)

28. Under 22a-134tt-6(f), if a tier classification is submitted, and fee is paid, to assign a release to tier 1A (or 1B) but the Department "rejects" that classification and assigns the release to tier 1B, 2, or 3 (or 2 or 3), will the Department refund the difference in the fee paid and the fee due for the assigned tier? (*See* Line 1931)

29. Considering the lack of timelines/deadlines applicable to the Department, how will the Department ensure that the regulated community is not stuck paying recurring (and increasing) annual fees when it is the Department who is slow to response or is not responded at all? (*See* Line 1939)

30. Why were municipalities, government agencies, non-profits, and other similarly situated entities not exempted from paying fees? (*See* Line 1929)

31. The following questions relate to the financial assurance section (22a-134tt-7(c)) (*See* Line 2031), which retains the same issues the current RSRs have:

    a. Contrary to the practice in almost every other state (even now New Jersey) and the federal government, why does the Department continue to not allow the use of surety bonds? The use of Payment and/or Performance Bonds should be allowed.

        i. If the Department continues to refuse to allow the use of bonds, then remove 22a-134tt-7(c)(3)(B).

b. The language in this section comes from the Wave 2 RSRs, which have been in place for two years. However, the Department's website for Engineered Control Variances still lacks approved templates for a Certificate of Insurance and a Trust Agreement or Trust Fund. When will the approved templates/language referenced in the regulations be available for use? Based on the many documents to be created that are referenced in the RBCRs, this does not give confidence they will timely be made available.

c. The language in 22a-134tt-7(c)(4) is cribbed from 40 CFR 264.142 (or similar CFR section), but leaves out crucial language that explains how to calculate the inflation factor. In the CFRs (and every other state), this is done by dividing the latest published *annual* Deflator by the Deflator for the previous year. In section (4) it appears to require "multiplying the latest adjusted surety estimate for the site by that 5-year inflation factor". However, (a) it is not clear what a "surety estimate" is, especially as the Department does not allow the use of surety bonds; (b) the use of the term "site" will no longer be appropriate for the RBCRs (though if the Department intends to still reference these financial assurance sections for use under the Transfer Act, universal or inclusive language will need to be incorporated); and (c) there is no indication what "that 5-year inflation factor" means, how it is calculated, and where it comes from. (*See* Line 2066)

d. 22a-134tt-7(c)(4)(B) includes a reference to "subsection (g) of this section", which is left over from the RSRs. (*See* Line 2071)

32. 22a-134tt-7(d) requires that a sign must be erected and maintained whenever (broadly speaking) remediation is taking place. However, due to the very broad definition of "Remediation", which includes characterization, this would require that persons order, acquire, and erect a sign when they begin investigating (e.g., characterizing) a release, which in some instances must start within 2 hours of discovery. (*See* Line 2084)

33. 22a-134tt-7(d) [the second (d)] states that no further remediation of a release is required under this Section 7 if that release has been remediated and that remediation has been "approved in writing by the commissioner". Where in the RBCRs does a person get written approval of their remediation? For example, 22a-134tt-12(5) just says that unless rejected by the Department, no further action is required. Why did the department choose not to provide the regulated community with clear, written confirmation that remediation has been accepted/completed? (*See* Line 2157)

34. In 22a-134tt-13 why has the Department elected to not send written notice to a person whose document(s) has been audited and accepted? (*See* Line 4725)

35. In 22a-134tt-13 why has the Department elected to not provide a person with the opportunity to appeal/challenge a rejection, especially when the Department gave itself the power to retain any fee associated with a rejected record and cause the person to submit a new closure report and other documentation, presumably with new fees and at significant cost? (*See* Line 4883)

36. Did the Department intend, in 22a-134tt-13(e)(1)(C), to retain the authority to commence a focused or full audit on any documents submitted in connection with a release that has received a TI Variance, which includes post-verification monitoring, even if those documents were submitted decades earlier and reviewed, approved, and accepted by the Department in order to receive the TI Variance? (*See* Line 4908)

37. Why did the Department elect not to include definitions for all defined terms (e.g., "lands and waters of the state", "imminent hazard" (22a-134tt-3(a)(1)(B)), "significant risk of harm" (22a-134tt-3(a)(1)(B)))?

38. Can the Department provide a justification for drastically expanding the scope of characterization (e.g., to non-detect)?

Thank you for your hard work, long hours, and continued efforts related to these regulations.

Much appreciated.

Best,

Jon

Jonathan H. Schaefer (*he/him/his*)

Robinson & Cole LLP

AECOM

AECOM
500 Enterprise Drive
Rocky Hill, CT 06067
aecom.com

February 5, 2024

Graham Stevens
Bureau Chief,
Bureau of Water Protection and Land Use
Connecticut Department of Energy and
Environmenatal Protection
75 Elm Street
Hartford, CT 06106

Brendan Schain
Legal Director, Environmental Quality Branch
Connecticut Department of Energy and
Environmenatal Protection
75 Elm Street
Hartford, CT 06106

AECOM Comments to Released Base Cleanup Regulations

AECOM welcomes the promulgation of release-based cleanup regulations (RBCRs) that would provide a unified framework for reporting and responding to releases in the State of Connecticut and appreciate the amount of time and effort that has gone into developing the regulations to date. A consistent regulatory framework for investigating and remediating releases to the soil and groundwater in Connecticut will provide a benefit to all stakeholders (e.g. the public, business, environmental cleanup professionals, etc.). However, as currently presented we feel that additional work is needed to finalize regulations such that they are clear, easily implementable and lessen rather than increase the burden on Connecticut Department of Energy and Environmental Protection (CT DEEP) staff. We appreciate the opportunity to provide comments that are directed towards these ends.

General Comments

Based on our review of the notification elements, the draft requirements for reporting are very broad and if retained, the proposed regulations are likely to generate numerous new sites, including sites that do not pose a risk to public health or the environment. Has CT DEEP evaluated the potential number of reportable releases likely to be discovered based on comparison to nearby states with established release reporting regulations or estimated the costs of administering the additional sites, to ensure that the funds raised by program fees are adequate or such that the legislature can appropriate adequate funds for CT DEEP to support staff levels to meet their obligations to manage the potential increase in release sites subject to the proposed regulations?

The proposed regulations appear to require the characterization of Discovered Releases at concentrations well below the cleanup standards. The proposed regulations imply that all releases (defined as anything detected above a laboratory reporting limit) need to be characterized. While it may be true that concentrations of a substance detected below a clean-up standard may represent a release or historical release, the determination of whether a release is a reportable release needs to be clarified. A release should only be reportable if it could drive remediation. Therefore, a threshold above the very low concentrations that are detectable by laboratories should be established to determine whether a detection belongs in the site cleanup program. This threshold could be established cleanup criteria or some fraction thereof, and those criteria should be appropriate to the use of the property and the mapped groundwater category beneath a site. Similarly, the existing cleanup standards or fraction thereof for groundwater could also serve as reporting thresholds for groundwater. Regardless of the threshold, the regulations should clarify that releases discovered at concentrations that would not require remediation as they are below the clean-up standards should be exempt from the need for reporting or further characterization. The need to characterize releases that would not require remediation would comprise a significant burden on individuals and businesses in the State of Connecticut and on CT DEEP staff. If the CT DEEP has a concern that concentrations detected below cleanup criteria would not

be adequately characterized such that higher concentrations that could exceed cleanup criteria go undetected, we suggest that due diligence practices currently being performed by the environmental professional community would mitigate against such an outcome.

In addition to the above general comments, specific comments are provided below for select sections as follows:

Definitions and Terminology

The definition of “substance“ is too broad and should be revised. While the desire to use broad definitions to limit exceptions is understood, the breadth of this definition is virtually infinite. To make these proposed regulations manageable, substances subject to these regulations need to be defined by individual chemical, family of compounds, or classes of materials as a list of those substance governed or excluded from the regulations. Other parts of the regulations make reference to “contaminants.” This term has the connotation of referring to potentially harmful substances, which is an improvement. However, the term is also not defined in the regulation. Regardless, some definition of the materials governed by these regulations are necessary, such that the regulations can be applied.

The phrase “maintaining a release” and “maintainer” are used throughout the regulations without defining the terms, except by various references scattered through the regulations. Use of such jargon without explicit definitions creates ambiguities regarding responsibilities for managing releases under the regulations. Such phrases need to be defined in the regulations.

The definition (76) “Laboratory Reporting Limit” incorrectly references 22a-134tt-1(e). The refence should be to 22a-134tt-1(d) which is the section titled General Requirements for Analytical Data. (e) is Significant Environmental Hazards.

Definition (99) “Permitted Environmental Professional” AECOM does not agree that this concept is needed and if adopted, will create an entire environmental subprogram that will require administration. Given the LEP program exists and serves this purpose, we recommend deleting this concept from the regulations. We note that the Massachusetts program does not utilize such a subcategory of permitted individual to implement cleanup regulations and New Jersey has only a limited subprogram that is confined to work within their underground storage tank program. We suggest this definition be deleted. As it is written we note that it states such person is authorized to certify release records. This definition should be revised by removing the ....”to certify release records” as we believe they would be allowed to do more than just certify release records. For example, they are allowed to investigate and oversee remediation.

Definition (156) “Upgradient Area” this definition seems to incorrectly limit such area. For example, a plume could migrate in a direction other than the groundwater flow. This definition should allow for the direction of the impact and not necessarily groundwater flow. This definition also seems to limit the upgradient area to just one upgradient property, which may not be the case in many circumstances.

Can the Department define the word “Newly” in the title of Section 22a-134tt-3-Reporting of Newly Discovered Existing Releases. The following text seems to just reference an existing release without any reference to a “newly” discovered release.

Significant Existing Releases

22a-134tt-1(e)(4)(D) exempts the detection of air contaminants in indoor air that derive from use of materials in an industrial setting. However, homeowners who perform woodwork, household maintenance, auto repair, etc. can introduce chemicals to indoor air similar to industrial users. There is no need to restrict the exemption to industrial sites.

Discovery of Releases

Section 22a-134tt-2 (f) Naturally Occurring Metals at the Time of Discovery. Why is the arsenic level for Naturally Occurring Background Metals Value for Connecticut so low? Arsenic is often found and known to be background at concentrations well over the current 10 mg/kg standards.

Licensing of Permitted Environmental Professionals

As noted above in the definition of Permitted Environmental Professional, we believe there is no need for a new class of Connecticut specific licensure for cleanup of simple spills. There are existing qualifications such as Professional Engineers from Connecticut and other states, Certified Hazardous Materials Managers, and environmental remediation licenses from other states that would qualify a person to perform the role envisioned for permitted environmental professionals (PEPs), as well as numerous LEPs who could readily fulfill that role while overseeing less experienced staff in the performance of activities designated to PEPs.

If PEPs are to remain in the regulations, objective standards for their licensure are needed, rather than the vague description of factors to be considered by the Commissioner in deciding whether to issue such a license.

Release Reporting

As previously noted, AECOM believes that the release reporting triggers for the RBCRs need to be clarified. The regulations exempt reporting of releases when the evidence of a release is “data available or generated before the date when [these] regulations are first adopted.” What constitutes “data” for such an exemption? Many of the lines of evidence identified as constituent elements of “constructive knowledge” could have been discovered prior to the adoption of these regulations. Would an old Phase I report with photographic evidence of a release or reports of staining or odors in soil, for example, constitute constructive knowledge, or would it be subject to the exemption? The regulations should clearly state that reporting requirements apply to analytical data collected after the date of adoption and also as previously noted provide reportable concentrations that are based on the cleanup criteria and not require reporting of data that is below the reportable concentrations.

If retained as currently written, defining the discovery of a release as detection of a substance at any concentration above laboratory detection limits will unnecessarily burden all stakeholders and produce an overwhelming administrative burden on CT DEEP. It is easily envisioned that combined with the broad definition of substance, a gardener testing the nutrient content of his soil would be required to collect three samples and compare results to the table provided in 22a-134tt-2(f)(1) to avoid discovering a release. Furthermore, certain substances are ubiquitous statewide or in certain portions of the state, and detection limits are often much lower than concentrations of potential concern, which will result in *de minimus* detections requiring release reporting for virtually any development project in the state. As previously noted, we recommend establishing numerical release reporting criteria based on applicable cleanup criteria to accompany the list of substances subject to release.

The proposed regulations may subject businesses and individuals to investigation and reporting requirements not intended by the spirit of the regulations, for example:

- Natural resource businesses in Connecticut such as gravel/ aggregate suppliers may be required to report a “release” due to naturally occurring substances with concentrations above published criteria, such as arsenic;
- Any business due to the presence of trace petroleum concentrations incidental to the business operations; or
- Any detection above laboratory reporting limits, which appears to require investigation and characterization even though concentrations may be far below cleanup standards.

Laboratory reporting limits for some compounds can be very low, much lower than risk-based criteria levels. The regulations should include numeric criteria other than laboratory reporting limits, as the threshold above which investigation is required.

The findings typical in some Phase I environmental site evaluations seem to fulfil the requirements of constructive knowledge of a release and discovery of a release (22a-134tt-2(a)(3)(A)(ii)(I), (III), (VI)), so a Phase I would these types of findings would be subject to the RBCRs and investigation cleanup/ timeline requirements?

We hope the Department is contemplating an online release reporting application.

AECOM

Tiers

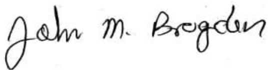
Why has the Department designed Tiers 1A and 1B? Why not just use 1,2,3 and 4, which would be simpler.

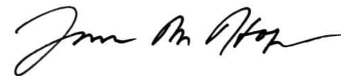
22a-124tt-6(d) Cleanup Oversight. Would seem to imply that an LEP may not fully oversee a Tier 3 cleanup. (d)(4) should be revised to state…" Releases assigned to tier 3 may be supervised by a LEP, QEP,..."

Standards

The premise for the Managed Multifamily Residential Direct Exposure Criteria for Soil (Appendix 11) and the Passive Recreation Direct Exposure Criteria (Appendix 12) would seem to provide some relief in the form of less stringent cleanup standards. However, the standards in both of these categories for benzo(a)pyrene (BAP) are less than the current Direct Exposure Criteria of 1 mg/kg. The standard for lead has remained unchanged. Given that lead and BAP are common contaminants driving the need for remediation at sites in Connecticut, providing no relief for these two compounds will significantly limit the use of these standards. These two standards should incorporate more reasonable and higher criteria for lead and BAP as they have for other constituents.

Sincerely,





John M. Brogden, LEP
Project Manager

Patrick Haskell, LEP
Technical Lead, Environment

Lawrence Hogan, PG, LEP, LSP
Associate Vice President

Daniel Seremet, PE, LEP
Project Manager

Hi Graham,

Again, thank you for the call earlier this week call with Brendan Schain and others at UI. The clarifications provided have helped us better understand some the impacts the new program will have on operations. Based on the call and review of the proposed regulations, we have developed the following list of questions for consideration that I would like to provide to the Working Group.

1. Regarding utility trenching/excavations and the use of virgin or processed material (not affected by a release) as backfill, can this material be used as backfill in the trench or excavation if background/baseline concentrations (specifically metals) are exceeded but less than cleanup criteria without notification or approval by CT DEEP or an LEP?

2. In an effort to maintain worker's safety, waste management, and conduct geotechnical investigations for infrastructure updates, maintenance, or other like activities, utilities regularly complete soil and groundwater sampling and analysis on properties not owned by the utility. Property owners may include CTDOT, residential, commercial, industrial, municipalities, land trusts, etc. What are the obligations for reporting under these new regulations for industry that does not own the property where sampling has been completed and identified releases?

3. Excavation work for non-environmental related work often encounters groundwater that is managed. In historically developed urban or industrial areas (e.g. GB groundwater), the groundwater frequently contains contaminants where the contractor was not the creator and they are not working for the maintainer. When will a receptor survey be required to evaluate if certain SEH/SER conditions for these situations?

4. Several business property owners (transportation, utilities, manufacturing, oil and gas, etc.) have existed in the state for decades and own property where environmental site assessments and/or investigations have been conducted, and as appropriated, may be at various stages of remedial action planning on site-wide basis. These properties, aka legacy sites, were often planned for the VRP or cleanup under the Transfer Act. a) Although having prior analytical data or the report containing such data alone does not meet discovery, is there a scenario where historical knowledge and documentation that is dated prior to the regulation date would meet the Constructive Knowledge definition? b) For sites with multiple releases, and/or comingled releases, will an LEP be allowed to manage such on area or site-wide basis rather than by release?

5. Given the similarities in use, or the limited use, of utility rights-of-way to the proposed "New Risk-Based Remediation Criteria for Managed Multifamily Residential and Passive Recreational Exposure Scenarios", could these provisions be extended to include such land?

6. What will be the reporting requirements for sites that are in federal cleanup programs, such as RCRA Corrective Action or TSCA, but not subject to a state program. Will collection of new data at these site result in a state reporting requirement?

7. The definition of "Practicable" does not include a consideration for worker or public safety needs such as restoring power, gas, water or other services. Could this definition be revised

to include an exception to avoid the potential public hazard of extending a service outage for the purposes of remediation and awaiting analytical data.

8 A similar variance to the Public Roadway Variance for other existing public utility infrastructure (i.e. railroads, busway, water mains, storm lines, sewer, power, etc.) should be considered.

9 "Permitted Environmental Professional" or "PEP" is defined in the proposed regulations (22a134tt-1 Definitions and Miscellaneous Provisions) as a person authorized by a permit issued pursuant to Section 22a-454 of the CGS to certify release records. CGS Section 22a-454 indicates permits can be issued for businesses that collect, store, treat, and/or dispose of the listed wastes in the aforementioned Section.

a. Can the CTDEEP please clarify if businesses that are already permitted for collecting, storing, treating, or disposing of the listed waste types in CGS Section 22a-454 will be considered "PEPs"? And can a business that employs a PEP or LEP serve in that role for releases under the new program.

b. Further clarification on training and education, duration and nature of a person's professional experience, and credentials/licenses necessary to satisfy the commissioners issuance of a PEP license should be considered.

c. "Permit" and "License" seem to be utilized synonymously for a PEP authorization issuance from the Commissioner. Should these be considered like-for-like, or did CTDEEP intend to define these separately?

10 A Notice of Intent was filed by the CTDEEP on November 20, 2023, and in accordance with Section 22a-209f(c)(2)(A), for a Large-Scale Filling Pilot Program. Have the drafted regulations taken into consideration the Large-Scale Filling Pilot Program and any affects it may have on the proposed program?

Regards,
Eric

Eric J. Boswell
Project Manager / Projects / Remediation Group

TRANSITION ADVISORY GROUP

Elizabeth Barton, Ann Catino, Franca DeRosa, Nancy Mendel and Tim Whiting

February 6, 2024

Via E-Mail

Graham J. Stevens
Brendan Schain, Esq.
Connecticut Department of Energy and Environmental Protection
79 Elm Street
Hartford, CT 06106-5127

Re: Comments on Draft Release-Based Cleanup Regulations

Dear Graham and Brendan,

The Transition Advisory Group (TAG) appreciates you recently meeting with us to discuss the Draft Release-Based Cleanup Regulations (RBCRs). We acknowledge the hard work that you and others at DEEP have dedicated to drafting the RBCRs, released on December 29, 2023, and to speaking to many interest groups and responding to questions. Your flexibility and willingness to address the concerns by various interest groups will ensure a better set of RBCRs that will enable them to be applied in a more successful manner.

We have heard many references in the Working Group meetings and other group meetings to the TAG Team "working on" or "dealing with" some key issues. However, some of the key issues that we have outlined in previous memos we submitted to you (for example, see list of issues in the attached October 12, 2021 memo and the April 18, 2023 voluntary remediation memo) are not resolved and we are using this opportunity to outline what we have identified at this point as some of the more significant issues below for further discussion and resolution.

1. <u>Conflicts between the Draft Release-Based Cleanup Regulations and existing environmental statutes and regulations</u> – We previously provided you with a list of some of the statutes and regulations that require changes. Having these revisions wait until after the (RBCRs) are promulgated is not effective or reasonable. We submit this timeline/sequencing will undermine the success of the (RBCRs). This presents circumstances analogous to the EUR regulations that were passed without corresponding forms and applications, which effectively shut down the EUR process for more than six months. <u>Question</u>: Has the Department begun to identify the various statutes and regulations that will require revision and, if so, can you please provide us with a list of same (as well as any draft language if available)?

2. <u>Compatibility with the Transfer Act</u> – In our previous discussions, we were told that the sites in the Transfer Act program prior to the implementation of the RBCRs would remain in the Transfer Act program. It now appears that new releases or newly discovered historic releases discovered at Transfer Act sites after the effective date of the RBCRs will be subject to the Transfer Act <u>and</u> the Release-Based Cleanup Regulations. Transfer Act sites with these releases would require compliance with the revised RSRs in the RBCRs, involve multiple verifications/certifications (as well as other filings), and trigger the potential for

multiple audits. Not a more efficient or streamlined process. Additionally, it is not clear whether existing Transfer Act sites will be afforded the option to use the new compliance methods introduced in the proposed RBCRs, which is a topic the TAG members discussed with you. Our strong recommendation is that the regulations be revised to confirm that the new releases or newly discovered historic releases discovered at Transfer Act sites after the effective date of the RBCRs be reported but be allowed to be closed out exclusively under the Transfer Act program. Question: Would the Department be willing to implement this option to facilitate, rather than complicate, the closure of existing Transfer Act sites?

3. RSRs – Based on our recent discussions, we understand that, upon implementation of the RBCRs, the RSRs included in the RBCRs (including some edits) will be the controlling cleanup regulations. The old RSR sections will exist only to cross reference their correlating sections in the RBCRs. Questions: How will the Department handle sites currently being remediated to the existing RSRs upon the adoption of the new RBCRs? Has the Department evaluated the potential for statutory or regulatory conflicts resulting from the revisions to the RSRs under the RBCRs' program including the revised applicability provision in the RBCRs?

4. Voluntary Programs – It is unclear how CT DEEP intends to deal with the Voluntary Programs. See our attached April 18, 2023, memo on the importance of these programs. Further, it has become clear from a review of the draft regulations that, without the option/ability to opt out of the RBCRs and enter a Voluntary Program, which Voluntary Program would cover multiple releases on a property under a single program/filing/REM ID#, under the RBCRs, that same site with 10 historic releases (for example) would require 10 reports/filings and10 initial and recurring fees, create the potential for 10 penalty assessments, and involve multiple timelines and multiple tiers /tiering processes, not to mention the implementation cost impacts. Again, not a more efficient, cost effective and streamlined process, and not a process that would encourage more comprehensive, site-wide remediation efforts. Also, it is discouraging to note that, relative to a site-/parcel-/property-wide investigation and remediation approach or option, CT DEEP's Winter 2024 RBCR slide presentation states on slide #12 "Voluntary parcel-wide investigation and cleanup option planned." Questions: Will this approach/option be included in the RBCRs? When and how will it be defined and implemented?

5. "Maintainer" Status – The "maintainer" status provisions in the RBCRs are particularly troublesome and lacking in definition. There are provisions that allow CT DEEP to unilaterally to determine that a property owner (as well as a tenant?) is a maintainer of a release, including without, for example, any deference to the existing "upgradient contamination" policy. These provisions do not state any right to appeal by the claimed maintainer, which violates existing administrative law and/or creates a new strict liability standard. Question: Will the Department be sharing for comment a clear definition of "Maintainer" and provide for a right to appeal?

6. RCRA Closure – Questions: Has the EPA approved the RBCRs? When and how will the EPA RCRA authorization documents with CT DEEP (including the Memorandum of Understanding between CT DEEP and EPA Region 1) be revised?

7. Audits – As we discussed, the CT DEEP's current determination of "no audit" for verification has great value for transactions and for assuring lenders that an endpoint has been reached in the remediation process. As indicated, this is a reference point in many existing transactional documents. We proposed that a "no audit" feature be added to the RBCRs. Further, the extended period in the draft RBCRs for CT DEEP audits will necessarily have a detrimental effect on transactions in Connecticut. During our discussion, you raised the issue of resource concerns and burdens on the Department as a rationale. Questions: Will the Department revisit these two issues, both the need for a "no audit" notification and firm reasonable timelines? Has the Department conducted a review of the extra resources that will be needed to be able to implement and manage this new RBCR program successfully? If yes, what actions will be needed to ensure there are sufficient resources and support (including those that are technology-based) in place prior to the adoption of the regulations?

Thank you for your consideration of these issues (as well as others we have raised). We remain willing and able to assist the Department with resolving these as part of the next turn of the regulations.

Sincerely,

TRANSITION ADVISORY GROUP

Elizabeth Barton
Ann Catino
Franca DeRosa
Nancy Mendel
Tim Whiting

PREVIOUS TAG MEMOS

CT DEEP RELEASE-BASED REMEDIATION OF HAZARDOUS WASTE PROGRAM REGULATIONS
TRANSITION GROUP RECOMMENDATIONS
JUNE 2021

The members of the Transition Group include Beth Barton, Ann Catino, Franca DeRosa, Nancy Mendel and Tim Whiting. Tim is a CT LEP and the remaining members are environmental attorneys.

The Transition Group has been meeting twice a month with Graham Stevens of CT DEEP since February 2021 to discuss transition issues related to the new proposed Release-Based Remediation of Hazardous Waste Program Regulations, as required by Public Act 20-9, which has been codified at C.G.S. Section 22a-133pp, et seq. Brendan Schain, Esq. of CT DEEP participated on one of our video conferences and we understand he will continue to be involved with our group. We are not a formal Working Group or Working Group Subcommittee created by CT DEEP; we were formed in response to the identification of a void or gap regarding transition from and integration with existing programs, including the statutes and regulations relating to those programs (as well as, in some respects, reporting and remediation in general).

Our primary goal is to identify the potential impacts the new release-based program and regulations will have on the existing CT DEEP programs and make suggestions on how to properly and practically integrate them to: (i) minimize uncertainty and provide clarity when and/or where overlap of programs may exist; (ii) support consistency and predictability; and (iii) provide clear guidelines to achieve finality and closure with no unintended consequences. Accordingly, to date, our focus has been on the Transfer Act and the RSRs, particularly since there are approximately 4,500 sites currently in the Transfer Act program (with others still being added daily) that need to achieve closure. We recognize that we will also need to look at other state and federal programs and statutes, including but not limited to, Brownfields, the Voluntary Program, Underground Storage Tanks, Significant Environmental Hazard reporting, RCRA Closures, USEPA Brownfield Funding Programs, and Municipal Liability statutes, and also review certain categories of regulatory documentation, such as Covenants Not to Sue and Stewardship Permits.

We believe it is important to document our recommendations to guide CT DEEP's development of the Release-Based Remediation of Hazardous Waste Program. We recognize that some of our recommendations may require statutory or regulatory changes. This is necessarily a dynamic document and the Transition Group will continue to update its recommendations as appropriate.

Recommendations:

1. Maintain the RSRs. We believe it is critical for the RSRs to remain in place and not be replaced or eliminated by the Release-Based Remediation of Hazardous Waste

Program Regulations. Everyone agrees that the RSRs are "released-based" and "risk-based" standards. The RSRs are referenced either directly or indirectly in 30 existing environmental statutes, which involve 26 legislatively created programs. The attached table shows the various statutory programs that refer to the RSRs as the basis for the remedial activities and/or liability relief. The RSRs set the standards for each of these programs and have provided the roadmap to closure relied upon by the regulated community and other constituents.

If the RSRs are eliminated or replaced, the impact on each of these programs needs to be considered. Each program either needs thoughtful modification through legislation to reflect integration with the new release-based remediation program or the statutory program may need to be repealed to eliminate confusion and/or dual or duplicative regulation.

For the Transfer Act, the RSRs (as amended) are the standards that used and relied on since 1996 to assess and remediate properties; they have formed the basis for legal documents and negotiations allocating environmental obligations, liabilities, and risk. Certainly, for the 4500 sites in the Transfer Act or the numerous sites in any of the Brownfields Programs, the Voluntary Program, RCRA Closures, USEPA Brownfield Funding Programs (or other statutes or programs that comprise the list of 30), we cannot change the requirements mid-stream without creating chaos, negatively impacting the path to regulatory closure, and adversely impacting various immunities and liability protections that currently exist and may have been relied upon by property owners, municipalities, and lenders, among others.

The vision is that whenever a site or a release area needs to be investigated and remediated, the RSRs should be the standards used for assessment and remediation to achieve closure of the site or the release area. The point of entry may be the Transfer Act, the Voluntary Programs, Brownfields, UST, or the Remediation of Hazardous Waste Program Program Regulations, but once you are in one of the programs, the release or the site (as applicable) should use the RSRs for assessment, remediation, monitoring, and closure.

2. Allow use of the Alternatives in the Release-Based Remediation Program Regulations. Although the RSRs should remain in place, the options and compliance mechanisms under the Release-Based Remediation of Hazardous Waste Program Regulations should be accessible to those in other programs. So, for example, if the Release-Based Remediation of Hazardous Waste Program Regulations allow for the use of risk assessments to close out a release area, that option should be available to close out releases on Transfer Act or other programs sites.

3. Standard of Care. Currently, the regulated community uses the Site Characterization Guidance Document (SCGD), dated September 1, 2007 and revised December 2010, as the standard of care for characterization of sites. It is necessary to either supplement and update this technical guidance document for future use for the Release-Based Remediation of Hazardous Waste Program Regulations or incorporate new standards

of care directly into the Release-Based Remediation of Hazardous Waste Program Regulations.

4. <u>Assessment of Incorporating Existing Programs into the Release-Based Remediation of Hazardous Waste Program Regulations</u>. As part of any transition, existing regulations and programs should be assessed to determine whether it is appropriate/necessary to integrate them into the new regulations. The attached table identifies the existing statutory programs that rely upon the RSRs and each statutory program should be assessed to determine affirmatively how it fits - or whether it fits - into the Release-Based Remediation of Hazardous Waste Program Regulations Release-Based Remediation Program. For example, we believe the Significant Environmental Hazard ("SEH") statute should be incorporated into the new regulations. This would ensure consistency in reporting requirements and help the regulated community determine next steps that may be required for a SEH site. We are, however, interested in the perspectives of the various subgroups. Thereafter, we may be in a better position to provide recommendations as to statutory integration.

5. <u>Overlap with Release Reporting Regulations</u>. CT DEEP is in the process of finalizing the proposed Release Reporting Regulations (C.G.S. §§22a-450-1 to 22a-450-6). There is a concern that there is not consistency with, or clear integration between, those proposed regulations and the "yet to be drafted" Release-Based Remediation of Hazardous Waste Program Regulations, which will include regulatory provisions relating to the reporting of releases. Without clear integration, once a release is reported, owners and responsible parties will be left with uncertainty as to what steps to take or which program will govern further compliance.

6. <u>Staffing and Resources</u>. A thorough review and evaluation of CT DEEP staff resources (present and future) are critical with the addition of new release locations/sites under the Release-Based Remediation of Hazardous Waste Program to the already 4500+ sites that CT DEEP staff is currently overseeing under the Transfer Act (not to mention the current and continuing commitment of CT DEEP staff resources to, for example, auditing and the review and approval of Environmental Use Restrictions).

   This analysis is especially needed against the backdrop of the reality of many recent and additional projected CT DEEP staff retirements and the greater demand for CT DEEP staff with risk-assessment experience. As noted in the June 9, 2021 Connecticut Law Tribune article:

   "By 2022, retirements at the Department of Energy and Environmental Protection (DEEP) will result in the loss of 44% of the staff in its Environmental Quality Division, and more than 30% department wide."

   "DEEP has been struggling to find ways to mitigate the effects of this impending loss of human resources, but it has not been—and will not be—easy. The CREATES report identified, for example, that DEEP has an extremely high attrition rate with younger

employees, many staying less than five years and making successional planning a 'pain-point.'"

"The immense human resources problem at DEEP is the imminent challenge and our sustainability and resiliency as a state is dependent upon our success in solving it."

Based on this reduction in staff, it is important to understand what happens to all the Transfer Act sites if limited existing remediation staff is reassigned to dealing with the new Release-Based Remediation of Hazardous Waste Program releases and/or sites? The Transfer Act sites will still need CT DEEP staff attention to close them out and make each of these sites marketable. With the Transfer Act sites, CT DEEP staff is typically dealing with one entire site and releases at that entire site at one time, under one remediation ID number. When the Release-Based Remediation Program begins, will the same CT DEEP staff be dealing with individual releases under that program, which could mean there will now be multiple releases, each assigned a remediation ID number, at a site, not just (although perhaps in some instances in addition to) the entire site being handled under the Transfer Act approach? All stakeholders want the Release-Based Remediation Program to be successful, but it will only be successful if there are appropriate staffing and resources.

7. Transition Group as Facilitators. The Transition Group intends to continue to make recommendations relating to the integration of the Release-Based Remediation Program and the programs identified on the attached table, including when and where legislative changes are needed and/or recommended. We also understand that there is concern that the new program may be overly broad, with potential to impact all residential properties in the State, which may be overwhelming and economically detrimental to the State and its citizens. To be most effective, the Transition Group proposes to review the concept papers submitted by each of the formal Working Group Subcommittees. After that review, we would plan to meet with representatives of each Working Group Subcommittee to discuss transition issues, with a focus on a comprehensive, deliberate, and effective strategy to handle the transition issues, and to identify where gaps may exist that would not serve the State's economic development interests, while also being protective of human health and the environment.

Programs that Directly Refer To RSRs CGS 22a-133k	Statute	Compliance Reference
Significant Environmental Hazard	22a-6u	RSRs provide thresholds for reporting and/or further action and remediation
Clean up of hazardous waste disposal sites	22a-133a	Final remedial action for a haz waste disposal site is a remedy consistent with RSRs
Environmental Use Restrictions / NAUL	22a-133o	References compliance with RSRs
EUR invalidity	22a-133r	If EUR is void, remediation is to RSRs
LEP licensing	22a-133v	LEP test tests applicant's knowledge of investigation & remediation IAW RSRs
Voluntary site remediation program in GB & GC areas	22a-133w	Requires compliance to RSRs
Voluntary Investigation & remediation of contaminated real property	22a-133x	"Release area" is defined per 22a-133k regulations & remediation must follow RSRs
Voluntary site remediation program in GB & GC areas	22a-133y	Requires compliance to RSRs
Covenant Not to sue prospective purchasers with Commissioner's approval of remediation plan	22a-133aa	Requires compliance to RSRs
Covenant Not to sue prospective purchasers with LEP's approval of remediation plan	22a-133bb	Covenant not to sue between DEEP and proposective purchaser based upon a remediation plan "of the property" per 22a-133k regulations & entry into 22a-133x or 22a-133y program or TA or verification
New Property owner's immunity from Third Party liability for conditions that existed prior to taking title	22a-133ee	Requires compliance to RSRs
Transfer Act	22a-134	Requires compliance to RSRs
Ownership of Unpermitted Solid Waste Disposal Facility	22a-208a(c)	Requires owner to submit a closure plan and provide public notice of such plan in a manner set forth in 22a-133k or remediate such disposal area IAW a remediation plan approved by DEEP or LEP pursuant to 22a-133x, 22a-133y or TA
UST Fund & clean up program	22a-449c, 22a-449f, 22a-449m and 22a-449p	RSRs create threshold cleanup standards
Certification of activity affecting floodplain	25-68d	Provides an exemption for mills from floodplain certification if remedial activity is subject to RSRs
DECD Brownfield Programs (Chapter 588gg) that rely upon applicants entering into a program, e.g., 22a-133x, which ultimately directs them to the RSRs either directly or through definition of remediation found in 22a-134, which refers to 22a-133k		
Brownfield Grant Program	32-763	Grant recipient must be in TA or enter into 22a-133x, 22a-133y, 32-768 or 32-769
Brownfield Loan Program	32-765	Loan recipient must be in TA or enter into 22a-133x, 22a-133y, 32-768 or 32-769
ABC Program	32-768	ABC requires entry into 22a-133x; note that it requires investigation of such property in accordance with prevailing standards and guidelines & remediation in accordance with regs "established for remediation" adopted by DEEP)
BRRP Program	32-769	Investigation of release or threatened release is to "prevailing standards and guidelines", remediation is for entire property; reference is to "remediation standards" as defined in 22a-134, which refers to 22a-133k; and LEP must provide a verification/interim verification
Municipal Tax Abatement for Brownfields	12-81r	Munie & prospective owner enter into an agreement for tax abatement, provided owner entres into 22a-133x, 22a-133y, 32-768 or 32-769 or be in Transfer Act
CT Brownfield Redevelopment Authority	32-11e	CBRDA (or its subsidiary) authority relating to funds necessary property acquisition & disposition, property improvement and compliance with 12-81r, 22a-133m(h), 22a-133x(b), 22a-133aa, 22a-133bb, 22a-133dd, the TA, 22a-452f, 32-7e, & 32-23pp to 32-23rr
Liability Waiver for Pre-Existing Conditions	32-764	Provides grant recipients with liability relief provided recipient is in TA or enter into 22a-133x, 22a-133y, 32-768 or 32-769 (& includes successors) & provided remediation is per 22a-133k
Other Statutes / Concepts for Transition Discussion		
Innocent Landowner Defense	22a-452d & 22a-452e	Innocent landowners not liable for pre-existing conditions
Lender Liability	22a-452f	Lender exemption from liability
Role of LEP v. Non LEP	22a-133v	LEP licensing & responsibility to protect human health & the environment
Municipal Brownfield Liability Relief program	22a-133ii	Provides liability relief for pre-existing conditions to Municipalities, other municipal entities and land banks

CT DEEP RELEASE-BASED REMEDIATION OF HAZARDOUS WASTE PROGRAM REGULATIONS
TRANSITIONS GROUP REPORT
October 12, 2021

The Transitions Group[1] (the "Group") has continued its efforts to identify transition issues related to the new proposed Release-Based Remediation program. As indicated in the Group's June 2021 Recommendations, the Group reviewed the five Working Group Subcommittees' concept papers and, thereafter, met with each Working Group Subcommittee's co-chairs. The intent was to facilitate the identification of issues that may inhibit or complicate the creation of a uniform, streamlined release-based program that furthers and supports the State's economic development interests while also being protective of human health and the environment.

During the discussions with the Working Group Subcommittees' co-chairs, significant transition issues were identified. We heard a number of commonly-held concerns. The participants are earnest in moving a released-based program forward but raised significant concerns about how the new program fits into, complements or replaces existing established programs. To the Group, it appears that the ambiguities, gaps and/or uncertainties we heard present challenges that were universally communicated as needing to be addressed and resolved prior to the effective date of any new released-based program.

The common themes raised to the Transition Group by the co-chairs include:

1. Significant Environmental Hazard ("SEH") program – a state statutory program (C.G.S. Section 22a-6u). The SEH program is release-based and includes at a minimum a short-term remedy component. How will this integrate? It may/may not be consistent with the concepts of an "immediate response" or "tiering" that are to guide action inextricably associated with or even driven by the seriousness of the risk presented. Should the SEH program remain? Will it be replaced by an "immediate response"? Or does it roll into it? Should it remain until the release is assigned to a tier? Concerns were clearly raised that there would be a dual regulatory structure with dueling requirements that will leave the regulated community quite confused as to what program/requirements to follow. General sentiment is that there should not be two separate reporting programs. Statutory changes are needed given that the SEH program is an existing, stand-alone statutory program.
    a. Tiers. The "tiers" concept – proposed to provide alternate paths. Can you move between or among the tiers? What are the exit ramps? Until you enter a path, is the SEH program the option?

2. The Underground Storage Tank requirements – a state statutory program (C.G.S. Section 22a-449 et seq.). The federal and state programs are already confusing, and regulation already exists on each level. Single family residential tanks are currently excluded. Are they to be included in the new release-based program? Should releases from all USTs be outside the release-based program and continue to be stand-alone?

[1] The Transitions Group includes Attorneys Beth Barton, Ann Catino, Franca DeRosa, and Nancy Mendel and LEP Tim Whiting.

3. Integration with C.G.S. Section 22a-450 and the new Spill Regulations. If there is an immediate spill/release, what regulations will control? Will the new release-based regulations be combined with the new spill regulations? Can immediate response actions developed pursuant to the release-based program be used to address immediate releases as well as historic releases? Is Spill reporting just reporting? If yes, will there be two reports? Need to address duplication, redundancy and inevitable confusion. If the new spill regulations are enacted prior to the pending RBP regulations, how will spill response and closure by guided and accomplished?

4. Transfer Act – a state statutory program (C.G.S. Section 22a-134). How will historical unknown releases be addressed if these releases were missed or otherwise not specifically addressed during the Transfer Act/RSR process? What if a new release is discovered prior to verification? What program applies? Only one program should apply (the Transfer Act? Or can it be closed out under the new program? Can there be an option?).

5. CERCLA/AAI, RCRA, TSCA, Federal PCB programs. How will consistency with the federal programs be achieved? And, also with other state programs? Will a single report of a release be allowed, or will the same release have to be reported multiple times on multiple forms? Is the "innocent landowner defense," a stalwart of the federal program and also codified in Connecticut (C.G.S Sections 22a-452d and 22a-452e) eliminated? Are the other statutes providing immunity similarly rendered a nullity (e.g., C.G.S. Section 22a-133ee)? How will the covenants not to sue programs (C.G.S. Sections 22a-133aa and 22a-133bb) be affected? Overall, there is a clear need for unifying existing statutes, DEEP regulations and programs PRIOR to the new regulations taking effect. Also, before the new regulations take effect, there needs to be clarity regarding integration of the new release-based program with the federal programs. What happens to the Memorandum of Agreement between DEEP and EPA Region I?

6. Logistics.
    a. Implementation. How will all of this be implemented? Will DEEP have a "concierge" to call? A liaison to make sure it is all coordinated? Does DEEP have the staff? Does DEEP and DOH have the risk assessors in numbers and experience to administer, implement, and support the process? If DEEP intends to rely on the LEPs, the requirements should be clearly articulated to facilitate implementation.
    b. Tracking System. Will DEEP implement a unified online searchable database tracking system for reported releases and respective status, accessible to the public?
    c. Definition of "Site" and Future of "Site-Wide" approaches. Can/should/how do site wide approaches remain? What is a "site" under the new program? Is it the entire property? How is the site/entire property distinguished from the site of a release area? How is "site" used?
    d. RSRs. Will the RSRs be replaced, supplemented or otherwise revised by these new regulations?
    e. Guidance/Forms – The clear consensus is that ALL RELEVANT GUIDANCE AND FORMS HAVE TO BE DEVELOPED AND AVAILABLE PRIOR TO THE TIME THE REGULATIONS GO INTO EFFECT.

i. The existing <u>Sitewide Characterization Guidance document</u> needs to be re-written and/or rendered inapplicable. Or is it still applicable and, if yes, to what? What about the ASTM standards – are they applicable any longer? How does the ASTM approach fit with the new release-based approach?

ii. Alternatively, another guidance document needs to be written (a "<u>Release Characterization Guidance Document</u>") to make clear expectations under the new release-based program. This needs to be available before any program becomes final and takes effect, otherwise no one (including perhaps most notably LEPs) will know what the expectations are and it will all be case-by-case. Questions need to be addressed so that the process, milestones, and end points are known and clear (*e.g.*, if an isolated release triggers reporting and it is commingled with fill or another plume, what do you do?) Do the changes to the end points (and is the ultimate end point the RSR compliance?) affect characterization? How? Or is it an entirely different approach based upon the risk assessed by the LEP?

iii. Several groups identified the need for clear, streamlined forms for all releases before the effective date, and an ability to complete and submit reports online.

f. <u>LEPs</u> - ROLE OF THE LEP HAS TO BE CLEARLY DEFINED BY THE TIME THE REGULATIONS GO INTO EFFECT. What is the role of the LEP? Will the LEP regulations change? Will there be other licensing requirements? What work can or has to be done by an LEP versus a non-LEP (*e.g.,* a qualified environmental professional)? What type of additional training will there be? How will non-LEPs be held accountable? What type of information can LEPs rely upon (if work is done by non-LEPs)? What can an LEP stamp or certify? The RBP program should not effectively exclude LEPs from performing due diligence work as has been the case in NJ.

g. <u>Impact on Municipalities</u>. This issue of municipal impact was raised by some groups and this Group believes it is significant. On a site foreclosed or to be foreclosed (which site may/may not be entered into a brownfield program), can a municipality simply make a site "safe" and await a buyer/developer, and if so how? What are the off ramps for municipalities?

h. <u>Residential Properties</u>. The issue of requirements that apply to releases on residential properties was raised by several Subcommittees interviewed. The Group understands that it is currently being reviewed by one of the Ad Hoc groups. Should the RBP include distinctions between owner-occupied residential properties (i.e., one- and two-family housing units) and multi-tenant residential rental properties?

The Transition Group agrees with the observations above (which are illustrative at this point of an overarching concern about coordination and clarity and not necessarily exhaustive). In particular, if a unified program is the goal, considerable work needs to be done to revise and integrate statutes (likely, at least, all 30 statutes identified in the Group's June 2021 report), and to develop new regulations (beyond simply the release-based regulations) and guidance documents. Otherwise, the goal of achieving a clear path forward to foster and support economic development in the State will likely not be achieved. Confusion, with overlapping and potentially conflicting programs, will result. Releases will not be remediated. There will be more questions than answers. All statutory conflicts and

inconsistencies should be addressed before any new program is in effect. The role of the LEP must be understood and all necessary guidance clearly needs to be in place. Forms also need to be in place before any new program becomes effective. The recent experience, backlog and delay associated with the sunsetting of the ELUR forms while the EUR forms were under development needs to be avoided at all costs. Without a clear path forward, the legislature's goals will not be achieved.

Release-Based Regulations - Transition Advisory Group
Notes from February 28, 2022 Meeting

Attendees: Beth Barton, Day Pitney
Ann Catino, Halloran Sage
Franca DeRosa, Brown Rudnick
Nancy Mendel, Winnick Ruben Hoffnung Peabody & Mendel
Tim Whiting, Ramboll
Collectively the Transition Advisory Group ("TAG")

Graham Stevens, CT DEEP
Brendan Schain, CT DEEP

On February 28, 2022, TAG had a video conference with Graham Stevens and Brendan Schain, Esq. of CT DEEP to discuss: (1) what activities TAG should be undertaking at this time; and (2) the timeline for those activities. There was consensus that TAG should continue to focus on the impact of the proposed release-based regulations on existing statutes and regulations and the need for revisions (through legislation, regulations, or otherwise). With regard to timeline, it was agreed that since the regulations have not been drafted, it is premature to develop strategies and solutions for provisions that conflict or need modification. Please note that, in the TAG recommendations memorandum of June 21, 2021, TAG already outlined the statutes and regulations that will require some modification or other consideration.

During our discussion, the following baseline assumptions were discussed. TAG believes it would be helpful to share these assumptions with the Working Group:

(1) It is CT DEEP's intent to share at least sections of the proposed regulations with the Working Group for review and comment prior to submission for regs review. Per CT DEEP, it's expected that this will be an iterative process with comments and revisions constantly ongoing.

(2) CT DEEP's current estimate is that the release-based regulations will be submitted later this year for public comment. It is CT DEEP's goal to build consensus among the Working Group members and other interested constituents prior to formal submittal of the draft regulations for public comment.

(3) It is CT DEEP's intent to create a new task force soon to review and propose solutions to the LEP requirements and implementation issues.

(4) CT DEEP has tried to get non-LEPs involved (like remediation contractors) who can sign off on small releases with lower risk. To date, that constituency has not been actively involved, but CT DEEP will continue to encourage their involvement.

(5) Once the regulations are enacted, CT DEEP indicated that CTDEEP has the flexibility to decide an effective date that may be later than Public Act 20-9's passage date or October 1 of the operative year. A later date could provide flexibility to address other statutes and regulations that require modification and to draft and finalize any forms that may be needed.

Release-Based Remediation Regulations/Voluntary Remediation Programs
TAG Team Overview
April 18, 2023

Overview:

There are currently two Voluntary Remediation Programs in Connecticut: Connecticut General Statutes §22a-133x and §22a-133y. We were asked by CT DEEP to consider whether these programs should be eliminated and merged into the Release-Based Remediation Program and the regulations that are currently being drafted to further CT DEEP's goals of: (1) moving towards one comprehensive remediation program in Connecticut; and (2) eliminating unlimited/establishing set timeframes for achieving regulatory closure at sites being investigated and remediated under the Voluntary Remediation Programs.

Conclusion:

As more fully discussed below, we believe it is imperative that Connecticut retain the Voluntary Remediation Programs as stand-alone statutes as an option for *site-wide* cleanups, with opportunities available, if desired, that would allow for: (1) the transitioning of a site that is already in a Voluntary Remediation Program to the Release-Based Remediation Program; (2) sites where there are releases within the Released-Based Remediation Program to opt into one of the Voluntary Remediation Programs; and (3) sites in the Voluntary Remediation Programs to utilize or implement any newly created or revised options or methods within the Release-Based Remediation Program to attain regulatory compliance, including where doing so would be quicker or more cost effective.

Discussion:

Reportedly, there are currently 8,000 sites in the Voluntary Remediation Programs. For many of these sites, enrollment in the §22a-133x Voluntary Remediation Program was associated with involvement in the Brownfield Remediation & Liability Relief Funds Programs, for example, the Abandoned Brownfield Cleanup Program. Entry into the §22a-133x Voluntary Remediation Program is a regulatory prerequisite to applying for and obtaining both DECD and EPA Brownfield funds under these programs.

It is critical to the successful redevelopment of these sites that there be maximum flexibility (consistent with protection of human health and the environment) and no set time frame for regulatory closure. The funding for these sites may not be applied for or received all at one time. When accepted into any of the brownfield funding programs, the funds are often times disbursed over a lengthy period of time and/or based on or tied to the specific or designated use of the funds (i.e., investigation, remediation, types of contamination). The timing of various rounds for the application for and awarding of funds, as well as the general availability of both state and federal funds, is often unpredictable. The disbursement of funds may not be triggered until the viable redevelopment stage of the sites (so-called "shovel-ready sites"); getting to this stage can take years of development-related and permitting activity, which may be accomplished in phases.

Presently brownfields sites enrolled in the brownfields programs are specifically exempted from regulation under the Release-Based Remediation Program pursuant to CGS §22a-134vv(a). It is strongly recommended that sites otherwise in either of the two state Voluntary Remediation Programs also should be similarly exempted.

There are also sites enrolled in the Voluntary Remediation Programs in order to: utilize an otherwise unavailable remedial strategy that is not self-implementing, for example, engineered controls and Environmental Use Restrictions; have the certainty of a CT DEEP or LEP verification that the entire property has been fully remediated in accordance with the RSRs; ensure a site-wide clean-up of properties for future marketing and anticipated transactions; and/or obtain liability relief (which may be transferable). With the advent of the Release-Based Remediation Program, some of these site owners may have adequate incentive to transition from a Voluntary Remediation Program to the Release-Based Remediation Program. For example, the Release-Based Remediation Program would not require investigation and remediation of the entire parcel, but rather only discrete release areas. This transition would result in release-specific remediation that is subject to set timelines for its completion, which has been pointed to by CT DEEP as a goal. But eliminating the existing Voluntary Remediation Programs and moving all sites into the Release-Based Remediation Program, thereby imposing timelines that do not currently exist within the Voluntary Remediation Programs, would remove one of the key incentives for site-wide clean-ups in the Voluntary Remediation Programs. Imposing such deadlines, particularly when there is not a significant risk to human health or the environment, could create unintended impediments to ensuring the continuation of robust site-wide brownfield remediation.

The TAG Team recommends: (1) that the Release-Based Remediation Regulations currently being drafted include provisions and/or mechanisms to: a) allow, but not require, sites in the Voluntary Remediation Programs to transition to the Release-Based Remediation Program voluntarily; and b) allow sites in the Release-Based Remediation Program to opt into one of the Voluntary Remediation Programs, particularly if site-wide investigation and remediation is the goal; (2) revision of CGS §22a-134pp(2) to include specific reference to both Voluntary Remediation Programs (CGS §22a-133x and §22a-133y); and (3) enabling sites in the Voluntary Remediation Programs to utilize or implement any newly created or revised options or methods within the Release-Based Remediation Program to attain regulatory compliance, including when such option or method is quicker or more cost effective.

Connecticut Society For Women Environmental Professionals

February 6, 2024

Graham Stevens & Brendan Schain
Connecticut Department of Energy and Environmental Protection
DEEP.Cleanup.Transform@ct.gov

Re: **SWEP-CT Questions on the CTDEEP draft RBCP Regulations**

Graham & Brendan:

SWEP-CT, by and through its undersigned members, as members of the Release-Based Regulations Working Group, and with the support of the Co-Chairs and undersigned members of SWEP-CT, submits for your consideration the enclosed questions on the draft Release-Based Cleanup Regulations issued on December 29, 2023.

Thank you for your consideration.

Respectfully submitted:

Nancy Mendel, Esq. – Working Group Member

Emilee Mooney Scott, Esq. – Working Group Member

Sam Haydock, LEP – Working Group Member

Beth Barton, Esq. – Working Group Member

With the support of:

Joy Kloss, LEP, CHMM (SWEP-CT Co-Chair)

Deborah Brancato, Esq. (SWEP-CT Co-Chair)

Jon Schaefer, Esq.

Elizabeth Fortino, Esq.

Victoria Man, LEP

Rebecca Merz

Christa Mandler

Aaron Silva, LEP

Holly Winger, Esq.

<u>SWEP-CT Questions on the December 29, 2023 Draft Proposed Release-Based Cleanup Regulations</u>
February 6, 2024

<u>Definitions</u>:

- Can definitions of "maintainer" and "creator" be added?
- Can a definition of "observed change in condition" be added?
- The definition of "Exigent Condition" reads entirely discretionary; can more definitive language be added to frame the Commissioner's use of this discretion?
- The concept of characterization ("determining the nature and extent of a release") is in the definition of "remediation," which seems problematic and likely to lead to confusion. Since this appears to stem from the statutory definition of "remediation" in Chapter 445b, is a revision to the statute planned as part of the cleanup/statutory adjustments?

<u>Discovery</u>:

- 22a-134tt-2(a): the rebuttable presumption provision allows only use of analytical data; does this afford adequate due process and/or does DEEP plan to provide a forum/opportunity to be heard where counter-evidence can be presented?
- The exclusion from discovery for when the "only evidence of such release is data available or generated before the date when regulations were first adopted" is a subject of confusion/varying interpretation; based on clarifications provided to date, can definitions of "only evidence" and/or "data" be added to highlight typical scenarios that would *not* constitute discovery? So for example, "The only evidence of release" shall not be deemed to include the following: (i) delivery of environmental reports to any person investigating/inquiring about the parcel generated prior to the date when regs first adopted; (ii) identification of an ASTM REC, CREC, or HREC in a Phase I prepared after the date when regs first adopted, which is based solely upon facts/data generated prior the date when regs first adopted; etc.
- What actions need to be taken if a release is discovered during waste characterization sampling for a public roadway/bridge project? Note that the release may not reside under pavement.

<u>Reporting</u>

- What is the justification for changes to/more stringent timeframes from Significant Environmental Hazards (SEHs) to new Significant Environmental Releases (SERs)? Can you please identify all the changes?
- What if despite best efforts, timeframe cannot be met (e.g./particularly, SER one-hour to notify maintainer)? Can concept of reasonableness (if ascertainable) from current SEH statute be included?
- Since the Spill Reporting Regs require reporting releases under 10 lbs/1.5 gals if not removed/mitigated within 2 hours "by trained personnel," then all "small" spills of this magnitude not addressed by such highly qualified "trained personnel" as that is defined in the Spill Regs, to land/waters of state, will then be required to go through RBCP?
  - Can there be more flexibility to achieve compliance for the "small spill" scenario where onsite owner/staff respond and take the necessary steps?

    - Should there be any exemptions/nuanced expectations for the "small" spill scenario? (Particularly for minor household residential scenarios, so expectation—DEEP doesn't expect/want reports of the carwash soap spills—can be more clearly reflected in the regulations?)
- Can you clarify the options/expectations for a new SER vs. EER for existing Transfer Act sites?

Immediate Actions

- What if despite best efforts Emergent Reportable Release response times cannot be met? (e.g., 15 days to install a treatment system; 36 hours to ensure sampling of all potential wells). Can concepts of reasonableness/good faith efforts/feasible methods of contact/time allowances for unforeseen delays be added?

Characterization

- In light of CTDEEP responses to questions to date about the requirement for "full characterization" to ND at time of regulatory closure, should this be removed from the regulations in favor of more flexible concepts (in the regs or in the guidance being developed) that match consistency with industry standards and risk/site-specific CSM considerations?
- For protocols for characterization, should concept of use of industry standards be incorporated (perhaps instead blanket ability to post guidance on website)?

Residential

- Can additional "special paths" (in addition to home heating oil scenario at 22a-134tt-8(b)) be added to mitigate against potential burdensome obligations that could now arise at residential sites? For example, finding PFAS in drinking water well-immediate response similar to SEH would be required, and is reasonable; but will homeowner be expected to monitor indefinitely, enter a tier, pay annual fees, and achieve compliance for a ubiquitous state-wide problem they did not cause?
- Will / can there be a grace/ramp-up period for applicability to residential properties?

Miscellaneous

- When will new program forms be provided?
- Can accompanying guidance referenced in the regulations be drafted/available (e.g., regarding characterization) *before* DEEP notices intent to publish the regulations?
- Can you specify all the circumstances LEP could be subject to penalties, or liability for failure to comply, under the new penalty schedule?
- Can a bundling concept be introduced to allow for more efficiency / less burden and varying tracks, when dealing with either multiple issues or site-wide efforts?
- Annual fees apply but CTDEEP is not held to any specific time period requirements for response, and has allowance for "available resources"; can DEEP introduce a tolling or stay provision on the clock, if delay is caused by lack of CTDEEP resources to review in timely manner?
- What happens to sites already in 133x/133y once the RBCP is effective?
- Notice signage is required for any "active remediation" and "remediation" of any ERR; since "remediation" includes concept of characterization, is it expectation that signage is required prior to investigation? If not, clarification appears needed about when signs are required.
- Would the new cleanup standard for passive recreation apply to surplus soils excavated for new trail projects along the ROW of municipal or state roads?
- Can APS standards be incorporated into RSR sections?

Hi all,

Here are two short ahead-of-time questions:

Would DEEP please consider limiting the definition of "Remediation" to what has always been considered remediation (i.e., containment, removal and/**or [add "or"]** mitigation..), and remove reference to determining the degree and extent characterization? It seem on the face of it that blending/conflating "remediation" and "characterization" using the current definition will lead to confusion (e.g.,. when referring to past remediation, perhaps of the same release areas as addressed under the new program, that does not meet the current present draft definition of remediation).

In Section 22a-134tt-5(d)(2) – page 36 – "Full characterization" (which is a defined term) and "complete characterization" (which is not a defined term) are both used in the same paragraph. Are they different, or did you intend to use "full characterization" both times? If different, please add a definition for "complete characterization".

Thank you,

Evan

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Evan J. Glass
ALTA Environmental Corporation
121 Broadway
Colchester, CT 06415

Ph: (860) 537-2582
Mobile: (860) 338-0967
Fax: (860) 537-8374

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From: Evan Glass
Sent: Saturday, January 13, 2024 11:26 AM
To: 'Zane, Ashley' <Ashley.Zane@cbia.com>; Stevens, Graham <Graham.Stevens@ct.gov>; Schain, Brendan <Brendan.Schain@ct.gov>; Eric Gjede <eric@statehouselobbying.com>
Subject: RE: E2 Meeting: Release Based Draft Regulations DEEP Presentation

Hi all,

Here is an ahead-of-time question:

Would DEEP consider changing the definition of "Full characterization" of a release from "to the points at which it is no longer detected" to "to the degree necessary for remedial decision making and demonstrating compliance with the remediation standards for soil and groundwater"?

Point source releases are approximate “bulls-eye-type patterns” in three dimensions, and the *outer compliant zones* can be reliably delineated without necessarily testing to “the points at which it is no longer detected”. Non-point source releases, such as commonly-occurring site-wide urban fill horizons, are *generally not amenable* to testing to “the points at which it is no longer detected”, in the horizontal directions.

Changing the definition per above would still require characterization of a release from “to the points at which it is no longer detected” for certain circumstances where pertinent such as (i) determining the extent of a groundwater plume to assess whether it not such plume reaches/discharges to surface water, (ii) determining attainment of non-detectable background concentrations for a groundwater plume in an area where non-detectable concentrations are the regulatory standard, and (iii) perhaps some others.

But for the most part and unless I’m missing something, it seems that characterization of a release “to the points at which it is no longer detected” is not necessary, and would be costly without risk-based benefit.

Together with this change, it may be understandable to consider requiring characterization *and remediation* of a select group of the “emergent reportable releases” to soil (i.e., new spills, particularly the small-sized ones) “to the points at which it is no longer detected” Meeting this more stringent standard for this group of releases may make sense because: (i) the releases are new and less subject to having large impacted-yet-compliant outer zones (i.e., they generally will have sharp boundaries between the impacted and unimpacted zones, so meeting the more stringent standard generally should not entail significant *additional* cost), (ii) they are small (by definition) and the *total cost* to remediate them is also small in comparison to large releases, and (iii) this requirement would reduce or eliminate the leaving behind of multitudes of compliant-yet-impacted outer zones.

Thanks for the opportunity to post questions, and for your careful consideration of them.

Evan

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Evan J. Glass
ALTA Environmental Corporation

During the Q&A session of the subject presentation, I raised the question of whether LEPs & PEPs will be able to certify contemporaneous spill clean-ups on the behalf of their employer in those situations where the employer is liable for the release. Under current LEP regulations, an LEP would be unable to certify such a clean-up because the employer has a financial interest in the release. Will future PEP regulations include such a prohibition? Will a company need to rely on third party LEPs/PEPs to certify contemporaneous clean-ups?

To give context for my question, my department at Eversource successfully manages the clean-up of 500+ contemporaneous transformer spills annually in Connecticut. My coworkers and I understand that in the future, a licensed individual will have to certify these clean-ups pursuant to the proposed regulations. It is our sincere hope that we, as LEPs and/or future PEPs, will continue to close out these spills on behalf of Eversource without having to rely on third party consultants, as the vast majority of these spills include small volumes to the ground surface only.

Thanks,

Michael M. Gaughan, LEP
Environmental Coordinator
Eversource Energy Service Co.

Hi Brendan,
I sincerely apologize, but we had some last-minute additions/revisions to the questions from our membership. Here is the revised list:

1. Does DEEP have the budget to administer this program in terms of personnel and technology?
2. Assuming you examined neighboring states like NY, NJ, MA, etc., why were those options for lower bounds for the investigation and remediation of spills and quantities not included in the regulations? Additionally, why were they not included for historical releases?
3. How did you arrive at the fee structure and will this make the state competitive with neighboring states?
4. Are you open to creating a cap on fees per site in a given time period in order to avoid significant impacts to business' budgets? If no, why?
5. Are you open to creating a cap on fees per site in a given time period in order to avoid significant impacts to business' budgets? If not, why? If so, what would your proposed change to the regulations be?
6. Connecticut is currently in a housing crisis, and we have seen inward migration patterns from our neighboring states like New York, why were residential properties included in the emergent release portion of the regulations? What sort of impact do you estimate that these regulations will have on homebuyers? On homeowners?
7. Approximately how many spills are currently reported and remediated from single family homes? Approximately how many spills will be anticipated to be reported and remediated from single family homes under the new program?
8. Connecticut is currently in a housing crisis and we have seen inward migration patterns from our neighboring states like New York, why were residential properties included in the regulations? Do you believe that these regulations will not have a negative impact on homebuyers?
9. The number one ask from businesses is predictability and stability from the state government. Why are timelines not included in the audit process? Will DEEP commit to providing **all** of the guidance documents and forms for the new program to the public for comment prior to finalizing the regulations? If not, why not?
10. Will there be a difference in liability and additional risk for businesses who select to use a PEP versus a LEP for minor spills?

Thanks and I'm sorry,
Ashley

Ashley Zane
Senior Public Policy Associate | CBIA

As requested, here is my question:

What actions need to be taken if a release is discovered during waste characterization sampling for a public or municipal roadway/bridge project? Note that the release may not reside under pavement.

I'm currently evaluating how different CTDOT/municipal scenarios would navigate through the draft RBC program.

Thank you,

Joy Kloss, LEP, CHMM
Senior Project Manager
Principal
BL Companies | *Employee owned. Client driven.*

Priority	Line #	Topic	Universal?	DOT + Muni	DOT only	Context	Question for DEEP
A	693	Soil stockpile samples	U		D	Disposal facilities require test results for a lot of parameters. Samples can come from a pile of excess soil destined for disposal. Lab analysis detects substances (but still acceptable to the disposal facility).	Does data obtained from soil samples collected from a stockpile constitute actual knowledge of a release?
A	693	In-situ excess soil characterization	U		D	Disposal facilities require test results for a lot of parameters. Samples can come from borings in areas that will generate excess material as part of construction. Lab analysis detects substances (but still acceptable to the disposal facility).	Does data obtained from in situ soil samples collected as part of planning for soil disposal constitute actual knowledge of a release?
A	693	Groundwater samples collected in advance of a construction project	U		D	Groundwater samples are collected from areas of deep excavations and/or shallow groundwater when the planned project abuts high risk properties, to plan for proper construction dewatering management.	Does data obtained from groundwater sampling done for the purpose of planning for construction dewatering management constitute actual knowledge of a release? Can the regulations stipulate that only disolved phase detections constitute a reportable release (e.g. filtered samples) like the MCP does?
A	693	Construction dewatering monitoring	U		D	Construction dewatering wastewater discharged under the General Permit for Remediation Wastewater requires periodic sampling. Lab analysis detects expected and unexpected substances (but still acceptable under the discharge permit).	Does groundwater data obtained from discharge monitoring under the General Permit for Remediation Wastewatercollected constitute actual knowledge of a release?
A	686	Maintain	U			There's case law that does not help DOT avoid being a maintainer. Only clarification DEEP is providing is that a maintainer is the owner or entity that controls a property with no further explanation of "control".	What are the various ways by which a person could be "maintaining" a release? Is ownership the only way that Maintain is established? Can there be more than one "Maintainer"? Owner vs. occupier vs. operator. How does responsibility get assigned? Apportioned by DEEP? Based on assets like 22a-471?
A	693	Any soil detections = reportable releases	U			Actual knowledge includes the results of laboratory analysis of soil, groundwater indicating concentrations of such substances above the laboratory reporting limit.	Will DEEP consider something less ubiquitous than any detections? than any detections? (DOT and municipal must consider anything as being incidental to roadways before deciding a detection is a reportable release.)
A	900	Any soil detections = reportable releases	U			Report within 365 days any lab detections found in soil or groundwater if not otherwise remediated and verified.	Will DEEP consider something less ubiquitous than any detections? (DOT must consider anything as being incidental before deciding a detection is a reportable release.)
A	636	Salt		D+M		Significant Existing Releases include a release that has caused or is causing contamination of a public or private drinking water well.	Do salt or other materials used to make roads safe and passable during snow and ice events that cause contamination in a public or private drinking well constitute a release? A Significant Existing Release? One that requires closure through the RBCR's and not just by providing a potable water supply? Is the presence of salt in the landscaped or grassy areas beyond the outer edge of the travel way constitute an incidental release? Should salt and similar materials be treated the same way that pesticides are treated?
A	907	Old releases anywhere withing the public roadway ROW		D+M		The provisions for cleanups in the public ROW are cumbersome. Determining and pursuing responsible parties for releases in the public ROW is challenging if not unfeasible. Exempt the public ROW.	Can the types of releases exempt from reporting include existing releases discovered within and beneath public roadways as well as the landscaped or grassy areas beyond the outer edge of the travel way when the public roadway owner is not the creator? Can the types of reportable releases (past and present) exepmt motor vehicle fluids from passenger vehicles, like in the MCP?
A	686, others	Create vs. Maintain		D+M		The provisions for cleanups in the public ROW are cumbersome. Determining and pursuing responsible parties for releases in the public ROW is challenging if not unfeasible. Exempt the public ROW.	How does DEEP intent to resolve responsibility when Creator and Maintainer are not the same? Does DEEP intend to assign Maintainer responsibility to owners of public roadways when the Creator is not the owner? When the Creator is not known (like an old spill)? To federal, quasi-federal and state owners of rail corridors when the Creator is not the owner?
A	N/A	Exempt acquisitions by condemning authorities		D+M		The Transfer Act exempts establishments acquired by condemning authorities from having to enter the Transfer Act cleanup program.	Can the regulations exempt acquisitions by condemning authorities from having to report, like the existing Transfer Act does?
A	907	Old releases anywhere within the federal, quasi-federal or state-owned railway ROW			D	Regardless of MN or Amtrak legal exemptions. state-owned freight lines	Can the types of releases exempt from reporting include existing releases discovered within the entire federal, quasi-federal or state-owned railway ROW when the owner is not the creator?
A	907	Incidental railway contaminants			D	Regardless of MN or Amtrak legal exemptions. state-owned freight lines	Can the types of releases exempt from reporting include existing releases discovered as incidental to within the entire federal, quasi-federal or state-owned railway ROW.

A	1156	PEP Certifications: roadway or railway, sampling or no sampling			D	DOT's spill contractors and LEPs are reluctant to certify a spill, even a small spill, is closed without sampling. Sampling will no doubt detect substances from overlapping old spills. This will lead to bonafide remediation and reporting for every roadside spill from DOT equipment.	Can a PEP certify a roadside spill impacting only pavement and soil has met the RBCR's without sampling? What does "a release remediation closure report certified by a PEP shall contain only such characterization necessary to demonstrate compliance with the applicable provisions of section 22a-134tt-8 of the RBCRs" mean?
B	724	Constructive Knowledge and asphalt in soil	U			The observed presence of asphalt in soil is one of the multiple lines of evidence that establish constructive knowledge of a release. Asphalt fragments are everywhere where any sort of site redevelopment has occurred when the site had been previously paved.	Can "asphalt" be deleted from the multiple lines of evidence that establish constructive knowledge of a release?
B	781	Spills that are not required to be reported	U			A release of less than five (5) gallons of oil or petroleum contained and removed or otherwise properly mitigated within two (2) hours of discovery is not required to be reported under RSCA 22a-450-2. Reported releases under 22a-450 become emergent releases. The RBCR are silent about releases that don't have to be reported under 22a-450.	Is a release less than five (5) gallons of oil or petroleum contained and removed or otherwise properly mitigated within two (2) hours of discovery that goes unreported in accordance with 22a-450 regs still considered an emergent release under RBCR requiring closure certification from a PEP (or LEP)?
B	1156	Permitted Environmental Professionals (PEPs)	U			PEP's are a proposed class of environmental professional who will be authorized to certify that smaller spill responses are clean-done. Impacts whether roadside spills from DOT equipment turn into long-term remediation projects or not. PEP qualifications and how to become a PEP not defined.	Will DEEP consider moving forward with these regulations only at such time when the qualifications and process by which Permitted Environmental Professionals (PEP) will be accredited is defined?
B	1156	PEP Certifications: when an LEP fills the PEP role	U			Spill contractors as potential PEPs are reluctant to certify spills as closed. They will defer to LEPs.	Can someone be both an LEP and a PEP? If so, when certifying a closure report under 22a-134tt-8, will the same prevailing standards apply as if a non-LEP PEP were certifying? Is the LEP going to be held to a higher standard than a PEP when the LEP is performing as a PEP?
B	664	Public roadway = industrial/ commercial		D+M		If the regs won't exempt public transportation ROWs....The regs define industrial commercial activity, residential activity, and public roadways. The nature of public roadways is industrial/commercial. Public roadways, by regulation, should be able to take advantage of the compliance alternatives (e.g., more lenient cleanup standards) available to industrial/commercial activities.	Can the regulations codify that public roadways as well as the landscaped or grassy areas beyond the outer edge of the travel way constitute industrial/ commercial activity, regardless of the land use abutting the roadway, and without having to secure an EUR?
B	693	Data obtained from collecting samples in publicly accessible areas.		D+M		What does a state or municipality have to do if someone has data indicative of a release based on samples collected from within the public roadway ROW without the permissions of the roadway owner?	What if actual knowledge of a presumptive release was unwantedly provided, to a person who would be considered to have created or maintained the release, in the form of laboratory data obtained from samples collected in a publicly accessible area like, say, a roadway shoulder? Does the person who would be considered to have created or maintained the release bear the burden of rebutting?
B	756	Data provided to a property owner subject to a proposed condemnation		D+M		Property owners who had no interest in selling could be forced into situations where remediation is required of them because of data obtained by a condemning authority, particularly if the condemnation doesn't proceed with the condemnation.	Can property owners subject to a proposed condemnation be indemnified from reporting when they provided data collected by the condemning authority?
B	1228 + 1247	Maintain, and Immediate Actions for large spills in the public transportation ROWs		D+M			Will entities that maintain (control) public roadways and railways be responsible for immediate actions and characterization resulting from releases from the traveling public? Large releases (tankers)? Motor vehicle collisions? Can state- and municipal-roadway owners be exempted as Maintainers in this regard?
B	665, others	Public roadway ≠ parcel		D+M		The regs define "parcel" and "public roadway." Many parts of the regs, particularly the parts that offer compliance alternatives, mention only parcels.	Do the regulations consider public roadways separate and distinct from parcels. Are the instances of "parcel" that occur within the regulations inapplicable to public roadways? For example, would the industrial/commercial exception provided in the definition of "Tier Characterization" not apply to roadways?

B	664	Residential cleanup standards have to be applied to Maintenance Facilities, unless a land use restriction is recorded.			D	The Industrial/commercial clean-up standards are more lenient than residential standards. To use the I/C standards, environmental use restrictions are required. EURs are neither easy nor inexpensive, requiring survey and environmental attorneys to provide an opinion in order to get DEEP approval.	When determining the applicable criteria for soil remediation, can regulations state that the industrial/commercial criteria be applicable to state-owned properties used for industrial/commercial activities, like vehicle repair garages? A change in use of a state-owned property can only be done in consideration of the Connecticut Enviromental Procedure Act, and releases (sales) of state-owned property can only be done through the property review board (i.e., the state cannot change an industrial property to a residential property with involvement from the public, OPM, and DEEP.)
C	693	Data obtained through illegal or unauthorized means.	U			What's the legal standing of samples collected illegally?	What if actual knowledge of a presumptive release was unwantedly provided, to a person who would be considered to have created or maintained the release, in the form of laboratory data obtained through non-legal means (i.e., samples collected by trespassing? Samples collected without the property owner's permission?) Does the person who would be considered to have created or maintained the release bear the burden of rebutting? If not, can the regs state as such?
C	704	Constructive knowledge	U			A Maintainer's constructive knowledge is a reportable condition requiring cleanup unless lab data refutes.	Will pavement staining intersected by a pavement crack observed by a reasonable person who also could be a Maintainer be construed as reportable constructive knowledge (if not otherwise refuted by lab sampling)?
C	775	Leaking USTs	U			Leaking USTs are exempt from the RBCRs. Leaking USTs are managed separately because they fall under a federal requirement that these be cleaned up. DEEP has always deferred to the clean-up criteria in the RSRs (to be incorporated into the RBCRs) in determining if a Leaking UST is closed. What about the newly proposed fees and timelines?	Can DEEP confirm that releases from regulated USTs will not be subject to the RBCR's deadlines or requirements for characterization, tiering, and close outs?
C	964	Receptor Surveys	U			Report contents require a receptor survey in all cases.	Will DEEP consider requiring the receptor survey only in certain reporting circumstances? i.e., is the concern about wells within 500' there is only lab detection, even less than RSRs? What about detections that only exceed DEC?
C	1127	Timing of guidance	U			The yet-to-be-available prevailing standards guidance will have a direct affect on the feasibility of the draft regs.	Will the DEEP guidance for characterization and remediation (e.g., the SCGD, Release Remediation Closure Report Form, etc.) be updated/developed before the RBCRs are finalized? How can the stakeholders or, eventually, the public at large comment on the regs without the guidance that will be used as the default standard?
C	1149	Durations for DEEP responses to requests.	U			One of the reasons for the regs is that so few sites have gotten closure through the transfer act program. One of the reasons that so few sites have gotten closure through the Transfer Act program is the time it takes to required approvals from DEEP (and also DEEP's unwillingness to issue approvals). If the regulated community is going to be held to hard deadlines in these regs, shouldn't the obligations of DEEP under the regs also be tied to a timeline?	Any time the regulations obligate the commissioner to make a written determination, can the regulations indicate a time or duration by which the written response must be issued? For example, can the regulations stipulate the time by which DEEP must finish its review of a proposed characterization practice that deviates from those that DEEP will post on its website?
C	1156	DEEP and PEPs	U			DEEP spill response personnel are present at major incidents and can direct DEEP's DAS spill contractors.	What is the anticipated role of DEEP Spills field inspection staff in determining appropriate characterization/ remediation of emergent releases? Can DEEP direct their spill response contractor to certify as a PEP? Must a spill response contractor working at the direction of DEEP provide the certification when directed? Will DEEP personnel be eligible to be PEPs? Will DEEP spill response personnel automatically be PEPs (because the qualifications and process has not been developed)? Will DEEP spill response personnel be authorized to certify closure reports for activities overseen by DEEP?
C	686, others	Maintain and DEEP role	U			DEEP has the statutory authority (22a-451) to pursue cleanups when the person who causes the pollution doesn't. DEEP has the authority to pursue costs from the person who causes. Does this authority to pursue or not pursue, particularly in the public ROW, make DEEP a maintainer? i.e., they have the authority to do the cleanup, but they choose not to.	Could DEEP, as a state agency authorized by statute to contract with any person issued a permit pursuant to section 22a-454 to contain and remove or mitigate the effects of a discharge, spillage, loss, seepage or filtration and/or to recoup such costs from a person who caused, be considered a person that maintains?

C	1156	DEEP and PEPs and public transportation ROW			D	DOT's spill contractors are reluctant to commit to certifying as PEPs.	What is the anticipated role of DEEP Spills field inspection staff in determining appropriate characterization/remediation of all emergent releases, including motor vehicle collisions, in the public transportation (road and rail) ROWs?
D	529	Regulating through guidance	U			Regulations that defer to protocols yet to be posted on DEEP's website create too much opportunity for DEEP to "regulate" through guidance that isn't subject to public processes.	When the definition of Reasonable confidence protocols references those protocols that are "posted by the commissioner on the department's website", does that give DEEP the ability to amend the default requirements by simply posting to its website without any public involvement or process?
D	574	Durations for DEEP responses.	U			One of the purpose for the RBCRs is that so few sites have gotten closure through the transfer act program. One of the reasons that so few sites have gotten closure through the Transfer Act program is the time it takes to required approvals from DEEP (and also DEEP's unwillingness to issue approvals). If the regulated community is gong to be held to hard deadlines in these regs, shouldn't the obligations of DEEP under the regs also be tied to a timeline?	Any time the regulations obligate the commissioner to make a written determination, can the regulations indicate a time or duration by which the written response must be issued? For example, analytical data quality assessments or usability evaluations that deviate from the protocols posted on the department's website.
D	981	Incomplete existing release reporting forms	U			The regs have a section about incomplete reporting forms when it's a Significant Existing Release, but not for other releases.	What are repercussions of submitting an incomplete report in a non-SER circumstance?
D	993	Regulating by form	U			Forms do not go through any sort of public process. The questions on the reporting form may go above and beyond.	Will the reporting forms that are yet to be developed by DEEP per the regulations go through any public involvement or process to ensure the form's questions are consistent with the regs and are proportionably reasonable to the information that is actually needed?
D	1127	Regulating through guidance	U			DEEP will post prevailing standards for release characterization on its website. Websites do not go through any sort of public process. (Regs allows practices that deviate to the posted prevailing standards to be vetted by the commissioner)	Can the regs propose a prevailing standards (that the regulated community can weigh in on) without deferring to a yet to be published website? If not, will the prevailing standards go through any public involvement or process?
D	N/A	No site-wide program yet	U			These regs treat/manage every single release separately. Creates extra burdens on remediations performed as part of Facility redevelopments. DEEP has wants a program to manage site-wide remediations to replace Voluntary and Transfer Act site-wide programs. The site-wide program has not been developed.	Will DEEP consider moving forward with these regulations only at such time when the proposed site-specific remediation program is developed into regulation. Such a program that could collectively address multiple releases on a site through a comprehensive redevelopment plan not necessarily tied to the deadlines for characterization, tiering and closeout of the RBCBs?
D	N/A	No site-wide program yet	U				Will the 133x/133y programs remain an option? What happens to sites already in one of these programs once the RBCP is effective?
							Can the permit by rule for soil under public roadways exclude the need for affidavit on a land record becaue of the challenge of associating the roadway with a parcel description?

ENVIRONMENTAL SERVICES
CMG
EST. 2002
ENGINEERING SERVICES

February 5, 2024

Release-Based Cleanup Program Working Group
℅ Department of Energy and Environmental Protection
79 Elm Street
Hartford, CT 06106-5127

Re: **Commentary on CT Draft Release-Based Cleanup Regulations**
RCSA §§22a-134tt-1 to 22a-134tt-13

To Whom It May Concern:

CMG Environmental, Inc. (CMG) herewith provides the following commentary on the Draft Release-Based Cleanup Regulations promulgated on December 29, 2023. We refer each comment to the respective subsection of that proposed regulation, as follows:

1. 22a-134tt-1(g) Licensing of Permitted Environmental Professionals: Why have two different types of licensures? This would seem to increase the administrative burden on DEEP (and add potential sources of error) when the existing LEP program has been long-established.
2. 22a-134tt-2(f) Naturally Occurring Metals at the Time of Discovery: Regarding the "Naturally Occurring Background Metals Values for Connecticut" table provided at 22a-134tt-2(f)(2), what are the peer-reviewed sources for and analytical methods used to determine the values listed in this table (e.g., citations of scientific studies/published articles)?
3. 22a-134tt-1(a) Definitions: "Creator" and "Maintainer" of a Release are referenced numerous times in the draft regulations [e.g., **22a-134tt-3(a) Report Required; Discovery By a Creator or Maintainer**]. "Release" is defined at -1(a)(121). Neither "Creator" nor "Maintainer" is defined in -1(a). Entities subject to and so prominently referenced in other subsections of these regulations should have explicit regulatory definitions. Lack of such definition would seem to invite loopholes to avoid release reporting.
4. 22a-134tt-3(1) Significant Existing Releases: This is a subsection describing the reporting of Significant Existing Releases within 72 hours or two hours. It relies on knowledge of the definition of Significant Existing Release at 221-134tt-1(a)(137). That definition defines a 'Significant Existing Release' by additional reference to the human health impacts listed at 22a-134tt-5(f) [Required Immediate Actions for a Significant Existing Release]. That subsection also references -5(d). This writer did not identify any 'human health impacts' in either subsection -5(d) or -5(f), rather list of measures to mitigate exposure via listed *exposure pathways*. However, an explicit list of triggers for 72-hour reporting is provided at 22a-134tt-1(e) as a standalone for 'Significant Existing Releases.' Highly recommend moving the contents of 22a-134tt-1(e) to 22a-134tt-3(1)(A) to avoid confusion.

67 HALL ROAD
STURBRIDGE, MA 01566
PHONE (774) 241-0901
FAX (774) 241-0906

5. 22a-134tt-4 Characterization of Discovered Releases: This entire section, as supported by definitions at 22a-134tt-1(a), seems to indicate that full characterization of the degree and extent of a release should be completed within *one year* of its reporting. This seems an undue financial burden to complete within such a relatively short timeframe. Note the timelines for Completion of Investigation and Verification currently in effect under the Property Transfer Program are considerably more generous and allow more time to adequately characterize potentially complicated releases of petroleum and hazardous materials (and time to arrange financing for such characterization). Rapid investigation sufficient to fully characterize the degree and extent of a release is feasible for small releases, but a 'one size fits all' short timeframe approach would seem, for more complex releases, to invite corner-cutting at best or utilize funding to complete rapid characterization at the expense of mitigating the release or its exposure pathways.

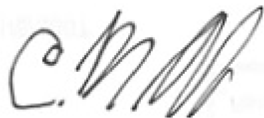
6. 22a-134tt-6(e) Deadlines for Remediation: The listed deadlines seem rather short for a complex release that poses considerable potential harm to human health (e.g., one year following tier assignment to remediate a Tier 1A release or downgrade it to a lower tier). Consider the more generous current timeframes used in the Property Transfer Program for Completion of Investigation and Verification.

7. Appendices 2 (Direct Exposure Criteria for Soil), 11 (Managed Multifamily Residential Direct Exposure Criteria for Soil), and 12 (Passive Recreation Direct Exposure Criteria for Soil): The table below summarizes inconsistencies in Residential Direct Exposure Criteria (RES DEC), Multifamily DEC, and Passive Recreation DEC wherein the RES DEC value is higher than one or both of the Multifamily and Passive Recreation DECs for the same substance. We understand this could be due to differing exposure assumptions and/or refinements to various parameters used to calculate the Multifamily & Residential DECs versus the RES DECs, particularly where the RES DEC has been in effect unmodified since the original adoption of the RSRs (circa 1996). However, we believe these values warrant additional evaluation. Furthermore, the draft RBCRs list a Managed Multifamily DEC of '0' for hexavalent chromium. This may be a typographical error, but note it is not scientifically valid or defensible to require a 'zero' concentration since reporting limits may vary between laboratories for the same analysis, or even between different soil sample sets from the same property (a frequent occurrence for the latter).

Substance	RES DEC (mg/Kg)	Multifamily DEC (mg/Kg)	Passive Rec DEC (mg/Kg)
Acrylonitrile	1.1	0.41	0.7
Benzene	21	4	7
Benzo(a)pyrene	1	0.22	0.38
Bromoform	78	28	48
Cadmium	34	17	30
Chromium, hex. (Cr^{6+})	100	*0*	1
Copper	2,500	519	911
Cyanide	1,400	109	191
2,4-D	680	173	304
Dibromochloromethane	7.3	2.6	4.5
1,3-Dichlrobenzene	500	346	500
1,2-Dichloroethane	6.7	2.4	4.2

Substance	RES DEC (mg/Kg)	Multifamily DEC (mg/Kg)	Passive Rec DEC (mg/Kg)
cis-1,2-Dichloroethene	500	346	500
1,3-Dichloropropene	3.4	2.2	3.8
Di-n-butyl phthalate	1,000	260	455
Ethylbenzene	500	128	195
Hexachlorobenzene	1	0.88	1.34
Hexachloroethane	44	35	54
Lindane	20	1.3	2.0
Nickel	1,400	346	607
Pentachlorophenol	5.1	0.55	0.95
Phenol	1,000	7.3	12.7
PCBs	1	0.71	1.1
Simazine	Not est.	500	500
Styrene	500	3.1	5.4
1,1,1,2-Tetrachloroethane	24	8.5	14.6
1,2,2,2-Tetrachloroethane	3.1	1.1	1.9
Thallium	5.4	1.7	3.0
Toluene	500	346	500
Toxaphene	0.56	0.20	0.35
Trichloroethene	56	14.6	24.7
Vanadium	470	156	273
Vinyl chloride	0.32	0.31	0.53

Respectfully submitted,



C. Ryan Goad
Hydrogeologist

Release-Based Cleanup Docs 12.29.2023\RBCR Commentary 2.5.2024.docx

Hope everyone is doing well. Believe it or not, I only have one question. It's not a trick question nor is it loaded. It pertains to the explosion and fire which occurred on December 29, 2023 at Tradebe Environmental Services in Bridgeport, CT. First, here is how I read the draft:

22a-134tt-3 – Reporting Newly Discovered Existing Releases (line 842)

(a) Report Required; Discovery By a Creator or Maintainer (843)

(b) Report contents and process (926)

(1) Contents of Report (928)

(A) Any report required by this section shall contain the following information regarding a discovered release: (930-1)

(ix) N/A (964-66)

(x) N/A (968-69)

(xi) N/A (970-71)

(xii) N/A (973-74)

(xiii) N/A (976-79)

(B) If the release required to be reported is a significant existing release, and not all information required by subdivision (1) of this subsection is available at the time a report must be provided: (981-92)

(ii) Not later than seven days after an incomplete report is provided pursuant to clause (i) of this subparagraph, a complete report, containing all the information specified in subdivision (1) of this subsection, shall be provided. (987-89)

Question: *In the future, what information will be readily available/accessible to local residents and the general public within seven (7) days of a major explosion at a hazardous waste/chemical recycling facility?*

Today is February 5, 2024. Here is the information currently available to the public:

1. Incident Report for 12/29/2023 Petroleum Incident (Incident ID: 202303637): CLOSED

> On 12/29/2023 there was an explosion and fire at Tradebe Bridgeport in their waste offload / degrit area. The Bridgeport Fire Department spent approximately 2 hours putting out the fire and using around **5,000 gallons per minute of water for the first hour** per Chief Edwards. Joe Altieri of Tradebe Bridgeport said they were in the process of offloading a tanker containing 4000 gallons of low-grade oxidizer waste. He also believed that the damaged tank contained a solvent and heavy metals. Once Fairfield

Haz-Mat arrived on scene we had them place AreaRAE meters around the outside of the property to monitor the air quality. DEEP and FD also monitored the area using 4 gas and PID meters, only hits we got was low level VOC's on AreaRAE's. The DEEP used PH paper to check the runoff that was a PH of 13 and coming off property and into the city storm drain system. DEEP checked the outfall of that drainage that goes to the Bruce Brook and Bridgeport Harbor near Lordship BLVD and I95 north offramp. There was visible fuel oil and a milky white cloud in Bridgeport Harbor including the East End Yacht Club. We immediately worked with Tradebe to place vacuum trucks and boom in those locations to prevent further impact to the harbor and recover product. DEEP, CSP Fire & Explosion Investigation Unit (FEIU) and Tradebe personnel worked to try and identify what products were in **tank 3** and **7**. **Tank 3** was one of the tank that exploded and lost all its contents and **tank 7** was the tank the tanker was being offloaded into per Tradebe. We attempted to get a certified lab to run some samples from the tanks but were unsuccessful due to the time of day and long holiday weekend. **The only information we knew at the time was that we had a release of fuel oil and a high PH liquid.** Tradebe worked on getting personnel and equipment to the site and commence cleanup of the waste that came off property. DEEP and FEIU worked on securing the site from any further materials leaking off property.

2. January 22, 2024: NOAA Office of Response and Restoration

NOAA's Office of Response and Restoration (OR&R)'s Emergency Response Division provides scientific expertise and services to the U.S. Coast Guard (USCG), ranging from producing oil spill trajectories that estimate where a spill may spread; to identifying possible effects on wildlife and fisheries; to estimating how long oil may stay in the environment.

As part of the firefighting effort, a large amount (**an estimated 18,000 gallons**) of firefighting wastewater, with unknown chemicals, leaked into a stormwater drain and spilled into small creeks outside of Bridgeport, Connecticut, upriver from the Stewart B. McKinney National Wildlife Refuge.

On December 30, USCG Sector Long Island Sound (LIS) contacted the NOAA scientific support coordinator (SSC) to request expertise from OR&R's Emergency Response Division. The NOAA SSC notified NOAA Fisheries and the U.S. Fish and Wildlife Service. Representatives from the EPA, USCG, and

Connecticut Department of Energy and Environmental Protection (CT DEEP) reported on-scene.

It was reported that 4,000 gallons of a low-grade oxidizer was being offloaded at the time of the explosion. **Chemical tests of the wastewater found high ph levels and elevated levels of Chromium**. **OR&R's chemistry response team advised the USCG of the highly toxic nature of Chromium, which will persist in the environment for some time.**

On December 31, some discoloration in the water was observed at one collection point; however, other locations where boom was deployed appeared clear. An oil spill response organization deployed spill boom, as well as vacuum trucks to skim the surface. **Approximately 30,000 gallons of milky water was recovered on-scene.**

On January 2, responders from USCG Sector LIS observed a storm drain flush-out, where 6,000 gallons of water was put into the storm drain across from the location of the chemical fire. A vacuum truck skimmed sheen from a boomed location, where light and weathered sheen was observed. No fish kills or injured wildlife were observed on-scene.

Cleanup continues at the site of the fire under the supervision of CT DEEP. Two sheen samples were taken by USCG for future analysis, should the sheen persist. The emergency response phase is wrapping up and remediation will be led by EPA or CT DEEP.

Am I misinformed? How many members of the regulated community actually understand the difference between a low-grade oxidizer and low-grade oxidizer waste? What about Chromium? This is an interesting situation. There are residents and residential properties located in the immediate vicinity of that explosion. Bruce Pond was not formally marked as impaired. The impaired segment ended at the inlet. Is that still true?

Best,

Bryant

February 5, 2024

Release-Based Cleanup Program Working Group
℅ Department of Energy and Environmental Protection
79 Elm Street
Hartford, CT 06106-5127

Re: **Commentary on CT Draft Release-Based Cleanup Regulations**
RCSA §§22a-134tt-1 to 22a-134tt-13

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Copper	2,500	519	911
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2,4-D	680	173	304
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Ethylbenzene	500	128	195
Hexachlorobenzene	1	0.88	1.34
Hexachloroethane	44	35	54
Lindane	20	1.3	2.0
Nickel	1,400	346	607
Pentachlorophenol	5.1	0.55	0.95
Phenol	1,000	7.3	12.7
PCBs	1	0.71	1.1
Simazine	Not est.	500	500
Styrene	500	3.1	5.4
1,1,1,2-Tetrachloroethane	24	8.5	14.6
1,2,2,2-Tetrachloroethane	3.1	1.1	1.9
Thallium	5.4	1.7	3.0
Toluene	500	346	500
Toxaphene	0.56	0.20	0.35
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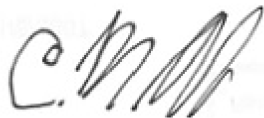
Vanadium	470	156	273
Vinyl chloride	0.32	0.31	0.53

Respectfully submitted,



C. Ryan Goad
Hydrogeologist

Release-Based Cleanup Docs 12.29.2023\RBCR Commentary 2.5.2024.docx

22a-134tt-8 Releases Certified as Closed by a Permitted Environmental Professional

(a) Emergent Reportable Releases Certified as Closed by a Permitted Environmental Professional

(1) The remediation of a release shall be determined to have satisfied the requirements of the RBCRs if:

(A) The approximate location and volume of such release was known at the time remediation was commenced;

(B) The substance or substances released are known;

(C) The release:

(i) did not occur in or directly to a surface water body and has not migrated to any such surface water body; or

(ii) occurred in or migrated to a surface water body, and each substance released is soluble or has a specific gravity of less than 1;

Will CT DEEP consider PCB-contaminated mineral oil as a single substance or a mixture of substances? Pure PCB is insoluble in water and has a SG>1, but the PCB/mineral oil mixture typically behaves as a substance with SG<1, and we typically do not observe phase separation when such transformer oil impacts surface water.

(D) The release:

(i) consists of a substance or substances other than oil or petroleum and has not contacted groundwater; or

(ii) consists only of oil or petroleum, is not within 500 feet of a drinking water well, and has not caused a persistent impact to groundwater as determined by subsection (c) of this section;

These draft regulations seem to imply that a well receptor survey will have to be performed for every emergent release. What level of investigation is CT DEEP expecting to determine the presence/absence of drinking water wells within a 500-foot radius? A typical drinking water receptor survey, as currently performed by LEPs, is a time-consuming process involving researching well drilling permits/ completion reports on file at CT DEEP, in addition to researching other resources.

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Hynes, Kenneth A

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