79 Elm Street • Hartford, CT 06106-5127

www.ct.gov/deep

Affirmative Action/Equal Opportunity Employer

VIA eREGULATIONS SYSTEM

October 30, 2020

Senator Craig Miner Representative Susan M. Johnson Legislative Regulation Review Committee State Capitol, Room 011 Hartford, Connecticut 06106

Re: Legislative Regulation Review Committee Review of Proposal to Adopt Regulations Concerning the Remediation Standard Regulations PR2016-005, LRRC 2020-015

Dear Senator Miner and Representative Johnson:

Pursuant to section 4-170 of the Connecticut General Statues, I am pleased to resubmit for your consideration and approval a proposal to amend the Remediation Standard Regulations ("RSRs"). These regulations replace existing regulations concerning the standards for remediation of soil and groundwater found in §22a-133k-1 through 22a-133k-3 of the Regulations of Connecticut State Agencies.

This resubmission addresses substantive concerns and technical corrections identified by the Legislative Commissioner's Office in its memorandum dated October 14, 2020 as accepted by the LRRC at its meeting on October 27, 2020. The attached response document explains the Department's response to those concerns and shows the language that was updated since the last submission to the LRRC. The Office of the Attorney General approved the updated version of the regulation as legally sufficient on October 30, 2020.

The proposed amendments provide increased options to address environmental pollution in a cost-effective manner while ensuring the protection of human health and the environment. This proposal strikes the correct balance between protecting human health and the environment while seeking to decrease the cost for responsible parties to comply with the requirements of the regulations. The amendments clarify the requirements within the RSRs and increased the number of options that can be implemented without DEEP staff oversight or approval by Licensed Environmental Professional ("LEPs"). This allows DEEP staff to spend their time on the highest risk pollution issues.

These regulations are a key component of Goal 5 of DEEP's 20 By 20 initiative aimed at increasing predictability, efficiency, and transparency of DEEP's environmental permitting and regulatory processes. The RSRs will make the process of implementing environmental cleanups more efficient and predictable while still protecting human health and the environment. Adoption of this proposal, together with the complimentary Environmental Use Restriction regulations that



are being submitted under separate cover for your review, will result in increased opportunities for parties responsible for cleaning up environmental pollution to reach practical and protective endpoints faster and with less DEEP involvement.

If there are any general questions regarding this submission, please contact Mandi Careathers of the Office of Government Affairs by electronic mail to Mandi.Careathers@ct.gov or at 860-424-3109. If you have any substantive or rule drafting questions, please contact Kevin Neary of the Bureau of Water Protection and Land Reuse by electronic mail to Kevin.Neary@ct.gov or at 860-424-3947. Thank you for your assistance with this matter.

Sincerely,

Katherine S. Dykes Commissioner

Xalu & Dykes



Responses to the Legislative Commissioners' Office (LCO) Report on

LRRC Regulation No. 2020-015

eRegulations Tracking No. 2016-005

All of the concerns identified in the LCO Report dated October 16, 2020 are addressed as specified. All the changes are reflected in the proposed regulation version uploaded in eRegulations.

Substantive Concerns:

1. On page 2, in section 22a-133k-1(a)(14)(B)(ii), the proposed regulation uses the term "breakdown component". Because this term is not defined, it is not clear what this term means.

DEEP Response: A definition of breakdown component has been provided for clarification.

Proposed language:

- (14) "Diminishing state groundwater plume" means a groundwater plume that has been characterized seasonally and in three dimensions, provided that the characterization of such plume:
- (A) Is consistent with a validated conceptual site model; and (B) Demonstrates that such plume:
- (i) Is not migrating, or has very limited potential to migrate, in any direction; and
- (ii) Is comprised only of substances whose concentrations have decreased and will continue to decrease over time, except for the concentrations of related breakdown components, provided it is demonstrated that concentrations of such breakdown components are not a known risk to human health and the environment.

- (14) "Diminishing state groundwater plume" means a groundwater plume that has been characterized seasonally and in three dimensions, provided that the characterization of such plume:
- (A) Is consistent with a validated conceptual site model; and (B) Demonstrates that such plume:
- (i) Is not migrating, or has very limited potential to migrate, in any direction; and
- (ii) Is comprised only of substances whose concentrations have decreased and will continue to decrease over time, except for the concentrations of related breakdown components, provided it is demonstrated that concentrations of such breakdown components are not a known risk to human health and the environment. For purposes of this clause "breakdown components" means constituent compounds that results from the



alteration of an original compound in the environment.

2. On page 5, in section 22a-133k-1(a)(<u>44</u>), the term "Connecticut certified laboratory" is used. Because this term is not defined or further clarified, it is not clear what is meant by this term.

DEEP Response: DEEP has referenced the statutory provision authorizing CT DPH's lab certification program

Proposed language:

(44) "Laboratory Reporting Limit" means the lowest concentration at which an analyte can be detected in a sample of environmental media by a Connecticut certified laboratory, and which concentration can be reported with a reasonable degree of accuracy and precision pursuant to section 22a-133k-1(h) of the RSRs.

New language:

- (44) "Laboratory Reporting Limit" means the lowest concentration at which an analyte can be detected in a sample of environmental media by a Connecticut certified laboratory certified by the Connecticut Department of Public Health pursuant to section 19a-29a of the Connecticut General Statutes, and which concentration can be reported with a reasonable degree of accuracy and precision pursuant to section 22a-133k-1(h) of the RSRs.
- 3. On page 5, in section 22a-133k-1(a)(49)(A), the proposed regulation refers to a "reasonable timeframe". Because this term is not defined, it is not clear what constitutes a "reasonable timeframe" for purposes of this definition and who would make such a determination.

DEEP Response: In response to the comment, the provision was edited to clarify what is considered effective from a remediation standpoint rather than focus on the timeframe as it is recognized that it can differ based on the characteristics of the release.

Proposed language:

- (49) "Monitored natural attenuation" means representative groundwater monitoring of the natural attenuation of each substance in a groundwater plume to a concentration equal to or less than groundwater criteria, provided such monitoring demonstrates that:
- (A) Such attenuation occurs within a reasonable timeframe after completing the remediation of a release in a manner that achieves compliance with the RSRs; and
- (B) The only remaining groundwater plume from a release is a diminishing state groundwater plume.



- (49) "Monitored natural attenuation" means representative groundwater monitoring of the natural attenuation of each substance in a groundwater plume to a concentration equal to or less than groundwater criteria, provided such monitoring demonstrates that:
- (A) Such attenuation occurs within a reasonable timeframes is occurring and will continue to occur as evidenced by changes in chemical concentrations, alterations of chemical components, and changes in hydrogeologic conditions within the aquifer after completing the remediation of a release area in a manner that will achieves compliance with the RSRs; and
- (B) The only remaining groundwater plume from a release is a diminishing state groundwater plume.
- 4. On page 9, in section 22a-133k-1(b)(2), the proposed regulation refers to "appropriate" representative characterization of a release. It is not clear if the agency intends the use of the word "appropriate" or the use of another word such as "accurate".

DEEP Response: DEEP has elected to delete the word "appropriate" and insert "a".

Proposed language:

(2) Characterization

All investigation and remediation undertaken to comply with the RSRs shall be based on appropriate representative characterization of a release, using a conceptual site model developed in accordance with prevailing standards and guidelines, such as the Department's "Site Characterization Guidance Document" as amended.

New language:

(2) Characterization

All investigation and remediation undertaken to comply with the RSRs shall be based on appropriate <u>a</u> representative characterization of a release, using a conceptual site model developed in accordance with prevailing standards and guidelines, such as the Department's "Site Characterization Guidance Document" as amended.

5. On page 10, in section 22a-133k-1(b)(3), the proposed regulation states that if any provision of the RSRs "conflicts with any provision of any other statute or regulation, the more stringent provision shall prevail". The agency does not have the authority to require that a more stringent provision of a regulation override a different standard set forth in a provision of the general statutes. This provision should be rewritten to comport with the agency's statutory authority.

DEEP Response: The Department notes that while other changes were made to this subdivision, that the language that is the subject of this comment is existing language –



unchanged since 1996 when it was first adopted - and no change to this was proposed. The Department also agrees with the comment, the RSRs cannot override a different provision set forth in state statute and in the approximately twenty five years of implementing the RSRs, the Department is not aware of this provision ever being used to try to override a statutory requirement. In light of the comment, the Department has modified this provision to remove, what is understands to be the objectionable text and better clarify the relationship between the RSRs and any applicable state statute.

Proposed language:

(3) Other Requirements

All remediation undertaken to satisfy the RSRs shall be conducted in accordance with all federal, state, and local requirements, including but not limited to, 40 CFR Part 761, all permits, and other required authorizations. In the event that any provision of the RSRs conflicts with any provision of any other statute or regulation, the more stringent provision shall prevail. Nothing in this subsection shall be construed as requiring any further remediation of any release which has been remediated and which remediation has been approved in writing by the commissioner, unless the commissioner takes action to require such remediation pursuant to any section of Chapter 446k of the Connecticut General Statutes.

New language:

(3) Other requirements

All remediation undertaken to satisfy the RSRs shall be conducted in accordance with all federal, state, and local requirements including, but not limited to, 40 CFR Part 761, all permits, and other required authorizations. In the event that any provision of the RSRs augments or supplements conflicts with any provision of any other statute or regulation, the more stringent provision shall prevail both shall apply. Nothing in this subsection shall be construed as requiring any further remediation of any release which has been remediated and which remediation has been approved in writing by the commissioner, unless the commissioner takes action to require such remediation pursuant to any section of Chapter 446k of the Connecticut General Statutes.

6. On page 10, in section 22a-133k-1(c), the agency is bracketing reference to requests for "approval of any variance from or alternative criteria", and leaves references to "request". It is unclear what type of requests this subsection is intended to address and this provision should be clarified.

DEEP Response: Language was inadvertently omitted in the version of the proposed regulation provided in response to public comments. The intended language, which was originally included with the Notice of Intent, clarifies the request in question include a variance and alternative criteria request. This language has been restored.

Proposed language:

(c) Time-frames for Issuance of Approvals by the Commissioner The commissioner shall provide estimated time frames for review upon request. In



establishing estimated time frames pursuant to this subsection, the commissioner shall take into account available resources, the complexity of the request, and the environmental and economic significance of the remediation.

New language:

- (c) Time-frames for issuance of approvals by the commissioner

 The commissioner shall make best efforts with available resources to process, in a timely manner, any complete variance or alternative criteria request, pursuant to the RSRs. The commissioner shall, upon request. provide estimated time frames for any such review and approval upon request;. In establishing estimated time frames pursuant to this subsection, the commissioner shall take into account available resources, the complexity of the request, and the environmental and economic significance of the remediation.
- 7. On page 10, in section 22a-133k-1(d)(1), the proposed regulation refers to "when public notice is required by law". It is unclear what law is being referenced. This provision should be clarified.

DEEP Response: DEEP has made adjustments to the language and has elected to omit the language creating uncertainty.

Proposed language:

(1) Public Notice of Remediation. The public participation requirements of this subsection shall apply after a release has been investigated and a remedial action plan has been prepared. When public notice is required by law, remediation shall not commence until after the requirements of this subsection have been completed, except that the requirements of this subsection shall not apply to actions undertaken during an emergency or during other unplanned time critical remedial actions.

- (1) Public Notice of Remediation. The public participation requirements of this subsection shall apply after a release has been investigated and a remedial action plan has been prepared. When public notice is required by law, remediation shall not commence until after the requirements of this subsection have been completed, except that the requirements of this subsection but shall not apply to actions undertaken during an emergency or during other unplanned time critical remedial actions.
- 8. On page 12, in section 22a-133k-1(d)(4), the proposed regulation provides, in part, that compliance with the requirements of such subsection shall satisfy, "as applicable", the notice requirements in four sections of the general statutes. It is not clear what "as applicable" means in this context. In addition, a regulation cannot override the requirements of a statute and regulatory notice requirements must be consistent with the statutory requirements. This provision should be clarified.



DEEP Response: DEEP has shifted the phrase "as applicable" to the end of the paragraph to clarify that the notice requirement being fulfilled is dependent on the applicability of the listed statutes to the remediation. In addition, the Department agrees with the comment regarding the relationship between the notice requirements in the RSRs and those in state statutes and has ensured that notice requirements in the RSRs do not override and remain consistent with the notice requirements of state statutes. The purpose of this provision is to ensure that those undertaking clean-ups appreciate that notice does not have to be provided twice, once under an applicable state law and secondly under the RSRs.

Proposed language:

(4) Compliance with the requirements of this subsection shall satisfy, as applicable, the notice requirements in sections 22a-133x, 22a-133y, 22a-134a, or 32-769 of the Connecticut General Statutes.

New language:

- (4) Compliance with the requirements of this subsection shall satisfy, as applicable, the notice requirements in sections 22a-133x, 22a-133y, 22a-134a, or 32-769 of the Connecticut General Statutes, as applicable.
- 9. On page 20, in section 22a-133k-2(b)(2)(A)(ii)(II), and throughout the remainder of the the proposed regulation, including the appendices, the proposed regulation makes references to an EUR that is required to "enumerate and require compliance" with a provision of the proposed regulations for which it is unclear what would be "enumerated". For example, in section 22a-133k-2(b)(2)(A)(ii)(II), the EUR would be required to "enumerate" the requirement that "access to the parcel containing such release is limited to individuals working at or temporarily visiting the subject parcel for industrial/commercial activity". It is unclear how an EUR would "enumerate" such a requirement. Accordingly, for this provision and for each of the remaining provisions in the proposed regulation that require an EUR to "enumerate" a requirement, the proposed regulation should be made clear as to exactly what would be "enumerated" in the EUR.

DEEP Response:

The term "enumerate" was used in connection with use of an environmental use restriction ("EUR"). Where an EUR was used the regulations required that an EUR "enumerate and require compliance" with an applicable restriction. An EUR would enumerate a restriction by mentioning it or reciting it. Nevertheless, in deference to the comments made and upon further consideration the Department is deleting the term enumerate when used in connection with an EUR. This does not mean that an EUR does not need to recite the applicable restriction; to the contrary, even with the term enumerate deleted an EUR must still require compliance with an applicable restriction. Since, however, an EUR can only require compliance with a restriction by reciting or mentioning the applicable restriction, including the requirement that the restriction be enumerated is superfluous and can be deleted.



10. On page 25, in section 22a-133k-2(c)(1)(A)(i), the proposed regulation requires the "mass analysis" of a substance. Because this term is not defined, it is unclear what analytical technique is required.

DEEP Response: DEEP has altered the term mass analysis to read "analytical results reported on a per mass basis in mg/kg or "analytical results reported on a per mass basis" if the units are already provided.

Proposed language:

Except as otherwise specified in the RSRs, polluted soil at a release area located in a GA area shall be remediated to the seasonal low water table; whereas polluted soil at a release area located in a GB area shall be remediated to the seasonal high water table. All such polluted soil shall be remediated so that the concentrations of substances in such soil are equal to or less than the applicable pollutant mobility criteria, as determined using:

- (i) Mass analysis for such substances, other than inorganic substances and PCBs; and
- (ii) TCLP or SPLP analysis expressed in mg/L, or mass analysis in mg/kg divided by twenty, for inorganic substances and PCBs.

New language:

Except as otherwise specified in the RSRs, polluted soil at a release area located in a GA area shall be remediated to the seasonal low water table; whereas polluted soil at a release area located in a GB area shall be remediated to the seasonal high water table. All such polluted soil shall be remediated so that the concentrations of substances in such soil are equal to or less than the applicable pollutant mobility criteria, as determined using:

- (i) Mass analysis Analytical results reported on a per mass basis in mg/kg for such substances, other than inorganic substances and PCBs; and
- (ii) TCLP or SPLP analysis expressed in mg/L, or mass analysis analytical results reported on a per mass basis in mg/kg divided by twenty, for inorganic substances and PCBs.
- 11. On page 26, in section 22a-133k-2(c)(1)(B), the proposed regulation provides that said subsection "may" apply to polluted soil above the seasonal high water table if remediation to the seasonal low water table is technically impracticable or would not result in the permanent elimination of a source pollution. It is unclear if the proposed regulation intends to utilize "shall" in this instance as the proposed regulation, with the use of "may", fails to otherwise indicate when the subsection would not apply to polluted soil above the seasonal high water table. This provision should be clarified.

DEEP Response: DEEP has changed the "may" to "shall."

Proposed language:

(B) In GA area, if it is determined that remediation to the seasonal low water table is technically



impracticable or would not result in the permanent elimination of a source of pollution, this subsection may apply to polluted soil above the seasonal high water table.

New language:

- (B) In GA area, if it is determined that remediation to the seasonal low water table is technically impracticable or would not result in the permanent elimination of a source of pollution, this subsection may shall apply to polluted soil above the seasonal high water table.
- 12. On page 26 in section 22a-133k-2(c)(2)(B)(i)(I), and throughout the remainder of the proposed regulation, including the appendices, the proposed regulation uses a unit or designator for the subdivision of the section that is not recognized or authorized. The use of designators "(a)" and "(b)" following a subclause designation should not be used because it could create confusion about what is being referred to. Accordingly, the division of the text should be reorganized in each such instance to avoid the use of such designators.

DEEP Response: The use of a identifier at a level lower than the traditional parts of a regulation described in the drafting manual can become necessary when dealing with complex subject matter like environmental remediation. The use of a level below a subclause in the form of (a), (b), (c) ... is prevalent in the existing RSRs. In addition, the regulations applicable to hazardous waste also utilize this level designator. The elimination of this level will greatly affect clarity and overall readability. For example:

- (II) Measures are in place to ensure that the structural integrity, function, and effectiveness of the engineered control will be maintained. Such measures shall include, without limitation:
- (a) Measures that ensure the continued effectiveness of the engineered control;
- (b) Measures to prevent storm run-on or run-off from damaging the engineered control; (c) Inspections, on a schedule approved by the commissioner. Such inspections may be done in conjunction with and satisfy the inspection requirements in the EUR Regulations; and
- (d) Repairs to correct the effects of any settling, subsidence, erosion or other damaging events or conditions no later than sixty (60) days following identification of damage to the engineered control, provided if weather prevents repairs from being made within sixty (60) days of the identification of damage, as long as temporary repairs or measures have been taken, repairs can be made as soon as the weather permits;

Becomes

(II) Measures are in place to ensure that the structural integrity, function, and effectiveness of the engineered control will be maintained. Such measures shall include, without limitation: measures that ensure the continued effectiveness of the engineered control; measures to prevent storm run-on or run-off from damaging the engineered control; Inspections, on a schedule approved by the commissioner. Such inspections may be done in conjunction with and satisfy the inspection requirements in the EUR Regulations; and Repairs to correct the effects of any settling, subsidence, erosion or other damaging events



or conditions no later than sixty (60) days following identification of damage to the engineered control, provided if weather prevents repairs from being made within sixty (60) days of the identification of damage, as long as temporary repairs or measures have been taken, repairs can be made as soon as the weather permits;

The Department's appreciates that use of these designators is the exception and not the rule. However, given the use of such designators in other similar complex the regulations where use of these designators will make the regulations not only more readable, but more understandable, the Department requests that it be allowed to use these designators in the RSRs.

13. On page 35, in section 22a-133k-2(d)(3)(A), the first sentence is not cogent. This sentence should be rewritten for clarity.

DEEP Response: DEEP will inset the inadvertanly omitted word "substances" to clarify.

Proposed language:

(A) Alternative Release-Specific Pollutant Mobility Criteria

With respect to for which pollutant mobility criteria are specified in Appendix B of the RSRs or approved by the commissioner pursuant to section 22a-133k-2(c)(6) of the RSRs, the commissioner may approve or deny in writing a request for an alternative release-specific pollutant mobility criteria or an alternative method for determining compliance with such criteria. No request shall be approved unless it is demonstrated to the commissioner's satisfaction that the application of such alternatives:

- (A) Alternative Release-Specific Pollutant Mobility Criteria
- With respect to <u>substances</u> for which pollutant mobility criteria are specified in Appendix B of the RSRs or approved by the commissioner pursuant to section 22a-133k-2(c)(6) of the RSRs, the commissioner may approve or deny in writing a request for an alternative release-specific pollutant mobility criteria or an alternative method for determining compliance with such criteria. No request shall be approved unless it is demonstrated to the commissioner's satisfaction that the application of such alternatives:
- 14. On page 38, in section 22a-133k-2(e)(3)(A)(ii), the proposed regulation refers to "the general vicinity" of a release area. Because this phrase is not defined, it is unclear what is meant.
 - **DEEP Response:** DEEP clarified that the nearest practicable location outside the release area shall be sampled to determine background concentration.



Proposed language:

A representative sampling program is used to characterize the background concentration for soil that:

- (i) Of similar texture and composition;
- (ii) Outside the subject release area, yet in the general vicinity of such release area; and
- (iii)Not affected by another discrete release of the same substance, or having an effect on the concentrations of the same substance for which a background concentration is determined; and either

New language:

A representative sampling program is used to characterize the background concentration for soil that:

- (i) Of similar texture and composition;
- (ii) is collected from the nearest location practicable outside the subject release area, yet in the general vicinity of such release area; and
- (iii)Not affected by another discrete release of the same substance, or having an effect on the concentrations of the same substance for which a background concentration is determined; and either
- 15. On page 47, the proposed regulation indicates that section **22a-467** of the general statutes provides for the "reuse" of soils containing PCBs. Section 22a-467 of the general statutes does not provide for the reuse of soils contaminated with PCBs. This provision should be clarified.

DEEP Response: DEEP will adjust the language and does not need the term "reuse" as it only needs to refer to the approval to be provided under the RSRs and identified in 22a-467.

Proposed language:

(III) Is reused in accordance with section 22a-467 of the Connecticut General Statutes and complies with section 22a-133k-2(f)(2) of the RSRs, if the polluted soil is polluted with PCBs; and

- (III) If the polluted soil contains PCBs, the Commissioner has issued a written approval in accordance with section 22a-467 of the General Statutes and with section 22a-133k-2(f)(2) of the RSRs.
- 16. On page 48, in section 22a-133k-2(h)(3)(C)(iii)(II)(c), the provision is not complete and is not cogent in light of the preceding provisions. This provision should be clarified.



DEEP Response: DEEP removed (c) because other portions of the RSRs clarify that the Commissioner can seek information on the form required for use of this provision.

Proposed language:

- (II) The cumulative depth of all reused polluted soil from all other parcels does not exceed ten feet, provided that:
- (a) The depth greater than four feet is required for redevelopment purposes;
- (b) All slopes are created to prevent erosion; and
- (c) Any other information deemed necessary by the commissioner to evaluate the need for the greater depth of reused polluted soil.

New language:

- (II) The cumulative depth of all reused polluted soil from all other parcels does not exceed ten feet, provided that:
- (a) The depth greater than four feet is required for redevelopment purposes; and
- (b) All slopes are created to prevent erosion; and
- (c) Any other information deemed necessary by the commissioner to evaluate the need for the greater depth of reused polluted soil.
- 17. On page 48, in section 22a-133k-2(h)(5)(A), the proposed regulation refers to "A Soil Horizon". While it is presumed that the use of this term refers, generally, to topsoil, this term should be defined for clarity.
 - **DEEP Response:** The "A" soil horizon is a technical term for the upper most layer of soil that comprises the organic material and is considered "top soil". Additional detail was added within this section to clarify what is the "A" soil horizon. This term is only used once within the RSRs and for that reason adding a new definition is not needed.

Proposed language:

(B) Such soil to be reused is excavated only from the A Soil Horizon

- (B) Such soil to be reused is excavated only from the soil horizon at or near the surface in which an accumulation of humified organic matter is mixed with the mineral matter from which plants receive the most nutrients;
- 18. On page 53, in section 22a-133k-3(b)(3), the proposed regulation provides that a request for approval "may" include those items listed in subparagraphs (A) to (D), inclusive, of such subdivision. The use of "may" in this instance is confusing as it seems the agency intends such items to be included in any such request for approval. This provision should be clarified.



DEEP Response: DEEP will clarify that the Commissioner, upon receipt of a request will specify the information from the list to be provided by the requesting party as not all listed information will be required in all circumstances.

Proposed language:

(3) Commissioner Approval

The commissioner may approve or deny in writing a request for a release-specific alternative surface water protection criteria or an alternative method of demonstrating compliance with a surface water protection criteria. No request under this subdivision shall be approved until it is demonstrated to the commissioner's satisfaction that such alternative criteria or alternative method for demonstrating compliance will protect all existing and proposed uses of surface water and is protective of human health and the environment. A request for such approval shall be submitted to the commissioner in accordance with section 22a-133k-1(g) of the RSRs, and may also include:

New language:

(3) Commissioner Approval

The commissioner may approve or deny in writing a request for a release-specific alternative surface water protection criteria or an alternative method of demonstrating compliance with a surface water protection criteria. No request under this subdivision shall be approved until it is demonstrated to the commissioner's satisfaction that such alternative criteria or alternative method for demonstrating compliance will protect all existing and proposed uses of surface water and is protective of human health and the environment. A request for such approval shall be submitted to the commissioner in accordance with section 22a-133k-1(g) of the RSRs. and may also include Upon receipt of such request, the commissioner shall specify which of the following shall be provided to the commissioner:

19. On page 61, in section 22a-133k-3(d)(2)(B)(iii)(I), the proposed regulation refers to a requirement to include a "public water service area map...that indicates that water is *now* available" (emphasis added). The use of the word "now" makes this provision unclear because it is not known if "now" refers to the effective date of the regulation or to the date of the request for approval of alternative groundwater protection criteria by the commissioner. This provision should be clarified.

DEEP Response: DEEP has eliminated the term now and made other grammatical adjustments for clarity.

Proposed language:

(I) Documentation shall be provided by a public or private water company subject to regulation by the Department of Public Health demonstrates that public drinking water is



available in the area where the subject groundwater plume is located, including an updated public water service area map on file with the Department of Public Health indicating that public water is now available;

New language:

- (I) Documentation shall be <u>is</u> provided by a public or private water company subject to regulation by the Department of Public Health <u>demonstrates</u> <u>demonstrating</u> that public drinking water is available in the area where the subject groundwater plume is located, including <u>an updated</u> <u>a</u> public water service area map on file with the Department of Public Health indicating that public water is now available;
- 20. On page 64, in section 22a-133k-3(e)(2)(E)(iii), the proposed regulation requires the parcel owner to maintain reports concerning the effectiveness of the variance, but does not specify for how long the owner needs to maintain such reports. A time period should be added for clarity.

Proposed language:

(iii) In addition to any requirement in the EUR Regulations, require the preparation of a report every five years, which reviews the implementation and effectiveness of the variance approved by the commissioner, including but not limited to, the impact of the use of groundwater on parcels adjacent to the TI zone. Such reports shall be maintained by the parcel owner who is requesting such variance and provided to the commissioner upon request; and

New language:

- (iii) In addition to any requirement in the EUR Regulations, require the preparation of a report every five years, which reviews the implementation and effectiveness of the variance approved by the commissioner, including but not limited to, the impact of the use of groundwater on parcels adjacent to the TI zone. Such reports shall be maintained by the parcel owner who is requesting such variance until the technical impracticability variance is no longer required pursuant to the RSRs and shall be provided to the commissioner upon request; and
- 21. On page 64, in section 22a-133k-3(f)(1), the proposed regulation exempts compliance with certain groundwater criteria for "the following substances in groundwater". However, the first exemption is for "substances resulting from releases of drinking water from a public water supply". It is unclear what "substances" may be encompassed in this first exemption. This provision should be clarified.

DEEP Response: DEEP will clarify that the substances are only those found in drinking water that is released from a public water supply distribution system. DEEP will restore the reference to Trihalomethanes as an example.

Proposed language:



Compliance with the groundwater criteria specified in section 22a-133k-3(a) of the RSRs is not required for the following substances in groundwater under the circumstances described in this subsection:

(1) Substances resulting from releases of drinking water from a public water supply system; or

New language:

Compliance with the groundwater criteria specified in section 22a-133k-3(a) of the RSRs is not required for the following substances in groundwater under the circumstances described in this subsection:

- (1) <u>Trihalomethanes or any other substance within drinking water released</u> <u>Substances resulting from releases of drinking water</u> from a public water supply <u>distribution</u> system; or
- 22. On page 74, in Appendix A, in the eleventh row of the first column, and throughout Appendices B to G, inclusive, the proposed regulation is changing a reference from "ETPH Analysis" to "CT ETPH Analysis". Because the latter term is not defined, this change creates a lack of clarity. This term should be defined. Also, the provision allowing the use of this analysis for samples taken on or after June 22, 1999 would appear to need amendment if such analysis was not utilized as of said date.

DEEP Response: Given the use of Reasonable Confidence Protocols, DEEP will delete these changes as they are unnecessary.

Proposed language:

Extractable Total Petroleum Hydrocarbons by CT ETPH Analysis

(This method may be used for the analysis of samples collected on or after June 22, 1999)

New language (to be changed in all Appendices):

Extractable Total Petroleum Hydrocarbons by CT ETPH Analysis

(This method may be used for the analysis of samples collected on or after June 22, 1999)

23. On page 102, in Appendix I, the proposed regulation contains a depiction of a map apparently to be used in connection with potential alternative groundwater protection criteria. According to the text of Appendix I, such map will be made available at the agency's headquarters and on its Internet website. However, the proposed regulation, in the text of Appendix I, does not indicate how the map is to be actually utilized. Moreover, as contained on page 102, such map contains no legend and it is unclear what the map actually depicts. The use of such map should be clarified in the text of Appendix I and the map should contain depictions and a legend so that it is clear what the map is intended to indicate.



DEEP Response: DEEP will clarify the intended use for the provision and include a new version of the map with a legend.

Proposed language:

The Department of Energy and Environmental Protection shall make Appendix I available on the Department's Internet website and which shall also be made available at the Department of Energy and Environmental Protection, Division of Water Protection and Land Reuse, 79 Elm Street, 2nd floor, Hartford, Connecticut during regular business.

New language:

For use in accordance with 22a-133k-3(d)(2) of the RSRs, the department shall make

Appendix I available on the department's Internet website and shall also be make it available during regular business hours at the Department of Energy and Environmental Protection,

Division of Water Protection and Land Reuse, 79 Elm Street, 2nd floor, Hartford,

Connecticut.

Technical Corrections:

All technical corrections identified in the LCO report have been made as described in the LCO report, except those corrections identified below:

Response to Selected Technical Comments:

8. On page 2, in section 22a-133k-1(a)(15), in the fourth line, the opening bracket before "Regulations" and the closing bracket after "Agencies" should be deleted and in the fifth line "RSRs" should be deleted, for consistency with the definition of RSRs. The same change should be made throughout the proposed regulation, when referring to a specific section or sections of the RSR regulations rather than the RSR regulations as a whole.

DEEP Response: DEEP intentionally inserted the defined term "RSRs" to be clear at all times when cross references were being made to other provisions within the RSRs. This was to provide clarity to those using the regulations that a cross reference was not to some other section of the Regulations of Connecticut State Agencies. This shorthand cross reference would be distinct from a cross reference to other regulations and the definition of RSR was intended to make this be clear. It reflects a familiarity that the regulated community has with these regulations applicable to specific programs within the Commissioner's purview. This is the same convention used by DEEP and recently approved by the Legislative Regulation Review Committee regarding amendments to the CEPA regulations, sections 22a-1a-1 to 22a-1a-12, inclusive of the Regulations of Connecticut State Agencies. In those regulations the CEPA is defined as [insert definition] and is used throughout the regulation, even when referring to different sections of the regulations. Given the numerous uses of the term RSRs (200) DEEP sees the requirement to change all of these to "Regulations of Connecticut State Agencies" as unnecessary and potentially confusing given the use elsewhere of the term RSRs. In an effort to address the concern, DEEP offers the following update to the definition of the term RSRs to clarify the meaning of the reference.



Proposed language:

(73) "Remediation Standard Regulations" or "RSRs" means sections 22a-133k-1 to 22a-133k-3, inclusive of the Regulations of Connecticut State Agencies, including Appendix A to Appendix I, inclusive, of the aforementioned regulations.

New language:

- (75) "Remediation Standard Regulations" or "RSRs" means sections 22a-133k-1 to 22a-133k-3, inclusive, of the Regulations of Connecticut State Agencies, including Appendix A to Appendix I, inclusive, of aforementioned said regulations, and when identified by a specific reference, "RSRs" also means any individual section or specific provision of sections 22a-133k-1 to 22a-11k-3, inclusive, of the Regulations of Connecticut State Agencies, including Appendix A to Appendix I, of said regulations.
- 15. On page 7, in section 22a-133k-1(a)(68)" and throughout the remainder of the proposed regulation, including each appendix, when reference is made to a number, including a measurement, time period or quantity of something, the number should be spelled out followed by such number appearing in parentheses, for consistency. For example, in section 22a-133k-1(a)(68), "(99)" should be "ninety-nine (99)".
 - **DEEP Response**: The Department understands this comment regarding spelling out numbers followed by the number in parenthesis to be applicable to numbers used in the text of the regulation, but not as is the case today to numbers in Tables or the Appendices.
- 27. On page 12, in section 22a-133k-1(d)(2)(C), "period, within thirty" should be "period or within thirty", for proper form.

DEEP Response: The Department revised this in the following manner to make clear the response to comments had to be prepared no later than thirty days after the close of the public comment period.

Proposed language:

(C) If comments on the proposed remediation are received during the public comment period, within thirty (30) days after close of the public comment period, the person responsible for remediation shall submit to the commissioner a written summary of all such comments and a proposed response to each such comment.

New language:

(C) If comments on the proposed remediation are received during the public comment



period, within no later than thirty (30) days after close of the public comment period, the person responsible for remediation shall submit to the commissioner a written summary of all such comments and a proposed response to each such comment.

36. On page 14, in section 22a-133k-1(f)(3), "cannot" should be "may not", in accordance with the committee's directive concerning mandates.

DEEP Response: The Department has modified this sentence to both respond to the comment and clarify the meaning of this sentence. As modified the sentence reads as follows:

Proposed language:

(3) The wording of any instrument used to satisfy the requirements of this subsection shall be identical to the language prescribed by the commissioner, which language shall be posted on the Department's internet website. In addition, an entity cannot issue an instrument used to satisfy the requirements of this subsection unless such entity satisfies the following requirements, as applicable:

New language:

The wording of any instrument used to satisfy the requirements of this subsection shall be identical to the language prescribed by the commissioner, which language shall be posted on the Department's internet website. In addition, an entity cannot issue an instrument used to satisfy the requirements of this subsection unless such entity satisfies the following requirements, as applicable In addition, only an entity that satisfies the following requirements, as applicable, may issue an instrument used to satisfy the requirements of this subsection:

47. On page 23, in section 22a-133k-2(b)(7)(A), "obtained pursuant to" should be "determined in accordance with", for clarity.

DEEP Response: The Department did not make this edit. This provision provides a way to obtain a direct exposure criteria, but is not strictly speaking "determined" in accordance with that subdivision. A number of parallel provisions the RSR, see RCSA 22a-133k-2(c)(6), 22a-133k-3(i) use the same phrase as that proposed by the Department.

49. On page 26, in section 22a-133k-2(c)(2)(A), in the last line, "subparagraph (A)(ii) of this subdivision" should be "subparagraph (B)(ii) of this subdivision", for accuracy.

DEEP Response: The comment correctly notes that "subparagraph (A)(ii) of this subdivision" is incorrect. However, changing this reference to "subparagraph (B)(ii) of this subdivision" is not consistent with the Department's intent. Upon additional consideration, this provision is clearer without the phrase "determined in accordance with subparagraph (A)(ii) of this subdivision." So as modified this provision reads as follows:



Proposed language:

(A) Polluted Soil in a GA Area

Substances in polluted soil in a GA area may be remediated to a concentration equal to or less than the groundwater protection criteria for such substance based upon the results of a TCLP or SPLP analysis determined in accordance with subparagraph (A)(ii) of this subdivision.

New language:

(A) Polluted Soil in a GA Area

Substances in polluted soil in a GA area may be remediated to a concentration equal to or less than the groundwater protection criteria for such substance based upon the results of a TCLP or SPLP analysis determined in accordance with subparagraph (A)(ii) of this subdivision.

55. On page 31, in section 22a-133k-2(c)(5), in the catchline, "Exemptions" should be "Exceptions", to accurately reflect the text of the existing regulation.

DEEP Response: This provision has been modified to clarify that the word "Exceptions" is being deleted by bracketing "Exceptions."

Proposed language

(5) Conditional Exemptions to Pollutant Mobility Criteria

New language:

- (5) [Exceptions.] Conditional Exemptions to Pollutant Mobility Criteria
- 70. On page 48, in section 22a-133k-2(h)(5)(B), "the A Soil Horizon" should be "the soil horizon", for proper form and in subparagraph (D) of said subdivision, "Such" should be "The", for proper form.

DEEP Response: See the response to substantive comment 17, above.

90. On page 65, in section 22a-133k-3(h)(1)(E), in the second line, "the" should be inserted before "risks", for proper form, and in the fourth line, "[subsection] section 22a-133k-3(e) [(2) of this section or otherwise identified] of the RSRs;" should be "subsection (e)(2) of this section; [or otherwise identified]", for proper form.

DEEP Response: This provision has been modified to read as follows:

Proposed language:

(E) The effectiveness of any remediation [taken] to eliminate or minimize [health or safety risks] risks to human health and the environment associated with [such] each release being



remediated, including but not limited to, any risks identified during remediation or identified in any risk assessment conducted in accordance with [subsection] section 22a-133k-3(e)[(2) of this section or otherwise identified] of the RSRs;

New language:

[(C)] (E) The effectiveness of any remediation to eliminate or minimize <u>any</u> risks to human health and the environment associated with each release being remediated, including, but not limited to, any risks identified during remediation or identified in any risk assessment conducted in accordance with <u>subsection</u> (e)(2) of this section <u>section</u> 22a-133k-3(e) [or otherwise identified] of the RSRs;

