

## **Public Comments on PA 20-9 Release Based Cleanup Program Working Group/Subcommittee's Concept Papers**

The P.A. 20-9 Release-based Cleanup Program Working Group has established topical subcommittees to recommend concepts to the Department of Energy and Environmental Protection ("DEEP" or "Department") related to the development of regulations for a release based cleanup program. The concepts developed in the first phase by five (5) subcommittees will guide discussion in subsequent phases, and will be guide the Department when drafting regulations. The first phase included subcommittees on Discovery of Historical Releases, Reporting Newly Discovered Historical Releases, Characterization of a Discovered Release, Immediate Removal Actions and Tiers.

The period for public comment on the Concept Papers drafted by the first phase Subcommittees was June 14<sup>th</sup>, 2021 to July 6<sup>th</sup>, 2021. The development of concepts by the Working Group is an iterative process and DEEP will continue to provide the public with opportunities for input throughout the process. The Department received two (2) comment submittals concerning the concept papers: one from a member of the public, and one from the Environmental Professionals Organization of Connecticut ("EPOC"). The comments appear generally supportive of the concept papers with various noted concerns and recommendations.

Since there were few received public comments the Department has attached for review the comments received in lieu of summarizing all of the content.



***Environmental Professionals Organization of Connecticut***

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To: CT DEEP – Release-Based Cleanup Program Working Group

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The Environmental Professionals Organization of Connecticut (EPOC) is pleased to submit these comments on the Topical Subcommittee Concept papers released for public comment on June 14, 2021. This document provides our general comments to the five concept papers as follows: Discovery of Historical Releases, Reporting Newly-Discovered Historical Releases, Characterization of a Discovered Release, Immediate Removal Actions, and Tiers.

We first wish to recognize and applaud the efforts of all the subcommittee members who worked on these papers over the past several months. We acknowledge the difficult task each workgroup undertook in a brief period to address the multitude of complex issues that must be evaluated as we embark on a transition to a new release-based cleanup program in Connecticut. We strongly urge as we move forward in this process that the Department continue to engage in a collaborative effort with both the workgroup members and the general public to ultimately develop a set of regulations that we can all implement.

**General Comments:**

1. The transition to a released-based system is an opportunity to unify and possibly simplify a number of currently separate DEEP programs (e.g., Spill Reporting, Significant Environmental Hazard, USTs, etc.). Connecticut has many overlapping environmental statutes, regulations, and programs; fewer statutes and regulations would be an improvement to our regulatory scheme. Less is better.

Transition to the new program and avoiding unintended consequences will be key to its success. Conflict with other regulations and programs will only increase uncertainty. Special attention will need to be paid to how the new program works in concert with, and not in conflict to, other existing regulatory programs.

2. Several of the papers reference the Massachusetts Contingency Plan (MCP). This release-based clean-up program has many good attributes and has stood the test of time, being in place since 1993 and resulting in the cleanup of over 34,000 sites. We support using as many elements of this program as possible while working within Connecticut's Regulatory framework.
3. We understand that the new program will rely heavily on Licensed Environmental Professionals, whom EPOC represents. To that end, we request that EPOC and LEPs have input commensurate with our leading role in the implementation of the program. EPOC and LEPs want to help DEEP ensure that the program that is developed can be effectively implemented, limiting unintended consequences.
4. The topics of how to handle non-point anthropogenic sources and historical urban fill are found throughout the papers. Based on the ubiquitous nature of these sources, special attention will be required on how to address these items as part of a release-based system. We should look towards other states programs to see how this issue is addressed.



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5. The topic of how to handle releases at residential properties was brought up in some of the papers. Exceptions and/or exemptions to some of the requirements of the new program specific to residential owners should be considered that reduce the financial burden of compliance while still protecting human health and the environment.
6. The concept of “tiering” releases based on both the timeliness of the response action and by using a risk-based approach is supported by EPOC. EPOC supports creating incentives in the tiering process to aggressively cleanup releases and achieve compliance.

EPOC supports use of risk assessment as a key component in achieving compliance with the RSRs. The ability to use a site-specific quantitative risk assessment (similar to the MCP Method 3 Risk Characterization), would be an important mechanism for demonstrating RSR compliance, particularly for more complex sites.

## Comment on Discovery Subgroup Concept Paper

Ken Feathers 5 July 2021

This concept paper is well conceived, and I concur with the broad interpretation of the statute.

I agree with the conclusion that some issues that should be managed as special cases appear to be captured by the statutory language as written. It may be that reporting is necessary under the law but the remedial requirement can be a special case, perhaps implemented by carve-out in the RSRs similar to those already implemented in the RSR wave II.

Consideration should be given to the need for an additional classification tier for some of these special cases; such a tier would be for deferred action, however these releases may fit the tier (my tier 3) including releases with no active exposure pathway (or none remaining after interim action) but not meeting RSR standards, which can conceptually accommodate delayed remediation with progress/status reporting.

I agree that the discovery of historical fill is clearly definable as discovery of a historic release, but the required release response should be limited to Significant Hazard style management of acute risk. However additional management may be necessary as the site of discovery is redeveloped so reporting and keeping the presence of fill on the DEEP radar is appropriate. DEEP should aggregate such reports and occasionally evaluate wider regions for the need for a state-lead neighborhood remedy if the larger body of data suggests public health risk exists.

I concur with the subgroup's conclusion that discovery of an anthropogenic background is discovery of a historic release. This would be a release that required no action under current RSR requirement with an appropriate demonstration of background. I disagree with the subgroup's blanket inclusion of concrete and bituminous concrete as always anthropogenic background, because these materials may have been initially formulated using beneficial use of hazardous materials and when no longer in the intended use the beneficial use conditions are no longer met; evaluation of such "adulterant" substances is warranted.

There is a public interest in developing a data set sufficient to begin such a broader evaluation of natural background, anthropogenic background and even regional evaluation of fills, and such public interest suggests that reporting should be required for data aggregation, even if remedial action is exempted.

The Subgroup identified some conditions identifiable as historic releases that they felt should not trigger action, or should receive special consideration. I generally agree, and the appropriate place to deal with this is in the reporting or remediation regulations rather than discovery. I disagree that reporting of unpermitted solid waste disposal areas or farm dumps should receive special consideration, unless they are entered into and closed under the solid waste regulations upon discovery. Remediation may be deferrable upon approval if site conditions warrant.

## Comment on Reporting Subgroup Concept Paper

Ken Feathers 5 July 2021

I support the concept of voluntary reporting of otherwise exempted releases to allow for documented closure. (Note: this concept is present in the Significant Environmental Hazard [SEH] Program)

Acute exposure conditions need good definitions, especially if the SEH program is to be superseded without compromise. The suggested leaching conditions (threshold H) do address a gap in the SEH program. Note, some of the groundwater threats from soil may be argued as not acute threats depending on proximity to receptors. The conditions include a provision for polluted surface soils above a health risk for ingestion but consideration should be given to potential exposures other than the access by children addressed by imminent risk 3, (which itself may not need 2 hour notification)

The thresholds for reporting NAPL in a well based on thickness should be updated to take into account modern LNAPL concepts as described in ITRC guidance documents. The presence of NAPL constituents in groundwater based on analysis may pose a threat even if no actual NAPL is present. Presence of NAPL in a well should trigger analysis of groundwater, in the absence of a subsequent analysis NAPL presence may still be appropriate as a trigger.

All discoveries of PFAs should be reportable, with no obligation to remediate unless DEEP acts to require action by an RP. Reporting could be direct to DEEP rather than an RP obligation. This will assist in evaluation of the extent of PFAs in the state and allow DEEP to react quickly using its resources if it considers receptors to be potentially at risk.

The suggestion to report discoveries on ROWs directly to DEEP has merit. Consideration should be given to requiring provision of additional data if the discovery is in conjunction with investigation on an abutting property, because the ROW condition may originate on such property.

All discoveries that exceed RSR criteria, or the analogous Massachusetts numbers, or are not definitively shown to be below RSR criteria before the reporting deadline, should be reported, even if they are remediated by the reporting deadline (see exemption 12). In the event they have been remediated, the report may be a documentation of the presence and subsequent remediation of a release, which becomes a discoverable part of the public record. What provisions are to be made for public involvement in such a clean-up? Consider if lower tier de-minimus releases could be exempted if remediated before the deadline. (see my comments about a Tier 5)

I disagree with the Subgroup opinion that not all releases need reporting because the market has mechanisms for discovery. First, market mechanisms for discovery are different than the average citizen's ability to access public information in a government database, and we should ensure that this information is accessible to all, not just prospective buyers of a property. Second, the proposed market mechanisms assume that all market players are reputable, and that bank financing or concern for liability will temper behavior; this ignores the "bottom feeder" elements of the market that operate on cash rather than financing and may not be publicly traded corporations that have accountability. In many cases a seller of a known-to-be polluted property may also have intent to conceal conditions.

DEEP should consider an omnibus reporting that also serves to address PCB and UST program requirements in a single reporting framework.

#### Exemptions:

I concur with most of the exemptions identified by the subgroup.

DEEP should consider a mechanism by which a 22a-450 release that is not fully remediated within 120 days becomes effectively transferred to the remedial program as a “reported release” under PA-20-9 programs. It would not supplant the exemption for reporting under PA-20-9, but act as a process path; a statutory tweak may be needed, but there would not be an obligation on the RP to report again. This would be a bureaucratic transfer of DEEP lead and allow consistent handling of all longer-term remedial obligations. This should also be a consideration for proposed exemption 13, with reporting required if progress not being made.

The exemption for sheens should be expanded from outboard motors to incorporate other types of watercraft such as jet skis.

Releases to vaults or interiors should only be exempt from reporting if there is confidence there is no leakage/seepage potential from the containment, and if the containment is sufficient to contain the volume released. (The concepts in the immediate removal subgroup appendix 4.5 have merit and bear on this.)

The presence of coal, coal ash, treated lumber, etc. exemption should be more narrowly defined. Some releases associated with these materials may require action to address acute direct exposure risk, and reporting may be warranted. This also may be an exemption that RPs attempt to apply to “urban fill”; there does not appear to be a discrete “polluted fill” exemption, nor should there be; the RSRs provide an exit path.

An additional reporting exemption should be considered for discoveries of a release in the course of a scientific study by a research institution. I have seen some research projects that did not move forward due to investigator or property owner concerns over the findings triggering liability or remedial obligations. (Acute hazards would still need to be appropriately captured and mitigated.)

## Comment on Characterization Subgroup Concept Paper

Ken Feathers 5 July 2021

This is a good comprehensive concept paper, and the appendix could serve as a starting outline for a release-focused guidance that would complement the Site Characterization Guidance Document.

I agree that characterization has many aspects, only one of which is laboratory analysis of environmental samples. (This concept is a longstanding element of the Triad approach to cleanup.) In order for characterization to be responsive to a variety of scenarios, this must be fully accepted by DEEP, and decisions based on adequate characterization even without significant chemical lab data should be acceptable for closing out some releases.

The subgroup correctly advocates for regulatory flexibility in characterization, with details of approaches specified by guidance rather than prescribed in regulation. I recommend that the regulations define characterization goals and data objectives, but allow flexibility for practitioners to meet these goals using acceptable methodologies described by guidance.

Regulation and Guidance should be carefully crafted to include a variety of acceptable approaches, but avoid the universe of methods becoming a “must include” laundry list.

The subgroup correctly notes that the SCGD and RSRs have always had a focus on characterizing and remediating releases, just within the framework of evaluating an entire parcel. Consequently, any release-focused guidance becomes a language refocus, rather than wholly new. The incorporated technical concepts, especially for Phase 3 characterization, are wholly pertinent to characterization of a release. Phase 1 characterization would remain a valid guidance, and can guide a parcel owner in site evaluation, but is not relevant for release discovery except to suggest where to look. Phase 2 concepts are applicable to the beginning process of determining a release occurred and may thus be relevant for discovery.

I agree that characterization is an element in determining a release has occurred, and note that this is essentially the focus of the SCGD phase 2 guidance, which identifies methods to evaluate a variety of potential locations of concern.

Characterization goals are necessarily two-fold, after determination a release occurred, and these must be separately identified, and can operate on different timelines. Firstly, the release must be understood sufficiently to evaluate the risk to people and the environment; this bears on data needs to determine Tier classification and interim actions. Secondly the release must be adequately defined to support remedial design; this bears on achieving closure and may be a different and later characterization effort.

I agree with the subgroup that it is appropriate to define a tiered approach to characterization, with smaller and contemporaneous releases requiring less characterization effort to meet the objectives. The characterization process may be appropriately simplified if the release is determined to be of minimal risk. Separately defined regulatory objectives may be appropriate. Guidance should present clear examples of the level of effort associated with high, medium and low level characterization, both for determination of a release and subsequent evaluation of risk posed.

Any release characterization guidance should facilitate the bundling of releases for characterization because, especially at complex sites, there are economies associated with evaluation of a site wholistically, especially if groundwater impacts are present.

The subgroup discussion of whether a release is newly discovered or reportable seems somewhat fuzzy, and a careful integration of this with the Discovery and Reporting subgroup concept papers may clarify.

The suggested characterization exemptions need some caveats. While in many cases contemporaneous releases such as a vehicle fuel tank rupture may not need significant characterization, there are circumstances where the environmental setting must be considered, and potential future impact to wells factored into the evaluation needed prior to a signoff.



## Comment on Immediate Response Subgroup Concept Paper

Ken Feathers 6 July 2021

The concepts subject to mandated immediate responses that go beyond the SEH program elements have merit and should be considered in development of regulations. Some of these concepts are most applicable to contemporaneous releases to limit or avoid long term impacts through quick action.

I concur with the subgroup that there should be both mandated response actions to address acute risk and optional response actions to fully address/stabilize/limit future environmental risk associated with a release. If fully addressed an early closeout mechanism is appropriate and can be incorporated in a single reporting obligation. If attenuation of a release is accomplished in a manner that reduces the risk-driven imperative for promptly addressing the residual risk, and if final remediation of the release is thus deferred, an ongoing monitoring and reporting framework should be established so the release does not “slip through the cracks”.

I note that these concepts apply to both contemporaneous releases and discovered historic releases, and scalable eligibility based on magnitude and complexity as well as risk also apply to both.

Especially to govern immediate responses, the wider concept of characterization presented by the characterization subgroup is applicable, to allow use of real time field information in guiding the initial response.

Early exit should not be viewed as keeping a release out of the regulatory system but rather as allowing case-specific regulatory closure to exit the system without further obligation. This would contrast with how today, with separate programs, DEEP OCSR often “closes” a case and refers it to the Remediation Division, which is hardly closure in a real sense where resolution is achieved. If true closure is enabled, the implicit avoidance of notification becomes moot, and notification becomes the public documentation of successful remediation of a release.

I agree with the subgroup that after the active contemporaneous release of pollution is controlled an initial evaluation should be conducted to determine associated ongoing risk, this is a concept well addressed in the characterization subgroup concept paper.

The subgroup should expand its concept of nonmandated actions to include partial actions associated with larger or more severe releases that can serve to reduce the ongoing risk and associated liability and may affect the tier classification.

LEP closeout evaluation of immediate actions for releases with the potential for groundwater impact is appropriate. Many types of contemporaneous releases (listed in appendix 4.3) can have limited potential to impact groundwater, depending on the setting and the nature of the initial response. There should be a required course offered for other-than-LEP environmental practitioners who wish to be qualified to close out such releases to familiarize them with DEEP expectations for evaluation of potential for groundwater impact of such releases, and when to call in the LEP. The identification of potential groundwater impact would require further characterization efforts, and may preclude meeting timelines for early exit. DEEP should evaluate if a limited groundwater evaluation could be accepted in some circumstances to enable early exit, and if so, what it would incorporate.

## Comment on Tiers Subgroup Concept Paper

Ken Feathers 5 July 2021

I think many of the concepts presented are well thought out. I have the following comments:

I agree that there should be a period, between discovery and determination of a tier ranking, to allow for additional data collection to understand the release and risk more completely, and even remediate or stabilize the release. However, if preliminary data suggest imminent or acute risk, either human or ecological, this period should not be an excuse to delay action to protect human health and the environment. Consistent with the approach of the SEH program, interim actions should be mandated, not discretionary, and this is especially essential if the SEH program is terminated. These would be appropriately Tier 1, and perhaps classified as such on a quicker timeline. Additional actions that were focused on non-acute risk should also be permissible, with a goal to limit liability or affect Tier classification and potential timeline for final remediation.

In the absence of interim action requirements, a one year period prior to classification is too long for tier 1 sites; 6 months to determine a site is not tier 1, either by added information, or implementation of interim measures, should be sufficient, with the ability to request an extension if there is no acute risk known but a higher degree of confidence is needed.

Public perception of a Tier "0" may be problematic, it implies worse than tier 1; different terminology should be considered if used.

With a waiting period assumed for tier classification, I recommend that Tier 1 be reserved for short term [acute] risks similar to those in the Significant Hazard Program that have not been addressed in the "interim period" prior to tier classification. The concept of acute ecological risk should be added. Tier 2 should be for releases that have had sufficient characterization, or interim actions, to not be in Tier 1, but also either insufficient characterization to allow full evaluation of the absence of active acute or chronic exposure pathways, or releases for which active interim measures must continue to be implemented (such as water treatment or vapor control); releases with active exposure pathways that require remediation under RSRs but do not pose acute risk would be included. Tier 3 would be for well understood releases with no active exposure pathways, but only potential risk requiring action under the RSRs, that have not yet been closed out for a variety of reasons as outlined in the Tiers document, including the need to coordinate with remediation of other releases on the site or manage in coordination with redevelopment activity. These releases would include actual or potential impacts to groundwater that is not being actively consumed. Both Tier 2 and Tier 3 sites would be expected to develop RAPs to govern remediation of the release. Tier 3 could include sites petitioning for deferred final action if an interim remedy reduced active exposure risk.

If a release is "closed" through use of an engineered control or land use restriction, will it remain in a tier? I recommend that only releases that are closed out without the need for any further care, be it EC O&M, EUR oversight, etc be allowed to exit the tier system. Perhaps for data management purposes those releases with long term care obligations should be considered a Tier 4: "fully protective but requiring ongoing oversight and periodic review". It might be appropriate to consolidate the legacy EC/EUR universe into a single site/release management database using this concept, rather than keep

them separate, allowing easier discovery in a public data query. A tier 4 classification may also be appropriate for any release in MNA status or only pending final establishment of an EUR.

The statute in section 19 (d) indicates there should be a lower risk tier that would not require verification of remediation. This should be identified as a Tier 5 and be based on characterization that shows no active exposure pathways and release features such as no bio-accumulative substances, no acute toxic substances, minimal extent and concentration, and substances subject to degradation under natural conditions. Likely candidates would include at least petroleum fuel releases that do not exceed a certain area/volume/concentration threshold. Reclassification of a larger release after partial removal should be allowed. If required to be reported, urban soils may also be appropriate to be included here if they do not pose significant concentration-based risk triggers. Many such releases may also be early exit candidates, prior to tier classification, or even reporting, and the concepts above would apply in defining the universe.

Tier 1	Imminent or acute risk (SEH)	Interim actions required
Tier 2	Open exposure pathway present <i>or</i> data gaps remain in release characterization	3 years to close exposure or complete characterization as tier 3
Tier 3	Actionable pollution remains but no open exposure pathway present	6 years to remediate Extensions for cause
Tier 4	Release remediated in a manner that requires long term actions	5 year reviews
Tier 5	Release of minimal long term concern	No verification required

Note that this is essentially a recharacterization of tiers and ideas as presented in the concept paper; requirements for reporting etc. applied to tier 3 would transfer to tier 4, with tier 2 concepts applied to my proposed tier 3.

Tier 4 sites may have some flexibility in who implements the ongoing obligations, however any required 5 year review should be by an LEP, who would have accountability through licensure and also the ability to understand the site history, and how the closure is consistent with the RSRs, and therefore the ability to discern any shortcomings. These releases are also likely to be at complex sites with multiple releases.

Groundwater impact and remedies are unlikely to be completed within a year, so would be tier 3 or 4 (see below) unless active exposure pathways are found. Groundwater pollution by degradable substances might be classifiable as Tier 5 if there are no active pathways and a defined threshold concentration is not exceeded.

Section 2F: both tier 1 and tier 2 may pose active risk, and any high priority DEEP enforcement efforts should not be limited to only tier 1. DEEP should also have the ability to enforce against non-performing RPs for any site, regardless of tier.

Section 2G I agree that extra work should not be required to address an anthropogenic background for close-out of a specific release into such polluted soil, but the fact of an elevated background should be subject to reporting rules as a separate release discovery, subject to any reporting and remedial action exemptions DEEP determines appropriate. RP remediation of such conditions should be limited to acute risk management. It may be appropriate for DEEP to compile such reports and based on regional evaluation implement a state-funded remedy if risk reduction is needed.

The recommendation to allow grouping of releases must be carefully implemented by DEEP to allow for appropriate data management and tracking.

All RAPs should be subject to public notice, not only those for releases remediated after the Tier classification. It may be appropriate for Tier 5 remediation to be excluded from this requirement.

## Crosscutting General Comments on Subgroup Concept papers

Ken Feathers 5 July 2021

*These comments are comments that may reflect ideas triggered by more than one of the subgroup concept papers.*

There seems to be some inconsistency in how several key concepts are viewed between subgroups, however there is also much convergence of concepts.

I have a concern that in the absence of some mechanism compelling one to look for and evaluate potential release areas, some elements of the regulated community will approach release discovery with a head-in-sand approach, and only discover releases if they can't avoid them. This appears to be a missing element in this release-based program and DEEP should at least retain the SCGD as guidance for parcel owners seeking to understand and limit their environmental liability through voluntary evaluations, which then, if releases are discovered, have a clear path to remedy.

The DEEP will need to significantly improve and integrate its GIS based data base for permits, sites, remediation program widgets, and releases to consolidate all programs and establish a unique tracking number for all releases, along with the ability to cross-link these items and relate them to the concept of a site that carries forward from traditional program and GIS approaches. In addition, this can provide the opportunity to capture the interrelationship of various Rem ID #s assigned to a single geographic location. A major resource commitment should be made to incorporate all legacy data to allow easy discovery based on a GIS search. This database will also be critical for DEEP oversight of complex sites that are being addressed as a suite of separate release remedies, rather than a site-wide cleanup. Any uploading of information affecting specific fields in this database, as opposed to report uploads, by others should be subject to a buffered review by DEEP before posting to ensure data quality.

The concept of allowing some work to be conducted by other than LEPs may require careful implementation if there is an expectation that a final LEP signoff will be required. The LEP community should be consulted to ensure that there will not be a need for extra work or expense by a RP to allow the LEP a comfort level when signing off on other's work, and therefore effectively providing a guarantee of that work. DEEP should require, of anyone signing off on a release, participation in one or two mandatory classes pertaining to the characterization and remediation regulations applicable for releases, especially if lower risk sites need not have an LEP verify.

I applaud the general acknowledgement that investigation and remediation is not a linear process, and can be based on other than chemical analyses. While the process can most easily be described in a linear manner, the implementation should be flexible. (This is one of the conceptual elements in the Triad approach to sites.) DEEP should establish some basic characterization expectations that must be met before the release/site is closed out and identify how these may be met if a RP chooses to implement an interim action such as hot spot soil removal prior to complete characterization.

The presence of a release to the soil or waters of the state is pollution under the Statutes. Even if a release is not deemed reportable or tier-able, there is still an implicit obligation to prevent/remove such pollution, and the state may require actions to prevent pollution. Some of the discussion about reporting and tiers seems to be to try to remove a release from, or avoid a release entering, the DEEP universe, with the perception that DEEP oversight, or even the implicit obligation to remediate,

reiterated clearly in PA 20-9, can thus be potentially avoided. The State has RSRs that specify release levels below which action may not be needed, however even if no action is required the fact of a release remains. The RSRs are effectively the State's opinion on risk management, and what pollution requires actions, but can only be applied if a release is fully characterized. At a minimum characterization is thus needed whether a release is reported or not, to properly evaluate the release's impact and the need for action. In the absence of adequate characterization showing an exemption is met, the default should be to report. The goal of this release-based program should be to minimize the bureaucratic pain that is perceived to accompany reporting.

I agree that there should be specific carve-out of requirements for 1-4 unit residential properties, but they should consider the distinction between rental properties (where remediation costs can be charged off on taxes) and owner/occupied residences. In addition, there should be some non-waivable requirements for surface soils, potable water impacts and similar Tier 1/SEH conditions. Flexibility may most appropriately focus on minimizing long term costs.

Coordination of deadlines for practicality is needed. Reporting should be prior to tier classifications, but there should be a window that allows a quick remedial action to be documented as one action report and done. Perhaps a delay in reporting could be allowed for preparation of a remedial action report, if all actions are completed prior to the reporting deadline and the report is submitted in lieu of tier classification.

DEEP should note that the adoption of regulations that are intended to supersede the Significant Environmental Hazard program will likely need to be accompanied by repeal of the separate statutory requirement. A careful legal review of any enforcement authority "losses" should be made before this is considered, and DEEP should be mindful that such repeal would likely be not able to be reversed if the successor program is later found to be deficient. Alternatively, the regulations can exactly incorporate the SEH program statutory language. The SEH program should at least be reviewed as an example of how a tier 1 release response may work, and such review may provide a beginning regulatory framework source that complements reliance on the MCP. A single program addressing all releases, both contemporaneous and historic, would be optimum.

Several subgroups advocate for DEEP publishing background ranges. The recommendation that rebuttable presumptive concentration tables be published for both anthropogenic background and naturally occurring substances is a good one. Development of such background ranges should be funded through graduate studies at UConn or elsewhere. (ITRC will be issuing a guidance on background determination later this year, and this plus the draft DEEP background document should govern the investigations.) Given the state's variability, geographic/geologic/airshed subregions may need to be identified to create a workable dataset. There is a risk that such a study will identify one or more ubiquitous substances that exceed published risk criteria (such as Arsenic, which is expected to exceed in much of the state) and the state should be prepared to address how it will communicate and manage the public health risk inferable from such a finding. (Example: USGS identified trace levels of atrazine in numerous wells not near cornfields and this was never evaluated for its health ramifications, in the absence of published risk numbers when the study was conducted.) Such documentation of background conditions associable with health risk will likely become an Environmental Justice issue given the probability that urban areas may more likely have associated health risks. Widely communicated recommended best practices for urban living, such as test or import garden soil, may help address

concerns; DPH should be involved early in any messaging. Some of these concepts would also apply if the DEEP workgroup effort on urban soils becomes reactivated to support any RSR exemptions for such soils reported as a historic release.

It is important that the public have adequate opportunity to provide input, especially for early off-ramp release remediation. The Characterization subgroup recommendation that public engagement be part of early characterization, prior to remedy implementation and tier assignment and even prior to reporting has merit. DEEP should develop, in consultation with the regulated community and public, a viable mechanism to expedite remediation yet ensure such remediation appropriately takes into account the interests of the public. Especially critical would be how a sign-off prior to Tier assignment, and even prior to reporting, will clearly incorporate the potential for public input. For such early signoffs it may be that public input is most effectively addressed by ensuring adequate participation at the regulation development stage, analogous to the public input for a general permit. If so, a mechanism for neighbors to be made aware of release remediation activities should be established, to respect their interests. The OCSR should consider what public involvement might be appropriate in the course of a contemporaneous release response.

Similarly, it is important for the public to have access to environmental data. Thus, exemptions from reporting should be limited. However, for early exit remediations, especially low risk releases, the report could be an action summary that closes out the release. The important element is that there is a publicly accessible record of the reported release and its resolution.

As incentives for early remediation of a release, even partial actions, I suggest that any fees only become applicable upon entry into the tier system and be scaled to reflect the remaining risk tier, and thus need for oversight. If the option exists to instead of submitting a tier classification report submit a close-out report this provides additional incentive for early closeout of releases that have no groundwater involvement, since GE sites have necessarily longer timeframes.

The program must be carefully structured to avoid a tendency for investigations to be conducted with blinders on in an attempt to avoid identifying additional releases.