106 Lake Shore Drive Wayland, MA 01778 September 8, 2011

VERTEX Environmental Services, Inc. 400 Libbey Parkway Weymouth, MA 02189 Attn: Jessica Fox, PE

SUBJECT: Wayland Town Center RAM Plan

Dear Ms. Fox:

Thank you for the opportunity to view the RAM plan on the website and to attend your September 1, 2011 presentation and response to questions about the plan. Review of the RAM plan was difficult given the extended power outage which prevented access to the website from home, and also given restricted access to the Wayland Library.

More troublesome however, was the lack of substantive information in the document. I attribute this not to VERTEX alone, but to your client, Twenty Wayland LLC, whose style is to provide little detail in any submittals. Reviewers throughout the Town Center approval process have been hard pressed to understand plans sufficiently to feel confident about their integrity. This is not for lack of the consultants' technical expertise or determination, but rather, the developer's lack of candor. Regrettably, I was one of the late arrivals to your presentation, albeit arriving only a few minutes past 7 PM. I was surprised when the meeting started so promptly, was so short, and as noted in the video rebroadcast, included no introductory explanation of context/history to facilitate attendees' understanding. The meeting did not invite dialogue, but rather signaled the developer's need to check off one more permit requirement.

It is no surprise therefore, that with regard to the RAM plan, residents have asked for additional graphic and text detail as to the location of monitoring wells near planned excavation, the process by which excavation will occur without disturbance to the existing outfall pipe, the specific handling process for any suspicious excavated soils and their disposition including methodology for immobilizing metals, etc.

You have noted that any temporary stockpiling of excavated soil will be covered. Could you clarify whether working stockpiles will be covered at the end of each workday? Also, I would ask you to provide graphically the location on-site for the treatment of soils with leachable metals exceeding RCRA limits. I look forward to seeing your response to these questions as well as those of other reviewers. Thank you for your consideration.

Sincerely,

Sincerely, Auce Boelfer Alice Boelter

CMG Environmental, Inc.

September 6, 2011

Ms. Jessica Fox, P.E. Vertex Environmental Services, Inc. 400 Libbey Parkway Weymouth, MA 02189

Re: Public Commentary on Draft Release Abatement Measure (RAM) Plan Former Raytheon Facility, 430 Boston Post Road, Wayland MA Release Tracking Number (RTN) 3-13302 Vertex Project No. 19163 CMG ID 2002-003

Dear Ms. Fox:

The following is my public commentary on the August 5, 2011 Draft Release Abatement Measure Plan for a portion of the former Raytheon facility in Wayland, Massachusetts (the Site) regarding Massachusetts Department of Environmental Protection (DEP) RTN 3-13302, prepared by Vertex Environmental Services, Inc. (Vertex). For the record, the Wayland Board of Selectmen has retained me to provide technical review of document submittals and other activities at the Site on behalf of the Town of Wayland, especially those that pertain to compliance with DEP requirements.

As in past document reviews pertaining to the Site, I have prefaced my comments with heading designations (where applicable) for ease of comparison, and used uppercase roman numerals to identify each comment.

1.6 SUMMARY OF THE SUBJECT SITE REGULATORY STATUS 1.6.1 RTN 3-13302

I) On Pages 4 and 5 of the draft RAM Plan, Vertex indicates that Raytheon had linked several additional RTNs to the primary RTN 3-13302 (which is true). However, perusal of the Massachusetts Department of Environmental Protection (DEP) "Waste Site/Reportable Releases Look Up" (http://db.state.ma.us/dep/cleanup/sites/search.asp) Web page for RTN 3-1783 indicates that Raytheon closed out this RTN through submittal of a Class B-1 Response Action Outcome (RAO) Statement submitted on August 3, 1995 rather than through linkage to primary RTN 3-13302 (as implied by the second paragraph following heading 1.6.1 or by submittal of an LSP Evaluation Opinion as indicated by the first bulleted paragraph following).

The DEP Web page for RTN 3-22665 indicates that Raytheon closed out this RTN via linkage to primary RTN 3-13302 rather than by submittal of a Licensed Site Professional (LSP) opinion as stated in the fourth bulleted paragraph on page 5 of the draft RAM Plan. (Closure solely via an LSP opinion implies use of the transition procedures set forth at 310 CMR 40.0600 of the Massachusetts Contingency Plan, particularly 40.0636(2)(a), (b), or (d) – which cannot pertain because RTN 3-22665 does not refer to a 'transition site.')

The Town of Wayland recognizes these are minor details that do not in any way affect the substance of the Vertex draft RAM Plan. Nonetheless, for the sake of accuracy Wayland requests that Vertex revise this portion of the final RAM Plan to reflect actual DEP submittals.

1.6.2 RTN 3-22408 (Linked to RTN 3-13302)

II) In the second paragraph on Page 6 of the draft RAM Plan, Vertex states that Raytheon linked RTN 3-22408 to the parent RTN 3-13302 in June 2009. It would be more accurate to note that on November 26, 2007 Raytheon submitted a partial RAO to close out the arsenic issue associated with RTN 3-22408, and a Downgradient Property Status Opinion to address the methyl tertiary butyl ether (MTBE) issue associated with this RTN (also identified with existing RTN 3-17974 at 356 Boston Post Road, currently in Remedy Operating Status, and subsequent RTN 3-27651 that DEP issued specific to the Downgradient Property Status Opinion). Raytheon did link the remaining issues associated with RTN 3-22408 (minor reportable concentration exceedances for toluene and trichloroethene, a/k/a TCE) to primary RTN 3-13302 on June 9, 2009.

As with Comment I above, Wayland recognizes this to be a minor detail that does not affect the substance of the Vertex draft RAM Plan. However, given the significant interest and scrutiny that Site redevelopment has garnered, the Town believes it prudent to have the background information be as accurate as possible. Therefore we request that Vertex revise this paragraph of the final RAM Plan to include all DEP closure submittals for RTN 3-22408.

1.6.3 Activity and Use Limitation (AUL)

III) Vertex discusses the "Site-Wide AUL" on pages 6 and 7 of the draft RAM Plan. Wayland prefers the terminology 'Deed Restriction' for this particular document (recorded in Middlesex South District Registry of Deeds Book 27793, Page 141) because although it is titled "Form 1075, Notice of Activity and Use Limitation" as if it were a DEP-style AUL in accordance with 310 CMR 40.1074, it deviates significantly from the regulatory requirements for an AUL as promulgated by DEP.

In particular, the Deed Restriction ('Site-Wide AUL') requires written certification from the LSP-of-Record for RTN 3-13302 (and linked RTNs 3-13574 & 3-14042) approving changes to surface conditions (such as topography, surface cover & paving), or property use for residential purposes. Unlike a standard DEP AUL, the Deed Restriction does not give authority to any other LSP to approve changes in surface conditions or property usage at the Site. Therefore the second paragraph on page 7 of the draft RAM Plan incorrectly states that "an LSP" will revise the Deed restriction, since only the LSP-of-Record for RTN 3-13302 is allowed that option.

The current LSP-of-Record for RTN 3-13302 is Mr. John Drobinski, P.G. of Environmental Resources Management, Inc., and he has been the only such LSP since imposition of the Deed Restriction on October 21, 1997. The draft RAM Plan is not signed by LSP Drobinski, nor does it include a written certification by Mr. Drobinski approving proposed changes to surface conditions (and planned residential usage) as mandated by the Deed Restriction.

Furthermore, the Deed Restriction stipulates that the LSP-of-Record for RTN 3-13302 must approve written procedures for response actions pertaining to monitoring, notification, management, or disposal of contaminated media (such as soil, groundwater, or sediment), waste, or debris. The draft RAM Plan certainly qualifies as a written procedure for such response actions. Nonetheless, it does not indicate that LSP Drobinski has approved these response actions.

The wording of this section of the draft RAM Plan leads Wayland to believe that perhaps Vertex does not fully understand or appreciate the unique and particular legal requirements of the Site Deed Restriction, which is definitely <u>not</u> a typical AUL. The Town requests that at a minimum, Vertex include a written certification statement from LSP-of-Record John Drobinski, P.G. (as mandated by the Deed Restriction) in the final RAM Plan, which indicates that LSP Drobinski approves the response actions as proposed in the RAM Plan, as well as the eventual residential usage of a portion of the Site.

Vertex's responses to questions at the September 1, 2011 Public Involvement Plan (PIP) meeting clarified that you have discussed the requirements of the Deed Restriction in detail with both LSP Drobinski and Raytheon, so Wayland does not believe our request for written documentation of agreement presents an undue hardship.

2.0 SITE SUBSURFACE CONDITIONS

IV) The last paragraph on page 11 of the draft RAM Plan discusses depths to groundwater at the eastern portion of the Site. Vertex states that groundwater elevations range from elevation 116-124, corresponding to 15-19' below grade. Raytheon has amassed a very substantial data set of groundwater elevations for the Site over the past 15+ years. Cursory review of groundwater elevation data for wells located in the vicinity of the existing main Site building indicates that in the past 10 monitoring rounds (September 2006 through May 2011), groundwater elevations have ranged from 113.45' (well MW-47S, 10/1/07) to 130.26' (MW-34, April 2011), corresponding to groundwater depths ranging from as shallow as 6.41' (MW-34, April 2011) to as deep as 19.23' (MW-45S, 10/1/07). Further from the Site building groundwater has been as shallow as 3.49' at MW-10 (4/23/07). Thus it appears that Vertex has significantly overestimated the minimum depth to groundwater.

Vertex's responses to questions at the September 1, 2011 PIP meeting demonstrate that you have reviewed much of the Site groundwater elevation data set. Wayland requests that Vertex consider whether and how RAM activities need to accommodate the significant seasonal fluctuation in groundwater elevations observed at the Site. The Town recommends appending a summary table of key monitoring well groundwater depths and elevations over at least the past 10 years to the final RAM Plan as supporting documentation for this analysis.

3.0 RELEASE ABATEMENT MEASURE PLAN

V) The third bullet paragraph on page 12 of the draft RAM Plan states "Conduct of [sic] all MCP response actions under the supervision of an LSP" with reference to the Deed Restriction ('Site-Wide AUL'). Wayland believes that in order to legally comply with the stipulations of the Site Deed Restriction this should read "Conduct all MCP response actions under the overall supervision of the LSP-of-Record for RTN 3-13302" (see also Comment **III** above).

VI) The first bulleted paragraph on page 13 of the draft RAM Plan discusses direct observation and field screening of excavated soil samples. DEP regulations set forth at 310 CMR 40.0442(3)(a) mandate a more detailed assessment of Site soils in cases where planned construction activities could prevent or impede future assessment of that area. That would be the case in areas shown as 'Proposed Buildings' on Figure 2 of the draft RAM Plan.

Wayland would like to encourage Vertex to work cooperatively with Raytheon and collect sufficient soil samples for the full suite of pertinent laboratory analyses once the existing main Site building concrete pad is removed, since this will be the best (and possibly only feasible) time to obtain these samples. The Town recommends that Vertex include a plan for collecting such assessment soil samples in the final RAM Plan.

VII) The second bulleted paragraph on page 14 of the draft RAM Plan indicates that Vertex is contingently planning on-Site treatment of excavated soils (if necessary) to reduce metals leachability. However, Vertex does not provide any details of such 'TCLP treatment.'

Wayland requests that the final RAM Plan include a description of the proposed treatment methodology to reduce metals leachability, including monitoring parameters and locations for remedial additives and their anticipated byproducts.

VIII) The third bulleted paragraph on page 14 of the draft RAM Plan indicates that Vertex is planning excavation to as deep as elevation 111.5 (21' below grade) for the proposed sewer pump station, but that this excavation "is not anticipated to encounter impacted groundwater." Figure 2 attached to the draft RAM Plan illustrates an area labeled "Future Municipal WWTP" but does not indicate where Vertex plans deep excavation for the proposed sewer pump station. Therefore the RAM Plan does not provide sufficient information to support Vertex's assertion that this excavation would not encounter impacted groundwater. Based on depth to groundwater considerations, it is very likely that this excavation would extend several feet below the seasonal high groundwater elevation (see Comment **IV** above).

Vertex's responses to questions at the September 1, 2011 PIP meeting indicate that the planned sewer pump station location is approximately 150-300' west of the southwesterly corner of the existing main Site building (in the vicinity of monitoring wells MW-204S & MW-45S, where the depth to water has ranged between 13.08-19.23' below grade in the past 10 monitoring rounds).

Wayland requests that the final RAM Plan describe (and accurately depict on a figure) where they propose excavation for said sewer pump station. If this excavation is in an area where Raytheon has identified groundwater contamination, the Town further requests that the final RAM Plan incorporate a contingency plan for treatment or proper disposal of impacted groundwater encountered during such excavation work.

4.0 RAM WASTE MANAGEMENT

IX) Pages 16 and 17 of the draft RAM Plan discuss management of soil excavated in the process of building demolition and Site redevelopment. Vertex does not include any contingency for handling soil that is a listed hazardous waste, which would be the case if stockpiled (or containerized) excavated soils equal or exceed applicable DEP S-1/GW-1 risk characterization standard for TCE or tetrachloroethene (PCE). It is also possible (albeit less likely) that excavated soils could exhibit the hazardous waste characteristic for TCE or PCE via the toxicity characteristic leaching procedure (TCLP).

Wayland requests that the final RAM Plan includes contingencies for properly handling excavated soil that is a listed or characteristic hazardous waste.

5.0 CONSTRUCTION DEWATERING

X) Pages 18 and 19 of the draft RAM Plan discuss options to handle water generated through excavation dewatering activities. The last paragraph of this section indicates that on-Site recharge would not require a permit (which is true). However, this type of activity is specifically controlled by the Site Deed Restriction and subject to the approval of the LSP-of-Record for

RTN 3-13302. Even if such water is not impacted by Site contaminants, on-Site recharge has the potential to significantly alter groundwater flow, which could have the unwelcome effect of migrating contamination into remediated or previously unaffected portions of the Site and vicinity.

Furthermore, the Wayland Wetlands and Water Resources Bylaw (Chapter 194) and the Order of Conditions for Site redevelopment (wetland File No. 322-0701) regulate groundwater discharge and injection locations. Specifically, the Chapter 194 permit issued by the Wayland Conservation Commission for DEP File No. 322-0701 on June 9, 2010 requires that dewatering activities conducted during construction must comply with the 2008 NPDES Construction General Permit (see Finding #rr and Conditions #14 & #30 of the 6/9/10 permit).

Wayland reiterates our request (see Comment **III** above) that at a minimum, Vertex include a written certification statement from LSP-of-Record John Drobinski, P.G. (as mandated by the Deed Restriction) in the final RAM Plan, which indicates that LSP Drobinski approves the response actions as proposed in the RAM Plan (including all contingencies provided for excavation dewatering).

7.0 FOCUSED FEASIBILITY EVALUATION

XI) On page 30 of the draft RAM Plan Vertex evaluates the feasibility of achieving or approaching background, as required by DEP regulations set forth at 310 CMR 40.0442(3)(c). This evaluation may be adequate for soil and soil vapor concerns, but omits any consideration of groundwater remediation. Raytheon has expended a very substantial amount of time and effort in aggressively remediating chlorinated solvent contamination at two portions of the Site. The so-called 'Southern Area' encompasses much of the large existing Site building, which is the identified source area of a chlorinated solvent plume in groundwater. Figure 2 appended to the draft RAM Plan depicts six smaller buildings wholly or partially within the footprint of the existing large Site building. Section 7.0 of the draft RAM Plan does not include any discussion of how Raytheon will be able to continue monitoring (and if necessary, treating) remaining chlorinated solvent contamination in the Southern Area portion of the Site following RAM activities and redevelopment in their effort to achieve background conditions in Site and vicinity groundwater. This is yet another subject addressed in detail by the Site Deed Restriction (see Comment **III** above).

Wayland requests that the final RAM Plan include a discussion of how Raytheon will be able to continue their program of Site groundwater monitoring and remediation. If warranted, the Town requests that Vertex consider modifications to the RAM Plan to facilitate Raytheon's efforts.

Minor Typographic Error

XII) On Page 9 of the draft RAM Plan, the fourth word in the first paragraph should be "regrading" or "grading" rather than "regarding." I thank you in advance for your timely response to this commentary on behalf of the Town of Wayland.

Sincerely, CMG Environmental, Inc.

Benson R. Gould, LSP, LEP Principal

Mr. Louis J. Burkhardt III, Raytheon Company cc: Environmental Resources Management (John C. Drobinski, P.G., LSP) Mr. J. Andrew Irwin, Wayland Ms. Anette Lewis, Wayland Massachusetts DEP (Pat Donahue, Larry Immerman, Karen Stromberg) National Parks Service (% Jamie Fosberg) Mr. Lewis Russell, Wayland Mr. Harvey & Ms. Linda Segal, Wayland Ms. Kimberly Tisa, U.S. EPA Region I Wayland Board of Health PIP Repository (% Julia Junghanns, Health Director) Wayland Board of Selectmen (% Town Administrator Frederic Turkington) Wayland Business Center, LLC (% Paula Phillips, Congress Group Ventures) Wayland Conservation Commission (% Brian Monahan) Wayland Fire Chief Robert F. Loomer Wayland Public Library PIP Repository (% Ann Knight)

Linda L. Segal 9 Aqueduct Road Wayland, MA. 01778-4605 508 655 0724 <u>Imlsegal@comcast.net</u>

September 8, 2011 Via email & US Mail

Ms. Jessica Fox, P.E. Vertex Environmental Services, Inc. 400 Libbey Parkway Weymouth, MA 02189

RE: Public Comment on Draft Release Abatement Measure (RAM) Plan, August 5, 2011 Former Raytheon Facility, 430 Boston Post Road, Wayland, MA. RTN 3 – 13302

Dear Ms. Fox,

I wish to thank you and your Vertex colleagues for hosting the September 1, 2011 PIP meeting, for the extended public comment period, and for this opportunity to comment on the subject draft RAM Plan. I write to document for the record questions/comments made at the PIP meeting and to offer additional information, which I hope will be helpful to you. This comment letter represents my personal lay views.

Your PIP meeting was recorded by our local cable TV station and is available on WayCAM's Video on Demand: <u>http://waycamtv.pegcentral.com/player.php?video=01f94192563ad8c4c414d9a59579803e</u> The sound volume on the remote microphone started out low but was adjusted quickly, so the recording documents pretty well what was said.

As I indicated at the PIP meeting, I am accustomed to seeing a greater level of detail in RAM plans and other documents prepared under the MCP. I have read and in some cases either commented on or used plans prepared by a few other environmental firms in the last 15+ years. Some of that is thanks to the DEP's posting of such documents on the agency's website for easier public access.

This site's history seems a bit more complex and involves multiple parties with overlapping interests. It also seems appropriate and beneficial for Vertex to consider providing more detailed explanations for how you intend to address what you may encounter in the field.

Attached please find a copy of the map I gave you at the PIP meeting. It was described last month as the most current site plan at the Wayland Planning Board office. It appears to be dated February 2011. As I indicated at the PIP meeting, some features were inconsistent with Figure 2 in the draft RAM Plan and the description of what can be built to the left and right of the so-called Raytheon line. My request was for Vertex to please update your Figure 2 to include relevant details such as those seen on the attached map, e.g. residential to the right of the Raytheon line, bifurcated town green, etc. That would NOT include cluttering up the Figure with parking space striping, for example, so I hope it is clear that I did not intend for all features on that map to be added to your Figure.

Please retain the day care building footprint on Figure 2 shown in the draft RAM Plan. At its September 6 public meeting, the Board of Selectmen voted not to exercise the option in the 2006 Development

Agreement to have 20 Wayland, LLC demolish the so-called "day care" building when the other structures get demolished. It appears the building and its foundation will remain, at least for now.

Please also add the outlines of the abutting Wayland condos readily found on other site plans. The draft RAM Plan describes dust mitigation. These condos are possibly the closest residences to the project site work, and an increasing number of the condos are now sold and occupied.

Last night, at a meeting of the wastewater commissioners, the public learned that the site plan is currently undergoing further refinements during negotiations between the Town and 20 Wayland, LLC as they work towards achieving written agreements needed to move forward with project construction.

With that, I respectfully request that when Vertex issues a Final RAM Plan that you please accommodate as best as you can the public's requests that additional information be shown on a revised Figure 2 so that known changes, which prompt the need for cooperation and communication during the implementation of the RAM Plan, are shown on the Figure (without compromising legibility). Please include the location of the new pump station, new piping routes and outfall because they are features vital to the success of the town center project and are likely to be built concurrently with Vertex's environmental site activities. It seems in everyone's best interests to have access to coordinated and accurate information, e.g. on your updated Figure.

At the PIP meeting, I asked about the MtBE plume in the southeastern portion of the property for which Raytheon filed for downgradient status a few years ago. I don't believe it is mentioned in the draft RAM Plan. If Vertex could encounter impacts to soils and/or groundwater during project construction, it seems prudent to include preparedness for it in the RAM Plan, including in the risk assessment.

We heard several parties indicate that negotiations regarding the AUL were close to completion. I also requested that if agreement is reached and documents are executed soon for new deed restriction language, that those pertinent details already mentioned in the draft RAM Plan be updated to accurately reflect the new language.

In closing, I respectfully request to be copied, electronically or via hard copy, on your Responses to Public Comment document. Please do not hesitate to contact me if you have any questions about my comments.

Thank you for your consideration.

Sincerely,

Linda L. Segal



31 Rolling Lane Wayland, MA 01778 September 5, 2011

Ms. Jessica Fox 400 Libby Parkway Weymouth, MA 02189

Veymouth, MA 02189

Re: Wayland Town Center, Vertex Project No. 19163

Dear Ms. Fox:

This is to document the verbal comments I made at your September 1 PIP meeting regarding the draft RAM plan for the subject project.

I object to the use of the term "insignificant" in section 1.7.1, entitled "Human Receptors", in describing the potential impact of site contaminants on the Baldwin Pond town wells.

While the former Raytheon site is outside the capture zone of the wells, and therefore will have no impact under normal conditions, it is within Zone 2 of the wells and therefore will provide source water during drought conditions. The correct characterization would be "small", not "insignificant".

My second comment regarded the sampling plan for soil and/or demolition debris as the main building is demolished. Having spent many years engaged in the sort of engineering work which went on in this building, I know that standard engineering lab practice was to clean circuit boards by spraying with chlorinated solvents while holding the boards over the floor, allowing solvents and contaminants to drip onto the floor and evaporate or infiltrate.

I therefore recommend that, in addition to any random sampling, specific testing of soil under former engineering labs be conducted. The probability of finding problems is far higher than under former offices or general use areas, and focused testing will avoid missing problems as a result of aggregating samples, dispersed sampling that happens to miss hot spots, etc. The Raytheon representative at the meeting indicated that he had the information as to where in the building former labs were located, and could make such data available.

Very truly yours,

- Scace

Thomas Sciacca



TOWN OF WAYLAND

41 COCHITUATE ROAD WAYLAND, MASSACHUSETTS 01778

> TOWN BUILDING 41 COCHITUATE ROAD TEL (508) 358-7701 www.wayland.ma.us

September 3, 2011

Vertex Environmental Services, Inc. Attention: Jessica Fox, P.E. 400 Libbey Parkway Weymouth, MA 02189

Re: Twenty Wayland Release Abatement Measure / 01. RAM Plan

Dear Ms. Fox,

The Wayland Historical Commission is concerned about the proposed ground disturbance on the former Raytheon property being developed for a Town Center. Although so much of the property has been already been disturbed by past development, your report states, there will be *"below-grade structures will be limited to subsurface utilities, foundations and other infrastructure elements"*.

In addition, the report states, "A sanitary sewer pump station will be constructed as part of the proposed redevelopment. The site preparation work will likely include removal of existing asphalt pavement, existing building foundations and abandoned utilities and will involve localized excavation of potential fill or natural soil." (Vertex PIP doc., page 3).

Furthermore, the Site Plan (Figure 2) shows the site of Future Residential Development located on the edge of the wetland at the northwestern boundary of the project. This area likely was not disturbed previously and therefore is archaeologically sensitive. Many pre-colonial sites have been found in Wayland located on areas adjoining wetlands.

Our Commission requests that an archaeological survey is conducted before this project goes forward. Ideally, such a survey should be implemented as quickly as possible so that the project can proceed as planned without delay.

Sincerely,

Siobhan Zane, Chair Wayland Historical Commission

CC: Ms. Brona Simon, Massachusetts Historical Commission Fred Turkington, Wayland Town Administrator Board of Selectmen, Town of Wayland Sarkis Sarkissian, Wayland Town Planner Brian Monahan, Wayland Conservation Commission



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