May 23, 2009

Memorandum for:
Public Affairs Office -- EA Comments
IMNE-MON-PA, Bldg. 1207, Room G-07
Fort Monmouth, NJ 07703

From: New Jersey Friends of Clearwater
PO Box 303, Red Bank, NJ 07724
Attn: Edward Dlugosz, Vice President

Re: Final Environmental Assessment
Finding of No Significant Impact
Fort Monmouth Closure at Fort Monmouth

General Comments:

The Environmental Assessment (EA) does not provide sufficient evidence to call for a Finding of No Significant Impact (FNSI). A forthright Environmental Impact Statement (EIS) is therefore a necessary addition to the evidence to assure that the receiving communities—Eatontown, Tinton Falls, and Oceanport, the county, and the state have a true, whole picture of the property that will become their citizens responsibility and liability. The EA lack of complete disclosure calls into question the claims of short-term, minor impact in almost all areas.

The Army chose to include (see EA Section 4.13.1) only the Phase I ECP report which included the:

- 43 contaminated sites were found originally in the Phase 1 ECP of which 27 are still under remediation and not declared as NFA yet.
- Several of the contamination sites have been declared Classification Exception Area (CEA) and/or Declaration of Environmental Restriction (DER), a virtual no-fly zone forever designation.

However, the Army did not use the most recent Phase II ECP when addressing hazardous or toxic materials (see EA Section 4.13.1):

- 27 additional contaminated "parcels" were found in the Phase II ECP which recommended a Baseline Ecological Evaluation (BEE) which is also required by NJAC 7:26E-3.11, *Requirements for Site Remediation.* The BEE is needed to determine which parcels/subparcels should go through more rigorous analysis and remediation and which parcels should be ruled out.
- The BEE had not been funded until early spring and hasn't yet been executed. Only after the BEE determinations are made can the Army enter into the 7-step process that identifies the problem more scientifically and lays out a plan for design and execution of the remediation.

These facts beg the questions:

- How can the Army declare FNSI when they have sites that will remain CEA and/or DER of no significant impact?

- How can they go forward and not take into account half again as many problem areas, i.e., Phase II, as they identified and started remediation 10 years ago.
- How can you pre-determine the new, unevaluated, unanalyzed parcels as FNSI when there are significant unremediated Contaminants of Concern (COCs) present?

The Army's EA and other documentation have never identified their pollution's impacts to food chain and environment downstream in the Shrewsbury. They never did and seeming never will acknowledge the impacts to past and present workers—the computer scientists, logisticians, technicians and military in the Hex (and other labs)—who never were notified of the carcinogens such as PCEs and TCEs that rose as high as 7820 μg/l level within 100 feet of their workplace. Although detected vapor intrusion in Phase II was relatively negligible, the same could not have been said in the years 1955 to 2001.

We call for an Environmental Impact Statement (EIS). For the reasons above, the EIS should address not only the current state of the property and its impacts but also the significant impacts already delivered to two major areas:

1. Significant Impact to the health of current and previous generations of workers and soldiers who were subjected to the carcinogens and other toxins without their knowledge through the Fort Monmouth's Installation Management Command's specific and informed withholding of information to the workforce.
2. The significant impact to the watershed, bays, and ocean and the animal and plant life that they support downstream from the base.

Specific Comments (gray highlighted EA passages for quick reference):

2.3.2 Cleanup of Contaminated Sites Past operations at Fort Monmouth have resulted in the release of various types of contaminants to the environment. The primary contaminants of concern at Fort Monmouth are trichloroethene; petroleum, oil, and lubricants; lead; tetrachloroethene; polychlorinated biphenyls (PCBs); chlorobenzene; pesticides; benzene; arsenic; 1,2-dichloroethene; and cadmium. The media of concern include groundwater, soils, and surface water. These are more specifically addressed in Section 4.0. In preparing to dispose of surplus property at Fort Monmouth, the Army will follow the provisions of Section 120(h)(3) of CERCLA, which requires a covenant warranting that all remedial action necessary to protect human health and the environment with respect to any such substances remaining on the property has been taken before the date of transfer. *All such remedial action is considered to have been taken if the construction and installation of an approved remedial design has been completed and the remedy has been demonstrated to be operating properly and successfully.*[3]

Section 2.3.2 Cleanup of Contaminated Sites, Pg 2-3 (p.23):
Section 4.0 does not elaborate or give more detail. This paragraph 1 is a high-level summary list of contaminants but the list is incomplete since it only shows some of those "contaminants of concern" which by the ECP/IRP definition are those contaminants that exceed the non-residential criteria. In the Phase II ECP the CoCs are called by a less lethal, more evasive term, i.e., *Constituents of Concern*. There is no corresponding "contaminants of non-concern", which is coined in this case for those contaminants that exceed the residential criteria. This useful data is essential because the reuse plans has a mix of residential and non-residential uses. Eatontown favors remediation of all contaminated sites to the residential criteria that gives Eatontown and the rest of the boroughs greater confidence that a changing, proper mix of uses can be visualized and executed.

2.3.2 (Continued) CERFA does not mandate that the Army transfer real property identified as available; rather, it is the first step in satisfying the objective of identifying real property where no release or disposal of hazardous substances or petroleum products has occurred (including no migration of these substances from adjacent areas). To these ends, the Army's Environmental Condition of Property (ECP) Phase I and Phase II report identifies areas at Fort Monmouth where release or disposal of hazardous substances or petroleum products or their derivatives has occurred. In addition, the ECP report identifies environmental and safety issues that, although not directly governed by the hazardous substance provisions of CERCLA, are nevertheless issues of concern, such as asbestos-containing materials (ACM), lead-based paint (LBP), radon, PCBs, radionuclides, and munitions and explosives of concern (MEC), which includes unexploded ordnance (UXO).

2.3.2 (Continued). Pg 2-4 (p.24), para. 3, line 2:

The ECPs never have and do not identify the status of the remedial actions. The follow-on IRP has a status list in a small table associated with each site. That status is now over 3 years old and work has been done and decisions have been made. The present, official NJDEP status of acceptance of Army-proposed status is not available in any of the now available documents provided by the Army. The referenced Fort Monmouth Army Environmental Database is not the official NJDEP scorecard for status. We've encountered numerous times that the *No Further Actions (NFA)* and *Response Complete (RC) were either wrong or the Army's count of proposed status that they hoped NJDEP would accept, but didn't have official designation.*

Section 2.3.2 (Continued), para 3. last 2 lines: The ECP report further serves as an information source to describe environmental conditions related to remediation activities. The ECP report is used to support property transfer documentation. In a letter dated April 17, 2007, the New Jersey Department of Environmental Protection (NJDEP) did not take issue with any of the parcels designated as uncontaminated.

Section 2.3.2 (Continued), Pg. 2-4 (p. 24), para 3. last 2 lines:
This statement, "(NJDEP) did not take issue with any of the parcels designated as uncontaminated." is taken out of context and is absolutely wrong. Uncontaminated means there is no contamination. In the RAB meetings, a member has stated that if a site has contaminants present, it is contaminated. The fact that a site has reading below the non-residential or residential criteria for a given substance does not mean it's uncontaminated, it means that it falls below an arbitrary limit that the DEP has set. There have been times that the NJDEP caseworker disagreed with the DPW members' claims that a goal/milestone had been achieved or how it was characterized. RAB members have never seen a blanket statement like this before. This is either a mistake or an overstatement of the facts out of context.

They also did not accept many of the Army proposed designations for the contaminated areas, such as NFA. Phase II has not had the Baseline Ecological Evaluation (BEE) analysis started yet. How can the Army say there are finding of no significant impact when **no** BEE or remediation has been done for Phase II or that relatively very few of the Phase I's 43 contaminated sites have been remediated and accepted by DEP.

4.4.2.1 Accelerated Disposal Alternative
Short-term minor beneficial effects on air quality would be expected from implementing the accelerated disposal alternative. Conveying the property away from the Army would not generate any air emissions and would have no effect on air quality. The short-term effects would be primarily from decreases of stationary, area, and mobile emissions associated with the cessation of most operations at the installation and former Fort Monmouth employees commuting to work. This alternative would not contribute to the violation of any federal, state, or local air regulations. An evaluation of the long-term effects based on the ultimate reuse of the installation is presented
in Section 4.4.2.5.

Section 4.4.2.1, p.55, para 1: Accelerated Disposal Alternative.
The concern in the EA seems to be the ambient air pollution caused by cars, CO and NOx. Fort Monmouth site itself generates a variety of air pollutants not associated with cars, transportation, etc. The statement that there'd be less air pollution caused by with an abandoned post is true but gravely ironic. Among the ones that the EA doesn't advertise is the air pollution generated by the ongoing remediation efforts themselves. Cases in point are:

Large-scale, ongoing VOC remediation of groundwater at CW-1, FM-22 site in the courtyard of the Myer Center, FM's continued purposeful pollution of the air to counteract the high pollution of the groundwater has been ongoing for at least ten years. When the air sparging was terminated back in 2006/07 the groundwater pollution levels again went well above the NJDEP criteria. Unless a more aggressive method is followed this continued groundwater pollution and the pollution of the air with the released VOCs will continue indefinitely. While the EA addresses air pollution associated with automobile and other transportation sources, the pollution from the sources on the property--VOCs, benzenes and other oil-based pollutants will continue as long as the 3 toxic plumes--CW-1 above, the pollution from the gasoline spill at the MP gas station, and the oil spill from the 250K gallon heating/fuel oil plume under the power transfer station near the commissary--are treated/not treated and those contained in the landfills must be taken into consideration.

Another important point must be made here since we are discussing significant or non-significant impact. The levels of air and groundwater pollution have dramatically been reduced since 2000 especially at the areas surrounding the toxic plumes. However, prior to the introduction of contaminant containment and remediation, the toxic levels of those groundwater and air pollution in proximity to highly concentrated workforce of labs like the Myer Center/Hex are major cause for concern to not only the health of the current workforce but puts into question the health of workers affected in the 50 years since its creation. Again using the real example of the Hex, VOCs--TCE, PCE, and DCE--levels were thousands of times higher than the non-residential NJDEP criteria for groundwater pollution. The levels discovered in the courtyard of the Hex for PCE in the groundwater monitoring wells as recently as 1998 and 2004 were 7440 and 7820 μg/l, respectively. Groundwater VOCs don't stay trapped underground. They percolate to the surface and enter the air as air pollution. The plume and these wells are less than 100 feet from the basement walls of the Hex. As a worker in the Hex for about 18 years over my 30-year career, no one--no one informed the workers of this hazard. While we complained of a variety of issues, this silent killer/carcinogen was lurking nearby. With the advent of remediation, the remedy was to pump the groundwater to the surface and volatize these carcinogens into the air with no seeming concern for the winds and additional vapor intrusion. The recent Phase II ECP vapor intrusion test yielded, thankfully, little or no evidence. However, if or perhaps when that test was conducted

during the Phase I IRP efforts, what were the results. We can probably extrapolate those results even now to when the plume was larger and more deadly.

What is or more importantly what was the significant impact of those deadly levels of toxins? How many generations of scientists, engineers, logisticians, and military were subjected to this impact? This, as much as any current local FM contaminated site, has suffered the greatest, most significant impacts to life and alone is reason enough for an Environmental Impact Statement (EIS) and not the facile FNSI statement that accompanies the EA. Until these impacts are quantified, FM owes Monmouth County and its inhabitants an accounting for the harm they have done.

4.7.1.1 Surface water

Water quality conditions for Mill Brook and Lafetra Creek have historically been poor, primarily because of local industrial operations on Mill Brook upstream from the Charles Wood Area and light industry and a large shipping center that discharge into Lafetra Creek upstream from the Main Post (USACE, Mobile District 2004). Before entering the Main Post, Husky Brook receives drainage from apartment complex sump pumps as well as storm water drainage (USACE, Mobile District 1999). Quarterly monitoring since 1997 of surface water entering and leaving Fort Monmouth has generally shown concentrations of contaminants (e.g., chlorinated solvents) to be greater at monitoring sites upstream of the post than at downstream sites (U.S. Army 2007). Parkers Creek and Oceanport Creek are on the Clean Water Act section 303(d) list of impaired waters (NJDEP 2006). Water quality in Husky Brook Lake is generally poor, most likely because of off-site source contamination as well as an overabundance of nutrients from Canada goose1 droppings (USACE, Mobile District 1999).

4.7.1.1 Surface water. Pg.4-33 (p. 69): The Fort and the Army has again mischaracterized the source of pollution of the streams blaming the Tinton Falls municipal complex as polluting the Wampum/Mill Creeks. It is the opposite. The fort's dumping of electronics production byproducts such as VOCs, heavy metals, oil-products, battery-component chemicals, etc. into the streams:

- through the sanitary sewage drains in the labs and not being treated in the STP or
- from the leachate from the 10 landfills situated on these same waterways or
- through the migration of contaminated groundwater into the streams

The major sources of the main pollutants that can be traced from all the R&D labs or production facilities on Charles Woods Area--Hex, Bldg 2525, Battery Labs etc. The major proof is the Wampum Lake whose pollution by mercury, lead, cadmium etc can be seen as the outputs and COCs produced by those labs. There are no industries in either TF or Eatontown that produce those types or quantities of pollutants.

Table 1 Wampum Lake Contaminants--Source MCHD

WATER BODY	WAMPUM	WAMPUM SITE 1	WAMPUM SITE 2	WAMPUM COMPOSITE	WAMPUM SITE 1	WAMPUM SITE 2	CWA sources consistent contaminants
SAMPL_TYPE		SEDIMENT	SEDIMENT	SEDIMENT	WATER	WATER	CWA PARCEL
DATE_COLL	9/5/89	10/31/90	10/31/90	10/31/90	10/31/90	10/31/90	
BERYLLIUM*	12.5	5	4.89	6.63	0.0003	0.0003	
CADMIUM**	27	10.24	16.95	10.72	0.001	0.001	27,
CHROMIUM	196	193.28	246.41	256.31	0.005	0.004	15, 27, 28*
COPPER**	545	59.17	176.93	130.62	0.02	0.02	15, 27
NICKEL**	215	62.65	138.97	110.67	0.05	0.05	27,
LEAD**	262.5	91.73	151.17	131.91	0.002	0.003	27,
ZINC**	605	314.28	429.44	428.11	0.05	0.05	27,
ARSENIC***	17	27.44	33.22	29.38	0.001	0.001	27, 28*,
SILVER**	22	10.24	16.95	10.72	0.001	0.001	
ANTIMONY**	50	1.48	1.13	2.23	0.0005	0.0005	
SELENIUM**	2.5	2.46	3.39	2.79	0.002	0.002	
THALLIUM**	110	0.059	0.6	0.087	0.002	0.002	
MERCURY**	1.05	0.27	69	0.48	0.0004	0.0004	27,
SOLIDS	20	24.21	27.76	24.73	0	0	
LAT		401818	401820		401818	401820	
LONG		740355	740349		740355	740349	
Uses:	* xray, nuclear, electronics, & acoustics		** Battery & Electronics		*** Electronics & wood preservative		Sd = Sediment Sl = Soil

Only the Husky Brook truly brings any VOCs or mercury from upstream in Eatontown. Those pollutants emanated from the former Bendix/Honeywell site, a electronics lab supplying the Fort and general industry. The Eatontown EC has had the site remediated by excavating 16000 cubic yards of soil which has greatly accelerated the cleanup of the site and reduced dramatically the downstream levels of pollution. It is the same scheme that Clearwater proposes for the 10 landfills on the Fort which continue to pollute the creeks, the Shrewsbury River, the Bays, and the Atlantic Ocean for 80+ years. To be fair, FM contributes to the Husky Brook and downstream pollution through the downgradients of those toxic plumes and the 3 landfills that surround the Husky and Oceanport Creeks.

4.13 HAZARDOUS AND TOXIC MATERIALS

4.13.1 Affected Environment

...For the purpose of this analysis, the terms *hazardous waste, hazardous materials,* and *toxic substances* include those substances defined as hazardous by CERCLA, RCRA, or TSCA. In general, they include substances that, because of their quantity, concentration, or physical, chemical, or toxic characteristics, might **present substantial danger to public health or welfare or to the environment when released into the environment.** ...Unless otherwise indicated, the baseline conditions as presented in the *U.S. Army BRAC 2005 Final Environmental Condition of Property Report for Fort Monmouth, New Jersey* (U.S. Army 2007) are presented in the following subsections.

4.13.1 Hazardous and Toxic Materials, Page 4-71 (p.107):
Because of this seemingly benign remark, half of the issues in the realm of Hazardous & Toxic Materials will not be addressed. The Phase II ECP points out 27 parcels of FM that were found to have hazardous & toxic materials in addition to the 43 contaminated sites listed in Phase I. Furthermore, the Phase II contaminants have not been fully assessed by the Baseline Ecological Evaluation (BEE) process that had been promised. The BEE was to distinguish the contaminated sites that exceeded the NJDEP non-residential criteria for soil, sediment, surface and groundwater pollution, those that exceeded the residential criteria, and those that didn't exceed those criteria. For those contamnated sites (BTW, it is still contaminated even tho' it didn't exceed the criteria) determined to exceed the criteria, the Army must move on to the full NJDEP-mandated 7-step site remediation process that takes the site through investigation, remedial design, remedial construction, remedial action operation, and long-term monitoring.

Only when we get to the remedial design step can we determine the significance of the impact of the environmental hazards. It is unthinkable but a fact that the Army has hastened to make a Finding of No Significant Impact (FNSI) without performing a BEE on all those questionalble sites and followed through with the site remediation process on those truly toxic sites. Whether they've prejudged those sites to be clean or have ignored the process that they themselves have identified, a FNSI is uncalled for at this time and a true, meaningful EIS must be delivered to the residents of Eatontown.

4.13.1.2 Storage and Handling Areas

...All but the remaining 13 tanks (none of which store heating oil) were removed as the installation installed gas lines and gas-fed boilers during the conversion to natural gas.

4.13.1.2 Storage and Handling Areas, Pg. 4-72 (p. 27), para. 4, last lines: As a case in point of the previous note on ignoring the early 2008 Phase II ECP, there were 24 additional UST found. At first it was determined that they would not be excavated. Under pressure from the public and NJDEP, the Army had a change of mind exactly one week ago has now determined they must remove them.

4.13.1.3 Environmental Cleanup—Installation Restoration Program

The Fort Monmouth Installation Restoration Program (IRP) identifies environmental cleanup requirements at each site or area of concern on the facility and proposes a comprehensive, installation-wide approach, with associated costs and schedules, to conduct investigations and necessary remedial actions. Forty-three IRP sites are managed or closed under the program. According to the Fort Monmouth Army Environmental Database for restoration, the Main Post has 15 active IRP sites and 15 sites that are listed as *response complete.* At the Charles Wood Area, there are two active IRP sites and 11 sites that are listed as response complete.

4.13.1.4 Environmental Cleanup--IRP, Pg.4-72 (p.108): In addition to the lack of Phase II input, this accounting does not coincide with the APPROVED NJDEP determination of RC. This database may count the proposed, self-administered hopes for Reponse Complete. The members of the FM Restoration Advisory Board (RAB) have not seen documented proof of these claims. This echoes an earlier claim that the NJDEP had rejected as untrue and premature. Again the new 27 parcels have not been fully evaluated, assessed, remediation plans established, and closed yet. Again this argues against the unqualified, determination of FNSI.

4.13.1.6.1 Asbestos

Fort Monmouth has actively investigated and managed ACM. Out of 470 buildings managed as part of the DPW asbestos program, 191 buildings have been surveyed, and an additional 153 buildings are similar enough to surveyed buildings that the survey results can be used to assess their status. Fort Monmouth also has actively removed asbestos as part of building renovations. A total of 72 buildi ngs have been gutted or constructed since 1987, so there are no ACM concerns for those buildings. No survey has been performed for 54 buildings. Because of the age of the facilities and the limited number of buildings remediated thus far, ACM potentially exists at most of the buildings on Fort Monmouth.

Section 4.13.1.6.1 Asbestos, Pg.4-73. Asbestos-containing materials are contained in all but 72 our of 474 buildings on post. Reuse is risky for health in those 402 that still remain. The ACM contents of those demolished 72 building are now resident unremediated and untreated in each of the 10 landfills/dumps on post. While buried,

the risk is somewhat reduced, but the erosion of those landfills both on the surface by the wind and by the stream currents over the past 50+ into the Shrewsbury may have released some into the greater environment.

4.13.1.6.2 PCBs
Testing of all oil-filled transformers, capacitors, voltage regulators, and switches was completed by June 1990. Thirty-three pieces of equipment were identified as PCB-class, 96 as PCB-contaminated, and 520 as non-PCB. An additional 224 pieces were identified from the manufacturer's nameplate as non- PCB. Of the 33 pieces of PCB-class equipment, all of which were transformers, 29 were removed and the remaining 4 were drained and refilled with non-PCB oil.

4.13.1.6.2 PCBs, Pg. 4-73 (p.290)
PCBs are contained in the landfills. Some at COC levels including landfill M-2. There were accidents that had been cleaned up.

4.13.1.6.4 Pesticides
...No pesticides or herbicides are stored on-site in either building, and all chemicals are provided under contract by the licensed vendors. The contract specifications do not allow any vendor to store any pesticide or herbicide on Fort Monmouth. Contracted application of pesticides has been in place since the mid-1980s for all of Fort Monmouth.

4.13.1.6.4 Pesticides, Pg. 4-74, (p. 290): Pesticides were disposed of in landfills. A major pesticide spill site was located on the east side of Oceanport Ave that had to remediated with major excavation. Long-term monitoring is required, especially since in was on/near the banks of the Oceanport Creek. There also still remains pesticide contamination on the far eastern border of the MP. Among the pesticides found there were arsenic near the RR tracks/

4.13.2 Environmental Consequences
4.13.2.1 Accelerated Disposal Alternative
Regardless of the type of disposal—accelerated, traditional, or caretaker—the Army is under a mandate to characterize contamination, define the appropriate remediation in coordination with regulatory agencies, and conduct the required remediation. The new use must be consistent with the remedial constraints, land use restrictions, and the protection of human health and the environment. The new owner may agree to perform all environmental remediation and monitoring, waste management, and environmental compliance activities required, or the Army may choose to continue to conduct or contract remedial and other activities. The Army would provide notification regarding hazardous substances that were stored, released, or disposed of on the property in excess of the 40 CFR Part 373 reportable quantities.

4.13.2 Environmental Consequences

4.13.2.1 Accelerated Disposal Alternative, Pg.4-75 (p.34) This alternative is full of risks. by definition and then by statement, the population of the fort before or during remediation is risky. More risky is the turning over of an unremediated site to the recipient/new owner to complete the remediation. The current remediation schemes, with the full power and resources of the Government, hasn't cleaned up many of the the sites to the spirit of the law or the needs of the community. Whether it's a commercial or a residential successor, the costs and rigor of cleaning up sites are daunting and there's been ample evidence of failed attempts at other BRAC sites.

4.14 CUMULATIVE EFFECTS

Other construction and development projects would continue to occur within the region, and all the projects would produce some combination of land use changes, air pollutant emissions, noise from construction and operation of facilities, loss of natural habitat, economic activity, transportation system changes, and demands on utility systems. New Jersey and the boroughs of Tinton Falls, Eatontown, and Oceanport take into account the effects of reasonably foreseeable development on regional resources. For instance, New Jersey takes into account all past, present, and reasonably foreseeable emissions when developing its SIP, and the boroughs account for reasonable development and population growth when developing their comprehensive plans. No specific projects or development have been identified that would result in a significant adverse cumulative effect on any of the area's resources. 1 Page: 112

4.15 MITIGATION Mitigation actions are used to reduce, avoid, or compensate for significant adverse effects. The EA does not identify the need for mitigation measures for any of the affected resource areas.

4.14/4.15, Pgs. 4-76-4-77 (112-113): It's been shown in previous comments that the contamination discovered in the Phase 2 ECP has not been considered and consequently mitigation of those polluted parcels have not been addressed much less mitigated by the Army and its plans. This is in addition to the unfulfilled remediation of the Phase I ECP, therefore it is evident that the EA was both in error and any FNSI is premature. An EIS is required **as required by federal regulations (40 CFR 1508.9)** and necessary to eliminate any ambiguities that were introduced by the EA.