



DEPARTMENT OF THE ARMY  
US ARMY INSTALLATION MANAGEMENT COMMAND  
HEADQUARTERS, UNITED STATES ARMY GARRISON  
4551 LLEWELLYN AVENUE, SUITE 5000  
FORT GEORGE G. MEADE, MARYLAND 20755-5000

REPLY TO  
ATTENTION OF:

IMND-MEA-PWE

April 14, 2012

MEMORANDUM FOR Restoration Advisory Board Members

SUBJECT: Minutes for the March 15, 2012 Restoration Advisory Board Meeting

1. The Restoration Advisory Board (RAB) meeting was held on March 15<sup>th</sup>, 2012, at 7 p.m. at the Captain John Smathers Army Reserve Center, Hwy 175, Fort Meade, Maryland. The next RAB meeting will be **Thursday, May 17<sup>th</sup>, 7 p.m.**, at the Captain John Smathers Army Reserve Center.

2. The following RAB members were present:

Mr. Tim Berkoff, Community Member  
Mr. Rusty Bristow, Community Member  
Mr. John Burchette, U.S. Environmental Protection Agency  
Mr. Mick Butler, Fort Meade Co-Chair  
Mr. Brian Chew, Anne Arundel County  
Mr. Paul Fluck, Fort Meade Restoration Manager  
Mr. Martin Madera, Community Member  
Mr. Kurt Riegel, Community Member  
Mr. David Tibbetts, Community Co-Chair  
Mr. Fred Tubman, Community Member

3. Members not present:

Mr. Wayne Dixon, Community Member  
Ms. Laurie Haines, Army Environmental Command  
Ms. Ivana Maksimovic, Community Member  
Mr. Harry Neal, Community Member  
Mr. Howard Nicholson, Community Member

4. Others present were:

Mr. David Bolton	Maryland Geological Survey
Mr. Steve Cardon	Fort Meade Legacy Base Realignment and Closure
Mr. John Cherry	ARCADIS
Mr. Tom Crone	ARCADIS
Ms. Sarah Gettier	URS
Ms. Katrina Harris	Bridge Consulting Corp.

Mr. Jerry Kashatus	URS
Mr. George Knight	Fort Meade Environmental Division
Ms. Shelly Morris	ARCADIS/Malcolm Pirnie
Ms. Lisa Nickerson	Bridge Consulting Corp.
Mr. Dan Sheehan	ARCADIS/Malcolm Pirnie
Ms. Denise Tegtmeier	Fort Meade Environmental Division (Versar)

5. Announcements and Minutes:

- a. Mr. Paul Fluck opened the meeting, welcomed everyone, and reviewed the main topics on the agenda. Mr. Dave Tibbetts, community co-chair, called the meeting to order. Mr. Fluck invited all present to introduce themselves.
- b. Mr. Fluck reminded everyone of the importance of signing out and the location of restrooms and exit doors.
- c. Mr. Fluck made a motion to approve the January 19<sup>th</sup>, 2012, meeting minutes. The motion was seconded and unanimously adopted.

6. Outstanding Items:

- a. Mr. Fluck stated Ms. Kerry Topovski had asked at a previous meeting for an update on the DRMO site. He advised the work at the DRMO site was being done under a contract that had encountered some issues, and the contracting officer had stopped work in April 2011. He said the Army has issued an order for the contractor, Kemron, to re-start work at three sites: the Former Trap and Skeet Range, the Former Nike Site, and the DRMO site. He noted work had begun at the Former Trap and Skeet Range and the Former Nike Site, and the Army is negotiating with the contractor with respect to the DRMO site. Mr. Fluck stated the Army is working diligently to get the work started again, and he should have more information at the next Board meeting.
- b. Mr. Fluck announced that Mr. Kurt Riegel and Mr. Tim Berkoff had been approved as of February 3, 2012, as community Board members. He read a letter from Fort Meade's Commander, Col. Edward Rothstein, approving the candidates after a determination they are representative of the surrounding community. Mr. Fluck advised there are currently 11 community Board members, and Fort Meade continues to provide opportunity for new members to apply for membership.
- c. Mr. Fluck referred to a discussion at a previous meeting regarding a Federal Facility Dialogue attended by Mr. Tibbetts. Mr. Fluck noted this group consists of senior executives from Federal agencies and environmental advocates that meet on an annual basis. He said he had reviewed a document from the group provided by Mr. Tibbetts to see if there was any relevant information that would be useful for the Board. Mr. Fluck said the Federal Facility Dialogue committee typically deals with policy-level issues and most recently had high-level discussions regarding five-year reviews, environmental justice, and the role of advisory boards.

He said the summary document did not provide any functional activities that could be implemented at the installation level; however, sometimes information that is deemed important by the senior executive leadership does filter down. He said one such Department of Defense initiative is to have environmental restoration sites be at the response complete stage by certain dates. Mr. Fluck thanked Mr. Tibbetts for bringing the information to his attention and asked if there was anything else Mr. Tibbetts would like to discuss with the Board. Mr. Tibbetts added that he had been invited to attend the Dialogue and had been impressed by the committee's discussion. He said there was a strong emphasis on the environmental justice issue, and he brought up the issue as he thought some of the lower income community areas surrounding Fort Meade might be impacted by the Base Realignment and Closure Act (BRAC) actions.

d. Mr. Fluck updated the Board on the status of the environmental management system web site and noted it is in transition. He said there is currently limited functionality, and it has not been updated. He said they are working on a contract for full functionality for a limited period of time. He said the web site will be transferred to Fort Meade's web site. Mr. Fluck asked for the Board's patience as they work through these issues.

7. Presentation on Groundwater in Anne Arundel County by Maryland Geological Survey:

a. Mr. Fluck introduced Mr. David Bolton of the Maryland Geological Survey to provide an overview of groundwater in Anne Arundel County.

b. Mr. Bolton introduced himself and advised the Maryland Geological Survey is part of the Department of Natural Resources. He explained he is not part of the US Geological Survey although his department works very closely with that agency on activities such as mapping regional groundwater. Mr. Bolton advised his background is in water quality, specifically mapping regional groundwater quality. Mr. Bolton referenced a geology basics presentation given at a previous Board meeting and stated he would not be repeating the basics but mentioning how they apply to parts of Maryland.

c. Mr. Bolton said groundwater in Maryland essentially consists of two general styles, and the two styles are divided by I-95. He stated central and western Maryland are underlain by crystal and rock or consolidated sedimentary rock; groundwater tends to flow through the fractures and joints of the rock rather than between the grains of the rock. He said the Coastal Plain area of Maryland consists primarily of groundwater flowing through sand and gravel. Mr. Bolton said these two distinctly different flow regimes have a significant ramification for how groundwater flows throughout the state.

d. Mr. Bolton displayed a graphic showing what the geology might look like if one sliced through Anne Arundel County. He said most of the aquifers are confined in that there is some type of protective clay layer on top which prevents water from the surface moving into the aquifer. He stated the aquifers in the Anne Arundel County region are separated by clay layers which have varying capabilities for transmitting water. He said some of the aquifers are completely surrounded by confining units, such as the Piney Point Aquifer which is a major aquifer in southern Maryland. He said the aquifers for the most part are very productive unlike

those seen in central and western Maryland. Mr. Bolton explained that at some depth in all the aquifers saltwater is encountered; he noted the exact depth at which saltwater is encountered varies and is not known for all aquifers.

e. Mr. Bolton discussed the hydrologic cycle. He referred to the numbers on the graphic and explained the County receives about 44 inches of precipitation each year and most of it evaporates or is taken up by plants. He said less than half runs into local streams or infiltrates into the groundwater. He noted about 11 inches moves into the groundwater. He pointed out the arrows on the graphic showing flow direction with most of the shallow groundwater moving towards streams.

f. Mr. Bolton discussed a slide showing the various ways groundwater can move. He stated a well installed in a deeper aquifer that pumps a significant amount of water can reverse the direction of the groundwater flow. He explained that over a long period of time, if the confined aquifers are somewhat sandy, there can be water induced into a unit from the aquifer below or the confining units themselves.

g. Mr. Bolton showed a graphic with information about the age of groundwater. Mr. Bolton said there are a number of techniques used to determine age including gas analysis. He explained the water in shallow, unconfined aquifers is on the order of days to years old. He stated the groundwater in deeper aquifers is much older—hundreds or thousands of years old. He said some recent work with the US Geologic Survey shows groundwater in the Upper Patapsco Aquifer is more than a million years old. Mr. Bolton advised it takes a long time for the water to move through the clay layers.

h. Mr. Bolton discussed the geology of Anne Arundel County and displayed a cross section of the aquifers in the County. He stated the Patuxent is the deepest aquifer and is separated from the Patapsco by the Arundel clay formation. He advised the Magothy is the aquifer above the Patapsco with varying levels of separation between the two aquifers. Mr. Bolton said those are the aquifers found in the immediate area with the Aquia aquifer found to the south.

i. Mr. Bolton reviewed a chart summarizing the characteristics of the major aquifers in Anne Arundel County. He stated the Aquia aquifer, the youngest of all the aquifers, has a marine depositional environment so one finds shells and a clay mineral called glauconite which is also called salt and pepper. He said many domestic wells in the southern part of the County are installed in this aquifer. He said the remaining aquifers are more similar geologically than the Aquia. He stated the other aquifers tend to be rich in quartz and intermixed with different color clays. He advised another characteristic is they tend to be quite acidic which reduces the pH when it encounters oxygenated groundwater. Mr. Bolton said a side product is it tends to mobilize naturally occurring radium formations. He said the Lower Patapsco is the highest producing aquifer in the County.

j. Mr. Fluck stated he had samples of the different aquifers which he would pass around for the Board member to view.

k. Mr. Bolton displayed photographs of the various aquifers and pointed out how they differ in color and composition and how much variety there can be in as little as 15 to 20 feet of clays.

l. Mr. Bolton discussed water level monitoring in Anne Arundel County and noted both the US Geological Survey and his agency maintain a network of wells throughout the Coastal Plain, particularly in southern Maryland. He stated there is a separate monitoring network for each aquifer and, depending on available funding, measurements are usually taken about twice a year.

m. Mr. Bolton showed a list of the number of wells in each of the aquifers in Anne Arundel County, with most of the wells being in the Magothy. He stated every two years the two agencies work together and plot the data and develop contours for each aquifer, as well as potentiometric-surface maps. Mr. Bolton advised maps are also produced to show the differences found over the years of measuring the water levels, and these maps are available online. Mr. Bolton stated his agency has been working with the Department of the Environment to develop a regional Coastal Plain groundwater flow model. He noted the Anne Arundel County Department of Public Works is very proactive in supporting the monitoring of these aquifers.

n. Mr. Bolton next discussed the Aquia aquifer water level map, noting this aquifer is not used by municipal supplies very heavily in Anne Arundel County but is used in southern Calvert County. He said all water levels were above sea levels until humans started pumping the groundwater. He showed the water levels for a well installed in Anne Arundel County and noted the levels from 1980 until 2011 have dropped about 40 feet. Mr. Bolton explained most of the decline is caused by heavy pumping in the southern areas and is not from pumping in Anne Arundel County. He added that the age of the water in this aquifer is more than 30,000 years old.

o. Mr. Bolton showed a map of the Magothy aquifer. He stated some of the aquifers do not have as much data as others and this is reflected on the maps.

p. Mr. Bolton discussed the maps produced for the Upper and Lower Patapsco aquifers and noted they are very heavily used in the Annapolis and Waldorf/LaPlata areas where there are steep cones of depression. He stated the water levels in the Crofton Meadows have dropped about 40 feet over the last 30 years in the Lower Patapsco Aquifer. Mr. Tim Berkoff asked about the possibility of running out of water. Mr. Bolton explained the Department of the Environment controls the drawdown of water through the requiring of permits, and even though there has been drawn down in these areas, it still may be a long way from the top of the aquifer.

q. Mr. Bolton displayed a map of the water levels in the Patuxent aquifer, noting it outcrops just northwest of Fort Meade. He stated it is separated from the Lower Patapsco by a thick, fairly impermeable clay layer. Mr. Bolton stated Charles County, Chalk Point, and Fort Meade/Patuxent Research Refuge all pump from this aquifer. He stated some monitoring wells

have been installed to look at the affect of pumping and recharge downgradient of an outcrop area. Mr. Tubman asked about the pumping at Chalk Point and whether it has altered or peaked over the years. Mr. Bolton responded the new maps to be published soon have a much larger cone of depression around Chalk Point than the ones he is showing, and his agency does monitor groundwater in that area. In response to a question from Mr. Tubman about a database of information which would show usage changes, Mr. Bolton said withdrawals from the aquifers are reported on an annual basis to the Department of the Environment, and water level data is also available from the US Geologic Survey. Mr. Bolton suggested anyone interested in this type of data contact him, and he would assist them in obtaining the information.

r. Mr. Tibbetts expressed concern about the cone of depression near Crofton Meadows and whether it would accelerate the movement of pollutants into the aquifer. Mr. Fluck responded that Mr. Bolton was discussing the Patuxent aquifer. He said where Fort Meade finds most of the groundwater contamination associated with its sites is in the Lower Patapsco aquifer, and those two aquifers are separated by the Arundel clay layer. Mr. Fluck stated the amount of leakage between the two aquifers is insignificant because of the dense clay layer. Mr. Bolton added the thickness of the clay in this area is about 200 feet thick.

s. Mr. Tibbetts asked about the efficiency of the aquifers in filtering chemicals. Mr. Bolton said in an unconfined area, the groundwater can be discharging to streams and not going into the deeper groundwater. He stated there are many transformations that can happen with organic chemicals in the sub-surface which is a function of the microbiology and the content of the aquifer. He said depending on the organisms in the aquifer they might be digesting the organic chemicals, and the aquifer materials themselves can have reactions with the organic chemicals. Mr. Fluck stated a consideration is that the groundwater system is dynamic and with that comes various physical processes which result in dissipation or dilution of chemicals, in addition to the microbial activities that may degrade the chemicals. Mr. Fluck said Fort Meade has seen breakdown components in some wells where tetrachloroethylene (PCE) has been detected which may be an indication there may be microbial activity. Mr. Fluck said because the distance between known groundwater plumes and the Crofton wells is significant and more importantly the aquifer with the contamination is separated by the Arundel clay layer which essentially acts as a clay wall.

t. Mr. Tibbetts asked about the interplay between surface water and groundwater. Mr. Bolton said in unconfined aquifers surface water and groundwater can be closely tied together. He said in an unconfined aquifer groundwater can flow into streams. Mr. Bolton said pumping an aquifer can induce some water from a nearby stream to be pulled into the groundwater, thus reducing the level of the water in the stream. Mr. Tibbetts asked about the chances of contamination moving into the surface water from contaminated Fort Meade groundwater. Mr. Fluck stated the contamination is at a depth of 200 or more feet below ground surface, so it is far below opportunities for discharge to streams.

u. Mr. Bolton advised his agency has developed an aquifer information system, and he showed several graphics from the system. Mr. Bolton pointed out confined and unconfined aquifers and monitoring well locations. Mr. Fluck stated the Mid-Patapsco aquifer is in the

immediate vicinity of Fort Meade and the Patuxent Research Refuge, and Fort Meade has maps showing structural contours in that vicinity. Mr. Fluck said the maps show evidence where the Mid-Patapsco is located, and along with data from the many monitoring wells, demonstrates the possibility that a leaky aquifer is very unlikely.

v. Mr. Tibbetts asked the possibility of vapor intrusion from contaminants in the groundwater if there should be a hole in the clay layer. He also asked how Fort Meade prevents drilling from creating vapor intrusion. Mr. Fluck responded that wells are installed using protective measures to prevent groundwater moving from one aquifer to another. Mr. Fluck said Fort Meade is currently looking at the potential for vapor intrusion in several areas, and an update will be given in the next presentation.

w. Mr. Bolton mentioned some recent work including a report published by the US Geological Survey on groundwater flow modeling related to the BRAC development and a report by the Maryland Geologic Survey on monitoring wells in the Patuxent aquifer.

x. Mr. Bolton provided his contact information as well as contact information for his colleague at the US Geological Survey. Mr. Bolton said his email address is [dbolton@dnr.state.md.us](mailto:dbolton@dnr.state.md.us). Mr. Bolton said information is also available through the US Geological Survey web site ([www.usgs.gov](http://www.usgs.gov)).

#### 8. Operable Unit No. 4/Sub-Slab Gas and Indoor Air Sampling:

a. Mr. Fluck introduced Mr. John Cherry of ARCADIS.

b. Mr. Cherry stated he would provide an overview of the vapor intrusion investigation and a summary of the vapor intrusion activities performed at Operable Unit 4 over the past year.

c. Mr. Cherry explained vapors can come off chemicals in the groundwater and vaporize in the air. He gave an example of smelling cleaning solvents in a dry cleaning business. He continued explaining that when there is groundwater contamination in a formation near the water table in the vadose zone there can be volatilization into the airspace of buildings through sump pumps or cracks in the slab. Mr. Cherry said vapor intrusion of chemicals from the groundwater is similar to the radon issues experienced in many parts of the country. Mr. Cherry said it is important during a vapor intrusion investigation to check for any background sources as the use of chemicals in homes or buildings can be a source of vapors.

d. Mr. Cherry showed a picture of the SUMMA canister used to collect the air samples over a 24-hour period. Mr. Cherry said the samples are being collected from on-post locations only because the contamination is shallower and at higher concentrations than off-post.

e. Mr. Cherry discussed a flow chart showing the investigation process. He said the initial step is to look at buildings and determine whether they meet the criteria for vapor intrusion investigation. He said the factors considered are proximity (100 feet vertically or laterally) to groundwater contamination, whether there is a basement, or whether the building is on a slab.

He stated the next step would be to conduct sub-slab sampling; and if the levels exceed the criteria, indoor air sampling is conducted.

f. Mr. Cherry said 44 samples have been collected from buildings at Operable Unit 4. He said five buildings had elevated levels, and indoor air sampling was performed. He said if concentrations were found above the criteria for the indoor air sampling, interim actions can be taken such as installing a ventilation system. He said the main purpose of the data is to incorporate it into the full remedial investigation/feasibility study which determines the nature and extent of contamination and the next steps.

g. Mr. Cherry displayed a map of the Operable Unit 4 study area and pointed out the location of the shallow groundwater contamination and the location of the known former source areas. Mr. Cherry reiterated that because the concentrations off-post are much lower and in an aquifer under a clay layer there is not the potential for a vapor intrusion issue off-post.

h. Mr. Cherry showed a map of the buildings in the area and noted the color coding indicates which buildings are elevated and have a crawl space and, thus, do not require sub-slab sampling (blue) and which building do require sub-slab sampling (red). He pointed out that the green circles indicate where sub-slab sampling has been conducted or will be conducted soon. Mr. Cherry stated the Architect of the Capitol building is within the zone being studied, and to avoid building disruptions, sub-slab sampling will not be conducted; however, indoor air sampling will be conducted within the next two weeks.

i. Mr. Cherry showed another map which depicted where the sub-slab gas sampling has been conducted and where there have been either no exceedances or where exceedances have triggered indoor air sampling. He noted some buildings still need to be tested based on requests from the US Environmental Protection Agency and Maryland Department of the Environment.

j. Mr. Cherry showed a map of the buildings where indoor air sampling has occurred. He stated no indoor air concentrations have been detected above risk-based action levels to date.

k. Mr. Cherry reviewed the schedule for the work and said work plans should be finalized in March, with the final round of sampling to be conducted in the summer. He stated all the results will be part of the Remedial Investigation/Feasibility Study Report for Operable Unit 4.

l. Mr. Berkoff asked if building occupants were notified of the sampling results. Mr. Mick Butler responded that every building has a facility manager who is met and briefed before the sampling is conducted. He advised they also have access to the Fort Meade EMS web site so they can be kept informed.

9. Manor View Site/Non-Time Critical Removal Action Update:

a. Mr. Fluck introduced Mr. Tom Crone of ARCADIS to provide an update on the removal action at the Manor View Dump Site.

- b. Mr. Crone said he would be providing an update since mobilizing on February 13.
- c. Mr. Crone showed an aerial photograph of the site and pointed out the area which contains waste that is generating methane. He noted this area is the focus of the removal action.
- d. Mr. Crone reviewed the three major phases of the work, noting he had described them in detail at the previous Board meeting. He explained the first phase, site control, includes mobilizing to the site, setting up and installing security measures, establishing a perimeter, and collecting samples to characterize the waste. Mr. Crone said the site control work should be completed by the following week, and the second phase, excavation, is scheduled to begin the week of March 19. He noted the schedule calls for Thursday, March 22, to be the first day they will scrape off overburden soils (four to eight feet thick soils on top of the waste) and on Friday, March 23, trucks will begin to haul waste to the off-Post landfill for proper disposal. Mr. Crone noted the site control phase is anticipated to take five weeks instead of the planned four weeks due to some rain and wind conditions which slowed the work.
- e. Mr. Crone discussed the waste characterization sampling. He said 16 samples were collected from the solid orange block shown on the aerial photograph which equals about one sample for every 500 cubic yards. He said the results from the sampling showed all the waste was characterized as non-hazardous waste, and the State of Virginia has approved the Army sending the waste to the King George Landfill. Mr. Rusty Bristow asked how the waste would be transported, and Mr. Crone advised dump trucks would take the waste to the landfill. Mr. Tibbetts asked why the King George Landfill was selected. Mr. Crone responded that the waste disposal was subcontracted to Waste Management, and they proposed the location as the most efficient and the closest to the site.

10. Update on the Manor View Site Recovery System:

- a. Mr. Crone stated the methane readings over the past two months continue to show decreased levels of methane. He advised the readings over the past month overall have been lower than historical detections; he stated part of the explanation may be a relatively dry winter as water feeds the reaction. Mr. Crone displayed and reviewed the last four weeks of data, noting only monitoring location 23 had an exceedance of the lower explosive limit. He said there was an unscheduled shut down on February 6 when a piece of equipment malfunctioned. Mr. Crone advised the system was shut down for several days while a new piece of equipment was obtained; however, the new equipment is performing better than the piece it replaced.

11. Update on the Odenton Groundwater Contamination Interim Measures Project:

- a. Mr. Fluck introduced Ms. Shelly Morris of ARCADIS/Malcolm Pirnie.
- b. Ms. Morris showed a map of the study area which is now focused on the Nevada Avenue area. She showed a summary of the sampling conducted over the past 12 months. She reviewed the next steps in the project and noted the legal right-of-way agreements are in

progress. She said several wells have been repaired recently, and new security equipment put in place to ensure the wells are water-tight.

12. Open Discussion/New Business:

a. Mr. Berkoff mentioned he had recently attended a community meeting regarding a water appropriation permit. He said the site is fairly close to Fort Meade and involves an average of 39,000 gallons per day with a maximum withdrawal of several times that amount. He said several of those in attendance asked about any potential impact on Fort Meade and contaminated groundwater at Fort Meade. He asked if Fort Meade was aware of the proposal and the 30-day comment period. Mr. Butler said he was not aware of the proposed action but will follow-up and obtain additional information.

b. Mr. Fluck asked for topics for the next meeting. Mr. Tibbetts proposed a training session on how the Board's community members can appropriately reach out to the community beyond their immediate groups and communicate on a regular basis and not just when there is a significant action. He stated it would be helpful to build a database to track old information so it does not have to be constantly repeated and for the public to be able to find answers. Mr. Madera stated he communicates with the Howard County Chamber of Commerce and other groups that he belongs to and lets them know he is part of the Restoration Advisory Board; he looks at the community members on the Board as representing the community. Mr. Madera added that the public interest may be low until there is a major event and interest will very suddenly increase; he said it is important to be prepared for such an incident and for the Board's community members to learn as much as possible in advance. Mr. Fred Tubman stated he does not think it is possible to give people too much information and strongly believes the more engagement the better. Mr. Butler stated he believes the program is as transparent as it can be, and data is shared when it is collected. He noted the post newspaper has searchable archives online, and he encourages new staff members to use them as a resource to learn the background on key environmental issues. He said the Army mailed 2,500 letters to residents of Odenton about off-post groundwater contamination and then held meetings where about 60 people attended; he said the people who are concerned and interested are engaging with Fort Meade. Mr. Fluck suggested the Board continue to have a dialogue and figure out the best way to address the issue. Mr. Fluck said there is an initiative underway to get more information about the cleanup program to the Fort Meade community, including articles in the post newspaper. He said the post newspaper, Soundoff!, can be accessed at [www.ftmeadesoundoff.com](http://www.ftmeadesoundoff.com) and is also available at shopping centers off-post. Mr. John Burchette added by law there are points in the cleanup process where a public comment period is required; he said at those times public notices are placed in local newspapers and public comment solicited.

IMND-MEA-PWE

SUBJECT: Minutes for the March 15<sup>th</sup>, 2012 RAB Meeting

- c. The meeting was adjourned at 9:24 p.m.



for

MICHAEL P. BUTLER  
Chief, Environmental Division

CF:  
RAB MEMBERS  
FGGM GARRISON COMMANDER  
PUBLIC AFFAIRS OFFICE