

**Guaranteed/ Fixed Price Remediation Contract Lessons Learned
Final Report**

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For
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Overview of Guaranteed /Fixed Price Remediation (G/FPR) Contracts

The U. S. Army Base Realignment and Closure Office (BRACO) has identified numerous installations for closure and realignment. Under the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA), environmental liability resides with the Service Component that owns and occupies the installation. As such, the Department of Defense (DoD) must provide indemnification in perpetuity. To manage this potential liability, DoD historically has made a significant financial investment to reduce or eliminate environmental risks and obtain regulatory closure. The timeframe for this process is typically several years. During this time, the installation's physical assets and the socioeconomic redevelopment potential are often sequestered and unavailable; thereby, increasing the total life-cycle cost of the closure activity.

The G/FPR approach is a methodology that expedites the BRAC process and realizes a reduced closure timeframe and overall cost savings, while achieving protection from future environmental liabilities. The G/FPR approach does not eliminate DoD's environmental liability entirely. Instead, it offers a significant buffer to the DOD and subsequent end users because third party endorsements are provided for known constituents and unknown contaminants. The work to be conducted may be in the nature of studies, removal action, remedial design, remedial action, and long term monitoring establishment of institutional controls, or a combination thereof, and support in defending toxic tort liabilities. The G/FPR names DoD as an additional insured and extends this protection to third parties. In this way redevelopment can proceed sooner and in conjunction with an immediate clean up effort.

The Army Forces Command (FORSCOM) initiated and awarded four G/FPR contracts in FY'01 and began work on a fifth installation for award in FY'02¹:

- Fort Devens, MA: Contract Awarded - Area of Concern 50
- Hingham Annex, MA: Contract Awarded - Installation wide
- Lompoc Disciplinary Barracks, CA: Contract Awarded – Installation wide
- Fort Sheridan, IL: Contract Awarded – Installation wide through Decision Document; Remedy implementation for selected sites
- Ft. Pickett, VA: Scheduled for procurement and contract award in second quarter FY'02
- Ft Devens, MA: Sheppley's Hill Landfill Groundwater, scheduled for procurement and contract award in third quarter FY 02.

¹ This report does not address the two G/FPR pilot projects conducted at Rio Vista, CA, and Camp Pedricktown, N.J.

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Lessons Learned and Observations

The process used to develop the statement of work and award the G/FPR contracts was slightly different for each installation, as was the breadth of environmental considerations. However, several observations are common to all installations. In order to improve the scoping and contracting process for future G/FPR contracts, BRACO compiled some of the key lessons learned from these recent G/FPR contracting efforts. The lessons learned are organized into five categories that follow the G/FPR process: Early Considerations, Scoping the Statement of Work (SOW) , developing the IGCE, the Procurement Process, and Contract Negotiation and Award. In addition, descriptions of each G/FPR and site-specific lessons learned are included.

Early Considerations

- The development of a G/FPR SOW is easier for all parties when the Base Environmental Coordinator (BEC) at the BRAC installation where G/FPR tasks will be conducted, is supportive of the G/FPR contracting mechanism and is actively involved.

- It is necessary to carefully “package” the G/FPR process to the regulators, particularly in terms of the cost savings aspect. Focus needs to be on having a consistent contractor to complete all activities and a fixed schedule. The emphasis on cost alienates regulators and may not be borne out since bids are typically based on the worst-case scenario. It is necessary to determine the extent it will be beneficial to request comments and feedback from regulatory agencies on all the draft versions of the G/FPR SOW. The innovative nature of many G/FPR SOWs may cause confusion and some suspicion amongst regulators. (However, if a Principles of Environmental Restoration (PER) workshop has been used to develop the SOW, then, in general, the regulators will be participating from the initial drafts of the SOW and their input on the draft SOW will be taken into consideration.)

- Groundwater remediation tasks are inherently different than the more typical “dig and haul” or soil-based remediation tasks which have discrete end points and can typically be completed in under 6 years. The differences are as follows: 1) groundwater remediation goals are often difficult to achieve during 6 years (typically, the upper limit of an environmental remediation contract); 2) in some cases, the remediation goals are uncertain until a ROD is signed; and 3) achievement of goals is very dependent on the technology and remedy selected.

- Candidate bidders can have prior work experience at the site. However, those elements of their work that impinge upon the scope have to be complete prior to release of the SOW, or there is an inherent conflict of interest. For example, at Ft. Sheridan, the design of Landfill 6&7 cap was at the 60% level during development of the SOW. The intent was to have the contractor complete the design once the contract was awarded and then turn the implementation to the

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G/FPR contractor. There may have been better continuity in implementation had the design been complete; in which case, Parsons could have been eligible for the competition. As it was, with the design incomplete, Parsons had too much knowledge that could not be imparted to other bidders, thus giving them an unfair advantage and necessitating their exclusion from the competition.

Scoping the SOW

- Professionally facilitated SOW development, such as a PER workshop, aided the Army in identifying and developing strategies to address many of the hurdles precluding regulatory closure. The PER approach was implemented at Lompoc, Ft. Sheridan, and Ft. Pickett.
- Uncertainty will drive costs. Therefore, during scope development, the Army team may want to evaluate options or activities that would narrow the range of significant uncertainties. For example, at Lompoc, the project team identified areas of uncertainty that could be resolved at two of the three operable units prior to the procurement, thereby, reducing the scope of work for the G/FPR. The work plan for investigations aimed at reducing uncertainty in the procurement should be a consensus product from the scoping workgroup (possibly a product of PER).
- When uncertainty spans too big breadth of scope, trying to lay the cost liability off on the contractor does not work. It is then necessary to either make the decision as to the path forward. If the costs associated with pending alternative remedies are too disparate, yet have strong arguments that suggest they cannot be ruled out, then the project is either not a good G/FPR candidate, or the decision needs to be resolved during the scoping process. This issue was encountered at Ft. Sheridan where the Record of Decision had not yet been signed for a landfill. There were strong arguments for two alternatives, capping or excavation. Because of the large cost differential between the two remedies, it was difficult for prospective bidders to prepare reasonable cost estimates. In this case, the Army had to re-bid the SOW, and in so doing made the decision to have bidders develop the estimate based on capping the landfill. The Army took the risk of the remedy requiring excavation, rather than having the risk borne by the contractors (which had substantially driven up the cost in the first bid).
- The potential for change out of project team members during the implementation process emphasizes the need to document consensus on scope prior to the procurement process. At Lompoc, output from the PER was used to justify withdrawal of scope additions made by a new state regulator upon her assuming responsibility for the site. Had there been a way to obtain more formal sign off on the output, it may have been even easier to avoid scope creep.
- During scope development, it is critical to identify and reach agreement on all of the outstanding issues, including conducting a records/file search to make sure that all previously identified areas of concern have been addressed all final

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paperwork is in place for tank closures/pulls, and other activities completed in the past that were never officially “closed out.”

- During the initial development stages of the SOW, it is critical to determine and agree upon the actual period of performance for the G/FPR contract. In determining the period of performance, the following factors must be taken into consideration:
 - Headquarters Department of the Army BRACO fiscal year limitations (e.g., length of time BRACO funds can sit unexecuted);
 - Length of time needed by the contractor to realistically accomplish certain goals; and
 - Key deadlines in the state or federal regulations guiding remediation efforts.
- Since most bidders/contractors often request that milestones be modified after award, it may not be necessary to spend the time to develop a very specific milestone table to be attached to the SOW.. Rather, it may be more appropriate to identify those activities that will qualify for payment milestones, and then ask the contractors/bidders to develop the milestone schedule.

Developing the Independent Government Cost Estimate (IGCE)

- There is a need to split the cost estimating effort from development of the statement of work, i.e., the IGCE should not be developed by the same group/persons responsible for developing the scope of work. Splitting these two efforts ensures a truly independent IGCE and serves as a final QA/QC step in development of the SOW. If there are questions/inconsistencies or possible misinterpretation, then they are likely to be reflected in the cost estimate (i.e., costs are much higher/lower than expected), providing an opportunity to catch potential issues before the SOW is released for bid, and, thereby, reducing the number of questions/clarifications necessary during the procurement process.
- Once the IGCE is developed, a full explanation of difference between the Cost to Complete projections and the IGCE is needed. This explanation needs to be complete early in the process and is particularly important when the IGCE and the CTC numbers are significantly different. While both numbers may have a justifiable basis, assumptions and the path forward identified for the G/FPR contract may be different than assumed in the CTC numbers and need to be provided to the BRAC Office to justify the request for additional funds. This analysis is similar to the Business Case Analysis performed in the ESCA process.

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The Procurement Process

- Conduct a thorough briefing with bidders. A new approach was attempted in development of the G/FPR for Ft. Pickett. All prospective bidders were invited to attend the PER workshop. The purpose was to give them an opportunity to hear discussions regarding uncertainties, to see the interaction between the BEC and the regulators, and to view the site. Bidders supported this process. However, bidders indicated that in the future they would send fewer participants in order to keep the cost down. In order to reduce cost, the Army needs to plan ahead and identify the potential bidders so that they can listen in during the technical discussions that lead to scope development.
- Effectively manage communication. During the procurement process, the need to level the playing field in terms of communication between site personnel, bidders, and regulators became apparent.. While contractors are encouraged to find out as much as possible about the site during the bidding process, it is critical that the competition remain fair, and that all questions and answers be provided to all bidders. At Lompoc, inquiries were handled through a website in which all questions and responses were distributed to all bidders. At other sites, inquiries and responses were handled by establishing a single point of contact for questions, and distributing answers via e-mail to all bidders.

Contract Negotiation and Award

- The Army needs to develop a negotiation strategy that will be followed during meetings and negotiation with the bidders. This strategy needs to be developed before bids are received and certainly before meetings are held with the bidders. This strategy should include recognition of uncertainties in the statement of work, so that wide swings in bids or discrepancies between the bids and the IGCE can be better accounted for. In addition, the Army also needs to identify a “walk away” point at which the Army chooses not to award the contract. Prior to negotiation, the Army needs a clear understanding of the upper limit it is willing to pay to the G/FPR contractor.
- It is evident that some bidders/contractors feel much more comfortable than others working in the G/FPR contracting environment and therefore are more adept at winning G/FPR contracts. These bidders/contractors may also have secured more favorable insurance coverage than others. Once again, bidders that are willing to take on more risk at a lower cost are more likely to win G/FPR contracts. One unfortunate result of this approach/ strategy is that fewer bidders/contractors may submit proposals for future G/FPR contracts because they have a poor track record of winning G/FPR contracts, and corporate philosophies prevent them from taking on more risk than usual.
- Contract payments are tied to milestone achievement in the SOW. That tying can defer payment for cost cap insurance principles that create a cost of money burden

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on the contractor. This situation can be resolved by authorizing payment of policy premiums upon award of contract, as was determined in the negotiations on the Lompoc G/FPR.

- It is very likely that some bidders/contractors may in fact be using much higher contingencies than typically used under non-G/FPR contracts or inflating their estimates in order to account for the uncertainty of tasks and also to minimize the chance of having to tap into insurance coverage funds. Therefore, future IGCEs should be adjusted upwards to account for this fact. For example, the method used to develop the cost estimate described by one successful bidder was to develop cost estimates for a suite of scenarios and then to select the cost based on the 75% - 90% cost estimate.
- Monetary incentives should be used when it is beneficial to the Army to achieve regulatory closure on a particular site in an expedited manner and therefore reduce out-year LTM and O&M costs. Expedited achievement of regulatory closure or even achievement of particular administrative goals may be appropriate when extensions have been granted by regulatory agencies to the Army or there are highly restrictive Federal Facility Agreements in place. Incentive awards were included for the AOC-50 at Ft. Devens.
- Monetary incentives may not always elicit the response expected from the bidders/contractors. Factors that may affect whether a bidder/contractor will formulate a strategy to reach an incentivized goal, include the following:
 - Overall corporate philosophy (e.g., how risk averse or aggressive is a particular bidder/contractor?)
 - How does a bidder/contractor typically deal with regulatory agencies (e.g., are they conciliatory or capable of pushing their agenda?)
 - Can a bidder/contractor realistically reach some of the incentivized goals during the period of performance of the SOW?

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Area of Contamination 50, Ft. Devens

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Background

Starting in December of 2000, FORSCOM BRACO began development of a Statement of Work (SOW) for the technically challenging groundwater remediation tasks at Area of Contamination 50 (AOC 50) found in the former Fort Devens. After a thorough analysis of specific groundwater contamination problems and lengthy discussions regarding the correct scope for the SOW, FORSCOM BRACO finalized the SOW on 28 June 2001. Soon after, the SOW was released to three different environmental contractors for bids. After the FORSCOM BRACO granted a 2-week extension on the proposal submission deadline, 3 proposals from 3 different environmental contractors were received. The three bidders/contractors that submitted proposals were:

1. MACTEC – Harding ESE
2. Parsons Engineering Science
3. ARCADIS – Geraghty & Miller

FORSCOM BRACO assembled a proposal review team in early September to review the 3 proposals. The team consisted of the following people: 1) an environmental scientist and contractor who developed both the AOC 50 SOW and the corresponding IGCE; 2) a chemist on contract with the FORSCOM BRACO; and 3) an engineer on contract with FORSCOM HQ.

After a thorough review of the proposals and ensuing discussions with all bidders/contractors, FORSCOM BRACO awarded the environmental remediation contract for AOC 50 to ARCADIS – Geraghty and Miller because of technical competency and the potential for significantly reducing out-year, longterm monitoring and operation and maintenance costs for the Army.

Unique Challenges/Features of AOC 50 G/FPR

- ✓ A unique element of the SOW for AOC 50 is that it contained monetary incentives for achievement of particular administrative and remediation performance objectives in an expedited manner.

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Hingham Annex

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Background

Starting in July 2000, FORSCOM BRACO began development of a Statement of Work (SOW) to perform the necessary environmental restoration work and achieve regulatory closure of the Hingham Annex Site. After a thorough analysis of specific contamination problems and lengthy discussions regarding the correct scope for the SOW, the SOW was finalized on 15 December 2001. Soon after, FORSCOM BRACO released the SOW to three different environmental contractors for bids. The contractors that received the SOW were:

1. Camp Dresser & McKee - FPC
2. Parsons Engineering Science
3. ARCADIS – Geraghty & Miller

After all contractors completed a site visit in February 2001 and reviewed the SOW, only Parsons Engineering Science submitted a proposal to implement the SOW. Following an initial review of the Parsons proposal, FORSCOM BRACO assembled a team in May 2001 to complete a detailed technical review of the proposal and negotiate the contract amount. The team consisted of FORSCOM personnel and contractor involved in the development of both the Hingham Annex SOW and the corresponding Independent Government Cost Estimate (IGCE).

After a thorough review of the proposal and ensuing discussions with the bidder, the Army Atlanta Contracting Center awarded the environmental remediation contract for the Hingham Annex site to Parsons Engineering Science because of technical competency and the potential for significantly reducing the period required to achieve regulatory closure of the Hingham Annex Site. The contract was awarded on July 2, 2001.

Unique Challenges/Features of Hingham Annex G/FPR

- ✓ A unique element of the Hingham Annex SOW was that the site characterization activities had not been completed, and, as a result, a remedial action work plan was not available to identify the scope of future actions to achieve regulatory closure. To account for the uncertainty in the scope of future actions at the site, FORSCOM and the Massachusetts Department of Environmental Protection (MADEP) developed a series of decision criteria to aid in the interpretation of future investigation data and guide the course of future actions at the site. The decision criteria were provided to each potential bidder as an attachment to the SOW. By minimizing regulatory and decision-making uncertainty, these decision criteria assisted in the proposal development and cost estimate greatly. .
- ✓ Although the remediation activities at the site were being undertaken pursuant to the Massachusetts Contingency Plan (MCP), the SOW required that all

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requirements of both CERCLA/ National Contingency Plan (NCP) and the MCP be achieved and that necessary regulatory approvals are received from all relevant local, state, and federal agencies.

- ✓ Due to the small contract value (relative to other FORSCOM G/FPR contracts), FORSCOM did not receive proposals from each contractor that received the SOW. As noted above, FORSCOM BRACO completed a detailed review of the proposal and negotiated the award amount to ensure that the contract value was consistent with the IGCE.

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Lompoc Disciplinary Barracks, Lompoc, California Guaranteed/ Fixed Price Remediation Contract Lessons Learned

Background

The goal of the Army is to transfer the Lompoc Branch Disciplinary Barracks to the Department of Justice for use by the Bureau of Prisons. While the Army has determined that the property is suitable for transfer in a manner which is consistent with the current and projected future use of the property and facilities, environmental issues have preoccupied the base closure team for a number of years leading to frustration and delays in planned construction programs. Consequently, the Army chose to expedite the BRAC process by “packaging” the activities under a Guaranteed Fixed Price Remediation (G/FPR) contract. As such, it was critical that the Army have a clear understanding of the scope of work remaining and potential costs of completing that work, prior to developing the Statement of Work (SOW).

Scoping the G/FPR Statement of Work

BRACO conducted a PER workshop in July 2000 to facilitate development of the scope of work remaining on three areas at the site. Through facilitated discussions, the Lompoc project management team:

- Identified and reached consensus on all remaining problem statements.
- Identified a hierarchy of likely response actions.
- Identified and evaluated the remaining uncertainties to determine their likely impact on prospective bidders’ ability to develop a cost estimate and perform the work under a fixed price remediation contract.
- Developed a range of estimated costs to complete the required activities.

During the PER, the project management team (PMT) established a clear path forward/decision diagram for addressing each of the areas at the site. While developing the path forward, the PMT identified a set of uncertainties that were keeping them from being able to make decisions on the likely remediation strategy for each of the three sites. For each significant uncertainty, the team developed a scope and schedule for obtaining the data and determined the path forward once data were analyzed. The latter included the identity of key decisions yet to be made and the alternative that would be pursued for each possible outcome of the decision. The uncertainty reduction accomplished through the data collection effort and the identification of limited requirements to reach closure as articulated in this exit strategy reduced the risk perceived by prospective bidders.

The final SOW (completed in May 2001) included all remaining environmental issues arising from releases and/or regulatory requirements at the installation. Restoration of these sites and achieving regulatory closure of identified issues and concerns were the primary objectives of the proposed work. The SOW included the following:

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- The farm fuel area where a plume of chlorinated solvents was identified in the ground water
- The washrack area where a second chlorinated solvent plume was observed
- The wood dump site where there are solid waste related concerns
- Six previously removed or closed in place underground storage tanks (USTs) where soil testing, remediation (if necessary), and submittal of closure documentation was required
- Additional parcels for which No Further Action (NFA) letters had been received from the regulatory community that need to be included in the final Decision Document (DD)/Remedial Action Plan (RAP)
- Three former USTs at the Farm Fuel Area that were closed and sampled with all documentation sent to the appropriate regulatory authorities. The cognizant agencies have chosen to defer final approval of those closures until such time as the entire site is completed. Therefore, those UST closures will be incorporated in the final decision document as well
- An additional surface scarring area that has not been adequately characterized to date

The Bidding Process

FORSCOM invited the following three contractors to submit bids on the SOW:

4. MACTEC – Harding ESE
5. Parsons Engineering Science
6. ARCADIS – Geraghty & Miller

All contractors participated in a site tour and introduction to the G/FPR process conducted at Lompoc the week of June 4, 2001. Contractors were encouraged to contact regulators to discuss the site and were provided access to all available data via a website. In that timeframe, a new state regulator was assigned to the site, and some institutional memory was lost. This raised questions about the need to add scope to the washrack site. In addition, during subsequent conversations with the Santa Barbara County, the Regional Water Quality Control Board, and EPA, the contractors became concerned that it would not be possible to achieve regulatory closure for the wood dump site as defined in the SOW. The contractors were concerned because there was uncertainty that the monitoring wells at the wood dump site would be required to remain in place for future monitoring for a potential ground water problem. FORSCOM reviewed the SOW and sent a modification that allowed the contractor to achieve closure (and receive final payment) even if the wells remained in place. As a result of this uncertainty, however, Parsons decided not to submit a bid.

FORSCOM BRACO assembled a proposal review team in early September to review the 2 proposals. The review team consisted of the following people: 1) A contractor engineer who developed the IGCE; 2) the contractor BEC for Lompoc; and 3) an engineer on contract with FORSCOM HQ. Both bids were substantially higher than the IGCE. Therefore, both contractors were allowed to revise their bids and resubmit.

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After a thorough review of the proposals and ensuing discussions and negotiation with all bidders/contractors, FORSCOM BRACO awarded the environmental remediation contract for Lompoc to ARCADIS – Geraghty and Miller in September 2001.

Lessons Learned Specific to Lompoc Disciplinary Barracks

- ✓ The uncertainty raised by regulators to the individual bidders after the SOW was released made it apparent that the bidders would benefit from participating in the PER discussions and hearing first hand any concerns expressed by the regulators. Their participation would avoid the independent discussions held between regulators and individual contractors, which ultimately lead to confusion and one contractor pulling out of the bid.
- ✓ The potential for change of project team members during the implementation process emphasizes the need to document consensus on scope prior to the procurement process. At Lompoc, output from the PER was used to justify withdrawal of scope additions made by a new state regulator upon her assuming responsibility for the site. A recommendation is to include the final PER “package” in the site Administrative Record.
- ✓ Contract payments are tied to milestone achievement in the SOW. That can defer payment for cost cap insurance principles that create a cost of money burden on the contractor. This situation can be resolved by authorizing payment of policy premiums upon award of contract.
- ✓ During the procurement process, it became apparent there was a need to level the playing field in terms of communication between site personnel, bidders, and regulators. While contractors are encouraged to find out as much as possible about the sites during the bidding process, it is critical that the competition remain fair, and that all questions and answers be provided to all bidders. At Lompoc, inquiries and responses were handled through a website where all questions and answers were distributed to all bidders. At other sites, FORSCOM/BRAC disseminated information by establishing a single point of contact for questions and having answers distributed via e-mail to all bidders.
- ✓ It is estimated that identification and conduct of limited investigations (on the order of \$100,000), prior to completion of the SOW to reduce key uncertainties, saved over \$1 million that would have been added to the bid. A sensitivity analysis of key uncertainties can identify such “leverage points” of potentially substantial savings to the government. In order to accommodate this approach, some schedule flexibility is required along with discretionary funds.
- ✓ When developing a G/FPR for closure of an entire site, it would be worth the effort to review the Environmental Baseline Survey prior to producing the SOW to ensure that all aspects of the site have been addressed, including having proper

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documentation for tank closure, etc. Significant costs were added to the original IGCE because the BEC kept finding “issues” that needed to be included in the SOW (e.g., a scarring area that had not been addressed).

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Ft. Sheridan, Illinois

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Background

The objective of the G/FPR approach was to perform all necessary environmental restoration work and achieve regulatory closure of Ft. Sheridan. Remediation at the Site is being undertaken pursuant to CERCLA/ NCP requirements. The overall facility comprises 712 acres, including surplus property (406 acres), property owned by the Navy (206 acres), and property owned by the Army Reserve (100 acres). (The portions of Ft. Sheridan not owned by the Army Reserve were identified for closure in the 1988 Base Realignment and Closure (BRAC) round.) The Navy assumed ownership of 206 acres in 1994. The remaining property was transferred to the communities in 1997 and is now undergoing development as a residential area.

Scoping the G/FPR Statement of Work

In May 2001, BRACO conducted a PER Workshop to facilitate development of the SOW. Discussions focused on identifying all activities necessary to achieve regulatory closure at the installation. Based on these discussions and results of the Remedial Investigation/Baseline Risk Assessment, remedial action activities were included for eight study areas:

1. Landfill 1. The contractor is responsible for preparation of the Proposed Plan and Decision Document.
2. Landfill 5. The contractor is responsible for preparation of the Proposed Plan and Decision Document, and design and implementation of the remedy.
3. Landfill 6/Vehical Equipment Storage Area 8. The contractor is responsible for preparation of the Proposed Plan and Decision Document, and design and implementation of the remedy.
4. Landfills 6&7. The contractor is responsible for installing cap (design prepared by existing contractor), preparation of the Proposed Plan and final decision document, and design and implementation of the remedy, development and implementation of land use control plan, and operation and maintenance of control systems through the first five-year review.
5. Coal Storage Area #3. The contractor is responsible for preparation of the Proposed Plan and Decision Document, and design and implementation of the remedy.
6. Coal Storage Area #4. The contractor is responsible for preparation of the Proposed Plan and Decision Document, and design and implementation of the remedy.
7. Water Tower Soil. The contractor is responsible for preparation of the Proposed Plan and Decision Document, and design and implementation of the remedy.
8. Building 70 Pesticide Storage. The contractor is responsible for preparation of the Proposed Plan and Decision Document.

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There are additional activities that will be required to be addressed as part of the G/FPR contract:

1. Underground Storage Tanks - Installation-wide: The contractor is responsible for an average of one tank removal per year of contract.
2. Unused Wells – Installation-wide: The contractor is responsible for well abandonment of 43 wells.
3. No Response Action sites: The contractor is responsible for including these sites in final decision documentation.
4. Landfill 2: The contractor is responsible for developing surveillance and monitoring plan, land use control plan, and implementing first five-year review.
5. Water Tower Lead Based Paint Removal: The contractor is responsible for removal of lead based paint from water tower surface and repainting.

The Statement of Work (SOW) and Independent Government Cost Estimate were finalized in July 2001.

Bidding the SOW

FORSCOM invited the following three contractors to submit bids on the SOW:

1. Camp Dresser & McKee - FPC
2. SAIC
3. Kemron Environmental Services

Of the three companies, only Kemrom submitted a bid. However, the bid was non-responsive because it included two prices in an attempt to bind the uncertainties associated with the SOW. The challenge posed for the contractors was the uncertainty associated with Landfill 5. Although the Army believed the remedy would be to cap the site because the proposed plan and decision documents had not been signed, there was still significant uncertainty from the perspective of both the bidders and the insurers as to the remedy. If capping was selected, then there were several options for design of the required cap. Additional uncertainty existed with respect to installation of the caps and Landfills 6 and 7 that were being designed by the existing contractor. The landfill 6 and 7 cap installation was the activity with the single largest cost in the bid, and at the time of the SOW release, was only at 60% design.

Army Forces Command (FORSCOM) requested that the bid be revised and resubmitted. In addition, BRACO/FORSCOM agreed that the Army would bear the risk associated with the potential that Landfill 5 would be excavated. Once this determination was made, Kemrom resubmitted the bid, and BRACO/FORSCOM awarded the contract in September 2001.

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Lessons Learned Specific to Ft. Sheridan

- ✓ When uncertainty spans too great a breadth, laying the cost liability off on the contractor does not work. It then becomes necessary for FORSCOM/BRACO to make the decision that will allow contractors to provide a reasonable bid (i.e., even if there is significant uncertainty on a remediation decision, . If the pending alternative remedies are too disparate, yet have strong arguments that suggest they cannot be ruled out, then the project is either not a good G/FPR candidate, or the decision needs to be resolved during the scoping process.

- ✓ Candidate bidders do not have to have no prior work at the site. However, those elements of their work that impinges upon the G/FPR scope have to be complete or there is an inherent conflict of interest. For example, the design of the Landfill 6&7 cap was at 60% design. The intent was to have the design complete by the time the contract was awarded and then turn the implementation to the G/FPR contractor. There may have been better continuity in implementation had the design been complete. Moreover, in that situation, the design contractor could have been eligible for competing. As it was, Parsons (the design contractor) was not allowed to compete, while SAIC, the feasibility study contractor, was asked to bid.

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Guaranteed/ Fixed Price Remediation Contract Lessons Learned

Background

The objective of the G/FPR approach is to perform the necessary environmental restoration work and achieve regulatory closure of the BRAC portions of Fort Pickett. Fort Pickett was closed on September 30, 1997, as a result of 1995 BRAC.

Approximately 42,296 of the installation's 45,160 acres are being utilized as an Army National Guard enclave with the responsibility for continuation of the training mission of Fort Pickett. A total of 2,863 acres of excess property and 88 buildings were designated by the Department of the Army as excess property on Fort Pickett. Virginia Polytechnic Institute and State University, Southern Piedmont Agricultural Research and Extension Center (SPAREC) will receive a total of 1,184.16 acres, much of which is currently under lease to the same agency. The bulk of the remaining property (1,608 acres) was transferred to the Nottoway County Local Redevelopment Authority for redevelopment purposes in February 2000. The final 71.45 acres and twelve buildings are scheduled for transfer upon completion of the necessary remediation activities.

The excess property at Fort Pickett contained 77 environmental sites identified as a result of the initial environmental baseline survey (EBS), subsequent reviews by the Base Closure Team (BCT), or interpretation of aerial photography (PI). Of the 77 sites:

- 26 were found to require no action either because there was no evidence of releases or because the residues from releases were below screening criteria.
- 13 were subject to some level of removal or response actions such that it was determined no further action was required.
- A total of 30 of the 77 sites were underground storage tank (UST) or petroleum sites that have been closed and are documented in closure letters from VDEQ.

Some activity of varying scope remains for the eight other sites, three of which will likely be included in the SOW:

1. EBS-115 – motor pool, remedial investigation ongoing
2. EBS-124 – motor pool, remedial investigation ongoing
3. EBS-13 – former salvage yard, remedial investigation underway

Activities at the three target sites will include removal actions, conduct of feasibility studies, preparation of the proposed plan, draft of the record of decision, and design and implementation of the remedy.

Developing the G/FPR Statement of Work

BRACO conducted a PER Workshop to facilitate development of the SOW. A new approach was attempted. All prospective bidders were invited to attend the PER. The

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purpose was to give them an opportunity to hear discussions regarding uncertainties, to see the interaction between the BEC and the regulators, and to see the site. FORSCOM invited representatives from the following companies to observe the PER and to submit bids when the Request for Proposals is released in early 2002:

1. MACTEC – Harding ESE
2. Parsons Engineering Science
3. ARCADIS – Geraghty & Miller
4. CH2M Hill

Although bidders supported this process, they indicated that in the future they would send fewer participants in order to keep cost down.