

**COSTS OF PREPOSITIONING
ADDITIONAL ARMY DIVISIONS IN EUROPE**

**The Congress of the United States
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PREFACE

The program providing for the storage, or prepositioning, of military equipment in Europe for U.S.-based troops that would deploy there in time of war is known as POMCUS (Prepositioned Overseas Materiel Configured to Unit Sets). Last year, the Congressional Budget Office (CBO) issued a report, Strengthening NATO: POMCUS and Other Approaches (February 1979), that examined the costs of prepositioning six division sets of equipment.

In its report on the fiscal year 1980 defense appropriations bill, the House Appropriations Committee directed the Army not to commit itself beyond the fourth division set until it had had the opportunity to review the fiscal year 1981 defense budget. This new study, requested by the Chairman of the Subcommittee on Defense of the House Appropriations Committee, reexamines the POMCUS program in light of recent Administration proposals to preposition equipment for more than six divisions by 1986. It also briefly describes risks associated with the program, as well as alternatives to it. In accordance with CBO's mandate to provide objective analysis, the study makes no recommendations.

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SUMMARY

The POMCUS (Prepositioned Overseas Materiel Configured to Unit Sets) program is a major Army initiative now under way to accelerate deployment of U.S. reinforcing divisions to Europe. In February 1979, the Congressional Budget Office (CBO) published a report on the program entitled Strengthening NATO: POMCUS and Other Approaches. At that time, POMCUS involved the prepositioning of six division sets of equipment in Europe for U.S.-based forces who would deploy there in time of war. Prepositioning speeds deployment since only the troops themselves, and a small amount of remaining equipment, would have to be moved from the continental United States. This paper updates the cost estimates contained in CBO's 1979 report in light of recent Administration proposals to preposition more than six division sets of equipment. It also briefly discusses risks associated with the POMCUS program, as well as alternatives to it.

The proposed budgetary plans of the Department of Defense (DoD) through fiscal year 1986 do not provide adequate funds to cover the full cost of the POMCUS program. CBO estimates that the added costs above those programmed would amount to at least \$4.6 billion for nine POMCUS divisions, including costs of equipment shortages, prepositioned war reserve stocks, and support:

- o Costs to meet equipment shortages for division sets 1 through 6 would be approximately \$800 million.
- o If more than six division sets were to be prepositioned, equipment shortages would be at least \$410 million per additional division set.
- o Shortages also exist in the prepositioned war reserve stocks--equipment needed to maintain wartime operations until factories can produce more materiel. CBO estimates the cost of filling the prepositioned war reserve stocks to a minimum level to be approximately \$1.85 billion.
- o In addition, a small peacetime logistics base is needed in the Northern Army Group (NORTHAG) to support the three divisions to be prepositioned in that area of Europe. CBO estimates that a skeleton logistics base would cost approximately \$770 million.

Shortages in POMCUS involve critical support items needed to sustain a combat force. For example, procurement of tactical

trucks alone, which are required for combat troop movement and resupply, would consume almost one-half of the funds needed to equip the POMCUS sets fully. Shortages also include combat-essential items such as tactical communications equipment and fuel resupply systems.

Equipment shortages likewise exist in other Army programs not examined in this paper. Thus, the additional funds discussed here would not eliminate all Army equipment shortages. By the same token, unless the Congress designated POMCUS as the recipient of the funds, the additional funding discussed above might be used by the Army to alleviate other equipment shortages to which it assigns higher priority.

Equipment shortages in POMCUS sets may hamper the Army's ability to reinforce NATO rapidly. If POMCUS equipment is lacking, the early deploying divisions would either have to airlift their equipment with them or fight without some equipment until it could be transported by sea. Thus, if the Congress wishes to implement the full POMCUS program, it will have to provide funds for additional equipment procurement. On the other hand, the Congress may decide to reevaluate the program and direct the Army to pursue other reinforcement initiatives, such as fast sealift. It could also direct further transfer of equipment from Reserve Component or other active-duty units, although this would reduce the capability of those units to carry out their assigned missions.

THE POMCUS PROGRAM

The POMCUS program is designed according to a specific planning scenario that envisions a war starting within approximately two weeks of a Warsaw Pact mobilization. It is assumed that NATO could detect a Pact mobilization within a couple of days, giving the United States ten days to deploy its forces before the outbreak of war. 1/ Using current airlift and sealift assets, divisions based in the continental United States (CONUS) would arrive after this initial period. Without early U.S. reinforcements, NATO ground forces might be insufficient to withstand a Warsaw Pact attack. Assuming a short-warning scenario, the Department of Defense has placed a premium on rapid deployment of forces.

The POMCUS program is designed to decrease U.S. deployment time if the Warsaw Pact attacks NATO's Central Region. If most combat and support equipment is prepositioned, the initial war-time movement requirement would be reduced to transporting the necessary personnel and remaining equipment.

The requirement for the POMCUS program is to move the prepositioned U.S. Army divisions to Europe within ten days of mobilization. By the end of 1980, the Army will have prepositioned four division sets in Europe: the "2+10" package, the Reformer package, and a fourth division set. Two additional division sets are scheduled to be prepositioned by the end of 1982.

NEW DEVELOPMENTS IN THE POMCUS PROGRAM

In its report on the fiscal year 1980 defense appropriations bill, the House Appropriations Committee directed the Army not to commit itself to prepositioning equipment for the fifth and sixth divisions until it had had the opportunity to examine the fiscal year 1981 budget. Since that time, Assistant to the President for National Security Affairs Zbigniew Brzezinski has revealed a plan to preposition a total of nine division sets in Europe by 1986.

1/ See testimony of Secretary of Defense Harold Brown in Department of Defense Appropriations for 1981, Hearings before the Subcommittee on Defense, House Committee on Appropriations, 96:2 (1980), Part 1, p. 546.



If the Army were to place nine divisions in POMCUS, it is assumed that the 82nd Airborne Division and the 101st Air Assault Division would be the only nonprepositioned divisions in CONUS. 2/

PROBLEMS IN THE POMCUS PROGRAM

How Many Division Sets Should Be Prepositioned and What Kind Should They Be?

The actual number of division sets to be prepositioned, as well as the proper mix of armored, mechanized, and infantry divisions, has been the subject of considerable debate within the Department of Defense.

At present, if neither the 82nd Airborne nor the 101st Air Assault Division is used, it is not clear whether the Army will be able to preposition equipment for nine divisions, since one of the divisions that would otherwise be earmarked for POMCUS --the 24th Mechanized Infantry Division--is slated to become part of the Administration's proposed Rapid Deployment Force (RDF). To respond rapidly and to sustain combat, the elements of the Rapid Deployment Force should be equipped at their authorized levels. If, however, the Army chose to preposition the 24th Mechanized

2/ The Army's 16 active divisions are divided into four armored, six mechanized, and four infantry divisions, one airborne division, and one air assault division. Five divisions currently are deployed outside the United States: two armored and two mechanized divisions in Europe and one infantry division in South Korea. The 11 divisions stationed in the United States that could be employed in the reinforcement of Europe include two armored, four mechanized, and three infantry divisions, one airborne division, and one air assault division. The specific divisions to be prepositioned have not yet been publicly identified. It seems reasonable to assume that the 82nd and 101st Divisions would not be part of a nine-division scheme for POMCUS. The 82nd Airborne Division is configured as a light infantry division with no heavy artillery or armor--equipment that would be prepositioned. In addition, it has traditionally been viewed as a strategic reserve in the reinforcement of NATO. The 101st Air Assault Division is also very light without its helicopters--equipment that would not be prepositioned under current criteria.

Infantry Division, all of its authorized equipment may not be available. Once a division is designated to be prepositioned in Europe, 30 percent of the type of equipment normally prepositioned can be withdrawn to fill POMCUS inventories. Therefore, if the 24th, 82nd, and 101st Divisions remain part of the force reservoir for the RDF, only eight active divisions will be available in 1986 for prepositioning in Europe. Alternatively, enough equipment could be purchased to allow the 24th Division to play both roles.

If the Army prepositions more than six division sets in Europe, then, under the Army's current structure, some will be infantry divisions. If it prepositions six or fewer, all could be armored or mechanized. The rationale for prepositioning armored or mechanized divisions rather than infantry divisions has been to reduce the lift requirement and to provide greater firepower to the combat area quickly. Current Army discussion of the utility of infantry divisions with enhanced anti-armor capability, however, may lead the Army to argue for the early inclusion of infantry divisions, even if six or fewer divisions are prepositioned.

Equipment Shortages

In order to preposition equipment in Europe, the Army must maintain two sets of equipment--one for the POMCUS stocks in Europe and one for the units to use in the continental United States. To fill the equipment for POMCUS sets, the Army "borrows" equipment from the war reserve stockpile; this equipment would be "returned" to the stockpile after mobilization, when the unit departs for Europe and is able to draw on its prepositioned equipment. Currently, war reserve stock levels are too low to meet all the POMCUS requirements, forcing the Army to withdraw some equipment from the active and reserve units. To ensure unit readiness by maintaining sufficient levels of equipment for training the U.S.-based units, the Army has stated that it will maintain at least a 70 percent level of equipment for CONUS units that are earmarked for POMCUS and a 50 percent level of equipment for the late-deploying reserve units. These thresholds were adopted to permit the Army to place equipment in POMCUS while maintaining some reasonable degree of readiness in the units. Under current allocation priorities and at current procurement rates, the Army will not be able to fill its requirement for six division sets by 1986.

One possibility for ameliorating the equipment shortages would be to bring reserve units below the Army's stated objective of 50 percent of their authorized equipment levels. Such an approach would not, however, solve all of the equipment problems because reserve units are not fully supplied with modernized equipment.

In its 1979 report, CBO estimated that shortages in armored personnel carriers and five-ton trucks would create shortfalls as great as 20 percent of authorized levels in the fifth and sixth division sets. By fiscal year 1986, the shortages in armored personnel carriers probably will be eliminated due to procurement of the new Infantry Fighting Vehicle. Shortages in five-ton trucks will, however, remain; proposed production of this item will not alleviate this problem during fiscal years 1982-1986. In addition to these shortages, preliminary analysis points to shortages in other essential, though less glamorous, items of equipment for the fifth and sixth division sets. These include the M577 command post carrier and logistics items such as vehicle-mounted FM radios, generators, and 5,000-gallon fuel-carrying systems.

Without major increases in the procurement program for the next five years, the Army will be faced with a sizable shortfall in equipment if nine divisions are to be prepositioned in Europe by 1986. CBO estimates that the cost of equipping nine full division sets by fiscal year 1986 will be at least \$2.03 billion. Almost one-half of the dollar value of these equipment shortages would be taken up by truck procurement.

Prepositioned War Reserve Stocks

Prepositioned war reserve stocks--the equipment and munitions needed to sustain combat until factories can provide replacements--are located in Europe and designated for the defense of NATO. These stocks are now below levels that the Army considers appropriate. In part, this shortfall has resulted from the drawdown of some equipment to fill POMCUS sets and also from the lower priority assigned to the buildup of war reserve stocks.

Prepositioned war reserve stock requirements increase when the Army prepositions more division sets, because the additional divisions would be entering combat earlier than previously planned. CBO estimates that the added five-year costs of filling the prepositioned war reserve stocks to a minimum level would

be approximately \$1.85 billion. This estimate can be considered conservative since it excludes munitions.

NORTHAG Support Structure

Current DoD plans call for three divisions, together with the necessary logistics units, to be prepositioned in the Northern Army Group (NORTHAG) of NATO's Central Region. CBO's 1979 study noted that at least one to two weeks would be required to establish a logistics base using only the logistics units that have prepositioned equipment. Assuming that war would start within ten days of a Warsaw Pact mobilization, the divisions in NORTHAG would require support much sooner. That could be done only by establishing a logistics base in NORTHAG during peacetime.

CBO estimates the five-year cost of providing a skeleton logistics base to be approximately \$770 million. This would include funding for base construction, for the addition of 12,500 military personnel to the Europe-deployed strength, and for operating costs. At present, the Department of Defense has no plans to place a logistics base in NORTHAG during peacetime.

COSTS THROUGH FISCAL YEAR 1986

CBO estimates that the cost of completing a nine-division POMCUS program by fiscal year 1986 would be at least \$4.6 billion more than the proposed five-year defense program (see Table 1). This estimate includes the costs of equipping POMCUS sets 1 through 9 to their authorized levels. In estimating these costs, it is assumed that the Army would not withdraw any additional equipment from the active and reserve units beyond the levels previously prescribed (70 percent and 50 percent, respectively). This estimate also includes the cost of filling the prepositioned war reserve stocks to a minimum level and of providing a skeleton logistics base in NORTHAG.

The Army maintains a system of priorities for the distribution of equipment procured during each fiscal year. It should be noted that the POMCUS program does not now have highest priority for new equipment. Administration plans for the RDF may further exacerbate current POMCUS equipment shortages. Equipping the units associated with the RDF may become a higher priority than POMCUS for the Department of Defense. If any additional funds were to be provided for equipment procurement, the Army would

TABLE 1. ESTIMATED ADDITIONAL COSTS OF POMCUS PROGRAM BY FISCAL YEAR 1986 (In millions of fiscal year 1982 dollars) a/

Item	Cost
Equipment to Fill Shortages in POMCUS Sets 1-6	800
Equipment to Fill Shortages in POMCUS Sets 7-9 <u>b/</u>	1,230
War Reserve Stocks Shortages	1,850
Increased Support Structure in NORTHAG (includes 12,500 personnel)	<u>770</u>
Total	4,650

a/ These are added costs above the proposed five-year defense program for fiscal years 1982-1986.

b/ This estimate is based on the cost of filling division set 7. It is assumed that the cost of filling equipment shortages for sets 8 and 9 will be at least equal to that of division set 7.

utilize its priority system to distribute the equipment throughout the force, giving POMCUS only a portion of the additional equipment. Therefore, if the Congress wanted to bring the POMCUS sets to their authorized levels, it would have to designate funds specifically for the POMCUS program or provide for all equipment needed to fill the higher-priority claimants as well.

RISKS ASSOCIATED WITH THE POMCUS PROGRAM

If the assumptions of a short-warning attack should prove incorrect, the POMCUS program involves considerable risks. If a Warsaw Pact mobilization proceeded undetected, or if an attack came without warning, the POMCUS stocks might be vulnerable to destruction by both ground attacks and air strikes. Under the current program of withdrawing equipment from U.S.-based forces, reinforcing divisions deployed to Europe would then

have considerably less than their authorized level of equipment for combat. Loss of the prepositioned equipment would also create serious deficiencies in the war reserve stockpiles.

If, on the other hand, an attack occurred after lengthy Warsaw Pact preparation, rapid deployment to Europe might be less important. With approximately 30 to 40 days of preparation preceding a NATO decision to commit forces, the United States could move the heavy equipment by sea to Europe before the initial attack.

ALTERNATIVES TO POMCUS

Fast Sealift

An alternative to prepositioning additional division sets in Europe might be to employ fast sealift, using roll-on/roll-off ships. The Department of Defense plans to acquire eight SL-7s, which are large container ships capable of operating at 33 knots. According to one source, these ships, after some modification, will be capable of carrying a division to Europe within four days. ^{3/} The eight ships will cost \$285 million to purchase and approximately \$450-600 million to modify.

If the ships were used to transport one division to Europe as an alternative to prepositioning equipment for it, the Army would not have to maintain duplicate sets of equipment. A division could theoretically then be equipped to 100 percent of its authorized level, giving the Army the flexibility to employ that division either in a European confrontation or in a non-NATO contingency.

Currently, U.S.-based POMCUS divisions could be delivered from the continental United States to European destinations in ten days. Although the modified SL-7s could transit the Atlantic in four days, the Army might not be able to move a division from its U.S. base to a designated port and load its equipment on these ships in fewer than six days. Thus, a decision on fast sealift versus prepositioning depends not only on a comparison of costs and benefits, but also on an assessment of the Army's ability to load the ships within the required time frame.

^{3/} "Civilian Ships Give the Navy a Fast Fix," Business Week (February 4, 1980), p. 31.

Additional European Efforts

As an alternative to POMCUS, additional European defense initiatives could reduce the unfavorable balance of forces between NATO and the Warsaw Pact in the initial ten days after mobilization. By strengthening both the peacetime and the post-mobilization forces, the risk of a surprise or short-warning attack would be decreased. CBO's 1979 study stated that redressing the firepower deficiencies of the non-U.S. NATO allies would reduce the initial force imbalance. This could be achieved by modernizing major equipment items and by increasing the density of artillery.

Recent developments indicate that West Germany and the Netherlands are pursuing an aggressive modernization of their forces. Both armies are modernizing major items of equipment, such as tanks, armored personnel carriers, and artillery. Great Britain and Belgium, however, are not pursuing as aggressive a force modernization program.

CONCLUSIONS

Department of Defense budgetary programs through fiscal year 1986 do not adequately fund the full cost of the POMCUS program. CBO estimates that the total added costs to preposition nine division sets would amount to at least \$4.6 billion, including the costs of equipment shortages, prepositioned war reserve stocks, and a peacetime logistics base in NORTHAG.

The Army's ability to reinforce NATO rapidly may be impeded by shortages in POMCUS sets. Thus, if the Congress wishes to implement the full POMCUS program, it will have to provide additional procurement funds. Further transfer of equipment from Reserve Component or other active-duty units might obviate the need for a part of this additional procurement, but to the detriment of these units' capabilities. Alternatively, the Congress may decide to reevaluate the entire POMCUS program and direct the Army to pursue other reinforcement initiatives.

