MCWP 4-11.7

MAGTF Ground Supply Operations



U.S. Marine Corps

Coordinating Draft

1	DEPARTMENT OF THE NAVY
2	Headquarters United States Marine Corps
3	Washington, D.C. 20380-1775
4	XX XXXX 2005
5	FOREWORD
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7 8 9 10 11 12 13	Marine Corps Warfighting Publication (MCWP) 4-11.7, <i>MAGTF Ground Supply Operations</i> , provides guidance governing the principles and concepts of supply and the organization, planning, and execution of supply support for a Marine air-ground task force (MAGTF) in an expeditionary environment (afloat/ashore). This publication also provides essential information concerning supply sources and options available internally and externally to sustain the MAGTF during predeployment and deployment. This publication is intended to provide a baseline for supply operation across the Marine Corps as well as providing a common philosophy and language for supply operations.
14 15 16 17 18	This publication is intended primarily for MAGTF commanders, their staffs, and supply personnel to expand their knowledge and understanding of the supply process during a peacetime environment and the supply mission area in an expeditionary environment. It concentrates on the current ground supply functions and operations necessary to sustain MAGTF operations. The final chapter in this manual focuses on logistics modernization initiatives that will have an impact on future supply operations and procedures.
19	MCWP 4-6, 29 February 1996.
20	Reviewed and approved this date.
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30	DISTRIBUTION: 143 000001 00

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CHAPTER 1 Fundamentals

3 One of the primary logistic concerns of a Marine air-ground task force (MAGTF) commander is to have the

4 requisite supplies, equipment, and repair parts on hand to sustain the mission. If this is not possible, the

5 concern of the MAGTF commander then becomes the timely acquisition of the required items. This manual

6 is structured to provide the MAGTF commander with supply support options that sustain a MAGTF

7 operation.

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8 MAGTF OVERVIEW

9 The MAGTF is a task-organized unit consisting of elements from the Marine division, Marine aircraft wing

10 (MAW), and the Marine force service support group (FSSG) formed into an air-ground-logistics team under

11 one commander. In a MAGTF operation, each MAGTF is task-organized according to the mission as a self-

12 contained unit that has the necessary logistic support to sustain itself for varying periods of time. The

13 mission of an operation determines the size of the MAGTF and the amount of time that the MAGTF will be

14 deployed. Before deployment, a MAGTF has a basic load of supplies. Based on the recommendations from

15 the combat service support element (CSSE) commander and the MAGTF staff, the MAGTF commander

16 makes decisions on supplies required beyond its basic load. Throughout the operation, the MAGTF

- 17 commander will find it necessary to adjust his supplies. Figure 1-1 is a basic wire diagram for a generic
- 18 MAGTF.

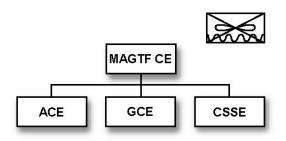


Figure 1-1. Generic MAGTF.

19 20

- 21 The degree of supply support will vary with the size of the MAGTF. The different types of MAGTFs that

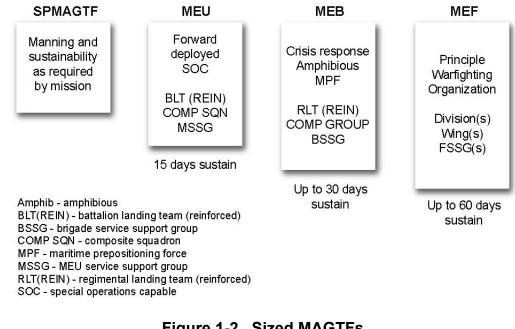
require supply support are a special purpose MAGTF (SPMAGTF) that are task-organized for specific

23 missions, a Marine expeditionary unit (MEU), a Marine expeditionary brigade (MEB), and a Marine

24 expeditionary force (MEF). A MEU normally deploys as part of an expeditionary strike group (ESG) with

the logistic capability to sustain itself with most classes of supply for up to 15 days, a MEB for up to 30

26 days, and a MEF for up to 60 days. Figure 1-2 depicts the various sized MAGTFs.



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Figure 1-2. Sized MAGTFs.

29 The CSSE commander in each MAGTF provides combat service support (CSS) to the MAGTF commander.

30 During deployments, the MAGTF requires the establishment of a responsive logistics pipeline for

31 sustainment. This requirement is critical during sustained operations ashore. During joint operations, the

32 joint force commander will normally be responsible for coordinating this logistic support in cognizance with

33 Service component commanders and their supporting logistical establishments. The MAGTF CSSEs must

34 be prepared to function with or integrate into the joint force logistic support pipeline.

35 TYPES OF MAGTF COMBAT SERVICE SUPPORT ELEMENTS

36 The CSSE is the MAGTF element which is task organized to provide initial CSS and sustainment to its

37 supported MAGTF. The supply responsibilities for a CSSE include organic supply support for itself and

38 direct/general or mutual support supply support missions for the entire MAGTF. CSSEs vary in size from

39 combat service support companies (CSSCs) or combat service support detachments (CSSDs), up to the

40 FSSG. Normally, one CSSE is comprised within a MAGTF.

41 The designation, size, and composition of the MAGTF CSSE is a function of the mission, size, and

42 composition of the MAGTF it supports. CSSEs may be organized as: Marine Logistics Command (MLC),

43 force service support group (FSSG)/force service support command (FSSC), combat service support group

44 (CSSG), brigade service support group (BSSG), combat service support battalion (CSSB), Marine

45 expeditionary unit service support group (MSSG) / MEU service support battalion (MSSB), combat service

46 support detachments (CSSDs), a combat service support company (CSSC), and a landing force support party

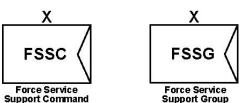
47 (LFSP).

49 Marine Logistics Command

- 51 The MLC is the operational level coordinator and the conduit for sustainment to the
- 53 FSSG. The MLC is the primary option to provide operational level support, to include
- 55 deployment, sustainment, resource prioritization and allocation, and requirements
- 57 identification activities required to sustain the force in a campaign or major operation.
- 59 The MLC may establish liaisons directly with the United States (US) Army's theater
- 60 support command (TSC), other theater resources, and/or continental US (CONUS) based wholesale and
- 61 intermediate supply sites. The MLC may provide similar support as the general support commands (GSCs)
- 62 did to the direct support commands and CSSDs during Desert Shield/Storm.
- 63 The MLC will provide general supply support to all Marine forces in theater. Additionally, it provides
- 64 direct supply support to organic MLC CSS units, MEU(s), MEB(s), and Marine rear area operations group
- operating in the area of operations, which are not attached to the MEF. This support includes:
- MLC organic supply functions under consolidated supply facility (CSF).
- Class II (individual issue), class III (packaged petroleum, oils, and lubricants [POL]), and class IV (construction materiel).
- Class VII (operational readiness float).
- Serve as the lead agency for sustainment of class IX consumables. Source class IX consumable
 requirements from supported activities within theater. Serve as the main conduit for the flow of class IX
 (repair parts) consumable sustainment from TSC to MEF, MEB, and MEU.
- Operate intermediate supply support activity (ISSA).
- Field contingency contracting; act as Marine theater coordinator for all contracting activities.
- Warehousing operations in support of the Marine Corps forces in theater.

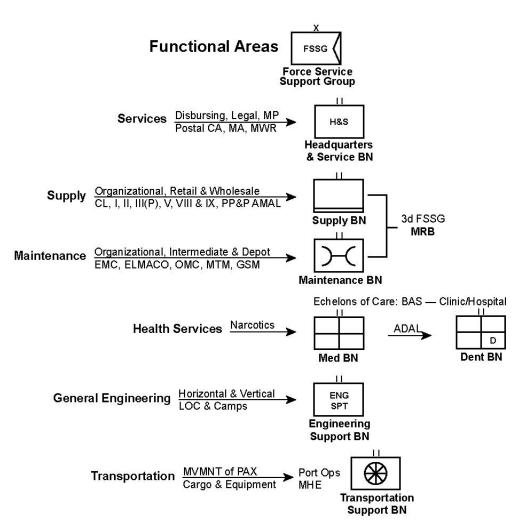
76 Force Service Support Group

- 77 The FSSG is a permanently structured command whose mission is to provide CSS to the MEF. Although it
- has up to eight permanent battalions, task organizations from those battalions normally support MEF-sized
- 79 MAGTF operations over a large geographic area. All elements of the FSSG are structured to provide
- 80 permanently organized sub elements to support independently deployed battalions, regiments, MEUs (i.e.,
- 81 task-organized groups to provide support, as required and preplanned), or geographically separated units in
- 82 garrison, in all levels of conflict. Future FSSGs may be redesignated as FSSCs.



- 84 As the CSSE of the MEF-sized MAGTF, it supports the MEF headquarters group, comprised of the
- 85 command element (CE) and its specialized battalion organizations; a ground combat element (GCE)
- 86 comprised of one Marine division; and an aviation combat element (ACE) comprised of one MAW.
- 87 Responsive supply system. Although all CSS functions are important, supply support has the greatest
- potential impact on the MAGTF commander's ability to integrate essential elements of firepower, mobility,
 and sustainability. See figure 1-3.





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Figure 1-3. CSS Functional Areas.

92 The FSSG provides centralized ground supply support, beyond supported units' organic capabilities, for the

93 sustainment of the MEF, including procurement, storage, care in storage, distribution, salvage, disposal, and 94 bulk fuel and water supply support. It provides selected consumer-level and full intermediate-level ground

95 supply support to the MEF and other operational units, as required.

Supply battalion is the principle supporting command within the FSSG that provides supply support to each
 major subordinate command (MSC) within the MEF. The supply battalion provides general support supply
 support, except for bulk fuel and Navy-funded stock/programs, for sustaining MAGTF operations.

Supply battalion provides supply support management, for the FSSG and other MEF elements beyondorganic capabilities of supported units, including the following stock control functions:

- Management of the MEF's special allowance training pool items and initial issue provisioning assets.
- Management of the MEF's secondary reparables through the maintenance float.
- Technical management, data research, customer service, and general assistance to the MEF for supply matters.
- Supplying status management reports for the MEF, as required.
- Interface for the MEF with financial and maintenance management systems.
- Provide contracting support and cross-servicing services for supported units, as required.

- Provide a warehousing capability in support of the MEF.
- Provide accounting for class I (subsistence), II, IV, VII (major end items), VIII (medical supplies), and IX supplies, initial issue provisioning assets, and authorized levels of war reserve.
 Provide subsistence support to the MEF, including operation of class I subsistence dumps and
 - Provide subsistence support to the MEF, including operation of class I subsistence dumps and storage, issue, and accounting for subsistence items.
 - Provide receipt, storage, and forwarding of class III (packaged) supplies.
 - Provide receipt, storage, issue, and accounting actions for class V (ammunition) items. Provide technical assistance in receipt, storage, assembly, and provision of nuclear ordnance.
- Provide for the receipt, storage, issue, and organizational (2d echelon) and intermediate (3d and 4th echelon) maintenance support for class VIII supplies and equipment.
 Provide intermediate level shop stores issue points for the MEF. Provide procurement services for
 - Provide intermediate level shop stores issue points for the MEF. Provide procurement services for the MEF for items decentralized by the integrated materiel manager.
- Provide packing, preservation, and packaging services.
- 122 The engineer support battalion within the FSSG provides general engineering support to the MEF
- 123 concerning bulk class I (water) and bulk class III and III(A) items. Engineer support battalion provides
- 124 water purification and bulk class I (water) storage and dispensing for the FSSG and other elements of the
- 125 MEF when requirements exceed supported units' capabilities, and provides bulk class III and III(A) fuel
- 126 support, including receipt, storage, and dispensing of bulk fuel products.
- 127 Transportation support battalion augments the above capabilities with medium- and heavy-lift transport and
- 128 distribution of bulk dry/liquid cargo, class III and III(A), and class V and V(A) supplies. This additional
- 129 capability is provided via line haul and unit/supply point distribution of bulk liquids.

130 Combat Service Support Group

- 131 The CSSG is a CSSE that is task-organized from the permanent organization of the FSSG. Personnel and
- equipment are assigned to it from permanent battalions of the FSSG. This support group is organized to
- 133 provide general and direct CSS to designated brigade-sized units. If required, the brigade-sized service
- 134 support group may be augmented by assets from the division and/or wing.
- 135 A CSSG is capable of task-organizing subordinate CSSEs. Currently, 1st FSSG has CSSG-1 established to
- support 7th Marines (Rein) at Twentynine Palms, California and 3d FSSG has CSSG-3 established to
- 137 support 3d Marines (Rein) and the aviation support element at Kaneohe Bay, Hawaii.



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139 Brigade Service Support Group

- 140 The BSSG is the task-organized CSSE, providing a full spectrum of expeditionary CSS to the MEB. The
- 141 FSSG provides BSSGs with the necessary personnel and equipment to accomplish their missions. In one or
- 142 more MEFs, the BSSG has been referred to as FSSG (FWD), an older designation associated to the past
- 143 MEF (FWD) concept. It draws its personnel and equipment from the permanent battalions of the FSSG.
- 144 These detachments from the FSSG are usually at the company level (e.g. supply company, maintenance
- 145 company, etc...). The BSSG deploys with up to 30 days of supply (DOS) for various classes of supply, to
- include classes I, II, III[B], IV, V[W] and IX. Dependent on the mission, the BSSG can become the forward
- echelon of the FSSG, or act as the logistics service component for the Marine Corps. The BSSG has the
- same numeric designation as that of the MEB it supports (e.g. I MEF's 1st MEB will have BSSG-1, II MEF
- 149 will have BSSG-2 and BSSG-4 (antiterrorism [AT])).

BSSG
Brigade Service Support Group

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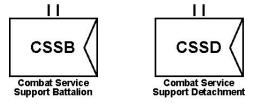
Combat Service Support Battalion 151

152 The CSSD is envisioned to transform to CSSBs in the future. A "detachment" is ambiguous as to the

153 CSSE's size and capability. A CSSB/CSSD is task organized from a combination of sources. Its primary

154 tasks are to rearm, refuel, and provide limited maintenance repair/supply for the supported force.

- 155 CSSBs/CSSDs are task-organized by the CSSE to meet the specific CSS mission at hand. For example, a
- 156 CSSB/CSSD usually supports a regiment, but one may provide direct support to a battalion conducting 157
- independent operations or to an aircraft squadron operating at a remote airfield.



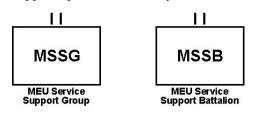
Marine Expeditionary Unit Service Support Group 159

160 The MSSG is the task-organized CSSE of the MEU. It draws its personnel and equipment from the

161 permanent battalions of the FSSG. The MSSG has the same numeric designation as that of the MEU it

162 supports. The MSSG could be tasked as the lead CSS component for a BSSG. The MSSG may be

- 163 redesignated as an MSSB.
- 164 The MSSG/MSSB can be expected to maintain the class I, II, III, IV, V, VII, and IX supply blocks that 165 support up to 15 DOS / days of ammunition (DOA):



167 **Combat Service Support Companies**

- 168 When established, CSSBs can also task-organize CSSCs along functional lines, or as a cross section of
- 169 supplies and services as internal detachments. These detachments would have the capabilities that mirror 170 those of the CSSB but on a more reduced scale.

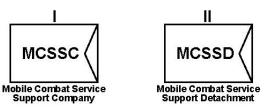


171 Combat Service Support Company

172 Mobile Combat Service Support

173 **Detachment/Company**

- 174 An MCSSD or MCSSC can be established from the CSSE/CSSB to provide roving general support to the
- 175 MAGTF or direct support to a particular element of the MAGTF. These CSS elements are mobilized in
- 176 order to be flexible enough to support the maneuvering element.



- A MCSSC/MCSSD can be expected to carry minimal essential supplies. The following supplies can beexpected:
- One to two DOS, plus water.
- Various items, chemical lights.
- 182 [JP-8], high usage [PKG] POL.
- Minimal backup fortification and barrier material.
- One to two DOA Class V(W).
- One to two DOS batteries, high usage repair parts and secondary reparables that support maintenance contact team/ maintenance support team echelons of repair and concept of maintenance support.



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188 Landing Force Support Party

189 This is a temporary organization that is normally dissolved when the CSSE phases ashore. The mission of

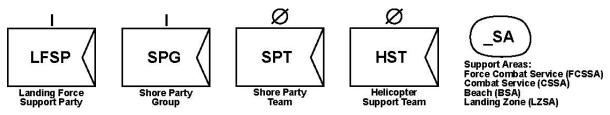
190 the LFSP is to support the landing and movement of troops, equipment, and supplies across the beaches and

191 into helicopter landing zones. The primary source for this task organization is the transportation support

battalion, FSSG. The organization and mission of the landing force dictate the structure of the LFSP.

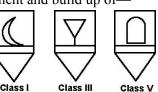
Marine Corps elements of the LFSP may include augmentation/detachments from the GCE, the ACE, and

- the CSSE. Naval elements may include detachments from the cargo handling and port group and beach
- 195 master unit.



- 197 The LFSP establishes the beach support area during an amphibious operation. The beach support area is
- 198 normally one of the first CSS installations established ashore, where the LFSP facilitates the initial
- 199 throughput requirements.
- 200 The LFSP commonly facilitates the establishment and build up of—
- 201 Rations dump

- Fuel site/farm, and
- Field ammunition supply point.



204 SUBFUNCTIONS OF SUPPLY

- Supply requires considerable forward planning and a detailed planning data system to sustain the MAGTF's
 throughput requirements. Supply also has more tasks, concepts, terms, and documents than other CSS
 functional areas. Every unit and individual has some involvement in a functional area of supply.
- The six subfunctions of supply are: determination of requirements, procurement, storage, distribution,
 salvage, and disposal.

210 **Determination of Requirements**

- 211 In logistics/CSS terms, supply requirements are the needs for those commodities essential to begin and
- sustain combat operations. The use of the unit's Marine Corps Training, Exercise and Employment Plan,
- supply support requirements with war plans, and various type-planning conferences are means to determine
- 214 supply support requirements. The three types of supply requirements are routine, preplanned, and long-
- 215 range.

216 Routine Requirements

Routine requirements support normal daily operations. The CSSE supports routine requirements with available sources or through redistribution of assets within the MAGTF.

219 **Preplanned Requirements**

Preplanned requirements pertain to support for special missions or operations. Since there is not enough time to obtain new resources during these types of operations, the CSSE supports these requirements with available resources or through redistribution of assets within the MAGTF.

223 Long-Range Requirements

- 224 Long-range requirements involve unusual or high-cost items. If this type of support is not correctly
- determined and programmed in a timely manner, resources may not be available.

226 **Procurement**

- 227 In the consumer phase, procurement relates to those supplies and items of equipment that the commander
- determines necessary to begin and sustain operations. The Marine Corps, like the other Services, will be
- 229 given special funds for the purchase of class VII (major end items) or be given the items themselves as an
- 230 initial issue. From this point on, the acquisition of repair parts and maintenance supplies required for these

- items will be the responsibility of the Marine Corps. Most secondary items are purchased through stock
- funds (operating budget funds). Supply will procure these items through the General Services
- 233 Administration, Defense Logistics Agency (DLA), or from civilian manufacturers and contractors for the
- 234 Marine Corps. These items are then stored in warehouses for eventual purchase by using units.

235 Storage

- 236 Storage is the safekeeping of supplies and equipment in a ready-for-issue condition. The storage function
- 237 includes the process of receipting for supplies and equipment from a source and the responsibility for
- maintaining accurate inventory controls. Storage of class I, II, IV, VII, IX, and X (material for nonmilitary
- programs) items can usually be provided by the using unit. Packaged food supplies, clothing, construction
- 240 materials, major end items and repair parts basically require simple shelter and security. However, 241 perishable food supplies do require refrigeration. Most medical supplies stored at the FSSG's medical
- perishable food supplies do require refrigeration. Most medical supplies stored at the FSSG's medical
 logistics (MEDLOG) have special considerations such as shelf life and/or refrigeration requirements. Class
- 242 Indistics (MEDLOG) have special considerations such as shelf life and/or refrigeration requirements. Class 243 III (POL) and class V (ammunition) supplies generally have some special or unique storage requirements
- 243 III (POL) and class V (ammunition) supplies generally have some special of the provide section and the section of the provide section of the section of
 - because of their hazardous nature.

245 **Distribution**

- For the MAGTF, distribution is the issue of supplies and equipment to using units or to intermediate supply
- 247 points for future issue. The distribution process has two steps. The first step is to requisition. A requisition
- identifies the user's needs and the priority of the requirement. The second step is to issue items. The supply
- activity issues supplies and equipment based on the commander's priorities and availability of the item.

250 Salvage

- 251 The salvage process encompasses the recovery, evacuation, receipt processing, storage, reclamation, and
- reissue of material, to include captured material. Salvage is property that has some value beyond that of its
- basic material content, is not economically reparable, and can no longer be used for its intended purpose.
- 254 Salvage collection points (SCPs) are established points that receive salvage items, usually from the disposal
- collection points, for reissue. SCPs are managed by detachments of the CSSE.

256 **Disposal**

- 257 Disposal is the process of eliminating excess, obsolete, or unserviceable property. Disposal may include
- transfer, donation, sale, or abandonment. It does not include redistribution or reissue. The local using unit
- disposes of consumable supplies. When a unit is deployed, controlled, serialized, and major end items must
- 260 be sent to SCPs for disposal. In an exercise or contingency environment, vehicles used to bring in supplies
- 261 can be used to send disposal items to the rear. Many times items such as clothing and canvas can be
- reclaimed by laundering and renovation. More durable items have scrap metal value, and certain items may
- contain radioactive and/or other controlled substances that must be forwarded through salvage channels to a
- 264 property disposal unit.

MARINE CORPS SUPPLY SYSTEM 265

266 The Marine Corps supply system (MCSS) provides the MAGTF commander with the necessary materiel for 267 conducting combined arms operations. As a result, supply management and readiness must be emphasized 268 at all levels of command to ensure an effective, responsive, and flexible supply program. The MCSS is 269 often considered the "cornerstone" for all support activity. An example of the broad base of supply support

- 270 is the sophistication of combat-essential equipment. This sophistication has increased the emphasis on
- 271 equipment readiness to support mission functions. As a result, the supply system has become a vital link in
- 272 a commander's maintenance program.
- 273 The mission of the MCSS is to provide and manage those items necessary for the equipment, maintenance, 274 and operation of the Marine Corps forces and supporting establishments. When MAGTFs are deployed, the 275 MCSS makes every attempt to forecast requirements so that necessary on-hand stocks are maintained. The 276 availability of these stocks is often reduced due to shipping constraints, extended distances from resupply
- 277 points, and a lengthened administrative time to process supply requisitions. Depending on situations and
- 278 conditions, the requisition process may be prolonged if the actual source of supply changes. Whether the
- 279 supply system is working to provide repair parts or initial fielding of new equipment, reconciliation of the
- 280 supply system is necessary. Special emphasis should be placed on supply requisitions that have adverse
- 281 impacts on the mission. The customer should never assume his requisitions' status is being monitored.

Levels of Supply Management 282

- 283 Within the Marine Corps, there are three inventory levels of supply:
- 284 • Wholesale. Inventories, regardless of funding source, over which an inventory manager at the national 285 level has asset knowledge and exercises unrestricted asset control to meet worldwide inventory 286 management responsibilities.
- 287 • Intermediate. An inventory, regardless of funding source, that is required between the consumer and 288 wholesale levels of inventory for support of a defined geographic area or for tailored support of specific 289 organizations or activities.
- 290 Consumer. An inventory, regardless of funding source, generally of a limited range and depth, held 291 only by the final element in an established supply distribution system for the sole purpose of internal 292 consumption.

Marine Corps Supply System within the Operating Forces and Bases 293

294 In addition to Headquarters, Marine Corps (HQMC) direction and Marine Corps Logistics Command

295 (MARCORLOGCOM) overview, the MCSS is comprised of warehouses, supported activities supply

- 296 support systems (SASSY) management units (SMUs), and direct support stock control (DSSC) self-service
- 297 stores residing within the FSSG/FSSCs/major bases. These warehouses are the using unit's first step in
- 298 obtaining their required supplies. The warehouses' usual stocks include class I, II, III (PKG), IV, VIII, and
- 299 IX items. Major end items (class VII) are ordered by the units directly from the Marine Corps logistic bases 300
- (MCLBs). The majority of bulk class III is maintained by the base fuel farm. Class V(W) ammunition, 301 because of its combustible/hazardous nature, is stored at the ammunition supply points maintained by the
- 302 Ammunition Company, Supply Battalion. Class VI personal demand items are those which are sold through
- 303 base exchanges, ship stores, and tactical field exchanges (TFEs). Most personal demand items are not
- 304 stocked by the MCSS, but are ordered, stocked, and sold by the Marine Corps Community Services
- 305 (MCCS). During deployment, the MCCS/Exchange system will support the MAGTF with class VI supplies
- 306 either as a gratuitous issue of basic health and comfort or purchasable goods in the exchanges/tactical field
- 307 exchanges.

308 Operating Forces Organic Sustainment

309 Operating forces organic sustainment consists primarily of the assets that have been issued to the user, i.e.,

310 units of the MAGTF (divisions, aircraft wings, CSS units) and supporting organizations (posts, camps,

311 stations, and recruiting and reserve districts).

312 Materiel Control

313 Materiel in the out-of-stores element is not centrally managed except for those stocks within the Operating

Forces (e.g. FSSGs/FSSCs) that are managed by the SASSY and Asset Tracking Logistics and Supply

315 System (ATLASS) or and ATLASS II+ and Small Unit Logistics (SUL)-Rapid Request Tracking System

316 (RRTS). Stockage objectives are based on actual usage or on mandatory table of equipment (T/E) 317 allowances published for each unit by HOMC. All phases of supply accounting (ammunition excepted)

317 allowances published for each unit by HQMC. All phases of supply accounting (ammunition excepted) at 318 the intermediate or using unit level are performed under the business rules per supply directives and resident

310 the intermediate or using unit level are performed under the business rules per supply directives and resident 319 within the SASSY/ATLASS/ATLASS II+ systems. These systems serve to eliminate most of the manual

320 accounting by the use of a mainframe computer and stand alone server/client-based networks.

321 Intermediate Supply Support

322 As previously stated, the SMUs and DSSCs support their respective MEFs/bases. The SMUs stock the

323 materiel necessary to support the major units for prescribed level of operations, normally 60 DOS/DOA.

The using units requisition materiel from the SMU's general accounts (i.e., the account which controls the

inventory for the geographical region that the SMU supports), and their demand is either filled, passed to the

integrated materiel manager, back-ordered, or procured locally. SMUs are the connecting link between unitlevel supply accounts, the MCLBs, and the other integrated materiel management (IMM) activities.

328 Material Requests

329 Essentially, the using unit/customer places demands (requisitions) on the system in two ways - the manual

330 (nonsystem requisition) demand and the system demand (system requisition) conforming to the military

331 standard requisition and issue procedure (MILSTRIP) electronic data interchange format and interfaces.

332 Manual Demands

333 These system demands are processed outside the scope of standard automated supply systems (i.e.

334 SASSY/ATLASS/ATLASS II+). Using units commonly submit these type of requirements within their

335 supporting DSSC stores, MCCS outlets, government credit purchase cards (GCPCs) for local small purchase

threshold requirements, or at purchasing and contracting offices for larger requirements. Manual demands

are also placed on the maintenance float/secondary reparable system employed by the Marine Corps,

338 whereby unserviceable but repairable components are exchanged for serviceable assets.

339 System Demands

340 These demands generally start as materiel requests by using units forwarded to the supporting SMU. The

341 SMU fills and/or backorders (B/Os) the requirement, or submits these system requisitions directly to the

342 appropriate integrated materiel manager via the automatic digital network, or via naval message by

exception. The applicable integrated materiel manager will transmit a materiel release order (MRO)

- directing its storage activity to release the on-hand (O/H) materiel or the National Stock Number (NSN).
 For the stocks that are not in stock (NIS), the requirement is placed on back-order with the manufacturer or
- For the stocks that are not in stock (NIS), the requirement is placed on back-order with the manufacturer or procured from another suitable commercial source for direct delivery to the requisitioner. Procurement
- priority is in accordance with the urgency of the priority assigned to the requisition.

CHAPTER 2 Planning for Supply Operations

3

1

2

4 Supply requires extensive forward planning because it has the broadest scope of support within CSS. As a

5 result, supply support becomes one of the first planning considerations in the support plan for the CSS

6 estimate of supportability within the tactical plan. In order for supply planning to be effective initially,

7 intense coordination between planners at all levels should take place during the pre-deployment phase. This

8 phase offers the most opportune time to get "tailor made" supply support as commanders can avail

9 themselves of the major base/installation FSSG facilities. Regardless of the phase of the operation, a unit

10 commander can receive timely and appropriate supply support if both the supported and supporting units

11 know each other's responsibilities. Without timely and appropriate supply support to sustain the MAGTF,

12 the effectiveness of efforts in the other functional areas and the overall throughput system is largely negated.

13 COMBAT SERVICE SUPPORT PLANNING REFERENCES

14 The references in Table 2-1 assist in the determining of CSS requirements.

Table of Authorized Material Navy/Marine Corps Publication 1017, USMC Table of Authorized Material and specific information on classes I, II, III, IV, VII, and IX. It also profactors needed to project anticipated losses.	
Table of Equipment Primarily concerned with class VII items and determining class III, V identifies the potential population of end items that consume bulk fue possessed by the unit, and the equipment that will require repair part reparables, respectively.	l, amount of weapons
Table of Organization (T/O) Describes the logistic capabilities of the unit, and provides the person unit. It also assists in the determining the weapon densities.	nnel structure for the
Marine Corps Orders Marine Corps Order (MCO) 4400.16, Uniform Materiel Movement an (UMMIPS); MCO 8010.1, Class V(W) Planning Factors for Fleet Mar Operations provides class V supply rates in combat operations; user technical manuals (TM).	ine Force Combat
Marine Corps Bulletins (MCBuls) MCBul 3000, Table of Marine Corps Ground Equipment Resource Resour	
Marine Corps Doctrinal Publications (MCDPs) Marine Corps doctrinal publications provide a wide range of information operations. They provide guidance covering principles and concepts organization, planning, and execution of supply support for a MAGTF environment. Example publications are listed below: • MCDP 4, Logistics MCWP 4-1, Logistics Operations • MCWP 4-11, Tactical Level Logistics • MCWP 4-11.6, Petroleum and Water Logistics Operations	of supply and the
 MCWP 4-11.8, Services in an Expeditionary Environment MCRP 4-11.8A, Marine Corps Field Feeding Program MCWP 4-12, Operational Level Logistics MCRP 5-12A, Operational Terms and Graphics 	

Annex D	This is the portion of the operation order (OPORD)/plan that pertains to logistics. It provides all supported units with the procedures to follow for CSS operations.
MAGTF Standing Operating Procedures (SOPs)	Each MAGTF will publish SOPs to help in the phases of deployment. All planning calendars will be different, depending on the mission and forces being deployed.
Supply SOP	The supply section will develop an internal supply SOP. Each supported unit must be familiar with the procedures before deployment. The SOP will cover, but not be limited to, the following:
	Communication/connectivity procedures while in garrison and deployed that support supply sustainment.
	 Financial guidance for the entire MAGTF/major support elements (MSEs). This guidance includes the entire budget formulation—execution—closeout cycle for planning estimate (PE), requisition authority (RA) and other funds. Additionally, this guidance will specify "legal" request routes for supplies and services.
	• Resupply procedures, to include open purchase items, self-service items, resupply from ships, high priority items, and routine requisitions.
	• Equipment repair order shopping list, supply requisition processing, and reconciliation procedures.
	Technical research procedures and requirements.
	SASSY/ATLASS/ATLASS II+ file maintenance procedures.
	• Transportation of resupply, to include sample "receipt of shipment" messages, tracer action procedures and sample tracer action messages with points of contact.
	Recurring report formats, inventory adjustment, validation, and requisition follow-up procedures.
	 Reconciliation Procedures. These procedures include internal MSE procedures, MAGTF procedures, and required reconciliations with higher headquarters between maintenance and supply sections.
	Generator package management responsibilities, stockage levels / criteria, and receipt procedures.
	Reparable issue point (RIP), clothing block, class I block, and self-service block management procedures.

Table 2-1. CSS Planning References.

16 SUPPORTED UNIT RESPONSIBILITIES

17 The supported unit commander, through the coordinated efforts of his G-3 and G-4 (S-3/S-4), initiates the

18 detailed planning for CSS. CSS planning begins with determining support requirements, assigning

19 priorities, and allocating resources.

20 **Determining Support Requirements**

21 The supported unit commander determines and identifies those supply support requirements beyond his

22 organic capabilities that are needed for a mission. To arrive at an accurate decision on the type and amount

23 of external service support needed, the required quantities of different supply categories need to be

24 calculated. The following factors should be considered when calculating these needs.

- Mission of the MAGTF.
- Characteristics of the objective area, including available resources, climate, weather and terrain.
- Enemy capabilities.

- Characteristics of operations to be supported.
- Time span of the operation.
- Capability and dependability of the transportation system both outside and inside the objective area.
- Tasks requiring special supplies and equipment.

32 Assigning Priorities

- 33 The supported unit commander establishes and assigns priorities associated with the execution of his
- 34 concept of operations and scheme of maneuver. This assignment of priorities, in turn, will affect the plans
- of the supporting CSSE's concept of CSS. Ultimately, the MAGTF commander oversees assignment of
- 36 priorities. Refer to appendix E for further details on priority designators.

37 Allocating Resources

- 38 The supported unit commander allocates available CSS resources to the subordinate elements of his
- 39 organization. This allocation includes those assets that he desires to retain as a reserve. The allocation of
- 40 resources must support and complement the supported unit commander's concept of operations. They also
- 41 need to reflect his previous decisions on requirements and priorities. Like his assignment of priorities, the
- 42 supported unit commander's allocations of CSS resources affect the supporting CSSE's concept of CSS.

43 SUPPORTING UNIT RESPONSIBILITIES

- 44 Once the CSS planner knows the supported unit's desires, he can begin to advise and assist the unit in
- 45 refining requirements, to procure the resources to meet those requirements, and to plan for the distribution of
- 46 assets to support the mission and concept of operations.

47 **Determination of Requirements**

- 48 This step is very similar to the estimate of the situation and must address each CSS functional support area.
- 49 These requirements are based on the supported commander's concept of operations and the situational
- 50 factors. The CSSE must know requirements early in the planning phase and be informed of changes as they
- 51 occur.

52 **Procurement of Assets**

- 53 The supporting CSSE procures assets based on the determination of requirements required to sustain the
- 54 supported unit. Realizing that nearly all consumers tend to overestimate their requirements, the supporting
- 55 CSSE attempts to prevent oversupply by processing procurement actions with realistic quantities.

56 **Distribution of Assets**

- 57 This involves the actual providing of the supported services. This stage has the most critical impact on
- 58 responsiveness, flexibility, and economy of combat service support.

59 LOGISTICS PREPARATION OF THE BATTLEFIELD

- 60 For any given exercise or operation, combat power will begin at nearly zero, and then escalate over time.
- 61 As this combat power increases, the supply support must stay in step with current operations in order to
- 62 provide responsive, sustained support. Any delta between combat power and sustainment is either support

- 63 excess that may be required at another time or place, or the delta could be shortfalls in the required support
- 64 for our combat forces. See Figure 2-1.

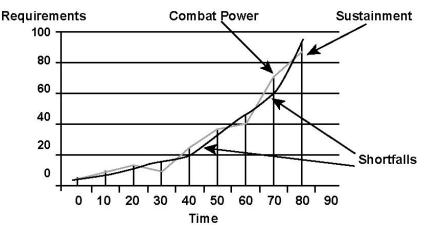


Figure 2-1. Determine Requirements.

66

67 Synonymous with the intelligence community's intelligence preparation of the battlespace, the logistics

preparation of the battlefield (LPB) provides a "picture" of the battlefield, to include the support agencies 68 69

within the supporting sustainment pipeline. This picture will take into account the Concept of Operations, 70 and each CSS functional area. Each functional area has some involvement in supply support. The LPB will

71 identify logistical resources, operational / sustainment requirements, and CSS capabilities and capacities.

72

Commanders use intelligence products to devise workable, flexible plans, make sound and timely decisions, 73

monitor events to ensure proper execution, and modify decisions quickly in response to changing situations 74

or to exploit fleeting opportunities. (MCWP 2-1, Intelligence Operations) Table 2-2 provides a sample of the intelligence requirements of concern to the operational logistic planner. Some of the items a logistic 75

76 infrastructure study helps to identify are:

- 77 Sources of potable and nonpotable water •
- 78 Local communications systems •
- 79 Local transportation means and systems •
- 80 Bridge and tunnel restrictions •
- 81 Inland and coastal waterway capabilities •
- 82 Number and type of road networks •
- 83 Local sources for classes of supply •
- 84 Location and type of power production facilities •
- 85 Medical assistance programs •
- 86 Food distribution networks •
- 87 Transportation, shelter, and care of displaced persons •

Environmental	Threat	Collection Support
Infrastructure	Counterintelligence	Enemy Prisoner of War
	Hostile Activities	
	Hostile Actions	
Weather and Terrain	Medical	Captured Enemy Equipment
Medical	Munitions	

Table 2-2. Sample Intelligence Requirements.

89 METT-TSL

- 90 Mission analysis is the first step in planning. Operational planners utilize METT-T to estimate the situation
- 91 for the commander (See MCWP 5-1, *Marine Corps Planning Process*). Utilizing METT-T as a common
- baseline, logistic and supply planners may find METT-TSL a useful approach to estimating the logistic
 situation in support of LPB.
- 94 M: Mission—See letter of instruction, OPORD, and Annex D.
- 95 E: Enemy—The enemy's capability to interrupt our CSS and the enemy's logistics capabilities.
- 96 T: Terrain and weather—the location of suitable main supply routes, and possible CSS facilities in 97 relation to the combat forces and the supporting agencies within the supply chain. Weather is also a major
- 98 factor.
- 99 T: Troops and support available—status (readiness) of the supported units, status (readiness) of the 100 supporting CSS unit, and the preparedness of unit CSS/logistics personnel.
- 101 T: Time available—the related time between the combat forces and the supporting agencies within the 102 supply chain.
- 103 S: Space—the distance between the combat forces and the supporting agencies within the supply chain.
- 104 L: Logistics—refer to LPB.

105 **Other Planning Factors**

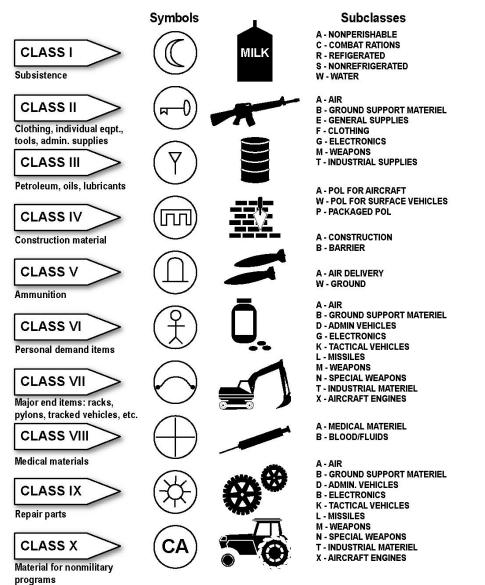
- 106 Historical Data.
- 107 Modeling and simulation.
- 108 Civil Considerations.

109 Security

- 110 The commander of a force cannot normally afford to dedicate combat forces for the protection of CSS units.
- 111 Therefore, CSS units must be prepared to defend themselves against enemy attack. When planning security,
- 112 the following actions must be considered:
- Observation posts should be established to give early warning.
- A perimeter defense should be established when expecting to be stationary for an extended period of time.
- Provisional rifle squads from logistics/CSS personnel should be assigned positions/sectors of fire.
- Vehicles with heavy machine guns should be positioned to cover likely avenues of approach.
- Internal communications should be established.
- On-call targets should be plotted for point defense.
- Position CSS elements near the reserve if possible.

CHAPTER 3 REQUIREMENTS BY CLASS OF SUPPLY

- 3 The sustainment of a MAGTF requires the most detailed and longest forward planning possible. Supply has
- 4 more tasks, concepts, terms, and documents than any other CSS functional area. Supplies are defined as all
- 5 material and items used in the equipment support and maintenance of military forces. For planning,
- management, and administrative purposes, supplies are divided into ten categories, which are known as
 classes of supply. See figure 3-1.



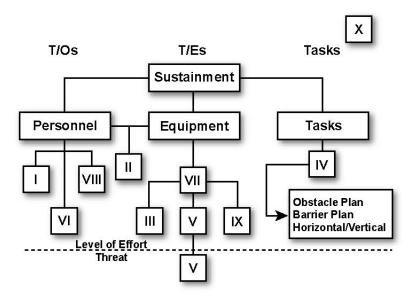
CLASSES AND SUBCLASSES OF SUPPLY

Figure 3-1. Ten Classes of Supply.

1

10 RELATIONSHIPS FOR MATERIAL REQUIREMENTS

- 11 Another way to categorize our classes of supplies is by their relationships with the following areas. See
- 12 figure 3-2.



13 14

Figure 3-2. Material Relationships.

15 Personnel

- 16 Class I (subsistence), class VI (personal demand items), class VIII (medical/dental supplies), and to a
- 17 certain degree class II (individual issue) are associated to unit personnel (T/Os). Subsistence, clothing and
- 18 medical supply requirements are initially based on personnel strengths. Personal demand items are normally
- an individual requirement, and unit strength numbers are used by Exchange personnel to calculate stores
- 20 type items.

21 Equipment

- 22 Class III (POL), class V (ammunition), class VII (major end items) and class IX (repair parts), and to a
- 23 certain degree class II (Individual Issue) are associated to unit equipment lists (T/Es). The number of major
- end items that consume POL are used to calculate both bulk and packaged oils and lubricants, ammunition
- 25 types (Department of Defense identification codes [DODICs]) and quantities (rates) based on ordnance end
- 26 items, major end items define class VII, repair part blocks support this equipment mix. Additionally, some
- equipment is designated as individual issue, per the TAM and T/O (e.g. M9 Pistol (E1250) and M16A2
- 28 Rifle (E1441)).

29 Tasks

- 30 Class IV (Fortification and barrier material) makes up this category. Based on the tasks to be performed for
- 31 example by engineers (breaching and demolition operations, road or facility construction, and barrier and
- 32 bunker construction) will determine unit class IV requirements.

33 CLASSES OF SUPPLY

34 Class I (Subsistence)

- 35 The T/O or troop list is the initial planning tool to determine these requirements. The concept of operations,
- and the associated feed plan will help shape this requirement. The following items will normally be
- 37 calculated within this class of supply.



38 Class

39 Packaged Operational Rations (POR)

- 40 Meals, ready to eat (MREs) are the most common form of POR and used extensively during field
- 41 evolutions. Packaged in flexible pouches, with 12 individual meals (4 rations) per box and accompanied by
- 42 an accessory package. (ME = meal, BX = Box, PAL = Pallet)
- 43 [12 ME/BX, 48 BX/PAL or 1 PAL = 576 ME]
- 44 Ration, Cold Weather
- 45 [36 BX/PAL of 6 Rations/BX or 1 PAL = 576 ME]
- 46 Multi-Faith Meals
- 47 [12 ME/BX, 48 BX/PAL or 1 PAL = 576 ME]
- 48 Vegetarian Meals
- 49 There are three VM available per box of MREs.

50 Unitized Group Ration - Heat and Serve (UGR-H&S)

Also know as tray rations or T-Rats, UGR-H&S are basically meals by entrée, that are packed in a large flat can that resembles a large sardine can. Each of these cans is then heated by tray ration heaters allowing for a heated meal that resembles a meal cooked and served in the unit's field mess using a 10-day menu plan.

54 A-Rations Enhancements

- A-rations enhancements are commonly used to augment PORs to provide variety and additional nutrition
- 56 within the feed plan. This category of rations is similar to the items that can be procured at any grocery
- 57 store. They include refrigerated and freezer goods (example: fresh fruits and vegetables, milk, and bread).
- 58 The menus and list of components are contained in the current editions of MCO P10110.17C, *Marine Corps*
- 59 Nutrition and Menu Planning Manual, and MCO P10110.42A, Armed Forces Recipe Service Cards.

60 Unitized Group Rations-B (UGR-B)

- 61 UGR-B is composed mainly of canned or dehydrated nonperishable foods. They are commonly augmented
- by A-rations enhancements, and are used together to replace PORs within the feed plan. The food service
- 63 community conducts preparations of this type of rations. Substantial planning is required for the re-
- 64 hydration (water requirements) of the UGR-B, food service equipment and personnel, and kitchen facilities.
- The menus and list of components are contained in the current editions of MCO P10110.17C.

66 Calculating DOS

- 67 Calculating DOS is a simple process. If we need to determine the quantity of MREs that we need to have 68 available for a particular operation, the CSSE will need to know:
- 69 Length of the operation.
- Number of Marines that require support
- Feed plan.

- 73 • Support Required: 100 Marines in the field for 9 days of training.
- 74 Feed Plan: 3 MREs/day ٠ 75
 - Daily Requirement = $(100 \text{ Marines}) \times (3 \text{ MRE's})$ ٠
- 76 77

- = 300 MREs/day
- = 1 DOS
- 78 Training Requirement = $(300 \text{ MREs/day}) \times (9 \text{ Days})$ 79
 - = 2,700 MREs
 - If O/H = 2,700 MREs = 9 DOS
- 81 If O/H = 3,300 MREs = 11 DOS
- 82 If O/H = 2,100 MREs = 7 DOS

83 Health and Comfort Pack

- 84 The HCP is classified as a gratuitous item under Class I vice Class VI (personal demand/non military sales).
- 85 An HCP is a Service contingency item designed to provide health and comfort items for male and female
- 86 personnel. HCPs are delivered into theater as outlined in DLA Regulation 4145.36, Operational Rations
- 87 and Health and Comfort Items, or until forward area exchange facilities are established. HCPs are not held 88
- in peacetime as part of WRM. To meet MAGTF deployment timelines, Commander, Marine Corps 89 Logistics Command provides an initial 30-day requirement for HCPs to the Defense Supply Center
- 90 Philadelphia. HCP requirements are calculated/registered during deliberate planning and are based on the
- 91 initial 30 DOS to support the MAGTF.

92 Water

- 93 The T/O is initially used when calculating the amount of water necessary. The T/E is used to determine
- 94 what equipment is available for the storage and distribution of water. Depending on location of the
- 95 operation, the making of fresh water or the procurement of bottled water may be considered. Appendix B
- 96 contains planning factors for water consumption. Some additional factors should be considered:
- 97 • Cooking and cleaning requirements.
- 98 Personal hygiene and laundry. •
- 99 Medical requirements. •
- 100 Enemy prisoners of war. •
- 101 Nuclear, biological, and chemical (NBC).

Class II (Individual Issue) 102

- 103 The T/O and troop lists, T/E, and TAM are initially used to determine what organizational clothing and
- 104 equipment may be required. The concept of operations and the commander's guidance will further focus this 105 requirement.



106

107 Clothing Blocks

108 This block will be constructed, embarked, and maintained normally based on previous deployment usage 109 data.

110 Cash Sales Clothing Block



- 111 This block usually includes high usage uniform items (camouflage utilities, and physical training gear). The
- supply section will collect funds, order resupply, and perform record keeping functions as specified by the
- 113 exchange officer.

114 **782 Gear**

- 115 This block normally consists of high usage individual combat equipment also known as "782 gear." Under
- the central issue facility, the CSSE is responsible for temporary loan of this equipment. The MAGTF CE
- 117 will then determine the appropriate distribution of this gear, if required. MAGTFs that do not operate under
- the central issue facility concept will normally recommend that the individual MSEs to embark small 782
- gear blocks for immediate availability. The CSSE will then store and embark the remainder of the
- 120 MAGTF's 782 gear block.

121 Contingency and Training Equipment Pool

- 122 The MSE supply sections may be required to construct, embark, and maintain necessary contingency and
- training equipment pool cold and hot weather items. These items are normally drawn to support training in
- very hot/desert and cold weather environments, and to support anticipated contingency missions. Cold
- 125 weather packages are normally broken down into individual requirements (those items the individual
- Marines and Sailors will pack and store for themselves during the deployment) and organizational packages
- 127 (those items that the MSE/MAGTF will store and embark in support of particular operations).

128 DSSC Items

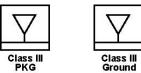
Administrative and cleaning supply requirements are projected using pre-deployment office and barracksusage data.

131 Bill of Material

132 The DSSC items listed above, and specific class IV items are commonly listed as bills of material.

133 Class III (PKG and Bulk POL)

- 134 POLs are expressed in terms of packaged and bulk products. The T/E, equipment density listing (EDL) and
- 135 TAM provide initial planning considerations for fuel requirements based on equipment, type of fuel used,
- 136 gallons per hour, and gallons per day. You must also consider the theater of operations and the
- 137 tempo/concept of operations.
- The major end items are included in multiple TAMCNs, and consume various types of bulk and packagedPOL.
- 140 Storage and distribution capabilities must be considered as opposed to the determined requirements.



141

142 Class IV (Barrier and Fortification)

- 143 The TAM provides initial data on individual construction equipment (e.g., barbed wire, sandbags, and
- 144 lumber). This is further modified by the theater of operation (e.g., urban, jungle, or desert). This
- requirement is then finalized after the tasks are considered that will use this class of supply. Tasks include:
- 146 Obstacle/barrier plans.
- 147 Bunker plans.
- Security and rear area security requirements.
- Horizontal and vertical construction projects.



151 Class V (Ammunition)

152 Information and requirements can be found in MCO 8010.1 for combat expenditure rates. The McBul 8011 153 provides training allowances. The theater of operations, the concept of operations, the EDL, the T/O and the

- 155 provides training anowarces. The theater of operations, the concept of operations, the EDL, the 170 and the troop list must be considered. See figure 3-3. Ammunition requirements are commonly broken down into the following categories:
- Ground Ammunitions—class V (W).
- Aviation Munitions—class V (A); normally determined by the aviation and naval communities.
- Security/Armory Requirements—usually a small requirement that must be considered.
- NonLethal and Antiterrorism Munitions—these type of munitions have recently been introduced to the
 Marine Corps inventory as force protection measures.



CALCULATIO	
	-

Total BA = Basis x BA Total DOA - Basis x DOA x # of Days

Total Requirement = Total BA + Total DOA

Total ft³ = Total Requirement x ft³

Total Weight = Total Requirement x Weight

LEGEND

Basis = number of weapons, kits, sets, billets, units and DODICs BA = basic allowance DOA = day of ammunition ft³ = cubic feet

161 162

167

Figure 3-3. Class V Calculations.

163 Class VI (Personal Demand Items)

164 This class of supply is normally an individual requirement. The MEF/Marine Forces Component G-4's

165 should coordinate exchange type services with MCLB. Ships stores and host nation support are other 166 additional sources of supply for class VI items.



168 Class VII (Major End Items)

169 The T/E, and unit mechanized allowance list and consolidated memorandum receipts, with the addition of 170 temporary loans of equipment and the unit equipment report (UER) provide initial allowances for major end

- 171 items. The EDL ultimately consolidates all the major end items for the MAGTF. The TAM will also
- 172 provide combat active replacement figures for a monthly basis.



173 Class VII

174 Class VIII (Medical and Dental)

175 The T/O and the resultant troop list are the initial planning tools for medical supplies. The concept of

- 176 operations and the geographic location and season will further define this requirement. Authorized medical
- allowance list (AMAL) and authorized dental allowance list (ADAL) are arranged in a modular concept.
- 178 The equipment module contains equipment and reusable materiel required to establish the basic function of
- the module (e.g., operating room). The supply module contains consumable material designed to support
- 180 the function in the treatment of a designated number of casualties or to perform a specific task. For 181 readiness purposes, an equipment module may be stored in combination with its corresponding supply
- 182 module. AMAL/ADALS are maintained and resupplied by the medical logistics company within the FSSG.



183 Class VIII

184 **AMAL**

- 185 Multiple types of AMALs are available to support unit deployments. They come in consumable and as
- 186 equipment blocks. The type and size of AMALs required for a deployment directly reflect the above stated
 187 planning considerations, to include the level of care (facilities and physician support).

188 **ADAL**

- 189 Similar to AMALs in design, they support the dental officer's requirements while deployed. Small unit
- deployments normally keep the bulk of their ADAL requirements as CONUS standbys. See appendix B for further detail on AMAL/ADAL.
- 192 Basic Allowance for Subsistence "Sick Call" Block
- 193 The basic allowance for subsistence "Sick Call" block was once a stand alone AMAL (AMAL 699). It
- remains an independently deployable package of medical supplies for use in daily sick call operations. This
- 195 isn't to be confused with the AMAL 635/635 series that contain the shock/trauma equipment and
- 196 consumable supplies. In concert, these AMALs would form a deployable medical capability to support
- 197 typical MAGTF operations.
- 198 Narcotics
- 199 Narcotics are not always considered as a separate medical block. These highly controlled medicinal
- substances are normally required in bulk, based on the geography/seasons, and the enemy's capabilities (e.g.
- 201 NBC).

202 Class IX (Repair Parts and Secondary Reparables)

- 203 MAGTF commanders are ultimately responsible for the determination of their class IX requirements. The
- 204 unit's T/E and EDL establishes the starting point to identify the equipment that will require class IX support.
- 205 This EDL matched with historical usage data within SASSY, produces the generator package (GENPACK).
- 206 The GENPACK is the computer's answer for class IX requirements for each TAMCN sited within the EDL.
- 207 After the MAGTF reviews the GENPACK and has sited any additional sources of class IX usage data, this

- 208 consolidated class IX requirement is submitted to the local SMU for the building of the class IX Block. This 209 class IX block is normally broken down into the following two categories:
- Repair Parts—consumable parts, batteries, communication wire, and tires, etc.
- Secondary Reparables (SECREPs)—major components to end items that are repairable by appropriate maintenance technicians.



213 Class IX

214 Class X (Non-Military Programs)

215 These supplies are not usually requirements for Marine Corps forces. If required, higher headquarters will

- 216 assign the required levels. Though, not necessarily class X supplies, the following supply support blocks are 217 included/identified:
- Foreign Humanitarian Assistance Block—items necessary to provide local relief to foreign country personnel.
- Wash Down Block—hoses and cleaning supplies that are required to clean the MAGTF's equipment and supplies in order to pass the agricultural inspection that allows the MAGTF to debark at its homeport.



222 Class

Table 3-1 provides estimates for daily, 30 and 60 DOS for a MEF.

	Daily	30 DOS	60 DOS
Class I (stons)	196	5,894	11,788
Class II (stons)	83	2,500	5,000
Class III (P) (stons)	40	1,200	2,400
Class III (B) (gal)	950,010	28,500,300	57,000,600
Class IV (stons)	139	4,183	8,366
Class V (stons)	1,600	48,000	96,000
Class VI (stons)	26	780	1,560
Class VIII (stons)	3	100	200
Class IX (stons)	41	1,240	2,480
Water (gal)	260,300	7,809,000	15,618,000
Stons = short tons			

224

Table 3-1. MEF Daily Supply Requirements.

225 Landing Force Operational Reserve Material

- 226 An additional ready reserve for MAGTFs, particularly MEUs, is the landing force operational reserve
- Material (LFORM). The MEU deploys with up to 15 DOS/DOA for class I, III, IV, and V (A & W). The following parameters constitute an LFORM stock:
- Marine Corps supplies embarked by Navy onto amphibious ships.
- Stored in prepackaged containers.
- Spread loaded to LFORM-capable ships.
- Used only during contingency or extreme emergencies.
- The use of LFORM requires Marine Corps forces level approval.
- LFORM stocks have separate reporting procedures.
- Any use of LFORM will require coordination with the Navy.
- The MAGTF should plan to replenish LFORM at 10 DOS/DOA, and/or the established safety level (S/L).

238 BUILD THE CLASS IX BLOCK

- 239 The primary focus of the class IX block is to provide combat essential repair parts to Marine Corps Ground
- 240 Equipment Readiness Reporting (MCGERR) equipment that is being used for deployment. The block is
- created to provide the immediate availability of parts to deployed units, normally provided in garrison by the
- 242 Supply Management Unit (SMU).

243 Class IX Block Generation

- Accurate identification of deploying equipment is essential when building the Class IX block. The
- supported units submit this equipment list to the supporting supply section as direct input for the block.
- 246 Once the equipment lists are received, the supporting supply section will consolidate them into one
- document and submit it to the SMU. The SMU will use this information to create an initial list of repair
- 248 parts called the GENPACK.
- 249 Once the GENPACK is finished and returned to the supporting supply section, it will be distributed to the
- supported units. The supported units will review the GENPACK to ensure that the necessary parts are
- 251 included. The supported units will also add/delete parts and quantities as required.
- 252 When the necessary requests for adjustment have been made by the supported units, the supporting supply
- section will consolidate the changes and submit them to the SMU. The SMU will then return the adjusted
- 254 GENPACK for final review, before generating the Class IX block.

255 Battery Block

- 256 The GENPACK is the current, accepted medium to start this block review process.
- 257 Unit S-6/communications officers and armory officers in charge should provide detailed input for their
- battery block, include by type, prime and substitute NSNs, and the recommended quantities for each. In this
- case, their input will normally supercede the GENPACK as the authority for the range and depth of batteries. See figure 3.7
- 260 batteries. See figure 3-7.

	15 DOS		LF6F	LF6F						
			3-95	3-95		CE			-	
BATT	NSN	U/I	RO	ROP	ACE	TOT	BLT	MSSG	TOT	RMKS
BA-200	6135-00-643-1310	PG	2	1	9	22	44	6	72	6 VOLT. LANTERN. 12EA/PG
BA-1363	6135-00-577-8309	EA	9	5		0			0	SG-886
BA-1372	6135-00-801-3493	PR				134	375	99	608	SEE BA-5372, KY-XX
BA-1567	6135-00-485-7402	EA	21	12		30		240	270	SEE BA-5567, NVG'S
BA-1574	6135-00-073-8939	EA	10	5		60		36	96	STROBELIGHT
BA-3030	6135-00-835-7210	PG	950	600	15	233	452	314	999	12 EA/PG, "D" CELL, TA-312
BA-3042	6135-00-985-7846	PG	100	60		30	36	12	78	12EA/PG, "C", TA-838
BA-3058	6135-00-985-7845	PG	100	60		112	122	20	254	"AA", 24EA/PG, KL-43
BA-3090	6135-00-900-2139	PG	25	15		34	35	3	72	12EA/PG, 9 VOLT
BA-4386	6135-00-926-8322	EA	885	500	9	37	40	6	83	SEE BA-5590, PRC-77
BA-5372	6135-01-214-6441	PG	20	10		64			64	
BA-5567	6135-01-090-5365	EA	500	250		160	1,464		1,624	NVG
BA-5588	6135-01-088-2708	EA	200	150		0	1,530		1,530	SEE BA-1588, PRC-68
BA-5590	6135-01-036-3495	EA	2,500	1,500	189	2,384	3,723	1,026	7,133	SEE BA-4386, SABER RADIC
BA-5598	6135-01-034-2239	EA	475	300		121	20		141	PRC-77
BA-5600	6135-01-168-2944	EA	50	30		110	267	30	407	PSC-2/3 DCT
BA-5800	6665-99-760-9742	EA	75	50		515	468		983	PLUGGER, GPS
BA-5847	6135-01-090-5364	PG				45			45	12 EA/PG
LS-6	6135-01-301-8776	EA	30	20		8			8	PLUGGER REFILL
3-VOLT	6135-01-351-1131	EA				390			390	BA-3090 ?, MP5, NIKON
LITH, D.	A 123A DURACELL									
	6135-01-382-9205	EA				0		30	30	9V ALKALINE
	6135-00-826-4798	PG				0			0	"AAA"

Figure 3-7. Example 15 DOS MEU Battery Clock.

Prior deployment consumption is an excellent means to "check and balance" the next deployment's recommended figures.

265 Unit supply officers should take special note of the U/I. Misinterpretations of quantity requirements 266 commonly come from U/I mismatches.

267 Echelonment

Units aboard ship practice some level of layering stocks, or echelonment. Echelonment is the preplanned provision or positioning of resources to ensure uninterrupted logistics support. The Sigonella Initiative is an example of echelonment. A combined effort by II MEF, Naval Air Station (NAS) Sigonella, and DLA, approximately 5000 repair part and SECREP line items, class I subsistence and select contingency and training equipment pool equipment has been prestaged at NAS Sigonella. This initiative provides an additional layer of stocks outside the supporting MSSG, to provide responsive support in theater.

274 Receiving/Preparing the Class IX Block for Embarkation

275 Once the Class IX block is created, the supporting supply section will receive it, conducting a thorough

inventory. The parts will be put on location in the appropriate containers for embarkation. The containers

should provide for the easy access and retrieval of repair parts while on deployment.

With the Class IX block in containers, embark space requirements must be submitted. Keep in mind that the block is not complete at this time. Additional containers and embark space must be considered for parts that were placed on back-order when the block was created due to insufficient stocks at the SMU.

- 281 The Class IX block should be embarked so that the repair parts are co-located with the corresponding
- equipment (i.e. tank parts are embarked on the same ship as the tanks). This should be the goal as long as

- 283 accountability and management are maintained. This practice reduces the risk in the event supplies located
- 284 on another ship become unavailable. The tailoring and echelonment of equipment and supplies will
- 285 normally require the correct personnel mix to match the maintenance and supply efforts.
- 286 The idea is to have the right stuff, in the right place, at the right time up front in the embarkation plan, to 287 ensure responsive supply support.

288 MANAGING THE CLASS IX BLOCK

289 For an MSSG, the stockage objective should be to support 15 days of operations or 15 DOS. The MSSG 290 should have O/H or O/O 15 DOS for any particular widget (NSN). [Remember: an MSSG will deploy for 6 291 months. However, the MSSG is expected to deploy with 15 DOS of class IX supplies. The sustainment 292 pipeline will facilitate the O/O portion of the RO definition (O/H or O/O).]

293 RO = O/H + O/O [Max desired quantity of an NSN]

or

$$(S/L)$$
 + Lead Time Qty (OST)

296

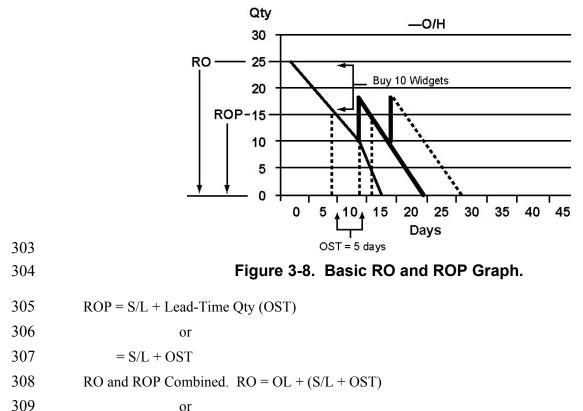
$$297 \qquad \qquad = OL + S/L + OST$$

298 An ROP is the point at which replenishment of stocks must be initiated in order to ensure that replenishment 299 shipments of stocks arrives before the remaining stock is depleted. In other words, the ROP for a particular

300 NSN is the "magic number" that turns on a buy up to the RO that ensures this net buy quantity is received

301 before the remainder of the stocks are depleted. For fast moving NSNs (those NSNs that have high usage),

302 this cycle will repeat itself often. See figure 3-8.



or

- 310 = OL + ROP
- ** The order ship time/shipping time is the time (in days) elapsed between the initiation of a stock
- 312 replenishment action for an item of supply and the receipt of that item by the activity. Simply, it is the time 313 it takes a supply section to order a part and then receipt for that same part. OST is a key component to 314 customer wait time or logistics response time, which includes repair cycle time.
- 314 customer wait time or logistics response time, which includes repair cycle time.
- OST directly effects O/H and O/O stocks. The longer the time between when a NSN is placed O/O and that NSN is received (OST) the greater the O/H or RO stocks may be. If the OST increases, and the RO and
- 317 ROP are not adjusted accordingly, stock outs for that NSN will occur.
- 318 If the RO and ROP are properly established and managed as opposed to the OST, stock outs should not
- 319 occur. In other words, the CSSE should remain responsive to the MAGTF's requirements. In the following
- 320 example, as the O/H stocks decrease over time due to customer requirements, the O/H stocks eventually
- 321 reach the ROP. At this time, a requisition would be produced (manually or automatically: requirement code
- dependent) for 10 widgets (the quantity gap between the RO and ROP). If the OST is 5 days, then the B/O
- 323 quantity of 10 widgets arrives in time prior to a stock out. The process then repeats itself.

324 Order Ship Time

- 325 If the RO and ROP were not properly established and/or managed, stock outs will most likely occur. If the
- 326 OST were to increase beyond the expected range, and the RO and ROP were not adjusted to match this
- 327 lengthy OST, then over time as customer requests are received, the 10 widgets that were placed on B/O will
- 328 not arrive in time. These stock outs will cause the CSSE to go into an NIS status for this widget, thus
- 329 lowering (to zero) the CSSE's responsiveness to the MAGTF.

330 Demand Rate

- 331 Stock outs can also occur if the demand rate (increased customer consumption) is greater than the
- established RO and ROPs. If this increase demand rate is not captured by the CSSE, the CSSE will quickly
- become NIS for this item. Even if the OST is reasonable, the increase demand rate works against the O/H
- quantities and the associated RO and ROP in the same way if the OST were to suddenly increase.

335 Safety Level

- 336 One means of circumventing stock out/NIS situations is to establish a S/L for particular NSNs. In the event
- the OST or demand rate increases, this S/L should initially accommodate these increases. However, the
- 338 CSSE should quickly ascertain these increases, and make the appropriate modification to the stockage levels
- 339 (RO and ROP, S/L). In the example below, the S/L "bought time" to allow the 10 widgets to arrive in time
- before a stock out. However, from this example, as this cycle increases, the likely hood of a stock out
- increases without any additional management by the CSSE.

RO and ROP Complete Picture

- 343 Simply increasing the safety level appears to be a good answer for most of these situations. For the most
- 344 part, this may be true. However, increasing the S/L has additional implications. By increasing the safety
- level, by definition, the RO and ROP will increase [ROP = S/L + OST; RO = OL + (S/L + OST) = OL + OST
- 346 ROP]. See figure 3-9.

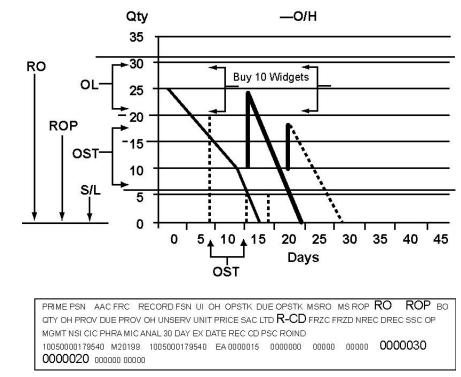


Figure 3-9. Complete RO and ROP Graph.

As the quantity increases for a particular NSN, the physical space requirements increases (embarkation), the management (personnel/files) for this NSN increases, and the cost of this line items effects the total cost of the block. Incorporating all these facets, begins to speak to total ownership costs. If S/L were simply increased across the board, then the total ownership cost of the block would increase in kind.

increased across the board, then the total ownership cost of the block would increase in kind.

353 In the below example, the S/L of five widgets increase the RO and ROP in kind. The net OST has been

translated into a physical quantity requirement. A fixed RO and ROP (1MSG) would not account for

355 changes or mistakes in calculations of OST and demand rate, and stock outs could occur. On the other hand, 356 if a variable requirement code (3AAA) were to be established, then OST would be incorporated by default

if a variable requirement code (3AAA) were to binto the widgets RO and ROP.

358 In either case, the CSSE will have to balance the management responsibilities within either scenario, as

359 opposed to the workload (effort) during the formulation of the block.

2

CHAPTER 4 SUPPLY SUPPORT

- 3 Once supply support is transferred ashore, there must be an established process for the flow of supplies from
- 4 the appropriate source to the consumer. The beginning of the supply flow is when consumers submit

5 requisitions. The consumers must know at what point to order supplies so that they do not have shortages.

- 6 The consumer must also order the correct quantity of supplies to prevent excess of on hand supplies, which 7 hinders mobility. Likewise, the supply sources (CSSE/CSSD) ashore will have to establish the means of
- 8 transporting the supplies for distribution and replenishment. This chapter will discuss ground supply
- 9 operations ashore and the supply knowledge required to sustain operations ashore.

10 SUPPLY OPERATIONS

- 11 In general, the organic supply source for ground units is at the battalion level and for aviation units at the
- 12 aircraft group level. Current Marine Corps/Navy directives and SOPs will dictate the specific procedures
- 13 that units use to request resupply.

14 CSSD Support

15 Simple, locally established manual procedures are the norm for initial requests from users. On receipt of

- 16 user requests, the supporting CSSD determines if the item is on hand. If the item is available, the CSSD
- 17 transports it to users with unit distribution, when possible. Consumers on supply point distribution are
- 18 notified where and when they can pick up the item. If the item is not on hand, the CSSD passes the
- 19 requisition to the next higher level for requisition. There is likely to be a transition period when both the
- 20 CSSE and CSSDs use manual supply processing procedures.

21 CSSD/CSSE Interaction

22 The CSSE receives requisitions from the CSSD or, in some instances, directly from the user. The CSS

- agency uses formal procedures both for stock replenishment and for passing unfilled user requests to the
- 24 CSSE. Where possible, CSSDs in direct support of consumers use automated systems to pass both
- 25 requisitions and reports to the CSSE. During the early stages of an operation, the likelihood of the CSSE
- 26 having data processing capability ashore to process automated requisitions is low.

27 CSSE Requisitions

- 28 When the CSSE cannot fill the requisition, it either back orders or passes it on to in theater sources. The
- 29 CSSE passes requisitions to these sources rather than to CONUS depots. Marine Corps user manuals and
- 30 MAGTF OPORDs will establish specific supply procedures for an operation.

31 **CSSE Supply Transportation**

- 32 The CSSE normally provides the transportation to deliver supplies and equipment to its subordinate CSSDs.
- 33 Selection of the mode of transportation is the CSSE's responsibility. Surface transportation is the norm;
- 34 however, water or air transportation may be used, when available. Although the consumer does not select
- 35 the mode of transportation, his request should contain the urgency of need and any information that might

36 influence the mode. For example, if the tactical situation requires rapid ammunition resupply, the use of air

delivery may be essential.

38 TRAIN CONCEPT

- 39 The train concept is a means of internally task-organizing and employing the organic CSS assets of tactical
- 40 units. Trains serve as the link between forward tactical elements and the supporting CSSE. The use of trains
- 41 enables CSS to be performed as far forward as the tactical situations permit. Depending on the situation,
- 42 trains may provide combat service support to units organic or attached to the battalion, and/or be fully
- 43 mobile. However, trains are usually movable rather than mobile. In the Marine Corps, this concept equates
- 44 to regimental, battalion, and unit trains.

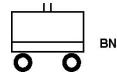
45 Regimental Trains

- Regimental trains consist of CSS assets required to sustain the regimental headquarters and any other units,
 organic or attached, to the regiment. Regimental S-4 manages—
- 48 Supports regimental headquarters company commander
- 49 Could be consolidated with battalion field Train or MCSSD
- 50 CSS resource here are not time crucial



52 Battalion Trains

Battalion trains support battalion-sized units. This concept improves responsiveness, flexibility, and
 survivability against attacks. The battalion trains are broken down into combat and field trains.

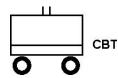


56 Combat Trains

- 57 Combat Trains are organic elements, which provide critical CSS in forward areas. These trains usually
- 58 include handling of rations, fuel, ammunition, critical repair parts, maintenance contact teams, and battalion 59 aid station. These trains are usually made up of the organic vehicles in the battalion.
- 60 S-4 Controls
- 61 24 hrs of supplies: I, III, V, selected medical/maintenance
- 62 Forward BAS with ambulance teams
- 63

51

- 63 Maintenance contact teams
- Follow in trace
- 65 Organic/attached security
- Mobile: responsive and survivable



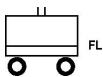
68 Field Trains

67

76

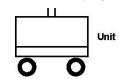
81

- 69 Field trains consist of the remaining CSS elements, and are located further to the rear. These trains include
- the mess, supply, motor transport sections, and remaining CSS that are not in the combat train. Organic
- vehicles of the same combat units are more vulnerable and require more security. Field trains are normally substantially heavier, and slower moving on the battlefield.
- S-4 located (could be headquarters and service company commander, S-4A, supply officer)
- Remaining CSS of unit: BAS, mess section, Supply section w/supplies, Motor transport, NBC, ammunition section



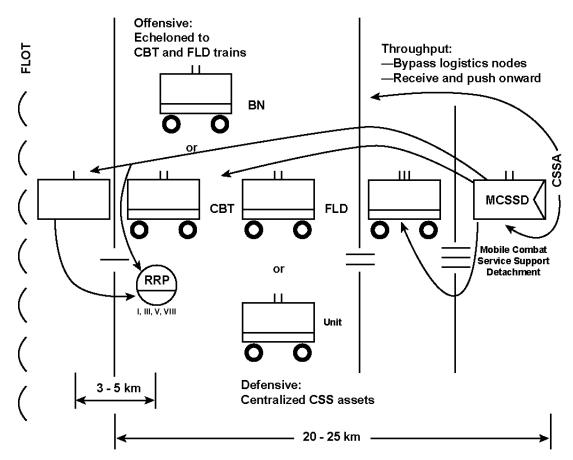
77 Unit Trains

- 78 Unit trains centralize the supported units CSS assets under the control of the commander. Unit trains are
- 79 most appropriate in defensive, slow moving, or static situations. This provides simplicity, economy, and 80 survivability against ground attacks.



82 **Positioning Considerations for Trains**

- Responsiveness and survivability should be the main consideration when selecting a train site. See figure
 4-1. In general, trains should be located:
- 85 On defensible terrain.
- 86 In an area that allows dispersion of vehicles and activities.
- In area that provides concealment from enemy observations.
- On firm ground that supports heavy vehicle traffic.
- Near suitable landing zone.
- Close to main supply routes.
- In an area that allows good communication with all other elements.



92 93

Figure 4-1. Positioning of Logistics Trains.

94 COMBAT SERVICE SUPPORT OPERATIONS CENTER

95 The CSS operations center (CSSOC) is the agency within the structure of the CSSE and subordinate CSS

96 units that controls and coordinates the day-to-day operations of the CSS organization. The CSSOC is

97 established in the command post of the CSSE and is operated by the G-3/S-3.

98 Purpose

99 The CSSOC supervises the execution of the CSSE commander's decisions by continuously monitoring and

- 100 recording the status of CSS operations. This continuous monitoring and recording is accomplished by G-
- 101 3/4, and S-3/4 watch officers/chiefs and detachment liaison officers. MAGTF operations are monitored
- 102 within the CSSOC via communication / information nets, requests for CSS support, the continuous updates
- to personnel / equipment status boards, and the update of map boards. Normal functions of the CSSOC are
- 104 detailed in MCWP 4-11, *Tactical-Level Logistics*.

105 **Responsibilities**

- 106 The following are the normal CSSOC responsibilities:
- Focus on meeting the needs of the supported units.
- Continually monitor and record the status of CSS operations.
- Supervise the execution of the CSSE commander's decisions.

- Operate 24 hours per day during combat operations.
- Control the CSS request net(s), CSSA local net(s), hot lines, and teletype/data links.

112 Arrangements

- 113 The commander may choose either a centralized or decentralized CSSOC. Centralized control and
- decentralized execution are ideals sought in logistics support operations where a balance between
- 115 centralization and decentralization is difficult to achieve. An optimal mix of centralized control and
- 116 decentralized execution will be based on the circumstances. For further detail on centralized or
- 117 decentralized CSSOCs, see MCWP 4-11.

118 Rapid Request

- All CSS is normally requested via the CSSOC using a rapid request. The format for the rapid request is
- 120 normally specified in the CSSEs local SOP and should be made available to all supported units. To save
- 121 time, the CSSOC can direct that an abbreviated line format be completed for the specific CSS being
- requested (only applicable lines or paragraphs be completed). Brevity codes may also be used to save time
- in processing requests. The abbreviated line format and brevity codes make transmission of the rapid
- request via the radio much easier and faster. It is imperative that all required information (as specified by
- 125 the CSSE SOP) be provided on the rapid request in order to move effectively provide the requested CSS.
- 126 Refer to Appendix D for an example copy of a rapid request.

127 Routing

- 128 All rapid requests, both internal and external to the CSSE, will be submitted to the CSSE operations officer.
- 129 Upon receipt, the rapid request will be assigned a sequence number and logged into an established tracking
- 130 system. The rapid request will then be forwarded to the CSSE detachment that provides that CSS function.

131 *Files*

- 132 The CSSOC will maintain the following rapid request files:
- **Pending Rapid Request File.** Contains all requests that have not been completed.
- **Completed Rapid Request File.** Contains all completed requests. A rapid request is completed when the requested CSS has been provided and the action CSS detachment has notified the CSSOC.
- Canceled Rapid Request File. Contains all requests that have been canceled either by the requester or
 the CSSE Operations Officer.

1CHAPTER 52SUSTAINMENT PIPELINE

The sustainment pipeline is the 'life's blood' for our deploying MAGTFs. Though each MAGTF
 deploys with its required DOS/DOA, based on size, embarkation space and unknown variables
 necessitate a responsive and flexible sustainment pipeline. This sustainment pipeline supports

6 two-way traffic between the CONUS and outside CONUS (OCONCUS) for supplies, cargo,

7 equipment and personnel.

8 MEF SUSTAINMENT PIPELINES

9 CONUS/OCONUS Sustainment Pipelines

10 For II MEF MAGTFs (MEUs), sustainment (supplies, equipment, and personnel) are routed

11 through both the aerial and seaports of embarkation (aerial port of embarkation (APOE) and sea

12 port of embarkation SPOE)) at Norfolk, VA. The Navy also uses these sustainment channels. In

13 fact, it is the Navy who generally establishes and works these channels. East coast MEU's

14 pipeline is extended to the Mediterranean area of operations, where they commonly operate

15 during deployments. See appendix A for existing sustainment pipelines.

16 High priority requirements are funneled through the APOE, and placed on scheduled Air Mobility

17 Command (AMC) flights destined for Europe debarkation logistic nodes. For aerial deliveries,

18 weight, cube and hazardous materials are significant considerations before any movement.

19 Deliveries via air transportation usually range from 8 to 14 days (OST).

20 Low priority requirements (less personnel) are funneled through the SPOE, and placed aboard

21 naval and commercial vessels destined for Europe. Deliveries via surface transportation usually

22 range from 30 to 90 days. Supply chain managers must be aware of these time frames if supplies

- are place on backorder with less than 02 priority.
- 24 Both aerial and surface shipments arrive at their respective aerial and seaports of debarkation
- 25 (APOD and SPOD) in NAS, Rota, Spain, or NAS, Sigonella, Sicily. While the MEU is deployed
- in the western portion of the Mediterranean Sea, Rota will be the APOD/SPOD. And while the
- 27 MEU operates in the eastern portion of the Mediterranean Sea, Sigonella will be the
- APOD/SPOD for the MEU. Therefore, some of the scheduled flights will reach Sigonella via
- 29 Rota, while others will be direct flights.
- 30 Additionally, a TMO Marine has been assigned to Sigonella for a 3-year tour to act as an
- 31 expeditor. This Marine plays a key role in ensuring personnel (PAX); cargo and material (PCM)
- 32 are routed expeditiously to the MEU. The ACE will dispatch a Marine to act as their expeditor

33 for aviation specific supplies, while the ESG's general purpose and multipurpose amphibious

34 assault ships will also have an expeditor for Navy specific supplies. This team of three will work

- 35 together to expedite PCMs to the ESG/MEU.
- 36 If the MEU is within helicopter ranges (legs), the HC-4 detachment located at Sigonella will
- perform resupply operations at sea. The MEU will also dispatch helicopters to make PCM flightsas well.
- 39 Those items that went by surface, were lower priority, or could not fit or weigh out a helicopter
- 40 will be forwarded to the MEU via Naval combat logistics force ships. United States naval ships

- follow in trace of the ESG and the carrier battle group and provide the bulk of the group's heavy
- 42 resupply at sea.
- 43 For those times when the MEU/ESG is too distant for helicopter "drive-by resupplies," the
- 44 MEU's expeditor will forward supplies on the next available air frames to the MEU next exercise
- 45 and/or liberty port. This flight support program is known as "FISDU," or flights in support of
- 46 deployed units.
- 47 The Uniform Movement and Material Issue Priority System (UMMIPS) provides the common
- 48 prioritization methods, response time frames, and establishes time measuring and evaluation
- 49 standards for all standard requisition. The priority designator is based upon a combination of
- 50 factors that show the mission of the requisitioner (F/AD) and the urgency of need of the end use
- 51 (urgency of need designator (UND)). See figure 5-1. These two numeric digits influence the
- 52 urgency of need as established by the customer, maintenance and supply organizations. See
- 53 appendix A for additional F/AD/UND descriptions.
- 54

	UMMIPS Priority Designator Matrix Urgency of Need Designator (UND)		
Force/Activity Designator	А	В	C
I	01	04	11
II	02	05	12
III	03	06	13
IV	07	09	14
V	08	10	15

Category Code (CC)	UND
М	A, B
Ν	С
Р	A, B
X	В
C	A, B, C
Note: if A and B are selected for CC – "C", then a M, X, or P must also be open	
F, H	A, B
К	A, B, C

56

Figure 5-1. UMMIPS Priority Designator Matrix.

57 **I MEF Pipeline**

58 On the other hand, I MEF initially provides support to their MAGTFs (MEUs) from the west

59 coast to sequential ports of opportunity in the Pacific. However, once the MEU extends its

60 pipeline, and arrives on station in the Persian Gulf, its sustainment pipeline turns back onto itself,

61 and is extended across the United States to Norfolk. At that point, the west coast MEU's supplies

62 are funneled through the same pipeline that the east coast MEUs use.

- 63 The one notable difference is that their sustainment pipeline must be extended to their theater of
- 64 operations, the Persian Gulf. Some direct flights arrive in this region from CONUS, but the
- remainder makes stops at both Rota and Sigonella, or some other POE in Europe.
- 66 The west coast MEUs/ESGs set their expeditors into the Administration Support Unit (ASU),
- 67 Manamah, Bahrain. In this case, these expeditors perform the same functions as their
- 68 counterparts in the east coast MEUs/ESGs.

69 III MEF Pipeline

- 70 The sustainment pipeline supports III MEF and its forward deployed units in a similar fashion.
- 71 Generally, most deliveries are made directly from the west coast of the United States to Okinawa
- 72 (Naha port and airfield facilities). For units operating in Korea for any length of time, the CSSE
- 73 will normally establish an expeditor to facilitate the movement of parts and supplies to the
- supported units. Other units operating within the Pacific Rim could establish Expeditor sites in
- Australia or Singapore, for example. The length of the operation normally dictates if back orderswould be handled on a "fill or kill" basis.
- The Norfolk SMU sustainment A/ SPOE is Dover, DE: DLA/sourse of supply (SOS) APOE and
 Charleston, SC: DLA/SOS SPOE.

79 Sustainment Pipelines in Reverse

- 80 Marines within the MEU are constantly returning to CONUS for emergency leave, they are
- 81 traveling TAD to and from CONUS and within theater, and on rare occasions they are sent home
- 82 due to severe sickness or injury. SECREP carcasses are also sent back through this channel, as
- 83 required.

84 Transportation Account Codes (TAC) Addresses

- Equipment and supplies reach their respective designations via the TTAC addresses assigned to
 each unit (e.g., AAC/RUC).
- 87 The TAC 1 address is the postal address for the command and their particular ship. Parts and
- supplies small enough and light enough will normally come through the mail system, right along
- 89 with official and personal mail. The MSE supply sections can expect to receipt vast quantities of
- supplies in this manner, and should make each and every "mail call" on ship. This address is
- 91 normally modified to the deployed address approximately 30 days before deployment, and then
- 92 changed back to the MSE's garrison address approximately 20 to 30 days before the MEU's return
- 93 to CONUS.
- 94 The TAC 2 address is the freight address for the bulkier items. Again, this address is related to 95 the particular ship that the supply section desires to receipt for those supplies. At times, the
- 95 the particular ship that the supply section desires to receipt for those supplies. At times, the 96 CSSE supply section will receive these supplies during a re-supply at sea, and in many occasion
- 96 CSSE supply section will receive these supplies during a re-supply at sea, and in many occasions 97 they will be received pier side during an exercise or liberty port visit. Again, the MSE supply
- 97 they will be received pier side during an exercise of liberty port visit. Again, the MSE supply 98 sections should ensure they are on sight for each of these deliveries. This address is normally
- 99 modified to the deployed address approximately 30 days before deployment, and then changed
- back to the MSE's garrison address approximately 20 to 30 days before the MEU's return to
- 101 CONUS.
- 102 The TAC 3 address is the financial address for any deliveries of financial information/bills to
- 103 DFAS. This address should not be changed while in garrison or deployed. For example:
- 104 TAC 1: COMMANDING OFFICER
- 105 BLT 2/6 (ATTN: SUPO M12120)

106	UNIT 72191	
107	FPO AE 09502-8851	

108	TAC 2: CO BLT 2/6 (ATTN: SUPO M12120)
100	NAC SICONFLLA (DI DC 452)

- 109 NAS SIGONELLA (BLDG 452)
- 110 MF: USMC BEACH DET
- 111 GELA SIGONELLA SICILY
- 112 TAC 3: DFAS
- 113 KCC CODE ALO
- 114STREET ADDRESS

115 This information is also transmitted to NAVTRANS to update the cargo routing information file 116 database. This is a master database that lists each of the Navy's ships and unit locations. The 117 cargo routing information file needs to be updated along with the Defense Automatic Addressing

118 Support Center (DAASC) for the routing of supplies to your destination. The DAASC is an

- automated system for tracking requisitions throughout the cycle to provide immediate visibility
- 120 into the location and current status of a requisition.

121 Worldwide Express (WWX/WWXII)

122 WWX/WWX II has become a reality for Marine units deployed. WWX/WWX II was established

123 to augment the AMC airframes that were being retired. Federal Express (FedEx(r)) and Dalsey,

124 Hillblom and Lynn (DHL) Worldwide Express have been given responsibility for the European

125 theater of operations, while FedEx(r) and United Parcel Service have been given responsibility

126 for Africa/South West Asia theaters of operation. In either theater, IMMs and the SMU can

127 forward supplies (less than 150 pounds, each) door-to-door, passing through customs, and

128 provide real time in-transit visibility (ITV) in less time than our fastest shipments can be

delivered via AMC. This ITV is available via the respective carrier web site and the shipment

130 number, and the associated transportation control number is fed into the military's Global

131 Transportation Network for similar ITV. If OST continues to drop, the on hand stocks "Iron

132 Mountains" that our MAGTF's currently deploy with could be reduced in kind.

133 SUPPLY SUPPORT CYCLE

134 The above process continues to work for the entire MAGTF (MEU). Locations of supported

units, level of hostilities, locations of the logistics trains and other CSS elements, and the

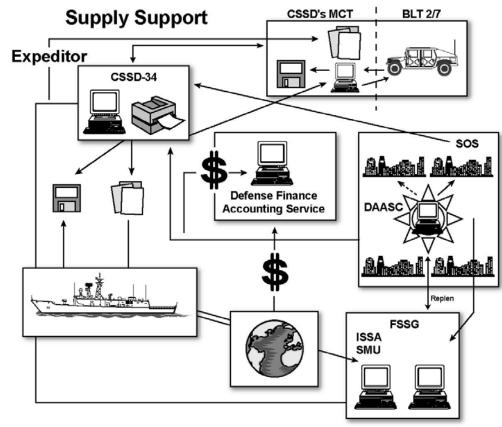
136 communication pipes will directly effect procedures for any given deployment. The above

137 procedures, in conjunction with the CSSOC and tactical-logistical group functionalities, will

138 produce responsive across the CSS spectrum.

139 Having established a sound and responsive sustainment pipeline, the next challenge is to map the

140 supply support processes. See figure 5-2.



141 142

Figure 5-2. Supply Support Process.

143 **Request Process**

The request process or procedure is fairly simple. Using the "broken HMMWV" analogy, BLT
 2/7 has recently landed in country (Korea), and is experiencing problems with a HMMWV.

146 The BLT dispatched a two MT mechanics to the site. The HMMWV is, in fact, "broken" and is 147 now reported combat deadlined for the infamous widget. This requirement is forwarded to the

BLT's supply section. The supply section performs their appropriate T&R, inducted the

requisition, ran a daily cycle, and produced a courier diskette with the widget document.

150 CSSD-34 accepts the diskette either by courier (a Marine) or via e-mail. The MSSG immediately

processes the requisition against their class IX block. In this case, the infamous widget is NIS.

- 152 The MSSG then forwards, via e-mail, the BLT's document to the SMU to fill. The MSSG will
- then forward a naval message to the FSSG/SMU/deployed support unit (DSU) citing the 02
- 154 priority document for the widget.

155 **DSU Support**

- 156 Following the scenario, the DSU receives this 02 priority document, and performs a stock
- 157 check/walk-thru for the part. Unfortunately, the SMU is NIS as well for the widget. DSU then
- 158 inducts the documents on a courier diskette into that night's daily cycle, and the requisition is
- 159 passed to the source of supply, via the Defense Automated Address System. Generally, the DSU
- 160 will reply via e-mail and naval message as to the status of this requisition.
- 161 The resultant DGA from the 4-card/Z01 will reserve/obligate RA funds against the BLT's
- 162 Standard Accounting, Budgeting, and Reporting System records.
- 163

163 Shipment Process

- 164 That next day, the IMM processes the document for immediate shipment. Per the TAC 1 address 165 (an alternate version for a TAC 1 address), the part will be shipped to:
- 166 USS Navy Ship (VXXXX)
- 167 CO BLT 2/7, 31st MEU
- 168 MF: SupO, BLT 2/7
- 169 FPO AP 09534-1662
- 170 The Navy and the ACE (aviation specified equipment and supplies) use "V" AAC/RUC's to order 171 as compared to USMC units "M" series AAC/RUC's.
- 172 This part is sent via AMC (WWX was not available to ship to Korea). This part will then arrive
- 173 at Pohang, South Korea, where the ESG and MEU have placed their expeditors. The expeditors
- 174 will forward this part to BLT 2/7 as soon as possible.
- The supply officer for BLT 2/7 will then receipt for the part, and forward the widget to the MT mechanic to "hang onto" the HMMWV.
- 177 The resultant DG6 from the 8-card/D6T/1 will expend/liquidate the associate RA funds.

178 **Resupply at Sea**

- 179 While underway, the ESG will conduct numerous resupply at sea operations. Some of the "hits"
- 180 come directly from the helicopter support coordinated by your expeditor out to the ships, the ACE
- 181 helicopters making runs to the expeditor's location, or by the supply ships and their fleet of
- 182 helicopters or via a direct hook up.

CHAPTER 6 LOGISTICS MODERNIZATION

3 In the fall of 1998, the Marine Corps began an aggressive effort to transform its discrete

4 functional techniques, procedures, and aged information infrastructure into an integrated,

5 responsive, logistics chain supported by state of the art technology. The goal was to create a

6 robust, responsive, agile logistics chain and support infrastructure that would exponentially

7 increase the mobility and sustainability of Marine Forces.

8 The first challenge was developing future "to be" logistics chain processes to meet the approved

9 goal. The "to be" logistics operational architecture (OA) provides a Marine Corps-wide,

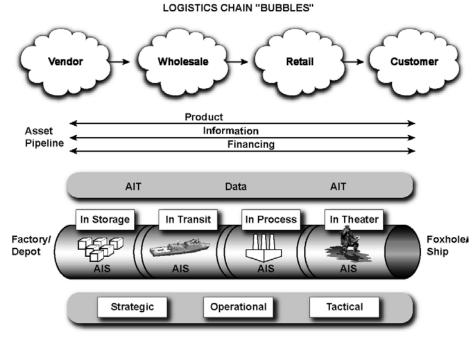
10 integrated view of the logistics chain focused on fulfillment of the demands for products and

11 services generated by the warfighter (supported unit). It is based upon selected industry standard

12 best practices and performance measures, and tailored to the expeditionary nature of operations

13 across the Marine Corps. The fundamental benefit is the opportunity to provide focused CSS to

14 the MAGTF. See figure 6-1.



15 16

1

2

Figure 6-1. Logistics Chain.

17 LOGISTICS CHAIN OPERATIONS

18 The Marine Corps logistics chain combines characteristics of a retail network and wholesale

19 distributors with the management of a post manufacturing capital asset intensive inventory

20 including responsibility for the maintenance, repair and overhaul of those assets. The retail

21 network currently manages roughly 44,000 NSNs worth \$1.5 billion in inventory yearly of which

22 approximately 4,000 NSNs worth almost \$500 million are reparable. The Marine Corps owns,

23 operates and maintains in excess of 6,500 different types of capital equipment worth in excess of

24 \$40 billion of materiel with maintenance cost exceeding \$175 million a year. There are

- approximately 4 million transactions processed annually of which 70 percent relate to financial
 and asset management. The extended logistics chain includes thousands of suppliers.
- 27 The Marine Corps organizes around five elements: the ground combat element, aviation combat
- 28 element, combat service support element, command and control element, and supporting
- 29 establishment (fixed infrastructure/bases and stations). Today, the logistics chain provides
- 30 materiel support, other than aviation unique assets, to all of those elements. The five elements are
- 31 arrayed at over 12 fixed locations (bases or stations) in the United States and several in the Far
- 32 East. The supported unit or customer base exceeds 200,000 Marines (customers) of the logistics
- 33 chain processes. Approximately 50,000 plus Marines and Civilians participate in the logistics
- 34 chain as a provider.
- 35 The Marine Corps task organizes various units from the five elements in order to assemble a
- 36 capability to meet the combatant commanders requirements. The end product of the task
- 37 organization is a MAGTF. A MAGTF includes logistics elements that plan and execute the final
- 38 nodes (last tactical mile) of the logistics chain. Further task organization requires the temporary
- 39 reassignment of people and assets to create the new force. The situation may dictate the
- 40 movement of assets between units.
- 41 Instrumental to the last tactical mile of the logistics chain is the capability to provide materiel and
- 42 service support to the MAGTF outside the fixed infrastructure (bases or stations). In other words,
- 43 Marines must be prepared to react to "worst case" logistics chain management first. Solving the
- 44 "worst case" or deployed scenario, makes the transition to a base or station scenario with robust
- 45 infrastructure easier. These are not two separate logistics chains; there are changes in
- 46 communications links, capacity, and infrastructure that challenge the process. This means
- potentially extending the existing supply chain into undeveloped environments without robustinfrastructure.
- 49 The nature of our existing processes and information technology do not support transformation.
- 50 common processes or enterprise integration. Moving the Marine Corps away from the antiquated
- 51 processes and technology and transforming to a logistics chain with common, flexible, and
- 52 integrated processes across the spectrum of operating environments is tantamount to the future.
- 53 Business process re-engineering (BPR) and information technology are key elements to this
- 54 transformation.
- The following are Department of Defense (DoD) transformation initiatives that factor into thelogistics modernization effort:
- Paperless acquisition and electronic signature management.
- Streamlined acquisition using best practices as proposed by the EI toolkit.
- Consolidation and centralized management of secondary reparables.
- Realignment of echelons of maintenance for MAGTF deployed operations.
- Eliminate and automate selected supply functions.
- 62 Streamline distribution process.
- Realign processes to support an end-to-end logistics chain.
- Align financial management and inventory management process to support national inventory.
- Management strategy.
- Redesign training initiatives to support commercial off the shelf (COTS) applications.
- Institute portfolio management procedures to adjudicate investment decisions.
- 69

69 **BUSINESS MODEL**

70 DoD logistics chain management (analogous to the commercial term "supply chain") is an

71 integrated process. This process begins with planning the acquisition of the supported (customer)

viit-driven requirements for materiel and services and ends with the delivery of materiel or

required information in services, including the materiel returns segment of the process flow, and required information in

- both directions among suppliers, logistics leaders, and supported units. The Marine Corps has
- 75 traditionally categorized its logistics chain into the six functional areas of CSS:
- 76 Supply
- 77 Maintenance
- 78 Transportation
- 79 General engineering
- 80 Health services
- Other services

The garrison logistics chain operations are generally conducted in a benign and relatively undemanding environment. The nodes of a garrison logistics chain are largely static in nature and enjoy a robust infrastructure that supports the free flow of information. Alternatively, forward deployed (expeditionary) operations, particularly combat operations, are typified by a highly dynamic, often chaotic nature and occur in a "closed" environment that interrupts the upstream and downstream flows within the logistics chain for product/services, particularly with regard to

- 88 information or visibility.
- 89 Existing Marine Corps logistics chain processes and supporting information technology have not 90 changed to meet either industry best practices or current battlefield requirements. Over the last 91 four years, the Marine Corps spent significant time to re-engineer logistics chain business 92 processes. Initially the problem was believed to be information technology deficiencies of the 93 logistics chain. During a focused analysis of the existing information technology, the Marine 94 Corps realized the problem was much broader. An effort to improve information technology 95 became a study of best practices and process re-design. The result of the study was a business 96 case and an imperative for change. Identifying the need to eliminate differences between forward 97 deployed CSS and garrison forms the basis for the concepts and recommendations to change 98 logistics business process OA.

Integrated logistics chain management is a cross-functional approach (e.g. across the functions of
 supply, maintenance, distribution and engineering) to integrate and manage end-to-end logistics
 chain processes that ensure reliable and consistent fulfillment of customer and other MAGTF

102 operational requirements. The Marine Corps integrated logistics chain is not limited to the span

103 of control of the Marine Corps; it requires collaboration and coordination from the MAGTF

104 customer through DoD organizations and commercial partners. The emphasis in a logistics chain

- 105 causes a shift from functional stove-piped performance and costs to total logistics chain
- 106 performance and costs.

107 The OA is modeled using the supply chain operations reference (SCOR) model. This model

108 contains a fully coordinated set of related process cycles- including plan, source, maintain

109 (make), deliver, and return-and are collectively optimized to ensure that materiel and service

110 requirements are effectively and efficiently planned for and executed to the satisfaction of the

supported unit. Integrated logistics chain management focuses on satisfying the supported unit

requirements first and only then meeting those requirements with the lowest total process cost and

113 efficiency.

114 USMC INTEGRATED LOGISTICS CHAIN CHARACTERISTICS

115 Segment Supported Units Based on Service Needs

116 Traditionally the logistics chain provides the supported MAGTF's the same level of service

- regardless of mission. The logistics chain of the future must have the flexibility to distinguish
- between those deployed, those in the beginning of the work up cycle, and those in a garrison
- environment. The logistics chain must be able to tailor its CSS (products/services) to each
- 120 separate MAGTF's mission.

121 Customize the Logistics Network

When designing the logistics network, the focus of main effort is on the service requirements andoperational missions of the MAGTF.

124 Listen to Demand Signals and Plan Accordingly

- 125 Operations and consumption planning must span the entire chain to detect early warning signals
- 126 of changing demand and ordering patterns, MAGTF missions, and so forth. A demand-intensive
- 127 approach leads to forecasts that are more consistent with optimal resource allocation. By
- 128 applying best inventory management practices utilized by the commercial best-in-class
- 129 companies, the Marine Corps will dramatically improve the SLAs for the supported unit while at
- 130 the same time providing additional funds, through inventory draw-down and cost avoidance.

131 Differentiate Product and Service Closer to the Supported Unit

132 The Marine Corps can no longer afford to stockpile inventory to compensate for forecasting

133 errors and uncertainty. Excess inventory occupies space that could be better utilized to bring

- 134 combat power to the battlefield. Differentiation of sources of supply and services allow planners
- to develop strategies that provide consistency in the level of support to each MAGTF. The
- 136 Marine Corps generally manages materiel within various classes of supply without regard to its
- 137 end item application or original use requirement. However, the commercial best practice is to
- 138 focus on the end item priority and manage the individual parts accordingly. Today, requisition to
- 139 order receipt cycle times in the Marine Corps is measured in days and weeks, while the best in
- 140 class commercial companies use hours as their measurement of success.

141 Strategically Manage Sources of Supply and Services

142 By working closer with key suppliers, the Marine Corps can reduce total ownership costs.

143 Develop Logistics Chain-Wide Technology Strategy

- 144 Information technology must support multiple levels of decision-making; through a clear view of
- 145 the flow of products, services, and information through the integrated logistics chain.

146 Adopt Channel-Spanning Performance Measures

- 147 Effective logistics chain measurement systems do more than just monitor internal functions.
- 148 They adopt measures that apply to every link in the logistics chain; from the supplier's supplier to
- 149 the supporting units supported unit.

150 LOGISTICS CHAIN MANAGEMENT ROLES

151 **Demand Management**

Demand management may be thought of as focused efforts that estimate and manage a supported unit's demand, with the intention of using this information to shape operating decisions, service level agreements, inventory categories and their location in relation to the customer. The essence of demand management is to further the ability of organizations to collaborate inventory levels and distribution support that is connected to customer demands. Demand information will be used to create collective and realistic service levels of the customer future needs and designate who in the logistics chain can provide that inventory and distribution to satisfy demands.

159 Customer Service

160 Customer service or logistics chain liaison has multifunctional interest for logistics leaders.

161 Instrumental to the success of the logistics chain is the ability of the logisticians to provide a

162 customer service or liaison connectivity to the supported unit. These processes ensure supported

163 unit requirements and expectations are met. The four dimensions of customer service or logistics 164 chain liaison are the underlying basis for establishing standards of performance of the integrated

165 logistics chain. The performance measurements in use today are not necessarily in the best

166 interest of the supported unit. Those performance measurements demonstrate how well the

167 logistics chain CSS providers perceive their performance. But the performance measurements

- 168 important to the supported unit are:
- 169 Orders received on time;
- 170 Orders received complete;
- Orders received damage free; and
- Orders billed accurately

173 **Performance Management**

Perpetuating the lack of coordination and integration in the current logistics chain, both deployed and in garrison, is that logisticians measure their internal processes to improve CSS functional performance. These metrics are not supported unit focused and do not improve the integration between the CSS functions and the overall performance of the logistics chain in support of the warfighter.

Meeting the supported unit's SLA and expectations requires new roles in the logistics chain
 organization to foster integration and focus on the supported unit. Integrated logistics chain
 management focuses on the performance of the entire chain across each CSS function. To realize

the power of managing supported unit requirements cross functionally the logistics provider must

182 the power of managing supported unit requirements cross functionary the logistics provider must 183 fundamentally change roles of the Marines in the logistics chain to deliver logistics chain

184 responsive CSS.

185 OPERATIONAL ARCHITECTURE ROLES

186 The OA will introduce roles that are no longer internally or functionally CSS focused, yet create

187 the coordination and integration necessary to manage, from a "supported unit focused

- 188 perspective", the supported units orders. Instrumental to integration is the ability to manage a
- 189 logistics chain cross-functionally and manage requirements from a beginning-to-end perspective.
- 190 The following provides description of the OA roles for the integrated logistics chain.

191 Request Management

192 The function of generating, approving, and submitting demands for products and/or services. 193 Request management is usually performed at the supported unit where the demand is generated, 194 validated, prioritized, and consolidated with supported unit requirements. The order is sourced 195 internally if possible; and if not possible submitted to the order manager of the supporting the 196 combat service support element (CSSE - or logistics support unit). RM is a uniquely USMC 197 logistics chain OA process. Commercial industry is not able to interact at this level with the 198 customer by law.

199 Commercial industry does not use a request management process since they have no direct

- 200 control of their customers. Commercial industry does use some of the principals, such as
- requiring little if any user training and requiring minimal technical knowledge, and simplified
- 202 approval. The RM process provides the Marine Corps much more. Using this process step, the 203 integrated logistics chain can begin to combine the entire supported unit's requirement to form an

203 integrated logistics chain can begin to combine the entire supported unit's requirement to form an 204 order. Today the mechanic enters tasks to work orders and supply clerks identify requisitions,

- 205 etc. The RM process identifies to the logistics chain network that there is an immediate demand
- that requires attention. Today, the health of a principle end item (PEI) is not known until the
- 207 mechanic formally enters the work order. The use of this process is limitless because of the data 208 conture potential
- 208 capture potential.

209 Order Management

210 The function of receiving, routing, coordinating, and tracking supported unit orders through to

- 211 fulfillment, providing feedback and coordinating SLAs with the supported unit. Order
- 212 management will be performed at the supporting CSSE headquarters.

An Order Manager will serve as the supported units' single point of entry into the integrated

214 logistics chain. The order manager is responsible for receiving and processing supported unit 215 requests, routing orders to appropriate CSS capacity manager(s), coordinating fulfillment with

216 capacity manager(s), and communicating order status back to the supported unit.

- 217 Order management changes how the integrated logistics chain fulfills a supported units
- 218 requirement. When a supported unit requires a product or service from the logistics chain today
- they piecemeal the parts of the orders to the logistics functional CSS stovepipes to fulfill that
- requirement. Under the OA, the order manager is a single point of contact within the integrated logistics chain that will act on the supported unit's behalf to coordinate fulfillment for all aspects
- of its order.
- An example utilizing this concept would be a requirement to support a supported unit's
- familiarization fire for its table of equipment (T/E) weapons. Using a parent/child relationship,
- the parent order would be a request to fire T/E weapons at the range and the children orders are
- all the various related lower tier CSS orders that are required when a supported unit needs to go to
- the range (i.e. support for transportation to and from the range, food at the range, medical support,
- 228 weapon limited technical inspections, range coordination, and ammunition transported to the
- range). Unlike today, the supported unit would coordinate this order through various units.

230 Capacity Management

231 The function of planning, managing, optimizing, and prioritizing resources and capacity to fulfill

- the supported unit demands. Capacity managers from the various CSS functional areas within
- that CSSE (i.e., supply, maintenance, transportation, etc.) will plan, prioritize, and ensure all
- resources at their disposal are allocated and employed most effectively to support the MAGTF

- 235 mission. They optimize capacity within a particular CSS functional area (inventory,
- 236 maintenance, transportation, etc.) and are responsible for allocating capacity and capability to
- supported unit orders, maintaining visibility of capacity and capability, and reporting status of
- 238 capacity and capability to OM. The CSS capacity managers will ensure the order manager has
- the ability to integrate, coordinate, and communicate all the capacity that exists in the CSS
- 240 functions across the MAGTF.

241 **Production/Operations Management**

- 242 Production/operation management is the function of coordinating, planning, tasking, and
- controlling how supported unit demands are fulfilled. The production/operations manager plans
- and controls his or her respective CSS execution. The production/operations manager is
- responsible for applying and assigning capability and resources to fulfill supported unit orders, maintaining visibility of orders, reporting order status to the order manager (through the
- respective CM's), and reporting the status of resources within their domain to respective CSS
- 248 CM's. The role of production/operations management is primarily the responsibility of the
- 249 commander/OIC of the subordinate functional CSS organization that executes fulfillment such as
- the CO of general support maintenance company, or OIC of the retail supply activity but is
- 251 probably delegated to subordinate leaders/supervisors (e.g., maintenance chief).

252 **OPERATIONAL ARCHITECTURE FUNCTIONAL FLOWS**

- The above roles are enabled by the processes defined within the OA functional flows. These flows can be grouped into the following levels, which are listed in priority order.
- 255 Execution/fulfillment
- 256 Requisition management
- Order management
- Production/operations management
- Capacity management
- 260 Logistics enterprise planning
- Logistics command and control (decision support)

262 GLOBAL COMBAT SUPPORT SYSTEM—MARINE CORPS

- 263 In accordance with the Office of the Secretary of Defense's enterprise integration roadmap,
- 264 USMC has begun the global combat support system-Marine Corps (GCSS-MC) program. The
- 265 GCSS-MC is the enterprise-wide portfolio of Marine Corps logistics and CSS information
- 266 technology capabilities and is designed to implement the logistics operational architecture with
- the intended consequence of eliminating "stovepiped" information technology systems.
- 268 The GCSS-MC Program will follow an evolutionary strategy in order to field an operationally
- suitable and supportable capability in the shortest time possible. The first increment of the
- process will be for block 1 functionality, or replacement/upgrade of the current logistics chain
- 271 management (LCM) systems. The intent of Block 1 is to allow the Marine Corps to retire legacy
- 272 logistics systems and support enterprise integration over the next several years. The business
- logic in the legacy applications for the most part does not support the OA. (There is not a one for
- one map of functionality in the legacy applications to the OA business logic.)
- The COTS solution will provide logistics operators, planners and the warfighters at the joint and
- 276 Marine Corps levels, a fused, integrated, near real-time accurate logistics picture thereby enabling

- 277 visibility into and control of the logistics pipeline. Control is exercised through electronic
- collaboration, visibility, use of joint decision support tools, and autonomous and real-time
- 279 updates. Commanders and staff at every level will be able to analyze logistics data from which to

280 make confident and informed decisions.

281 High Level Program Objectives

- Through iterative implementation of functional capability, the fully implemented GCSS-MC will
 provide capabilities to support the following missions and GCSS operational elements:
- Decision support
- Distribution (inventory, warehousing, mobility, transportation, movement)
- Execution/fulfillment (maintenance, engineering, supply, force health protection)
- Force deployment and execution
- 288 Logistics chain planning
- Order management
- 290 Personnel management
- Purchasing/procurement (acquisition)
- 292 Request management
- Resource Management (Finance)

294 High Level Block 1 Functional Requirements

- The GCSS-MC will utilize COTS product(s) to provide the following GCSS-MC Block 1
 improvements to the LCM processes:
- Provide access to information and interoperability of all information within the Marine Corps
 logistics domain.
- Ensure that relevant information is made available for sharing with other systems to contribute to the commander's common operational picture.
- Support GCSS-MC applications by shared data linked by a common operating environment and accessible through a global network.
- Present a single, fused picture of combat support to the warfighter and provide a closed link
 between operational C2 and logistics C2 (LogC2).
- 305

GCSS-MC shall manage information in a cross-functional configuration that, at its conclusion,
 will include the traditional pillars of CSS. These pillars are embedded in the end-to-end
 (horizontal) requirements that conform to the logistics OA. GCSS-MC shall support integrated
 processes and information flows of horizontal requirements that support the execution of vertical
 processes. GCSS-MC shall address and define the need for information flow, both vertical and

- horizontal, to include cross functional and cross staff section information exchange requirements
- 312 in the context of the logistics OA.

313 **Execution**

314 Request Management

315 Identify, generate, approve, validate, and submit requests for products and/or services to the

- 316 supporting unit.
- 317

317 Order Management

- 318 Route, coordinate, task, and track customer orders (products/services) through to fulfillment.
- This includes managing parent-child orders, providing feedback to, and (optionally) coordinating
 SLAs with, the supported unit.
- 320 SLAs with, the supported unit.

321 Inventory Fulfillment

Provide, manage, and store the information necessary to execute inventory activities related tofulfillment of customer orders for products.

324 Maintenance Fulfillment

325 Provide, manage, and store the information necessary to execute maintenance activities related to 326 fulfillment of customer orders for maintenance service.

327 Distribution Fulfillment

Provide, manage, and store the information necessary to execute distribution as part of a customerorder for products and services.

330 Operations Management

331 Maintenance

- 332 Schedule and reserve specific resources to support overall fulfillment requirements for
- 333 maintenance services.

334 Inventory

335 Schedule and reserve specific resources to support overall fulfillment requirements for product336 demands.

337 Enterprise Planning

338 Maintenance Planning and Scheduling

- 339 Determine the maintenance requirements for all assets that need maintenance in the enterprise;
- 340 schedule maintenance resources against specific assets that need maintenance.

341 Inventory Planning and Capacity Operations

- 342 Plan what inventory (by item / item category) is required, how much should be held, where it
- 343 should be held (location) and when it should be reordered to support current and future demands
- 344 at the enterprise level. Additionally, schedule and reserve capabilities and support overall
- 345 fulfillment requirements for product demand.

346 Inventory Control/Demand-Supply Management

- 347 Analyze and correct variances in demand and supply due to imbalances between actual and
- 348 planned consumption, and manage the adjustment of resources (inventories and/or capacities) 349 required to correct the imbalance.
- 349 required to correct the imbalance
- 350

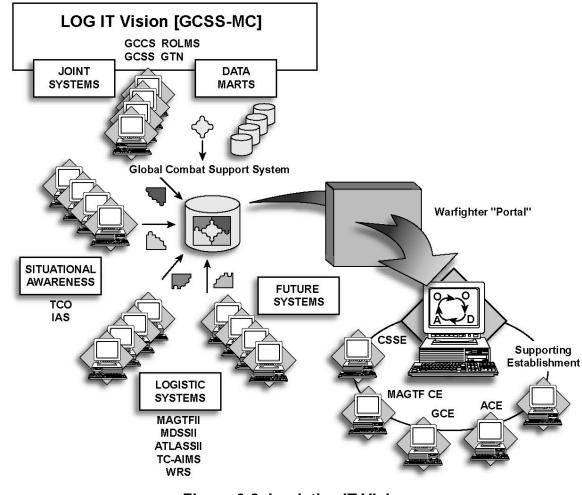


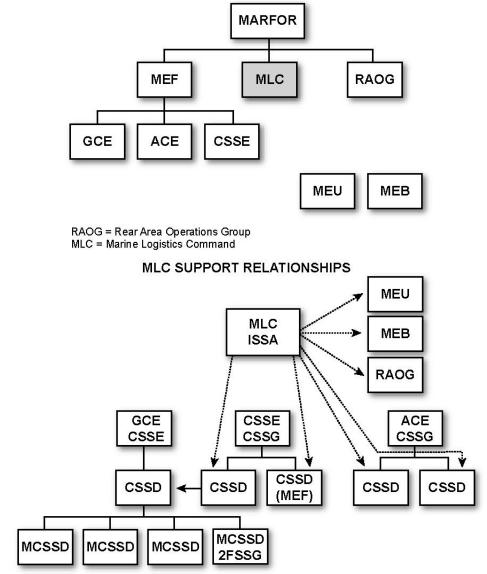


Figure 6-2. Logistics IT Vision

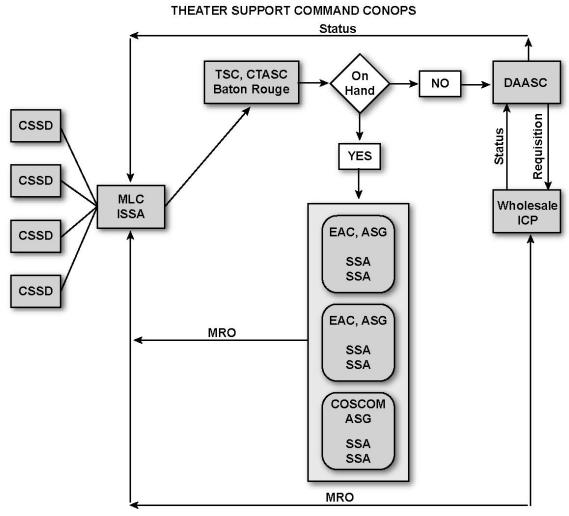
APPENDIX A 2 COMMAND/SUPPORT RELATIONSHIPS

- 3 For planning purposes, these charts depict the standard relationship between major subordinate
- 4 commands and overarching command element both in garrison and deployed.

MARFOR COMMAND RELATIONSHIPS



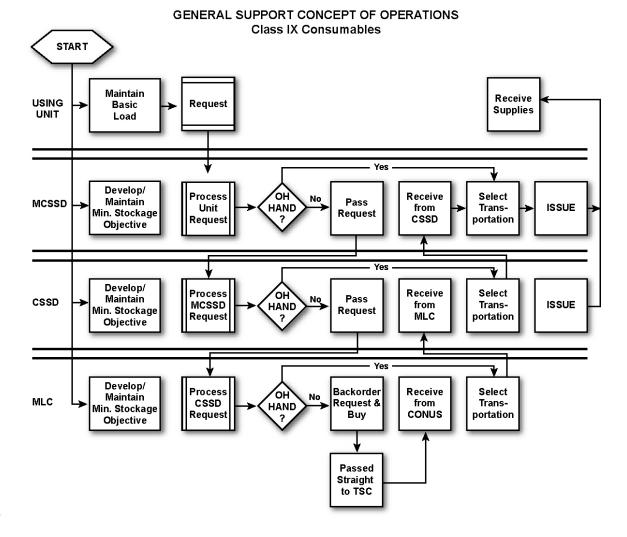
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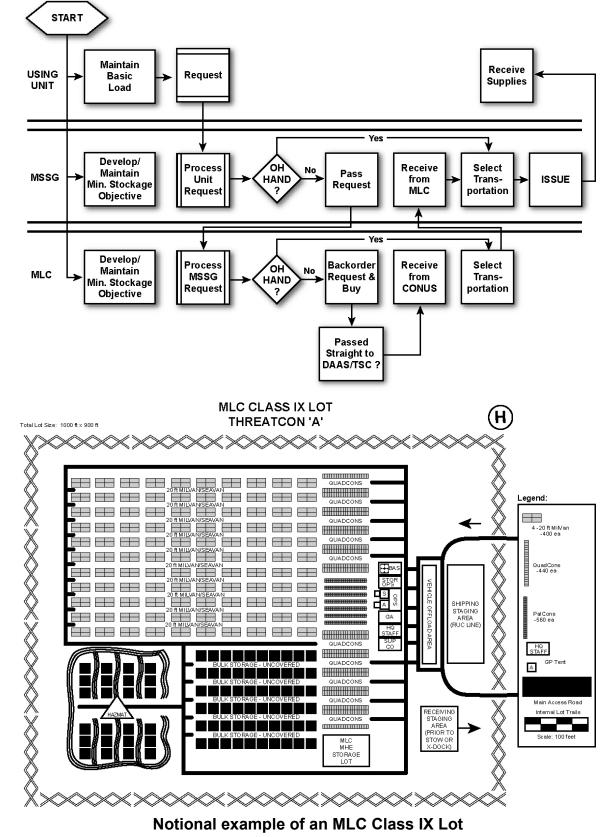


SSA = Supply Support Activity

EAC = Echelons Above Corps TSC = Theatre Support Command

TSC = Theatre Support Command CTASC = Corps Theatre ADP Service Center





DIRECT SUPPORT CONCEPT OF OPERATIONS Class IX Consumables

9

10

2

APPENDIX B Planning Data for Class I, III, and VIII

3 Planning factors for high use, mission critical, classes of supply.

4 Class I (water)

Temperate Zone	Daily Gallons Per I	Man Requirements	
Function	Sustaining	Minimum	
Drinking	1.5	1.5	
Hygiene	1.7	1.0	
Field feeding	2.8	0.8	
Medical treatment	0.4	0.4	
Subtotal	6.4	3.7	
+10%	0.6	0.4	
Total	7.0	4.1	

5

6

Tropical Zone	Daily Gallons per Man Requirements	
Function	Sustaining	Minimum
Drinking	3.0	3.0
Hygiene	1.7	1.0
Field feeding	2.8	0.8
Heat casualty treatment	0.2	0.2
Medical treatment	0.4	0.4
Subtotal	8.1	5.4
+10%	0.8	0.5
Total	8.9	5.9

Arctic Zone	Daily Gallons per	Man Requirements	
Function	Sustaining	Minimum	
Drinking	2.0	2.0	
Hygiene	1.7	1.0	
Field feeding	2.8	0.8	
Medical treatment	0.4	0.4	
Subtotal	6.9	4.2	
+10%	0.7	0.4	
Total	7.6	4.6	

Arid Zone	rid Zone Daily Gallons per Man Requirements		
Function			
Drinking	3.0	3.0	
Personal hygiene	1.7	1.0	
Field feeding	2.8	0.8	
Heat casualty treatment	0.2	0.2	
Medical treatment	0.4	0.4	
Centralized hygiene	1.8	0.0	
Construction	0.5	0.0	
Vehicle maintenance	0.2	0.2	
Aircraft maintenance	0.2	0.2	
Laundry	2.1	0.0	
Subtotal	12.9	5.8	
+10%	1.2	0.6	
Total	14.1	6.4	
Lube Oil Perce	entages By Society American Er	gineering (SAE)	
Normal temperatures	(above 32F) – 20 % SAE 10, 65 % SA	E 30, and 15% SAE 50.	
Cold weather (0	F to 32 F)- 70% SAE 10, 25% SAE 20), and 5% SAE 50.	
Extreme cold weat	her (0 F down to –65 F) – 90 % Subz	ero and 10% SAE 10	
	Formulas		
Fuel formula (in gallons) for gas/dies	el		
# Of days x	hrs/day x GPH x # of equipment = fue	el requirement	
Lube oil (internal and gear) / kerosen	e/ grease (in gallons/pounds)		
(#	Gal gas x gas %) + (# gal diesel x die	esel)	
	Percentages:		
	Lube oil, internal (gallons) 3% of gas, 3.5% of diesel		
	0		
	Lube oil, gear (gallons)		
	0.5% of both gas and diesel		
	Kerosene (gallons)		
	0.5 % of both gas and diesel		
	Grease (pounds)		
	1% of gas, 3% of diesel		
SAE formula (in gallons)			
	% SAE x # gal of lube oil, intern	al	
		-	
F	Rodent control formula (in gallo	าร)	
	0.12 x # personnel x # days 30		

Standard Petroleum Products Containers						
Type POL	Type Container	# Gal Full	SqFt	CuFt	Wt (lbs) Empty	Wt (lbs) Full
MoGas	55 Gal drum	54	4	11	54	384
	5 Gal can	5		1	10	41.5
Diesel	55 Gal drum	54	4	11	54	432
	5 Gal can	5		1	10	45.2
Kerosene	55 Gal drum	54	4	11	54	421
	5 Gal can	5		1	10	47.1
Oil Lubricating	55 Gal drum	54	4	11	54	475
	5 Gal can	5		1	10	47.5
	1 Gal (bulk)			.134		7.5
	1 case (24 qts per case)			1.4		57
JP-4	1 Gal (bulk)			.134		6.5
JP-5	1 Gal (bulk)			.134		6.8

9 Class III Computation Flow Chart

10

11 Class III Planning Tables

CLASS III (Gal)			
Organization	Assault	Sustained	
MEF	1,204,856	950,010	
MEB	563,868	443,738	
MEU	63,842	48,145	
	Class III		
Unit	Daily Fuel Requirement (Gal) Assault	Daily Fuel Requirement (Gal) Sustained	
MEF CE			
H&S Bn	5,591	3,346	
Radio Bn	4,406	3,707	
Comm Bn	7,128	5,641	
Services Co	1,563	1,592	
Gen Supt Comm Co	4,459	3,435	
MEF CE total	17,125	12,694	
Marine Division			

HQ Bn		
H&S Co	3163	1725
Truck Co	10403	5399
Det, Truck Co	2601	1350
Comm Co	2885	1938
Det, Comm Co	721	484
MP Co	337	315
Inf Reg	5402	3340
Inf Bn	966	564
Artillery Reg	22607	13970
Artillery Bn	3341	1954
Tank Bn	30285	15608
Tank Co	5222	2627
LAV Bn	8828	4715
LAV Co	1195	602
AAV Bn	20442	5376
AAV Co	3701	602
CEB	8269	7600
CEC	255	128
CESC	6544	6634
FSSG		
H&S Bn	5739	5151
HQ Co	3644	3134
Service Co	276	276
Comm Co	1175	1174
MP Co	644	567
Engr Supt Bn	24244	31382
H&S Co	808	805
Engr Supt Co	14685	21672
Bulk Fuel Co	5590	5394
Engr Co	1584	2132
Bridge Co	1577	1379
Supply Bn	740	632
Ammo Co	577	523
Supply Co	102	68
Med Log Co	61	41
Maint Bn	13298	12400
H&S Co	4922	5012
Elect Maint Co	3552	3518

Engr Maint Co	907	884
Ord Maint Co	1421	1181
MT Maint Co	1593	1505
Gen Supt Maint Co	903	300
Medical Bn	1290	1828
H&S Co	1137	1066
Surgical Supt Co	51	254
Dental Bn	123	81
H&S Co	0	0
Dental Co	41	27
Landing Supt Bn	8646	9104
H&S Co	443	429
Landing Supt Co	61	41
Landing Supt Equip Co	8020	8634
Motor Transport Bn	48998	57386
H&S Co	3638	3140
G/S MT Co	26466	31152
D/S MT Co	9447	11547

14 AMAL LISTING

15 AMAL 618 - Laboratory Equipment

16 Equipment and reusable materiel required to establish a laboratory capable of hematology,

17 microbiology, urinalysis, collecting, and chemistry testing.

18 AMAL 619 - Laboratory Supply

Consumable supplies required to perform hematology, microbiology, urinalysis, and chemistrytesting for 100 patients.

21 AMAL 627 - X-Ray

Equipment, consumable supplies and reusable materiel required to establish one X-Ray suite
 providing support for 100 patients.

24 AMAL 629 - Pharmacy Equipment

25 Equipment and reusable materiel required to establish a pharmacy.

26 AMAL 630 - Pharmacy Supply

- 27 Consumable supplies required to provide pharmacy support to 1,000 persons, in six 5-day
- 28 packages for a total of 30 days.

29 AMAL 631 - Shock Surgical Team/Triage Equip

- 30 Equipment and reusable materiel required to establish a basic shock trauma surgical team or
- 31 triage to support the receipt, resuscitation, sorting and temporary holding of casualties.

32 AMAL 632 - Shock Surgical Team/Triage Supply

Consumable supplies required to receive, resuscitate, sort and temporarily hold 50 casualties with
 major wounds and to provide basic line corpsman resupply.

35 AMAL 633 - Ward Equipment

36 Equipment and reusable materiel required to establish a 20-bed unit providing care for patients.

37 AMAL 634 - Ward Supply

38 Consumable supplies required to provide ward support for 100 bed days to patients.

39 AMAL 635 - Aid Station Equipment

- 40 Equipment and reusable materiel required to support one division, wing, group, or engineer,
- 41 battalion aid station.

42 AMAL 636 - Aid Station Supply

- 43 Consumable supplies required to provide aid station support, initial resuscitative and stabilizing
- 44 care for 50 casualties with major wounds before evacuation and to resupply basic line corpsman.

45 AMAL 637 - Preventive Medicine Equipment

- 46 Equipment and reusable materiel required to establish a preventive medicine section providing
- 47 technical preventive medicine advice and inspection of food service operations, waste disposal,

48 water potability, and sources, vector control, and coordination of control measures required of

49 communicable diseases and monitoring and assisting in immunization programs.

50 AMAL 638 - Preventive Medicine Supply

51 Consumable supplies required to provide support of preventive medicine effort of the MEF, in 52 twelve 5-day packages for a total of 60 days.

53 AMAL 639 - Operating Room Equipment

- 54 Equipment and reusable materiel required to support one operating room for performance of
- 55 major surgical procedures, administration of general anesthesia, sterilization and maintenance of 56 sterile material.

57 AMAL 640 - Operating Room Supply

58 Consumable supplies required to provide operating room support for 25 surgical cases.

59 AMAL 645 - Forward Resuscitative Surgery System (FRSS)

Equipment, consumable supplies and reusable materiel required to care for 18 patients in a 48 Hrperiod.

62 AMAL 646 - Forward Resuscitative Surgery System (FRSS)

63 Consumable/Re-supply - Equipment and consumable supplies required to reconstitute the FRSS
 64 suite.

65 ADAL 662 - Field Dental Operatory

66 Equipment and reusable materiel required to establish a field dental clinic. Consumable supplies

67 required to provide emergency, diagnostic, preventive and maintenance dental support for 40068 patients.

69 AMAL 684 - Geographic Supplement

Consumable supplies and reusable material required to accommodate special mission/geographic
 related requirements for a MEF, in twelve 5-day packages for a total of 60 days.

72 AMAL 685 - Cold Weather Supplement

Consumable supplies and reusable material required to accommodate special mission/geographic
 related requirements into areas where cold related injuries are likely to occur.

75 AMAL 686 - Hot Weather Supplement

Consumable supplies and reusable material required to accommodate special mission/geographic
 related requirements into areas where heat related injuries are likely to occur.

78 AMAL 687 - NBC Individual

Materials required in order for the individual to conduct primary decontamination and treatmentin a Nuclear, Biological and Chemical environment.

81 AMAL 688 - NBC, Unit

Materials required in order for the units to conduct primary and secondary decontamination and
 treatment in a nuclear, biological and chemical environment.

84 AMAL 691 - Med Log Test/Repair Equip

Equipment and reusable materiel required to perform testing, calibration and 3d and 4th echelon
 maintenance of medical/dental equipment.

87 AMAL 692 - Med Log Test/Repair Supply

- 88 Consumable supplies required to accommodate a medical repair section in the testing, calibration,
- 89 and 3d and 4th echelon maintenance of medical/dental equipment.

	Initial Issue	MEDLOG	MPS	Total Required
AMAL 618	13	0	4	17
Lab Equip				
AMAL 619	13	63	21	97
Lab Supply				
AMAL 627	13	0	21	97
X-ray Equip				
, , , , , , , , , , , , , , , , , , , ,				
AMAL 629	13	0	4	17
Pharm Equip				
AMAL 630	13	52	18	83
Pharm Supply				
AMAL 631	11	0	5	16
STP Triage		·		
Equip				
AMAL 632	11	46	15	72
STP Triage				
Supply				
AMAL 633	9	0	4	13
Ward Equip				
AMAL 634	9	84	24	117
Ward Supply				
AMAL 635	30	0	15	45
Aid Station				
Equip				
AMAL 636	30	96	30	156
Aid Station				
Supply				
AMAL 637	1	0	1	2
Prev Med Equip				
AMAL 638	1	0	1	2
Prev Med				
Supply		^		
AMAL 639	9	0	4	13
OR Equip				450
AMAL 640	9	114	30	153
OR Supply		-	-	
ADAL 662	26	0	8	34
Field Dental				
AMAL 684	0	9	0	9
Geo Block				

AMAL 685	0	9	0	9
Cold Weather				
AMAL 686	0	9	0	9
Hot Weather				
AMAL 687	0	9	0	9
NBC Individ				
AMAL 688	0	9	0	9
NBC Unit				
AMAL 691	0	3	0	3
Med Log Equip				
AMAL 692	0	3	0	3
Med Log Supply				

91 AMAL /ADAL requirements for I and II MEF. AMALS/ADALS to be carried by FSSG are

92 93 94 initial issue plus medical logistics. Class VIII requirements for the Marine Corps Reserve includes all equipment blocks but no consumable AMALS.

	Initial Issue	MEDLOG	MPS	Total Required
AMAL 618	9	0	4	13
Lab Equip				
AMAL 619	9	46	21	76
Lab Supply				
AMAL 627	9	0	4	13
X-ray Equip				
AMAL 649	9	46	21	76
X-ray Supply				
AMAL 629	9	0	4	13
Pharm Equip				
AMAL 630	9	37	18	64
Pharm Supply				
AMAL 631	10	0	5	15
STP Triage Equip				
AMAL 632	10	34	15	59
STP Triage Supply				
AMAL 633	6	0	4	10
Ward Equip				
AMAL 634	6	60	24	90
Ward Supply				
AMAL 635	26	0	15	41
Aid Station				
Equip				

AMAL 636	26	44	30	100
Aid Station Supply				
AMAL 637	1	0	1	2
Prev Med Equip				
AMAL 638	1	0	1	2
Prev Med Supply				
AMAL 639	6	3	4	13
OR Equip				
AMAL 640	6	86	30	122
OR Supply				
ADAL 662	16	0	8	24
Field Dental				
AMAL 684	0	6	0	6
Geo Block				
AMAL 685	0	6	0	6
Cold Weather				
AMAL 686	0	6	0	6
Hot Weather				
AMAL 687	0	6	0	6
NBC Individ				
AMAL 688	0	6	0	6
NBC Unit				
AMAL 691	0	3	0	3
Med Log Equip				
AMAL 692	0	3	0	3
Med Log Supply				

96

AMAL /ADAL requirements for III MEF.

APPENDIX C GENPACK SAMPLES

This is a sample GENPAC report for a MEU showing quantities of selected TAMCN's by MSE within a MEU. A Supply Officer uses this for computation of support requirements.

6				CE	BLT			
7	TAMCN	ID NO.	NOMENCLATURE	TOT	тот	ACE	MSSG	TOT
8	<u>A0004</u>	07960A	MK-1823(V)/TT	0	1			1
9	<u>A0011</u>	10165A	ADV FIELD ARTY	0	4			4
9	<u>A0014</u>	08717A	CONVERTER, AC POWER	0	1			1
10	<u>A0017</u>	08718A	CONVERTER, DC POWER	0	1			1
11	<u>A0059</u>	00266B	OE-254/GRC	23	34			57
11	<u>A0092</u>	08161A	PP-7286 BATTCHG	0	3			3
12	<u>A0260</u>	08463A	AN/MSQ-115	0	1			1
10	A0284	08008C	AN/UGC-74C(V)3	0	2			2
13	<u>A0412</u>	08987A	AN/ULQ-19 JAMMING SYST, COMM	3	0			3
14	<u>A0498</u>	08487C	AN/PSC2A DCT	0	16			16
	<u>A0498</u>	08487A	AN/PSC2A DCT	25	0			25
15	A0504	10077A	DTAMS	1	0			1
16	A0517	09812A	AN/PRD-10/12	2	0			2
10	A0661	09150A	AN/UYK-83	0	0		1	1
17	A0662	09526A	AN/UYK-85A	6	2			8
10	A0675	08103A	SG-886T/UR GEN INTERFERENCE	2	0			2
18	A0805	07570A	AN/USM-323 SIG	0	2			2
19	A0815	07711A	HELIPORT LIGHT SET PORTABLE	0	1			1
-	A0817	N/A	AN/PSN-8, GPS	2	1			3
20	A0890	09955A	AN/UXC-7A FAX	3	3		2	8
21	A0891	09480A	AN/UPS-3, TDAR	1	0			1
<u> </u>	A0892	10136A	V2 LTWT TACT COMPT	2	0			2
22	* <u>A0917</u>	09924A	AN/PSC-3 SAT COMM TERM	7	0		1	8
23	A0966	09999B	AN/MLQ-36 MES	1	0			1
23	A1253	08077A	PP-7333 POWER	2	5		1	8
24	A1255	07935A	PP-7332/U POWER	1	0			1
25	A1260	09880A	AN/PSN-11 LTWT GPS, PLUGGER	15	38		5	58
25	A1275	08715A	MU-848/PSC-2A DCT	3	10			13
26	A1305	07675A	AN/UIQ-10(V)	1	2			3
	A1530	09001A	AN/PPN-19 RADAR TRANSPONDER, BEA	2	2			4
27	* A1935	07743A	AN/MRC-138B	2	1		2	5
28	* A1935	07743B	AN/MRC-138A	5	3			8
20	A1957	09730A	AN/MRC-145	5	9		2	16
29	A2030	06827B	AN/PRC-68A	0	116			116

- 34 This is a GENPACK discrepancy report used to identify items that the requesting agencies have
- 35 modified the quantity of. This flags to the supply officer those items to be researched for purposes

_

36 of determining actual support requirement in parts and money once the MEU deploys.

		MEU	T/O	PREV	MAGTF	USING	SOURCE	CMD CHANGE
TAMCN	NOMENCLATURE	OTY	OTY	UER OTY	MSE	UNIT	CMD	MADE BY
10003	CANISTER CHEM-BIO	546	0		CSS	MSSG	FSSG	
40004	MK-1823	1	0		CMD	DET COMM BN	COMM BN	
10004	MK-1823	1	0		CMD	DET ENABLER	COMM BN	
40059	ANTENNA OE-254/GRC	5	0	9	ACE	MACG DET	MAW	2DMAW
A0059	ANTENNA OE-254/GRC	2	0		GCE	AAV PLT	DIV	
A0059	ANTENNA OE-254/GRC	1	0		GCE	CBT ENG PLT	DIV	
A0059	ANTENNA OE-254/GRC	1	0	0	CMD	DET HET	INTEL BN	24 MEU
A0059	ANTENNA OE-254/GRC	10	0	8	CMD	DET COMM BN	COMM BN	II MEF G-6
40059	ANTENNA OE-254/GRC	1	0		CMD	DET FRECON	DIV	
40059	ANTENNA OE-254/GRC	2	0		CMD	DET MLE	MLE	
A0059	ANTENNA OE-254/GRC	4	0		CMD	DET RAD BN	RAD BN	
0059	ANTENNA OE-254/GRC	1	0		GCE	LAR PLT	DIV	
A0059	ANTENNA OE-254/GRC	12	0		CSS	MSSG	FSSG	
A0059	ANTENNA OE-254/GRC	1	0		GCE	NGFSPT TM	DIV	
A0059	ANTENNA OE-254/GRC	1	0		GCE	RECON PLT	DIV	
A0059	ANTENNA OE-254/GRC	1	0	0	GCE	TANK PLT	DIV	2D MARDIV
40299	PRINTING MACHINE LABEL	2	0	0	CSS	MSSG	FSSG	24 MEU
40300	PRINTING MACHINE LABEL	1	0	0	CSS	MSSG	FSSG	24 MEU
A0412	AN/ULO-19 JAMMER	2	0		CMD	DET RAD BN	RAD BN	
A0498	DIGTL MESSG SYS AN/PSC 2A	1	0		GCE	CBT ENG PLT	DIV	
40498	DIGTL MESSG SYS AN/PSC 2A	5	0		CMD	DET FRECON	DIV	
40498	DIGTL MESSG SYS AN/PSC 2A	4	0		CMD	DET RAD BN	RAD BN	
40498	DIGTL MESSG SYS AN/PSC 2A	1	0		GCE	LAR PLT	DIV	
40498	DIGTL MESSG SYS AN/PSC 2A	3	0	7	ACE	MACG DET	MAW	2DMAW
A0498	DIGTL MESSG SYS AN/PSC 2A	2	0	0	CMD	DET COMM BN	COMM BN	II MEF G-6
40517	AN/PRD-12 DIRECTN FINDR, TACT	0	0		CMD	DET RAD BN	RAD BN	
A0617	TEST SET, ELEC SYSTEM	1	0	0	GCE	TANK PLT	DIV	2D MARDIV
40675	SG-886	0	0		CMD	DET RADBN	RADBN	
A0814	COMM TERM	1	0		CMD	DET ENABLER	COMM BN	
A0815	HELIPORT LIGHT SET PORTABLE	0	0	2	ACE	MWSG DET	MAW	2DMAW
A0890	LW DIGITAL FACSIMILE AN/UXC-7	0	0	2	CMD	DET COMM BN	COMM BN	II MEF G-6
40891	TDAR	1	0		ACE	MACG DET	MAW	
A0917	MANPCK SAT COM TRM AN/PSC-3	0	0	4	CMD	DET COMM BN	COMM BN	II MEF G-6
A0917	MANPCK SAT COM TRM AN/PSC-3	0	0	2	CMD	DET MLE	MLE	II MEF G-6
A0917	MANPCK SAT COM TRM AN/PSC-3	0	0	2	CMD	DET RAD BN	RAD BN	II MEF G-6
40917	MANPCK SAT COM TRM AN/PSC-3	0	0	5	GCE	HO BLT	DIV	II MEF G-6

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38 The General Account Balance File (GABF) is extracted to assist the supply officer in identifying 39 class ix parts that are readily available or those requiring longer lead times due to being out of 40 stock. This is invaluable in load planning and costing out the support requirements for the 41 deployment. The Supply Officer can program buys to maximize dollars and minimize backorders.

+1 deployment. The Supply Officer can program buys to maximize donars and minimize backorder

43 44 45	CLASS IX BLOG 6240	CK 00-08-18
46 47	ID NUM EN	D NSN RQMT C UI NOMEN GABF GABF RTDMD RTDMD DUE GA GA GABF BUY
48 49	UNIT EXT ITEM NOMEN	CD E CD RO ONH HITS RD IN BO MSL AMRD QTY PRICE PRICE C
5012334567890	008087A	4820007264719 3 5 EA VALVE, VENT 773 196 340 3356 0 0 0 305 31. 0.86 26.66
52	08087A	4820008491220 3LIC 6 EA COCK, DRAIN 156 110 382 1295 0 0 0 95 10. 0.69 6.90
53	08087A	4820012108821 3 5 EA VALVE, ANGL 130 37 80 626 0 0 0 82 8. 12.28 98.24
54	08087A	5305000581082 3 5 HD SCREW, TAPP 13 62 57 72 0 3 0 5 1. 2.34 7.20
22	08087A	5305000680502 3 5 HD SCREW, CAP, 33 350 269 444 0 0 0 9 1. 2.59 2.59
20	08087A	5305001433266 3 5 EA SCREW, MACH 50 19 37 140 0 0 0 14 1. 0.06 0.06
57	08087A	5305005432419 3 5 EA SCREW,CAP 80 56 177 971 0 0 0 24 2. 0.05 0.18
28	08087A	5305007195219 3 5 HD SCREW, CAP 52 5 72 236 0 0 0 13 1. 10.03 10.03
22	08087A	5305007247223 3 5 EA SCREW,CAP, 18 12 34 881 0 0 1 6 1. 0.21 0.33
60	08087A	5305009931848 3 5 HD SCREW, MACH 36 16 57 62 0 0 0 11 1. 2.15 2.15
61 62	08087A	5306001891775 3 5 EA ROD,THREAD 28 117 149 0 25 0 13 1. 1.24 1.24
62	08087A	5306002264825 3 5 HD BOLT,MACHI 106 62 48 99 0 0 2 50 5. 4.48 22.40
63	08087A	5306004094066 3 5 EA BOLT,SHOUL 46 43 99 354 0 0 0 11 1. 1.67 1.67
64	08087A	5306010155675 3LIC 5 EA BOLT,SELF- 161 66 42 664 0 0 0 77 8. 0.17 1.36
65	08087A	5306010522402 3 5 EA BOLT,SELF- 345 100 179 7957 0 0 0 231 23. 0.16 3.68
66	08087A	5310000145850 3LIC 6 HD WASHER,FLA 20 7 87 173 0 0 0 8 1. 2.01 2.01
67	08087A	5310000609435 3 5 EA WASHER,LOC 15 6 19 86 19 0 0 6 1. 0.11 0.11

68907723456778901233456789012345678901234567890123456789012345678901234567890123456789012345678901234567890101101	08087A 5310005157449 5 HD WASHER,FLA 24 4 4 0 0 9 1. 0.90 0.90 08087A 53100058259651 5 HD WASHER,LOC 70 31 274 358 0 0 16 2. 1.10 2.20	3.74 5.55 3
102 103	Batch Rqst Nbr: JTS0130244046 31 Aug 2000	
104	21:21:01	
105	Activity : MML100	
106	Packup I. D.: ML100005	
107	Page: 1	
$\begin{array}{c} 108 \\ 109 \\ 110 \\ 111 \\ 112 \\ 113 \\ 114 \\ 115 \\ 116 \\ 117 \\ 118 \\ 120 \\ 121 \\ 122 \\ 122 \\ 122 \\ 122 \\ 125 \\ 127 \end{array}$	00266B ANTENNA ELEVATOR GRO 4030 010736103 EA STAKE ASSEMBLY 28 5.71 15 5355 013157946 EA KNOB 7 3.75 2 5355 013157948 EA KNOB 4 4.77 19 5355 013157948 EA KNOB 10 3.39 3 5820 011792792 EA CHASSIS,ELECTRICAL-E 0 350.00 5820 012348093 EA RECEIVER-TRANSMITTER 0 9226.00 0 5865 013715638 EA COUNTERMEASURE SET,S 0 1946.00 0 5895 013187991 EA DEMODULATOR 0 673.00 0 5895 013196696 EA KEYBOARD,DATA ENTRY 0 98.44 0 5895 013392977 EA PANEL,CONTROL,ELECTR 0 829.00 0 5895 013826411 EA PANEL,CONTROL,ELECTR 0 1242.81 0 5935 013755085 EA ADAPTER,CONNECTOR 27 25.00	PRICE 9.88 6.25 9.08 3.90 0.00 0.00 0.00 0.00 0.00 0.00 0.00

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	5985	010724342	EA	SLEEVE, ANTENNA SUPPO	8	28.10	224.80
	5985	011223959	ΕA	PLATE, ANTENNA MAST	2	4.53	9.06
	5985	013243462	ΕA	MAST SECTION	24	11.06	265.44
	5985	013265533	EA	SLEEVE, ANTENNA SUPPO	5	29.23	146.15
	5995	010851665	EA	CABLE ASSEMBLY, RADIO	6	67.97	407.82
	5998	011792820	EA	CIRCUIT CARD ASSEMBL	0	178.00	0.00
	5998	011883350	EA	CIRCUIT CARD ASSEMBL	0	89.43	0.00
	5998	012755524	EA	CIRCUIT CARD ASSEMBL	0	630.00	0.00
	5998	012822855	EA	CIRCUIT CARD ASSEMBL	0	228.00	0.00
	5998	012822856	EA	CIRCUIT CARD ASSEMBL	0	226.00	0.00
	5998	013081428	EA	CIRCUIT CARD ASSEMBL	0	1315.00	0.00
	5998	013168721	EA	CIRCUIT CARD ASSEMBL	0	187.00	0.00
	5998	013184128	EA	CIRCUIT CARD ASSEMBL	0	260.00	0.00
	5998	013196713	ΕA	CIRCUIT CARD ASSEMBL	0	296.00	0.00
	5998	013419185	EA	ELECTRONIC COMPONENT	0	320.00	0.00
	5998	013501709	ΕA	CIRCUIT CARD ASSEMBL	0	457.00	0.00
	5998	014354233	EA	ELECTRONIC COMPONENT	0	609.33	0.00
	5999	013207953	ΕA	CHASSIS,ELECTRICAL E	0	1246.00	0.00
	6130	013068095	EA	POWER SUPPLY	0	1545.00	0.00
	6130	013251826	ΕA	POWER SUPPLY	0	387.99	0.00
	6625	014220003	EA	PROGRAM SET, APPLICAT	0	20920.97	0.00
07960A PARTS KIT, ELECTRONIC	5920	005572647	EA	FUSE,CARTRIDGE	1	0.12	0.12
···· , ··· ,				FUSE,CARTRIDGE	1	1.16	1.16
				CIRCUIT CARD ASSEMBL	0	488.62	0.00
				CIRCUIT CARD ASSEMBL	0	439.04	0.00
	5998	010236707	EA	CIRCUIT CARD ASSEMBL	0	459.37	0.00
	5998	010239815	EA	CIRCUIT CARD ASSEMBL	0	530.92	0.00
	5998	010261206	EA	CIRCUIT CARD ASSEMBL	0	832.32	0.00
	5998			EXTRACTOR, ELECTRICAL	0	62.58	0.00
				CIRCUIT CARD ASSEMBL	0	753.90	0.00
				CIRCUIT CARD ASSEMBL	0	729.76	0.00
				LAMP, INCANDESCENT	1	0.21	0.21
				LAMP, INCANDESCENT	123	0.21	25.83
				,			

1	APPENDIX D
2	SAMPLE RAPID REQUEST
3 4 5	A sample of the rapid request form used in submitting CSS requirements in a field environment. These are collated within the CSSOC to track and prioritize requests and to maintain visibility of all assets within the CSS element.
6	RAPID REQUEST #
7	A. REQUESTING UNIT
8	В. ТО
9	C. DATE/TIME
10	D. PRIORITY
11	E. LOCATION
12	F. NOMENCLATURE
13	G. NSN
14	H. U/I
15	I. QTY
16	J. END ITEM APPLICATION
17	K. EQUIPMENT TYPE
18	L. OWNING UNIT
19	M. NATURE OF REPAIR
20	N. TRANSPORTATION REQUEST FOR TROOPS/CARGO
21	O. FROM/TO LOCATION
22	P. READY TIME
23	Q. OTHER SERVICES
24	NOTES: BREVITY CODES (*)
25	ALL REQUESTS - FILL IN LINES A-F QUARTERBACK—RAPID REQUEST
26	SUPPLY REQUESTS - FILL IN LINES G-J TOUCHDOWN—EMERGENCY RESUPPLY AMMO
27	MAINTENANCE REQUEST - FILL IN LINES K-M PASS—EMERGENCY RESUPPLY WATER
28 29 30	TRANSPORTATION REQUEST - FILL IN LINES N-P PENALTY—CONTACT TEAM FORWARD PASS—MT TACKLEORDNANCE
31	SERVICES REQUEST - SPECIFY ON LINE Q
32	* THESE CODES ARE EXAMPLES ONLY.

1	Appendix E
2	PRIORITY DESIGNATORS
3 4	When submitting requisitions, the priority designators are critical in ensuring the timely receipt of the part in garrison or a field environment.
5 6 7	Priority Designators relate to the mission and are constructed of a force/activity designator (F/AD), and the urgency of need designator (UND). The F/AD's are broken down as follows (See MCO 4400.16_).
8	F/AD I: US forces in combat and other activities designated by the Secretary of Defense.
9 10	F/AD II: Combat-ready forces in CONUS, CONUS forces on call, programs or projects vital to defense.
11 12 13	F/AD III: Marine Corps forces within and outside CONUS not included under F/AD II. Programs and projects of comparable importance, ships detachment afloat, specified combat- ready and direct combat support forces of foreign countries.
14 15 16	F/AD IV: Reserve units, training bases, supporting establishments, security forces, program and projects of comparable importance, Federal Agency programs which contribute to planned improvement of defense.
17 18	F/AD V: All other active and reserve forces, programs and projects not designated, forces of foreign countries not otherwise designated.
19	As the UNDs are used in combination with the F/AD's they are presented below.
20 21 22	UND "A": Priorities that fall under UND "A" will be used to requisition parts that require immediate installation to end items that prevents units from performing their assigned operational and training mission.
23 24	UND "B": Priorities that fall under UND "B" will be used to requisition parts that require immediate installation to end items that impairs the operational capability of the unit.
25 26	UND "C": Priorities that fall under UND "C" will be used to requisition parts for scheduled maintenance and stock replenishment.

1		APPENDIX F
2		GLOSSARY
3		Section I: Abbreviations and Acronyms
4	AAC	
5		assault amphibious vehicle
6		aviation combat element
7		authorized dental allowance list
8		authorized medical allowance list
9		Air Mobility Command(USAF)
10	ARG	amphibious ready group
11		asset tracking for logistics and supply system
12	AVCAL	aviation consolidated allowance list
13		
14		basic allowance for subsistence
15		basic capability package
16		battalion landing team
17		battalion liaison support teams
18		battalion
19		backorder
20	BSSG	brigade service support group
21		
22		
23		combat essentiality code
24		
25		
26		
27		combat service support area
28		
29		combat service support company
30		combat service support detachment
31		combat service support element
32	CSSG	combat service support group
33		
34		Defense Logistics Agency
35		
36		Department of Defense
37		Department of Defense identification code
38		
39		direct support stock control
40	DSU	
41	EDI	en an en
42		equipment density list
43		expeditionary strike group
44 45		force activity designator
45		force service support command
46	FSSG	force service support group

47 48	FSSG(Fwd)	force service support group (forward)
49	GCE	ground combat element
50		
51		
52		generator package
53		general support command
55 54	030	general support command
55	HMMWV	
56		Headquarters, Marine Corps
57	iiqiiic	
58	ID NO	identification number
59		integrated materiel management
60		infantry battalion
61		intermediate supply support activity
62		in-transit visibility
63	11 V	
64	LAV	light armored vehicle
65		landing force operations reserve material
66		landing force support party
67		logistics preparation of the battlefield
68		loaded unit balance file
69		
70	MAGTF	
71		
72		
73		Marine Corps Community Services
74		
75		
76		Marine Corps logistics base Marine Corps Order
77		*
78		mobile combat service support company
79		mobile combat service support detachment
80		Marine Expeditionary Brigade
81		medical logistics
82		
83		
84	MEU	
35	MILSTRIP	military standard requisitioning and issue procedure
36	MLC	
87		
38		meals, ready to eat
39		materiel release order
90		major subordinate command
91	11100	
91 92	MSSB	
92 93		
93 94	шээд	Marine expeditionary unit service support group
94 95	NAS	
6		
97		Nava Aviation System Command
)		

98	NCF	
99	NCR	naval construction regiment
100	NIMS	
101		in stock
102		
103		
104	OA	operational architecture
105		on hand
106		operating level
107		organizational maintenance activity
107		operational manuver from the sea
100		operational maneuver nom the sea
110		
111		
112		operation order
112		
-		operational readiness float
114	081	order ship time
115	DE	• • • • • • •
116		
117		principal end item
118		
119		
120		
121	POR	packaged operational rations
122	POS	
123		
124	RA	requisition authority
125	RIP	repairable issue point
126	RO	
127	ROP	
128	RRP	
129		
130		
131		
132	SAC	stores accounting code
133		
134		salvage collection point
135		secondary reparable
136		survey, liaison and reconnaissance party
137		Selected Marine Corps Reserve
137		Supported Activities Supply System Management Unit
138		
		standard operating procedure
140		
141		special purpose Marine air-ground task force
142		social security number
143	*	
144		
145	SupBn	
146		
147	T&R	
148	TAACOM	theater Army area command

TAHQ theater Army headquarters TAM table of authorized material TAMMC theater Army materiel management center TAVB aviation logistics support ship TC AIMS Transportation Coordinator's Automated Information for Movement System T/E table of equipment T/O table of organization TPFDD time-phased force and deployment data Trng training TSA training squadron allowance TSC US Army Theater Support Command	
UER unit equipment report	
U/I unit of issue	
UND urgency of need designator	
USTRANSCOM United States Transportation Command	
WRM	
WRS-A war reserve stocks for allies WWX	
Section II: Definitions	
accompanying supplies —Unit supplies that deploy with forces. (Joint Pub 1-02) That materiel, including consumables, that moves with and supports the deploying MAGTF. Marine Corps doctrine requires that MAGTFs deploy with up to 60 days of supplies.	
allowance items —The quantity of items of supply or equipment prescribed by Marine Corps tables of equipment or other authorized allowance publications. (MCRP 5-12C)	
assault echelon —In amphibious operations, the element of a force comprised of tailored units and aircraft assigned to conduct the initial assault on the operational area. Also called AE. (JP 1-02)	

180 **assault follow-on echelon**—In amphibious operations, that echelon of the assault troops,

181 vehicles, aircraft equipment, and supplies which, though not needed to initiate the assault, is

required to support and sustain the assault. In order to accomplish its purpose, it is normally

required in the objective area no later than five days after commencement of the assault landing.Also called AFOE. (JP 1-02)

beachmaster unit—A commissioned naval unit of the naval beach group designed to provide to
 the shore party a Navy component known as a beach party, which is capable of supporting the
 amphibious landing of one division (reinforced). Also called BMU. (JP 1-02)

188 combat service support—The essential capabilities, functions, activities, and tasks necessary to

sustain all elements of operating forces in theater at all levels of war. Within the national and

190 theater logistic systems, it includes but is not limited to that support rendered by service forces in

ensuring the aspects of supply, maintenance, transportation, health services, and other services

192 required by aviation and ground combat troops to permit those units to accomplish their missions

193 in combat. Combat service support encompasses those activities at all levels of war that produce

194 sustainment to all operating forces on the battlefield. Also called CSS. (JP 1-02)

- 195 **combat service support detachment**—A separate task organization of combat service support
- assets formed for the purpose of providing rearming, refueling, and/or repair capabilities to the
- 197 Marine air-ground task force or designated subordinate elements; e.g., a battalion conducting
- independent operations or an aircraft squadron operating at a remote airfield. The combat service
- support element normally provides the command element of a combat service supportdetachment. Also called CSSD. (MCRP 5-12C)

201 **combat service support element**—The core element of a Marine air-ground task force

- 202 (MAGTF) that is task-organized to provide the combat service support necessary to accomplish
- 203 the MAGTF mission. The combat service support element (CSSE) varies in size from a small
- detachment to one or more force service support groups. It provides supply, maintenance,
- transportation, general engineering, health services, and a variety of other services to the
- 206 MAGTF. It may also contain other Service or foreign military forces assigned or attached to the
- 207 MAGTF. The CSSE itself is not a formal command. Also called CSSE. (MCRP 5-12C)
- 208 consumable supplies—Those articles which, after issue, are chemically or physically altered 209 with use to the extent that they cannot be economically reused for their original purposes. They
- 210 are not normally returned to a storage or industrial activity for repair. Consumable supplies are
- 211 either consumed in use or lose their identity in the process of work or performance of service.
- They include such items as office supplies, petroleum, oil, and lubricant products, and lumber.
- 213 Crane report—An annual serial number reconciliation (physical inventory) with the Navy
- 214 Registry, Crane Division, Naval Surface Warfare Center, Crane, IN.
- 215 **day(s) of ammunition**—Unit of measurement of replenishing ammunition expressed as a
- 216 specified number of rounds, or items of bulk ammunition as may be appropriate per weapon, unit, 217 individual kit, set, or using device required for one day of combat. (MCRP 5-12C)
- 217 individual kit, set, or using device required for one day of combat. (MCRP 5-12C)
- 218 demand(s)—An indication of a requirement (requisition, request, issue, etc.) for issue of 219 serviceable materiel. Demands are categorized as either recurring or nonrecurring.
- expendable supplies and material—Supplies that are consumed in use, such as ammunition,
 paint, fuel, cleaning and preserving materials, surgical dressings, drugs, medicines, etc., or which
 lose their identity, such as spare parts, etc. See also consumable supplies. (Joint Pub 1-02)
- fly-in echelon—1. Includes the balance of the initial assault force, not included in the assault echelon, and some aviation support equipment. (JP 1-02). 2. Airlifted forces and equipment of the MAGTF and Navy support element plus aircraft and personnel arriving in the flight ferry of the aviation combat element. Also called FIE. (MCRP 5-12C)
- force sustainment—Capabilities, equipment, and operations that ensure continuity, freedom of
 action, logistics support, and command and control. (MCRP 5-12C)
- helicopterborne operation—A military action in which combat forces and their equipment
 maneuver about the battlefield by helicopters or vertical-landed aircraft (MCRP 5-12C)
- host-nation support—Civil and/or military assistance rendered by a nation to foreign forces
- within its territory during peacetime, crises or emergencies, or war based on agreements mutually concluded between nations. (JP 1-02)
- 234 integrated material management—The exercise of total Department of Defense-level
- 235 management responsibility for a federal supply group or class, commodity, or item by a single
- agency. It usually includes computation of requirements, funding, budgeting, storing, issuing,
- cataloging, standardizing, and procuring functions. (JP 1-02)

integrated material manager—Any activity/agency designated to exercise integrated material management for a Federal supply group/class commodity or item on a DOD or Federal

- 240 Government level. (User Manual 4400.71)
- joint operation—An operation carried on by a force which is composed of significant elements of the Army, Navy or the Marine Corps, and the Air Force, or two or more of these Services
- operating under a single commander authorized to exercise unified command or operational
- control over joint forces. Note: A Navy/Marine Corps operation is not a joint operation.
 (MCRP 5-12C)
- 246 maritime prepositioning force—A task organization of units under one commander formed for
- the purpose of introducing a MAGTF and its associated equipment and supplies into a secure
- area. The maritime prepositioning force is composed of a command element, a maritime
- prepositioning ships squadron, a MAGTF, and a Navy support element. (MCRP 5-12C)
- operating level of supply—The quantities of materiel required to sustain operations in the
 interval between requisitions or the arrival of successive shipments. These quantities should be
 based on the established replenishment period (monthly, quarterly, etc.). (JP 1-02)
- plan for landing supplies—A plan peculiar to amphibious operations. It prescribes the levels to be landed at prescribed times and sets forth the means by which the transfer from ship to shore is accomplished. It includes instructions concerning supplies to be landed with assault troops,
- 256 prescribed loads, mobile loads for vehicles, floating dumps, supply by helicopter or other aircraft, 257 selective and general unloading, and dump levels to be achieved during various phases.
- 257 selective and general 258 (MCRP 5-12C)
- port of embarkation—The geographic point in a routing scheme from which cargo or personnel depart. This may be a seaport or aerial port from which personnel and equipment flow to port of debarkation. For unit and non-unit requirements, it may or may not coincide with the origin. Also called POE. (JP 1-02)
- principal end item—A final combination of major end products, component parts, and/or
 materials which are ready for their intended use (e.g., truck, aircraft, tank, etc.).
- reorder point—1. That point at which time a stock replenishment requisition would be submitted to maintain the predetermined or calculated stockage objective. 2. The sum of the safety level of supply plus the level for order and shipping time equals the reorder point. (JP 1-02)
- repairable item—A nonconsumable item of supply normally repaired and for which
 condemnation authority can be exercised below the depot level of maintenance.
- 270 **safety level of supply**—The quantity of materiel, in addition to the operating level of supply,
- required to be on hand to permit continuous operations in the event of minor interruption of normal replenishment or unpredictable fluctuations in demand. (JP 1-02)
- 273 secondary items—Items, consumable and nonconsumable, other than principal end items.
- secondary reparable—A reparable item other than the primary unit/end item. They are not
 functional by themselves, but are components of other items. Also called secrep.
- 276 Not mentioned in this publication.
- stockage objective—The maximum quantities of materiel to be maintained on hand to sustain
 current operations. It will consist of the sum of stocks represented by the operating level and the
 safety level. (JP 1-02)
- supplies—In logistics, all materiel and items used in the equipment, support, and maintenance of
 military forces. (JP 1-02)

- supply—The procurement, distribution, maintenance while in storage, and salvage of supplies,
 including the determination of kind and quantity of supplies. (JP 1-02)
- supply control—The process by which an item of supply is controlled within the supply system,
 including requisitioning, receipt, storage, stock control, shipment, disposition, identification, and
 accounting. (JP 1-02)
- supported activities supply system—The automated supply management system specifically
 developed to support the Fleet Marine Force. It is designed to accomplish supply accounting for
 all elements of a Marine expeditionary force and it minimizes the requirement to perform manual
 accounting operations. Also called SASSY. (MCRP 5-12C)
- supported commander—The commander having primary responsibility for all aspects of a task
 assigned by the Joint Strategic Capabilities Plan or other joint operation planning authority.
 (extract from JP 1-02)
- supporting commander—A commander who provides augmentation forces or other support to a
 supported commander or who develops a supporting plan. Includes the designated combatant
 commands and Defense agencies as appropriate. (extract from JP 1-02)
- sustainment—The provision of personnel, logistic, and other support required to maintain and
 prolong operations or combat until successful accomplishment or revision of the mission or of the
 national objective. (JP 1-02)
- 300 tactical-logistical group—Representatives designated by troop commanders to assist Navy 301 control officers aboard control ships in the ship-to-shore movement of troops, equipment, and
- 302 supplies. Also called TACLOG group. (JP 1-02)
- theater—The geographical area outside the continental United States for which a commander of
 a combatant command has been assigned responsibility. (Joint Pub 1-02)
- 305 throughput—The average quantity of cargo and passengers that can pass through a port on a 306 daily basis from arrival at the port to loading onto a ship or plane, or from the discharge from a 307 ship or plane to the exit (clearance) from the port complex. Throughput is usually expressed in 308 measurement tons, short tons, or passengers. Reception and storage limitation may affect final
- 309 throughput. (JP 1-02) In logistics, the flow of sustainability assets in support of military
- 310 operations, at all levels of war, from point of origin to point of use. It involves the movement of
- 311 personnel and materiel over lines of communications using established pipelines and distribution
- 312 systems. (MCRP 5-12C)
- 313 throughput system—The logistic infrastructure that links; a. production logistics to consumer 314 logistics, and b. the sources of operating forces' military capability to the sustainability of those 315 forces. It is associated distribution systems (ports, bases, and airfields), civilian agencies, and
- 316 supporting forces and service troops which operate those facilities and installations.
- 317 (MCRP 5-12C)
- time-phased force and deployment data—The Joint Operation Planning and Execution System
 database portion of an operation plan; it contains time-phased force data, non-unit-related cargo
 and personnel data, and movement data for the operation plan, including the following: a. Inplace units; b. Units to be deployed to support the operation plan with a priority indicating the
 desired sequence for their arrival at the port of debarkation; c. Routing of forces to be deployed;
 d. Movement data associated with deploying forces; e. Estimates of non-unit-related cargo and
- 324 personnel movements to be conducted concurrently with the deployment of forces; and **f**.
- 325 Estimate of transportation requirements that must be fulfilled by common-user lift resources, as
- well as those requirements that can be fulfilled by assigned or attached transportation resources.
- 327 Also called TPFDD. (JP 1-02)

APPENDIX G REFERENCES

3 Joint Publications

- 4 Joint Pub 1-02 Department of Defense Dictionary of Military and Associated Terms 5
 - Joint Doctrine for Amphibious Operations Joint Pub 3-02
- 6 Joint Pub 4-0 Doctrine for Logistics Support of Joint Operations
- 7 Joint Pub 4-01.2 Sealift Support
- 8 Containers (under development) Joint Pub 4-01.7
- 9 Joint Doctrine for Petroleum Operations Joint Pub 4-03
- 10 Joint Pub 4-05 Doctrine for Health Service Support in Joint Operations
- 11 Doctrine for Planning of Joint Operations Joint Pub 5-0
- 12

1

2

Marine Corps Warfighting Publications 13

- 14 MCWP 4-1 Logistics Operations
- 15 MCWP 4-11 Tactical-Level Logistics
- 16 MCWP 4-11.1 Health Services Support Operations
- MCWP 4-11.3 **Transportation Operations** 17
- 18 MCWP 4-11.4 Maintenance Operations
- 19 Seebee Operations in the MAGTF MCWP 4-11.5
- 20 **Bulk Liquids Operations** MCWP 4-11.6
- 21 MCWP 4-11.8 Services in an Expeditionary Environment
- 22 **Operational-Level Logistics** MCWP 4-12
- 23 **MCWP 5-1** Marine Corps Planning Process
- 24

Marine Corps Reference Publications 25

- 26 MCRP 4-11.8A Marine Corps Field Feeding Program
- **Operational Terms and Graphics** 27 MCRP 5-12A
- 28 **MCRP 5-12C** Marine Corps Supplement to Department of 29
 - Defense Dictionary of Military and Associated Terms
- 30 MCRP 5-12D Organization of Marine Corps Forces
- 31

Dual-Designate Manuals 32

- 33 NWP 22-9/FMFM 13-4 Naval Construction Force Support of MAGTF Operations NWP 22-10/FMFM 1-5 34 Maritime Prepositioning Force Operations
- 35
- 36

36 Marine Corps Orders

37 38	MCO 4000.10	Policy on Select Table of Authorized Materiel (TAM) Type 3 Items
39	MCO P4081.1	War Reserve Manual (under development)
40	MCO 4400.16	Uniform Materiel Movement and Issue Priority System
41	MCO P4400.39	War Reserve Materiel Policy Manual
42	MCO P4400.150	Consumer-Level Supply Policy Manual
43	MCO P4400.172	T/E Allowance Change Procedures
44	MCO P4400.177	Marine Corps Aviation Supply Desk Top Procedures (ASDTP)
45	MCO 8010.1	Class V (W) Planning Factors for Fleet Marine Force Combat Operations
46	MCO 8011.4	Marine Corps Policy and Procedures for Class V(W) Materiel (Peacetime)
47		

48 **Other References**

49	MCBul 3000	Table of Marine Corps Ground Equipment Resource		
50		Reporting (MCGERR) Equipment		
51				
52	NAVMC 1017, USMC Table of Authorized Material			
53				
54	NAVSEAINST 8370.	2, Small Arms and Weapons Management Policy and Guidance		
55				
56	UM 4400-124			
57				
58	DoD 4140.1-R			