NATO STANDARD

ALP-17

REPORTABLE ITEM CODE SPECIFICATION

Edition A Version 1

FEBRUARY 2018

NORTH ATLANTIC TREATY ORGANIZATION

ALLIED LOGISTICS PUBLICATION

INTENTIONALLY BLANK

NORTH ATLANTIC TREATY ORGANIZATION (NATO)

NATO STANDARDIZATION OFFICE (NSO)

NATO LETTER OF PROMULGATION

5 February 2018

1.   The enclosed Allied Logistics Publication ALP-17, Edition A, Version 1, REPORTABLE ITEM CODE SPECIFICATION, which has been approved by the nations in the Logistics Committee Executive Group in Standardization format, is promulgated herewith. The agreement of nations to use this publication is recorded in STANAG 4788.

2.   ALP-17, Edition A, Version 1, is effective upon receipt.

3.   No part of this publication may be reproduced, stored in a retrieval system, used commercially, adapted, or transmitted in any form or by any means, electronic, mechanical, photo-copying, recording or otherwise, without the prior permission of the publisher. With the exception of commercial sales, this does not apply to member or partner nations, or NATO commands and bodies.

4.   This publication shall be handled in accordance with C-M(2002)60.

Edvardas MAŽEIKIS
Major General, LTUAF
Director, NATO Standardization Office

INTENTIONALLY BLANK

RESERVED FOR NATIONAL LETTER OF PROMULGATION

INTENTIONALLY BLANK

RECORD OF RESERVATIONS

CHAPTER	RECORD OF RESERVATION BY NATIONS
Note: The reservations listed on this page include only those that were recorded at time of promulgation and may not be complete. Refer to the NATO Standardization Document Database for the complete list of existing reservations.	

INTENTIONALLY BLANK

RECORD OF SPECIFIC RESERVATIONS

[nation]	[detail of reservation]

Note: The reservations listed on this page include only those that were recorded at time of promulgation and may not be complete. Refer to the NATO Standardization Document Database for the complete list of existing reservations.

INTENTIONALLY BLANK

TABLE OF CONTENTS

INTENTIONALLY BLANK

CHAPTER 1   INTRODUCTION

1.1.   INTRODUCTION

1.   The overall purpose of the Reportable Item Codes (RIC) system is to produce a standardized format for reporting items of interest in a multinational and multi-lingual environment. Within NATO there are hundreds of thousands of items that are possibly relevant for operations. RICs were introduced to categorize these items according to their operational characteristics.

2.   A RIC is a code assigned to individual assets (equipment, materiel, supplies and personnel) to categorise them according their main characteristics. It is used to define operational capabilities for NATO's user communities' needs. In a RIC each character identifies a hierarchical level in the tree structure. The items are the leaves of the tree structure and are identified by six alphanumeric characters.

3.   The RIC system covers all mission reportable items. Further detailed classification of what is "mission essential" and what is "mission dependant" rests with the NATO Commander or operations/logistics staffs in order to accomplish the mission outlined in the operation plan (OPLAN), or during the Operational Planning Process to assess various Courses of Action (COAs). The allocation of an accurate RIC is critical to NATO logistics reporting in particular. It is important to understand that the RIC system allows for logistics reports to feed the required information to the NATO Common Operational Picture (NCOP) in order to give the Force Commander full visibility over logistics resources transiting into, throughout, and out of the theatre of operations.

4.   The RIC system enables nations to provide information about mission essential items to the Commander, allowing him to analyse the current logistics situation. When associated with additional data, it provides the Commander with asset visibility information about items in use, in store, in maintenance, in transit or in medical treatment.
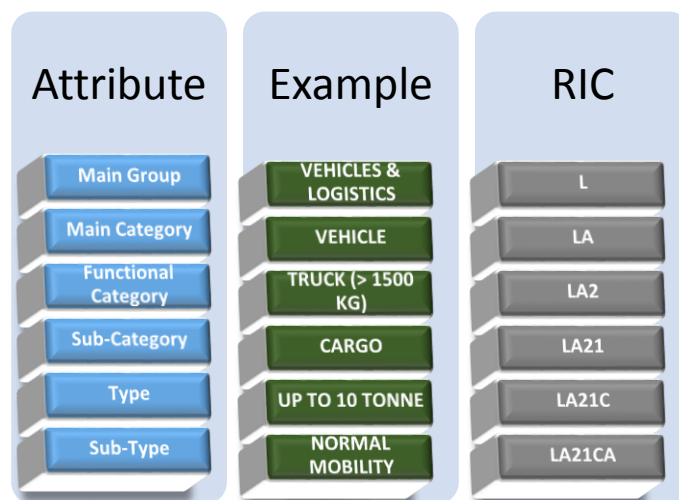
5.   The RIC system is intended to be used in NATO and national logistics information systems. Among these systems, the NATO Logistics Functional Area Services (LOGFAS) is the principal user. Other NATO information systems that use RICs are NATO Depot & Support System (NDSS), Tools for Operational Planning, Functional Area Services (TOPFAS) and NATO Defence Planning Automated Support System (NDPASS). In the future, LOGFS shall become the principal user of the RICs.

6.   The ever-growing community of RIC users has generated the need for establishing procedures for the production, maintenance and use of RICs. RICs are centrally regulated and controlled. A Standard Operating Procedure (SOP) on how a new RIC can be requested and an existing RIC can be modified exists (Ref [A]). The RIC STANAG will enable the RICs to be included in the NATO standardised codification system, and will extend its use by the national information systems. This

will positively influence logistics interoperability, and will improve the format, consistency and integrity of logistics information exchange.

1.2.   REPORTABLE ITEM CODE

1.   The Reportable Item Codes are designed to be a systematic and comprehensive classification to codify the capability of equipment, materiel, supplies and personnel. These items are to be classified by their essential characteristic versus their incidental characteristics. The classification allows the user to identify the specific characteristics of an item without the difficulties of language, terminology or abbreviations used by different nations. The current RIC system uses a 6-digit alpha/numerical code, in which items are classified as detailed as needed for planning purposes, but as generic as possible to reduce national workload.

Attribute	Example	RIC
Main Group	VEHICLES & LOGISTICS	L
Main Category	VEHICLE	LA
Functional Category	TRUCK (> 1500 KG)	LA2
Sub-Category	CARGO	LA21
Type	UP TO 10 TONNE	LA21C
Sub-Type	NORMAL MOBILITY	LA21CA

Figure 1: RIC Structure Example

2.   Some kinds of equipment with very specific capabilities, which have relatively few makes/models (such as tanks and combat aircraft), may be listed by make/model. These may further be decomposed by functional upgrades. For example, LEO-2 (Main Battle Tank), with variants (A4, A5, A6, etc.)

3.   A detailed description of the logical construction of RICs can be found in ANNEX A. Each item must have only one RIC assigned. If the characteristics to which items are classified are not mutually exclusive, and if the characteristics of an item would qualify it for more than one RIC, then one of these RICs shall be assigned and all others de-activated/deleted, if they already exist.

1.3.   DATA EXCHANGE AND INTEROPERABILITY

1.   For NATO Logistics the RIC is the key identifier for logistics data coming from the nations. Therefore the RIC will have to be used well into the future by the NATO

military command structure, nations and partners who intend to use LOG FS or have to be interoperable with LOG FS, which is subject of Force Goal 2860 (Ref [B]).

2.   Adoption of the RIC standard will ensure that the RICs are consistently used within information systems which identify items and are coordinated as well as externally coherent with the wider aspects of Bi-SC AIS. This will positively impact logistics visibility for the NATO Commander and support NATO's Operations Logistics Chain Management (Ref [C]).

INTENTIONALLY BLANK

Edition A Version 1

CHAPTER 2   RIC MANAGEMENT

2.1.   RIC MANAGEMENT PRINCIPLES

1.   RICs are one of the most important key data elements for information interoperability, and must therefore be maintained and updated under rigorous procedures. The procedures adopted to achieve these standards must however remain simple and allow for transparency throughout the RIC management process.

2.   Only one RIC version is to be considered valid at any one time. RIC versions shall be indicated by incremental integers (i.e. v1, v2, v3, etc.)

3.   All users of RICs are invited to contribute to the development by stating requirements and/or RIC change requests (via their RIC coordinator) and are invited to take part in the management process.

4.   Changing the RIC version has consequences for many users. Version changes involve all RIC using communities and therefore all NATO commands, nations and operational theatres. Consequently, version changes shall only be introduced to a maximum of twice a year.

5.   The RIC system is user-oriented and user-driven. RIC codification will only be done in areas and for capabilities where users can be clearly identified. There will be no codification effort in areas that have no perceived asset visibility value. The codification will be done according to the user requirements and validated by subject matter experts.

6.   RICs shall remain as generic as possible, focusing on capability rather than characteristics such as manufacturer or model. Their purpose is to categorize and therefore it is generally not intended to codify each possible item on such a level that the RIC identifies the item specifically. For example, RIC shall not duplicate NATO Stock Numbers and their level of accuracy.

2.2.   RIC MANAGEMENT STRUCTURE AND RESPONSIBILITIES

1.   Logistics Reporting Working Group (LOGREP WG) is Bi-SC WG responsible for Logistics Reporting capability development in all aspects of DOTMLPFI. Logistics Reporting Working Group (LOGREP WG) is responsible to the Logistics Coordination Board (LCB) and acts under its authority.

2.   The LOGREP WG is responsible for RIC configuration management, and the development and maintenance of this standard. The LOGREP WG provides status and progress reports to the LCB. The LOGREP WG cooperates with and therefore can provide status and progress report to the Bi-SC Logistics Functional Services Information Management WG (LOGFS IM WG) or to other groups when requested

2.2.1. LOGREP WG:

- Acts as owner of the RIC structure and the RICs on behalf of the Bi-SC,

- Is the executive RIC Management authority,

- Is the final arbiter for any disputes pertaining to RIC Management,

- Agrees on content and time of release of new RIC versions,

- Resolves open questions,

- Involves other FAS and NATO Commands as required,

- Generates a decision sheet after the meeting showing the participation and decisions taken.

2.2.2. RIC Executive Officer

Role assigned to: ACO J4 LOG, Logistics Plan & Requirement Section

- Acts as initial POC for all RIC related questions,

- Develops RIC changes and concepts, liaising with SMEs as required,

- Develops initial guidance for RIC Manager,

- Stays in close contact with RIC Manager, LOGREP WG and all related Working Groups,

- Assists in identifying and tasking Subject Matter Expert (SME), as required,

- Recommends major changes and presents minor changes to the LOGREP WG for approval,

- Distributes a decision sheet after the LOGREP WG meeting.

- Is the official publisher and distributor of RIC Deletion Candidate List, RIC release and other major RIC related information to the RIC user community (via the RIC Coordinators),

- Provides feedback to RIC Change Requests (via the relevant RIC Coordinator),

- Maintains the POC distribution list,

- Coordinates the distribution/publishing with the RIC users and

- Maintains the RIC area on NATO's LOGNET website[1].

2.2.3. RIC Manager

Role assigned to: NCIA Service Support and Business Applications Service Line

---

[1] https://lognet.nato.int

- Maintains the latest RIC version,

- Maintains and further develops the technical note on "RIC Specification" (Ref [D]),

- Incorporates changes approved by the LOGREP WG,

- Reports to the RIC Executive Officer,

- Develops and maintains the RIC management tool,

- Documents all changes,

- Creates RIC Update files,

- Prepares the draft of the next RIC Version and the documentation of changes for distribution.

2.2.4. National / NATO RIC Coordinator

Role assigned to: Point of Contact within a Nation or NATO Body, or managers of NATO Systems

- Is the senior user representative for the RIC Manager and manages all RIC related issues with the end users in his area of responsibility.

- Establish and maintain a list of RIC users/systems within their nation/NATO body and coordinate all RIC related communication with them

- Nations must nominate a RIC POC for national coordination and inform the RIC Executive officer whenever a change occurs

- Review, validate and de-conflict RIC Change Requests from recognised RIC users

- Submit RIC Change Requests to the RIC Executive Officer. RIC Change Requests will only be accepted when submitted by the national RIC Coordinator

- Ensures that the current RIC Change Request form is used for change requests.

- Review RIC Deletion Candidate List for potential issues relating the usage of items proposed for deletion (i.e. ensure that none are in use by their RIC using community)

- Ensure that new RIC versions are applied by all users/systems within their area of responsibility.

2.2.5. RIC Users

Role assigned to: Personnel working with a RIC using system (e.g. LOGFAS, TOPFAS, etc.) in NATO (HQs, agencies and nations), PfP nations, and NATO led operations:

- Identify and request changes (see ANNEX B) to the RIC structure via their RIC Coordinator to better support their requirements,

- Provide feedback on RIC related issues beyond RIC Change Requests via their RIC Coordinator, and

- Ensure that they are included in their RIC Coordinator's list of users.

2.2.6. Subject Matter Experts (SMEs)

Role assigned to: Experts from Nations, NATO Command Structure, NATO Agencies or NATO Working Groups

- Person or group with expertise in specific capability areas.

- Assist in troubleshooting RIC structure problems.

- Review and recommend action on RIC Change Requests.

- May be appointed by the RIC Executive Officer for a longer period or – if required – may be selected temporarily on ad-hoc basis.

2.3. RIC MANAGEMENT PROCEDURES

1. The following figure provides an Overview for RIC Management / RIC Change Proposal. Each step is depicted by the circled numbers:
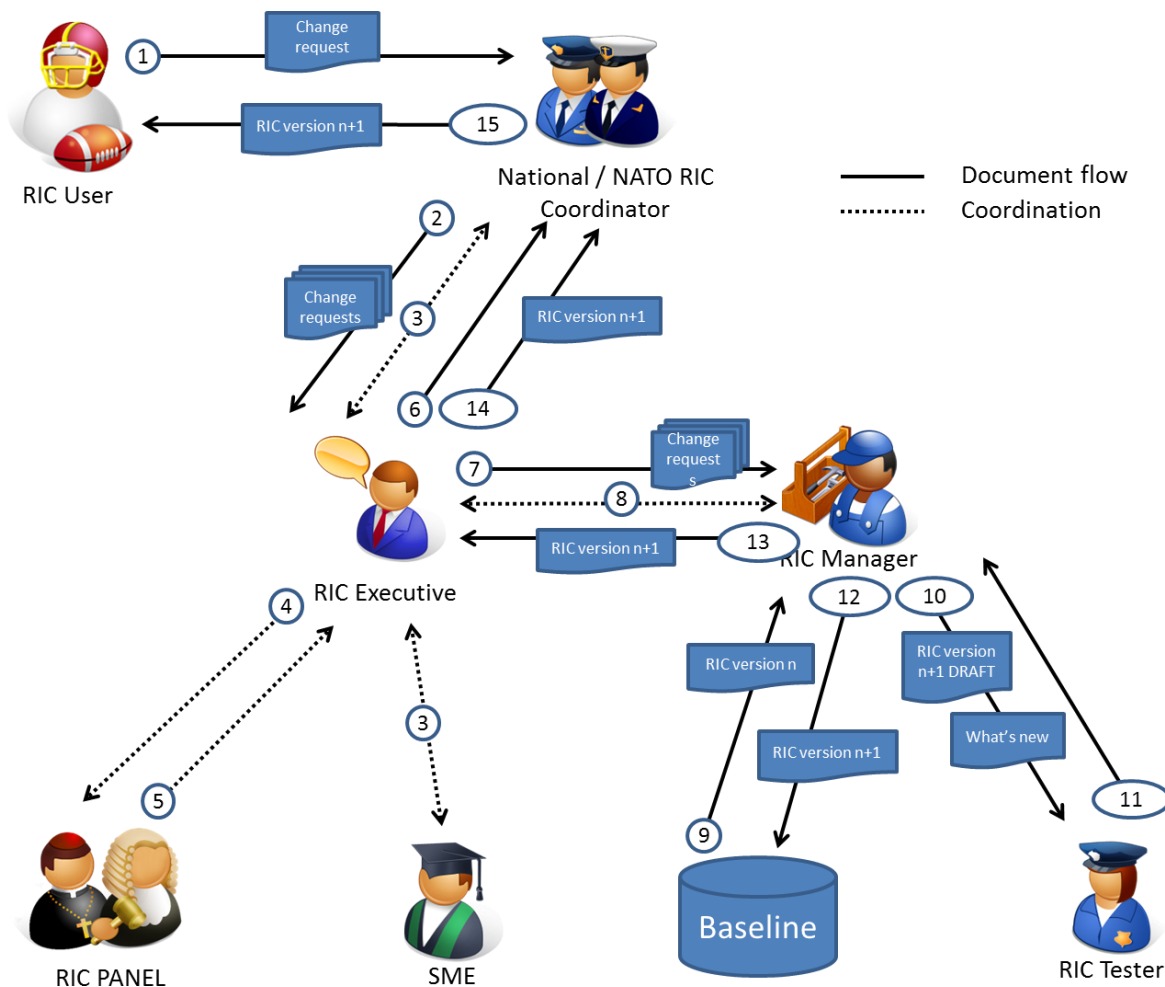
Figure 2: RIC Procedures

1.   The RIC user identifies need for changes in the current RIC Version and creates a RIC Change Request (see ANNEX B for template) that is sent to their National / NATO Command Structure (NCS) RIC Coordinator.

2.   The National / NATO RIC coordinator harmonizes RIC requests in his area of responsibility (including identifying conflicting/duplicate requests) and forwards the requests to the RIC Executive Officer.

3.   In case of issues, the RIC Executive Officer seeks clarification from the National / NCS RIC coordinator and liaises with SMEs from NATO HQ, nations, or other organisations as required.

4.   The RIC Executive Officer forwards conceptual questions, issues and requests for guidance to the RIC Panel within the LOGREP WG for further decisions, if required.

5.   The RIC Panel decides about conceptual questions and issues and provides guidance as deemed appropriate, and replies to the RIC Executive Officer.

6.   The RIC Executive Officer provides feedback the National/NATO RIC Coordinator on the processing of the RIC Change Requests. If a RIC Change Request is rejected (or accepted with modification), details are provided.

7.   The RIC Executive Officer forwards the change requests to the RIC Manager, stating principal approval, restrictions and guidance.

8.   If required, conceptual questions, unresolvable issues and requests for guidance are sent by the RIC Manager to the RIC Executive Officer.

9.   The RIC Manager takes the latest valid RIC version (version n), documents the changes and develops the draft of the next RIC Version (version n+1)

10.   The RIC Manager incorporates the approved changes and the results of discussions and investigations and generates the RIC Update file for the draft of the next RIC Version, the "What's new" documentation and – if required - a "Read me" file. Then he forwards this package to the RIC Tester.

   a. RIC Update file

   b. "What's New" – overview information about the new version

   c. "Read Me" file, if required

11.   The RIC Tester tests and validates the draft of the next RIC version regarding technical and / or software incompatibilities. If the draft RIC version fails the tests for any reason, coordination with the RIC Manager is performed, resulting in a new draft RIC version, until all tests are passed and the RIC Tester approves the release.

12.   The RIC Manager baselines the new RIC version, including publishing the release package on LOGNET.

13.   The RIC Manager informs the RIC Executive Officer that the new RIC version has been published.

14.   The RIC Executive Officer informs all National/NATO RIC Coordinators on the RIC POC Distribution List of the publication of a new RIC version.

15.   The National/NATO RIC Coordinators inform their users of the publication of the new RIC version and ensure that it is applied to all systems and by all users in their area of responsibility.

CHAPTER 3   RIC SPECIFICATION

3.1.   OVERVIEW

1.   The RIC system is a standardized format for reporting items that covers all potentially mission essential items. It is a hierarchical system with a maximum of six levels.

2.   The RIC system is designed to be a comprehensive classification system that codifies the characteristics of equipment, materiel, supplies and personnel. These items are to be grouped by their essential characteristic versus their incidental characteristics. The classification allows the user to identify the specific characteristic of an item without the difficulties of language, terminology or abbreviations used by different nations.

3.   The current RIC system uses a 6-digit alpha/numerical code, in which items are classified with a RIC as detailed as needed for planning purposes but as generic as possible to reduce national workload. Each item must have only one RIC assigned. If the characteristics to which items are classified are not mutually exclusive, and if the characteristics of an item would qualify it for more than one RIC, then the predominant characteristic must drive the RIC selection.

3.2.   RIC STRUCTURE

1.   As mentioned before, the Reportable Item Coding system is a hierarchical system where each item code consists of six alpha-numeric characters. All six characters are used for all items. It is expected that the RIC system will be used mainly by automated systems. However, it would also facilitate manual entry if needed. To achieve this, letters are used for the first two characters, followed by two digits and ending with two more letters (e.g. AA14AC) with very few exceptions[2]. In a Reportable Item Code, each character identifies a hierarchical level (or branch) in the tree structure. Items are identified by all six alphanumeric characters. Table 1 depicts the RIC structure with the six hierarchical levels of a RIC.

Level	Name	Type
1	Main Group	Letter
2	Main Category	Letter
3	Functional Category	Numeric
4	Sub-Category	Numeric
5	Type	Letter
6	Sub-Type	Letter

---

[2] Exceptions will only occur if too few letters (A-Y) or numbers (1-9) exist to codify a specific RIC on that specific tree or leave level.

Table 1: RIC Structure

2.   For example, the aforementioned RIC **LA21CA** identifies:

RIC	L	A	2	1	C	A
Name	Vehicle & Logistics	Vehicle	Truck (> 1500 KG)	Cargo	Up to 10 Tonne	Normal Mobility

3.   Some further specific coding conventions are applied. The letter **"Z"** is used for any level that does not further specify that item and can be used in any position. The term **"Not Otherwise Specified (NOS)"** is used for Z indicating the lack of further information for that item. The NOS designator can be used at all levels. However, the use of NOS designators should be avoided in practice when further details are known.

4.   Letters **"I"** and **"O**" and the number **"0"** are whenever possible avoided since these can be easily confused by the users.

5.   For example, RIC **AZZZZZ** identifies:

RIC	A	Z	Z	Z	Z	Z
Name	**Armour & Combat Vehicles** (which could be captured enemy equipment) NOS					

6.   The RIC **ZZZZZZ** is used to identify any item which is not described by any other RIC code, at any level. This RIC shall always exist in all release versions.

7.   The RIC **ZZZZZY** is used to identify any item for which the RIC has been deleted during a RIC update. This RIC shall always exist in all release versions.

3.2.1. Level Description

In the following the different levels of the RIC structure will be explained in more detail.

Level 1 – Main Group

The Main Group code defines the family code of the item. The second through sixth characters are different for each family (main group). The following Figure 1 illustrates the 18 different Main Groups defined in the RIC system at the time of writing.

Figure 3: Main Groups

Table 2 provides the description and composition for each of the Main Groups.

Code	Main Group	Description / Composition
A	Armour & Combat Vehicles	Wheeled or tracked armoured vehicles used in military inventories. Many of the armoured vehicles form the mobile platforms for various weapon delivery systems as well as performing a multitude of roles in support of the frontline, combat support and service support troops. All are characterized by varying degrees of armour protection for the crews, occupants and vital components. Armoured vehicles used in Artillery and Ground Based Air Defence primary roles are shown under those Main Groups. Also, armoured VIP vehicles are listed under the Vehicles & Logistics Main Group.
B	Infantry Weapon	Individual non-armoured or small calibre crew-served ground based weapons that are not part of a larger weapon. Equipment used in Artillery and Ground Based Air Defence primary roles shown under those Main Groups. Items that contain explosives are listed under the Munitions Main Group.
C	Artillery	All fixed or mobile ground based artillery guns, howitzers, rocket launchers and coastal defence systems used in support of combat forces. Items with a primary anti-tank or ground based air defence role are excluded. Mortars are listed under the Infantry Weapons Main Group.
D	Ground Based Air Defence	Ground based weapon platforms that have the primary purpose of destroying aircraft or other objects in flight. Weapons with a primary anti-tank, artillery or mortar role are excluded.

Code	Main Group	Description / Composition
E	Ships & Marine Eqpt (NSG 19, 20)	All sea-borne surface and underwater combatants, logistics, training and support vessels. Small boats used in support of land (e.g. inflatable boats) operations are listed under the Vehicles & Logistics Main Group.
H	Aircraft	All fixed or rotary wing aircraft. Ancillary aircraft items are also listed under this Main Group.
K	Radar	All Radars and their supporting systems including training systems are listed under this Main Group.
L	Vehicle & Logistics	Vehicles & Logistics Main Group is a mixed class containing items not grouped under other Main Groups. Non-armoured ground vehicles, transportation and material handling equipment, engineer and support equipment, camouflage and decoy equipment, shelters and containers, fuel handling equipment and water supply equipment are listed under this Main Group.
M	Ammunition & Explosives (NSG 13)	Corresponds to NATO Class V Items that contain explosive or hazardous substances are listed under this Main Group. Launchers and shooting platforms are listed under the respective Main Groups. POL and gases not used in munitions are excluded.
N	CBRN (NSC 1040)	CBRN protection equipment not listed under other Main Groups.
P	POL	Corresponds to NATO Class III. Petroleum fuels, oils and lubricants for all purposes except for use in weapons. Compressed and liquid gases, chemical products, coolants, de-icing and anti-freeze compounds together with component additives to such products are also listed under this Main Group.
Q	Medical (NSG 65)	Medical material including special repair parts but excluding medical major end items listed under other Main Groups (e.g. ambulances). Items for which the medical usage is one of several design options may also be listed under another Main Group.
R	Electronic Warfare	Electronic Warfare systems that are not platforms. Platforms are listed under the respective Main Groups. Includes training systems.
S	Subsistence (NSG 89)	Corresponds to NATO Class I. Items that are consumed by personnel or animals including water, fresh or rationed food, gratuitous health and welfare and other personal demand items are listed under Subsistence Main Group.
T	C4I	C4I systems that are not platforms. Platforms are listed under the respective Main Groups. Includes information systems, communication networks, intelligence gathering systems and computer systems (hardware and software).
U	Unmanned Vehicle and Drone	Aircraft or a vehicle without a human pilot/driver.
W	Waste	Any substance which is discarded after primary use, or it is worthless, defective and of no use

Code	Main Group	Description / Composition
X	Live Animals (NSG 80)	Animals used for military purposes such as horses and dogs.
Y	Personnel	Military and Civilian personnel.
Z	Unknown	Items whose characteristics are not known. The "Z" code should only be assigned temporarily during the investigation of the item's technical and functional characteristics. Once these are known, the item should be classified properly.

Table 2: Main Groups Descriptions and Compositions

Level 2 – Main Category

The main category defines the most general category of the item within each family of a main group. For example, the main categories under the Armour main group include: Tanks, Armoured Fighting Vehicles and Armoured Support Vehicles.

Level 3 – Functional Category

The functional category defines the function of the item within each main category. For example, the functional categories under the Tank main category are: Main Battle Tanks (MBT), and Light Tanks.

Level 4 – Sub-Category

The sub-category further breaks down the items in each functional category according to a relevant characteristic. For gun or cannon based weapon systems, this characteristic is the calibre of the gun or the cannon. For example, the sub-categories for the MBT functional category are: 84mm, 90mm, 105mm, 120mm, 125mm, 140mm and 152mm.

Level 5 – Type

This level lists all types' items under each sub-category. Only the basic types are listed and marks/brands and variants are excluded. For example, the types under the MBT 120mm sub-category are: Leopard-2, M1, Challenger, etc.

Level 6 – Sub-Type

Each distinct mark or variant for the item type is listed. For example, the sub-types under the MBT 120mm Leopard 2 type are: A2, A3, A4, A5, A6 and A6M.

3.2.2. RIC Structural Rules

Rule	Description
S1	RICs on level 1 do not have parents.
S2	Every RIC on level 2 to 6 has a parent in the next higher level.
S3	Every branch of the RIC tree must go down to level 6. That means that every RIC on levels 1 to 5 has at least one child in the next lower level. If no other information is available then the child will be code "Z" with description "NOS".
S4	The following statements are equivalent: The maximum length of an RIC is 6 characters. No branch of the RIC tree has more than 6 levels. RICs on level 6 do not have children.
S5	The short description attribute of an RIC contains the short description attribute of the parent RIC plus additional characters unique under the parent (the short description part). Exception: Code "Z – NOS" does not add characters to the short description field.
S6	The code attribute of a RIC contains the code of the parent RIC plus one character unique under the parent.

Table 3: RIC Structural Rules

The rules allow a display as a tree with a depth of six.

These rules are pre- and post-conditions for any modification, but might be temporarily violated during the execution of modifications.

3.3. RIC ATTRIBUTES

The RIC codes have the attributes described in Table 4 below.

Column Name	Data Type	Allow NULL	Validation	Default
RICID	INTEGER	No	Non-negative	0
RIC	CHAR(6)	No	None	None
Parent RICID	INTEGER	Yes	None	None
Description	CHAR(50)	No	None	None
Short Description	CHAR(50)	Yes	None	None
Indicator	CHAR(1)	Yes	C Consumable M Munitions O Other Q Medical S Shooter T Transportation U Unknown No other values are valid	O
Unit Of Measure	CHAR(2)	No	None	EA (each)

Table 4: RIC Attributes

Each of these attributes is described in more detail below.

3.3.1. RICID

The RICID is a static, surrogate, primary key for the RICs. This means that a RIC, when created, is assigned a unique integer which never changes (between RIC versions) and is never re-used (even if the RIC is deleted).

All RICs and partial RICs are assigned RICIDs.

3.3.2. RIC

The RIC is the natural key for the Reportable Items and is the value that users will most often encounter.

3.3.3. Parent RICID

The RICID of the parent RIC in the 6-level hierarchy. For top level (level 1) RICs, the Parent RICID is NULL (empty).

A RIC is the RIC of its parent, with the addition of one character at end.

3.3.4. Description

For easy identification of each RIC each hierarchical level code is given a description (to a maximum of 50 characters). The complete ("full") description of an item is produced when all six levels of description are combined in sequence.

For example the description for RIC LA21CA would be:

Full Description	Vehicle & Logistics – Vehicle – Truck (> 1500 KG) – Cargo – Up To 10 Tonne – Normal Mobility

Short Description

Each RIC is assigned a short description (up to 50 characters in length), which reflects the abbreviated RIC Full Description. Short descriptions are prefixed by an acronym[3] to make it easier for the user to recognize specific items from the short description. The acronyms also provide an alternative way of searching certain operational characteristics. The short description will be defined by the RIC manager. The current acronyms are listed in Annex A.

---

[3] Some items use universally recognized military abbreviations which, if changed to a three letter format, would merely cause confusion (e.g. ATGW and EW). Therefore these remain unchanged. Although the acronyms are completed for most main groups, rationalization in the Ship, Aircraft and POL main areas is needed.

For example the short description for RIC LA21CA would be:

Short Description   VL-VH-TRU>1.5t-CGO<10t-NRM

3.3.5. Indicator

Indicators are applied using a single character that indicates the item's main function. Currently seven different codes, as depicted in Table 5, could be applied[4]. The RIC indicator is shown in the RIC viewer.

Indicator Codes	Indicates
C	Consumables
M	Munitions
O	Other
Q	Medical
S	Shooter
T	Transportation Asset
U	Unknown

Table 5: Indicator Codes

3.3.6. Unit of Measure

The management of RICs also encompasses the management of unit of measure codes, which are codified using a 2-character identifier (e.g. "LI" represents "Litres"). These codes are managed as part of the RIC update process. The unit of measure "EA" (representing "Each") is the default value and shall always exist.

3.4.   RIC CHANGE REQUESTS

All users of RICs are invited to propose RIC change requests, which will be processed according to the RIC Change Management Process (see Section 2.3).

When requesting a modification, the aim is always to categorize items according to the following question:

"What is its essential characteristic describing a capability?"

Hence, there is no need for every item to be assigned its own RIC. The following example should provide clarification:

It is irrelevant to have a unique RIC for an "ATV, Mercedes", and a second RIC for an "ATV, Peugeot", however it is important in this case to request a RIC for a "Car, rough

---

[4] The indicator domain can be expanded as necessary.

terrain as sedan or estate/wagon". The capability should always be the focus of RIC codification.

RIC changes requests that are approved shall result in one or more RIC modification for the next release.

3.5. RIC MODIFICATIONS

In order to be a valuable tool the RIC needs to be unique, stable with a formal baseline, and be adaptable and upgradeable (under a controlled process) to define new capabilities or priorities.

There are five different modification types used to enhance the RIC structure: ADD, UPD, MOV, DEL and MRG. Table 3 explains these different modification types in more detail including its short description.

Action	Definition	Description
ADD	Addition of new RIC	The action ADD adds a new RIC into the RIC structure including all required fields.
UPD	Update of a RIC	The action UPD changes all fields of an existing, however, the RIC itself remains. If a change of the RIC is required then use MOVE.
MOV	New destination of a RIC in the RIC structure	The action MOV transfers one RIC in the tree structure to another parent. If any other data field to be modified then use UPD.
DEL	Deletion of a RIC	The action DEL deletes the RIC in the tree structure including all children. Items using this RIC will be coded ZZZZZY in order to indicate that the underlying RIC was deleted.
MRG	Merger of two RICs into one	The action MRG merges one dying RIC into one surviving RIC in the tree structure. The items referring to the dying RIC will be coded with the surviving RIC.

Table 6: RIC Structure Modification Types

In order to validate a RIC Request / RIC Change Request, a description explaining the operational characteristics of an item, and how it differs from existing RICs in the

existing RIC structure, is required from the user. Only then it can be assessed if this is a new capability or is represented by a RIC currently existing in the RIC structure.

An example for a RIC Request / RIC Change Request template and its use is in Annex B. Only relevant parts of the RICs are required (trailing Zs can be omitted). When requesting a new RIC or RIC changes, Internet links to the applicable source of data (example Jane's Defence Magazine) should be provided whenever available in order to facilitate the validation process. Additional information, such as the NATO Stock Number, manufacturer's data sheets, etc. are also valuable sources for supporting RIC Change Requests.
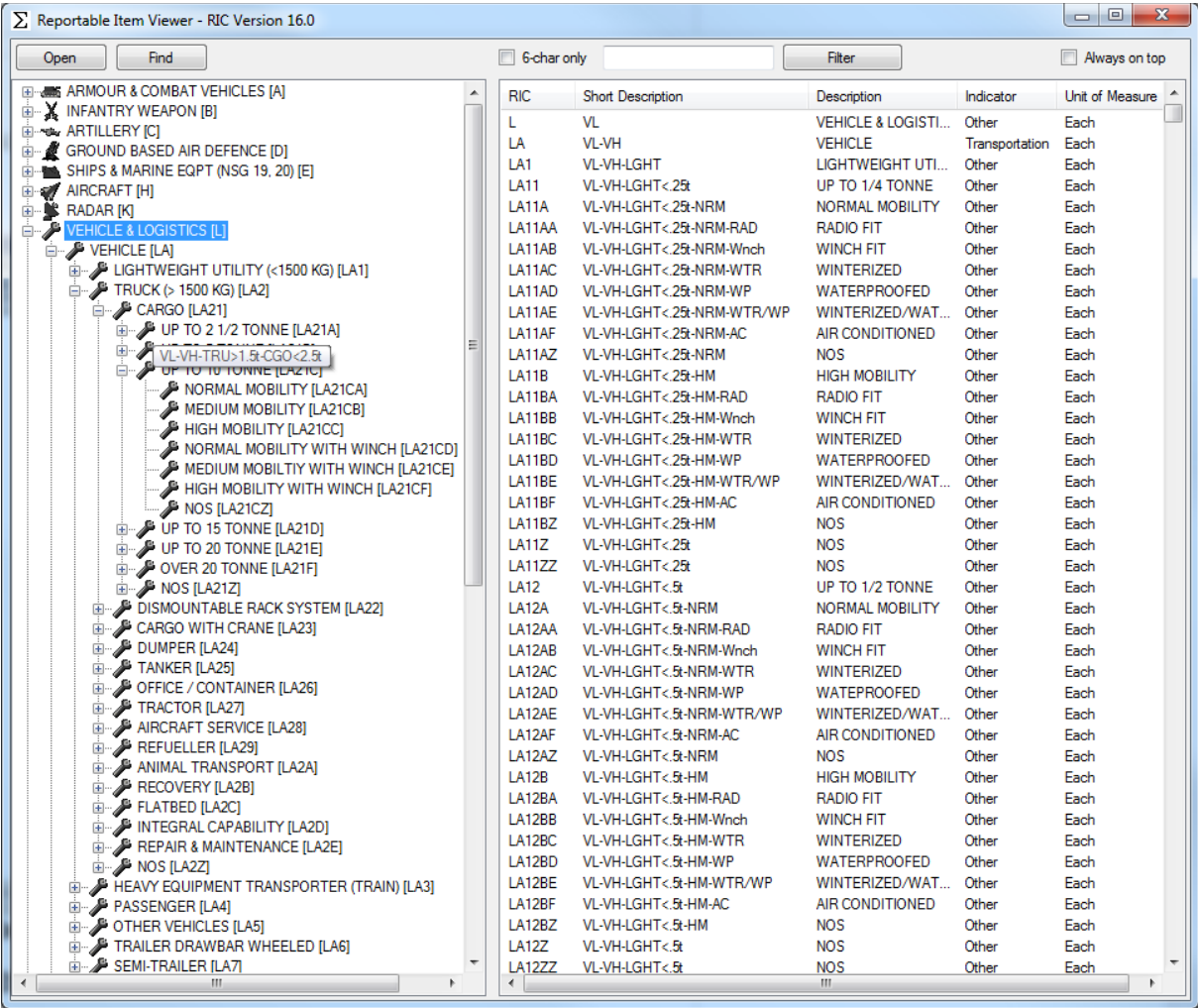

Figure 4: Example RIC Viewer Snapshot

3.6. RIC DELETION PROCESS

As outlined above, deleting RICs (DEL) is one of the options the RIC Request / RIC Change Request procedure offers, but it is the most crucial one. Deletion of a RIC will

change the RIC tree structure including all "Children" belonging to that RIC[5]. Therefore, the following deletion process for RICs must be followed:

(1)   Since the RIC structure should be user driven, every RIC user is allowed to request the deletion of a RIC in order to keep the RIC tree structure continuously improved and up-to-date. A justification for the deletion of a specific item could be that it is no longer in use. RIC users have to state a RIC candidate for deletion using the RIC Request / RIC Change Request Template (see Annex B). The request has to be submitted to the RIC Manager via the appointed National or NCS RIC Coordinator.

(2)   The RIC Manager will check if the requested deletion is generally acceptable (provided format). Every specified RIC candidate for deletion will be earmarked for deletion and a target deletion date will be allocated to that RIC deletion request.

(3)   RICs earmarked for deletion will be collected in a RIC Deletion Candidate List published on LOGNET Web Site under the RIC section by the RIC Manager. This list shall be published four months prior to the release of a new RIC version and will contain the following information:

- RIC deletion requester,

- RIC deletion candidate,

- Target deletion date,

- Current status with possible remarks,

- Final approval for deletion by the LOGREP WG.

(4)   The fixed deletion dates of 30th June and 31st December have been established. Therefore, the RIC requests for deletion must be submitted to the RIC Manager not later than 28th February and 31st August of the calendar year respectively.

(5)   Chairmen of the LOGREP WG, Stockpile Planning Committee (SPC) and LOGFAS M&T WG are obliged to deal with the RIC deletion in their respective meetings on a continuous basis as an agenda item in order to allow Nations/NCS the forum for objections. Decision sheets from those respective meetings will be clearly annotated with those objections and submitted to RIC Executive Officer. Nations not attending these meetings need to break silence in a formal letter to the RIC Executive Officer via their RIC Coordinator.

---

[5] The RIC tree structure is a Parent – Children relationship. This kind of naming is commonly used in information systems. A "Parent RIC" of a RIC is the RIC without the right – most character. A "Child RIC" of a RIC is the RIC plus one additional character on the right. Example: RIC AA (ARM-TNK): The second A (TNK) is the "Child" of the first A (ARM) as "Parent".

(6)   The RIC Executive Officer will inform the RIC Manager on objections to the Deletion Candidate list.

(7)   The RIC Manager will update the RIC Deletion Candidate list on a continuous basis and brief the LOGREP WG about the proposed RIC deletion candidates at each meeting. The LOGREP WG will officially approve formally the proposed deletion.

(8)   Finally, the RIC Manager will execute deletion in the next RIC version.

3.7.   ALGORITHMS

1.   Every modification described in the logical view requires one or more record-level commands to be executed.

2.   The records in the RIC table must follow certain rules. It might be necessary to temporarily violate these rules during the RIC update process, but upon the completion of every logical modification the rules must be obeyed. That requires corrective action after the execution of certain commands.

3.   The rules and algorithms are described in detail in the RIC Specification (Ref [D]).

3.8.   RIC UPDATE

Whenever a new RIC version is released a RIC update file is provided to upgrade from older versions to the latest version. The user can use a tool to process that RIC update file. For example in LogFAS (Logistics Functional Area Services) that tool is called "RIC Updater", which is a specific configuration of the general "Reference Data Updater" library. The RIC updater tool is a re-usable product that can be built into other applications. The format of the RIC update file is defined by a version controlled XSD file managed by NCIA as part of the Reference Data Management process.

The RIC updater tool:

- Reads the RIC Update file

- Executes the changes

- Compares the resulting list with the new master list that is part of the RIC update file and enforces compliance, if required.

The RIC update file consists of the following main elements:

- Header. This element contains information about the format version, the RIC version to be updated, the updated RIC version and the number of modifications.

- List of commands. This element lists all commands to modify individual records in chronological order.

- Master list of RICs. This element contains the complete new RIC version. It is used by the RIC updater to verify that all modifications of the RICs were executed correctly and that the updated old RIC version is equal to the new RIC version.

- Master list of UoMs. This element contains the complete new UoM list. It is used by the RIC updater to verify that all modifications of the UoMs were executed correctly and that the updated old UoM list is equal to the new UoM list.
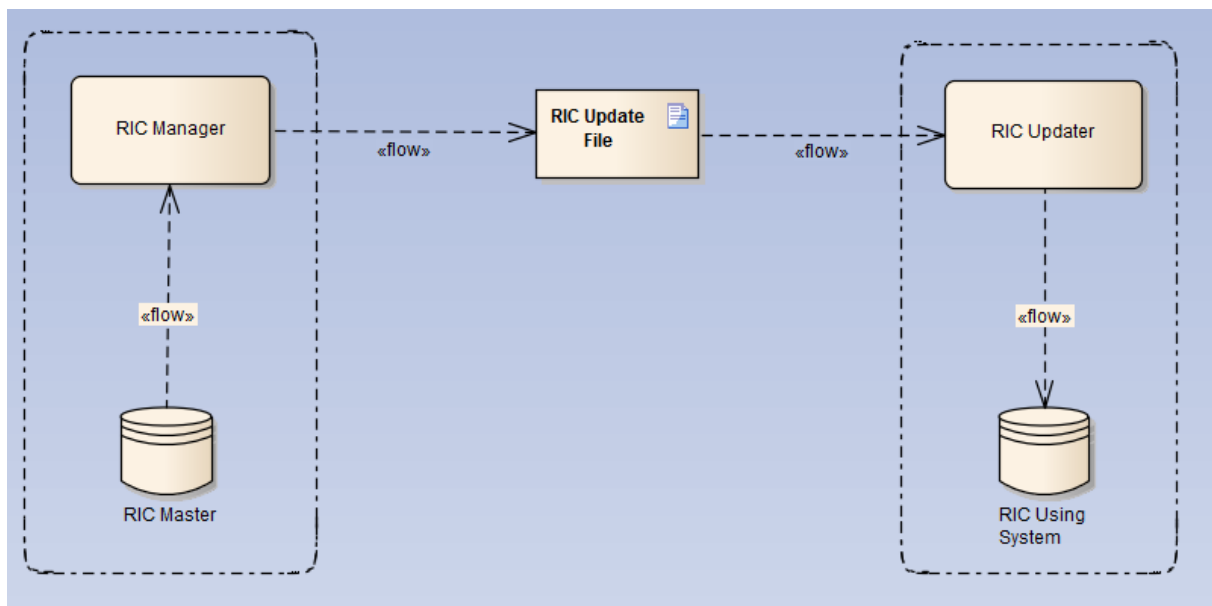
Figure 5: RIC Update Management

INTENTIONALLY BLANK

CHAPTER 4   RIC SPECIFICS

4.1.   RELATIONSHIP WITH NSN

1. The NATO Stock Number (NSN) is a 13-digit numeric code identifying all the 'standardized material items of supply' as they have been recognized by all NATO countries. Several non-NATO nations have also adopted the NSN for inventory management.
2. The system domain covers a wide range of items that range from food rations to aircraft carriers. It has to be pointed out that the scope of the RIC system is always focused on the item's operational characteristics. Therefore, RICs are neither intended to duplicate NATO Stock Numbers (NSN) nor part/serial numbers.
3. Additionally, items assigned a RIC are not limited to those found in NATO nations' respective inventories, but also those items of interest from other countries that may be used in a NATO led operation.
4. The overlap between the RICs and NSNs has been identified as the relationship between the NSC (NATO Supply Class) or NSG (NATO Supply Group) and the RIC "branches" (usually at 3rd or 4th level). The NSN itself is a national-specific code (i.e. the same item will have a different NSN for each nation making it), whereas the RIC is by design common across all nations.
5. Due to the differences in the way that the two codification systems have evolved, the following rules apply:
    *   The relationship is not homogenous (it is many-to-many)
        o   A RIC-branch may map to multiple NSCs
        o   An NSC may map to multiple RIC branches
    *   The relationship is not comprehensive
        o   There will be RIC-branches without any NSC mapping
        o   There will be NSCs without any RIC-branch mapping
6. The technical report on RIC-NSN Interface at Ref [E] (Linkage of Reportable Item Codes (RIC) and NATO Stock Numbers (NSN)) describes the efforts under way for the implementation of RIC-NSN NATO Web Service Interface. This interface will enable the mapping of RICs to NSNs (at the NSC/NSG level) and vice versa.

INTENTIONALLY BLANK

ANNEX A   CONSTRUCTION of RICs

A.1.   Introduction

System managers wishing to implement RICs within their system should follow the instructions presented here. By following these standards, their system shall be able to utilise the RIC Updater and the RIC Update Files.

A.2.   Tables

There are two tables to be centrally controlled:

- Table "ReportableItem": Self-referencing to represent the RIC structure. It contains full and partial RICs.
- Table "UnitOfMeasure": Contains all valid units of measurement.

One additional table is needed to contain information about the current RIC version:

- Table "Version": Contains one record that represents the actual RIC version loaded in the table "ReportableItem". This table may also be used to store version information for other data sets.

A.2.1. Table: ReportableItem

A.2.1.1   Columns

Column Name	Data Type	Allow NULL	PK	FK	Validation	Default	Attribute
ReportableItemCodeID	INTEGER	No	Yes	No	Non-negative	0	RIC ID
ReportableItemCode	CHAR(6)	No	No	No	None	None	RIC Code
ParentReportableItemCodeID	INTEGER	Yes	No	Yes[6]	None	None	Parent of RIC
Description	CHAR(50)	No	No	No	None	None	Description
ShortDescription	CHAR(50)	Yes	No	No	None	None	Short Description
ReportableItemIndicator	CHAR(1)	Yes	No	No	C Consumable M Munitions O Other Q Medical S Shooter T Transportation U Unknown No other values are valid	O	Indicator
UnitOfMeasureCode	CHAR(2)	No	No	Yes[7]		EA	Unit of Measure

Table 7: ReportableItem Table Columns

A.2.1.2   Triggers

---

[6] ReportableItem:ReportableItemCodeID
[7] UnitOfMeasure:Code

None: This is mandatory in order to enable the RIC updater program to make necessary modifications.

A.2.1.3 Constraints

None: This is mandatory in order to enable the RIC updater program to make necessary modifications.

A.2.1.4 Data Guarantees

These guarantees exist during "normal" database use. During RIC updates they might be temporarily violated and therefore they cannot become constraints.
- Length (Reportable Item Code) = length (Parent Reportable Item Code)+1
  Specifically, Reportable Item Code is the Parent Reportable Item Code plus one character.
- The parent of 1-char RICs is NULL
- RICs "ZZZZZZ" (RIC ID = 19624) and "ZZZZZY" (RIC ID = 19623) will always be present, because of their special meaning (see paragraph 3.2):
  - "ZZZZZZ" means "Not otherwise specified".
  - "ZZZZZY" means "Original RIC was deleted during one of the last RIC updates". See as well Section A.2.1.5 for related rules.

A.2.1.5 Rules for Referencing Tables

Systems that use RICs typically have tables that refer to the table "ReportableItem" in order to ensure referential integrity. E.g. a table that stores "items" whose capability is coded with RICs will have a foreign key that refers to the table "ReportableItem" to ensure that items refer to valid RICs only. The rules for those referencing tables are:

- Deletion of RIC during RIC update: Whenever an RIC is deleted during an RIC update then referencing tables might do one of the following:
  - Change their foreign key RIC to the RIC ID of 19623 ("ZZZZZY") (e.g. ON DELETE SET 19623). (For the meaning of "ZZZZZY" please see paragraph 3.2). This will prevent the loss of data in referencing tables.
  - Delete the referencing value (e.g. ON DELETE SET NULL). This is equal to removing the reference for that record to the RIC table.
  - Delete the whole record that contains the referencing value (e.g. ON DELETE CASCADE). This means that e.g. any item that is coded with the to-be-deleted RIC will be deleted.
- There must not be an "ON DELETE RESTRICT" statement in relationships to the tables "ReportableItem".

A.2.2. Table: UnitOfMeasure

A.2.2.1   Columns

Column Name	Data Type	Allow NULL	PK	FK	Validation	Default	Attribute
Code	CHAR(2)	No	Yes	No	None	None	Unit of Measure Code
Term	CHAR(25)	No	No	No	None	None	Full name for unit of measure

Table 8: UnitOfMeasure Table Columns

A.2.2.2   Triggers

None: This is mandatory in order to enable the RIC updater program to make necessary modifications.

A.2.2.3   Constraints

None: This is mandatory in order to enable the RIC updater program to make necessary modifications.

A.2.2.4   Data Guarantees

These guarantees exist during "normal" database use. During RIC updates they might be temporarily violated and therefore they cannot become constraints.

- Unit of Measure "EA" always exists (see section 3.2).

A.2.2.5   Rules for Referencing Tables

Systems that use Units of Measure (UoM) typically have tables that refer to the table "UnitOfMeasure" in order to ensure referential integrity. E.g. a table that stores "items" whose unit of measure is coded with UoMs will have a foreign key that refers to the table "UnitOfMeasure" to ensure that items refer to valid UoMs only. The rules for those referencing tables are:

- Deletion of UoM during RIC update: Whenever a UoM is deleted during an RIC update then referencing tables might do one of the following:
  - Change their foreign key UoM to the UoM of "EA" (e.g. ON DELETE SET 'EA'). This will prevent the loss of data in referencing tables.
  - Delete the referencing value (e.g. ON DELETE SET NULL). This is equal to removing the reference for that record to the UnitOfMeasure table.
  - Delete the whole record that contains the referencing value (e.g. ON DELETE CASCADE). This means that e.g. any item that is coded with the to-be-deleted UoM will be deleted.
- There must not be an "ON DELETE RESTRICT" statement in relationships to the table "UnitOfMeasure".

A.2.3. Table: Version

A.2.3.1   Columns

Column Name	Data Type	Allow NULL	PK	FK	Validation	Default	Attribute
Item	CHAR(20)	No	Yes	No	None	None	Exactly one record contains "RIC" in this field, to identify the record that contains the current RIC version number
Value	CHAR(10)	No	No	No	None	None	Version number of the RIC version loaded into table "ReportableItem"

Table 9: Version Table Columns

A.2.3.2   Triggers

None: This is mandatory in order to enable the RIC updater program to make necessary modifications.

A.2.3.3   Constraints

None: This is mandatory in order to enable the RIC updater program to make necessary modifications.

A.2.3.4   Data Guarantees

These guarantees exist during "normal" database use. During RIC updates they might be temporarily violated and therefore they cannot become constraints.

- At any time there is exactly one record for which the field "item" contains the string "RIC".

A.2.3.5   Rules for Referencing Tables

None.

A.3. Relationships

A.3.1.1 Relationship of "ReportableItem" table to "ReportableItem" table

Characteristic	Description
Parent Field	Reportable Item: Reportable Item Code ID
Child Field (FK)	Reportable Item: Parent Reportable Item Code ID
Relationship Type	[0 or 1] to [0 or more]
Relationship Description	1 Reportable Item Code is parent of [0 or more] Reportable Item Codes 1 Reportable Item Code can have [0 or 1] Reportable Item Codes as parents See Section 3.2.2, S1 and S2.
On Parent Update	Cascade
On Parent Delete	Cascade

Table 10: ReportableItem-ReportableItem Relationship

A.3.1.2 Relationship of "UnitOfMeasure" table to "ReportableItem" table

Characteristic	Description
Parent Field	Unit of Measure: Code
Child Field (FK)	Reportable Item: Unit of Measure Code
Relationship	1 to [0 or more]
Relationship Description	1 Unit of Measure is measurement for [0 or more] Reportable Items 1 Reportable Item is measured in 1 Unit of Measure
On Parent Update	Cascade
On Parent Delete	Restrict

Table 11: UnitOfMeasure-ReportableItem Relationship

A.4. SQL Creation Statements

For clarification possible SQL creation statements are listed below. There is one statement per table and relationship. These statements can be combined.

A pseudo-language is used for the description. SQL statements vary for different database engines.

```
// Creation of table ReportableItem
CREATE TABLE ReportableItem (
        ReportableItemCodeID          INTEGER NOT NULL PRIMARY KEY
        ReportableItemCode            CHAR (6) NOT NULL
        ParentReportableItemCodeID    INTEGER
        ReportableItemIndicator       CHAR (1) DEFAULT 'O'
                CHECK (ReportableItemIndicator IN ('C', 'M', 'O', 'Q', 'S', 'T', 'U'))
```

```
          Description                    CHAR (50) NOT NULL
          ShortDescription               CHAR (50)
          UnitOfMeasureCode              CHAR (2) DEFAULT 'EA')
```

// Creation of Relationship ReportableItem to ReportableItem
```
ALTER TABLE ReportableItem
      ADD FOREIGN KEY (ParentReportableItemCodeID)
             REFERENCES Reportable Item (ReportableItemCodeID)
             ON DELETE CASCADE
             ON UPDATE CASCADE
```

// Creation of table UnitOfMeasure
```
CREATE TABLE UnitOfMeasure (
          Code                           CHAR (2) NOT NULL PRIMARY KEY
          Term                           CHAR (25) NOT NULL)
```

// Creation of Relationship ReportableItem to UnitOfMeasure
```
ALTER TABLE ReportableItem (
      ADD FOREIGN KEY (UnitOfMeasureCode)
             REFERENCES UnitOfMeasure (Code)
             ON UPDATE CASCADE
             ON DELETE RESTRICT)
```

// Creation of table Version
```
CREATE TABLE Version (
          Item                           CHAR (20) NOT NULL PRIMARY KEY
          Value                          CHAR (10) NOT NULL)
```

A.5. RIC Updater Software

System managers should contact the RIC Manager to obtain the latest RIC Updater software, as well as technical information and advice on how to integrate it with their system.

ANNEX B **RIC CHANGE REQUEST FORM**

RIC Users who wish to submit a request for a RIC change (addition, update, deletion, move or merge) may do so by using the RIC Change Request Form. This form is an MS Excel workbook and should be completed and sent to the RIC Executive Officer.

The RIC Change Request Form may be found on LOGNET under the "Background Data > RIC" section.

The RIC Change Request Form has the following appearance:

RIC Change Request Form

To add, update, delete, move and merge Reportable Item Codes (RICs)

Please read the instructions first!   Please read the instructions first!

Requestor	Name:	Max Mustermann	Date of Request:		01-Jun-08
	User Community:	ADAMS	This request is based on RIC Version:		12
	Organisation:	NATO C3 Agency	*All provided information will be stored for change management purposes.*		
	Email:	max.mustermann@nc3a.nato.int			
	Tel / Fax:	+31-70-374-0815			

Modification Type	Reference: Fields in RIC Viewer (see Instructions!)		RIC Indicator (1 Character)	Suggested Short Description Part (optional)	Additional Information
ADD	Suggested new RIC (Trailing Zs can be dropped)	Suggested Description **in RIC Viewer** (50 Characters) (appears in the RIC tree, see instructions)	RIC Indicator (1 Character) C - Consumable S - Shooter M - Munition Q - Medical T - Transportation O - Others **only if not obvious**		**Additional information** (like: Some information about the new capability, Jane's Website, Manufacturer). This info is for further clarification and future reference. **Will not be distributed with the RIC release.**
UPD	affected RIC (trailing Zs can be dropped)	New Description **in RIC Viewer** (50 Characters)			**Justification of update** (like: Typing Error, Clarification, etc) This info will not be distributed with the RIC release.
DEL	affected RIC (Trailing Zs can be dropped)	Description **in RIC Viewer** (to verify correct RIC) (as in the RIC tree, see instructions)			MANDATORY **Justification for deletion** (like: Discontinued, no onger relevant, etc) **This info will be published on the RIC Deletion candidate list.**
MOVE	RIC to be moved	Destination RIC	N/A	N/A	**Justification** (like: Misplaced, New better Branch opened etc) This info is for further clarification and future reference. **Will not be distributed with the RIC release.**
MERGE	RIC that will die	RIC that will survive			**Justification** (like: Duplication, remove innecessary details) This info is for further clarification and future reference. **Will not be distributed with the RIC release.**
ADD	AA19	111 mm	S	111	New class of MBT with 111mm canon. See Janes website www.janes.com/111mm
ADD	AA11A	AA-Role	S	AA	www.aa-manufacturer.com
UPD	HA11E	WF2100	S	WF2100	Renaming of Eurofighter EF2000 to Worldfigter 2100
DEL	HA13B	Phantom F-4			F-4 is out of service
MOVE	CC5	DD9			Misplaced item. According to Jane's, this item is artillery rather than air defence.
MERGE	MA12A	MA12G			Remove duplication

Figure 6: RIC Change Request Form

ANNEX C ACRONYMS & ABBREVIATIONS

Acronym	Description
NOS	Not Otherwise Specified
12G	12-GAUGE
2SURV	SECONDARY SURVEILLANCE
A_FLM	AERIAL FILM
AA	AIR-TO-AIR
AAA/SAM	AAA/SAM COMBINED
AAG	ANTI-AIRCRAFT GUN
ABRN	AIRBORNE
AC	AIRCRAFT
ACT	AIRCRAFT TURBINE
ADR	AIR DEFENCE RADAR
AE	AEROMEDICAL EVACUATION (AE)
AF	ANTIFREEZE
AFV	ARMOURED FIGHTING VEHICLE
AIR	AIR FORCE
ALnch	AIR LAUNCHED
Amp	AMPHIBIOUS WARFARE SHIPS
AMPH	AMPHIBIAN
ANA	ANTI-NERVE AGENT PROPHYLACTIC DRUGS
ANC	ANCILLARY ITEM
ANIMAL	ANIMAL
APers	ANTI-PERSONNEL MINES
Apt	AIRPORT
AreaDenial	AREA DENIAL
ARM	ANTI-RADAR
ARM	ARMOUR
ARM	ARMY
ART	ARTILLERY
ASB	ANTI-SUBMARINE
ASLNCH	ANTI-SHIP MISSILE LAUNCHER
ASM	AIR SPACE MANAGEMENT

Acronym	Description
ASMM	AIR FIELD SURFACE MOVEMENT MANAGEMENT
ASP	ANTI-SHIP
ASPSB	ANTI-SHIP/ANTI-SUBMARINE
ASS	AIR/SURFACE SEARCH
AST	ANTISEIZE TAPE
AST	ARMOURED SUPPORT TRAILER
ASurv	AIR SURVEILLANCE
ASV	ARMOURED SUPPORT VEHICLE
AT	ANTI-TANK
AT	ANTI-TANK MINES
ATGW	ATGW
ATM	AIR TRAFFIC MANAGEMENT
ATM	AUTONOMOUS SYSTEM
ATRANS	AUTOMATIC TRANSMISSION
ATROP	ATROPINE SYRETTE
ATT	ATTACK
AUT/ART	AUTOMOTIVE & ARTILLERY
AUV	AUTONOMOUS UNDERSEA VEHICLE (AUV)
AUX	AUXILIARY
AW	ANTIWEAR
BFS	BATTLEFIELD SURVEILLANCE
Blk	BULK
Bmb	BOMB
BMW	BALLISTIC MISSILE WARNING AND ACQUISITION
Boy	SONOBUOY SYSTEMS
BRG	BRIDGING SYSTEM
BRK	BRAKE FLUID

Acronym	Description
BTS	OVERBOOTS
C4I	C4I
CAN	CANNISTER
CAN	CANNON
CAR	CARRIER
CBT	COMBAT
CBU	CLUSTER
CDS	COMBAT DATA SYSTEMS
Chem	CHEMICAL
ChemVapor	CHEMICAL VAPOR CONFIRMATION KIT
CIS	COMMAND INFORMATION SYSTEM
CIV	CIVILIAN
CL	CHLORINATED SILICONE
CLPS	COLLAPSIBLE TANK
Clr	MINE CLEARANCE
CMD	COMMAND
CMF	CAMOUFLAGE
CMF	CAMOUFLAGE & DECOY EQUIPMENT
CMP	COMPOUNDED
CMPD	COMPOUND
CND	CANNED GOODS
COAST	COAST GUARD
COM	COMMUNICATION NETWORK
COMP	COMPUTER SYSTEM
CONT	CONTAINER HANDLER
CONTR	CONTRACTOR
COOL	COOLANT
CORPREV	CORROSION PREVENTIVE
CRN	CRANE
CRP	CROP SPRAYING
Crt	CARTRIDGE
CRWD	CROWD CONTROL
CRYO	CRYOGENIC
CSTL	COASTAL
CTR	CONTAINER
CUT	CUTTING FLUID
CWIS	CWIS

Acronym	Description
CWS	COLLISION WARNING SYSTEM
DDS	DATA DISPLAY SYSTEMS
Decon	DECONTAM KIT & ANTIDOTE
Decon	DECONTAMINATION EQUIPMENT
Decon	PERSONAL DECONTAMINATION KIT
Demol	DEMOLUTION MATERIAL
DENT	DENTAL
Depth	DEPTH
Det	DETECTION DEVICE & IDENTIFICATION EQUIPMENT
Dip	DIPPING SONARS
Dis	DISCHARGER LAUNCHED
Dism	DISMOUNTABLE
Disp	DISPENSER
DME	DUMMY TARGET
DOG	DOG
DOS	DOSIMETER
DRONE	DRONE
DRY	DRY GOODS
DSL	DIESEL
DTNK	DROP TANKS
ECF	CONSTRUCTION & FIELD FORTIFICATION
ECM	ECM - SONAR
ECM	ECM SYSTEMS
ECM_CB	ECM - COMBINED
ECM_CM	ECM - COMMUNICATION
ECM_IR	ECM - INFRARED
ECM_RDR	ECM - RADAR
ECW	EW/CMD/WPN CONTROL SYSTEM
EMT	MATTING & TRACKWAY
EMUL	EMULSIFYING
EMW	MINE WARFARE
ENG	ENGINE

Acronym	Description
ENG	ENGINEER
ENG	ENGINEER & SUPPORT EQUIPMENT
ENG	ENGINES
EOD	EOD
EQSPT	EQUIPMENT SUPPORT
ESE	SPECIALIST / SUPPORT EQUIPMENT
ESM	ESM SYSTEMS
ESMDF	ESM - DIRECTION FINDING
ESMG	ESM - GENERAL
ESMI	ESM - INTELLIGENCE
ESMTW	ESM - THREAT WARNING
ETH	ETHANOL
EW	ELECTRONIC WARFARE
EWS	EW SYSTEM
Exp	EXPLOSIVES
F&P	FUZE AND PRIMER
F/A-Expl	FUEL/ AIR EXPLOSIVE
FArt	FIELD ARTILLERY
FC	FIRE CONTROL
FD	FOOD
FemH	ITEMS FOR FEMALE HYGENE
FHE	FUEL HANDLING EQUIPMENT
Fire	FIRE
FIRE	FIREFIGHTING
Fix	FIXED SONARS SYSTEMS
FLA	FUEL ADDITIVE
FLD	FLUID
Frag	FRAGMENTATION
FRK	FORKLIFT
FSH	FRESH
FSTnk	FLEXIBLE STORAGE TANK
FUEL	FUEL
FW	FIXED WING
FX	FIXED TANK
G&H	GUN & HOWITZER
G/C	GUN/CANNON
GAS	GAS

Acronym	Description
GAS	GASEOUS
GAT	GATLING
GBAD	GROUND BASED AIR DEFENCE
GCI	GROUND CONTROLLED INTERCEPTION
GEAR	GEAR
GEN	GENERAL USE
GenP	GENERAL-PURPOSE
GLnch	GROUND LAUNCHED
GOV	NATIONAL GOVERNMENT
GP	GENERAL PURPOSE
GPOD	GUN POD
Grd	GROUND
GRLNCH	GRENADE LAUNCHER
Grn	GRENADE/PYROTECHNIC
GRND	GROUND BASED
GRPHT	GRAPHITE
GRS	GREASE
GSL	GASOLINE
GUARD	GUARD
Guid	GUIDED
GUID	GUIDED MISSILE SYSTEM
GUN	CANNON/GUN
GUN	GUN
Hand	HAND
HD	HAND
HELI	HELICOPTER TRANSPORTABLE CONTAINER
HELI	HELICOPTER TRANSPORTABLE TANK
HET	HEAVY EQUIPMENT TRANSPORTER (TRAIN)
HFND	HEIGHT FINDING
HORSE	HORSE (INCL. MULES, ETC)
HPL	HAND PALLET LIFTER
HVY	HEAVY

Acronym	Description	Acronym	Description
Hw	COMPUTER HARDWARE	MAR	MARINE GAS TURBINE
HYD	HYDRAULIC FLUID	MAR	MARINES
HYDZ	HYDRAZINE	MAR	MARITIME
IFSDH	INTERFACE SENSOR/DATA HANDLING	MAR	MARITIME ASSET
		MBT	MBT
ILL	ILLUMINATING SYSTEM	MC	MINE CLEARANCE
		MCBT	MAJOR COMBATANT
INF	INFANTRY WEAPON	MCM	MCM SONARS
InfEq	INFANTRY EQUIPMENT	MED	MEDICAL
		MED	MEDICAL AID STATION
INS_OIL	INSULATING OIL	MED	MEDIUM
INST	INSTRUMENT	METH	METHANOL
INT	INTELLIGENCE GATHERING SYSTEM	MF	MULTI-FUNCTION
		MFC	MORTAR FIRE CONTROL
IntD	INTRUDER DETECTION	MG	MACHINE GUN
IntS	INTEGRATED SYSTEM	MHE	MATERIAL HANDLING EQUIPMENT
INTSEC	INTERIOR SECURITY	MIL	MILITARY
ISO	ISOPROPANOL	Mine	MINE & MINE DISPOSAL
ISOPROP_N	ISOPROPYL NITRATE		
JOINT	JOINT/HQ	MINE	MINE WARFARE
KERO	KEROSENE	MIS	MISSILE SYSTEM
LAttack	LAND ATTACK	Misc	MISCELLANEOUS SONAR SYSTEMS
Leafl	LEAFLET		
LGHT	LIGHT	ML	MINE LAYING
LGHT	LIGHTWEIGHT UTILITY (<1500 KG)	MOLY	MOLYBDENUM DISULFIDE
LIQ	LIQUIFIED	Mon	MONITOR (LIQUID AGENT)
LND	LAND BASED		
LOG	LOGISTICS SHIPS	MOR	MORTAR
LR	LONG RANGE (>150KM)	MP	MAN PORTABLE
		MP	MULTI-PURPOSE
LREW	LONG RANGE EARLY WARNING	MP	MULTI-PURPOSE ASSET
Lsr	LASER GUIDED	MR	MEDIUM RANGE (75-150KM)
LSW	LIGHT SUPPORT WEAPON		
		MS	MULTI-SERVICE
LTA	LIGHTER THAN AIR CRAFT	MS	MULTI-SYSTEM
		Msl	MISSILE
LTK	LIGHT TANK	MSL	MISSILE GUIDANCE
LUB	LUBRICANT	MSL	MISSILE LAUNCHER
LUB	LUBRICANT CLEANER AND PRESERVATIVE	Mun	MUNITIONS
		MW	MINE WARFARE VESSELS
LUB	LUBRICATING OIL	MW	MW SYSTEM

Acronym	Description	Acronym	Description
N_ACID	NITRIC ACID	PIP/H	PIPELINE / HOSE
NATO	NATO	PlugV	PLUG VALVE
NAV	NAVAL	PMP	PUMP
NAV	NAVAL DIESEL	POL	POL
Nav&CstGun	NAVAL AND COSTAL GUN	POL	POLICE
		POW	POWER
NAVY	NAVY	PR	PR SURFACE COMBATANTS
NBC	NBC		
NET	NETWORK DEVICE	Pract	PRACTICE
NFV	NON-ARMOURED FIGHTING VEHICLE	PrecLS	PRECISION APPROACH/LANDING SYSTEMS
NG	NAVAL GUN		
NGO	NON GOVERNMENTAL ORGANISATION (NGO)	PRIS	PRISONERS OF WAR (POW)
NGUID	NON-GUIDED WEAPON	PROP	PROPELLANT
		PropCh	PROPELLING CHARGE
NGun	NAVAL GUN	ProtSM	PROTECTIVE SUIT & MASK
NLW	NON-LETHAL WEAPON / LESS LETHAL WEAPON	PRT	PORTABLE
		PSGR	PASSENGER
NPTB	NON-POTABLE	PST	PISTOL
NRID	NON-RIDGID	PTB	POTABLE
OCBT	OTHER COMBATANT	PV	PATROL VESSELS
OIL	OIL	PYR	PYROTECHNIC EQUIPMENT
ORD	ORDNANCE LAUNCHER		
		R1	ROLE 1
OrdDis	ORDNANCE DISPOSAL TOOL	R2	ROLE 2
		R3	ROLE 3
OTH	OTHER SHIP	R4	ROLE 4
OTH	OTHER AIRCRAFT	RCH	REVOLVING CHAMBER
OTH	OTHER VEHICLES	RDR	RADAR
PACK	PACK	REC	RECCE
PDec	PORTABLE DECONTAMINATION APPARATUS	REC	RECCE PODS
		REC	RECONNAISSANCE
		REF	REFRIGERANT
Pen	PENETRATION	REF	REFRIGERANT COMPRESSOR
PERFL	PERFLUORINATED		
Peri	PERIPHERAL DEVICE	REF	REFRIGERATED
PERP	PERSONAL PROTECTION	REF	REFUGEE
		RES	RESIDUAL
PERS	PERSONNEL	RespAC	RESPIRATOR AIRCREW
PET	PETROLATUM		
PET	PETROLEUM	RespCG	RESPIRATOR GROUNCREW
PHE	PHOSPHATE ESTER		
PIP	CROSS COUNTRY PIPELINE	RID	RIDGID
		RIF	RIFLE

Acronym	Description
Rkt	ROCKET
RKTLNCH	ROCKET LAUNCHER
RL	RECOILESS RIFLE
RLNCH	ROCKET LAUNCHER
RPLnch	RIFLE/PISTOL LAUNCHED
RPV	REMOTE PILOTED VEHICLE
RR	RECOULESS RIFLE
RST	RIGID STORAGE TANK
RT	RATION
RTS	RATION SUPPLEMENT
RW	ROTARY WING
S_TWD	STATIC AND TOWED
SA	SMALL ARMS
SA	SURFACE-TO-AIR
SAM	SURFACE-TO-AIR MISSILE LAUNCHER
SASFC	SURFACE/AIR SEARCH/FIRE CONTROL
SatSurv	SATELLITE SURVEILLANCE
SBOY	SONAR BOUYS
SC	SUPPORT CRAFT
SDP	SUNDRIES PACK
Sea	SEA MINES
SeaMDisp	SEA MINE DISPOSAL
SENS	SENSORS & ELECTRONICS
Sfc	SURFACE SHIP SONARS
SFL	SEMI-FLUID
SH	SHELTER
SH&CT	SHELTER & CONTAINER
She	SHELTER & SHELTER FILTERATION
Shl	SHELL
SHP	SHIP
SIG	SIGNAL PISTOL
SIGHT	SIGHTING EQUIPMENT
SLED	SLED
SLF	SELF PROPELLED
SMA	SMALL ARM
SMG	SUB-MACHINE GUN

Acronym	Description
SNIF	SNIFFER
SOF	SOF
SOL	SOLID
SOLV	SOLVENT
SON	SONAR
SPC	SPECIALITY PRODUCTS
SPEI	SPECIAL ELECTRONIC INSTALLATION
SPSURV	SPACE SURVEILLANCE
SR	SHORT RANGE (<75KM)
SS	SURFACE-TO-SURFACE
SS/FC	SURFACE SEARCH/FIRE CONTROL
SSN	SURFACE SEARCH/NAVIGATION
SSNFC	SURFACE SEARCH/NAV/FIRE CONTROL
SSRCH	SURFACE SEARCH
SSURV	SURFACE SURVEILLANCE
STM	STEAM
STRL	SEMI-TRAILER
STT	SURFACE TARGET TRACKING
Sub	SUBMARINE SONARS
SUB	SUBMARINES
SUB	SUBSISTENCE
SUIT	NBC SUIT
SUP	SUPPORT SHIPS
Sup	SUPPORT SYSTEMS
SUPR	SUPPRESSOR
Sw	COMPUTER SOFTWARE
SW_REST	SEA WATER RESISTING
SYN	SYNTHETIC
TDE	TACTICAL DISTRIBUTION EQUIPMENT

Acronym	Description
TDW	TRAILER DRAWBAR WHEELED
TGT2	TARGET ACQUISITION 2D
TGT3	TARGET ACQUISITION 3D
TBM	TACTICAL BALLISTIC MISSILE
TNK	TANK
Tpdo	TORPEDO
TPDO	TORPEDO TUBES
TRK	TRACKING AND GUIDANCE
TrlTrc	TRAILER TRACKED
TRN	TRAINER
TRN	TRAINER/UTILITY
TRN	TRAINING
TRN	TRAINING SHIPS
TRN	TRAINING SYSTEM
Trsp	TRANSPORT
TRU>1.5t	TRUCK (> 1500 KG)
TUR	TURBINE
TWD	TOWED
UAV	UNMANNED AERIAL VEHICLE
UKN	UNKNOWN
UUSV	UNMANNED UNDERSEA VEHICLE (UUV)
V&L	VEHICLE & LOGISTICS
VH	VEHICLE
VPC	VERTICAL PALLET CARRIER
VRR	VEHICLE RECOVERY & REPAIR
WPN	WEAPONS
WPS	WATER PURIFICATION SYSTEM
WS	WEAPON SYSTEM
WTA	WATER THRUST AUGMENTATION
WTHR	WEATHER SURVEILLANCE
WTR	WATER
WTR	WATER SUPPLY EQUIPMENT

Acronym	Description
WtrGly	WATER GLYCOL

INTENTIONALLY BLANK

ANNEX D   REFERENCES

A   Bi-SC SOP: Management of Reportable Item Codes
B   Force Goal 2860
C   Unified OLCM Business Process Model v3.0, dated March 2015
D   NCIA Technical Report TR 2014-SVL009567-01, RIC Specification v6.0
E   NCIA Technical Report TR-2014-SPW009343-01, Linkage of Reportable Item
     Codes (RIC) and NATO Stock Numbers (NSN)

ALP-17(A)(1)