# The 'Ultimate' RAACO Storage Solution

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## 0. Introduction

After having spent several weeks with a lot of work and time to move my ASL counters from my old intitial storage to new RAACO storage, I was rather elated to be done with it. I am very content with the result.

One piece of bad news at the start:
Contrary to the title of this article, I had to learn that there is no such thing as the universal 'ultimate' storage solution. I had hoped to seach the net, find the perfect solution and copy it. Alas, this did not work. There are some approaches out there, but nothing that compiles 'all you need' in one space (something that this article will be going to some length to establish). More importantly, I discovered that everyone seems to have slightly different preferences and levels of OCD to tackle the matter. So what you will be presented with is the 'ultimate' solution for my preferences. More on that below.

Anyway, before even starting off with the actual moving of counters, I spend considerable time and thought on how to best approach the task. There were a number of helpful pieces of information to be found in the net in the form of threads, PDFs, pictures, and other documents. These gave me some ideas, inspired my thoughts, and did save me some time, though not as much as I would have liked or expected.

The objective of this document is to save those who want to start with or switch to RAACO storage a good starting point together with references and links to what I found most helpful. Maybe reading this might save you some time in the arduous undertaking, which I just have completed.

## 1. Establishing Premises – What kind of storage do you want?

First of all, of course, you need to make up your mind what kind of storage you envisage.

I presuppose that you want RAACO storage at this point and thus will not weigh its pros and cons vs. PLANO, matchbox, coin envelope or other types.

You should scrutinize carefully, where your personal preferences and objectives lie and sum them up before you start off. This is the first point that will save you time later. If you have a sound basic

plan how you want to store, you will need to make less adjustments later.

To make things a bit easier, I will first list what I wanted to achieve and afterwards point out some other aspects that might be of higher importance for other people.

- I wanted to store basically all ASL Core Modules by AH/MMP and some AH/MMP HASLs but not all of them. This is because I have not punched most of my HASLs as I would probably play them via VASL.
- I did not intend to mix third party counters with those of AH/MMP.
- I wanted to be able to store more that a 'single set' of the Core Modules, i.e. roughly a double set. I say 'roughly' and not precisely, because a double OoB is not necessary or desirable for all units (for example some Infantry) but quite desirable for others (for example some Vehicles or Guns). In practice this means that I wanted to be able to house two sets of 26 counters (A-Z) of a given squad type and 6 Vehicles or Guns per type. For some very common and often used Vehicles, I planned for 12 Vehicles of a given type (say for some variants of the Pz IV, T-34 or Sherman to illustrate the example). This would allow me to play most CGs or monster scenarios without needing to draw on separate counters and not encumber my set unneccessarily with an excess of stuff that would never have any practical use.
- I wanted a type of storage that largely allows for 'visual' identification and a storage location. When viewing a tank on a scenario card, I first look at its type (i.e. Turreted/Non-Turreted, OT/CT, Tank/Halftrack), second at its MA caliber, third its MPs, and only then at the Vehicles designation. Thus I needed a storage that allowed me to 'view' the Vehicle counter and has easy to read labels so as not need to strain the eyes for deciphering the minuscule printed designation on the counter. This was to be supported by certain 'patterns' which always places full squads on the top tier to the left, SW top tier to the right, etc.). This should allow finding counters very quickly without the need to draw on an index to identify a storage location.
- A certain 'context' should have priority over saved space, i.e. I'd rather use a second Assorter for the German OoB rather than to cram it into a single one at the cost of 'visibility'. I'd rather accept empty inserts rather than mixing Allied and Axis nationalities in the same Assorter. The result is that my 'solution' needs a total of 3 Handy-Cases with 4 Assorters each and not just 2 which I have seen others use.
- 'Flexibility' of the storage solution does not have prime priority. Based on the fact that by now all nationalities for WW2 have been covered by Core Modules, I have assumed that there will be few 'new' counters that need to belatedly fitted in among the existing system (i.e. a 'new' Pz 3½ to fit in between the Pz3s and Pz4s to make up an example). Some limited extra space is available in most cases, but adjustments might not be very easy to make. This goes along with my first and second premise, to store third party products separately and possibly MMP HASL counters in the context of that particular HASL.
- One of my basic assumptions is, that I will not transport my set by other means than by car, which means that it does not matter whether I have to transport 2 or 4 Handy-Boxes to a tournament (should I desire to punch some TTP stuff or HASLs which would go into the 4th one).

If you have the same or similar preferences as I do, you will get along with my storage solution very well and like it.

If you strive for a storage solution that is optimized for being as condensed as possible, if you prefer to find vehicles by index or vehicle ID#, if you want a 'unified' system mixing TPP counters with

AH/MMP, or if you want to indulge into some sort of massive 4x OoB storage, you might consider other storage solutions (including 'upright' Vehicle and Gun storage with inserted tabs for identification as one example).

## 2. Hardware – What do you need?

*Overview*

With the basic premises established – in this case basically my basic premises – the question arises what 'hardware' you need. It might be of advantage to order everything at one time to get discounts or free shipping.

You will need **3x** *'HandyBox 55' (Article-# 136259)*, **12x** *'Assorter 55 4x8-0' (Article-# 136204)* i.e. 4 per each HandyBox, and a **mix of 192x** inserts of types *'Insert A75' (Article-# 115759)* and *'Insert A78' (Article-# 115766)* i.e. 16 per Assorter times 12.

Please note, that some inlays remain empty, but you still need them to hold the others in place and to prevent the spilling of counters (counter-creep). On top of that I have used a total of 4 inserts other than A75 and A78 to put LOS-thread, dice, tweezers, and pen into, specifically

**1x** *'Insert A9-4' (Article-# 114585)*,
**1x** *'Insert A9-2' (Article-# 114578)*,
**2x** *'Insert A9-1' (Article-# 100274)*.

Each *'Assorter 55 4x8-0' (Article-# 136204)* can hold 2 tiers of A75 or A78 inserts of 8 per tier and 16 in total. Please note that there is also an *'Assorter 80 4x8-0' (Article-# 136235)* which can house 3 tiers with 24x A75/A78 in total. Be careful, though, as the *'Assorter 80 4x8-0' (Article-# 136235)* is **NOT** compatible with the *'HandyBox 55' (Article-# 136259)* nor is there an alternate HandyBox which would fit the *'Assorter 80 4x8-0' (Article-# 136235)*. Thus, to use the Handy-Boxes you need the *'Assorter 55 4x8-0' (Article-# 136204)*.

Please note, that there is the option not to buy all these parts separately. In fact, it might be cheaper to buy a set of a HandyBox 55 with 4x Assorters and a collection of Inserts as a package, none of which are of the A75 or A78 type, though. As a result, you will end up with some extra unneeded inserts for our purposes yet for less money spent.

## How do the parts you need look like?
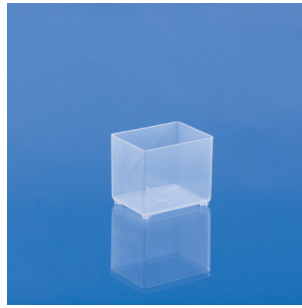


'HandyBox 55' (Article-# 136259)



'Assorter 55 4x8-0' (Article-# 136204)



'Insert A75' (Article-# 115759)



'Insert A78' (Article-# 115766)



'Insert A9-1' (Article-# 100274)



'Insert A9-2' (Article-# 114578)



Insert A9-4' (Article-# 114585)

## Where to buy RAACO?

It would be fruitless to provide detailed lists of links where to get RAACO stuff at the best price as these are subject to constant change, and I am not even going into exchange rates for currencies, shipping, customs, discounts, etc. In my experience, though, doing a thorough reseach for the best price is time very well invested because I have observed a price span of up to roughly 100% for the same article. You do not want to pay double for the same thing as RAACO is not cheap in the first place.

Thus I will limit myself to provide two links (as of 29. Jan. 2017):

http://www.dittmar-werkzeuge.de/Werkstatt-und-Betriebsbedarf/Betriebseinrichtungen/Raaco-Aufbewahrungssysteme.html

The one above in Germany with not the best price I found but at least all needed articles in one place and the stuff usually in stock.

http://cpc.farnell.com/webapp/wcs/stores/servlet/Search?storeId=10180&catalogId=15002&langId=69&sf=411&categoryId=700000008651&st=racco&showResults=true

The one above in the UK with much better prices but somewhat difficult procedures if you live outside the UK. Yet I have heard of a guy from the US that ordered from there and beat US prices even taking shipment/customs into account.

You should be aware, that there are much cheaper RAACO clones out there that are much cheaper compared to 'original' RAACO products. I have not researched these, but when informing myself I have read reports that especially the A75 and A78 inserts of these clones are often slightly warped which might be unacceptable to some. The issue seemed not so bad with Assorter clones (DURATOOL appearing to be a brand name of one of these clones), so some people seem to have combined original unwarped RAACO A75 and A78 inserts with Assoter clones.

***Exact list of needed RAACO hardware for my set***

What follows is an exact list of hardware needed for **my** set which fits in 3 HandyBoxes (in total and per nationality / system counters):

In Total:

**3x**     *'HandyBox 55' (Article-# 136259)*
**12x**    *'Assorter 55 4x8-0' (Article-# 136204)*
**85x**    *'Insert A75' (Article-# 115759)*
**103x**   *'Insert A78' (Article-# 115766)*
**1x**     *'Insert A9-4' (Article-# 114585)*
**1x**     *'Insert A9-2' (Article-# 114578)*
**2x**     *'Insert A9-1' (Article-# 100274)*

One might consider buying a 13th *'Assorter 55 4x8-0' (Article-# 136204)* and remove the lid from it. This one could be used to put on the table next to the playing area to place inserts with counters in that will likely be used while plaing a particular scenario. This might seem a bit over-cautious, but as an opened Assorter lid stand quite upright while opened, it might be torn from a table accidentally by someone passing very close to the table in confined space.

In Detail:

**Germans & Finns:**
**2x**      *'Assorter 55 4x8-0' (Article-# 136204)*
**20x**     *'Insert A75' (Article-# 115759)* **4** of which empty
**12x**     *'Insert A78' (Article-# 115766)* **2** of which empty


**Japanese & Italians:**
**1x**      *'Assorter 55 4x8-0' (Article-# 136204)*
**6x**      *'Insert A75' (Article-# 115759)*
**10x**     *'Insert A78' (Article-# 115766)*


**Hungarians:**
**1x**      *'Assorter 55 4x8-0' (Article-# 136204)*
**8x**      *'Insert A75' (Article-# 115759)* **4** of which empty
**8x**      *'Insert A78' (Article-# 115766)* **4** of which empty


(Germans, Finns, Japanese, Italians, and Hungarians in HandyBox #1)


**Russians:**
**1x**      *'Assorter 55 4x8-0' (Article-# 136204)*
**10x**     *'Insert A75' (Article-# 115759)* **1** of which empty
**6x**      *'Insert A78' (Article-# 115766)* **1** of which empty


**Americans & USMC:**
**1x**      *'Assorter 55 4x8-0' (Article-# 136204)*
**11x**     *'Insert A75' (Article-# 115759)*
**5x**      *'Insert A78' (Article-# 115766)*


**British:**
**1x**      *'Assorter 55 4x8-0' (Article-# 136204)*
**9x**      *'Insert A75' (Article-# 115759)* **1** of which empty
**7x**      *'Insert A78' (Article-# 115766)*


**French & Chinese:**
**1x**      *'Assorter 55 4x8-0' (Article-# 136204)*
**4x**      *'Insert A75' (Article-# 115759)*
**12x**     *'Insert A78' (Article-# 115766)*


(Russians, Americans, USMC, British, French, and Chinese in HandyBox #2)


**System Counters:**
**2x**      *'Assorter 55 4x8-0' (Article-# 136204)*
**6x**      *'Insert A75' (Article-# 115759)*
**22x**     *'Insert A78' (Article-# 115766)*
**1x**      *'Insert A9-4' (Article-# 114585)*
**1x**      *'Insert A9-2' (Article-# 114578)*
**2x**      *'Insert A9-1' (Article-# 100274)*

**Axis Minors:**
**1x**    *'Assorter 55 4x8-0' (Article-# 136204)*
**5x**    *'Insert A75' (Article-# 115759)* **3** of which empty
**11x**   *'Insert A78' (Article-# 115766)* **2** of which empty

**Allied Minors:**
**1x**    *'Assorter 55 4x8-0' (Article-# 136204)*
**6x**    *'Insert A75' (Article-# 115759)* **4** of which empty
**10x**   *'Insert A78' (Article-# 115766)* **3** of which empty

(Axis Minors, Allied Minors, and System Counters in HandyBox #3)


*Crepla mats vs. counter creep*

You might want to add some additional 'hardware' as a precaution vs. the accidental spilling of counters in between inserts during transport (counter-creep). Generally, it can be said that as long as you have filled an Assorter complete with 16 inserts, that there will not be much counter-creep to begin with. But there have been reports of some of this happening if the Assorters and / or HandyBoxes are handled roughly.

Here's why it can happen: There are apparently 2 different types of lids that you might encounter on an Assorter and which cannot be specifically chosen when ordering. One is a 'flat' one, the second has small ridges on the lower face that are designed to hold all types of inserts better in place while the Assorter is closes *except* the A75 and A78. On the latter two, alas, it has somewhat of the opposite effect as the ridges do not match with the rims of these two types of inserts. The result is that especially the 'ridged' lid is bent a little bit upwards which might allow counter-creep.

Fortunately, there is a pretty easy solution for this issue. After having seached around in a hobby store a bit, I found this:
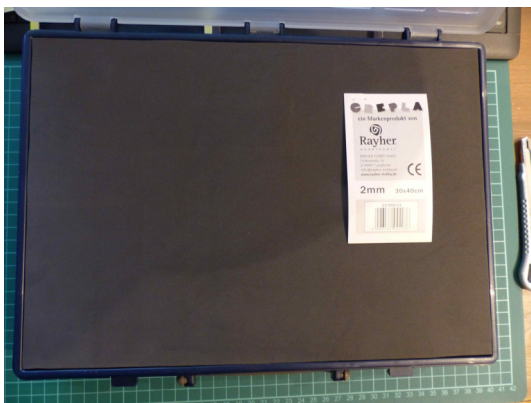


These are foam mats of 2mm strength that fit perfectly flush on top of the 2 tiers of A75/A78 inserts in an Assorter. The material is comparable to what you find on the bottom side of a mouse pad. The mats can be easily cut to size. If the lid of the Assorter is now closed, counter creep is all but impossible. The mats come in a 30 by 40cm size, which means that you will need one per Assorter and have quite some excess. This is not too bad as each one does cost something between 1 and 1.5 Euros.
The article is called 'Crepla Platte schwarz, Article-# 3395001, 30x40x0.2cm', the producing

company can be found here:

www.rayher-hobby.de

Here are links as to the specific mats as of 29. Jan. 2017:
https://rayher-hobby-shop.de/Bastelmaterial-1/Materialien/Moosgummi-Crepla/Crepla-Platte.html

https://www.amazon.de/Rayher-3395001-Crepla-30x40x0-schwarz/dp/B004P1M7TW/ref=sr_1_5?
ie=UTF8&qid=1485722033&sr=8-5&keywords=Crepla+Platte+schwarz

An alternative to these mats could be a piece of felt mat or simple cardboard. But we do want the 'ultimate' storage solution, now, don't we?


### *Avery adhesive labels for the inserts and Assorters*

 The next 'hardware' you need is for the labels which you want to place on your Assorters and in each compartment of your A75 and A78 inserts.

After pondering the issue of labels for quite some time, I have come to the solution that the most versatile, easy to use, and cheapest solution are **Avery labels**.

You can insert them like normal paper in your inkjet, laser-printer or photocopy machine and print anything you want on them. A package of 25 DIN-A-4 size labels costs around 12 Euros plus shipment. To label all Assorter and inlays, you need to print 22 DIN-A-4 pages. Package sizes of 100 labels (Avery 3478), 25 labels (Avery 6119), and 10 labels (Avery 6125) are available.

See links here as of 29. Jan. 2017:

https://www.avery-zweckform.com/produkt/universal-etiketten-6119

https://www.amazon.de/Avery-Zweckform-6119-Universal-Etiketten-Etiketten/dp/B0002S47X6


As everyone likely has a printer at home, there is only the cost for the label sheets and your printer's ink or toner. Furthermore, you have the advantage that you can use any program you might want to create the file for the labels. I used Open Office in Excel format.

I have not checked, if Avery labels are also available in letter format, but I would be surprised if they weren't.


### *Alternatives to Avery labels*

Any alternative will likely be much more expensive and more difficult to use. There are DYMO or BROTHER labelling machines of varying sophistication. The less sophisticated ones will not enable you to print everything you want on your labels or be limited in colors. If you do not already own such a machine, you need to buy one. Furthermore, the cartridges holding the label-band costs about 5 Euros for 4 meters (DYMO). With roughly 24 meters of labels needed altogether, you see that the there is no chance to beat the price of the Avery labels. One advantage, that the film-like

label-bands of the labelling machines might have is their probably higher resiliency to moisture.

*More on the label file and labelling technique*

The complete file with all labels will be made available by me separately in DIN-A-4 format as an Excel and/or PDF file. I reckon that people from the US can easily adapt these to Letter format. The great advantage of this is, that you will be able to use these files as a basis for personal modification or extension. This will save you a *lot* of time even if you do not use my storage system.

More on the labelling process will follow below in the label section.

With this, the 'hardware' section is concluded.

## 3. Arrangement of the Inserts in the Assorters

*Some information on my label file*

My label file has been created with Open Office v4.1.3 and saved in Excel format (.xls). I will try to make this available in the Resources section at GameSquad forum

http://www.gamesquad.com/forums/index.php?resources/

and/or offer it to the Texas ASL Club to place it in their download section.

http://texas-asl.com/

As we have already learned, 16 inserts of the A75 or A78 type fit into one Assorter. My file with the complete labels has separate tabs for

- Each individual nationality for use with A75 and A78
- All system counters for use with A75 and A78
- Nationality labels for use on the Assorters

One extra tab combines all labels for all A75 and A78 labels to take less space when printing. You will need to print only this tab (20 DIN-A-4 pages) and the tab with the labels for the Assorters (2 DIN-A-4 pages).

The tabs for the individual nationalities as well as the system counters provide the position where these particular labels will need to be placed in the entire set of the 3 HandyBoxes. It will look about like this:

Box 1, Assorter 2, Top Tier, Position 7

This means in the 1$^{st}$ of the 3 HandyBoxes, the 2$^{nd}$ Assorter from the top, the top tier within that 2$^{nd}$ Assorter on Postion 7 with the positions according to the follwing scheme:

| Positon 1 | Positon 2 | Positon 3 | Positon 4 |
|-----------|-----------|-----------|-----------|
| Positon 5 | Positon 6 | Positon 7 | Positon 8 |

In the label file, the labels are put in 'blocks' that will cover one insert each. This system should be pretty easy to understand when you cut out the labels after printing them. I recommend with proceeding with cutting out per inlay as this helps you to figure out where in the inlay each counter will go and avoid confusion. Here is an example:
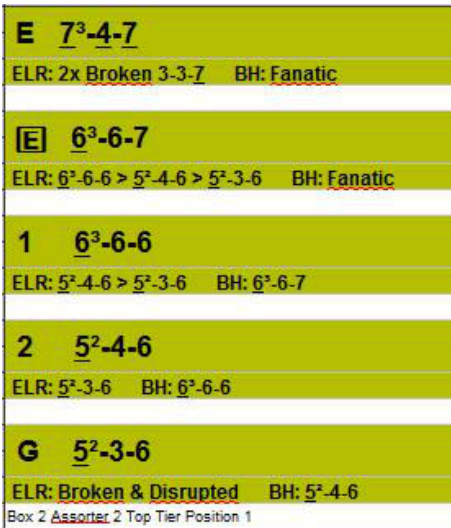


Example labels for an A75 insert



Example labels for an A78 insert

Here is an example, how a tier of inserts will look like when labelled:

## *Photographic Documentation of my Entire Set*

The A78 inserts have 8 compartments each. Two rows of 3 and one row of 2. Normally, the '2-row' will go to the right. But in some cases, it is advantageous to turn in by 180° to provide the counters within with a better context to neighboring inserts.

To help you determine and to visualize the position of the counters in each Assorter and tier therein, a complete list of photographs of the 'finished product' will follow. For a details view you will need to zoom in. To determine cases of A78's being turned by 180° you need not:

HandyBox 1, Assorter 1



Top Tier



Bottom Tier

HandyBox 1, Assorter 2



Top Tier



Bottom Tier

HandyBox 1, Assorter 3



Top Tier



Bottom Tier

HandyBox 1, Assorter 4



Top Tier

Bottom Tier (no pic, I ran out of empty inserts...)

HandyBox 2, Assorter 1



Top Tier



Bottom Tier

HandyBox2, Assorter 2



Top Tier



Bottom Tier

HandyBox, Assorter 3



Top Tier



Bottom Tier

HandyBox 2, Assorter 4



Top Tier
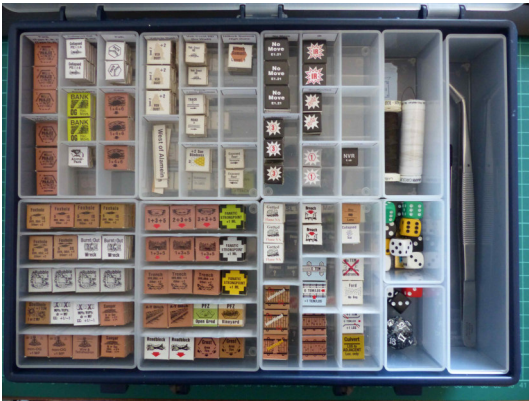


Bottom Tier

HandyBox 3, Assorter 1



Top Tier



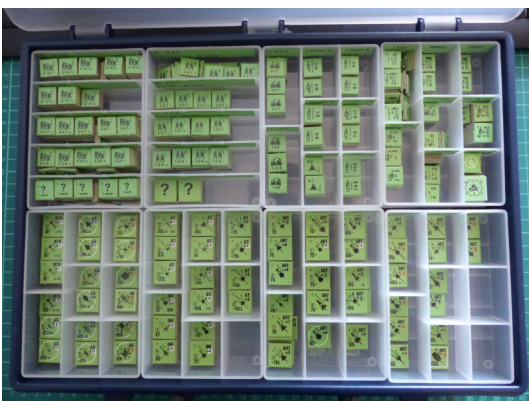Bottom Tier

HandyBox 3, Assorter 2
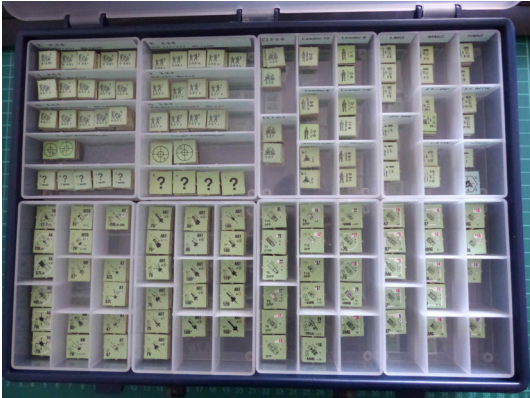


Top Tier



Bottom Tier

HandyBox 3, Assorter 3



Top Tier



Bottom Tier

HandyBox 3, Assorter 4





Top Tier

Bottom Tier (I ran out of inserts...)

HandyBox 1 (outside)

HandyBox 2 (outside)





HandyBox 3 (outside)

*Thoughts, Reasoning, and 'Patterns' behind my Storage Approach*

As you have now seen where you will end up, I will share with you the reasoning behind when to preferrably use an A78 to an A75. And I will illustrate the underlying 'patterns' in my visually oriented storage.

For easing orientation and finding counters in the storage system, I attempted to do things in a similar way for all nationalities. Since not all nationalities are the same – some have many infantry types, some a lot of vehilces, others a lot of different SW – I did not apply all patterns slavishly but adapted them a bit. This also served the purpose of trying to keep all Axis nationalities in one HandyBox and the Allies in the second (except for each side's Minors in the third). Furthermore I tried to keep each nationality either within one tier or within one Assorter, which worked out in most but not all cases. In this, you find the 1st 'pattern'.

Within each nationality, the basic 'pattern' will start with Full Squad Infantry types on Position 1, HS Infantry types on Position 2, SMC & Crews on Position 3, and SW on Position 4. If there are many infantry types, Full Squad Infantry will continue on Position 5, HS types on Position 6, Guns on Position 7. Vehicles follow after the Guns. This is the 2nd 'pattern'

If a nationality does not fit in a single tier, then Infantry, SW, and Guns will be found in the top tier and vehicles continue in the bottom tier. The exception are nationalities with a lot of different infantry types (like the US with USMC and Early Philippine Army). In the latter case, the extra infantry will be found in the bottom tier beneath the infantry on the top tier. This is the 3rd 'pattern'.

Infantry will usually be stored in A75's because there are many counters of a given type. The quality will usually decline from the top to the bottom compartment. This is the 4th 'pattern'

The postion of leader-types, Snipers, Heroes and crews will usually be basically the same for all nationalities. Crews in particular might instead be found with the Squads/HS if it fits better. Normally A78's will be used for SMC types. This is the 5th 'pattern'.

The position of SW-types will usually be basically the same for all nationalities. Some nationalities have so many different SW-types, that two inserts are needed. Acquistion in particular might be found with the SW-types or with Squads/HS if it fits better. Normally A78's will be used for SW-types. This is the 6th 'pattern'.

Guns will first be sorted by type (i.e. MTR, AA, INF, AT, RCL, ART), then by caliber (where 75* would be followed by 75, 75L, and 75LL within a given caliber). Within the same caliber type, the third criterium might be alphabetical order of the printed gun designation on the counter. In some cases, a criterium might be the nationality suffix (for example a GrW34**(g)** for a Hungarian colored MTR). It will be attempted not to 'overlap' Gun types across more than one insert if it can be avoided (i.e. all MTRs in one insert, all AA in the next). If I had enough counters available to form stacks of 6 of each gun type of a given nationality consistently, I tended to use A75's. The identical stack height is important to hinder lateral counter-shifting within an A75 during transport and thus to keep mix-up at a minimum. In some cases, where even double OoBs do not yield 6 Guns of a given type, I might have substituted excess 5/8" Concealment conters at the bottom of a stack to raise it to the height of 6. In case I did not have double OoBs to draw from, which resulted in many different Gun stacks of different height (mainly 6, 4, 3 or 2), I tended to prefer A78's to minimize counter-mixup caused by shifting during transport. This is the 7th 'pattern'.

Vehicles will usually be first sorted by 'type' like Unarmed Transport, Truck Type MP expenditure, AC type expenditure, Tanks, Non-Turreted CT AFV, ht's, OT TD's, SPA, SPAA, AFV of foreign origin. The next criterium will usually be unit designation as printed on the counter (for example different Pz IV types in order after Pz III types). Sometimes, a criterium can be MA caliber size. The ID# of the Chapter H vehicle notes is not a criterium as this would require cross-referencing which I want to avoid. As the picture is comparably diverse for Vehicles, the greatest variety in 'pattern' may be encountered. But as all vehicle types are stored horizontally and visible, you will easily be able to single out the Vehicle that you need. In this, you are aided by the labels that sticks in each compartment of the insert and specifies the vehicle types within in an easy to read font size. As unarmored & unarmed Transportation is usually more 'to the left' and Tanks 'more to the right', you will even be able to intuitively know which insert of a top tier you need to lift if the vehicle you are looking for is stored in the bottom tier of an Assorter. Even if this might sound a bit unsystematic, it works very well in practice.You'll see. With regard to preference of A78's to A75's the same principles as for Guns are applied. This is the 8$^{th}$ 'pattern'.

With regard to System Counters, the ones you need to handle most marking of Infantry, Vehicles, Levels, Smoke, Residual FP, and some other things are located in the top tier of the first System Counter Assorter. This serves the purpose that you need to lift up as few inlays during the game as possible for the System counters you need. On the bottom tier of the first Assorter of System Counters you will find things you usually only need to fetch at the start of a game or on rather rare occasions (for example Mines, 'White Conveyance' such as Horses or Cycles, Aircraft, Boats, OBA counters etc.). Generally, the system counters are 'themed' in their inserts (for example Residual FP, Smoke/Flame/Blaze, Vehicle Markers, all forms of CC, HW, Melee, etc.). This is the 9$^{th}$ 'pattern'.

The second Assorter of System Counters holds all sorts of Terrain on the top tier (Fortifications, Bridges, PTO terrain, DTO terrain, and Night). Again, each insert is 'themed'. Usually, you will only need to draw things here at the start of play or on rare occasions. The bottom tier of the second Assorter of system counters holds stuff that is very rarely needed (for example SASL counters or system counters for a couple of HASLs like perimeter markers etc.). This is the 10$^{th}$ 'pattern'.

As you see, I have put quite a lot of thought to the details that hopefully will make the drawing of counters quite intuitive and quick. As mentioned before, it might be a good idea to use a 13$^{th}$ Assorter without lid to place therein those inserts that will be forseen to be frequently used during the scenario you are going to play (i.e. Inserts with Concealment/CX Counters for both sides, the Night insert if you play Night, etc.). That way you will be able to easily access all counters you will likely need during the game in one or two Assorters you might find room to place beside your playing area without need to draw on the rest before sorting back the counters at the end of the game.

I hope, this was illuminating *why* I did things the way I did. You might come to different solutions for your set, but still the information given might be valuable to you because it point out what you might want to think about.

With this, the section on the arrangement of the inserts in the Assorters and Handy Boxes and the reasoning behind it is concluded.

## 4. The Process of Labelling

In this section, I will tell you about my experiences while going through the tedious work of cutting out the printed labels and applying them to the inlays and Assorters. Believe me when I say that you will be happy when this process lies behind you...

Altogether, you will need to individually cut out 1100 labels, carefully separate sticky part from the unneded backside and place the former into the inserts. Cutting out the labels is the easy part. Dividing the sticky part from the rest needs a steady hand as does the placing in the inserts where you want to avoid them to stick prematurely or misaligned.

I reckon everyone knows how to handle scissors, so I will not spend many words on that. Possibly, using a cutting machine could be an alternative which bears the promise to speed up work.
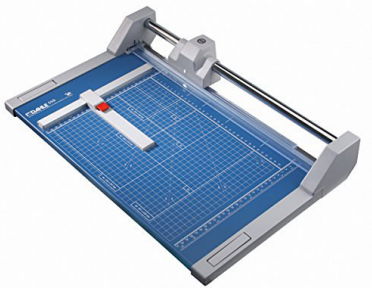


Personally I found that using scissors worked better for me and was more precise. You have to consider, that the labels are pretty small in size (7.0 by 0.4cm for the A75's and roughly 2.2 by 0.4cm for the A78's). So eventually, things might become difficult to handle with a cutting machine.

### *Best Way to Cut Out the Labels in my Experience*

While you get at it, I would recommend cutting the labels out by 'insert block':



When you have cut out the labels for one or two A75's or A78's, first stick them into the inserts before cutting out more. You will lessen chances to mix up things.

### *Best Way to Separate the Sticky Part of the Label from the Backside in my Experience*

Separating the sticky part of the lable from the rest will be a pain. Basically, the back of the Avery labels have creases that allow you to easily split off the unneeded parts of the backside. However, what works well for a DIN-A-4 size label is much more difficult for a label of 2.2 by 0.4cm. Manytimes, you will not have any crease at the back at all that helps you to peel of the back. Your fingernails will be to thick for the job. The best way I found was to hold the label in one hand and to carefully insert the tip of an Exacto knife in between the sticky part of the label and the backside you want to peel off. You need a steady hand and keen eye there... Once you've got the tip of the blade in between the two parts, turn it by 90°. Then you will have a small corner that is large enough that you can grasp it between your fingernails to pull it off. Sounds horrid? It is...

### *Best Way to Apply the Labels into the Inserts in my Experience*

Now how to best apply the sticky labels into the inserts? Especially, if you have thick fingers you might be in trouble with the A78's. Even without, I found them a bit tricky. The technique I developed works as follows: Once you have the sticky label separated from the backside, carefully grip it roughly in the middle with the very tip of a pair of tweezers. Hold the insert against your belly with the other hand. Then carefully use the tweezers to put the label in place. You need to be very careful not to misalign it. You can use one finger of the hand holding the insert to your belly to help align the label within the insert. Only when it sits straight apply pressure on the label to put it finally in place. If you misalign the label and it begins to stick in place in an unwanted position, it is most often possible to carefully retrieve it unless you have applied pressure on it. In the latter case, you will probably need an Exacto knife to get it off the insert while not trying to scratch the latter. On top of that, you will probably need to reprint the page on which this label was found (i.e. an entire DIN-A-4 page). For this reason, though a package of 25 Avery labels is enough, you might be better off with a package of 100. In fact, such screw-ups happened very rarely to me. If they did, I 'collected' the particular labels before printing out replacements, i.e. by copy/paste put a number of them on an extra tab in the Excel label-file and then printed them.

### *Editing and Expanding my Label File*

You may say the existing file for the labels is all fine and well, but I want to edit it and make additions.

Just so. One of the first obstacles you might run into could be that the non-PDF version might not be displayed 'right' on your computer. The reason for this might be that you are missing some fonts which are needed for the encased or circled 'E' for some type of elite units.
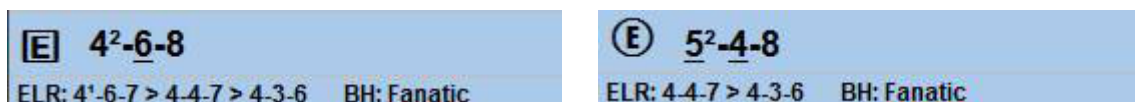


For the encased 'E' the font name displayed in Excel is 'D3 RoundSquarism', the name of the TrueType font is 'D3RoundSquarism.ttf'. This font can be found for free download (as of 30. Jan. 2017) here:

http://www.schriftarten-fonts.de/fonts/5225/d3_roundsquarism.html
http://ufonts.com/download/square-frame-mt/84882.html

For the circled 'E' the font name displayed in Excel is 'CombiNumerals Pro', the name of the TrueType font is 'ufonts.com_combinumerals-pro.ttf'. This font can be found for free download (as of 30. Jan. 2017) here:

http://ufonts.com/download/combinumerals-pro/117733.html
https://profont.net/fonts/bullet-numbers-sans-pos-pdf-font-download.html

By the way a nice tool for finding fonts and similar fonts is this:

http://www.identifont.com/find?similar=square+frame&q=Go

Useful to you will be the follwing table which provides the RGB color codes for ASL's nationalities. I used these codes to set the background colors in the label file. In some cases, the colors appear to be a little off the counters that I found in BV3 or Yanks2. On the other hand, printing a particular color as seen on the computer screen or third medium is a tricky business. For the Russians, no less than *three* color codes are given. The third one which I added below the table is the one which has been used for BV3.

| Nationality | Pantone Value | HTML Value | RGB Value # | VASL RGB Value | CMYK Value |
|---|---|---|---|---|---|
| German | 277 | #ABCAE9 | 171 202 233 | 106 184 255 | 35 9 0 0 |
| British | 155 | #EFD19F | 239 209 159 | 229 206 160 | 0 13 33 6 |
| U.S. | 390 | #B5BD00 | 181 189 0 | 102 204 0 | 27 0 100 3 |
| Russian | 124 | #EAAA00 | 234 170 0 | 145 145 0 | 0 27 100 8 |
| Russian | 125 | #B58500 | 181 133 0 | 145 145 0 | 6 32 100 24 |
| Italian | Cool Grey 6 | #A7A8AA | 167 168 170 | 166 173 178 | 16 11 11 27 |
| Allied Minor | 351 | #A2E4B8 | 162 228 184 | 130 237 189 | 27 0 23 0 |
| Axis Minor | 361 | #43B02A | 67 176 42 | 29 226 86 | 77 0 100 0 |
| Japanese | 115 | #FDDA24 | 253 218 36 | 255 219 0 | 0 14 86 1 |
| French | 297 | #71C5E8 | 113 197 232 | 0 140 255 | 52 0 1 0 |
| Finnish | 427 | #D0D3D4 | 208 211 212 | 208 211 211 | 7 3 5 8 |

Russian RGB for BV3:          183 152 86

So much for all you need to know about creating and applying labels.

# 5. Useful Links

Before I come to an end, I will provide you with a list of commented links that I found useful when getting into RAACO storage. These will not include those that have already been mentioned in previous sections.

http://www.raaco.com/
The 'home' of RAACO. A Danish company. They sell their products via resellers, but you will be able to see all the stuff that they have some of which a particular reseller might not have.

http://tacticalwargaming.blogspot.de/2014_10_01_archive.html
The most inspiring link to Vinnie Maresca's blog. I used this as a starting point to develop my own 'ultimate' solution. Has good pictures and a good PDF file to document in detail his way of storing his counters. The PDF can be found here:
https://drive.google.com/file/d/0B5pHlREa3wOLLTVidW14dGNreTQ/view

http://www.trojangames.se/raaco.html
This link is to a Swedish Reseller of ASL stuff and RAACO. He provides some detailed information on RAACO storage, proposes what hardware you need based on an approach using two HandyBoxes. There is also a PDF (albeit in Swedish) on that site to be found here:
http://www.trojangames.se/raaco-v122pdf.zip

http://stavkaarchives.com/
The STAVKA Archives from Sweden provide some pictures of a RAACO storage. A bit 'unorderly' in the implacable monocled view of Oberst von Marwitz, but still a good example. It does provide a view on some of the system counters which the blogspot link above omits.

http://texas-asl.com/
The crew of the Texas ASL Club have done a great job to collect a number of valuable links on RAACO storage and other storage soultions such as PLANO, matchbox or coin envelope in their download section here under the heading 'Counter Organization'. The following can be found there:

http://texas-asl.com/download/Raaco%20Storage%20Sheets%202009.zip
This one (RAACO Organization I) by Dave Spurlock provides Excel spreadsheets for an index-based storage solution.

http://texas-asl.com/download/RAACO_Tabs.zip
This one (RAACO Organization II) by Oliver Gray provides templates for tabs to cut out for an 'upright'-type Vehicle / Gun storage that uses much less space than my approach. Tabs are ordered by Chapter H ID#s with third party counters being inserted (BFP, CH, HoB, ToT). I used these tabs for excess vehicles that I have relegated to my reserve.

http://texas-asl.com/download/Raaco%20Organization%20for%20ASL%20-%20BWA.pdf
This one (RAACO Organization III) by Vinnie Maresca is the same as the PDF-File which can be found in the blogspot link above.

Of course, there are countless and endless threads in various forums out there that do provide tidbits of added useful details about the ins and outs of RAACO storage. But the attempt to list them up here would be rather tedious. The purpose of my article was to collect and present some of the information that I pieced together from numerous sources to save you the time doing just that.

## 6. Conclusion

If you have persevered reading up to this point without tumbling over bored to sleep, than you are probably determined enough to begin your own RAACO storage or to expand on my ideas.

I hope that I could point out that there is not *the* ultimate RAACO storage but only *your* individual ultimate RAACO storage. A fact that I did not realize when I started off. And I hope that I could save you a lot of time by compiling this information. After all, your ultimate RAACO storage remains only a means to an end – to enjoy the great game of ASL.


von Marwitz