



The Grumbler

The Official Newsletter of the Group North Historical Wargames Society



Volume 17 Issue 4

November 2017

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Cover image: Tambour-major et tambours du 1er régiment de grenadiers à pied 1809 (grande tenue) by Maurice Orange.

Editorial

Welcome to the November edition of The Grumbler! Many thanks to the contributors: Tom Hilder, David Alva, Mark Cook, and Ishtar and Ross Dawe.

As the Editor I am pleased to see the newsletter growing into a magazine, with this issue featuring six articles on various topics, with two of them related to the latest big events at the club. It also means that there are lots of things happening around, which is good! Hope you enjoy the read.

Sergiy, Editor

Submission guidelines:

Items for “The Grumbler” can be e-mailed to: TheGrumblerGNHWS@gmail.com. Files could be of any format supported by the Open Office: plain text (.txt), .doc and .docx, .rtf, .pdf, etc. with embedded or attached pictures. Paper submissions (“hard copies”) can be dropped into “The Grumbler” box in the Society’s Library room. Please feel free to include pictures, maps, drawings, and photographs – these will be scanned and returned to the owner. Finally, paper submissions can be posted to the club mail address (see below).

There will be a Christmas issue of the newsletter this year – if you have something in mind, please submit for this issue before 8 December. Currently the next regular issue is planned for March 2018 with the submission deadline on 28 February. Don’t be stressed if you’ve missed the deadlines – there will be more future issues with enough pages for your writing!

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Opinions expressed by the contributors are not necessarily those of the Society

Diary

Gaming nights:

Regular: every Wednesday from 19:00:

November: Wed 1, 8, 15, 22 & 29.

December: Wed 6, 13, 20.

January: Wed 10, 17, 24 & 31.

Subject to members' interest: Fridays from 19:00, Wednesdays 27 December and 3 January (these must be confirmed with a "key master" from the Club's Committee)

Sun 19/11/2017	Warrior Kings tournament
Wed 20/12/2017	Christmas Games (no door fee)

Other Clubs:

The Wargamers AU forum provides updates on the current and future wargaming events. Go to <http://www.wargamer.au/forum> and scroll down to the Tournaments and Conventions sub-forum. The direct WargamerAU link for the SA 2017 game calendar is:

<http://www.wargamer.au/forum/index.php?showtopic=187630>

General Notices and Announcements

Membership Fees

As a reminder your annual subscription is now overdue! Please see our executives: Rowland, Lance, Mike, or Sasha a.s.a.p.

Regards,

Rowland Dickinson (Treasurer)

Second Hand Stall 2017

I am happy to report that the second hand stall has so far made over \$740 for the club. Ishtar has also been organising some on-line sales for the board games donated to the stall, so that total should go up soon. The remaining stall items are on sale for a few more weeks, until I have to pack up the last couple of stall tables.

Many thanks to everyone who helped with the stall, from running it, donating items and spending money there!

As stall money is bonus money, the club can spend it on useful stuff to improve our wargaming. Please send any suggestions for what to spend the money on to our club committee members. Lately I have seen some very nice wargame terrain mats: perhaps a few of them could be bought for the club as a bulk order.

Regards,

Ross Dawe

Events

**The Open Day 29 October 2017:
Battle Of Khambula 29th March 1879**

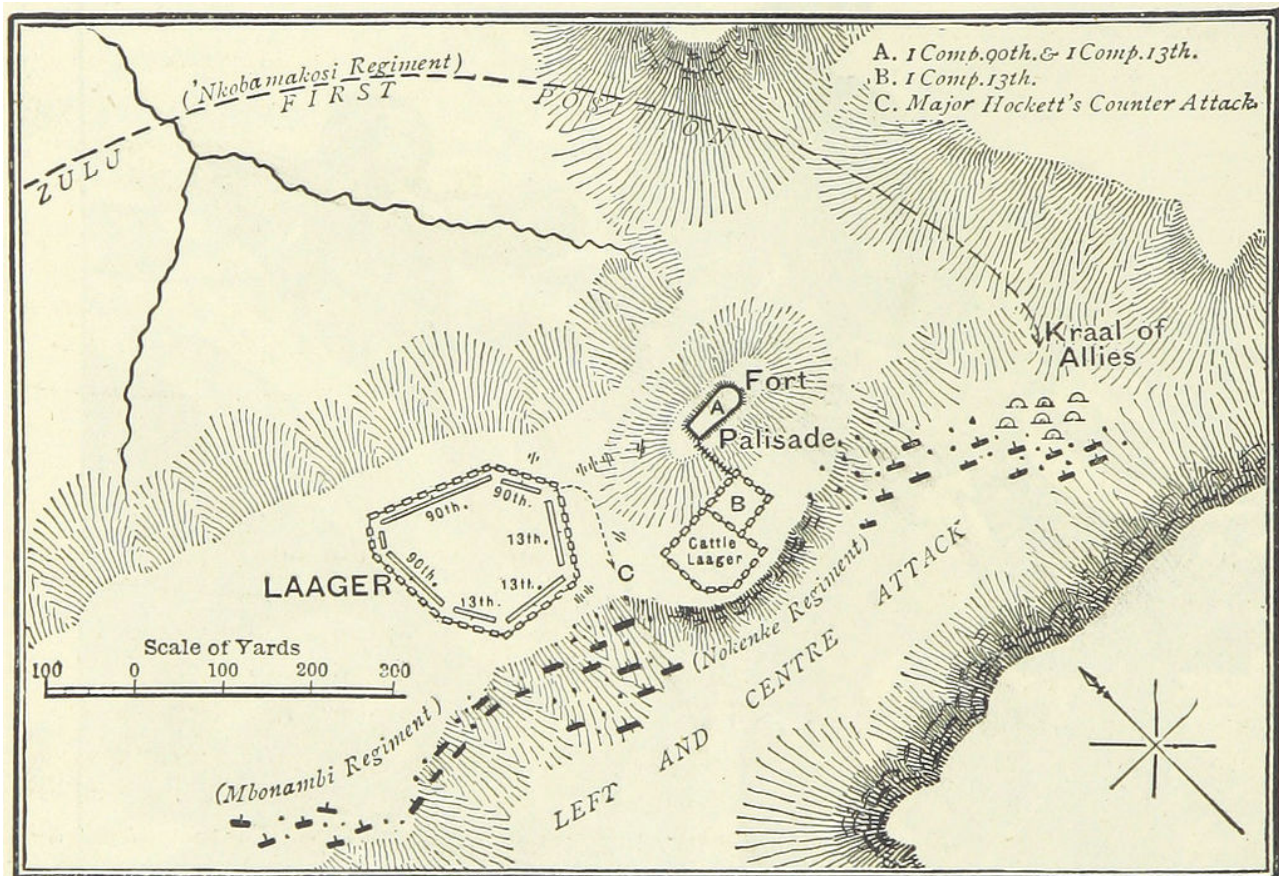
By Paul Webb

Part I: What happened at the actual battle

Colonel Evelyn Wood VC's Number Four Column, the most northerly British force, invaded Zululand on 6th December 1879. The Zulus in the area were of the AbaQulusi, a tribal group vigorously loyal to Cetshwayo the Zulu King. Led by the enterprising Prince Mbilini waMswati, the AbaQulusi held a group of mountains of which Hlobane was the most prominent. One of Wood's senior officers was Lieutenant Colonel Redvers Buller, an energetic leader of irregular South African horse.

On 20th January 1879, Wood dispatched Buller with a mounted force to reconnoitre the Zulu positions. After a running skirmish Buller was forced to retire.

On 21st January 1879, Wood's force marched out of camp and moved swiftly on the Zulu positions, forcing the Zulus to withdraw onto Hlobane Mountain. Wood's troops camped and on 23rd January 1879, Wood began his attack on Hlobane. In the early hours of the morning, the column received the news of Isandlwana, the destruction of Chelmsford's camp and the loss of nearly a full battalion of British troops.



PLAN OF THE BATTLE OF KAMBULA.

It was immediately apparent to Wood that the whole Zulu army that had fought at Isandlwana might well attack his column. He abandoned the operation and moved north to a new camp site, away from the main Zulu army.

The British column encamped on a plateau at Khambula, where the ground sloped away on two sides. The troops fortified the camp with wagon walls and trenches and built an earthwork bastion on a small hill in the middle of the camp and a further laager to house the cattle and oxen.

No Zulu attack materialised over the next few days and the energetic Wood returned to harassing the local Zulus. On 1st February 1879, Buller carried out another raid on Hlobane.

Over the following weeks, the Zulus raided north into the areas occupied by Boer farms and villages, away from Wood's camp, while the British raided the Zulu areas.

The main Zulu Army, dispatched north by Cetshwayo, arrived at Hlobane during the course of Buller's raid. The British force suffered heavy casualties, just before the trap closed on it. Buller lost 12 officers and 80 men. An unrecorded number of native irregulars were killed.

The newly arrived Zulu Army, commanded by Chief Mnyamana Buthelezei, moved on towards Khambula in battle formation; the mass of warriors forming the 'chest' with other columns as the left and right 'horns', ready to envelope the British, encamped ready for battle the next day.

The Zulu formation paused for a time, while final arrangements for the attack were made. It may be that the Zulu generals wished to avoid a direct assault on the British camp. However, the Zulu army began to move towards the British with increasing speed, the horns spreading out to the left and right flanks, the chest heading straight for the camp. The battle began at around 1.30pm.

The left horn disappeared from view, as it moved into the valley to the South, where it was held up by marshy ground. The right horn circled round to the North and came in towards the camp. Wood dispatched Buller with his mounted men to provoke the right horn into making a premature attack, before the other sections of the Zulu Army were in place. Buller's move had the effect intended, the mass of the right horn rushing towards the British fortifications.

The troops along the north face opened fire with the guns positioned in the open between the wagon laager and the redoubt. The storm of fire destroyed the right horn as a threat to the camp, the Zulu survivors rushing back to cover some six hundred yards back and remaining there. Wood was free to deploy a significant number of the troops and guns from the north side against the chest and left horn as they came up.

Hurried by the sound of firing, the Zulu left horn climbed the south face of the hill, out of sight of the British troops until they reached the crest, where they met a heavy fire. The Zulus on the right of the advance were able to mount an attack on the cattle laager, forcing Wood to withdraw its garrison and leave the laager to the Zulus.

Wood ordered Major Hackett of the 90th to take two companies to the edge of the hill and fire down on the Zulus assembling in the valley below. This enterprise had to be abandoned, in the face of heavy Zulu fire, using Martini Henry rifles

captured at Isandhlwana, from the cattle laager and a hill to the West of the camp, although the Zulu left horn was temporarily halted.



The Zulu left horn and the chest attempted attacks on the camp at various points around the perimeter from the south to the north-east, all driven back by the heavy fire from the two infantry regiments and the guns of the Royal Artillery: the two mule guns in the redoubt and the four 7 pounders deployed in the open ground between the wagon laager and the redoubt.

At 5.30pm the Zulus began to fall back. Wood ordered companies of infantry forward to fire into the withdrawing Zulu regiments.

Wood then unleashed Buller's mounted men in pursuit of the increasingly disordered Zulu retreat. Enraged by the defeat of the previous day on Hlobane and the slaughter at Isandhlwana, the horsemen killed the fleeing Zulus mercilessly during the pursuit, which continued over many miles. British foot patrols sought out Zulus lying wounded around the camp and killed many of them. Under the pressure of the defeat and the subsequent pursuit, the Zulu Army collapsed, many of the warriors heading for their homes.

Casualties at the Battle of Khambula:

Wood's force suffered 83 casualties. It is believed that 3,000 Zulus were either killed in the battle or died of wounds.

Part II: The Game, or What happened at the Open Day

Well, here we are at ring-side to watch a re-match between the perfidious Brits (COL Marcus Evelyn Wood & LTCOL Steve Redvers Buller) and the brave Zulus (General Paul Mnyamana Buthelezi Webb, General Alan Ntshingwayo kaMahole Schultz and General Heinz Bombasa Nkolisa Schroeder) at the “Battle of Khambula”. We expected the Brits to stay in their well-entrenched encampment and, by Jove, they have! Hopefully the Zulus will have had a stern talking to from their trainer and have revised their battle tactics, although initially they seem to have followed the same old plan once more.

Entering from the south-west one thinks that the Zulus will not use the same tactics and move along in five columns before deploying into their traditional “horns of the buffalo”. I am disappointed that they repeat this action so I quickly bet five quid on the Brits.

I also see that the Zulus appear to have less troops than before but am advised that the Zulu trainer cannot afford enough Zulus for his army so has worked out a system whereas when they are killed then “Zombie” Zulu units will replace them on the table until he meets his total base limit (he apparently learned this tactic from a war-gaming convention that he had recently attended). Meanwhile the Brits are sitting tight on the hill awaiting developments. Sensible, but a bit boring for the spectators who start to fidget.

Next move the Zulu right horn expands along the hill to the S-E, the centre moves below the glacis, and subsequently cannot be seen or shot at by the Brits. The left horn sits patiently out of the Brit firing range but still threatens the Brit right flank. The Brits are still waiting, waiting, waiting (some slow-handclapping now coming from the more boisterous spectators).

Now we can see the Zulu tactics more clearly. Instead of attacking the Brit centre or the extremely well defended laager the Zulus are concentrating their larger impis on the fort, manned by one Brit unit as well as two 7 pounder guns. The Zulu centre below the glacis is awaiting the opportunity to contribute initially by attacking the cattle laager &/or the centre while the left horn maintains its threatening posture but without committing its lads.

The Zulus are already taking casualties, as expected, but the attack by the right horn is developing well and the Brits are starting to hit the ropes in that section. I think about placing a 10 quid bet on the Zulus but reduce it to eight when some Mounted Infantry (MI) from the laager are sent to their aid.

While the Zulus right horn press their attack the Zulu chest now enters the fray by moving up to the glacis. They immediately face a formidable Brit force composed of three 7 pounder guns in the centre, a unit in the cattle kraal and also fire from the units in the laager. To support this attack the Zulu left horn also moves up onto the hill.

Now the spectators are really starting to get their moneys' worth!

Zulus are falling left, right and centre but they continue their attacks. The Brits at the fort, as well as their MI support are not enough to hold them off and they capture the fort and continue their advance along the hill from the east. Meanwhile in the centre the Brits have brought out some of their infantry units from the laager to support the three 7 pounder guns as well as MI out to their right flank to attack the Zulu left horn.



British camp from the western approach - the fort in the background



Zulus overwhelm the fort!



Zulus advance from the fort to engage the British centre line

The Zulu left horn holds and then attacks the laager together with some impis from the chest. Other troops from the chest still continue to confront the Brit centre while the Brits centre is simultaneously attacked by the Zulu right horn advancing down from the fort. Casualties mount in the Brit centre. I raise my bet to 20 quid on the Zulus.



Zulus from the left horn enter the laager - seconds later a unit of the Zulus from the chest join them

Finally two Zulu impis, one from the left horn and one from the chest, manage to breach the Brit laager and the game is at an end.

Overall, a well-deserved win for the Zulu lads over a very plucky Brit opponent. With a 1-1 win total we expect another re-match. The Zulus should then hopefully be able to field a full base set due to subsequent royalties from TV, films, magazine articles, interviews etc.

So, in signing off I bid you all a fond farewell until next time.

Paul Norris ("Noggs") Newman Webb (War correspondent for The Standard)

From the Front - Northern Zululand 1879

Extract from Wood's diary:

When I had obtained all the information I required I said, "Before Isandhlwana we treated all your wounded men in our hospital. But when you attacked our camp your brethren, our black patients, rose and helped to kill those who had been attending on them. Can any of you advance any reason why I should not kill you?" One of the younger men, with an intelligent face, asked, "May I speak?" "Yes." "There is a very good reason why you should not kill us. We kill you because it is the custom of the black men. But it isn't the white man's custom."

The Big Game Sunday 15 October 2017: Napoleonic Big Day Out

Text by Ross Dawe, photos by Mike Allen

Sunday 15th October saw Group North open for wargaming. With a 10am start and the venue open to 4pm, this was an opportunity to try a big multiplayer Napoleonic game using the Blucher rules.

There were two 160 point armies combined on each side: an Austro-Prussian coalition versus a French/Saxon/Bavarian army. Normal Blucher rules were used, with some minor tweaks for the scenario.

- Army break was at half instead of one third.
- Retired units stayed on table but assembled at a designated camp behind their army. They defend themselves with one dice and cannot attack or shoot.
- No named characters from the army lists.
- Each side had 3 dice for command points.

As they say, a picture is worth a thousand words... so let the pictures tell the remaining story!



Here we see the commanders prior to hostilities (left to right): Heinz fielded Prussians, Mike C. was using Saxons, Bavarians and a few French, Greg and Ross shared a French army and Mike A. fielded an Austrian army.

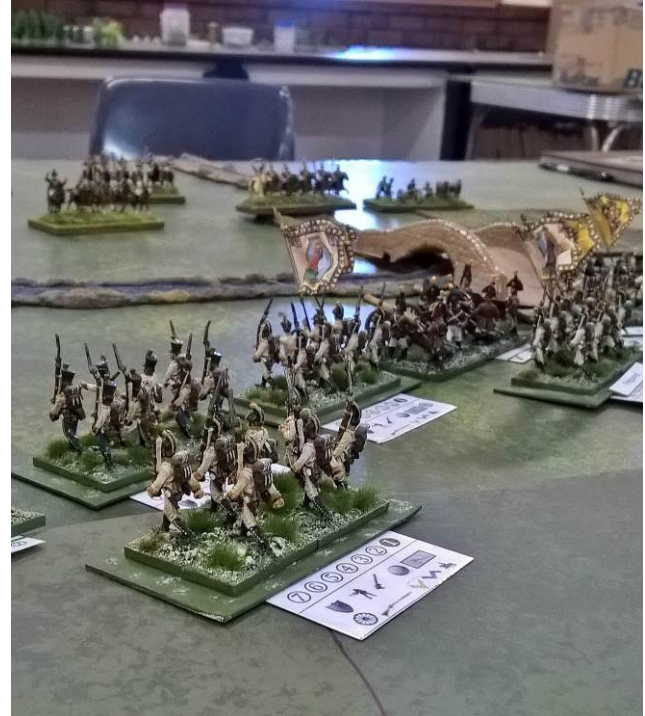


The terrain was a simplified version of the battle of Neerwinden from the Revolutionary Wars. The playing area was 12 feet wide by 6 feet deep, so plenty of room for 320 points a side. The cards in the photo show the initial army dispositions. The French deployed on the right of the picture, with units in the foreground spread over a wide expanse. In the distance are more French troops, with Saxons and Bavarians on the right wing massed for a big push. At left foreground in the picture are Austrians, with Prussians in the distance lined up to meet the big French right hook. The French camp is behind their centre. The Austro-Prussian camp is behind the ridge on their left flank



Left: The French army, commanded by Marshal Bernadotte leading the Saxons, immediately surged forward. The Prussians facing them were steadfast.

Right: Gaps in the Prussian line so soon? The Saxon artillery was deadly accurate. In the middle distance the Prussians and some Austrians have started an attack on the thin French centre. In news to no-one, your correspondent is not photogenic.



Left: Meanwhile, the Austrians are massed for a big attack. They looked very impressive standing there. Apart from the French at the bend in the easily forded stream, the only other French facing the Austrians were a couple of cavalry units and a horse artillery battery out of frame to the right.

Right: There are the French off in the distance, holding up an entire flank.



Left: The Prussians put up a stern fight, but the Saxons pressed their early luck and steadily picked off units. Here the Saxons are still an easily commanded cohesive force, but the Prussian casualties have broken up their formations and made it more costly in command points.

Right: While the Prussians were fighting and dying, their coalition partners the Austrians were still mostly sitting there eyeballing the few French units in front of them.



Left: It just kept getting worse for the Prussians: here we see their reserve units getting ready to meet the next onslaught. Apart from the Saxons seen in the background here, there is a large Bavarian corps about to exit the wood at right in support.

Right: The Prussians get one back: guard cavalry with a little help smash some Bavarian cavalry.



Left: Zouls! With the surviving Prussians no longer needing many command points, the Austrian juggernaut has bestirred itself into a major assault. The French look small as they are mostly 1/72 scale Airfix figures. The French camp including retired units can be seen in the distance at upper right.

Right: Prussian fans, look away now. The Prussian infantry unit in the centre of frame was mown down moments later.

The Austro-Prussian camp with retired units is just out of camera shot to the left, behind the Prussian unit at the back of the ridge. No pressure on that unit at all.

Moments later, Marshal Bernadotte conceived of a truly brilliant masterstroke. He planned to turn around his cavalry corps, ride it around the back of the forest, across the battle field and thwart the Austrian attack in the centre.

The Marshal's aides pointed out that all he had to do to decisively win the battle was ride the cavalry corps straight forward over the ridge and into the enemy camp, destroying the Austro-Prussian logistics and scattering many units in headlong flight.



Here we see the battle moments later. That wall of artillery are retired units, not a terrifying grand battery. The Saxon and French cavalry had ignored the muffled cries from a large bag held by the Marshal's ADCs and rode forward.

The last Prussian infantry unit in the way tried valiantly, with its musketry far better than the front line units. Unfortunately, the Saxon cavalry still charged into the Austro-Prussian camp and started mowing down units.

Meanwhile, the Austrian mass finally assaulted across the small stream. Some attacks threw the French infantry back. The French unit in the foreground had been badly damaged by musketry, but won fame and glory fighting off two near full strength Austrian units. Cuirassiers were ready to pounce on the Austrian breakthrough nearby.

At that point, the body count on the Austro-Prussian coalition and the ongoing destruction in their camp prompted an army collapse. Marshal Bernadotte, apparently fresh from a quick nap, immediately began composing his victory report to the Emperor.

Much fun and carnage was had by the players.

So, what could potentially have saved the battle for the Austro-Prussian coalition? In hindsight, they may have missed two opportunities. The first was not immediately using a reserve move to march at least one Austrian corps to the left flank to help the Prussians. The second was not launching the Austrian assault on the French cordon several turns sooner. Most of the French command points turn after turn were going to support the main attack, and there were periods when the French centre and left did little movement.

* * *

Many thanks to Mike Allen for organising the game day!

The experimental full day format allowed us to play all the way through a relatively large game, rather than having to pack up before achieving a result.

The next Big Sunday club day is currently planned to include a multiplayer Lord of the Rings game. In March or April there will be a game day with a big ancients battle based on the wars of Alexander's Successors.

Happy gaming!

Words of Wisdom

This battle is lost. But there is still time to win another.

General Louis Desaix de Veygoux reporting to Napoleon Bonaparte during the Battle of Marengo



Rimmer's War Diaries

"Rimmer's War Diaries are composed so that, for future generations of tabletop commanders, the experiences and insights of successful (and not so successful) commanders can be made available to them. Through such magnanimous generosity of their predecessors, the future commanders can be suitably informed and over-awed by the brilliance of those who have gone before."

US/Dutch Warships Battle Japanese in Java Sea: the 75th Anniversary

By Tom Hilder

The Battle of the Java Sea was a decisive naval battle of the Pacific campaign of World War II on 27 February 1942. The battle was the largest surface ship engagement since the Battle of Jutland in 1916.

The Japanese amphibious forces gathered to strike at Java, and on 27 February 1942, the main Allied naval force, under Rear Admiral Doorman, sailed northeast from Surabaya to intercept a convoy of the Eastern Invasion Force approaching from the Makassar Strait. The Eastern Strike Force, as it was known, consisted of two heavy cruisers (HMS Exeter and USS Houston), three light cruisers (Doorman's flagship HNLMS De Ruyter, HNLMS Java, HMAS Perth), and nine destroyers (HMS Electra, HMS Encounter, HMS Jupiter, HNLMS Kortenaer, HNLMS Witte de With, USS Alden, USS John D. Edwards, USS John D. Ford, and USS Paul Jones).

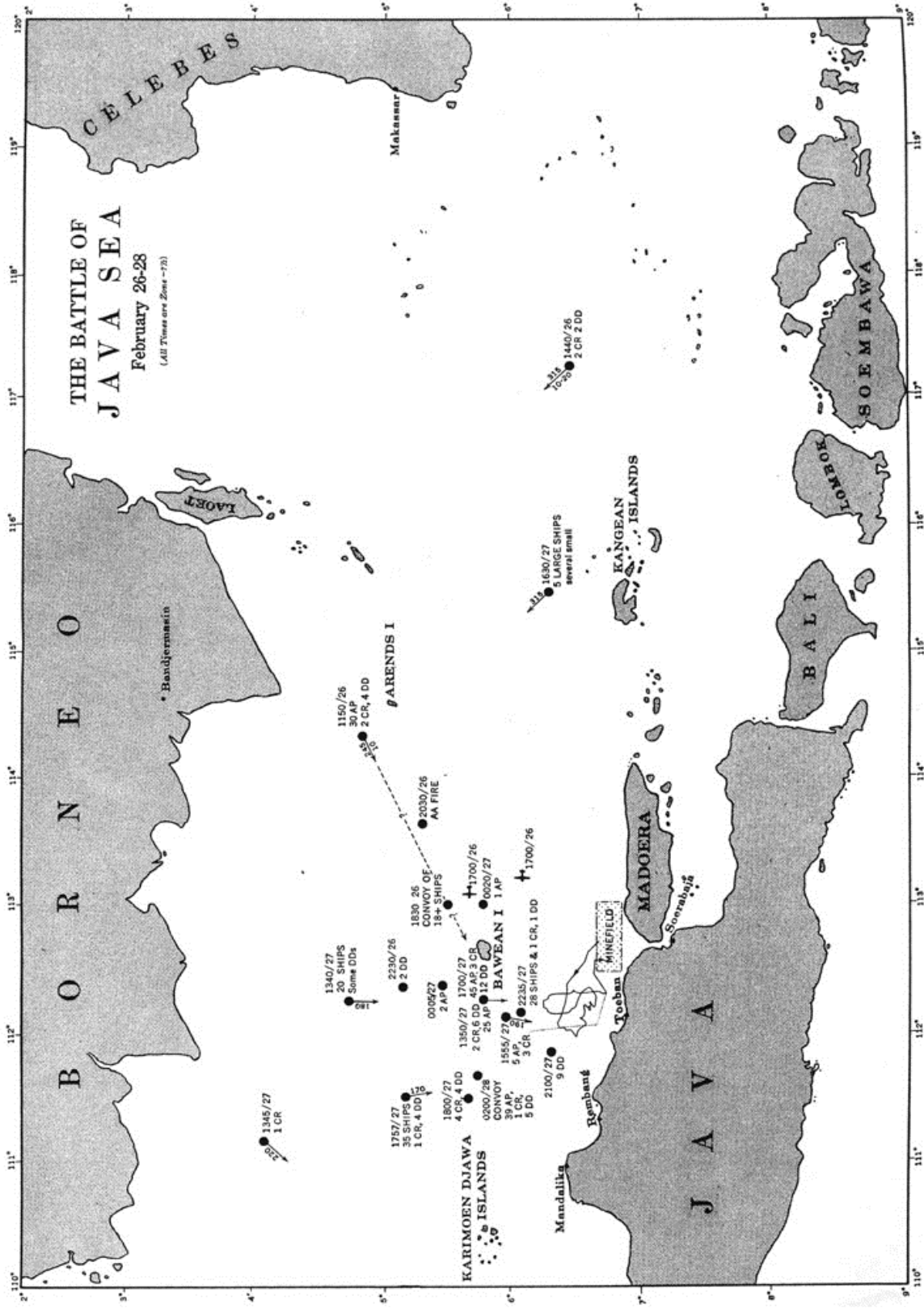
The Japanese task force protecting the convoy, commanded by Rear-Admiral Takeo Takagi, consisted of two heavy (Nachi and Haguro) and two light cruisers (Naka and Jintsū) and 14 destroyers (Yūdachi, Samidare, Murasame, Harusame, Minegumo, Asagumo, Yukikaze, Tokitsukaze, Amatsukaze, Hatsukaze, Yamakaze, Kawakaze, Sazanami, and Ushio) including the 4th Destroyer Squadron under the command of Rear Admiral Shoji Nishimura.

We had decided to refight this battle as part of a club games day using Naval Thunder rules and 1/3000 Navwar minis to celebrate the 75th Anniversary of the battle.

Special Rules and Victory Conditions

The Japanese jammed the radio frequencies and due to language differences each ship had a liaison officer / translator. This means that ABDA communication is difficult and requires each Allied player to communicate to each other in writing, which is delivered next turn. In the face of the Japanese successes in South East Asia morale is low, except for the Royal Navy ships with their proud naval tradition. Imperial Japanese Navy morale is running high after a series of victories over the western colonial powers.

The Allied force engaged the Japanese naval forces in the Java Sea, and the battle raged intermittently from mid-afternoon. The Japanese transport ship have turned north to avoid Admiral Doorman's Strike Force. If the ABDA forces can punch through the Japanese escorts they will try and catch the transport ships undefended.



A chart outlining the historical battle, published by the US Office of Naval Intelligence.

Opening Game



Starting moves (ABDA on left – IJN on right)

The ABDA Strike Force enters from the southern edge of the board. The destroyers have split into two forces – the US Navy Destroyer Division 58 and the Dutch and Royal Navy destroyers. The USN DDs lead the way and move directly north to engage Japanese ships from the Second Escort Force. The main body of the ABDA Force hold formation behind the DeRuyter and move west in line – engaging the IJN forces as they approach. The IJN First Escort Force led by the light cruiser Naka sails due south to close with the allied cruisers.

In the opening shots of the game the salvos of the ABDA cruisers fall short, except the HMS Exeter who hits the Jintsu at extreme range. First blood to the Allies.

From turn 3 the Japanese start rolling for the arrival of their Cruiser Support Group with the heavy cruisers Nachi and Haguro. Rear Admiral Takagi who leads the escort must be keen to stop the ABDA ships today as he turns straight up and arrives immediately to assist his subordinates.

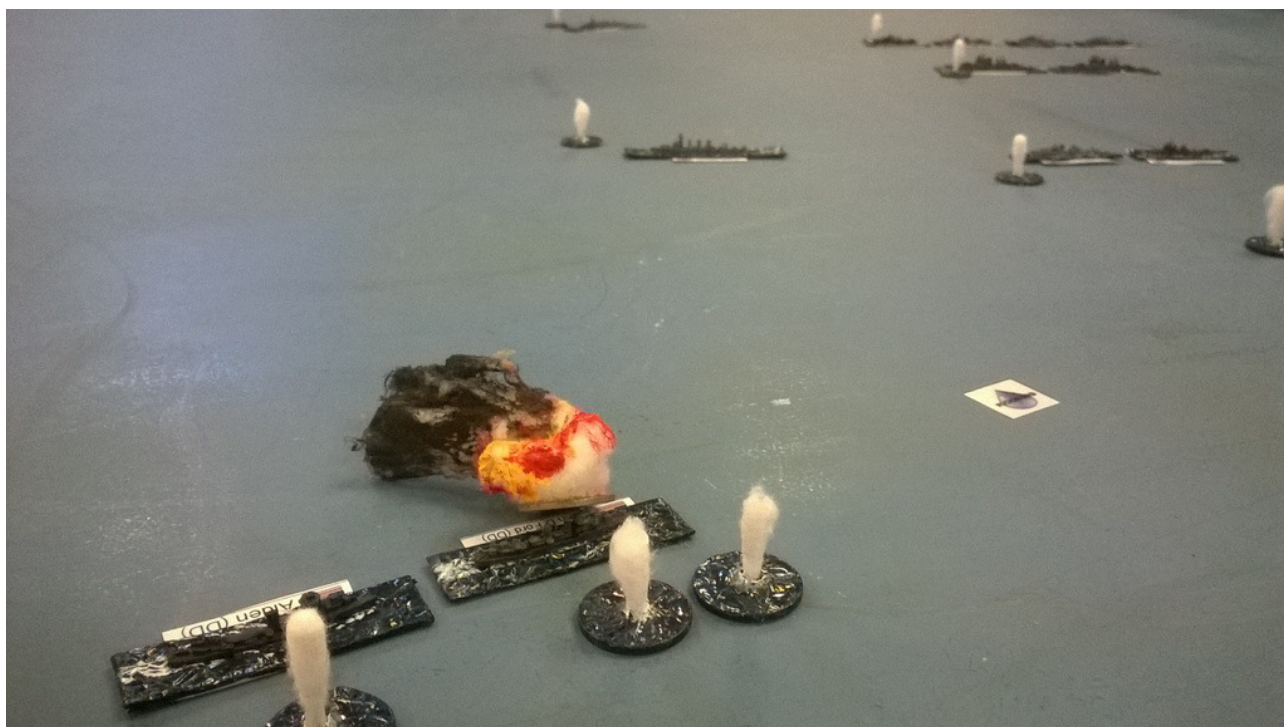
The IJN ships continue to close with the ABDA forces. As the USN destroyers push north they engage with the Japanese Second Escort Force lead by the Jintsu. The WW1 era USS Paul Jones leads her three sister ships to close with the Japanese ships. A hail of incoming shells explodes all over her as she erupts in flame and sinks rapidly soon followed by the USS John D Edwards to the bottom of the sea. The next ship, the USS John D Ford is hit and on fire, but this is quickly contained by their damage control teams. The Japanese gunners clearly have their range. The return fire of the USN ships is largely ineffective.

The ABDA cruisers trade blows with the Japanese forces at long range but both sides are largely undamaged.

With the loss of the USS Paul Jones and USS John D Edwards the ABDA DDs complete a morale check. This causes the Dutch DDs (Kortenaer and Witte De With) to retire followed by the HMS Encounter.



IJN heavy cruisers Nachi and Haguro arrive (top right). Jintsu and her DDs in foreground.



USS John D Ford on fire and the IJN forces in the top right of picture.

Midgame



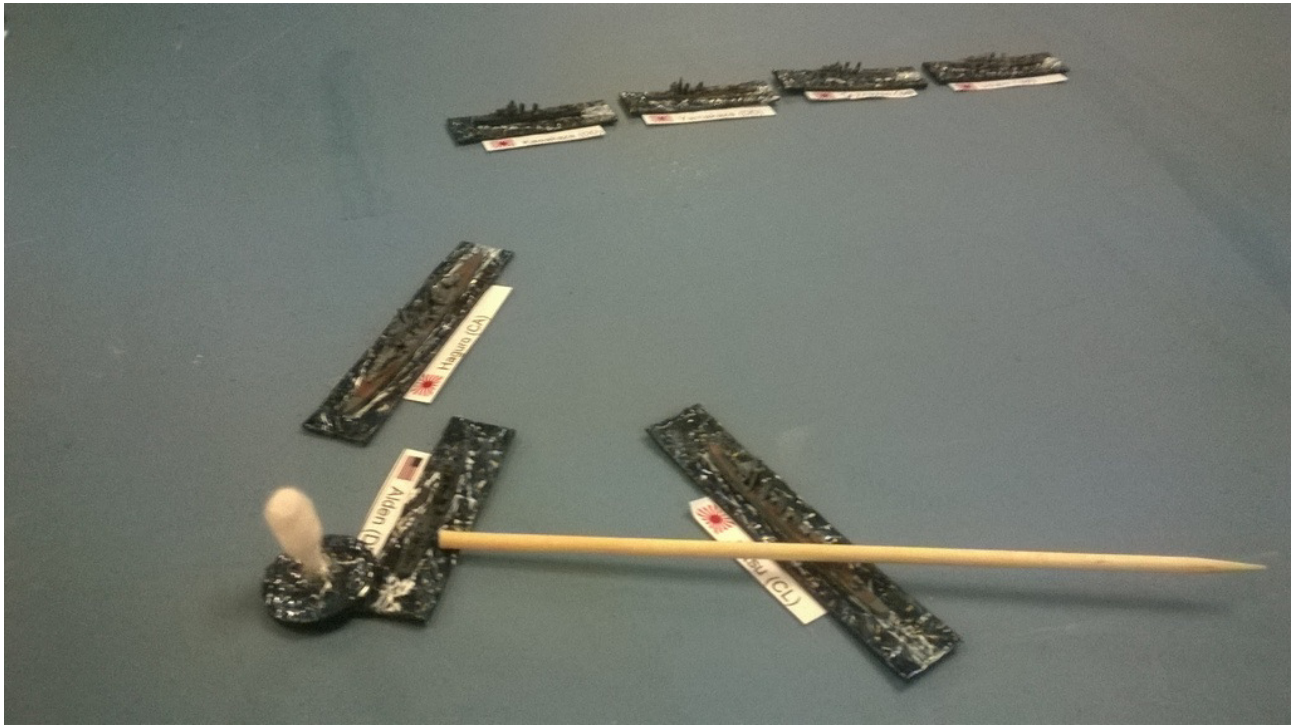
*ABDA Force on right. USN DDs bottom centre with USS John D Ford on fire.
IJN Forces on left.*

The USN DDs and IJN DDs with Jintsu close. The Jintsu blows the USS John D Ford clean out of the water and the USS Aiden takes heavy damage but closes with the IJN ships. She is a brave ship led by a brave captain! Weaving in and out of the Japanese torpedoes and shells she unleashes a wave of silver fish at her enemies. As the spray from the fall of shells falls she sees them reach out to her nearest foe.... And miss completely. Japanese torpedoes are similarly effective and sail past her sides.

The Royal Navy DDs HMS Jupiter and Encounter close to try and support their American allies.

Admiral Doorman meanwhile continues to trade long distance blows with the Japanese cruisers and destroyers – blowing off the odd secondary turret to keep them on their toes. To ensure he doesn't sail too far from his destroyers or too close to the IJN DDs (and to make sure he doesn't sail off the edge of the board) executes a classic 180 degree turn and forms back into line of battle.

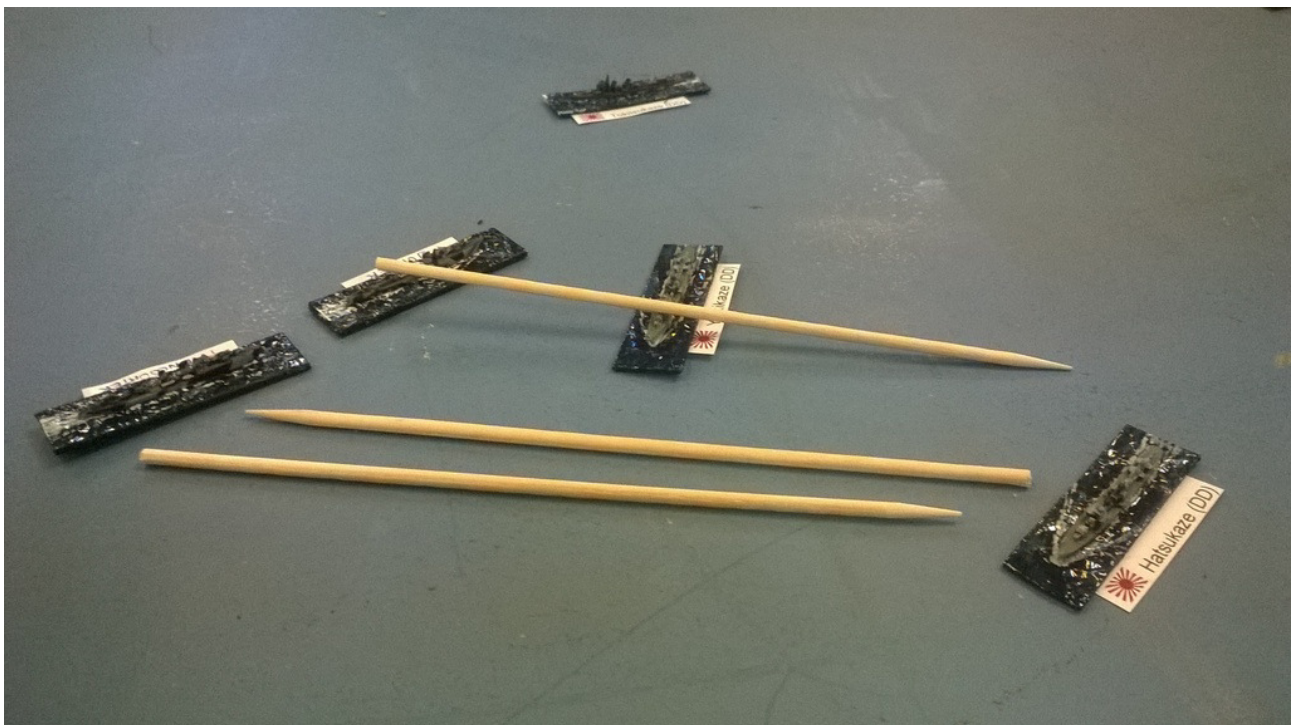
The damaged USS Alden, the last surviving USN DD, sees a gap in the Japanese lines and closes with the Japanese light cruiser Jintsu. On her port side she can also see the heavy cruiser Haguro. If she can survive their fire she can get her torpedoes off at close range into the sides of the vulnerable Japanese light cruiser. The Japanese cruisers fire – and all miss – except the last turret which sinks the valiant USS Alden.



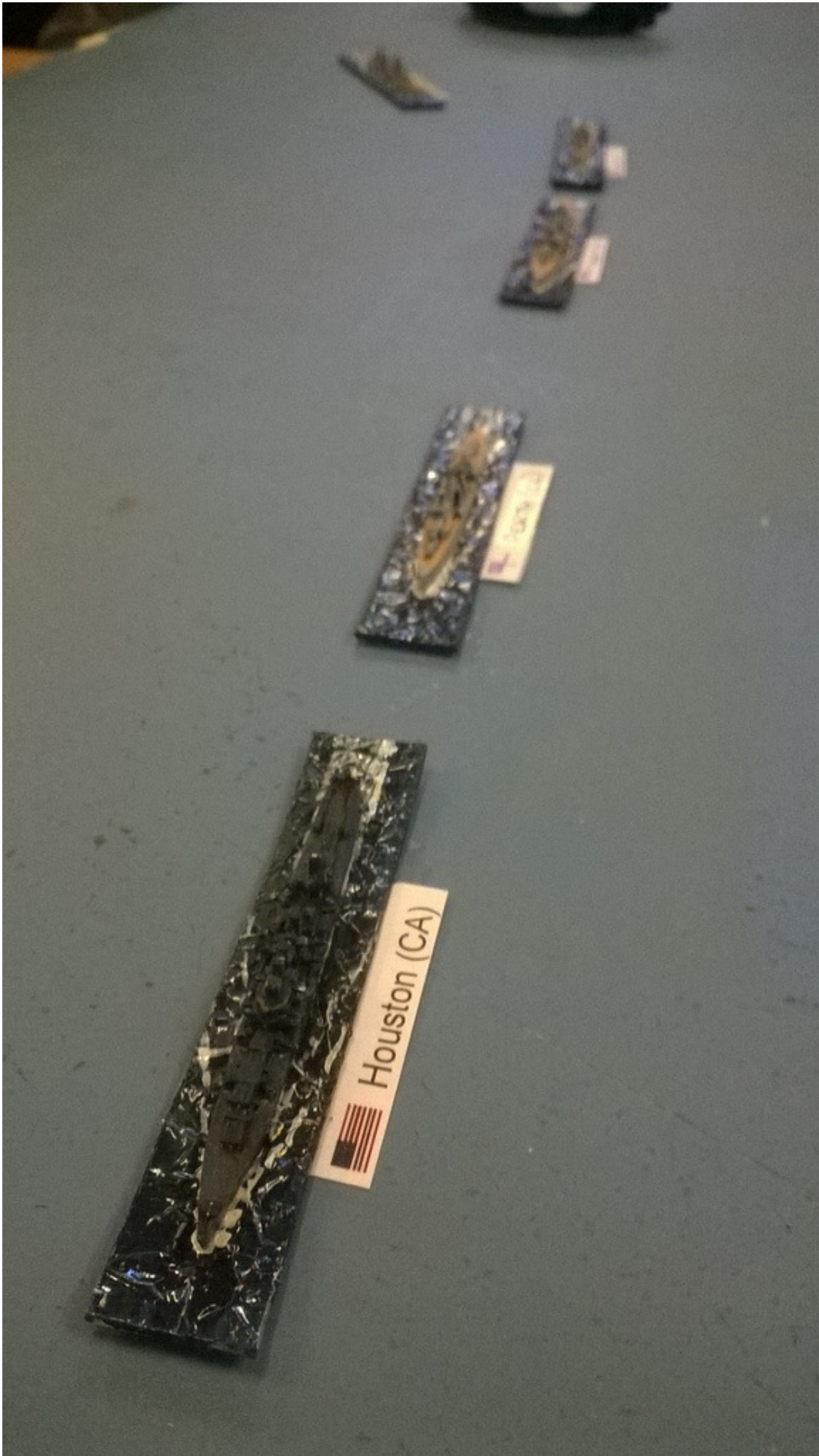
The brave USS Alden closes with the Japanese cruisers.

The Japanese ships are starting to close the noose on the ABDA force now. But sensing the disarray of the Japanese forces after the USS Alden's run, HMS Encounter and Jupiter close with the Japanese destroyers with torpedoes. The Japanese put some long lance torpedoes into the water, but previous damage has taken its toll on some of the Japanese ships with damaged tubes.

After the frenetic salvos by massed Japanese cruisers and destroyers, the Royal Navy destroyers are still float and watch as their 21" torpedoes sailed past their targets.



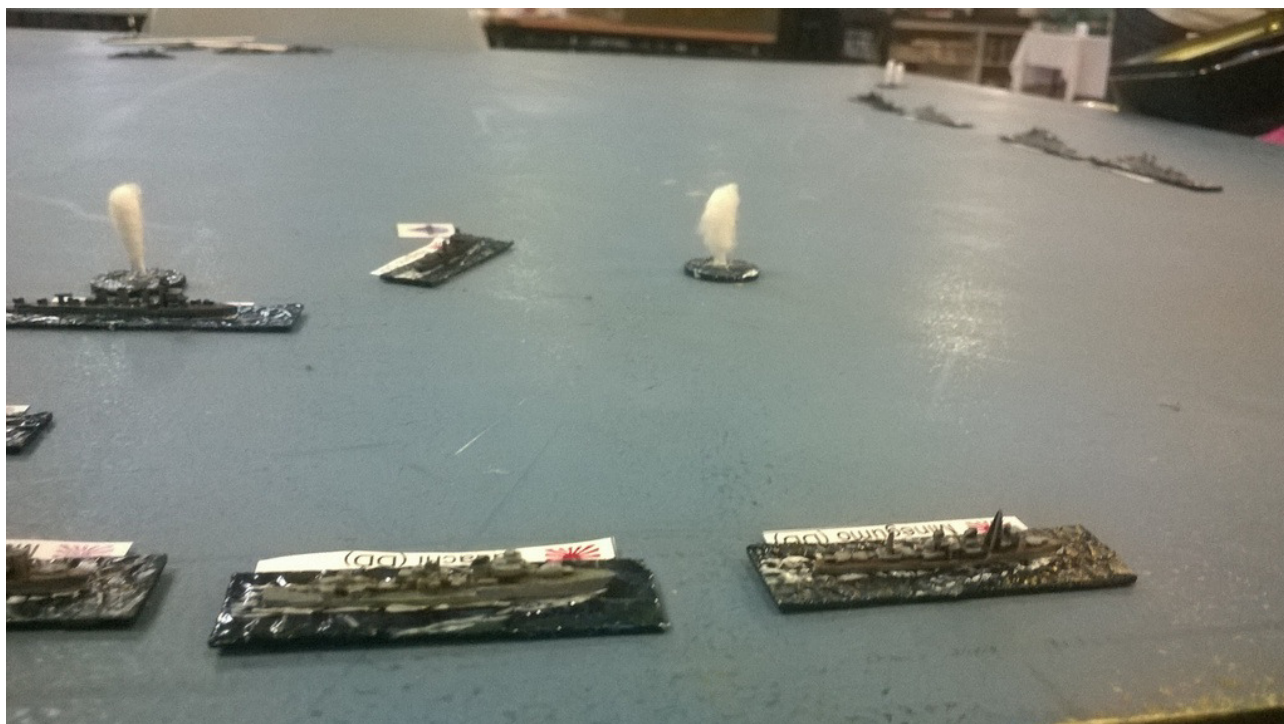
Royal Navy torpedo action



ABDA cruisers in line of battle behind USS Houston

The ABDA cruisers continue to improve the effectiveness of their gunnery as the range shortens. On a number of occasions they over-penetrate the Japanese destroyers – making them look like Swiss cheese. Allied fire badly damages the Naka causing flooding, as well as hitting the fire control room for the Nachi. A number of fires are also started but the well drilled Japanese damage control crews quickly extinguish these. Return fire on the ABDA cruisers concentrates on the Doorma's flag the Java and the Exeter, with an engine room hit slowing the British vessel.

End Game

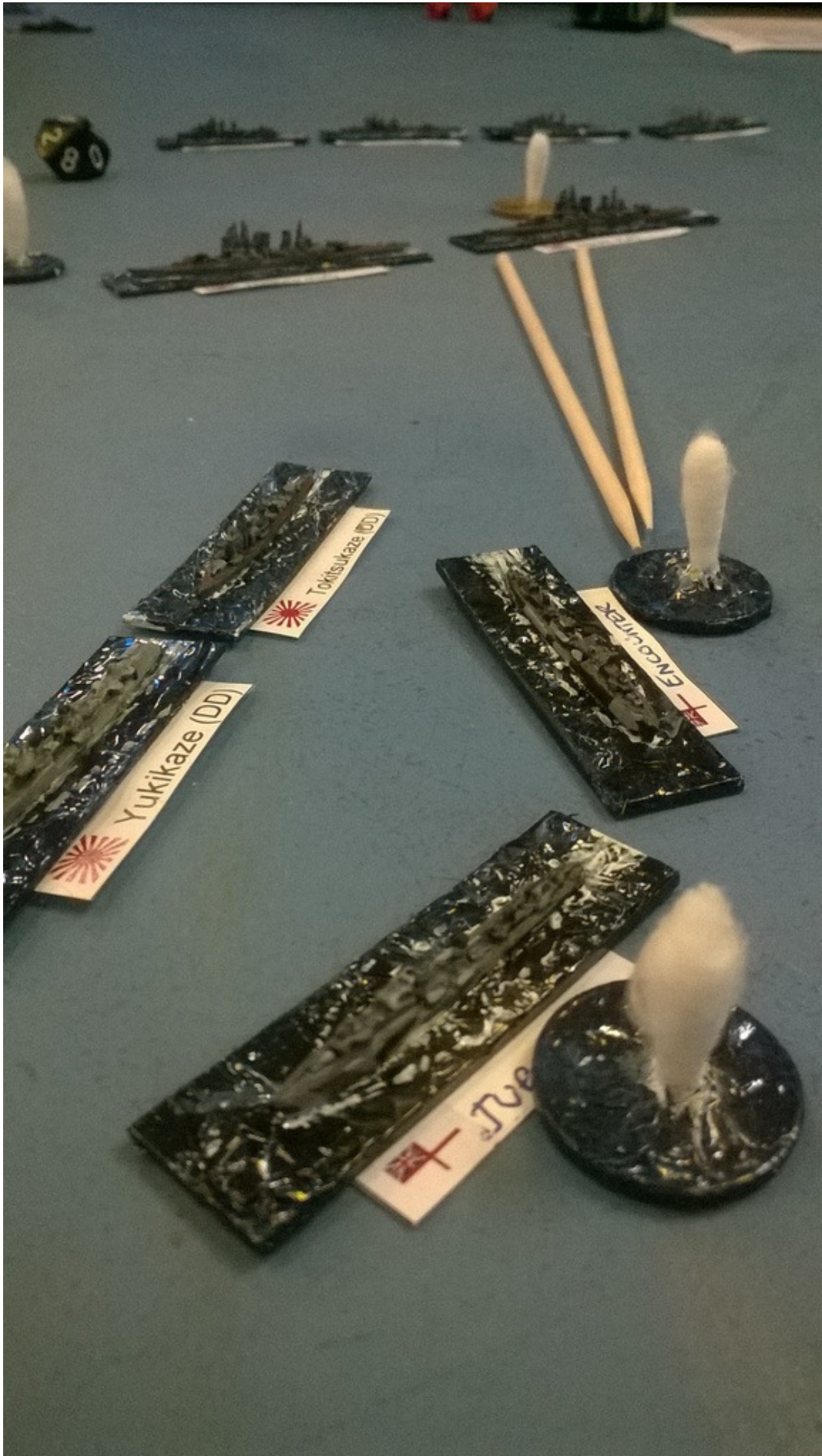


Japanese destroyers (bottom) trading shells with the ABDA cruisers in line of battle (top right)

The Japanese are currently on top in this tussle. They have sunk four American DDs and kept the ABDA Strike Force from breaking out north. Their ships are now starting to take damage and running lower in the water. As the ABDA cruisers come into action against the scattered IJN forces can they turn the tide?

Accurate fire from the Allied cruisers damages the Haguro's rudder forcing and takes her over 50% damage. Long range fire destroys three of the main turrets of the Nachi, which along with her damaged fire control reduces her effectiveness. The Naka suffers more accurate fire from the ABDA guns and reduces her hull to 25%. Japanese destroyers take damage from the secondary batteries of the Allied ships, with the Asagumo taking engine room damage and finally sinking.

The previously unflappable and impeccably accurate Japanese fire control seems to falter and hits are few and far between. Damage to the ABDA cruisers is light, with only minor damage inflicted.



The Royal Navy destroyers HMS Encounter and Jupiter weave and turn their way through the Japanese destroyer screen

The Royal Navy destroyers HMS Encounter and Jupiter weave and turn their way through the Japanese destroyer screen but there is complete bedlam. The Japanese cruisers close and launch torpedoes as well as fire their main batteries at their diminutive foe. Accurate fire sinks the Jupiter and leaves the Encounter with one last hull point. The Japanese Long Lance 24” torpedoes trail out to the Encounter and run past either side of her.

With the sun slowly setting over Java and both sides smarting from the battle the Japanese and ABDA forces break off the engagement.

Epilogue

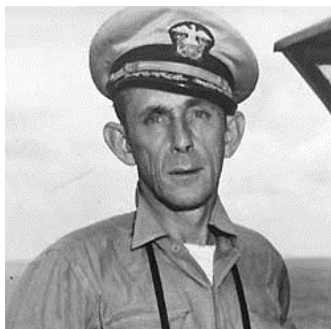
Well what an interesting battle. The Japanese did well to keep the ABDA forces well away from the troop convoys to the north and initially made very good progress against the isolate USN DDs. The little USS Alden provided some exciting moments as she nearly snuck through to do some serious damage. These managed to capture the attention of the Japanese ships, resulting in a lot of pain for the Allied destroyers but kept the attention off their larger brethren.

The ABDA cruisers were well controlled and provided steady fire on the Japanese ships. As the game went on and range closed, this became more and more accurate. Although only one Japanese destroyer was sunk, four of them were reduce to 50% or less and the cruisers Naka, Jintsu, Haguro and Nachi suffered significant damage. The ABDA cruisers were largely undamaged from their exchanges.

It was amazing to see the large numbers of torpedoes launched and miss their targets – even when they were fired at short range with reasonable “to hit” numbers none of them hit their targets.

In terms of victory points the Japanese claim the win with 329 VP for the 5 × DDs and ABDA scoring 72 VP for the Asagumo. It certainly felt a lot closer and if the game had continued a few more Japanese ships may have been modern day reefs in Indonesia. In comparison with the historical result the ABDA force did significantly better than one damaged Japanese DD and 36 sailors killed, with five Allied destroyers sunk.

Well played one and all.



Words of Wisdom

The definition of a calculated risk is a gamble which military men take when they can't figure out what else to do and which turns out to be right. When it turns out wrong, it wasn't a calculated risk at all. It was a piece of utter stupidity.

Rear Admiral Daniel V. Gallery, USN

Articles

1775 – 1783: The American Revolution, Part III

Not all were Hessians

By Mark Cook

I'm sure that everyone who has any familiarity with American Revolution has heard of the Hessian mercenaries hired by the English. However, while it was popular to call all the mercenaries Hessians, not all the Germans were from Hesse-Kassel; in fact, there were two different types of Hessians. 10,461 of the 29,875 came from 5 other German principalities. For more than one of these states, the renting out of their troops to other nations was a large source of their income. Nor was the mercenary system all that unusual: in the 1750's they saw their share of fighting in the Seven Year's War. The mercenary system had quite an honourable history for many years. This was not so surprising when it realised that wars were traditionally the province of the monarchies and that the armies belonged to the sovereign rather than the nation.

The Hesse-Kasslers saw most of their duty with the main army of Howe/Clinton and operated within and out of New York City.

The 3rd Waldeck Regiment sailed with British General Campbell for Pensacola, Florida. This meant that the Waldeckers have the dubious distinction of serving the furthest south of all the German units. Dubious because it was described as being "unfit in dress, equipment and discipline for service in the wilds of America".

In 1779 three companies of Waldeckers including the Grenadier Company were sent to reinforce the small British garrison at Baton Rouge in Louisiana. When the Spanish's army arrived outnumbering the garrison by about 4-5 to 1 the isolated garrison of British, Loyalist and Waldeckers surrendered after a brief siege. In the early part of January 1781 during the main fighting for Pensacola the 3rd Regiment Colonel Hanxleden led a force of 60th Foot, Pennsylvania and Maryland Loyalists with Choctaw Indian allies against the Spanish army encamped west of Pensacola. The attack failed, Hanxleden was killed, and his small brigade was driven back into the British entrenchments surrounding Pensacola. In May 9th 1781 the garrison of Pensacola surrendered after a lucky shell detonated the main magazine of the principal English fort in the Pensacola defences. Thus ended the Waldeckers southern travail. They were later paroled not to fight against Spain during the remainder of the war. Thus the Waldeck Regiment spent the rest of the war in garrison duties in and around New York City.

Anspach-Bayreuth's little army, although not arriving until June 3rd, 1777, saw considerably more action. It consisted of two regiments of infantry – one from Anspach, the other from Bayreuth – each of 570 men plus a Jaeger company of 101 men and officer and a small 44 man artillery company from Anspach. They joined General Howe in Philadelphia that November. They returned to New York City by sea the following June, as British distrusted them, claiming their inability to march quickly. For the next few years they remained a part of the New York garrison. In June, 1780 they were part of the Springfield New Jersey campaign. The following May they became part of the growing British presence in Virginia. As part of the Yorktown garrison they surrendered with that force.



Brunswick Light Infantry Battalion, 1777
(Lt. Colonel von Barner)

(1) Sergeant (2) Private (3) Lieutenant

Arrived Quebec, Canada, 17 Sept. 1776. Principal engagements: Ticonderoga, Hubbardton, Freeman's Farm, Bemis Heights, Saratoga. Like the Jaeger Company which served with it, this unit was made up of picked men and considered an elite corps. Its uniforms of special cut were of better quality than those of the regular Brunswick infantry regiments. Like the jaegers, they were armed with good German rifles and the straight hunting sword or hanger. They wore aigulettes on the right shoulder and long narrow cartridge boxes on the waist belt, the cut of the coat being intended to minimize interference with loading. The collars and cuffs were of black velvet. The gilt braid on the sergeant's hat and cuffs and his yellow and white hat and sword tassels conform to the general regulations for grade markings in the Brunswick units. As in the Jaegers the officers were armed like the men, with rifle and hunting sword. Both of these arms were usually of fine workmanship obtained by private purchase or bestowed as gifts by friends or relatives. These were the troops who were expected to counteract the deadly effectiveness of the American Riflemen.

PAINTING BY COLONEL HARRY C. LARTER, U.S.A.

FORT TICONDEROGA MUSEUM, FORT TICONDEROGA, N. Y.

"CURTICOLOR" REPRODUCTION FROM KODACHROME ORIGINAL



BRUNSWICK JAEGER COMPANY, 1777
(Captain von Geysa)

(1) Private (2) Private (3) Officer

Arrived Quebec, Canada, 17 Sept. 1776. Principal engagements: Ticonderoga, Hubbardton, Freeman's Farm, Bemis Heights, Saratoga. Attached to Lt. Col. von Barner's Light Infantry Battalion during entire Burgoyne Campaign. Under direct control of Commanding General for military operations. An elite corps of selected rangers and marksmen, predominantly sons of German State-Forest-Rangers. Arms: German rifles of excellent quality and straight hunting swords (hangers). Equipment and leggings of brown leather. Coat and waistcoat, traditional Jaeger green with white metal buttons, scarlet lapels, collar, cuffs and left shoulder strap. White worsted aigulettes for the enlisted men, worn on right shoulder. Buff leather breeches and gauntlets. Green worsted sword-knot, green and white hat-cord, green cockade with black loop and white metal button. Officers' buttons, aigulettes and cockade loop were silver. Their hat-cord and sword-knot were green silk interwoven with silver threads. Officers' jack-boots were soft legged with stiff knee-cuff and foot. Officers armed with rifles and hunting swords of rich design.

PAINTING BY COLONEL HARRY C. LARTER, U.S.A.

FORT TICONDEROGA MUSEUM, FORT TICONDEROGA, N. Y.

"CURTICOLOR" REPRODUCTION FROM KODACHROME ORIGINAL

*Old postcards showing Brunswick Light Infantry and Jaegers uniforms.
Images sourced from RarePostcards.com*



BRUNSWICK INFANTRY REGT. von SPECHT, 1776-77 (Colonel J. F. von Specht)
 (2) Color Bearer (Gefreitecorporal (with Princely Colors)

(2) Musketeer (light drill uniform) (3) Drummer (Trommler) (guard mount uniform)

Arrived Quebec, Canada, 17 Sept. 1776. Principal engagements: Ticonderoga, Hubbardton, Freeman's Farm, Bemis Heights, Saratoga. Upon arrival in Canada, the German regiments were uniformly equipped with knee high black cloth gaiters buttoned with from 12 to 18 metal buttons. For service in America they were equipped with the American "over-all," a loose fitting high waisted garment that strapped under the instep and buttoned snugly at the ankle with four or five buttons. This garment was supplied by the British from salvaged tentage and sails and from surplus naval stores of seamen's trousers made of blue and white or red and white striped "tiken." (See also Plate G-111). German drummers and musicians of this period were distinguished by elaborate braid trimmings on the regimental coat. The drum aprons were of brown or white leather. The drums were brass shelled with embossed coats-of-arms. The drum ropes were tightened by means of the "slit-tie" leather keepers and the snares by a turn-screw. The Princely colors reversed the colors of the field and flames of the Regimental colors. Thus the regimental colors of this regiment had white flames on a red field. The same held true for the other Brunswick Infantry regiments.

PAINTING BY COLONEL HARRY C. LARTER, U.S.A.



WINTER CLOTHING—German Troops, 1776-77 (Major General Friedrich Adolph von Riedesel)
 (2) BRUNSWICK DRAGOON Regt. von Ludewig
 (1) BRUNSWICK MUSKETEER Regt. von Specht
 (3) HESSE-HANAU CANNONEER Artillery Company

During the winter in Canada, 1776-77, special articles of clothing issued to British and German troops included: Canadian hooded capots (blanket coats) made of white blanket material trimmed and fastened with light blue tape; long heavy blue cloth "over-alls" extending from well above the hips down to a strap under the instep, warm and loose fitting under-jackets with white corduroy sleeves; blue wool corduroy lined mittens or leather fleece lined mittens; red-topped fur caps of racoon, fox, or squirrel, or Canadian blue tuques (long knitted caps with tassels); The Musketeer (1) in racoon cap, mittens, capot and over-alls is armed with a German musket and infantry side-arm. The Dragoon (2) has buttoned the lapels and skirts of his regimental coat over the thick winter under-jacket; his cap is of fox fur. The Cannoneer (3) in tuque, mittens, capot and over-alls, carries his artillery "pallasch" (straight sword) and, although not then an article of general issue, he wears beaded Indian moccasins for use when snow shoeings which was part of the prescribed winter training.

PAINTING BY COLONEL HARRY C. LARTER, U.S.A.

Old postcards showing Brunswick Infantry uniforms and German troops winter clothing.

Images sourced from RarePostcards.com

Next was Anhalt-Zerbst. The last nation to sign a treaty for troops with King George III (October 1777), they were to consist of one regiment of two battalions: each battalion to consist of one grenadier company and two musketeer companies of 160 men each and a Jaeger company of 50 men, for a total of 569 men. Most were new recruits which brought the unit to full strength for service in America. The unit saw little action in America doing garrison work in New York and New Jersey. But they had the most unusual uniform of white coat and breeches with red facings and turn backs with an unlaced black tricorne for everyday wear.

The last contingent and the largest outside of Hesse Kassel are from the Duchy of Brunswick under the command of General Riedesel. More than 4,000 in 4 foot regiments, a dragoon regiment, a battalion of combined grenadiers, a light infantry battalion and a company of Jaegers formed the contingent. The Dragoon was never fully mounted and about 40-60 troopers were mounted with inferior horses as scouts and couriers. The rest fought as infantry with British muskets and infantry equipment.

The Brunswickers sailed from England in two divisions. The first went with General Burgoyne and some British regiments reaching Quebec on June 1st 1776. The second Division arrived between July 29th and September 17th, 1776. Some of the first division took part in the chase of the Americans through Canada to Fort Ticonderoga, before settling down in their winter quarters.

The Brunswickers were equipped in a similar fashion to Hesse Kassel troops. Stories of the Brunswickers troops being cheated and given ladies shoes by a contractor is not true. Their equipment and uniforms were average for German troops of the period. They were allowed by the Duke of Brunswick to adopt British infantry tactics and they trained to fight in open order and seek cover in "Indian" fashion. So unlike all other Germans infantry in America they fought and moved as British infantry and learned from English experience of fighting in the wilds of Canada and America.

In 1777, most of the men went south with Burgoyne's army to invade the Hudson Valley. A part of each company, excepting the Dragoons, was left behind as part of the Canadian garrison. The 562 men and officers left behind were joined by 222 recruits from Germany that year. During the invasion the Prinz Fredrick Regiment was left behind with the weakened British 53rd Foot as garrison of Fort Ticonderoga. In August 1777 a force under Lt. Colonel Baum of the Prinz Ludwig Dragoons, consisting of his regiment, minus the mounted component, detachments of grenadiers, jaegers, 2 x 3 pdrs, several Canadian Tory units and about 100 Indians were defeated on a foraging expedition to Bennington. A relief column of Brunswickers under Colonel Breyman with his Grenadier Battalion, the Light Infantry Battalion Von Barner and 2 x 3 pdrs was sent to help. They were too late to save Baum and his command but managed just to fall back to the main army with some loss.

Shortly thereafter, they shared the disaster of Burgoyne. The generous articles of surrender granted by the American General Gates were overturned by the Continental Congress. The Army was given rough treatment and put to work as slave labour on northern farms and other industrial projects. Many deserted the harsh conditions. In 1781 the remaining troops were exchanged and the remaining 2,708 out of 5,723 returned home.

In the meantime, only the Prinz Frederick Regiment and the Hesse Hanau Jaegers remained as complete units and the other fragments of the main Brunswick troops left behind were formed into a three makeshift battalions, Ehrenkrock, Praetorius, and Barner. They garrisoned Canada where they saw no more combat with the exception of the Hesse – Hanau Jaegers who were active on the frontier with the United States alongside 8th and 34th Foot and the many loyal Indian tribes.

Suggested reading:

Morrissey, B. *Saratoga 1777*. Osprey, Great Britain, 2000

Morrissey, B. *Yorktown 1781*. Osprey, Great Britain, 1970

Eelking, Max von. *Letters and Journals of Major General Riedesel*. New York, 1969

Pausch, G. *Journal of Captain Pausch*. New York, 1971

Boatner, M.M. *Encyclopaedia of the American Revolution*. New York, 1961

Lefferts, C.M. *Uniforms of the American Revolution*, New York, 1926

Mollo, J. & McGregor, M. *Uniforms of the American Revolution*. Blandford Colour Series, London, 1975

Kings Of War: Fantasy Stereotypes and Uniqueness.

By David Alva

Kings Of War has been on the scene of wargaming for a number of years now and was one of the first tabletop wargame games to catch my attention after Bolt Action, it's certainly one of Mantic games most popular games and has established a dedicated horde of fans on its own merits after continuing on from its original release state of mainly trying to capture the attention of dispossessed and disheartened Warhammer Fantasy fans.

Kings Of War features many armies with the usual fantasy trends; such as Elves, Dwarves, Humans, Halflings, Orcs and Goblins but in the world of Mantic (The name of the world Kings Of War is set in) quite often these traditional races come with fluff that is not in their usual stereotype.

Unlike most standard fantasy settings your Dwarves of Mantic are not a dying race; in fact the Dwarves are doing quite well, there is a huge empire and a number of smaller and independent factions. The main empire of Dwarves even threatens the gates of the greatest human city on the planet and capital of Basilea.

One of the nicest changes to fantasy races in Mantic that I first found was how Ogres have been handled. Unlike in Warhammer fantasy where the Ogre forces were pseudo-Mongols and cannibal savages, in Mantic the Ogre's alignment is neutral. The Ogres are indeed big, scary and tough but also brave and they have a communal quiet side to them as well. The Ogres of Mantic have a *wanderlust*, they crave adventure, travel and song with a culture centred around heroic campfire stories being told to new generations of Ogres for generations to come.

With this unique twist on Ogres in Mantic away from how they have been presented in other games a number of players have picked them up as an army to play because they love their flavour and the background of the Ogres.

Other races in Mantic brew and bobble for attention: evil treacherous Ratkin are out in packs like the traditional Skaven, Twilight Kin (Dark elves) boil horror potions and plan evil deeds, while the Salamanders charge out of their jungle strongholds to wreak havoc on the forces of enemies.

The Nightstalkers is another one of Mantic's unique races; they are the result of Elven mages messing with magic that should have been left alone. Now hideous Cthulhu-like horrors pour forth from portals from places no intelligent race has ever seen before and bring about terror on the land. Naturally the army is of the evil alignment. This army is found in the "Uncharted Empires" Army Supplement book.

Mantic has also created a good alignment sea faring race with the Trident Realm, like something from the Brian Jacques' "Redwall" type of book. The fish type men join forces with Frogmen, Water elementals, Krakens and the Thuul (Cthulhu-like tentacle men) in order to battle the forces of evil from their watery shores (however the Trident realm forces are officially neutral).

Mantic also has not just your standard evil such as abyssal demons but more unique evil such as the Varangur. These are an evil faction that doesn't follow the main evil line. Instead, they follow their own evil god and don't get along with the stereotypical evil so much that they successfully invaded the abyss and rendered a whole section of it desolate. Those historically minded will recognize the name Varangians and associate it with the Vikings; this is indeed what the clans of the Varangur are based from our real history; only add in some trolls, tundra wolves and monstrous horrors from the darkest caves.



*Some badasses looking for even more trouble
(from the Mantic Games web-site)*

The world of Kings of War is really picking up and with the rules updates and many new fantasy races that are to be included we will no doubt see more of a new spin on the old stereotypes for fantasy races and more unique factions to play.

One thing I have found playing Kings of War is that win or lose, I like to be able to field and play an army for which I really like the lore and the background. Personally it has become the most important factor in choosing an army for me.

It's All about the Food

Editor's Note

The following article is a bit unusual for The Grumbler as it doesn't talk about wargaming, historical warfare, or modelling techniques: it describes a personal experience of a person going through voluntary starvation. Ishtar Dawe took part in the Ration Challenge fundraising action and for a week sustained on essentially a half of what would be a normal food intake.

Ishtar's experience helps one to understand what people in besieged cities and devastated countryside would go through and hence to see the history with empathy. To put it into some perspective, the article is accompanied by a note on rations of armies of the past.

Ration Challenge: A Red Cross Fund Raiser

By Ishtar Dawe with interview questions from Ross Dawe

As part of a fund raising challenge, for one week Ishtar Dawe ate a diet based on the food the Red Cross supplies to each Syrian refugee. Several Group North members generously sponsored her.



The ration box arrived containing food for one week. It was not as large as expected.

Q: What was the Ration Challenge all about?

A: The Ration Challenge is a combination fundraiser and empathy adventure. Refugees in Jordan have limited resources and are already suffering from the trauma and stress of leaving a war-torn area. Act For Peace co-founders Kaz McGrath and Ben Littlejohn came up with the idea for the challenge when visiting a Burmese refugee camp in Thailand over three years ago. The idea of the challenge is to open our eyes and our stomachs to the conditions that refugees are living in and try to survive on the highly limited resources they are supplied.

The Ration Challenge is for us to go out there and show refugees we stand with them, not against them, which is something desperately needed in our social climate today.

The tumultuous war and political climate across the world at the moment has placed us into a humanitarian crisis worse than World War II according to the United Nations. Undertaking this challenge we were able to raise money to give refugees food, medicine, education, and support they desperately need to survive. We will, too often, ignore the actual human side of the trials of war on the innocent populations in an area. This is just a little way we can bring their struggle to the limelight.



The cat is for scale in the photo and is not part of the refugee diet.

Q: So, you essentially ate a refugee subsistence diet for a week. How much food was allowed?

A: The food we had was minimal. Act For Peace supplies rations in 6 month rotations, while we were having only a week of that, it was really, really minimal. Inside the week ration box there was 420 g of rice, 170 g of lentils, 85 g of dried chickpeas, 125 g of tinned sardines, 400 g of tinned red kidney beans, 300 mL of vegetable oil, as well as a coupon for 1.5 kg of rice, and a coupon for 400 g of plain flour. From fundraising we could earn extra rewards such as a spice of our choosing (by sponsoring ourselves), 8 teabags (raise \$200), 50 g of sugar (raise \$400), 170 g of a vegetable of our choosing (raise \$500), 120 g of a protein of our choosing (raise \$700), a bonus item up to the value of \$5 (raise \$1000), 330 mL hot or cold drink of our choosing (raise \$2500), a special thank you gift made by a refugee in Act For Peace's small business program in Jordan (raise \$5000), 70 g of milk powder (be part of a team of people doing the challenge together). I managed to scrape through the extra protein tier and let me tell you how very minimal that amount of food is all up.

The average calorie count for a day on these rations is below 1738* cal. For context the Sphere Minimum Standard† is 2100 cal/person/day. It's a huge difference when you actually do it.

* Food calories; 1 food calorie is 4.18 kJ – Editor.

† The Sphere Project was launched in 1997 to develop a set of minimum standards in core areas of humanitarian assistance. One of the major results of the project has been the publication of the

Not to mention that with only a single spice and only a small variety of ingredients, there was minimal flavour in anything. By the end of the week it tasted like my rice was sugary, my body was that desperate for sustenance. It's a rough time.

Q: That diet seems rather bland, and I'd be worried about long term effects if anyone was on it for a sustained period. Over the week, did you notice any health effects as a result of the diet?

A: So it turns out I get severely ill if I don't consume enough animal protein in a given period of time. You may be wondering how I found this out. The constant, brain crushing headaches, the wooziness, the muscle fatigue, the muscle spasms and paralysis, and the inability to concentrate on a task that only alleviated when I ate a proper serve of animal protein leads me to believe I may die if I ever try to become a vegan.

Beyond that, however, the extremely low calorie count as mentioned above made this a very difficult time. I reduced my activities as much as possible to avoid overusing the minimal energy stocks I had available. It was a very lethargic week.

Q: How did the diet affect your ability to do normal tasks?

A: I found myself fatigued constantly and simply things like travelling in a car felt as though I was being crushed under the weight of an elephant right on the temples. Also before I had consumed a proper protein based meal I found myself switching between muscle spasms and temporary paralysis that meant I couldn't move beyond moving my hands slightly. Basically just about everything was horrible.

Q: Was your mental alertness affected?

A: It was exam week. This time trying to do exams and study has been the worst period of my study in a while. I would not recommend ration living while trying to live a very mentally intensive lifestyle.

Q: Were there any noticeable behavioural effects?

A: I found myself to be a lot grouchier and tired at everything I was trying to do. Every little thing that went right was a blessing to me, everything that went wrong was devastating. The world was in extremes.

I also felt pained every time someone else in the house made food because smells intensified, and I spent most of my time watching cooking videos and dreaming of being able to eat again.

Q: What kind of foods seemed to help with alleviating any problems?

A: So as I mentioned before with the paralysis thing, that fixed itself right up when I ate animal protein again so I just decided to cut my losses and reduced my total amount of rice I allowed myself each day and substituted that for egg instead. Egg has the highest protein content per gram (being about 17g of protein to 45g of total mass). I felt significantly better making this switch and my paralysis managed to stop, I had better focus, my three day migraine subsided, and I actually had some energy to do things again.

Q: I notice you were part of a team going through the challenge together for mutual support. How much did your team raise?

A: All up my team (Raditions) managed to raise \$1475 during the challenge, which is pretty neat. I'd love to give a shout out to some of the people who sponsored us from Group North! Thank you so much to Lance Holden, Mike Allen, Harry Dunn, and Ross Dawe for your kind donations to the cause. You've done so much to help both the team and people who need it far more than we do.

Q: How much did the overall Ration Challenge raise?

A: All up we managed to raise over \$3 million to support Syrian refugees around the world!

Q: As a parent, it felt odd to be donating money so that my child would starve! Would you be willing to undertake a similar fund raising venture in future?

A: Honestly, I probably would, but I'd want to talk to a doctor beforehand because I'd rather not get as sick again as I did this time. Haha. It was all for a good cause and it helped open my eyes a little bit more to the struggles those people have to deal with on a daily basis. We all could use a little more empathy; this was just a small step in the right direction.

Calories through the Ages

By Sergiy Kravchuk

“An army marches on its stomach”.

This phrase is variously attributed to great generals of the past, most often either to Frederick the Great or to Napoleon Bonaparte. Sometimes it is ascribed to Claudius Galen, the Chief Physician of the Roman army – he definitely knew! But quite possibly it originated from Alexander the Great as his army was supplied by a stretched logistic chain from Greece. Maybe the saying is even more ancient and Alexander simply translated to Greek what his adversaries said in Persian, for the Persian army was a big, complex, and well-supplied military machine. Anyhow, the validity of this thesis was attested countless times through history. Those still in doubt may look at the fate of *la Grande Armée* in 1812. Aiming for a swift decisive campaign (the word *Blitzkrieg* won't be coined for yet another century), Napoleon hoped his army could live off the land (or in simple terms, rob the locals) up to the end of the campaign. He was half-right, for on their way out of Russia they were pushed back to the land they devastated on their way in. Of 100000 men marching out of Moscow on 19-20 October 1812 less than 2000 crossed the Niemen River in December same year on their way to France*. So out of 100 men 98 did not make it: some were killed in action, but most either died from starvation or froze to death. Lucky ones were captured by Russian troops and survived†.

Ishtar's experience shows how debilitating could a shortage of food supply be even in a short term. She tried to survive on 1700 calories a day for a week and initially had no source of animal protein (neither meat nor eggs) with a profound effect on health. The diet did not include fresh fruit and vegetables; however one

* These were joined by remnants of two other big detachments sent north of the route at the beginning of the campaign, so there were around 10000 survivors in total returning from Russia. – S.K.

† A few thousand Frenchmen taken prisoners during this war were later converted to Cossacks and served in Central Asia and Siberia. They married local girls and eventually settled in these areas. Two centuries later their descendants consider themselves ethnic Russians. *C'est la vie*. – S.K.

week was not enough to develop an acute deficiency of vitamin C, known in ancient times as scurvy. Ishtar didn't try to mimic activities of an ancient warrior, her experience was probably more in line with what civilian population of a besieged city would go through, and reading Ishtar's interview one can understand why so many times in history city folks eventually gave up resistance and accepted whatever the victor imposed on them, be it slavery or even death.

But what these calories actually mean? How much are these 1700 calories of the ration pack or 2100 calories of the recommended minimum? Let us put the numbers into some context.

Diet scientists tell us that the required energy intake mainly depends on four factors: gender, age, body size, and level of physical activity. We can add the climate as well, but it has perhaps a lesser effect since people tend to put on clothes according to the weather. An UN (FAO) report published in 2001 has some formulae to calculate the recommended daily calories depending on these factors.

The modern NATO standard for operational rations defines a "reference" soldier weight of 79 kg. However, people of antiquity were shorter and weighted less. In fact, height of people in Europe did not change much from the Roman times to the mid-XIX century when it gradually started to creep up. So we take an average ancient warrior to be 170 cm high (or 5 feet 7 inches for those still in Imperial units) and weighting 63 kg (so he is not overweight), plug the numbers into the formula, and get the modern recommendations:

Male person, 63 kg body weight, of age:	Daily energy intake, calories per day, for physical activity level:		
	Sedentary	Moderate	High
25 years	2300	3000	3400
40 years	2100	2600	2900

An average young warrior would require 3000-3400 calories a day, and a veteran could in theory survive on 2600-2900 calories per day... especially by delegating hard work around the camp to greenhorns.

But this is the scientifically calculated demand; what about the supply side, what was offered in the ration?

The ancient Greek soldiers received daily a *choenix* (a quart, 0.84 kg) of barley and some olive oil, which would provide around 2800 calories. It is known that they also carried onions, cheese, salted meat and fish, and wine (to mix with drinking water). Given their daily ration weighted between 1 and 1.3 kg, they had perhaps 100 grams or more of meat and cheese per day. Add oil and onions to the equation, and at around 3000 calories per day the diet still remains rather lean, but definitely not starving.

The Roman soldiers received 4 *modii* of wheat a month, which would make approximately 0.83 kg per day – the same as Greeks five centuries ago. They also received meat, olive oil, wine and sour wine. Scholars agree that this diet would provide 3000 calories a day, maybe a bit more. No doubt it was supplemented by

some extra food a legionary could source from locals by either buying (in peacetime) or confiscating (at war).

Fast-forward sixteen centuries, and Peter the Great, the Russian Emperor, wrote regulations for his newly created army which absorbed the best of what the military science of the time could offer. A Peter's soldier would receive a daily ration of 1 pound* of meat, 2 pounds of bread, 1/2 cup of grain, wine and beer. Well, a bit more generous than the Roman ration, but not too much: together these would give 3300-3400 calories per day. Granted, Peter loved his army, but adding 10–15 % to a standard ration adds accordingly to the logistic burden, so there was a good practical reason for being that kind to soldiers: Russia was (and still is) a cold, no, COLD place – ask Napoleon if unsure. Fresh fruit and vegetables were not specified in the regulations, they were given to seasonal availability; the navy, for example, was even supplied with imported oranges and lemons to avoid scurvy†.

Back to the XXI century, and the modern-day NATO field rations standard sets the mark at 3600 calories per day.

Knowing all these, what can we take from Ishtar's experience?

An attempt to survive on 1700 calories (around 55 % of what an ancient soldier would normally get) was a challenging task by itself. One can imagine now how tough it was when these not so generous soldier's rations were halved during sieges or severe shortages. Also note detrimental effects of cutting the animal protein intake. Meat was much more expensive than grain, also meat could be easily spoiled in warm weather, and yet it was in ration packs of soldiers for millennia for a very good reason. Generals of antiquity were not excessively generous men, but they needed their armies to fight and win.

So next time, when fielding your army for a battle, make sure they had a good meal before. An army marches on its stomach indeed.

Sources consulted:

Human energy requirements. Report of a Joint FAO/WHO/UNU Expert Consultation, Rome, 17–24 October 2001

Field rations. Wikipedia.

Nikola Köpke and Jörg Baten. *The Biological Standard of Living in Europe during the Last Two Millennia.* Tuebingen Economics Department Working Paper No. 265, September 2003.

The Military Statute of 1716. Saint-Petersburg, 1776 // *Уставъ Воинскій.* Напечатанъ повелѣніемъ Ея Императорскаго Величества четвертымъ тисненіемъ в СанктПетербурѣ при Императорской Академіи Наукъ 1776 года.

The Cambridge History of Greek and Roman Warfare, in two volumes. Cambridge University Press, 2007.

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* Russian pounds; 1 Russian pound = 0.4095 kg

† This practice was adopted from the Dutch, the leading European seafaring nation of the day; if reasons for scurvy were better understood at the time, the Russians could do much cheaper with sauerkraut. – S.K.