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AUSTRALIAN ARMY JOURNAL

A periodical review of military literature

No. 215, APRIL 1967.

Contents

Photograph: *Australian War Memorial*

TOBRUK SIEGE. Part of the town and port which the 9th Australian Division and its British, Indian and Polish comrades helped to defend against far stronger Axis forces between the months of April and December 1941.

The British freedom from embarrassment in the Egyptian frontier area during much of this period was ascribed largely to the defenders of Tobruk. 'Behaving not as a hardly pressed garrison (wrote General Auchinleck) but as a spirited force ready at any moment to launch an attack, they contained an enemy force twice their strength. By keeping the enemy continually in a high state of tension they held back four Italian divisions and three German battalions from the frontier area from April until November.' It was at Tobruk, at the outset of the siege, that German armoured forces suffered their first defeat in World War II.

General Northcott: A Wartime Chief of Staff

Major-General L. E. Beavis, CB, CBE, DSO,
Australian Army (Retired)

GENERAL Sir John Northcott, KCMG, KCVO, CB, K St J, died at his home at Wahroonga, NSW, on 4 August 1966. Twenty years before, on the termination of his active service with the Australian Army, he had been appointed Governor of New South Wales, a position he held for eleven years. He had been Administrator of the Commonwealth of Australia in 1951 and 1956 during the absence of the Governor-General.

That General Northcott should hold these positions and carry them out in the manner he did is an indication of his stature, a stature due to his personal qualities, his wisdom and his wide experience of men and affairs. It can be truly said of him that in the wise execution of these responsibilities he 'could walk with Kings — nor lose the common touch'. Not only did he have the respect which should go with the positions he held throughout his service, he also had the affectionate regard of his associates and those who served under him. He could be firm and unequivocal, but at the same time understanding and considerate, and he had the capacity to express himself lucidly and convincingly even in circumstances when the facts at his command might have been more extensive — attributes which some military leaders in the past have not possessed.

In the Army Gradation List of March 1946 there were, on the Active List, four substantive lieutenant-generals, Lavarack, Sturdee, Mackay and Northcott, who had done much to make possible the raising of the Second AIF as a result of the standard achieved by the

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Major-General Beavis graduated from the Royal Military College in 1915, and saw hard service with the AIF in France and Flanders mainly with the artillery, from early 1916 onwards, for the most part as a battery commander, but briefly as CO of the 14th Artillery Brigade in the operations at the Hindenburg Outpost Line and the Hindenburg Line. He was artillery liaison officer with the 60th American Brigade during the attack on the Selle River defences, and with the 6th British Division in its advance of 23 October 1918.

After a variety of appointments in the peacetime Australian Army, he left the appointment of Director of Staff Duties to rejoin the AIF in April 1940, first serving as ADOS I Aust Corps and later as Director of Ordnance Services AIF in the Middle East. He was appointed Master-General of the Ordnance in April 1942, a post he filled with great distinction for the next four and a half years. After the war he became Chairman, New Weapons and Equipment Development Committee, Australian Guided Missile Committee (1946-47), and Australian High Commissioner to Pakistan (1952-54).

Army — both regular and CMF — during the difficult years before 1939. Also, subject to the qualifications that Lavarack had limited opportunity to display his talents as a commander after his return from the Middle East and Java in early 1942, and that Mackay in January 1944 went to Delhi as High Commissioner for Australia in India, these officers were among the leaders of the Australian Army throughout the war. Other outstanding leaders included Herring, Morshead and Rowell.

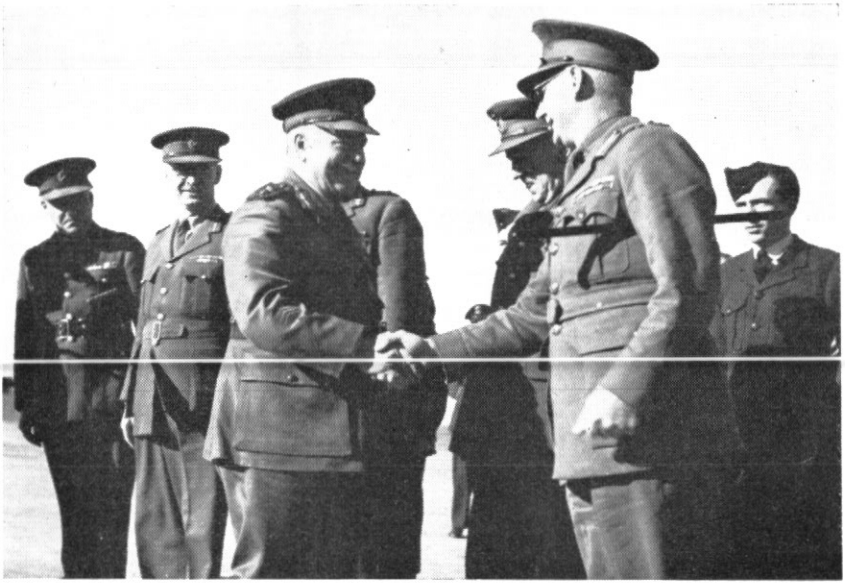
While the 1939-45 war service of Northcott is of first importance, his service — as well as the service of members of the army generally — during the years before September 1939 deserve special emphasis. In *To Benghazi*, the first volume of the Australian official history of the war, Gavin Long describes the situation existing in the army. The following extract provides a frame for Northcott's pre-war contribution:

> How had the army in particular fared after 1935 when, for the first time since the depression, its annual income was raised to approximately the sum that it had received in the 'twenties? At the beginning of this period of recuperation a relatively young officer, Colonel Lavarack, was promoted over the heads of a number of his colleagues and made Chief of the General Staff. The army whose rebuilding he had to control consisted of 1,800 'permanent' officers and other ranks, compared with 3,000 in 1914, and 27,000 militiamen compared with 42,000 in 1914. Its equipment had been supplemented hardly at all since the A.I.F. had brought it home from France and Palestine; and it was the equipment only of the seven divisions, but not equipment for the many supporting units that are needed for an army based on seven divisions — such units had been provided in the war of 1914-18 by the British Army. It lacked also mortars and anti-tank and anti-aircraft guns; it lacked tanks, armoured cars, and a variety of engineer and signal gear; it had inadequate reserves of ammunition. In recommending how the moderately-increased army vote be spent Lavarack's policy did not differ materially from that laid down fifteen years before by the Senior Officers' Conference of 1920; broadly it was: training of commanders and staff first, equipment next, and, lastly, the training (or semi-training, for that is all it could be) of more militiamen. The allotment of priorities was assisted by a plan under which three degrees of mobilization were contemplated. The first was designed to meet war with a distant enemy and would entail only the manning of coast defences and the calling-up of a few militia units. The second was to meet a situation in which raids were possible but full-dress invasion improbable, and would require the assembly of a field army of two divisions and seven independent brigades of cavalry and infantry. The third — full mobilization — would bring into the field the five infantry and two cavalry divisions, 200,000 men in all not allowing for reinforcements. To produce such a force would demand an exacting national effort. . . .

John Northcott was born on 24 March 1890 at Creswick, Victoria, and educated at Grenville College, Ballarat and Melbourne University. On 14 August 1908 he was commissioned as a 2nd-lieutenant in the 9th Light Horse and subsequently promoted in that regiment to lieutenant and captain. He joined the Administrative and Instructional Staff on 16 November 1912. After a period as Militia Adjutant of the 19th Light Horse and on General Instructional Duties in Tasmania, on 24 August 1914 he joined the A.I.F. and was appointed

Adjutant of the 12th Battalion. He was severely wounded in the left chest on the first day of the landing at Gallipoli, and after periods spent in hospital in Egypt and England was returned to Australia for discharge from the AIF.

From April 1917 until the end of the war he served as GSO3 on Headquarters 5th Military District (WA), and after other staff appointments in that State attended the Staff College at Camberley in 1924-25. He was Director of Supplies and Transport at Army Headquarters from 1926 to 1931 (in this period he was Chairman of the Commonwealth Transport Committee, 1926-28, and Commonwealth Staff Officer attached to the Duke and Duchess of York's staff during the Royal visit in 1927), then GSO 4th Division and later of the 3rd Division, and early in 1933 returned to England as an Exchange Officer (GSO 2) with the 44th (Home Counties) Division. My association with the then Major Northcott — in accordance with the pattern of those days he had been a major for thirteen years — commenced at this time; I was then (1933-36) the Army Representative on the staff of the High Commissioner in London.



Senior officers of the Australian Army greeting General Blamey at Essendon Airport on his return from the United States on 27 June 1944. From left: General Northcott, General H. D. Wynter (LGA), General Blamey, General J. H. Cannan (Quartermaster-General), and General Beavis (Master-General of the Ordnance).

(Australian War Memorial)

Northcott spent 1935 at the Imperial Defence College and after attending the Senior Officers' School and being attached for some four months to the Committee of Imperial Defence — an assignment of a Service officer which was not viewed kindly in some official civil circles — spent about ten months attached to Australian diplomatic missions in the United States and Canada before returning to Australia in June 1937.

I remember General Northcott recounting that one of the outside lecturers at the I.D.C., Sir Robert Vansittart (later Lord Vansittart), then civil head of the Foreign Office, spent fifty-five minutes speaking about European affairs and five minutes about the rest of the world. Northcott at question time asked why this ratio of eleven to one and Vansittart replied that this was roughly the ratio of time given to day-to-day problems in the Foreign Office; he agreed that the time weighed heavily in favour of Europe. Perhaps similar considerations, not unnaturally, today affect U.K. attitudes to South-East Asia and Vietnam and lead to some lack of understanding and sympathy in some of the problems of Commonwealth countries beyond the confines of Europe.

On return to Australia Northcott became GSO 1 4th Division in Victoria. I was serving with the division at the time and well remember being one of a 21A Board, of which he was President, for the examination for promotion of C.M.F. officers. We all had a happy time living for some days at the old Golf House at Healesville — at least the members of the Board did.

Northcott became Director of Military Operations and Intelligence on 1 September 1938, at the time of the Munich crisis, and held this appointment until 12 October 1939 (the date on which General Squires became C.G.S.), shortly after the outbreak of war. Subsequently he was Deputy C.G.S. until the end of 1941.

From Munich time until April 1940 I was in the Directorate of Staff Duties, succeeding General Sturdee as Director when he went to become G.O.C. of the newly formed Eastern (N.S.W.) Command on 12 October 1939, and thus had some opportunity of seeing the nature and extent of the wide and important General Staff responsibilities so ably carried out by Northcott in that period of expansion, with all its difficulties of organizing and training new formations, providing staffs, planning accommodation, obtaining weapons and all that went with them, and getting financial approval from a Treasury which did not always at that time readily open the coffers for projects approved as Government policy. Not the least of his responsibilities was that of giving advice in the formulation of policy and the making of major decisions.

Major-General Squires, who was originally appointed as Inspector-General in June 1938, with Lieutenant-Colonel Rowell as his staff

officer, prepared a report on the development of the Army which was presented to Parliament in March 1939. His recommendation for a Command organization — as exists today — instead of all formations being directly under Army Headquarters, was not put into effect until October 1939, that is, after the outbreak of war. His proposal for two regular infantry brigades, at first approved in principle by the Ministry, was not implemented. In March 1939 the Government announced that a quota of 1,571 men would be authorised in the June 1939-June 1940 year, but the Prime Minister announced in April that this force, estimated to cost £1,875,000 in the first year, would not be raised; the Military Board was instructed to prepare an alternative plan for increased militia training, and on 23 August the Government announced that a special force of 14,000 militiamen would be enlisted for a longer term (thirty-two days) of annual training in camps and that other militia camp training would be increased from twelve to sixteen days. That day, 23 August, was the day the pact between Germany and Russia was signed, and German armies were lining up to attack Poland.

I remember reporting to General Squires (then C.G.S.) at about 9 a.m. in his office one morning after he had returned from several days at Canberra. He greeted me with his kindly and on this occasion somewhat quizzical smile and said 'Your politicians are devils', and immediately asked me the nature of my business. So I did not learn whether his comment referred to policy discussions or the known circumstance that he had been kept cooling his heels for a day (or more) after being called to Canberra. We know from Bryant's book on Alanbrooke's diaries and from other accounts that Churchill could be 'a devil', so if Squires as C.G.S. and Northcott as D.C.G.S. had difficulties in the political sphere that was not unique.

This is how Gavin Long in *To Benghazi* sums up the situation at the outbreak of war:

> There remains the larger question: What had the Australian Government done between the wars to increase its ability to carry out its military responsibilities? In that period Australia had become a fully-independent nation, an enhancement of status in which she took some pride. She had greatly enlarged her colonial territory and had established her own diplomatic department. Her population had increased by nearly two millions and her industrial equipment had been vastly elaborated. There had been a corresponding increase in her responsibilities as a member of the British Commonwealth; and the military leaders of the senior member of the Commonwealth had declared that in a major war the immediate help of trained, equipped forces from the Dominions would be needed. Yet in 1939 the now-adult nation possessed an army little different in essentials from that of the young Australia of 1914. It was fundamentally a defensive force, intended if war broke out to go to its stations or man the coastal forts and await the arrival of an invader. History had proved and was to prove again the futility of such a military policy. The measures that had been taken in the few years of 're-armament' were insignificant in the face of the threat offered by two aggressive Powers, one of which desired to master Europe, the other East Asia.

While D.C.G.S. Northcott attended the Dominions Conference in London as Australian Military Adviser in the period from October to 24 December 1939 during which he visited the B.E.F. and the Maginot Line in the 'Phoney War' interval. It was his information that there was no general reserve force behind the French and British Armies — at a time when the Germans were transferring their forces to the west after the defeat of Poland — that impelled me to spend New Year's Day 1940 writing a paper (doubtfully within the scope of my duties) the gist of which was that in the early spring of April the Germans would launch an offensive which, in the absence of a general reserve behind the allied line, was likely to capture the Channel ports, that this would produce last-minute decisions to raise extra forces without preparations having been made for accommodation, equipment and suchlike, and recommending that an early decision be made to proceed with the preparations for the raising of Corps headquarters, Corps troops and the 7th Division. With the approval of General Northcott as DCGS I presented this paper and discussed it with the C.G.S., General Squires. With the addition of an air co-operation squadron and a modified reference to the possible capture of the Channel ports, Squires submitted it to War Cabinet, and after discussions of strengths and establishments, the War Cabinet decided on 28 February to form the new division and the necessary corps troops.

During his appointment as D.C.G.S., and at the time of General Squires' illness, Northcott acted as C.G.S. from 27 January to 17 March 1940 (when Sir Brudenell White took up the appointment), that is, during the hectic days of the raising of the 7th Division and Corps troops.

Northcott joined the A.I.F. on 1 September 1941 and commanded the 1st Armoured Division from then until 5 April 1942. The raising and training of this division is a story in itself — one for someone better informed than myself as at the time I was in the Middle East. Northcott visited that theatre from October to December 1941, during which period he was attached to the 7th (British) Armoured Division and Headquarters I Australian Corps.

In the reorganization of forces in April 1942 after the return of General Blamey and the A.I.F. from the Middle East, consequent on the fall of Singapore and the advance of the Japanese, Northcott was appointed G.O.C. II Australian Corps, but only until 9 September when he succeeded General Sturdee, who became Head of the Australian Mission in Washington, as Chief of Staff to General Blamey, G.O.C. Allied Land Forces, and also as Chief of the Australian Section of the Imperial General Staff. From this crucial period until the end of the war Northcott as C.G.S. was the right-hand man of General Blamey in the control and administration of the Australian Military Forces — apart from certain operational functions carried out by the

Chief of Staff at Advanced Land Force Headquarters in the forward area. It was as C.G.S. that as Master-General of the Ordnance I had close and continued association with General Northcott throughout the remainder of the war. I remember with gratitude his understanding, assistance and co-operation (an attitude that was not special to me but displayed to all with whom he came into contact) in carrying out the responsibilities of my branch of the Staff for obtaining and then supplying the fighting troops with the armament, equipment and

(Australian War Memorial)

The author, General Northcott and General Cannan.

material of all kinds that they needed. The significance of this may be gauged from the fact that in the year 1942-43 the expenditure on arms and equipment was £125,000,000, then about equal to one-third of the Federal revenue, and over £80,000,000 the following year. The Business Adviser and the Business Board examined orders for civil pattern stores, but the periodic schedules for warlike stores went to the War Cabinet for approval, and Northcott was there to state the case and give the answers. But material requirements, including Lease Lend with the United States, were only a facet of the responsibilities of Northcott. Acting for General Blamey or under his direction they covered all major matters of policy relating to personnel, e.g. manpower, and the organization and functioning of the

Australian Military Forces, as well as policy in relation to British (e.g. Royal Navy in the Pacific) and Allied Forces. Northcott's wide experience, calm temperament and logical and forceful exposition made him an advocate for the army of exceptional ability.

General Blamey had complete confidence in Northcott's wisdom, tact and loyalty and relied on him increasingly to present the army's problems and proposals to the War Cabinet, and to maintain a friendly liaison with the rear echelons of G.H.Q. He was constantly in touch with the Minister for the Army while General Blamey was in forward areas. It was Northcott who had to cope with the War Cabinet's decision in May 1945 that 'all members of the Army and Air Force with operational service overseas and who have over five years' war service are to be given the option of taking their discharge'. Blamey suggested that this drastic decision, which could have deprived the army, including formations then in action, of a great number of its key men, should be modified by restricting the discharges to men who had enlisted in 1939 and adding the proviso 'when the present operations permit'. Senator Fraser, the acting Minister, instructed Northcott that his view was that 'full, immediate effect' should be given to the decision and that no troops affected by it should thenceforth leave Australia. Northcott explained the impracticability of the decision and declined to carry it out. The Minister insisted. Northcott stood firm. On 18 June he stated his case before War Cabinet, which found a compromise solution.

I am uncertain of the details, but I remember it being said — I think by one of our Prime Ministers — that it was too good to be true that General Northcott, when Chief of the General Staff on General Blamey's Allied Land Force Headquarters, was always right in the submissions made and views he expressed at War Cabinet discussions. No doubt he was not always right, but this comment speaks volumes for Northcott's contribution in the discussions of the War Cabinet affecting the efficiency and welfare of the Army, the direction of the war effort and well-being of our country.

On domestic army matters the Commander-in-Chief relied on his recommendations regarding contentious issues, either as an individual or as the chairman of a specially appointed committee. He had his problems, of course, one being that the C-in-C was at times too ready to permit direct access of old friends who, in the organizational set-up, should normally have dealt with the C.G.S.

The war having ended, the Military Board was re-established on 12 October 1945 and on 1 December Northcott was appointed Commander-in-Chief of the British Commonwealth Occupation Forces in Japan, an appointment that was not only recognition of Australia's contribution to the war effort, but also a tribute to General Northcott. He held this appointment until June 1946 when, as already recounted,

he became Governor of New South Wales. His success in this appointment is common knowledge, and although Lady Northcott, through ill health, was not able to continue the full support she had given to him over the years, his daughters ably stepped into the breach. His family life was particularly happy, as was to be expected from his personal qualities, character and interests.

Whilst Governor he liked to see his old army friends. If, early after arrival in Sydney on a visit, I did not get in touch with his Military Secretary, I found at Victoria Barracks a message waiting for me. His 'Intelligence' organization apparently was very good. And it will be seen that this tribute to General Northcott must inevitably bring in personal references and be a pale substitute for a wider biographical account incorporating material from many and varied sources.

On retirement he continued his interests in many fields until the end. One which gave great pleasure to many who served with and under him was the Presidency of the Regular Defence Forces Welfare Association, a nation-wide organization to watch the welfare of all ranks retired from the Navy, Army and Air Force, whose representations have received sympathetic consideration in political and departmental circles in Canberra.

General Northcott was an Honorary Air Commodore of the RAAF, Hon. D. Litt. of Sydney and New England Universities, and Hon. D. Sc. University of New South Wales.

I well remember a lecture given by a prominent Japanese, in 1934 or 1935, at the Institute of International Affairs in London, which he ended by saying, somewhat dramatically, 'The British sun has set, the American sun is at its noon-day height, the Japanese sun is rising.' If the leaders of another Asian country have the same thought — with their own country substituted for Japan and with aggressive intentions — perhaps there will be an increasing need for many within our army to continue following in the steps of General Northcott, to assist in slowing down, or stopping, the rising of another sun. The example to follow is there. He was pre-eminent as a soldier, a good citizen and, in the true sense of the term, a gentleman. □

Aerial Minelaying

Major L. H. Shaw,
Royal Australian Engineers

SOME recent AMF training publications indicate that we are unlikely to conduct large-scale mining operations in South-East Asia. This prediction appears to be based more on our lack of suitable mining techniques rather than on any lack of requirement to conduct such operations. In view of the large areas of South-East Asia that are suited to the employment of armour, the ability of the Chinese to produce and employ armour and the great emphasis placed by the Chinese on the tactical mobility of their infantry, this policy should be reviewed and suitable mining techniques developed to meet the likely threat.

The aim of this paper is to examine the need for minefields, highlight the defects in our current equipment and techniques, examine the characteristics of an ideal mining system and to propose that the AMF investigate aerial mining techniques.

The Need for Minefields

Minefields may be employed for any one of a number of reasons:

- Protective minefields are laid to assist a unit with its local defence, to help prevent attacking enemy troops from breaking into its position.
- Defensive minefields are employed to prevent the enemy from penetrating between areas occupied by companies or battalions and to assist with the defence of those areas.
- Barrier minefields are laid to block enemy attack formations in selected areas, especially to the flanks, and to deflect him into selected battle areas.

A mixed minefield, containing both anti-tank and anti-personnel mines, may be used to delay or deflect a combined infantry and armoured force. A purely anti-tank minefield will allow infantry to pass through it while the supporting armour is held back; a strong anti-personnel minefield will hold back infantry but allow the armour to pass through. Minefields can therefore be used to separate the

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Major Shaw graduated from OCS Portsea in June 1953 and was allotted to the RAE. His appointments include Instructor HQ 6 Engr Gp (1957-59); Adjutant 3 Fd Engr Regt (1960-61); 21 Construction Squadron (1961-64) and SORE 3 D Engrs AHQ (964-65). His present appointment is OC 7 Fd Sqn in Northern Command.

This essay was written during Major Shaw's attendance at Staff College in 1966.

elements of an assaulting force and prevent them supporting one another, thus making them more easy to deal with.

Minefields may be used to strengthen or extend existing natural barriers or they may be employed on their own where no natural barrier exists. They have one decided advantage over natural barriers in that they may be sited to fit exactly into a tactical plan.

Any Allied force engaged in land operations in Asia against the Chinese Communist Army is likely to be at a serious disadvantage in terms of numbers. This disadvantage can be offset by superior fire power and greater power of manoeuvre. Our ability to out-manoeuvre the enemy can be increased by the utilization of barriers; therefore, minefields as artificial barriers, are likely to play an important part in such a war.

The intention of the Chinese Communist Army to employ armour is obvious if one examines what is known about their order of battle. Their ability to produce an effective tank became apparent when they readily made available quantities of their T59 to Pakistan to make good losses suffered in the war with India. In the past Chinese armoured operations have been restricted by an acute shortage of tanks; this influenced their tactical doctrine and made them reluctant to risk tank casualties. This reluctance to commit their tanks led some Western observers to think that the Chinese did not appreciate the value of armour, or how to employ it for best results. Today, with reasonable quantities of armour available, the Chinese have changed their tactics. Provided that the terrain is suitable we could well be faced with masses of tanks employed as a mobile striking force. To counter such a threat we would need a strong anti-tank capacity. A speedily emplaced minefield could play an important part in giving us this strong anti-tank capability.

One of the major factors governing the effectiveness of a minefield is the density of mines within the field. This is expressed in terms of the number of mines per yard of front. Experience has shown that a density of one and two-third mines per yard of front is required to immobilize 70 per cent of an assaulting armoured force and that two mines per yard of front will immobilize 90 per cent of an attacking force. An anti-personnel minefield composed of blast-type mines would require a density of 24 mines per yard of front to stop an attack by determined infantry.

A mixed minefield laid in accordance with current minelaying drills will produce a maximum anti-personnel to anti-tank density ratio of 3 to 1. This had led to the employment of mixed minefields with two anti-tank and one anti-personnel mines per yard of front. Theoretically a field of this nature should stop any combined armour and infantry force by immobilizing 90 per cent of the armour. The anti-personnel content, although insufficient to stop determined in-

fantry, does slow them down and makes the task of breaching the minefield slow and hazardous. This type of minefield though it should be ideal in fact has serious disadvantages.

The disadvantages of the present minelaying system are as follows:

- The laying of a minefield of any significant size requires too much trained manpower.
- The weight of stores required imposes a serious burden on our logistic system.
- Because of the time required to lay a minefield of any size the laying must start early. Siting is therefore based on incomplete information as to enemy intentions. It may well be that many of these mines are therefore laid in the wrong place and much of this early effort is wasted.
- Minelaying parties are extremely vulnerable and normally require the protection of a substantial infantry force.
- The movement of large numbers of men and vehicles in and around the minefield leaves many tell-tale tracks. Aerial reconnaissance by a trained observer will quickly pin-point the minfield and the pattern of mines within the field. Surprise is thus lost.
- Current Australian anti-tank mines have a small-explosive content and in order to immobilize a modern tank they would need to be laid in pairs, one on top of the other.

A well-trained engineer troop can lay only 750 anti-tank mines or 600 mixed clusters consisting of one anti-tank and three anti-personnel mines in a working day. An infantry platoon has about one half of this capability. Forces of up to company strength may be required to protect those engaged in laying the mines. This manpower is thus tied up at the critical time when all available labour is required to develop the main defensive position.

A mechanical minelayer was developed, which with a crew of 4 could lay 2,250 anti-tank mines per day. This machine was cumbersome, left definite tracks on the ground and could only operate on open and relatively flat ground. It must therefore be considered as quite unsuitable for use in most of South-East Asia. The AMF is therefore still dependent upon hand-laying methods.

The current Australian anti-tank mine weighs 12 pounds but contains only 8 pounds of explosive. The anti-personnel mine weighs 3 ounces but contains only 1 ounce of explosive. When packed for transport 470 anti-tank or 13,000 anti-personnel mines constitute a 2½-ton vehicle load. Minefield marking stores require one 2½-ton vehicle per 1,000 yards of minefield.

Let us consider the case of a conventional barrier minefield across a task force front. Such a field could be 5,000 yards long and have a density of two anti-tank and six anti-personnel mines per yard of front. Because the anti-tank mines would need to be doubled up the field would require 20,000 anti-tank and 30,000 anti-personnel mines. Together with perimeter marking equipment this field would require 50 2½-ton truck loads of stores. It could therefore only be sited in an area that was accessible to these vehicles. All of the stores required would have to be hauled forward from the Communications Zone and a variety of transport agencies would probably be used, i.e., trucks in the Communication Zone, air from the Communication Zone to the task force air head and trucks in the forward area. There would be much double-handling and trans-shipment of stores with the associated waste of effort. To lay the minfield would take a field squadron and an infantry company four days. Another infantry company would probably be required for the same period to protect the minelaying parties.

From these facts it can be seen that there are serious disadvantages in our minelaying techniques and a more efficient system is desirable.

The Ideal Minelaying System

The characteristics of the ideal minelaying system may be summarized as follows:

- It must produce an effective minefield on the ground in the minimum time and with the minimum requirement of manpower.
- The system must be efficient in terms of cost effectiveness.
- The system must not overburden the logistic resources of the force employing it.
- The commander must be able to site the minefield exactly where he wants it.
- Desirably, the mine employed should have a known period of armed life so that large areas of ground do not become permanently unusable or require extensive clearing operations.

An aerially emplaced minefield appears to offer the best solutions to the problem.

Aerial Minelaying

The Germans employed the 'Butterfly Bomb' during the 1939-45 War. This was an air-dropped anti-personnel fragmentation mine fitted with an anti-lift fuse. It consisted of a cylindrical metal canister containing high explosive and a built-in fuse. The mine was fitted with wings that folded around the canister but when dropped from aircraft these wings were forced open by air pressure and retarded the fall of the mine. The 'Butterfly Bomb' was dropped in large

numbers over England and proved to be a considerable nuisance to the British; because it could not be disarmed it had to be destroyed *in situ*. The US have improved on the original 'Butterfly Bomb' and, as the M83, a similar device is current in their list of war materiel.

In 1960, both UK and US military leaders realized the benefits of an aerially emplaced anti-tank minefield. Experiments were conducted using conventional anti-tank mines dropped from helicopters flying three or four feet above the ground. Details of these trials are available in the publication *The Military Engineer* of January-February and September-October 1959. Although this system proved to have some merit it was not entirely satisfactory. The major drawbacks were:

- The conventional anti-tank mine is not very effective when laid on the surface because its definite shape makes it easily seen, and hence avoided and cleared. When laid in this manner it cannot be fitted with its normal anti-lift device.
- The weight of the mine in relation to its performance lowered the efficiency of the system.
- The carriage of sensitive high explosive together with a detonator made the operation hazardous.
- Flying at low altitudes made the helicopter vulnerable to small arms fire and endangered by trees, hedges or power lines.

From these early experiments military leaders in both the United Kingdom and the United States began to appreciate the possibilities of an efficient aerial mining system. The major drawback at the time was the unsuitability of the current mines for dropping from the air. When dropped from 3,000 feet by aircraft flying at 300 mph the conventional mine either detonated, burst open, rolled too far out of position or buried itself feet deep in the ground. The first non-classified information on a new concept in aerial minelaying techniques was made available in a brief article in *The Military Engineer* in September 1964.

Present Aerial Minelaying Techniques

The mine that is primarily designed to be laid by high performance aircraft must be so constructed that it hits the ground without detonating, bursting or burying itself and then remains in the place where it fell. It must also be capable of immobilizing its target. The solution to this problem was simple but highly effective: eliminate the heavy metal case of the conventional anti-tank mine and replace it with a tough, flexible bag made of nylon and coated with a plastic membrane; replace the solid cast high-explosive filling with a soft plastic explosive; replace the sophisticated detonator and initiator with a simple crush type initiator but desensitize both initiator and plastic explosive with a highly volatile desensitizing agent. When

dropped from a fast, high-flying aircraft this mine behaves like a bag of putty, it hits the ground and stays where it falls. It may partially bury itself in very soft ground. As soon as the desensitizing agent evaporates the mine is armed. The color of the plastic bag can be selected to blend in with the ground onto which it is to be dropped. This, together with the lack of any definite shape makes the mine difficult to detect by infantry and almost invisible to the crew of a moving AFV. Of the total weight of 20 pounds 99 per cent is high explosive and this is quite capable of immobilizing any known tank.

The mines can be suspended in racks below a helicopter or along the interior of a Hercules or Caribou aircraft. The racks are designed so that once dropping starts the mines are automatically released at the rate of 65 per minute. Experiments have shown that the ground pattern is predictable enough to allow a minefield of given shape and density to be positioned by day or night.

The associated anti-personnel mine weighs only 4 ounces and is similar in construction and operation to the anti-tank mine. The mines are stored in pods, hermetically sealed and in an atmosphere saturated with the vapour of the desensitizing agent; this prevents the desensitizer from evaporating until the mine is released from the pod. These mines are released in a shower and rely on speed and air resistance for dispersion. Again experiments have proved that dispersion is sufficient to achieve the desired ground pattern. This mine is capable of blowing a man's leg off or bursting the tyre of a wheeled vehicle.

The minefield previously described which would take a field squadron and an infantry company four days to lay manually could be laid by three Hercules aircraft, operating from an airfield 100 miles to the rear, in seven hours. No engineer effort would be required in the task force area and no infantry protection would be necessary. No ground transport would be used in the forward area and there would therefore be no tell-tale marks on the ground to identify the area as a minefield. Using only these three aircraft and their loading teams from the Communication Zone the whole minefield could be in position and operational within nine hours of the commander's decision to lay it.

Marking and Recording Techniques

The marking and recording of an aerially emplaced minefield is not quite so accurate as that of the hand-laid minefield where each mine row is fixed by means of distance and bearing from a landmark and a fence is constructed around the field. Among current suggestions for marking the aerially emplaced minefield the most practicable is to lay a rear boundary fence just before dropping commences and then lay well forward of this fence. It is still quite probable that some mines would fall behind this rear fence.

Recording presents an even more difficult problem. Present thought is to drop a visible foam with the mines and photograph the foam pattern on the ground. The foam then evaporates and disappears but the photograph together with a knowledge of the total number of mines dropped will form a record of sorts. Current research aims at producing a mine whose position need not be recorded. This aspect will be discussed later.

Advantages of the Aerial Mining System

Despite the difficulties associated with marking and recording, the advantages of the aerial mining system should now be apparent. The most critical reader should be convinced of the benefits of such a system after detailed consideration of the following aspects:

- Manpower saving.
- Time saved.
- Tactical cost effectiveness.
- Logistic advantages.

The manpower required to lay a minefield from the air consists entirely of aircrew and loading teams. All of these come from units in rear areas out of contact with the enemy. This leaves all of the engineer and infantry work force of the forward units free for digging, wiring and the construction of other defensive works. This is in complete contrast to the present system which generally requires a high proportion of the available work force to be engaged in mine-laying when they are most needed for other tasks..

The aerially emplaced minefield could be in position in the time it takes to load the mines in bulk into the aircraft, fly to the dropping zone and release the mines. The pilots can be briefed while the aircraft are being loaded and the mines can be unpacked and hooked into the dropping racks while the aircraft are flying out to the dropping zone. Alternatively, once it is known that a minefield will be required the aircraft can be loaded and placed on ground alert. The first mines could be in position within an hour of deciding on the exact site for the minefield. Although there is a definite upper limit to the number of troops that can be effectively employed on the one minefield this is not so in the case of aircraft. Provided that aircraft are available they could follow one another over the dropping zone in a continuous stream. The minefield requiring a field squadron and an infantry company for four days could be laid by fifteen Hercules aircraft in two hours.

The tactical advantages of the aerial emplacement system are derived from a combination of the following factors: speed of laying, better concealment from aerial reconnaissance, complete freedom in siting the minefield and greater density, hence greater killing power. Because of the short time in which the field can be laid it could be

emplaced in the time between which enemy patrols report the area to be clear and the time that the enemy starts to move across it. An enemy could thus find that he has committed himself to attack across a dense minefield with the probability of incurring 90 per cent casualties before he breaks through it. Greater density is possible because of the speed and ease of laying. Where the present minelaying drill produces a minefield with a density of two anti-tank mines and six anti-personnel mines per yard of front an aerially emplaced field could contain three anti-tank and 24 anti-personnel mines per yard of front, and thus have a killing probability of 95 per cent and 90 per cent respectively. Although it might be argued that the increased lethality is not great in view of the large increase in mines laid it does in fact represent a good investment. From the ground commander's point of view the increased lethality against infantry represents good value, while the immobilization of even one additional enemy tank could well offset the increased cost from an economic point of view.

The commander requiring a minefield has complete freedom of choice as to which ground he will mine. Aircraft, unlike mine-carrying vehicles, are not tied to any road system; as a result otherwise inaccessible areas can be mined from the air. Mining operations can even be conducted deep inside enemy territory. This is a new concept in the use of mines and such operations could be conducted to close enemy supply routes or prevent the movement of reserves from rear areas to the battlefield. Operations of this nature could well prove effective in blocking the Ho Chi Minh trail.

An aerially emplaced minefield also is more efficient than a similar hand-laid minefield from the cost-effectiveness aspect. Because the aerially emplaced mines do not have expensive metal cases or sophisticated fuses they are cheaper to produce than conventional mines. Because of the speed with which an aerial minefield can be emplaced the commander can withhold the order to lay it until he is more certain of the enemy's intentions. He then gets all of his mines in the place where they will be most effective. This again is in complete contrast to the existing situation where many thousands of man hours are expended in burying expensive mines in the wrong place.

There are definite logistic advantages: because all movement between the Communication Zone and the final laying site is by air there is no movement along roads with consequent risk of losses by guerilla action. In contrast with current equipment, where every five mines require 10 pounds of packaging, the aerially emplaced mines require no packaging forward of the rear airfield. Because the aerially emplaced mines are merely bags of plastic explosive they can be economically employed as such. The anti-tank mine, a 20-pound bag of plastic explosive, would make a very efficient cratering or demolition charge.

Experiments have also shown that the mine designed for aerial emplacement is quite effective when used as a buried mine provided that the desensitizer is allowed to evaporate before it is covered. There would therefore be no need to continue production of two types of mine if the aerial emplacement system is adopted.

Present Research and Development

Although the system appears to be near perfect at its present stage of development there is still room for improvement. Two aspects that are of particular concern to military planners are as follows:

- Because of the ease with which mines can be employed there is a danger that large areas of ground could be rendered permanently unusable.
- Large numbers of these surface-laid mines could easily be recovered by the enemy and used by him, either as mines or as explosive charges.

Self Sterilizing Mines. Self-sterilizing mines are mines with a pre-determined period of armed life. At some pre-determined time after laying the explosive content of the mine decomposes and the mine becomes inert. The use of mines of this type will prevent large areas of ground becoming permanently useless. The technology of producing mines of this nature has proved an easier task than that of getting military leaders to agree on the required period of armed life. The use of a very short life mine of say 10-12 hours for the close protection of overnight bivouacs has been generally agreed to. The problems occur in the life required by defensive and barrier type minefields. Because of the longer life required these are the mines that are likely to be recovered by the enemy and re-used. Mines for use in this role should have an armed life of between seven days and nine months. Ideally, each mine should be such that its life can be selected immediately before laying, which will obviate the necessity of producing mines of differing life.

Anti-Handling Devices. It is clear that there is a requirement to prevent the enemy from removing and re-using longer life mines. This could be accomplished by laying every minefield with so high a density of anti-personnel mines as to prevent movement of troops in the area. This would prove expensive where the basic role of the minefield is an anti-tank one. The answer appears to lie in the incorporation of an anti-handling device in each anti-tank mine. Current types of anti-handling devices designed to operate in conjunction with hand-laid mines would be quite unsuitable. An inbuilt device similar to that used by the Germans in the 'Butterfly Bomb' previously described, is probably the answer. For best results this would require that the mine hits the ground at a certain attitude.

The addition of a small fabric 'streamer' to each mine would ensure this, and if suitably constructed could assist in camouflaging the mine.

Desensitizing Agents. The rate of evaporation of the desensitizing agent is dependent upon local atmospheric conditions. Variations of these will cause irregularities in the time between laying and activation. There is therefore a requirement for a desensitizing agent whose rate of evaporation is constant within the range of atmospheric conditions likely to be encountered.

Marking and Recording. The problems of marking and recording are not properly resolved. Although investigations are being made, many engineers are of the opinion that the best solution lies in the introduction of the self-sterilizing mine. This will reduce the data to be recorded to a knowledge of the general area of the minefield, the number and type of mines employed and the time that the life of the minefield will expire.

Concealment. Because the mine is not buried it relies on its lack of definite shape and compatible colour and texture to escape detection. Investigations are being conducted to determine the most suitable combinations of colour and texture for use in the likely theatres of operations.

Conclusion

The need for an effective and economic mining system has been established and the shortcomings of the existing methods and equipment have been made apparent. The requirements of an ideal mining system have been stated and an examination of an aerial minelaying system shows that it goes a long way towards meeting these stated requirements. Progress in current developmental projects indicates that most of the present drawbacks of the aerial mining system will soon be eliminated. The introduction of an air-droppable, self-sterilizing mine fitted with an anti-handling device will offer even greater benefits.

Australia should play a more active part in the development of an aerial mining system for use by the AMF. The tactical implications of such a system should be investigated during major exercises and TEWTs by writing into the exercise the ability to employ such a system. The requirements for the period or periods of armed life of a self-sterilizing mine should be investigated during TEWTs or war games. The technical problems of the production of suitable mines and dispensing techniques should be studied by one of our research establishments, or one of the systems developed by the United Kingdom or United States should be adopted and, if necessary, modified to suit the requirements of the AMF. □

With a Medium Troop in Sabah

Major C. P. Masters,
Royal Artillery

'The medium Regiment has low mobility compared to that of a Field Regiment'.
— *The Division in Battle,* Pamphlet 1.

WITH the introduction of the Tropical Warfare Division and the Air Mobile Concept, the deployment of artillery to hitherto inaccessible areas has become commonplace. However, the move of a medium troop to Sabah in 1964 must rank as one of the more unusual deployments of recent years.

In July 1964 170 (Imjin) Medium Battery RA was located at Seremban, Malaya. Since arriving in the Far East eleven months before the battery had spent four months and a half in Sarawak, armed firstly with 4.2-inch mortars, and later in an infantry role. A 5.5-inch medium troop had just returned after two and a half months in Aden where it had taken part in the Radfan operations.

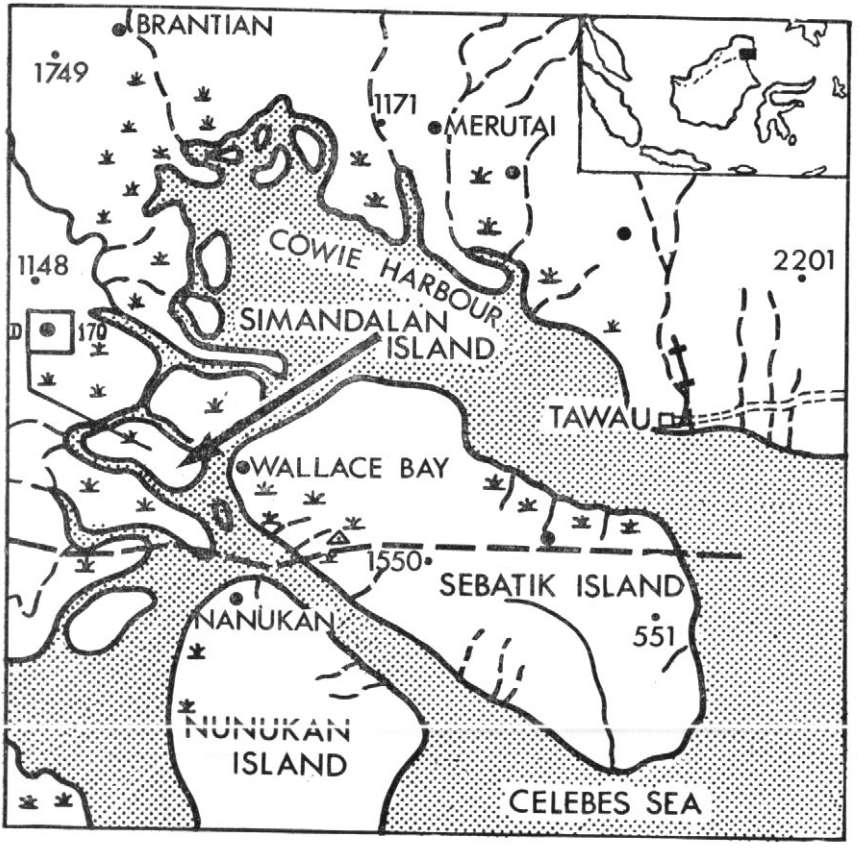
At the end of July a signal was received from HQ FARELF warning the battery commander to be prepared to send a troop of two 5.5-inch guns to the East Brigade of Borneo. Headquarters of East Brigade was at Tawau on the east coast of Borneo, close to the Indonesian border. At this time East Brigade consisted of the 5th Malaysian Infantry Brigade, and various administrative units.

Earlier in the year the battery commander had carried out a reconnaissance in the Tawau area in case guns should have to be deployed on Sebatik Island at short notice. As can be seen from the map Sebatik lies about five miles south of Tawau and is divided into two parts by the international border.

The importance of Sebatik lies in the logging centre of Wallace Bay which also housed battalion headquarters and one company of a Malaysian battalion. Operationally the area had been very quiet for some months, but guns based in Indonesian Sebatik, the island of Nunukan, and on amphibious troop carriers, occasionally fired at marine patrols in assault boats on the Malaysian side of the border. Heavy guns had also been identified in Nunukan town.

A request had been made for 5.5-inch guns — the only guns with sufficient range — to be sited on Sebatik for retributive fire should it be necessary. The battery commander had reconnoitred a gun area at Wallace Bay but further planning had been shelved.

That then was the setting. Back in Seremban the battery commander held an 'O' group and explained the reasons for the move. Intelligence sources in Tawau had received reports that an Indonesian attack on Wallace Bay was planned for mid-August. The guns were required to be in position beforehand.

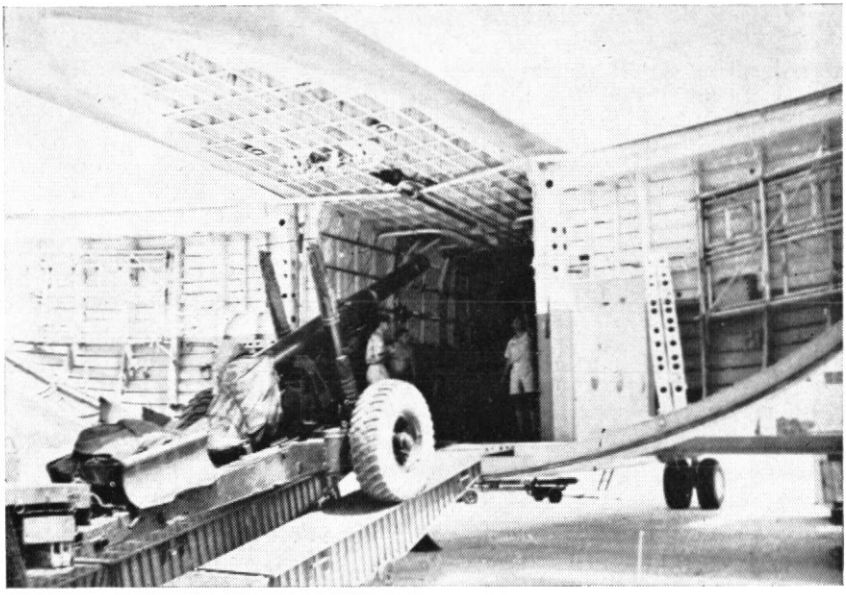


While 'D' Troop of the battery prepared to move, the battery commander flew to Tawau for an up-to-date reconnaissance. The troop GPO was in Korea commanding the United Nations Honour Guard but Lieutenant Keith Hall, RAA, was 'borrowed' from 102 Battery RAA as a temporary replacement.

It was at first planned to move the guns to Tawau by sea; due, however, to the shortage of LSTs no sea move could be mounted for at least a week, and the move would take ten days. This would be too late. RAF movements had no records of 5.5s being moved by air

before, and loading and lashing diagrams were not available. Nevertheless an air move was the only possible course in the time available and this course was adopted.

After a great deal of weighing and experimentation the troop, with two guns and most of its vehicles and equipment, was fitted into two Beverleys. The 10-ton Leyland gun tractors were not airportable and would have to be sent by sea with other heavy stores. The troop would have to rely on what transport could be found in Tawau to move the guns on arrival. Ammunition was flown in separately.



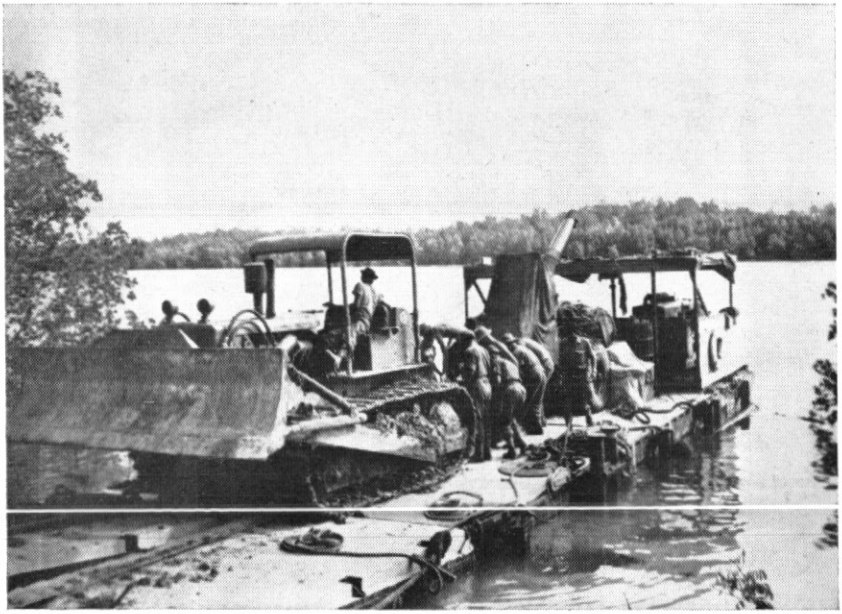
Loading a 5.5-inch gun into a Beverley aircraft.

The battery commander returned from Tawau in time to brief the troop commander before the troop's departure. He painted a rather gloomy picture: the task for the guns was as before but East Brigade were no longer willing to have the guns at Wallace Bay. It was feared that their presence might invite bombardment from Nunukan, with consequent civilian casualties. The battery commander was told to find a new area.

This was easier said than done as the only other island within range were interlaced with waterways and surrounded by mangrove swamp. The gun position had to be near a deep-water approach and have a hard shelving beach to enable the guns to be landed. After

two days helicopter reconnaissance a possible site was found on Simandalan island; the main snag was that it was covered in jungle. However, East Brigade approved the area and the sappers started to clear the jungle.

Despite misgivings by the passengers the flight to Tawau passed without incident and the troop found nearly all East Brigade HQ, and half the garrison, waiting for them at the airstrip. As the move was at that time classified as 'Secret' the guns were covered with a large canopy as they were unloaded. The only available gun tower was a huge sapper Michigan bulldozer and this, with the heavily shrouded guns, gave the impression that nothing less than an Inter-Continental Ballistic Missile had arrived.



Unloading from the Unifloat at Simandalan Island.

The plan was to move the guns to Simandalan Island, one at a time, on a flat pontoon or 'Unifloat'. It was then discovered that there was no crane in Tawau capable of lowering the guns the twenty feet from the jetty on to the Unifloat. This problem was finally resolved by moving each gun alongside the weekly Straits Steamer, where it was picked up by the steamer's derricks, swung across the ship, and lowered onto the Unifloat which was moored on the other side. This operation was made considerably more difficult as, for security

reasons, it was carried out in darkness after the nightly curfew had been imposed.

The weather was good and the open sea voyage to Simandalan was completed in under three hours. A bulldozer had previously been moved to the island to help with jungle clearance and this pulled each gun up the beach without difficulty.

The gun site, as the troop found it, was in an appalling state. The sappers had done a magnificent job clearing the jungle, but the bulldozer had churned up the ground and torrential tropical rain had turned it into a quagmire. Pumps running continuously failed to reduce the surface water.

Gun position at Simandalan.

When the bulldozer tried to move the first gun across the gun position it bogged down. A tractor trying to winch out the bulldozer bogged as well. It took two days to move the guns 75 yards to their platforms and the task was only managed after wooden tracking or 'corduroy' had been laid.

Once in position the guns started to sink into the mud. Even after log platforms had been built under their wheels the guns continued to sink until they rested on their axles in the mud. There was some speculation as to what would happen when they fired! Would they disappear altogether? Deployment orders had laid down a 360° field of fire but this was quite impossible as it took several hours to

move the gun once its top traverse was expended. In the end the two guns were laid in different arcs covering the two most likely target areas.

In the meantime the OP party had deployed with the forward company of the Malaysian battalion on Sebatik island seven miles away. Registration was carried out using an air OP but the expected attack did not materialize and the OP party was withdrawn to Tawau on 18 August. This move, made in an assault boat in gale force winds, was one that nobody in the OP party has any wish to repeat.

The troop commander returned to Malaya for three weeks on 19 August and once again 102 Battery RAA came to the rescue in the form of Captain Don Quinn who took over temporarily after a tour in Sarawak with 70 Battery RA. 'D' Troop now had an Australian troop commander and GPO.

As has been mentioned marine patrols had been fired on by Indonesian amphibians or 'alligators' operating from Nunukan. It was decided that the next time this happened 'D' troop would become 'Coast' artillery and engage them if they crossed the sea border. (Opinions as to its exact location varied.)

Observation was a problem but the OP party was deployed on a police launch, *PC 3,* which was permanently moored out at sea in Malaysian territorial waters. Thence Nunukan was observed through large binoculars. A tour on *PC 3* was fraught with a certain amount of danger as its main armament was an LMG and in the event of real trouble all the crew could do was slip the moorings and run for safety, at the same time radioing for help from the gunboat moored round the next headland. The OP party spent a month 'at sea' on *PC 3* without the troop once firing in anger though on one occasion *PC 3* was mortared and machine-gunned from the shore.

At the end of August the BRA FARELF visited the troop and, as a result of representations he subsequently made to the Director of Operations, the troop was withdrawn and redeployed to West Brigade in Sarawak. Medium guns had been misemployed in Tawau from the start. The real need was for more naval and air support, but this was not available.

This short account has not been able to bring out the myriad difficulties and problems which faced the troop at every stage. No mention had been made of the major problems of language and stores accounting between allied forces and the incompatibility of the radio sets in use. Finally the task of getting the guns off the island again proved even more difficult than getting them on had been and nearly ended with a gun and bulldozer being submerged by the rising tide. However, although the Tawau operation was not a resounding success, 'D' Troop enjoyed themselves thoroughly and gained a great deal of experience in a most unusual, if not unique, role. □

The Validity of the Domino Theory

Wing Commander K. Tongue,
Royal Australian Air Force

Introduction

STAND a set of dominoes on end in column, each separated from its neighbour by half its own length. Knock the first over and, one by one, the whole row falls. An assertion has been made in the United States of America that an analogous situation exists in South-East Asia, the contention being that, should one country fall to communist pressures, the remainder would follow as in the case of the dominoes. International publicity has led to the analogy being called the 'domino theory'.

Communist insurrection in South Vietnam today is aimed at converting that country into a communist state. In the context of the domino theory, an attempt is being made to topple the first domino in the line. The implications of the communists' actions were recognized in the communique issued by the SEATO Council after its last meeting in Canberra in June 1966: 'The Council reaffirmed its conclusion at Manila in 1964 and at London in 1965 that the defeat of the communist campaign is essential not only to the security of the Republic of Vietnam but to that of South-East Asia.'

While the need to defeat communist insurrection in South Vietnam is not denied, the inevitability of communist domination of the whole of South-East Asia, should South Vietnam become a communist state, is worthy of examination. The purpose of this essay is to examine the validity of the domino theory, bearing in mind its connotation of inevitability.

National Attitudes in South-East Asia

A domino standing on its end is inherently unstable and, therefore, only minimum force need be applied to topple it. Comparison of the countries of South-East Asia with dominoes implies that each country is similarly unstable. Therefore, an examination of the stability of the countries involved should indicate their potential to

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Wing Commander Tongue enlisted in the RAAF in 1943 and trained as a navigator/bomb-aimer in Australia and Canada. He has held a number of important navigation appointments, including navigator in the Aircraft Research and Development Trials Flight, Woomera; instructor at the RAAF School of Air Navigation; exchange duties with the RAF as a navigator; Squadron navigation officer, No. 2 Squadron, Amberley; and a staff officer, Department of Air. He wrote this essay during his attendance at the RAAF Staff College in 1966.

withstand the toppling force being applied by communism. Prevailing national attitudes are a major factor in the structure of stability in the various nations.

Of all the countries of South-East Asia, only Thailand has not been the colony of a Western power. The remainder have gained their independence during the last 20 years and some as recently as 1957. Malaysia, Singapore, Burma and the Philippines began their independent nationhood with the advantages that their colonizers had educated them somewhat in democratic processes. The French in Indo-China and the Dutch in Indonesia made little attempt to prepare their colonies for self-rule.

The period of the Japanese occupation of South-East Asia, however distasteful to the occupied peoples at the time, demonstrated to those peoples that their previous European overlords could be driven out. The lesson was not unheeded. After the defeat of the Japanese in 1945, the returning colonists were greeted by changed attitudes. Nationalism had been engendered in meeting the needs of personal survival. One political group hiding behind the facade of nationalism in each country was the Communist party — Pathet Lao, Viet Minh, Partai Kommunis Indonesia, Malayan Communist Party, Hukbalahap.

Nationalism in each country has had a common goal: the end of foreign domination and, in its place, development of the national economy for the welfare of the population, with the State itself as the main means to the end. Territorial integrity and national identity are ardently cherished.

The *sine qua non* of success of the nationalist policies so fervently expressed in the newly independent states is national unity. However, the nature of society in South-East Asia has militated against national unity in many of the countries. Cambodia and the Philippines, on the other hand, have attained a highly developed sense of national unity. Although the new Federation of Malaysia is facing problems in this regard, observers are reasonably confident that the unity evident in the parent state will evolve in the new Federation. The situation in Indonesia is still obscure but the majority of the population exhibit a sense of national unity.

Unfortunately, Laos remains an agglomerate of feudal societies, the rural population being mostly unaware of the world outside their villages. The central government is unknown to many and exists, in its present form, as a result of international diplomatic pressure (communist and non-communist). Such conditions are ideal for communist infiltration tactics and, therefore, Laos is particularly exposed to communist domination despite the efforts of the West to promote the country's unity and welfare. Burma, too, suffers from national disunity with minority ethnic groups expressing their dissidence in insurgency. While Thailand jealously guards her long-

standing independence, national unity is subjected to pressures by a significant part of the population living near the Laotian border. Those people have an ethnic affinity with the Lao and, therefore, constitute a chink in Thailand's armour.

As India's influence throughout South-East Asia has been considerable, her adoption of a neutralist policy while promoting her nationalism has led other countries in the area to follow her example. Laos, Cambodia, Burma, Malaysia and Singapore express their neutralism in varying degrees. Cambodia currently favours China more than she does the West. Her Head of State, Prince Sihanouk, has stated openly[1] that 'the survival of my small country and its 6,000,000 people and particularly its territorial integrity can be insured only if Cambodia were linked, as a satellite, with the USSR or the People's Republic of China ... We could be an Albania or a Hungary, but at least our name and our flag would continue to exist, together with our national identity.' Nevertheless, Sihanouk has also stated that personally he prefers no further relations with the United States of America, although as Head of State of Cambodia he feels obliged to proclaim that the Khmers will always consider the Americans as friends[2]. Thus, Cambodia vacillates, being prepared to favour the major power most likely to guarantee her territorial integrity and national identity.

Burma, too, tends to favour China more than she does the West. She readily accepts Communist Chinese economic aid but has refused aid from the USA, although she does accept some aid under the Colombo Plan. Her fear of China led her into a 'Friendship and Non-aggression Pact' with China in 1960, under the terms of which the Sino-Burmese border was delineated and guaranteed by both parties. Today, Communist Chinese troops hunt remnants of the Kuomintang forces in the far north-east of Burma.

On the other hand, Thailand and the Philippines have openly stated their alignment with the West through their membership with SEATO. Indonesia's nationalism has led her to aggression in the past, on the pretext of assimilating neighbouring states she contends are rightfully hers. Until her internal political situation is resolved, Indonesia's foreign policy must remain a little obscure. However, there are indications that she will reject alignment with either the communist bloc or the West and will adopt a neutralist attitude with strongly nationalistic overtones.

External Stabilizing Influences

SEATO has been criticized by its own members and by outsiders, but its existence continues to be a stabilizing influence in South-East

[1] 'Cambodia looks to China' (*The World Today*, Vol 20, No. 1, Jan 1964, p. 31).
[2] J. P. Armstrong, *Sinhanouk Speaks*, New York, 1964, p. 145.

Asia. It remains the formal expression of the willingness of the major Western nations to help defend the territorial integrity and national identity so eagerly sought throughout the area. The attitude of Thailand towards SEATO is of major importance to the continued effectiveness of the organization and, therefore, when Thailand questioned that effectiveness after the Laotian crisis of 1961, she was hastily reassured by the considerable reinforcement of the forces of Western nations already on her soil. Today, Thailand is an active member of SEATO but the strength of her commitment is influenced largely by the demonstrated intentions of the USA to uphold the treaty. The withdrawal of the USA's active support could have far-reaching effects on Thailand's foreign policy.

The commitment of SEATO to defend Laos as a protocol state of the treaty lapsed as a result of the agreements reached in Geneva in 1962 when Laotian neutrality was recognized. Cambodia has rejected her right as a protocol state to request SEATO assistance. On the other hand, observers are confident that any Communist Chinese aggression against Burma would prompt that country to seek SEATO assistance although she has no explicit rights under the treaty. Similarly, although her desire for friendly relations with India causes her to remain outside SEATO, Malaysia is fully cognisant of the protection afforded her by the existence of the organization and tacitly supports its existence. As the new regime in Indonesia is fearful of Communist Chinese expansion, we may expect that country, although unlikely to become a member, to accept SEATO as a bulwark against the Chinese threat. The Philippines is an active member of SEATO.

Japan's significance in promoting stability in South-East Asia should not be overlooked. Industrially she ranks fifth in the world and her economic standing lends power to her voice throughout South-East Asia, and indeed the world. Her delegation played a leading role in shaping the Asian and Pacific Council (ASPAC) in June 1966. Indications are that she sees herself as a bridge between East and West, a potential peace-maker in Asia. Japan's strength vis-à-vis that of China is likely to draw the weaker nations of South-East Asia into alignment with her in preference to China, whose domination they fear.

The Appeal of Communism

The communist movement is ever-conscious that the basis of its power in South-East Asia lies in the peasant villages. Village society has nurtured the movement, the motivation before independence being anti-imperialism and, since independence, nationalism. Few who follow communist leadership in the area know what communism is, nor are they aware that they are following communism. They yield to persuasions that certain actions will result in an improved local society.

The obvious opulence of Western visitors in South-East Asia provides an opportunity for communism to stimulate resentment against the West. The former colonialists are depicted as having acquired their opulence through exploitation of their former colonies. However, as happened in the case of Burmese peasants who officially visited Communist Chinese villages, the communists explain their higher standard of living as being the product of communism's superior ideology. Thus, while denigrating colonialism and its reputed champion, Western democracy, communism capitalizes on the disappointment and resentment at the meagre returns to date from independence.

Growth of an educated class in South-East Asia provides an opportunity for communism to further its intellectual appeal. It claims to explain history and the explanation is easy to understand. Furthermore, communism claims to predict the future course of social development, which claim appeals to a society in which soothsayers are frequently consulted in earnest.

The psychological appeal of communism lies in the importance an individual derives from being in the vanguard of those establishing a supposedly superior social order. Hence, village headmen and minor government officials with few prospects in the existing society are vulnerable to communism's blandishments. In addition, the economic growth of Russia and China is held to be attributable solely to communism's superiority over other social systems. The prospect of rapid economic growth appeals much more in an area beset with poverty and low living standards than does the slower advancement exhibited by Western democracies. Communism, therefore, has found ample opportunity to further its expansion in South-East Asia.

The Impact of Communism

New nations are probably most susceptible to communism's advances in the formative years of their independent nationhood. However, in South-East Asia only North Vietnam has embraced communism. The other countries are, nevertheless, plagued by varying degrees of communist influence.

To the intensely nationalist South-East Asian countries, China represents another form of domination and subjection. Furthermore, there is strong anti-Chinese feeling throughout the area, generated partly by the control of commerce exercised by Chinese minorities and partly by the known allegiance of those minorities to China. Although few doubt that North Vietnam is a Chinese puppet, China has tried to offset the antipathy towards her by promoting communism in the area through the use of local cadres apparently

led by a locally prominent figure-head. Hence, the threat of communist expansion in South-East Asia could lie in the direction exemplified by Yugoslavia.

Laos, bedevilled by a disunity aggravated by the Pathet Lao, is unable to prevent further subversion of her population, and the North Vietnamese freely use the country as a corridor for infiltration of neighbouring countries. Communist domination of Laos appears to be merely a matter of the Peking regime nominating the time for take-over.

Cambodia has constitutionally banned the Communist Party and yet sections of the Ho Chi Minh trail within her borders facilitate North Vietnamese infiltration of South Vietnam. Also, the Viet Cong take sanctuary in Cambodia, whose policy of appeasement of China probably fosters such an accommodating attitude. Furthermore, Prince Sihanouk's utterances freely indicate Cambodia's attitude to the conflict between communism and the West.

Burma is a disunited country with a repressed society facing economic disaster. In this environment communism has prospered, particularly as Burma's relations with China permit regular visits across the border by the peoples of the two countries. By day, General Ne Win's Revolutionary Government controls about 75 per cent of the country but by night it controls only 50 per cent. Political dissidence is rife and the country is ripe for revolutionary propaganda, with the result that potential resistance to a communist coup from within is low.

Thailand banned the communist party in 1952 and today's estimated 500 members operate clandestinely. In the districts bordering Laos, however, communist infiltration recently revealed its hand. Furthermore, propaganda is levelled at villagers in that area by the 'Free Thai Radio' operating in Laos. Strong counter-measures have been taken by the Government, aided by the West.

Malaysia has thwarted strong communist insurgency once in the last 15 years and maintains an extensive security system to prevent a recurrence of the threat. She is conscious of the problems that could be presented by her own large Chinese population and by that of nearby Singapore. As a result she is unlikely to permit internal communism to threaten her national security.

The Philippines is strongly anti-communist and, having also overcome communist-inspired insurrection since 1945, carefully watches for its re-emergence. Communist China is attempting to subvert the population by propaganda broadcasts in the vernacular language of the Philippines, and remnants of the Hukbalahap movement are active in Luzon. Nevertheless, communist influence is unlikely to disturb the country's present attitudes.

Indonesia's communist party (PKI) ranks third in size to those of USSR and China. Its 6,000,000 followers are, nevertheless, but a small part of a total population of 105,000,000, the great majority of whom strongly oppose communism. The PKI, which held considerable power until 30 September 1965, is now largely ineffectual. However, the domestic political situation in Indonesia precludes any forecast of the eventual influence of the PKI. Popular fear of China and suppression of the recent communist-inspired coup are grounds for believing that Indonesia will continue to resist communism.

A Possible Course of Events

There is, then, evidence of determined resistance to communism in some of the nations of South-East Asia. Evidence also exists, however, that others have neither the stability nor potential power of resistance which might prevent their falling under communist domination.

Should South Vietnam be lost to communism, there is every indication that Laos would fall soon afterwards. Burma, too, exhibits an instability conducive to a successful communist take-over, particularly as her potential to resist is weakened by national disunity and inept government. On the other hand, Cambodia is nationally united and comparatively stable, but fear of losing her national identity would probably prompt her to seek complete alignment with China in the role of a satellite nation.

If South Vietnam's fall precipitated the fall of Cambodia, Laos and Burma, the psychological impact on Thailand would be considerable. Her will to resist would be weakened unless she was reassured by the active support of SEATO, and in particular of the United States of America. Without that support Thailand might adopt an accommodating attitude, as she has done in the past, to preserve her national identity.

Malaysia and the Philippines would almost certainly resist communist aggression, but their capacity to resist would need reinforcement by the West. Defence alliances between Malaysia and Britain and between the Philippines and USA ensure that the necessary reinforcement would be provided. Domestic turbulence in Indonesia's recent past has left her isolated internationally, but her suppression of communist influence points to a determination that she will not yield to communism. Furthermore, definite moves have been made towards regional economic co-operation in South-East Asia, with Japan emerging as the rallying point of the newer nations. In the reasonably near future, that economic co-operation could well grow into an organization designed to resist Communist expansion.

Conclusion

Comparison of the countries of South-East Asia with a set of dominoes neglects to account for the inherent stability of individual countries. Similarly, but unlike the dominoes, individual countries offer differing resistances to any force attempting to topple them. Nations are not dominoes and will react to a given situation in very different and individual ways.

The will to resist exhibited by some of the countries is unlikely to be sufficient on its own to oppose the toppling force applied by communism. The strength of those countries to resist must be supplemented by the West, and this is provided for in certain cases by defence alliances with Western nations, who are unlikely to refuse to honour their commitments.

Thus, the fall of South Vietnam to communist insurgency would not necessarily presage the fall of the remainder of South-East Asia. The connotation of inevitability inherent in the 'domino theory' over-simplifies the situation in that it disregards the attitudes of the individual nations and their will to retain their national identity and territorial integrity. Therefore, the theory is not wholly valid but does serve to warn that Western support of individual nations in South-East Asia is vital to the security of the area. □

FIRST BULLECOURT, APRIL 1917

An hour later, while the field artillery was still playing on the Hindenburg parapets and the 'heavies' on Bullecourt and Reincourt... while the line of wounded followed by shells from some German battery was trailing like a string of ants across the open to the rear — there suddenly appeared, slowly returning from the sector of the Hindenburg Line captured that morning by the 12th Brigade, about 150 men.

They were the 48th Battalion... A full hour after every other battalion had left the trenches [they] came out — under heavy rifle and machine-gun fire, but with proud deliberation and studied nonchalance, at walking pace, picking their way through the broken wire, carrying a proportion of their Lewis guns, carefully helping the walking wounded, and with their officers bringing up the rear. Wherever Australians fought, that characteristic gait was noted by friend and enemy, but never did it furnish such a spectacle as here. For ten minutes the attention of half the battlefield was held while, leisurely as a crowd leaving its daily work, the 48th drew clear.

— C E. W. Bean, *The Australian Imperial Force in France, 1917* (1943).

The Regimental March

Lieutenant-Colonel R. A. Newman, ARCM,
Director of Music

IS any music more inspiring and romantic than the regimental marches of the British Army? They represent battles, victories, love, conviviality, hunting, poaching, the whims of military men and their women folk, and casual fancies. A regimental march may be a tune such as *Dumbarton's Drums,* the march of the Royal Scots, which has been handed down from one generation of soldiers to the next for 300 years, or it may be a march like *Ca Ira* of the West Yorkshire Regiment, which actually won a battle.

Tunes by great composers and obscure musicians have been promiscuously annexed, and strange liberties have been taken with little hope of satisfactory adaptation; even a solemn hymn has been turned into a regimental march. Generals and colonels have produced marches which have survived to this day, and several marches of the British Army are creations of our Royal Families.

The mother of Queen Victoria, then Duchess of Kent, composed several regimental marches, one of which is the justly acclaimed Royal Artillery Slow March. Another Royal composer was Queen Victoria's Consort, Prince Albert, who composed the regimental march of the Somerset Light Infantry (Prince Albert's Own) — a very effective march and particularly exhilarating when played at the Light Infantry pace.

Of the tunes from the pens of military men surely the most curious is the well-known *In the Garb of Old Gaul,* the regimental march of the famous Royal Scots Greys. The music of this song was originally given the title of *Highland March,* and was part of a collection composed by General John Reid, an eminent Scottish soldier-musician. The tune may have languished in obscurity had not another soldier, Lieutenant-General Sir Henry Erskine, produced some verse

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Colonel Newman was born to the sound of drums in the Duke of Cornwall's Light Infantry, of which his father was regimental sergeant major, in 1909. He joined the army in 1923 as a band boy and from 1924 to 1935 served with the 1st DCLI in India.

He was appointed Bandmaster to the 3rd King's Own Hussars in 1940 after training at the Royal Military School of Music, Kneller Hall, and next year was loaned to the Canadian Army as Bandmaster of the Royal Canadian Artillery Band, serving in this capacity for the next five years in Italy, France, Belgium, Holland and Germany. During this period he was for nine months Musical Director of the Canadian Band of the Allied Expeditionary Force Radio Service on the BBC.

He left the British Army in 1947 to take up a civil musical appointment in Adelaide, but four years later returned to service life as the Australian Army's first Director of Music, an appointment he still holds.

which, while perhaps of no great poetic merit, became extremely popular and effectively combined with the music. Thus two non-contemporary General Officers combined to create a fine regimental march which is justly famous as a song in its own right. The original title of the tune gave way to the first line of the verses, which commence with the words 'In the garb of old Gaul'.

The romance of the regimental march is best exemplified by the tune *Ca Ira* ('That will certainly happen') which is the march of the West Yorkshire Regiment. The song became popular in Paris during the French Revolution and to its strains many victims were led to the guillotine. The refrain *'Ah! Ca ira, ca ira, ca ira'*, which proclaimed death to the aristocrats and declared that despite all opposition the revolution would succeed, became the revolutionaries' song. The tune is bizarre and in keeping with the strange manner of its adoption as a British regimental march.

In 1794 the 14th Foot, later the West Yorkshire Regiment, were storming the French Revolutionary camp at Famars, stubbornly defended by troops who were inspired by their band playing *Ca Ira*. The hardened Yorkshiremen were forced to fall back when their colonel, so it is said, rushed to the front. In a flash of inspiration he ordered his band to play *Ca Ira,* and shouting 'come on lads, we'll beat them to their own damned tune', so fired his men that they swept the Frenchmen from their positions. Whatever the quality and accuracy of the music may have been when the noise of battle was added the regiment was authorized to adopt the tune as its regimental march. From that day to this, this unusual tune has been played by West Yorkshire regimental bands in many parts of the world.

The reader sensing something apocryphal in this story is warned to keep his peace if hearing it recounted by Field Marshal Lord Slim of Yarralumla, the West Yorkshire Regiment's most famous son. The field marshal delighted in this episode in his regiment's history, and always concluded its telling with that out-thrust chin and a scowl for his audience, as if defying them to cast a shadow of doubt on its authenticity.

A stirring and romantic story is also told concerning the regimental march of the Devonshire Regiment, the old 11th Foot. The tune *We've Lived and Loved Together* was the *Tipperary* or *Roll Out the Barrel* of its day. Boys whistled it, grown-ups sang it; and as the tune had a fine swing, it was suitable as a march. Just before the battle of Salamanca in 1812, that sanguinary contest which gave the regiment its significant nickname of 'The Bloody Eleventh', the Devonshires were marching near a French regiment — enemies marching onto the field of battle, indeed a solemn company! No order to attack had been given when one of those incredible incidents which are inseparable from warfare occurred. *We've Lived and Loved Together*

was known to all the Englishmen, and was considered appropriate to the occasion by someone whose name has not been recorded. Accordingly the band was ordered to strike up the air, and it broke the solemn silence as Englishmen and Frenchmen deployed for battle. Soon afterwards the temporary friends had become official enemies, and the plains of Salamanca were covered with the dead and dying of the two regiments. A tune with such uncommon associations was unlikely either to be forgotten or relinquished. *We've Lived and Loved Together* was adopted as the regimental march of the Devonshire Regiment and has been retained ever since.

The Royal Military College, Duntroon, has adopted a new march, titled 'General Bridges' in honour of the founder of the college, as the Regimental Slow March of the Corps of Staff Cadets. The Director of Music, Colonel Newman, using the Corps of Staff Cadets bugle call as a basic theme, composed and arranged the march. He presented the original score to the Commandant, Major-General C. H. Finlay, on Wednesday, 1 March. It will have its first major public hearing at this year's Queen's Birthday Parade.

One of the curious and perhaps puzzling stories about British regimental marches concerns a tune adopted by two famous regiments. The tune has words, the first lines of which run:

'Off, off', said the stranger,
'Off, off and away.'
And away flew the light barque,
O'er the silv'ry bay.

An apparent impasse was overcome by the simple expedient of using the same tune under different titles. Thus the Royal Ulster Rifles uses *'Off, off' said the Stranger* as the title of its regimental march, while the Durham Light Infantry uses the same tune with the title *The Light Barque.* As a further gesture to differentiation, one regiment plays the tune in the key of C major, while the other prefers the key of B flat.

The choice of a purely Scottish tune *Wha Wadna Fecht for Charlie,* as the regimental march of an English regiment would perhaps seem peculiar, but the explanation is simple.

Among the honours of the 22nd Foot, later the Cheshire Regiment, there is one 'Scinde', about which a famous tale is told. A soldier who played a major part in winning that campaign in India in 1843 was Sir Charles Napier, who announced his victory in the one-word signal *Peccavi* — 'I have sinned'. The Scinde Campaign included the battle of Meanee, in which the 22nd Foot was the only British regiment engaged. Afterwards Sir Charles was appointed Colonel of the regiment, and when a regimental march was required one was chosen which was considered to be specially appropriate because it included the name Charlie. Thus *Wha Wadna Fecht for Charlie* was annexed as a tribute to a great leader, and has remained the regimental march of the Cheshires ever since.

While these stories of the origin of British regimental marches have the merit of tradition and antiquity, contemporary happenings in the Australian Army in this field should also be recorded for posterity. I am reminded of this by the recent choice of the tune *The Campbells are Coming* as the official march of the Australian Army Psychology Corps. I consider the choice a happy one and the makings of a tradition. No one who knows anything of the history of this young and valuable corps would be in doubt about the purpose of the choice which was to perpetuate the name of its original Director and his significant contribution.

An interesting story about regimental marches in the Australian Army concerns the choice of a march for the Royal Corps of Australian Electrical and Mechanical Engineers. The corps' Director sought my assistance in changing his corps march, which was a combination of *Lilli Burlero* and *Aupres de ma Blonde* — the same march used by RAEME's English counterpart — because he felt that the slavish acceptance of tunes used by equivalent corps in the British Army was unimaginative and stultifying. This was an opinion with which I heartily concurred. I proposed that one of the tunes should be retained to preserve the traditional link, but that another tune, possibly Australian, should be added; in any case is should be a tune that could be identified as belonging to RAEME. He agreed, and promptly assigned to me the task.

The assignment caused me considerable worry. There was a paucity of purely Australian tunes, and in the small number available none seemed particularly suitable or apt. Having sought inspiration from the music of the world without success, it was with a feeling of frustration that I joined a number of officers of various corps who were celebrating the end of a course at the School of Signals. When a pause in the light-hearted banter occurred, I threw into the conversation the subject of suitable corps marches. This was seized upon with considerable relish by all present. Many suggestions, generally bawdy or uncomplimentary to corps not represented were made: for example, 'One Meat Ball' for the Catering Corps, 'Nuts in May' for the Psychology Corps and so on. And then, seeing a grey-headed RAEME major leaning against the bar, I at last brought their wit to bear on my problem by asking him for suggestions for a suitable march for RAEME.

Having a butt for their witticisms, the company present spared no effort and their sense of humour ran riot. The RAEME major, however, proved equal to the occasion, and at the first break in the conversation said, in a mock-hurt tone of voice, 'It's all right for you so and so's, but you don't appreciate RAEME; we're just the backroom boys of the army.' His remark provided the spark that I sought as I remembered the song *The Boys in the Backroom*, popularized by Marlene Dietrich in 1938. The tune, adapted as a march and immediately following *Lilli Burlero*, was arranged for the band and was readily accepted by RAEME as its official march.

A similar situation occurred with the Women's Royal Australian Army Corps. The Director felt that their official march *Soldiers of the Queen*, though suitable and apt, was far too short and repetitive for a big parade. She felt that the addition of another tune would solve the problem, and also would conform with the two-tune practice of other corps. She requested that I find such a tune.

Approaching the task with an appropriate measure of delicacy, I discussed it with an officer friend in D Psych's office. Perhaps I should have known better. His sense of humour, always fairly lively, was given full rein, and he provided many light-hearted suggestions which, though they tickled D WRAAC's sense of humour, did not win her approval. However, in a more serious moment, the same officer proposed the song *Girls* from the *Merry Widow*, and this D WRAAC immediately accepted. The holders of the copyright were approached and permission was formally granted for me to 'include the composition *Girls* from the *Merry Widow* in the march you are arranging for use by Army bands only'. When this had been done and approved by D WRACC, she asked that I provide her with a copy of the words of the song; to comply I had to borrow the full score of the entire operetta. Imagine my surprise and embarrassment when I discovered that this song, well known to all (including the pub-

lishers) as *Girls* was in fact titled *Women* — a subtle difference. My embarrassment, however, was short lived; D WRAAC, amused at the situation, decided that she would retain the tune under its better known title, and a suitable and attractive corps march it has become.

Other heads of corps were similarly interested. Brigadier Lawson, the Director of Ordnance Services, requested that the Ordnance Corps march, *The Village Blacksmith,* which is also the march of the Royal Army Ordnance Corps, be extended by the addition of a suitable tune, preferably Australian. My suggestion of *The Wild Colonial Boy* was immediately accepted and the resultant combined march approved.

Colonel Woollard, Director of Signals, requested that the first tune in the march of the Royal Corps of Signals, *Begone Dull Care,* be retained and the second tune *On the Road to Newcastle* be discarded in favour of something Australian. He suggested *Click Go the Shears* as a substitute. It was suitably Australian and, he felt, apt to his corps since the click of shears might generate sparks and 'Sparks' was an appellation often applied to signalmen. I personally thought that the association was somewhat obscure and that the song would not lend itself to adaptation as a quick march and said so. I was prevailed upon to persevere, however, and in the end my judgment proved faulty. The colonel had chosen wisely and the tunes of *Begone Dull Care* and *Click Go the Shears* now combine in a rousing march of definite Australian flavour.

The choice of a corps or regimental march is never easy and in fact places a great responsibility on those concerned. Tastes differ among contemporaries and vary over the years. Consideration must be given to aptness, suitability of title or historical association, and above all to the tune's adaptability as a quick march. However dignified a chosen tune may be, and however dramatic the historical association, the irreverent soldiery are likely quickly to adapt to it words of their own choice and invention. Though often lewd or bawdy this usually only demonstrates their affection for a tune and probably therefore is the best measure of its success.

I remember the CO of a Pentropic battalion once remarking that 'if it is the unfortunate duty of a CO to select a suitable march, then it is equally the duty of succeeding COs to foster the same tune'. He went on: 'When I took over this battalion I disliked its regimental march intensely. Feeling, however, that it was my duty to perpetuate what some other CO had created I made no change. Now, after disapproving of it for so long, I have grown to have some regard for it, and would defy any efforts to change it.'

I feel that two lessons lie in that statement. COs responsible in the first instance for the choice of a regimental march should choose wisely. They should remember that they are powerful people in their

appointments and when suggesting possible tunes for adoption need to be on guard against sycophancy or other signs of too ready acceptance in their subordinates. And once chosen the regimental march should never be lightly discarded.

I recall a unit which had played its regimental march for several years. The troops used to sing their ribald versions at suitable times, but march to its strains smartly and proudly when the occasion demanded. Then along came a new CO, who immediately set the wheels in motion for the creation of a new march. This was a *pot-pourri* of several tunes, skilfully welded together, but of little or no aesthetic value. Although I have no wish to set myself up as an arbitrary judge, I personally doubt whether ex-members of the unit will be able to recognize, leave alone recall, its strains in later years.

There is now probably little hope of learning when and why many of our regimental marches were adopted. We have to be satisfied with the bare facts that certain tunes are associated with certain regiments or corps. This is sad, because Australian Army traditions, apart from the fighting ones, are too few and too slow in forming. Where they have formed they need to be nourished. If I were to make a plea it would be that officers should properly record all such details in unit records; unless this is done they will be quickly forgotten.

A regiment never dies unless it is disbanded; it lives on in the unbroken succession of its recruits, and with the regiment lives its regimental march. The generations of Australian soldiers to come will want to know how such marches came to be chosen. □

The British 81-mm Mortar

Major C. V. L. Palmer,
Royal Australian Electrical and Mechanical Engineers

Introduction

TRADITIONALLY mortars have suffered from such defects as wide dispersion of fire, the sporadic short round, limited range and vulnerability of propellant to moisture and physical damage. These effects were due to:

- Wide tolerances in the manufacture of ammunition, giving two sources of error:
  (1) An unstable projectile.
  (2) Poor sealing of the bore by the bomb, giving inconsistent internal ballistics.
- Excessive bomb clearance in the bore and aerodynamic effects of the propellant gases on the bomb leaving the muzzle, which magnified projectile yaw.
- The location of supplementary charges between the tail fins so that firing sometimes forced fins out of alignment.
- The combination of spin and yaw which produced the phenomena of spin yaw resonance, so creating an unstable projectile.
- Baseplate instability.
- Variation of recoil under varying soil conditions, which allowed variation in muzzle velocity.

The British L.16 mortar system was designed to remedy the majority of these defects without sacrificing the inherent advantages of simplicity, mobility, flexibility, lethality and firepower.

This article describes and discusses the British 81-mm mortar in that system.

Description of the Weapon

The weapon comprises the following conventional assemblies:

Barrel	27 pounds
Mounting	26 pounds
Baseplate	25 pounds
Sight	2.8 pounds
Total, ready to fire	80.8 pounds

Major Palmer graduated from RMC in 1957 and was allotted to RAEME. He gained a Fellowship Diploma in Mechanical Engineering at the Royal Melbourne Technical College in 1959 and subsequently served in Workshop and LAD appointments and with HQ CRAEME 1 Div. He entered the Royal Military College of Science, Shrivenham, U.K., in October 1964, passed the Technical Staff College in April 1966, and from then until November, when he returned to Australia, was a TSO with the Design and Development Department of the Royal Small Arms Factory, Enfield. His present appointment is DAMGO (Guns), D. Equipment, at Army Headquarters.

He is an Associate Member of the Institute of Engineers, Australia.

Barrel

The barrel is of forged monobloc construction in high quality alloy steel of cold yield strength 75 tons per square inch. Cooling fins assist this light barrel to dissipate heat rapidly enough for a rapid rate of fire of 15 rounds per minute. The firing pin is angled into the breech piece so that the pin may be changed with the mortar in the firing position.

Sighting the 81-mm mortar.

Mounting

The mounting is called a 'K' type. This configuration reduces errors due to backlash in the cross-levelling gear and leg joints, and provides a stable mount for a minimum of weight.

All thread surfaces and gearing are enclosed and packed with lubricant to reduce friction and maintenance. The yoke is buffered to reduce the transmission of impact from the barrel. The barrel clamp is designed to allow rapid adjustment if baseplate sinkage occurs.

Baseplates

The baseplate incorporates a central socket allowing all-round traverse of the barrel by moving the mounting.

Sight

The standard C.2 sight unit is fitted, and internal illumination is provided.

Ammunition

The following natures of ammunition are in service:

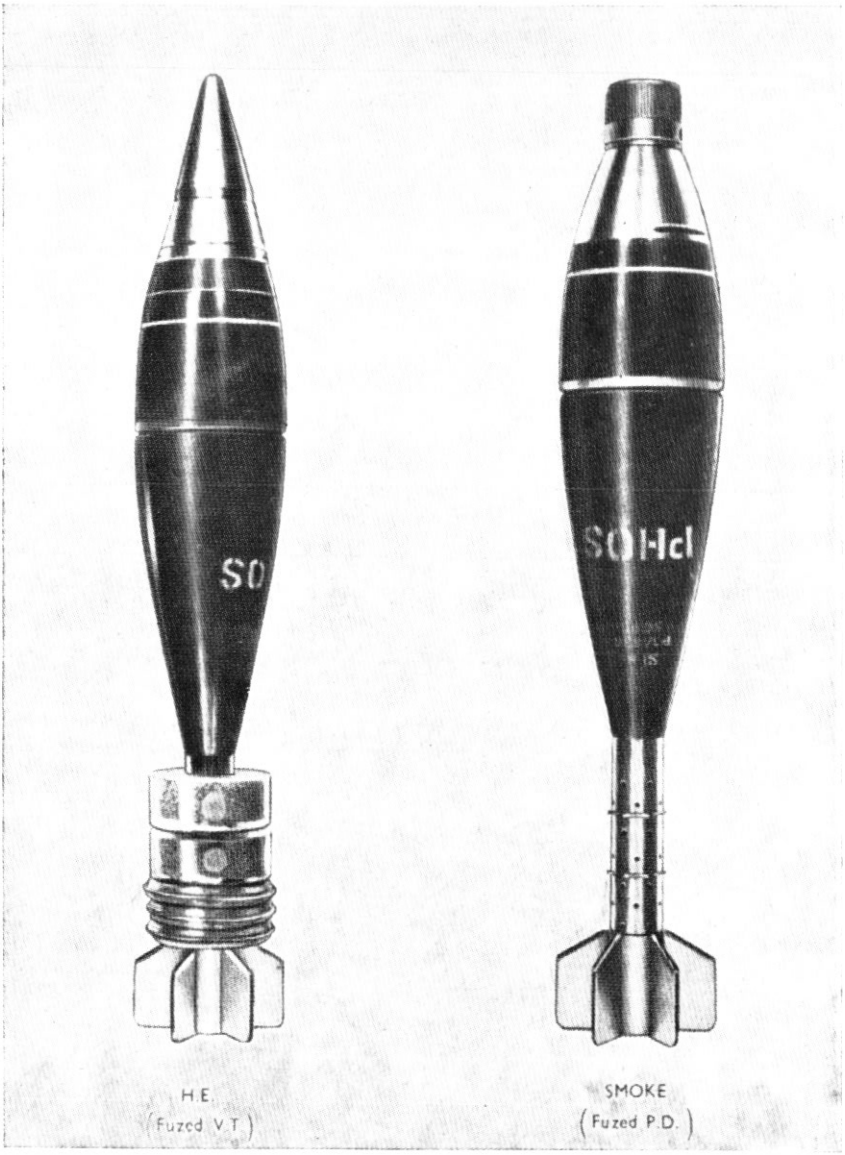
- H.E. Anti-personnel.
- W.P. Smoke.
- H.E. Training.
- Practice Inert.

The firing position.

Features Common to all Natures

The 81-mm bombs have been designed for optimum accuracy and stability. All types are streamlined, and incorporate an obturating

ring at the maximum body diameter to reduce the bypass of propellant gases. Standard percussion or proximity fuzes may be fitted. The tail assembly is accurately extruded aluminium alloy.



Propellant

The primary cartridge is sealed in an aluminium tube within the tail. Increments, in horseshoe-shaped combustible containers, are clipped onto the tail boom above the fins to reduce the chance of fin damage on firing.

H.E. Anti-Personnel Bomb

This H.E. bomb weighs less than 10 pounds, but the thin-walled ductile iron body and a high charge to weight ratio give a high lethality at 40 metres radius.

Performance

The current maximum service range is 4,700 metres. At this range 50 per cent of all bombs will usually fall in a zone 40 metres by 10 metres. Under average conditions, the probable error for range is unlikely to exceed 1 per cent.

Trials at greater ranges have been fired successfully, and suitable charge systems are expected to be available in the near future.

The British mortar is relatively expensive when compared with its predecessor, due to the high standard of steels and aluminium alloys used. Such cost, however, is offset by the improved mobility which the light weight of the weapon gives.

The ammunition is also relatively expensive due to the high standard of accuracy required to give a stable projectile. This, too, is offset by improved lethality, reduced dispersion, increased range, and the confidence which troops will have in a mortar which does not drop sporadic short rounds.

Conclusion

The 81-mm L.16 mortar is impressive both in specification and performance. Both weapon and ammunition are expensive, but this disadvantage is offset by the many advantages:

- The improved mobility which must result from a weapon with a maximum one-piece weight of 27 pounds.
- The increased range, which means in increased potential target area per weapon.
- The improved lethality and reduced dispersion, which means that fewer bombs are required for a given target effect.
- The complete confidence which troops have in a mortar which delivers its firepower accurately and consistently. □

TOBRUK AND EL ALAMEIN, by Barton Maughan. (Australian War Memorial, Canberra, 1967, $4.)

Reviewed by Mr. A. J. Hill, lecturer in history at the Royal Military College, and formerly a company commander in the 2/13 Bn and BM of 20 Bde.

WHEN, twenty-six years ago, the 9th Australian Division moved westward along the austere North African coast, it was hardly more than a name, a fortuitous collection of units gathered from other divisions, on its way to relieve 6th Division and complete its training in a quiet theatre. Men looked with curiosity at Halfaya and Capuzzo and at the debris of battle still scattered near the coast road and they looked with more than curiosity at Bardia and Tobruk where the 6th had already made its name. Here was a division, one they could admire and hope to emulate, which had already proved that the new A.I.F. was not unworthy of the old. But the brigades and regiments of the 9th knew less about the other components of their own division than they did of the 6th with whom 20th Brigade mingled when staging at Tobruk. It was mercifully hidden that within a month the same brigade, still short of training, weapons and equipment, would be the first Australians to join battle with the German Army and that they would be forced back to defend Tobruk. It was in Tobruk and in battle that 9 Div, to use the old familiar tag, was first concentrated although still lacking two of its field regiments and a few other units; and it was under siege that the division came to know and respect its commander, Leslie Morshead.

9 Div held Tobruk in good company. It is one of the many virtues of Barton Maughan's *Tobruk and El Alamein* that it shows in full measure the fighting qualities of the Royal Artillery, of the Royal Tank Regiment, of the Royal Northumberland Fusiliers — those unsurpassed machine gunners — of the 18th Cavalry of the Indian Army, of the R.N. and the R.A.N. whose worn ships and weary crews brought in all that was needful and carried back to Alexandria the wounded and the sick. The Navy was supported in its supply missions by the men in the small ships; if their devotion is remembered by all, some of their adventures in support of Tobruk will become known to many for the first time in Maughan's pages. From the beginning of the siege, Wootten's 18th Brigade of the 7th Division, the best

trained and best equipped infantry of the garrison, was a rock on which Morshead felt he could lean until, in August, they were relieved by the Polish Carpathian Brigade under Major-General Kopanski. The Poles were soldiers as tough as those whose place they took and they were consumed with a hatred of the Germans which only other Europeans of those days can fully grasp. If the R.A.F. appears but little in the Tobruk story, this reflects the scarcity of aircraft in the Middle East, the isolation of the fortress and the difficulty of maintaining even a reconnaissance flight in an area no part of which was out of reach of the enemy's guns. A year later, 9 Div was to know the power of close air support and to see the Luftwaffe fade from the sky above El Alamein.

9 Div learnt its trade as an apprentice on the job. Two factors played a vital part in its apprenticeship — the fortune of war and the quality of its own commanders. Luck and the fog of war — sometimes well thickened with desert dust — helped in the withdrawal to Tobruk and, in view of the German superiority in the air, in armour and in training for mobile operations, it was fortunate that the Division could fall back on a position already held by two Australian brigades — 18th and 24th — and partly developed for defence. Here the Australians could fight in a way for which they already had some qualifications as the 2/13th Battalion had demonstrated in its spirited fight at Regima. Maughan emphasizes not only the resolution of Morshead and his brigadiers but also the value of their experience in positional warfare in France. From the beginning, the keynote of the defence was aggression and forward battalions patrolled incessantly; as the siege wore on, patrolling became more skilful and more highly organized so that by August Colonel Williams, the commander of 1st R.H.A., could write to Brigadier Thompson, commanding the artillery of the fortress, drawing his attention to the confirmation of patrol reports by air photographs and stating that he wished the enormous importance of deep patrolling by infantry to be placed on record. 'Although having had experience of various theatres of operations in the past (he wrote) I have never seen the great value of deep patrolling so forcibly brought out before. The continuous failure of air support, either by observation or photographs, added to the featureless nature of the desert, set an apparently hopeless prospect of correctly deducing the enemy dispositions and activity beyond our limited zone of observation.' Williams then went on to describe how the 2/9th Battalion's patrols had given most valuable information to the limit of the guns' range. The 'climax' had been reached when the 2/13th Battalion 'produced a series of most convincing detailed reports of the enemy dispositions, and it was highly satisfactory on receipt (after waiting nearly five months) of an air photo of that area to see with what astounding accuracy those dispositions had been fixed.' The 'continuously brilliant

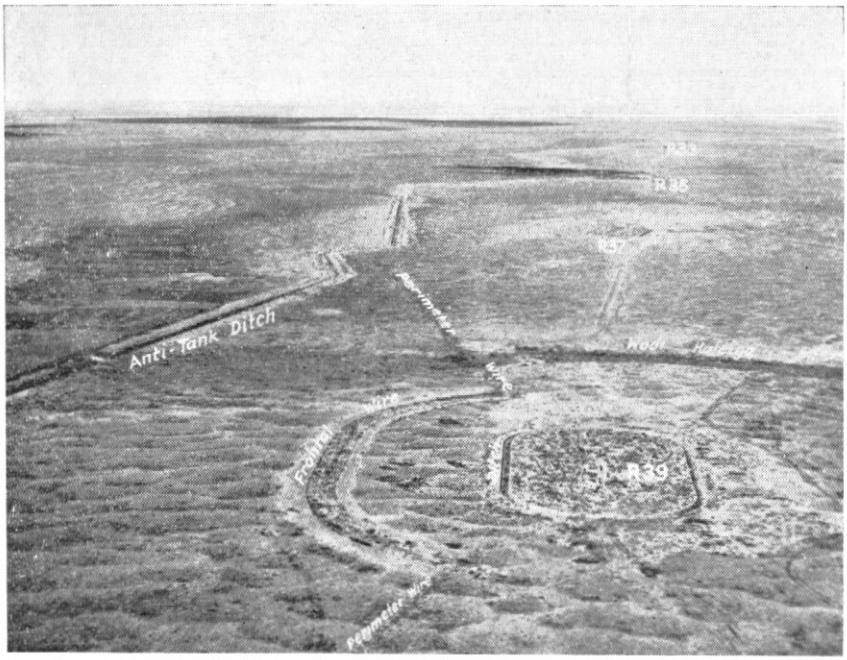
patrolling' had enabled the gunners 'to strike deeply and accurately' and had 'persistently impressed' them as 'regular soldiers'. The book abounds in descriptions of these reconnaissance patrols and of the daring fighting patrols which gravely upset the enemy. They became the hallmark of the defence.

Rommel's first attack on Tobruk, the Easter Battle, is vividly described; indeed it is one of the best chapters in a history which never flags throughout its 750 pages. In this battle, the first Australian V.C. of the war was gained by Corporal Jack Edmondson of the 2/17th Battalion and for the first time, steady infantry (2/17th Battalion) showed how to deal with an armoured thrust. Maughan points out that the German defeat on 14 April must be attributed to their failure 'to reinforce the bridgehead promptly and strongly'. He offers an English gunner's view of the outstanding features of the battle which most Australians would be content to accept: '(i) A/E Battery's tank shoot, which finally stopped the tanks. (ii) The infantry in D Company remaining in their positions completely unperturbed by the tanks and then attacking the ensuing infantry, together with an excellent counter-attack by B Company.'

Rommel's second and more elaborate attempt to take Tobruk on 1-2 May failed of its object but established the Axis forces in the perimeter, thus creating the Salient of unhappy memory. Maughan shows clearly the difficulties under which our counter-attacks were mounted, first by the 2/48th Battalion and on the night of 3-4 May by 18th Brigade; inadequate communications and lack of support, lack of time and lack of experience and training in night attacks told against the infantry who were set tasks beyond their powers. Nevertheless, Morshead's aggressive reaction to Rommel's blow sealed off the penetration, inflicted heavy casualties and stabilized the position. The description of this battle is a most evocative and skilful piece of writing; the tension and the uncertainty are built up as the focus shifts from the infantry posts on the perimeter to Fortress HQ and Brigade HQ then back to platoons and sections of the ill-fated 2/24th Battalion.

It was an odd trick of fate that the employment of 9 Div should have given rise to friction between the British and Australian Prime Ministers twice in the space of little more than a year. The controversy over the withdrawal of Australian troops from Tobruk is told in full from the documents of both sides thus redressing the balance of Churchill's partial account. Obeying Sir Keith Hancock's injunction that the historian's business is to 'write coolly of hot stuff', Maughan lets the facts speak for themselves with a minimum of comment. One cannot help feeling sympathy for Auchinleck. An Indian Army officer, he was strange not only to the British Army which ran the Middle East but even more so to the exasperating Dominion forces whose commanders could, and did, invoke their charters when they

believed the interests of their forces to be in jeopardy. Auchinleck was caught between the Scylla and Charybdis of Churchill and Blamey, neither of whom was noted for meekness. He was also in the unhappy position of having in Blamey a Deputy C-in-C whose advice was perforce accepted in preference to his own. Hetherington's



(RAF)

A post-war photograph of Post R39 in the southern sector of the Tobruk perimeter. The perimeter defences between R33 and R35 (then held by the 2/17 Battalion) were breached by the Germans in the Easter attack on Tobruk.

account in *The Blamey Papers* (pp.119-123) shows that their relationship had become explosive; after Blamey and the Australian government had forced the issue, Auchinleck even sought to resign. 9 Div was brought out by the Navy without loss until the night of 25 October when the last convoy, which was approaching Tobruk, was bombed and H.M.S. *Latona* was sunk. The other ships returned to Alexandria. The last details, except the 2/13th Battalion, were taken out in November; thus the 2/13th became the only unit of the Division to return to Egypt by road after taking a notable part in the heavy fighting for Ed Duda during the Crusader operation. Maughan indicates that there is doubt about the decision to retain the 2/13th in

Tobruk; his inference, based on the lack of references in the documents, is that G.H.Q. M.E.F. 'decided not to seek Australian concurrence but to present A.I.F. Headquarters with a *fait accompli*'.

The total losses of 9 Div and its attached troops in this campaign from 1 March to 15 December 1941 were 832 killed, 2,177 wounded and 941 taken prisoner, the very great majority being borne by the infantry of 9 Div and 18th Brigade. If the price was high it was more than matched by the achievement, and the units, which in February had moved to Cyrenaica to train, returned to Palestine in October a division. In a just conclusion, derived not only from his mastery of the material but also from his six months' service in Tobruk as an infantry officer, Maughan writes: 'If the greatest single factor in repelling the German assaults and holding the besiegers off was the steadfast, efficient and brave work of the field artillery which for some of the time was solely and for the whole time preponderantly from the British Army; if the greatest call on deep resources of courage was laid most often upon the anti-aircraft gunners who stood to their guns day and night even when they themselves were the direct target of the strike; if the most dreadful burden borne by the defenders was the constant manning of shallow and sun-scorched diggings and weapon-pits in the regularly bombed, bullet-raked Salient, in which to stand in daylight was to stand for the last time; these judgments only illustrate that each man had his own job in the conduct of the defence. The spontaneous respect of all arms and services for the performance of the others and the loyalty with which they combined were the things that made Tobruk strong in defence and dangerous to its besiegers.'

It was not until the end of June 1942 that 9 Div, moved back to the Western Desert and to a part in a campaign which was hastening from disaster to disaster as Eighth Army fell back towards Alexandria. The Division was still deployed around El Amiriya, just forward of Alexandria, when the exhausted *Africa Corps* was stopped by the South Africans, New Zealanders and other elements of the Eighth Army. This clearly emerges in *Tobruk and El Alamein* and the point is worth stressing if only because one occasionally hears assertions that 'the Australians stopped Rommel at the gates of Alexandria'. Indeed, the first Australian engagement in 1942 took place between Morshead and Auchinleck over the question of piecemeal employment of 9 Div which seems to have been taken as a matter of course at Army Headquarters. Morshead's recollection of the occasion as quoted by Maughan is strongly reminiscent of the confrontation between Auchinleck and Blamey quoted by Hetherington. Nor was this the only occasion when Morshead crossed swords with his Commander-in-Chief as a lengthy quotation from his diary for 21 July reveals; he 'was extremely critical of the tasks laid upon his division in the operation' (22 July) 'and took strong exception to

the plan'. No general was more concerned for his soldiers; if he demanded sacrifices and ceaseless exertions from them when the situation warranted this, he nevertheless sought always to launch them into operations soundly conceived. That no detail escaped him and that he had not forgotten his own experience as a junior officer is shown in his letter to General Leese, Commander XXX Corps and quoted at length on p.663. In it Morshead argued against the proposed earlier H hour (Zero Hour as it was then) for Second Alamein. He wanted the men of the assaulting companies who would have to lie in slit trenches well forward of our positions for an entire day, to have time for relaxation and 'those very last instructions which a platoon commander gives to the whole of his platoon'.

In First Alamein the Division suffered 2,552 casualties, practically all of them in the period 7-27 July, from the successful raid by 2/43rd Battalion to the loss of the 2/28th Battalion on Ruin Ridge. Maughan's account of these hard and costly attacks is evidence of the value of the training carried out in Syria; after First Alamein he considers that the Division was 'a more self-confident formation than before and a more efficient one'. All brigades were now experienced in the attack and the infantry knew that their own artillery could answer their calls with the same power and promptness as the British gunners in Tobruk. But there was a genuine distrust of the armoured regiments — shared by 2nd New Zealand Division — which to the infantrymen appeared always to be late and unable to get forward. The point is made that there were faults in both arms in the July fighting and that new techniques had yet to be developed for getting the armour through minefields. The real trouble lay not in the tank crews but in 'the commanders and the methods used'. This divorce between the commands of armour and infantry fighting the one battle had been apparent long before and had led to the confused melees into which the Crusader operation had degenerated and to the utter disaster at Gazala in May. But faults in command stemmed from the highest levels in Eighth Army. Morshead's diary and conversations with him recorded by Maughan reveal a lack of confidence in Ramsden, then commander of XXX Corps, and in the C-in-C himself. These were still the days of columns — Robcol, Squeakcol, Wall Group and the like; an Eighth Army cynic is said to have defined a battle group as a brigade group which had been thrice overrun by German tanks. Auchinleck's great qualities of calmness, decision and resolution saved the Army at the eleventh hour but he appears to have lacked those other qualities of the great captain which would have enabled him to fight Eighth Army as an army and employ its superiority in men and armour to defeat his opponent. Morshead wrote on 6 August: 'No stability, a wealth of plans and appreciations resulting in continued TEWTs. Fighting always in bits and pieces and so defeats in detail. Formations being

broken up automatically — it has been difficult and unpleasant keeping 9th Div intact.'

All these matters were put in order after 13 August when Lieutenant-General B. L. Montgomery took command of Eighth Army. Maughan emphasizes the new outlook and spirit which soon permeated the Army and which Morshead reported in a letter to Blamey as early as 13 September. This story and that of the planning and preparation of Second Alamein have often been told although not often with the care and knowledge which distinguish this account. Great stress is laid on the administrative planning, on the attention given to the development of a drill for clearing minefields and on the joint training of infantry and armour for their tasks in the coming battle. Good troops need good staffs if their fighting qualities are to exert their full effect; this book shows that 9 Div and its sister divisions were well served by the staffs at every level from Army down. It is disappointing therefore, that there is no mention of Colonel Woodward, A.A. and Q.M.G. or Colonel Furnell, A.D.M.S. who made outstanding contributions to the performance of the Division.

Men who were with 9 Div on that 23 October will be impressed by Maughan's vivid description of the opening of Second Alamein and by his depiction of the bitter fighting of companies, platoons and sections. Here, too, are stark and moving accounts of individual courage and sacrifice: Sergeant Kibby of 2/48th Battalion winning his VC, like Gurney and Gratwick of the same unit, or the incredible Gunner Schwebel of 2/3rd Anti-Tank Regiment, who received no award, and many another. For each whose deeds are recorded how many more are there who could as fittingly be mentioned and how many who received no honours but did their duty and more at El Alamein? And it should be added that Maughan's account of this battle is indirectly a tribute to the remarkable fighting qualities of the German soldier.

Second Alamein has long been one of the most controversial of British battles largely owing to the way in which Montgomery himself has told the story of his command. Even his greatest admirers must be distressed by his lack of generosity towards Auchinleck, his inability to follow Allenby and leave it to 'history' to judge the results. But the reaction against Montgomery and even against Second Alamein itself has gone too far; writers like Correlli Barnett with a naive, school-room view of battle wax indignant because Montgomery, with a two to one superiority in men and better than two to one in tanks, failed to crash through the Axis positions on the first night. Lord Tedder complains in his aptly titled book, *With Prejudice,* as he did in October 1942, that Montgomery was too slow. It is to be hoped that these critics will read Maughan's history of Second Alamein in which the careful analysis of the platoon and company battle makes it clear why it was not all over in a day or two. The history of

modern war shows that a two to one superiority is no guarantee of success against a resolute, skilful enemy who has had time to fortify his positions. Even Auchinleck with a similar superiority and when the situation was fluid, failed to defeat the exhausted Germans. There was no possibility of a British *blitzkrieg* if only because the armour, artillery and air were not integrated in the German fashion and the enemy was not the 1918-style army of France or Poland but the *Africa Corps*. In their combination of 50-mm and 88-mm guns, the Germans had an anti-tank screen which held to the last. All this and more can be gleaned from Maughan's history and from his balanced summing up of the battle.

In this large book the slips are few, relatively minor and, as a rule obvious. There is, however, a very obscure passage in paragraph 3 of the translation of a German directive on p.66 and the last two lines on p.669 have been transposed. The 'Priests' mentioned on p.679 may not be recognized by all as 105-mm self-propelled guns. Orders of battle of the Tobruk garrison and of 9 Div at El Alamein would have been useful in an appendix. While most of the maps fulfil their purpose, it seems to this reviewer regrettable that fold-out maps, for example of dispositions on the eve of Crusader, have not been provided. This may well be related to costs — the book is immense value at four dollars — but one has only to use the British and American histories to appreciate the advantages of larger maps opening clear of the text. However, these are small details in a work which does honour to the Australian soldier and his comrades in arms from Britain, New Zealand, India, South Africa and Poland. It ends with two appendixes by A. E. Field; the first is an interesting and moving story of the sufferings and resourcefulness of Australian prisoners in Europe and the second records the work of Australian railway construction companies in Syria.

This history has been worth waiting for. To read it is to know that its author has also sought to make a monument more enduring than bronze for . . . .

> '. . . these are deeds which should not pass away,
> And names that must not wither, though the earth
> Forgets her empires with a just decay . . .' □

AUSTRALIA'S PEARL HARBOUR, DARWIN 1942, by Douglas Lockwood. (Cassell Australia Limited, 1966, $4.00.)

DOUGLAS Lockwood went to Darwin in 1941 as a correspondent for the *Melbourne Herald;* apart from World War II service as a soldier and war correspondent, he has been there ever since. He is the author of nine other books about life in the Territory, where he is a well-known and likeable identity.

In this book, with the aid of eyewitnesses (Service and civilian; Australian, American and Japanese) he reconstructs in close, sometimes vivid, detail the events of 19 February 1942—Darwin's 'day of national shame', was how Mr Hasluck, then Minister for Territories, described it at a later date, thereby rousing the ire of Territorians far and wide. One angry citizen wrote to the Editor of the *N.T. News* accusing Mr Hasluck of 'eating our salt, drinking our beer and insulting his hosts by declaring that this was our national day of shame'. But another correspondent, more with Mr. Hasluck than against him, wrote that 'in a similar emergency the Alice Springs Derby would be on again, with a bigger field and a better track'. Indeed the author himself provides plenty of evidence that though there were many who stood staunchly to their posts—practically everyone, in fact, who had a job to do — there were many others that day who ran fast and far.

It was a useful exercise for Mr Lockwood's talents: the first and by far the largest raid on the Australian mainland, in which the Japanese apparently used 188 aircraft (36 fighters, 71 dive bombers and 81 level bombers) plus 54 land-based bombers in a second attack that day. Probably 250 people were killed and about 320 wounded. Nine ships were sunk, four others beached but later salvaged and ten more damaged.

The figures of attacking aircraft, quoted from Mr Lockwood, are about 100 higher than the generally accepted total — arrived at after an analysis of Australian observers' reports—but were provided by the Deputy Director of the Japanese Naval War History, have been verified by the Japanese air attack leader, Commander Fuchida, and in fact agree with a Japanese post-war account, 'Invasion of the Dutch East Indies', translated by the Allied Translator and Interpreter Section in 1948 and quoted in the Australian naval official history. I well remember the many hours spent by a War History researcher in painstaking study of the Australian observers' reports in an endeavour to arrive at the true total of attacking aircraft. The answer, it now appears, was available all the time.

Mr Lockwood's is the longest and most detailed account of the February 1942 raids ever likely to be published, but not — one regrets to say — the clearest. His picture of the events tends to be

obfuscated by the arrangement of the detail, some of which, to this reviewer, seemed trivial, and some of which is repetitive, though perhaps necessarily so.

The Australian Service viewpoints—Army Navy, Air Force and medical—have already been expressed in four published volumes of the official history. A fifth account—the civilian — NT administration point of view — will be provided in Mr Hasluck's second volume of the official history. The published official accounts of the raid already total some 18,000 words, and it has been described in fairly close detail in several other works. Mr Lockwood is aware of this as his bibliography and frequent quotations from the official history make clear. Consequently it is surprising to read in his introductory notes that 'comparatively little is known of what happened [at Darwin]. Two or three writers have discussed it only briefly. The Official War History, in each of several volumes, gives the barest outline. Few Australians know that part of their country was so heavily attacked.'

In fact, it is doubtful whether any episode of comparable military interest has been described in the Australian official histories in so much detail as the raid on Darwin on 19 February 1942. If Australians lack knowledge of the raid, it could hardly be for want of publicity.

If it is hard to agree with Mr Lockwood on this point, on another issue it is almost impossible to disagree with him.

> It seems to have been a regrettable decision (he writes) apparently deliberately taken, that airmen who distinguished themselves while others were doing the opposite were neither commended nor decorated by their Service. The names of several were sent to the Air Board with appropriate recommendations. Air Chief Marshal Scherger has remembered what he describes as the 'superlative behaviour' of a number of officers and NCOs. 'They were magnificent and it seems odd indeed that they were not recognized,' he told me. From an entirely different source it has been learnt that the Air Board's reaction, expressed in colloquial terms, was broadly, 'You don't give gongs for a schemozzle'.

Earlier Mr Lockwood describes an episode in which a British naval officer unearths a second reason for not recommending decorations. He was Lieut-Commander Symonds, who commanded the examination vessel HMAS *Southern Cross*. He records of his crew that 'the bravery and devotion to duty shown by every officer and man, all in equally exposed positions, in picking up *Peary's* survivors, excludes the possibility of distinction of individuals'. Symonds, by the way, received an m.i.d.

It is perhaps a sad commentary of the times that in World War II some commanders seemed fonder of finding reasons for not writing citations than for doing so. Another reason, quoted by Gavin Long in *The Final Campaigns,* was given in the interim history of the 2/2nd Battalion, whose chronicler claimed that, in the matter of decorations, the battalion 'imposed its own standards; and those standards have been rigid to the degree of harshness'. At that stage

(mid-1945) the battalion had fought in four campaigns — Libya, Greece, Papua and Aitape-Wewak; it had been nearly six years at war, yet no subaltern in the battalion had been awarded a Military Cross!

It is to be hoped that Australian appreciation of the value of awards for active service — their influence on the army's public image, their impact on recruiting and unit *esprit de corps* — is more realistic today. However, in a thesis written recently at Staff College an officer claimed that a comparison between the number of decorations awarded to British troops in Borneo and the number awarded to Australian would be startling. He cited the number of decorations awarded in World War II to an Australian battalion and to English and New Zealand ones in order to demonstrate that English units had been and were still being rewarded on a more generous scale. Such comparisons, however, are not valid. What was clear in World War II was that the number of decorations won by a battalion was largely dependent on the will of the battalion commander. Given action, deeds of gallantry were common enough, perhaps always will be in Australian units. If there is someone to write adequate and convincing citations and a C.O. prepared to back them, no Australian battalion is likely to suffer by comparison with any unit in any army.

What has been noticeable about some recent awards to Australian soldiers for service in Vietnam is the length of time that elapses between commission of an act and promulgation of an award. For example, on 7 December 1966 the Press published the names of four Australians who had distinguished themselves in Vietnam. One was a battalion commander who had been awarded the DSO for service over the period December 1965 to May 1966. The DSO traditionally is a battalion award and the battalion takes pride in celebrating it as such. When the award was announced the battalion had been out of action for seven months; the commander was in another post half a world away. Another officer won the Military Cross for an action which took place in November 1965; a warrant officer a DCM for an action in December 1965; and a corporal the MM for an action in February 1966. On 15 December 1966 the Press announced the award of the Victoria Cross to Warrant Officer Wheatley for an action that had taken place thirteen months earlier.

There has latterly been some improvement, but even so the term 'immediate award' seems to have lost some of its significance. In this regard at least World War II set better standards. For example, the honours and awards for the Cyrenaican Campaign (January-February 1941) had been approved by the Commander-in-Chief and announced in AIF Orders (Middle East) on 28 March. Lieutenant F. W. Cook (now DDMT at AHQ) won the MC for an action which took place

at Tobruk on 3-4 May 1941. The award was announced in AIF Orders on 28 June, and this time was about average. Why then the delays today? Are more hands than necessary intervening on the decorations trail between originator, Chief of the General Staff and Prime Minister? In World War II the Governor-General Lord Gowrie appears to have had power to confirm immediate awards in the SWPA — a sensible arrangement for a war in which at that stage the United Kingdom was not closely engaged. The case for a similar arrangement for Vietnam is perhaps even stronger today.

— A. J. S. □

MALAYA: THE COMMUNIST INSURGENT WAR 1948-1960, by Edgar O'Ballance. (Faber & Faber, 1966, 30s sterling.)

Reviewed by Lieutenant-Colonel R. S. Garland, MC

EDGAR O'Ballance has attempted a critical and pithy summary of the history of the Malayan Emergency. It is of particular interest to all who wish to widen their knowledge of techniques that can be used to defeat an insurgency situation.

The narrative traces the birth and development of the Malayan Communist Party before 1939 and gives an interesting account of communist duplicity during World War II.

The author portrays the post-war confusion that led to the MCP decision to wage open insurrection, and the reasons for this decision and the factors that led to the abortion of the venture are skilfully argued.

The book gives a detailed account of the measures introduced by General Briggs and General Templer to gain the control and support of the population and so isolate the guerilla from his intelligence and logistic support. There are many lessons which were learnt during this phase that have application to other insurgency situations. It then narrates briefly the ensuing decline and defeat of the Communist Terrorists in the field.

The publication is valuable as an historical narrative of the history of the Emergency viewed from the political angle. The military issues, however, are only sketchily covered, although the basic military concepts which were employed are outlined for the reader.

The book is interesting but very repetitive in detail. Mr. O'Ballance attempts to explain this away in his preface by stating that 'readers may notice a certain amount of repetition of detail. I make no apology as this serves to emphasize vital factors and points'.

I am unconviced by this admission. I also found that the narrative tended to meander through the years in such a way that the exact sequence of events became confused. These faults would have been corrected by efficient editing.

Chapter 9 is titled the 'Key to Victory', and being virtually a review of the book thus provides further repetitive detail. O'Ballance has made no real effort to deduce those lessons which may have application to other insurgency situations under differing circumstances as in South Vietnam. I feel that he has thus missed an important area which could well have been included.

Notwithstanding the above criticisms the book is a valuable contribution to any library on counter-insurgency warfare, and is recommended for general reading. □

INTENTION CLEARLY EXPRESSED

The responsibility will immediately fall upon each line unit therefore: not only to maintain intact the line and territory which it takes over; but also to put in hand at once a policy of aggression against the enemy; to exert and maintain a superiority of morale over him; to systematically wipe out his forward posts and to occupy with its own troops the same ground, and thus incessantly to exert pressure upon the enemy and relentlessly drive him back bit by bit on battalion fronts, under arrangements made within battalions. It is to be made perfectly clear to all ranks that we are not simply there to hold a line; but that we are there definitely with the purpose and intention of regaining ground previously lost, and of inflicting loss on the enemy by every means in our power.

— 18th Brigade Memorandum to Commanding Officers on the conduct of the defence at Tobruk (quoted in Barton Maughan, *Tobruk and El Alamein*, 1967).