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THE ARMY: LOOKING FORWARD IN A RECESSIONARY ENVIRONMENT

Jeneral Tan Sri Dato' Zain Hashim
Panglima Tentera Darat

After tracing the background of the 1979/80 Army Special Expansion Plan, the article focuses on the readjustments to the plan made necessary by the current economic recession. The cuts have inevitably affected force expansion, force modernisation, procurement of new equipment, movements and activities, as well as tertiary education. Nevertheless the Army is pressing ahead with measures to improve its battle-discipline, doctrinal shortcomings, organisational weaknesses, quality of manpower, esprit de corps, weapon systems and logistical support.

HISTORICAL OVERVIEW

Except for a brief stint in the Congo (now Zaire) from 1961 to 1963, as part of the United Nations Special Forces, and

the experience of the unfortunate Konfrontasi episode of 1963-66, our Army has traditionally been inward-looking. This inward focus was partly the natural outcome of our prolonged preoccupation

with the internal communist threat. Even during the Konfrontasi, we were really not looking beyond our immediate borders. The skirmishes that we had, despite the sporadic sounds of artillery, never developed into anything more than a very limited and undeclared war. In keeping with our national posture, our actions in this affair were purely defensive in nature.

However, over the last decade or so, there has been a gradual shift from this internal fixation to a perception that the Army would have to take on a broader role to cope with external threats as well. Heretofore our strategy against external aggression had relied upon the assumption that, if we were attacked, Britain would come to our aid as provided for in the Anglo-Malayan Defence Agreement (AMDA) signed on the attainment of Merdeka. To put it in another way, the threat of overt external aggression was a remote possibility while we enjoyed the military protection afforded by AMDA. But then, following the end of Konfrontasi, Britain began to reduce her military commitments east of Suez. This process culminated in her military disengagement from this region in 1971 and in AMDA giving way to the Five Power Defence Arrangement.

Being thus forced to fall back upon our own resources and initiatives to safeguard our security, our Government steered the country more and more towards neutrality and regional cooperation. Our own experience and that of many other developing countries had suggested that the main threat to our security would continue to come from internal subversion and insurgency. The appropriate means to counter such a threat was not so much military strength and modern weapons as economic strength and regional stability. Accordingly, we pursued these latter goals through ASEAN. In the meantime we also built up bilateral arrangements with Thailand and Indonesia under the auspices of the General Border Committees (GBCs) to enable us to deal effectively with the communist terrorists, the *common enemy* lurking in the border areas. Simultaneously with these initiatives, the Army and its sister Services were expanded within the limits of our economic,

social and technological resources.

EXPANSION OF THE ARMY AND ECONOMIC RECESSION

The developments which took place in Indochina in the first half of the 1970s — the withdrawal of American forces from Vietnam and the fall of Saigon and Phnom Penh to the Indochinese communists — had a traumatic effect on us as well as on the other non-communist countries of this region. However, we believed that, beyond encouraging the local communists to raise the tempo of their subversive and terroristic activities, the developments in Indochina would not lead to external threats to our security. We thought that the Vietnamese communists, having fought for 30 years and won, would settle down to peaceful reconstruction. We looked forward to a long period of peace in Southeast Asia. However in December 1978 Vietnam moved into Kampuchea. This move created the perception that Vietnam might use its military strength to venture further adopting, perhaps, the communist strategy of infiltration, subversion and guerrilla warfare.

Two important conclusions could be drawn from this brief resume of developments affecting our security.

- * Only true peace, freedom and neutrality in Southeast Asia would allow the countries of the region to pursue their legitimate aspirations and fulfil their destinies unhampered by 'jitters'.
- * Should peace be threatened, there would be no substitute for a credible deterrent force to dissuade the potential aggressor and safeguard our national sovereignty and territorial integrity.

In the light of these conclusions, the realistic stance to take would be to hope for peace while being fully prepared for the eventuality of war. With this in view we launched a Special Expansion Programme in 1979/80 covering all aspects of our military organisation, manpower and logistics. We had a single-minded purpose — expand and forge ahead irrespective of impediments. Within our means,

we responded well to this purpose, though not without short-term sacrifices.

Then came June 1982. The country could no longer avoid the ill effects of world-wide economic recession. Some readjustments in the budget became necessary to cope with the economic slowdown. Like all the other sectors, the Army was affected by the economy measures taken by the Government. The budgeting constraints necessitated cuts in all areas of Army expenditure, which meant a readjustment to our ambitious development programme. Force expansion, force modernisation, procurement of new equipment, movements and activities and tertiary education were all affected. As a result, our budgetary management, which has always been centrally controlled, has now become a major responsibility for all staff and commanders. Our investments must, by necessity, be very selective and limited.

As a result of the budget cuts, the familiar words of the earlier days, such as 'expansion' and 'procurement', have given way to new slogans such as 'consolidation', 'underimplementation' and 'suspension'.

This situation has given rise to the following questions:

- * Where do we go from here?
- * Are the assumptions and the appreciation which led to the earlier expansion programme no longer valid?
- * With the economy measures taking effect, will we have the military resources and will to meet the potential challenges if they materialise?
- * What is the Army posture for the immediate and mid-range future?

The answers lie mainly in our perception of the internal and external threats which confront us now and which are likely to confront us in the foreseeable future. This paper will therefore attempt an assessment of the threat situation and a determination of the range of capabilities required to meet the threat situation. It will then go on to outline some of the measures being taken to acquire those capabilities within the budget constraints without losing sight of the

long-term need for expansion, force modernisation and better efficiency.

THE THREAT SITUATION

Despite the pursuit of conflicting interests by the two superpowers, we can discount the possibility of a general war breaking out because both parties appear to be well aware of the calamities of nuclear war and, therefore, remain determined to avoid a direct confrontation which could lead to a general conflagration. This assessment does not, however, preclude the possibility of a limited war involving Malaysia.

There are several issues which may trigger off such a conflict. In the main they are territorial, economic or ideological in nature. There are the conflicting claims over the islands in the Spratly group. Then there are the differences over the delimitation of exclusive economic zones (EEZ), contiguous zones and territorial waters. The economic resources of the sea are the focal point of these disputes.

The major cause of tension in South-east Asia, however, is still the overflow of the effects of the long war in Vietnam. Vietnamese actions in Kampuchea, its confrontation with China and its dependence and growing relationship with the Soviet Union are not reassuring developments for the peace, neutrality and stability of our region.

This situation lends itself to conjuring up the potential enemies of our country. Nevertheless, I can say with confidence that there is no country in the region which we can say with certainty is our enemy. Given the continuation of present trends, it is unlikely that any country in the region would start an all-out war against us — at least as long as we maintain a strong and credible deterrent force.

A more likely threat from outside is the possibility that an external power may attempt to exploit a serious internal security situation, should such a situation arise. Political or religious extremists or the communist terrorist organisation may try to create such a situation. The internal threat posed by the communists is familiar enough, for we have lived with it

for the last 35 years. The communist terrorists remain as a thorn in our flesh. It is heartening, however, to note that their attempt to reestablish themselves in the country has been thwarted by our unrelenting operations. Our efforts in this direction have been reinforced by our people's rejection of the Communist ideology and its propaganda.

TASKS AND CAPABILITIES

Having outlined the environment we live in, our main military tasks are too obvious:

- * Defence against internal security threats — already present.
- * Defence against low intensity conflicts resulting from frictions with unfriendly countries — a potent possibility.
- * Defence against a high intensity conflict involving an outside power which could threaten the survival of Malaysia — less likely in the immediate future, but a distant possibility as it has always been.

To meet these three tasks in full calls for the development of a very wide range of capabilities. The acquisition of such capabilities, however, is governed by several factors:

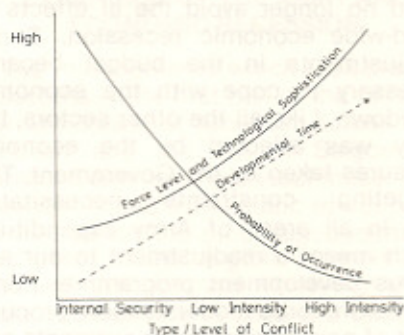
- * Our financial resources.
- * Our technological know-how.
- * Our capacity for sustained expansion (in terms of leaders, managers and planners at all levels).
- * The geographical separation of Peninsular Malaysia and Sabah/Sarawak.
- * Geopolitical realities.
- * Time.

These essentially restrictive factors make it impractical for us to go for the ideal force level and capabilities. A compromise has to be struck. A method of striking this balance is indicated in the diagram.

All things considered, we must develop the following characteristics:

- * Flexibility — Weapons, equipment, organisation and training must be such as to meet a wide range of operational roles and contingencies.

Searching for the Dynamic Equilibrium in Force Level/Capabilities



- * Mobility — We must be able to move our fighting men to all parts of the country. Here we must develop internally, and the Air Force and the Navy must also develop this aspect in concert. Interdependence and cooperation between the Services remain the main objective. Reliance on civil means is also unavoidable.
- * Interoperability with our Friends — We must attempt to operate beyond the GBC level.

A non-recoverable resource is time. Unfortunately, our preoccupation with internal security tasks and routine matters has resulted in less-than adequate attempts to formulate our own Army doctrines. Our solutions invariably reflect which staff colleges we attended. We are judged primarily on the eloquence with which these solutions are articulated. Whilst it is desirable, healthy, and sometimes even imperative, that we have different solutions and approaches to problems, this should come only after an understanding of a common perception of the modus operandi. Which means that we must have our own Army doctrines.

OUR DIRECTION

Over the years, with the establishment of our own Armed Forces Staff College (AFSC), our own doctrines have begun to emerge. An example is the KESBAN, which has become the crux of the National Doctrine in tackling our internal security problems. To accelerate the for-

mulation and development of all Army doctrines, we have formed an Army Doctrine Committee, under the chairmanship of the Commandant of AFSC. The Committee's tasks are primarily:

- * Formulate and develop Army doctrines for land warfare.
- * Review all existing land warfare doctrinal publications.
- * Initiate and approve proposals for amendments to doctrinal publications.
- * Produce the Malaysian Army Journal — SOROTAN DARAT.
- * Monitor and observe the doctrinal aspects of Army Exercises.

In addition to our doctrinal shortcomings, the 1979-83 expansion plan had recognised, and intended to correct, some very obvious shortcomings in respect of:

- * Organizational disposition.
- * Level and quality of manpower.
- * Weapon systems to meet higher levels of threat.
- * Armour "punch" and anti-armour capabilities.
- * Logistical support.

Shortage of funds, relative peace and stability, economic slowdown and increasing choices in job opportunities and vocational options outside the Services, are not conducive to an Army's expansion. On the other hand, it is in peace that we must prepare for war — an event we pray will never come, but for which we must be fully prepared, and if it comes, we must win. An Army takes on a war mission with only one objective — to fulfil that mission successfully, efficiently, and with minimum casualties to our troops. A losing army is not a good army. So, our expansion must continue; only target dates will be adjusted. In a way, the slowdown caused by the budget cuts is not altogether unfortunate, for it allows us to take a second look at our plans, to consolidate and "top up" deficiencies which have been revealed.

The breathing spell should also allow us to focus on morale, discipline and leadership aspects which were not given sufficient attention in meeting the demands of expansion in the period of

1979-80. Leadership at all levels has been diluted and stretched thin to fill new appointments resulting from the expansion. It has not been possible to prepare the leaders adequately for their responsibilities because of insufficient training time, frequent turnover of leaders and lengthy periods of sustained operational deployments. All these imbalances are now being consciously corrected. Some units have been suspended and their personnel posted to fill urgently required establishments.

In vehicles and equipment, we plan to achieve a minimum of 80% of the establishment. Unit training and regimental activities are being encouraged in order to develop esprit de corps, physical fitness and operational efficiency. Regimental customs and traditions are being revived to return to the spirit of the sixties and the seventies. Our experience has shown that loyalty, esprit de corps and spirit are best inculcated, initially within the various Regiments and Corps themselves, and, from these, spread to the Army and the Nation as a whole. Loyalty to the Army must begin, first, in pride within the unit and the regiment.

Our fighting force consists, of course, not only of combat and teeth-arm soldiers. These soldiers must be well supported by combat support and service support units. The old adage that 'soldiers march on their stomachs' remains true as ever. A balanced force means that the Army not only has the "punch" to fight but is also adequately and promptly supported logistically. Towards this end, we are in the process of working towards a 'regional' concept of logistics, as opposed to the very centralised system hitherto practised. Specifically, we are currently looking into the following:

- * Expanding the Personnel and Service Support units to provide each Brigade with a Medical Company or Section, a Transportation Company, an Ordnance Field Park or Ordnance Maintenance Park, and, a Field Workshop. Each Division will also have a Medical Battalion, a Transportation Company, a Regional Ordnance Depot and a Regional Workshop.

- * Improving the communications between the supporter and the supported and those within the Personnel and Service Support units, by providing them with adequate radio sets.
- * Revising and updating our Equipment Tables and fully equipping all units in accordance with the new tables.
- * Updating our General Staff Requirements and Specifications.
- * Improving our procurement and supply procedures.
- * Establishing Regional Depots for POL, ammunition and rations to stockpile our war resources, with immediate emphasis on providing essential operational items and accommodation stores targeted for 1983.

The challenges which we face in meeting these requirements demand positive responses from all officers and men. For example, we will have to wrestle with and master new technology with the acquisition of the new generation of 'A' vehicles. As future battlefields get more sophisticated, so, too, will the requirements for the hardware to be employed on those battlefields. However, weapons and hardware are only as effective as the brains and hands that manipulate them. In other words, the human factor remains the most decisive factor in war. As such, training must remain the key to our efficiency, both for peacetime requirements and battlefield demands. Our training is geared towards four primary objectives:

- * To produce capable leaders at all levels.
- * To inculcate battle-discipline and tactical proficiency.
- * To optimise efficiency in individual and group handling of weapons and equipment and improve performance in all tasks and jobs.
- * To foster intellectual and professional development.

In line with the objective of battle-discipline, I coined the 'satu peluru satu musuh' maxim, which demands a high standard and strong sense of battle-discipline. The spirit of this maxim should also be carried into other aspects of soldiering, leadership and management

resources.

It is inevitable that 'something' has got to give way in a recessionary environment. This makes it that, in training, any form of activity which involves expenditure must be minimised or decreased. However, this restriction need not obstruct the attainment of our overall objectives, provided that we make some adjustments, show initiative, employ resourcefulness and resort to improvisation. Instead of one battalion exercise per month for every brigade, units are now required to conduct only one test exercise per annum. Combined and bilateral exercises overseas are also being curtailed in terms of force levels. Instead, field training at platoon and company levels, study periods, TEWTS and CPX are being emphasized. In order to expand training capacity, some basic courses are being run in the Divisions to enable Army schools to concentrate largely on 'advanced' courses with bigger intakes. For instance, Pusat Latihan Darat (PULADA) and Latehan Tentera Darat (LATEDA) are expanding their intakes by 100 per cent, other Corps schools (except POTERA) by 15 — 100 per cent and Sekolah Jurutera Letrik dan Jentera by 82 per cent. There is no longer any necessity to carry out recruit training in PULADA and LOK KAWI; all recruit training is being centralised at the Pusat Latihan Rekrut, Port Dickson.

'War Gaming' to simulate battlefield conditions will also be introduced this year. Towards this objective, an Army Battlefield Simulation Project Team has been formed. The first war game model, 'Tempor Pertama', was completed by the end of last year. War gaming is, of course, not an end in itself. It is only intended to complement tactical training activities. No amount of external training, however sophisticated it may be, can replace a commander's initiative and innovation in carrying out unit training. Therefore, war gaming, or other centrally planned and organised training, does not remove the burden of responsibility from commanders at all levels to be personally accountable for the battle efficiency of their men.

Tertiary education and overseas courses, too, have been drastically reduced.

ed as an interim measure. To partly compensate for this, officer cadet training is in the process of being overhauled. The Short Service Commission course has been lengthened from nine months to twelve — a need long felt. The Regular course, if found necessary, will be lengthened to three years, to incorporate the complete syllabus of the Sijil Tinggi Pelajaran. For the moment, the intellectual and professional development process has to be concentrated within our own military schools and the service environment, with a much reduced exposure to tertiary education and overseas courses, until better times.

CONCLUSION

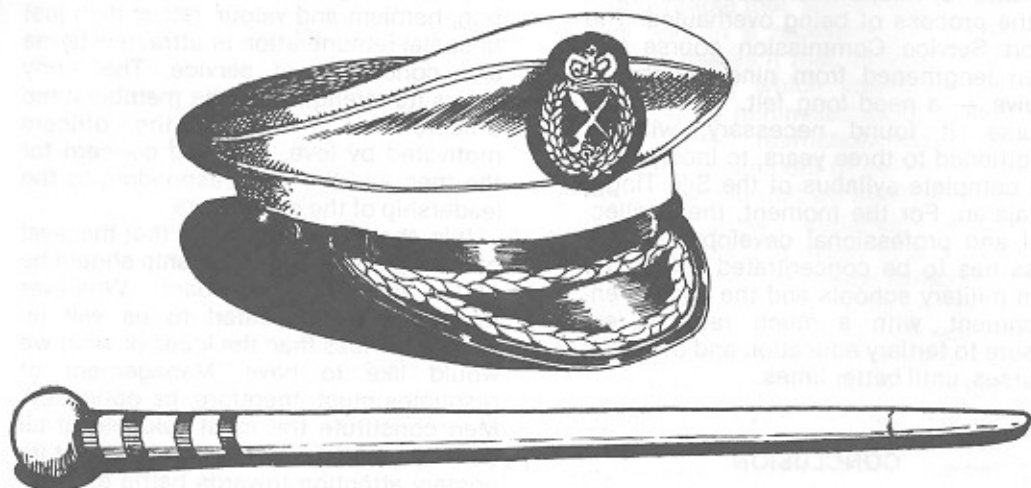
Our plan is good only if executed in all its intent and spirit. This is the time that demands a lot from all officers and men. The Army is a profession which, I hope,

draws men principally because of a 'higher calling', such as love for the nation, heroism and valour, rather than just financial remuneration or attractive terms and conditions of service. The Army draws its strength from its members: the officers and the men, the officers motivated by love, care and concern for the men and the men responding to the leadership of the commanders.

It is, therefore, imperative that the level of management and leadership should be of a very high standard. Whatever resources are allocated to us will invariably be less than the ideal, or what we would like to have. Management of resources must, therefore, be optimised. Men constitute the most valuable of all our resources. Leadership must direct its primary attention towards battle efficiency, for, in the final analysis, the business of the Army is to win battles. And towards this end, we must prepare ourselves in times of peace — recession or otherwise.

General Tan Sri Dato' Zain Hashim, the Chief of the Army, is a graduate of OCS Eaton Hall, RMA Sandhurst, the Staff College at Camberley, the Joint Services Staff College at Latimer and the Royal College of Defence Studies. Beginning his career in the Malay Regiment, he has been Chief of Personnel Staff, Brigade Commander, Commandant AFSC, Divisional Commander, Chief of Logistics Staff and Deputy Chief of the General Staff before being appointed to the highest position in the Army.





LEADERSHIP IN HIGHER COMMAND

Mejar Jeneral Dato' Hashim Mohd Ali

The following is the slightly condensed text of the lecture given by the General to the students of the Armed Forces Staff College on 13 October 1982. The General identifies three sets of forces which influence a leader and determine the kind of leadership he provides.

INTRODUCTION

When I received your Commandant's invitation to address the college on the fascinating subject of LEADERSHIP, I thought this would also allow me to know the subject better. Leadership is an integral part of our military way of life and it has become a subject discussed at all levels and by students of military history. I personally feel we must continue to explore this subject throughout our career to unravel more and more of the mystique which surrounds a good leader.

What I am going to say will in essence, cover LEADERSHIP IN GENERAL

although I have been asked to talk on the intricacies of LEADERSHIP IN HIGHER COMMAND. I shall cover as much as I can in the allotted time; any "left-overs" could be tackled during question time. In my talk I have taken the *general staff* as the level of *higher command*.

In the course of my talk, I will draw on my experiences both as staff officer and field commander at the various levels of my service career including my association with some of the foreign forces, especially those around us. I will of course speak of leadership in the Malaysian environment and would like to assume that you have done some reading

on Leadership. I shall endeavour to concentrate on military leadership but references to and comparison with leadership in the civilian sphere of activity are unavoidable and instructive. Leadership is not a one-dimension subject and I do expect views from you later.

FACTORS WHICH AFFECT A LEADER

Let me, first of all, categorise the various factors which affect a leader, whatever level he may be in and which could equally apply to the civilians. They are:

- * Forces within the leader.
- * Forces within the people being led.
- * Forces within the situation.

I shall develop my talk on these three factors as guidelines and, where possible, draw on certain case studies.

FORCES WITHIN THE LEADER

The military organisation is such that when we talk of a leader, it also involves the organisational structure that embraces that particular person and the group of people within the organisation. Hence you will find that unity of command will require the active and willing co-operation of all ranks of the armed forces in the execution of the war plan. It is only by effective co-operation that the component parts of any force can develop to the full measure of their strength. In order that their co-operation may be effective, each must know the capabilities and limitations of the other and then apply their knowledge in gaining and demanding assistance. Co-operation therefore must be achieved from the highest level of strategic planning to the lowest units and sub-units of the armed forces. The military leader works for the purpose of upholding his country's sovereignty and integrity and providing defence and national security. His primary responsibility is the accomplishment of the assigned mission. In pursuing and achieving this aim he is often required to inflict death or injury on the

enemy, simultaneously exposing his men and himself to equal risk.

The greatest challenge facing a leader is how he can make his men cooperate and give their best in fighting the war against the enemy.

Hence, the success of a military operation will naturally depend on the highest qualities of military leadership. How can a leader make use of these factors in his strategy and military operations and, above all, do so ahead of and better than his enemies? How can he organise his offensive, as well as maintain the secrecy of his plans, better and more effectively than his enemy? How can he rationally employ his forces in the theatre of war with the minimum possible cost in men and materiel while maintaining security and efficiency in his military operations better than his opponents? How best can he successfully employ the element of surprise before it can be used against him by his enemy? How best can he inspire his men with the truth of their cause and objective, create confidence in them and prepare them with a strong will and determination to fight? And, above all, how can he make them cooperate and give their best in fighting the war against their enemy?

The effective and successful employment of those elements I mentioned demands a leader with exceptional or very high qualities; a leader who can rise to the occasion and meet every situation with skill and wisdom; who can inspire confidence in his men and get their willing co-operation even under the great stress of battle and who can at the same time, also keep military initiative on his side; who can maintain a cool and balanced temperament in the heat of battle even in very grave and unfavourable military situations and think out a rational and successful solution without loss of time; who would be able to engage the enemy in battle tactics on his own terms until the strength of his enemy is weakened while conserving his own strength in men and materiel to overpower the weakened enemy.

A leader's courage must not only be reflected in time of battle where he leads his men but also in time of peace where he must be seen to stand by his men and fight for his men in all aspects of welfare and administration.

The military leader must be courageous and full of determination. His courage must not only be reflected in time of battle where he leads his men but also in time of peace where he must be seen to stand by his men and fight for his men in all aspects of welfare and administration. He must be brave to stand up to certain basic principles of command and leadership though realising how unpopular it may appear before his superiors.

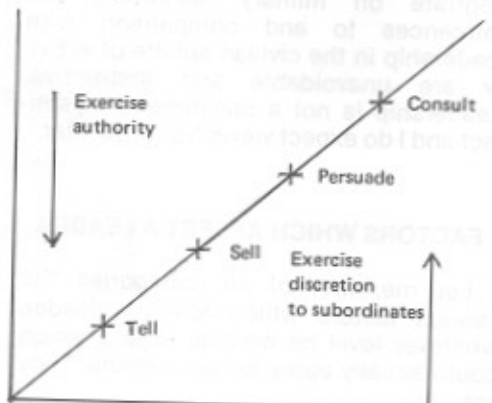
In practising welfare he secures their willing co-operation and improves their capability to perform the mission. Similarly a well-prepared, executed and accomplished mission is the best means of ensuring the welfare of his men. This is achieved through systematic training to condition the men to survive the rigours of battle.

The military leader is expected to set an example to his men in the performance of his duty. He should share in the dangers and hardships which they may be required to face and, above all, his moral and ethical behaviour must be unquestionable. He is also expected to possess certain permanent or inherent characteristics such as:

- * Bearing
- * Patience and Endurance
- * Personality
- * Dependability
- * Self-Control
- * Justice and Equality
- * Decisiveness
- * Integrity
- * Knowledge
- * Intelligence and High Degree of Initiative.
- * Good Cheer and Sense of Humour
- * Loyalty
- * Forward-Looking Attitude
- * Tact and Unselfishness

This chart indicates how the military leader should apply his personality and bearing together with the other leader-

ship characteristics in exercising his authority:



The Leadership style will depend on various factors and situations which I will touch on later. Nevertheless the leader is to decide whether it is to be very much authoritative or discretionary, i.e., employ Directive Methods or Participative Methods, as the chart shows. There are moments, such as in an assault phase, the leader is required to *tell* his subordinates what to do to achieve his aim. Yet there will be moments when in order for him to achieve maximum results and harmony, he may have to *sell* the idea or even *consult* his subordinates to achieve full participation. The personality of the individual will play a major role here and there is no DS solution to this problem of leadership style. However, regardless of the many individual personality differences among military leaders, the military remains an institution built on executive authority. It has to be that way. It is not democratic in the perception of the society it serves and there are moments it can never be democratic, primarily because the military mission is determined by a higher authority. This is the major difference between the military and civilian forms of leadership.

There may come a time in his career when a good military leader may find himself in disagreement with his superior. Here he is expected to have the moral courage to make his dissenting view known to the superior.

The military leader has also a follower's role. In this role, he adheres to the role and behaviour expected of him by his superior in terms of mission accomplishment, the welfare of his men and the traits mentioned earlier. As a subordinate leader he must repeatedly demonstrate the capability of understanding his role and adjusting to the requirements of his superior. This, however, does not mean that he should compromise himself at every available opportunity just to gain favour. There may come a time in his career when a good military leader may find himself in disagreement with his superior. Here he is expected to have the moral courage to make his objection known to him.

In his role as leader, the military commander must cultivate certain behavioural traits which are expected of him by his subordinates. They expect him to be concerned with their needs, to be helpful to them in satisfying their personal goals, to be friendly in his approach towards them while maintaining some social distance and to have a strong influence within the unit and the service. These, the leader cannot be, unless:

- * He shows an interest in his men.
- * He understands the men's needs.
- * He is helpful to the men and is approachable.
- * He recognises the men's abilities.
- * He is willing to back his men.
- * He gives the men a fair share of off-duty time.
- * He has a fair promotion policy.
- * He creates awareness of the importance of his unit's job.
- * He shows keen personal interest in his men's progress.
- * He keeps them informed.
- * He metes out punishment fairly.

It should be obvious by now that our government's slogan of BERSIH, CEKAP, AMANAH, which means CLEAN, EFFICIENT AND TRUSTWORTHY, fits very well also within the concept of military leadership.

A military leader will have the appropriate organisation to allow him to function effectively. We also have the chain of command for all to follow so that the mission can be accomplished effec-

tively and systematically. Leadership in higher command strictly follows this chain of command. To me, a chain of command is like a transmission wire. If you require the bulb at the other end to remain constantly bright, the energy that flows through the wire must be smooth with no interruptions. We have the various field Formation HQs which act as step-up transformers. If you get flutters down the wire, you will surely not have the constantly bright light. Leadership and Command, to a large extent, are synonymous. The study of military history will tell you the numerous occasions when directives from the top were not forthcoming resulting in utter confusion and eventual defeat. Defeat in war will normally result in much loss of life.

FORCES WITHIN THE PEOPLE BEING LED

A present-day military leader realises that in a complex world in which many different strands make up the thread which guides his decisions, he is expected to optimise a system containing diverse and often seemingly contradictory factors. Malaysia as a nation originates from its own geography and history. It takes its character from its culture, religion, race, the concept of justice that it has developed and ideas about how best to organise to meet the needs and aspirations of its people. Diversity in culture and religion, among others, must certainly have resulted in uniqueness that makes the possibility of common denominators in what constitutes effective behaviour, most improbable. Biologists find no meaningful differences among us. The dilemma between cultural diversity and biological similarity among people raises many systematic issues of leadership and behaviour. The military being a disciplined organisation and autocratic to a certain extent, does not regard the cultural diversity as a hindrance to achieving its mission in war as long as the training, discipline and leadership are adequate to meet the requirements. Now that I have touched on this aspect of human behaviour let me examine the forces within the people being led.

There are those who have to be driven to work and others who can be motivated to work.

McGregor has propounded a theory which places people under one or the other of two categories. Into the first category fall people who are assumed to be naturally lazy and whose inclination is to remain satisfied in not doing anything. They do not want to work. To remedy this, the leader has to exercise the authoritative style of leadership. The second category comprises people who are not necessarily lazy and idle, but are willing to work and can be motivated to usefully employ their talents. With such people, the participative style of leadership is effective. We can see these two groups in all societies and the Armed Forces is no exception.

Let me now relate this talk to my present command.

I have under my command, in 2 Div, 773 officers and 20,056 ORs making a total of 20,829 men and women. It may interest you to note the following facts about the service experience of the men under my command:

1 — 5 yrs service: 434 Offrs + 11072 ORs = 11506

6 — 10 yrs service: 153 Offrs + 4202 ORs = 4355

11 — 15 yrs service: 94 Offrs + 2916 ORs = 3010

16 — 20 yrs service: 63 Offrs + 1518 ORs = 1581

21 — 25 yrs service: 20 Offrs + 342 ORs = 362

26 — 31 yrs service: 9 Offrs + 6 ORs = 15

About 50% of the total strength fall within the category of young soldiers, with about 5 years of service and below and about 9% are those who have done at least 16 years of service.

To effectively command and lead such a disparate group of men is dependent upon a number of variables. The *maturity* of subordinates, I would consider, is the

most critical variable. In the context of work, I would define 'maturity' as willingness (motivation) and ability (competence) to perform an assigned task, as opposed to 'maturity' in the context of the biological aging process. Hence I have to initiate efforts to develop the confidence and self-respect of those with five years or less of service experience, for them to adjust to and meet military requirements. These requirements range from handling a simple shovel to operating sophisticated electronic and other equipment we have in the Army. Incidentally, the converse of this consideration is that the choice of equipment to be purchased must necessarily depend on whether the soldiers are ready to receive them and whether we have the infrastructure to maintain them.

Equally important is the quality and standard of training that we provide the soldier with. I quoted a figure of about 9% in my Division who have at least 16 years of service. We depend very much on this small group to inculcate in the others the expertise, traditions and virtues of the military profession.

Every army has a system of training for its individuals according to the roles and tasks given to the army. We in the military train our soldiers to be loyal to our country and to kill the enemy while preserving themselves. Likewise, the goal of the civil service of a modern state is to maintain the administration of the country. Therefore all emphasis in the training of civil servants is on faithfulness to the Government in power and on developing their administrative abilities.

The authoritative as well as the participative styles of leadership have their place in the armed forces.

Given the many variables, the military leader will have to decide what leadership style he is to adopt. His personal character and personality will, no doubt, be a major factor since success and failure will be attributed solely to his own self doing. Taking my Division as an ex-

ample, there are merits in adopting both authoritative and participative styles of leadership. I would consider it appropriate for a leader to apply the authoritative stance to the young soldiers whereas the participative approach would be more appropriate to the older ones.

In summary, when we consider the forces within the people being led, we take note of:

- * The competency of the group.
- * The confidence they have in themselves and their leaders.
- * Their educational standard and experience.
- * Their dedication to work and level of discipline.
- * Their quality in all aspects.
- * Their integrity and loyalty.
- * The quality of equipment they would use.

These points will dictate the leadership style the person in charge is to adopt.

FORCES WITHIN THE SITUATION

The third factor I would like to discuss is the forces within the situation. Military leaders today face several problems which are related to situational factors rather than to purely military problems. Of course, such situational problems appear more complex to the more senior officers, especially those in Higher Command than, say, to the Battalion Commander. This is understandable as the Battalion Commander accepts orders from his Brigade Commander who would have considered all factors before he issued the orders to the Battalion Commander. Nevertheless there are situational factors which affect leaders at all levels.

Let me begin with military tradition. Military tradition is one factor which I consider extremely important in any army. Some armies draw their traditions from days well before the rifle was invented. Our Army will be 50 years old in 1983; the nation is only 25 years old. Until recently we used to have the Trooping the Colour ceremony held annually at the Merdeka Stadium. To the public, this

ceremony is a tradition of the Army, an occasion to witness the pomp and pageantry associated with the Army. On important occasions the Army also holds tattoos for the public, another tradition of the Army. To the vast majority of the public, this is a fun fair — a 'temasya' —, a grand spectacle in scope and excellence.

Leadership is not merely driving one's subordinate forward but, at its best, is the concept, 'Follow me'.

Why does the Army, unlike other national organisations, indulge in such practices? Is there any link between the pomp and pageantry of parades and tattoos and the grim business of war? Indeed, there is a greater purpose in sticking to these traditions than providing entertainment for the public. The public may believe that things get done automatically in the Army. Perhaps they think it is just a matter of giving orders. They attribute it to discipline. The fact is that military traditions, which are perhaps little more than a source of entertainment to the public, are one of the important means of inculcating military virtues, building up military professionalism, fostering discipline and dedication and developing that 'automatism' which the public associate with the military.

To an outsider many things done by the Army in the name of tradition might seem strange, outmoded and even bizarre. One of the best-known traditions of all armies of the world is the 'salute'. To some people the very act of saluting is a vestige of feudalism — a person lower in rank by saluting a senior performs an act of 'obedience'. On the contrary, this ceremonial action is an accepted tradition where the hierarchical structure of an organisation is openly recognized. A junior salutes his senior not as a kowtow but in the spirit of comradeship. Equally important is the salute which the senior gives in reply, confirming the bond between the junior and the senior. The standard of saluting is an extremely good indicator of the discipline and morale of any unit or formation.

No man is so brave that he never thinks of fear. The soldier, more than any civilian, is constantly in danger and has constantly to fight off his fears — of death and injury, of physical hardship and, even more so, that he will be seen by others to be afraid.

Traditions begin to create in the mind of the recruit a way of life. Without traditions, the Army would be no better than civilian organisations. It could be rife with discontent in the same way as other organisations which cannot take full pride in themselves and in which cohesion between the superior and the subordinate is not as important as in a war-winning organisation. Traditions help in fostering the soldier's pride in himself and the organisation to which he belongs. They also help in another even more important way — in helping to maintain the soldier's courage. No man is so brave that he never thinks of fear. The soldier, more than any civilian, is constantly in danger, and has constantly to fight off his fear of death and injury, of physical hardship and, even more so, of facing constantly the thought that he will be seen by others to be afraid.

If the Argentinian Army were to have the same traditions as the British Army, we could expect the Falklands War to be bloodier than it actually was. I would dare say, the British won not only because of the good planning and able leadership but, more so, because of the long-standing traditions of the British Army.

Traditions are the cementing bonds which make the Army unique, working for something more than its pay. Traditions have inherent morale influences, of devotion, courage and fidelity which bind its members to each other and the nation.

I have laboured at length on tradition and let me skim through the other situational factors which affect military leaders in higher command. They are, mainly, the political, economic and social factors. It would be foolish of any senior military leader to ignore the political re-

quirements or the economic considerations in preparing his strategic plans to defeat the enemy. In a democratic country the military is subservient to the civil administration and our decisions are guided by the directives given by our political masters. However, we are also to assume that our political masters are mature enough to allow the military leaders to conduct the mechanics of war in the manner the military knows best. Trust and confidence must prevail and with a strong sense of personal integrity and loyalty, the military leader should get whatever he wants from his political masters, barring certain limitations and financial constraints.

Other situational factors are the threat to the nation and the organisations and agencies which exist to meet such threat. One of the roles given to the Army today is participation in nation building and, hence, military leaders are exposed to the various behavioural patterns within the civilian world which can at times be very frustrating.

CONCLUSION

In conclusion, I would say the Army strives to do its best. The preoccupation of any army is to win war and it cannot assume the stance of **SECOND BEST** because only the **BEST** wins wars and the second best ends up the loser.

A military leader has a heavy responsibility as he is a leader of men, unlike our civilian counterparts who are administrators. We improve ourselves not because we like to, but because we have to. Foreign forces have an influence on us as we cannot lag behind too far. We look outwards, whereas our civilian colleagues look inwards to ensure that the best is provided for the people.

Leadership style depends on several factors other than character and personality.

The military is a disciplined organisation trained for war. It is an organised body with specific capabilities, an institution built on executive authority. It is not

democratic in the view of the society it serves. The military leader has to weigh the many complex variables before he

gives his command to ensure that his mission is accomplished with the full cooperation of his subordinates and men.

Mejar Jeneral Dato' Hashim Mohd Ali is the General Officer Commanding 2 Division. He is a graduate of OCS Eaton Hall, RMA Sandhurst, the Staff College at Camberley, and the National Defence College, India. Among his major appointments have been those of the RASCOM command in Sarawak and Brigadier General Staff and Chief of Operations Staff at the Ministry of Defence. The General has had wide contacts with the militaries of several countries.





1933 — 1983

50 YEARS OF THE MALAYSIAN ARMY

The author of this article wishes to remain anonymous. — Chief Editor

This article attempts to trace very briefly the growth of the Malaysian Army over the fifty years of its existence and the internal and external developments which necessitated this growth.

'For if the trumpet give an uncertain sound, who shall prepare himself to the battle?'

INTRODUCTION

On 1 March 1983 the Malaysian Army celebrates its golden jubilee. In common with the armies of many of the nations

which have gained independence from colonial rule in the post-World War II era, it shares the distinction of being older than the nation itself. It might have been even older but for the misgivings of the

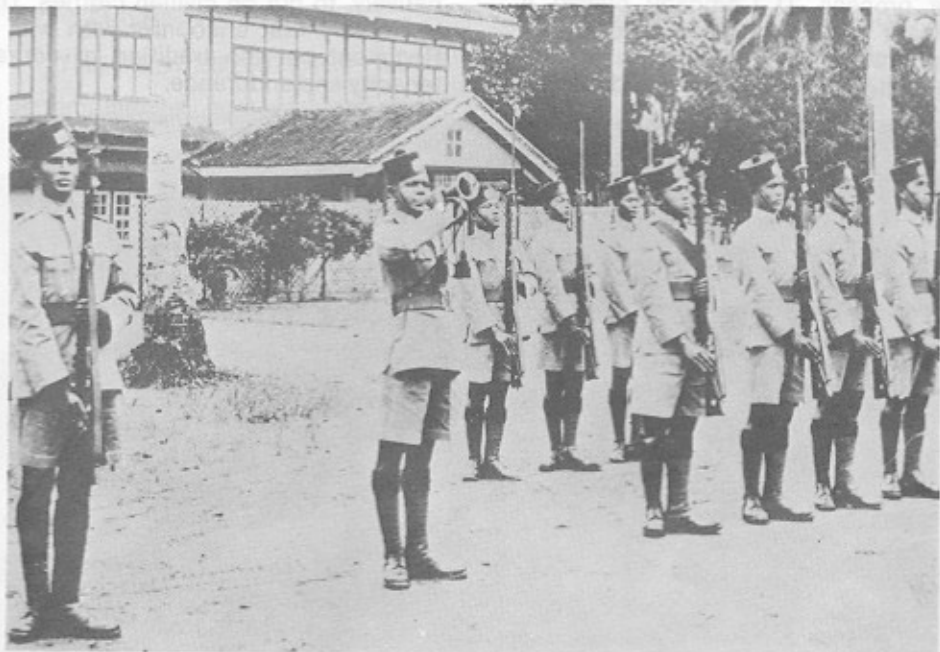
British colonial authorities that the "individualistic" and "warlike" temperament of the Malay would not render him amenable to 'the discipline of the parade ground and the barrack room'. For, the idea of a body of Malay troops for 'the military defence and protection of their homeland' had sprung up in the second half of the 19th century. It was in 1932 only that a host of political, economic, financial and administrative considerations emerged to overcome the colonial rulers' misgivings and persuade the Colonial and War Office in London to approve *in principle* the formation of a Malay Regiment. 'In principle' meant that the implementation of the venture would depend upon whether or not the first recruits — an Experimental Company to be assembled for military training on 1 March 1933 — turned out to be of equal military value to that of the Indian troops then engaged for the defence of the Federated Malay States.

EARLY DAYS

Thus it was that the nucleus of the Malaysian Army came into existence on 1 March 1933 with the first 25 recruits of the Experimental Company reporting to Port

Dickson for training on British Army lines, under a small group of seconded British officers and SNCOs headed by Major G. Mc. I.S. Bruce. The 'experiment' proved so successful that, in mid-1934, it was decided to form a complete battalion. Following this, steps were taken for the construction of permanent barracks for the men, officers' quarters, battalion parade-ground, a rifle-range, a guard-room, etc. at Port Dickson. The title 'Malay Regiment' was officially assumed on 1 January 1935. The first four Malay officers were commissioned on 4 November 1936. The Regiment attained the full strength of a battalion by October 1938, with three rifle companies, a support company equipped with Vickers machine-guns and a headquarters wing.

In the meantime, the Regiment had earned high praises for its standard of smartness and 'superlative drill' and for showing 'considerable discipline and restraint' while on strike duty at the Malayan Colliery's coalfields at Batu Arang. But it was still to undergo, in the words of Lieutenant-Colonel Bruce, the first Commanding Officer of the Regiment, 'the vital and searching test of war to bring it to its army manhood'.



The Experimental Company, Malay Regiment (1933)

WORLD WAR TWO

This test was not long in coming. War broke out in Europe in September 1939. Japan became a signatory to the Tripartite Pact with Germany and Italy and, subsequently, occupied north Indo-China. It seemed only a matter of time before the war would spread to the East. As part of the preparations to meet this eventuality, the Malay Regiment's training programme was intensified and its fire-power increased through the acquisition of two and three-inch mortars, anti-tank rifles, Bren-gun carriers and other modern weapons. The Regiment was also expanded; its 2nd Battalion was officially formed on 1 December 1941, just seven days before the Japanese invaded Malaya.

The distinction of getting the first taste of the ordeals of war befell A and D Companies of the 2nd Battalion then deployed in Kota Bharu and Sungei Bakap respectively. It is now history that, unable to match the cunning and superior tactics of the invading Japanese forces — 'the most formidable fighting insects on earth' —, the British forces retreated down the peninsula towards Singapore. A and D Companies joined this retreat and, in the process, D Company played a significant part in the defence of Seng-garang airstrip south of Batu Pahat. For his 'excellent work' in this and subse-

quent operations, Lieutenant Ibrahim Alladitta won the Military Cross.

The 'vital and searching test of war', for the Malay Regiment as a whole, came in the final stages of the war, in the Pasir Panjang sector of Singapore. The Regiment, about 1,400 strong and forming part of the 1st Malaya Infantry Brigade, was deployed for the defence of the 'W' sector of Pasir Panjang coast. The Japanese invading forces landed north of Pasir Laba on 8 December 1942, broke through lines held by Indian and Australian troops and advanced down Chua Chu Kang and Jurong roads towards the Malay Regiment sector. The fighting that ensued lasted until 15 February, the day of the British surrender. The Japanese pressed their attacks with artillery, mortars, tanks and airplanes. In resisting the Jap assault on 'Opium Hill', C Company 1st Battalion almost fought to the last man and the last round: only one officer and three ORs survived the carnage. Lieutenant Adnan Saidi, one of the officers who fell in this battle, was hung upside down from a tree by the Japs, presumably for offering ferocious resistance. About ten days after the surrender, at least five of the captured Malay officers were executed by the Japs for refusing to serve under them, or, alternatively, to put on civilian clothes. Thus, in its very first encounter with war, the Regiment set the tradition of courage, tenacity and endurance.



2nd World War: The Pasir Panjang Battle

The performance of the Regiment in the war is best summarised in the words of Lieutenant-General A.E. Percival, G.O.C. Malaya 1941/42.

When war broke out in the Far East, the Regiment was in the process of expansion. In consequence like many other units of our Imperial Forces, (it) was not fully prepared for the ordeal which it was to face. Nevertheless these young and untried soldiers acquitted themselves in a way which bore comparison with the very best troops in Malaya. In particular, by their stubborn defence of the Pasir Panjang Ridge at the height of the Battle of Singapore, they set an example of steadfastness and endurance which will become a great tradition in the Regiment and an inspiration for future generations.

Japan accepted unconditional surrender in August 1945 and, within 24 hours, the veterans of the 1941/42 campaign began reporting for duty. Such enthusiasm and loyalty led to the Malay Regiment being revived on 6 September 1945. By December 1946, it reached its pre-war strength of two full battalions and a Depot at Port Dickson.

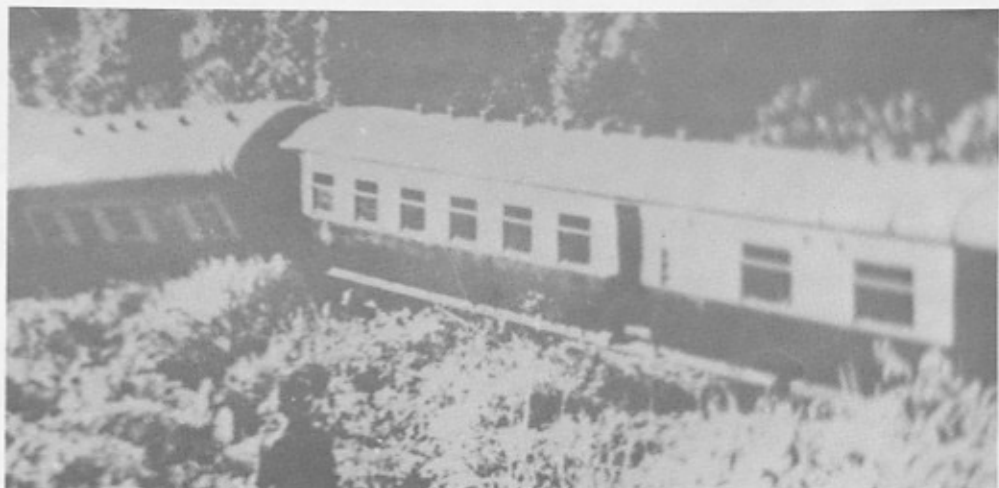
THE FIRST EMERGENCY

The immediate post-war period in Malaya was one of turbulence. After fail-

ing to capture power through political agitation and labour unrest, the Malayan Communist Party launched an armed rebellion throughout the country in June 1948. The government having declared a state of emergency to deal with the situation, began expanding the Malay Regiment and the Police as well as raising auxiliary units to eliminate the communist terrorists (CTs) operating from the jungle and its fringes. The 3rd Battalion, Malay Regiment, was formed on 1 July 1948; the 4th on 22 November 1949; the 5th on 31 April 1951; the 6th on 1 May 1952; the 7th on 1 October 1953. (Troops from Britain, Australia and New Zealand, Gurkhas, Fijians and African Rifles were also engaged to suppress the rebellion).

The CTs employed the hit-and-run tactics of guerrilla warfare and relied heavily on the elements of surprise, deception and ambush. These methods being different from those of conventional warfare and new to regular forces, the Malay Regiment (and the other military units engaged in suppressing the rebellion) had to devise new techniques to deal effectively with the CTs. Initially it was a case of learning as they went along. The British set up the Jungle Warfare School at Kota Tinggi to study the problems in depth and come up with counter-techniques.

Typical of the tactics employed by the CTs and the early problems these created for the security forces, was the ambush of No. 12 Platoon of D Company, the 3rd Bat-



First Emergency: Derailed Train

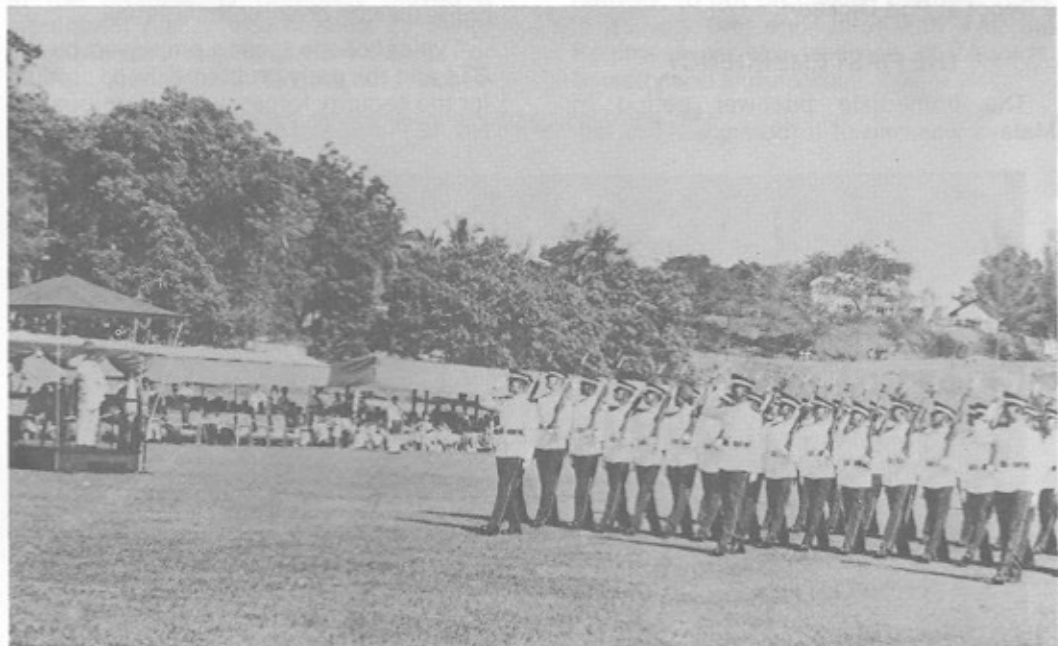
talion, near Gua Musang, in 1949. The Platoon suffered 18 dead and six injured in this encounter. The incident however showed the courage and tenacity of our soldiers: the Platoon Commander having fallen in the initial burst of fire from the CTs, Corporal Jamaluddin immediately took over command, rallied the survivors and repelled attack after attack until the last round was expended. Despite such early reverses, the Malay Regiment played a leading part in the defeat of the communist rebellion: its score at the end of the Emergency stood at 575 CTs killed, 49 wounded, 92 captured and 21 surrendered.

In the period of 1933 to 1952, the indigenous army of Malaya consisted solely of the Malay Regiment. In 1952, with the communist rebellion at its height, the British realised that military measures alone might be insufficient to quell the communist rebellion, that political steps would also have to be taken. They announced their intention to advance Malaya to self-government and eventual independence. General Sir Gerald Templer, then High Commissioner of Malaya, saw that the success of an independent Malaya would be highly dependent upon the three major races in

the country cooperating and working together for the common good. Non-Malay citizens would also have to play their part in the active defence of the country. Acting on this premise, General Templer initiated, in July 1952, the formation of the first multi-racial units: the Federation Regiment and the Federation Armoured Car Regiment.

The Armoured Car Regiment, which was only one squadron-strong initially, began operational duties, such as escorting and reconnoitering, within months of its formation. The Federation Regiment was deployed on operations in mid-1954. At the end of the Emergency, its score stood at 20 CTs killed and eight surrendered.

On 1 January 1960, the Federation Reconnaissance Corps was born from the amalgamation of the Federation Regiment and the Federation Armoured Car Regiment. The new Corps came to have two Regiments, each made up of half infantry and half cavalry (armoured cars), the result of incorporating one half of the Federation Regiment (infantry) in the 2nd Reconnaissance Regiment and one half of the Armoured Car Regiment in the 1st Reconnaissance Regiment.



Federation Military College in Port Dickson

The period of 1948-60 also saw the creation of new formations and support units for the effective functioning and deployment of the expanding army. HQ 1st Federation Infantry Brigade was formed on 1 July 1949 for the effective command of all indigenous units then in existence. The Federation Signals Regiment came into being in 1952; the Federation Engineers in 1953; the Federation Military College was established (in Port Dickson) in 1953, with a Cadet Wing for the training of potential officers and a Boys Wing for moulding future leaders of the armed forces, the civil service and the private sector (the College was later transferred to Sungei Besi); the nucleus of the Sekolah Latihan Tentera Darat (LATEDA) was created in 1954; the General Service Corps (Clerical, Medical, Pay and Legal) was formed in 1954; the 1st Field Battery of the Regiment of Artillery in 1957; the Armed Forces

PEACE-KEEPING IN THE CONGO

Soon after the Emergency was declared to be at an end (31 July 1960), came the despatch of a Malayan Special Force (MSF) to the Congo (now Zaire) to assist in United Nations (UN) peacekeeping operations in that newly-independent and chaotic country. Initially the MSF consisted of elements of the Royal Malay Regiment (RMR), the Federation Reconnaissance Corps and other supporting units; subsequently it was enlarged to brigade-size.

In the Congo, the UN faced the most difficult mission it has ever been its lot to undertake. Being a 'constabulary force' dedicated to achieving its mission with the minimum use of force while maintaining strict impartiality in the disputes of the contending parties, the MSF, together with other UN contingents, found the task of peace-keeping very trying indeed.



In the Congo

Maintenance Corps (Ordnance, Supply and Transport, and, Electrical and Mechanical Engineers) in 1957; and, the HQ Garrison and Recruit Training Centre in Port Dickson in 1958. (Subsequently, in 1964, the Armed Forces Maintenance Corps was disbanded and each of its three components established its own corps).

However, except for one unfortunate incident in Kindu, in which an error of judgement on the part of an officer led to the butchering of a number of innocent Italians by the Congolese, the MSF lived up to the Prime Minister Tunku Abdul Rahman's exhortation at its departure for the Congo, to uphold the good name of

the Federation of Malaya. This was confirmed by Mr U Thant, the UN Secretary-General himself, who wrote on the occasion of the MSF's departure from the Congo.

Malayan troops will be remembered in the Congo for their tact, understanding and friendliness towards the people of the Congo and the excellent manner in which they performed their duties You have served under difficult conditions and at considerable personal discomfort. You can however leave the Congo with the satisfaction that you have done a splendid job and have earned the highest appreciation of your services both from the United Nations and from the Republic of the Congo.

(Here it is pertinent to mention that the UN has once again approached our Government to provide a contingent for peacekeeping operations, in Namibia. The Prime Minister has agreed and the Ministry of Defence stands ready to despatch the force as and when required).

CONFRONTATION

Even before the UN mission in the Congo was brought to a successful completion, trouble began to brew in Southeast

Asia, as Indonesia's President Sukarno decided to 'confront' the proposed union of Sabah and Sarawak with the Federation of Malaya to form Malaysia. The tensions created by Sukarno's attitude led to the recall of the MSF from the Congo and the deployment of Malaysian troops in Sabah and Sarawak to deal with Indonesian infiltrators. The Malaysian Army suffered an early reverse at Kalabakan in December 1963 which reminded the need for constant vigilance and served as an impetus for better operational performance subsequently. Soon, with the help of our allies, most of the infiltrators were eliminated. Sukarno then sent his infiltrators to Peninsular Malaysia. They too were soon rounded up.

Although, under the terms of the Anglo-Malayan Defence Agreement, the British came to the country's assistance in resisting confrontation, the tensions created by the formation of Malaysia and the burden of protecting 'a wider national territory' necessitated a further expansion of the Army. Three more battalions of the RMR were raised between 1962 and 1967. On Malaysia Day (16 September 1963), as provided for in the agreement (between the governments of the United Kingdom and the Federation of Malaya) which brought about the formation of Malaysia,



Confrontation: Our troops with captured Indonesian infiltrators

the British Army raised, in Johore, the Malaysian Ranger Regiment comprising two battalions, the 1st incorporating elements of Sarawak Rangers and the 2nd with recruits drawn mainly from Sabah. They built up these battalions to full strength, equipped and trained them and, on 4 October 1965, officially handed them over to the Malaysian government. Even before this hand-over, the 3rd Battalion of the Ranger Regiment had been formed in Ipoh on 1 July 1965 under the direct responsibility of the Malaysian government. A 4th Battalion of the Regiment was formed on 28 March 1966.

The Malaysian Special Forces Regiment (Commando) was also formed in this period, on 1 May 1966, for the purpose of undertaking specialised, independent offensive operations by land, sea or air. Elements of this Regiment saw operational duty in Sabah in the closing stages of Confrontation.

In May 1967, the Medical and Dental Branch broke off from the General Service Corps and formed the Medical and Dental Corps of the Malaysian Armed Forces.

NEW RESPONSIBILITIES

By early 1966, with the end of Indonesia's Confrontation in sight, the British government decided to reduce its military aid to Malaysia. Henceforth the Malaysian government would have to bear a greater burden for the defence of the country. The protection of Sabah and Sarawak required the deployment of a significant portion of the country's armed forces — the instruments of sovereignty — to those two states. Consequently, the HQ Land Forces, East Malaysia, was set up in Kuching in July 1966. The forces there were rapidly built up to division-strength. A year and eight months later, HQ 2nd Infantry Division was established in Kuala Lumpur, for the defence of Peninsular Malaysia.

MAY 13 AND RESURGENCE OF COMMUNISM

The end of Confrontation did not usher in a period of peace for the nation or the Army. First, there was the insurrection of

the North Kalimantan Communist Party in Sarawak and then the 'May 13' disturbances, followed by the resurgence of militant communism in Peninsular Malaysia. Next, towards the end of 1968, there were indications that the Philippines might revive its claim to Sabah in a more forceful manner. Finally, the British announced their intention to relinquish their military commitments in the East (of Suez) by 1971; this led to the Anglo-Malayan Defence Agreement being replaced by the Five Power Defence Arrangement, which provided for mere consultations (as opposed to firm commitments) in the event of Malaysia's security being threatened. All these developments inevitably led to a further expansion of the Malaysian Army (and the other Services).

The concern for internal security created by the May 13 disturbances paved the way for the RMR and the Ranger Regiment to be expanded by several battalions. The requirement of maintaining a high professional standard for the increasing number of middle-rung officers was met by the establishment of the Armed Forces Staff College in 1971. To cater for the imperative need to maintain high combat efficiency, the Special Warfare School (now known as Pusat Latihan Tentera Darat — LATEDA) was opened in 1972 at the site of the old British Army Jungle Warfare School.

The task of containing the CTs in Sarawak turned out to be comparatively easy. But in Peninsular Malaysia, the remnants of the MCP, buoyed by the successes of the Indochinese communists, succeeded in creating concern by staging a series of acts of terrorism, sabotage, assassination and ambush of security forces, particularly during the year 1975. The Army once again, in cooperation with other security forces, soon contained the CTs and restored comparative tranquillity to the country.

The period of the mid-seventies is also memorable for the initiative of then General Officer Commanding Peninsular Malaysia, Mejar Jeneral Dato' (now Jeneral Tan Sri, Chief of Defence Forces) Mohd Ghazali B Dato' Mohd Seth, who launched the GONZALES series of military exercises. Not satisfied with the

limited successes achieved by the security forces in their operations against CTs in the preceding years, the General decided to launch a Divisional exercise-cum-operation, involving three infantry brigades with their supporting arms and services, the Royal Malaysian Air Force and the Police Field Force (altogether 10,000 men), in the Sungei Siput and Chemor salients. The main objective of this initiative was to destroy the 5th Assault Unit of the Communist Party of Malaya (CPM), at that time the most active and successful of the CT elements which were attempting to make a comeback. The exercise-cum-operation was also intended to exercise the troops in all aspects of counter-CT operations and to test the feasibility of standing operating procedures. Conducted over the period of 8 April to 7 May 1974, it turned out to be highly successful: 12 CTs including the commander of the 5th Assault Unit were killed; two main CT camps and several food-dumps were discovered and destroyed. Encouraged by this result, many more similar exercises have been conducted since then, under the code-name GONALES.



Major Zainal B Rashid posthumously awarded the SP, the nation's highest honour, for outstanding courage in a contact with CTs near Gubir on 15 July 1976.

THREAT FROM VIETNAM?

Following the final triumph of the Vietnamese communists in April 1975, it was thought that they would direct their energies towards the rehabilitation and reconstruction of their country. Acting on this assumption, Malaysia and the other ASEAN countries extended to them the hand of friendship and cooperation. The ASEAN countries thought that, at last, there would be peace in Southeast Asia. This was not to be. The Vietnamese invasion and occupation of Kampuchea in December 1978/January 1979 came as a rude awakening to these countries. The Vietnamese action of resorting to massive invasion and using a local proxy seemed to be a radical departure from the usual pattern of employing infiltration, subversion and guerrilla warfare, to bring down an established government. Thailand, in particular, and Malaysia feared that they might be the next targets for Vietnamese aggression.

Under the impact of this fear and fully aware that the Vietnamese possessed the most formidable fighting machine in Southeast Asia, Malaysia took the decision to beef up its armed forces and prepare it for conventional warfare. Although, subsequently, the earlier fears of impending Vietnamese aggression abated somewhat and this, coupled with domestic and international economic recession, caused a halt in the expansion programme, the Army is still engaged in consolidation. Yet another step to enhance professional standards has been taken in the meantime by establishing the Armed Forces Defence College, the highest institution of military learning in the country. It is likely that, in the near future, the Malaysian Army will acquire tanks, heavy artillery, missiles and all the other paraphernalia of modern war.

THE TERRITORIALS

No treatment of the evolution of the Malaysian Army over the last 50 years would be complete without a mention of our Territorial Army which was first formed in 1958. Its precursors, the Volunteers and the Home Guard, rendered invaluable service to the nation in the 1948-60

Emergency. Today they stand ready to deploy in times of emergency and to reinforce the regular forces in the defence of the nation.

ACHIEVEMENTS

From its humble beginning of an Experimental Company 50 years ago, the Malaysian Army has by now grown into a fullfledged modern force organised in a Corps and several Divisions, with the necessary supporting arms and services. This expansion has come about under the impact of a number of circumstances: the defence obligations imposed on the nation by the attainment of independence; the formation of Malaysia; the termination of the Anglo-Malayan Defence Agreement; the resurgence of internal threats; the fears and anxieties caused by the communists' triumph in Indochina and the subsequent Vietnamese invasion and occupation of Kampuchea.

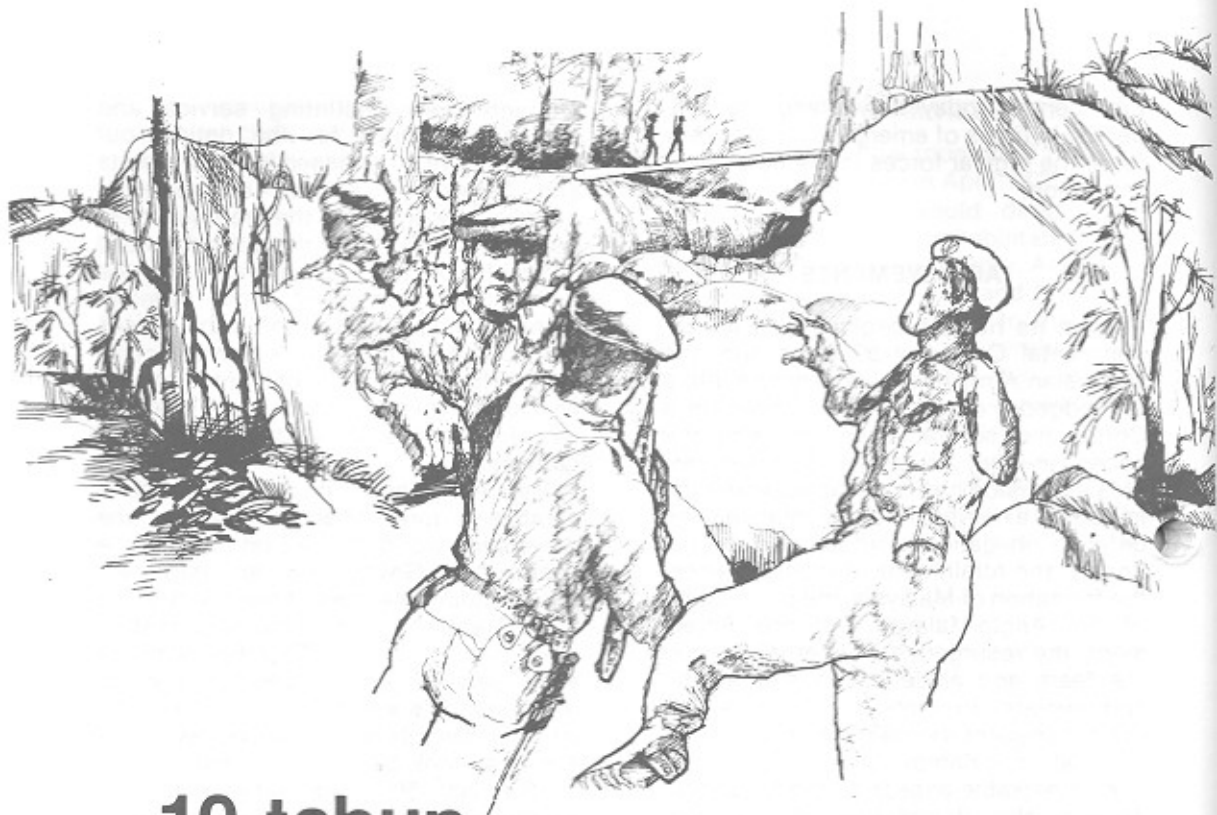
A remarkable aspect of the Malaysian Army is that it has been almost continuously on operational duty since 1948.

Through their unstinting service and selfless sacrifices for the nation, our soldiers have suppressed internal threats and helped to subdue our external enemies. By providing the prerequisite of peace and security in the country, these sentinels of the nation have allowed political, economic and social development to take place at a rapid pace. This is probably their greatest achievement to date. They have brought international honour for this country through their exemplary service in a dark stretch of faraway Africa.

The Army has no politics, a comparatively rare phenomenon in the developing world. It looks on itself as the agent of the Government, an instrument for upholding the laws of the country and the protection of its democratic institutions and practices. Together with its sister Services, it stands as the guardian of the nation's sovereignty and territorial integrity. On this auspicious occasion the Army can look back on its achievements of the last 50 years with pride and satisfaction and face the future with confidence.

GRAPHICS

As the reader can see in this issue, every article published in SOROTAN DARAT is preceded by a graphic symbolising its gist. To continue with this practice, contributors are requested to forward with their article an appropriate sketch to guide the artist engaged for drawing the graphic. Additional illustrations are most welcome. Photographs should be in black and white.



10 tahun — HAIGATE DAN PENGARUHNYA KE ATAS DOKTRIN TENTERA

Brigedier Jeneral Haji Mustaffa B Awang

10 Tahun telah berlalu, Maktab Turus Angkatan Tentera (MTAT) yang lebih terkenal dengan panggilan 'Haigate' telah banyak berbudi kepada Pegawai-pegawai yang kini berkhidmat dalam seluruh ATM. Jika sejarah gilang-gemilangnya hendak dicatitkan sepenuhnya, banyak ruang-ruang jernal ini akan terpaksa digunakan. Komandan MTAT menukilkan secara selayang pandang kemajuan-kemajuan yang tercapai oleh MTAT dalam jarakmasa 10 Tahun sambil menekankan betapa perlunya MTAT memainkan peranannya dalam memperkembang dan mencipta DOKTRIN-DOKTRIN Tentera Darat yang asli dan lebih sesuai dengan suasana dan alam semulajadi tempatan.

Pada tahun 1967 di atas keputusan dari lawatan Allahyarham YAB Tun Abdul Razak, Menteri Pertahanan di kala itu, ke Maktab Turus Burma, idea membina MTAT telah diwujudkan. Ekoran dari itulah

maka MTAT telah ditubuhkan pada Tahun 1971.

Penubuhan maktab ini adalah selaras dengan perkembangan Angkatan Tentera yang memerlukan tenaga-tenaga pegawai

yang terlatih di bidang turus dan pemerintahan. Terdahulu dari tahun tersebut kursus turus peringkat menengah hanya diselenggarakan di Maktab Tentera asing terutamanya di negara-negara Komonwel dan di Amerika Syarikat. Dengan demikian pegawai-pegawai Angkatan Tentera Malaysia terpaksa dihantar berkursus di negara-negara tersebut. Ini telah melibatkan perbelanjaan yang besar lagi pun angka pegawai yang dapat dihantar bergantung kepada peruntukan yang ditetapkan oleh negara-negara berkenaan. Sehingga tahun 1970 Angkatan Tentera Malaysia hanya dapat 12 peruntukkan tempat sahaja. Selepas tahun 1970 keperluan pegawai-pegawai yang berkelulusan Maktab Turus telah menjadi ketara. Misalnya di dalam tahun tersebut daripada 286 jawatan yang memerlukan pegawai-pegawai turus yang terlatih, hanya 16 jawatan sahaja dapat diisi. Pergantungan kita kepada negara-negara asing untuk kursus tersebut telah melemahkan keupayaan kita membina Angkatan Tentera yang berupaya, terlatih dan berkembang mengikut peredaran semasa.

Berasaskan hakikat ini Maktab Turus Angkatan Tentera Malaysia telah didirikan. Selaras dengan keperluan ini objektif asas Maktab telah dirumuskan; melatih pegawai-pegawai peringkat



Lawatan Pertama Ketua Turus Angkatan Tentera 1972

menengah untuk melengkapkan mereka memenuhi jawatan di peringkat yang lebih tinggi.

Dari segi hakikatnya MTAT adalah sebuah institusi pengajian tinggi ilmu



Markas Maktab 1971

ketenteraan di dalam Angkatan Tentera Malaysia. Sebagai institusi pengajian tinggi ianya adalah merupakan ejen penyebaran serta perkembangan ilmu. Seajar dengan fungsi ini MTAT telah diberi mandat sebagai satu badan bebas untuk mentadbir serta merancang pengajian mengikut pengajaran ketenteraan semasa. Pada dasarnya MTAT adalah institusi pengajian ketenteraan untuk ketiga-tiga perkhidmatan,¹ Darat, Udara dan Laut. Sewaktu ianya ditubuhkan, keperluan Tentera Darat adalah lebih mendesak. Berasaskan ini kursus yang telah dirancang menekankan dengan sepenuhnya kepada pelajaran Tentera Darat; dengan rancangan jangka panjang memberi penekanan yang sama kepada pengajian ketiga-tiga perkhidmatan. Dengan demikian, perkembangan masa hadapan MTAT yang dirancang adalah untuk merintis jalan kepada pencapaian matlamat ini.

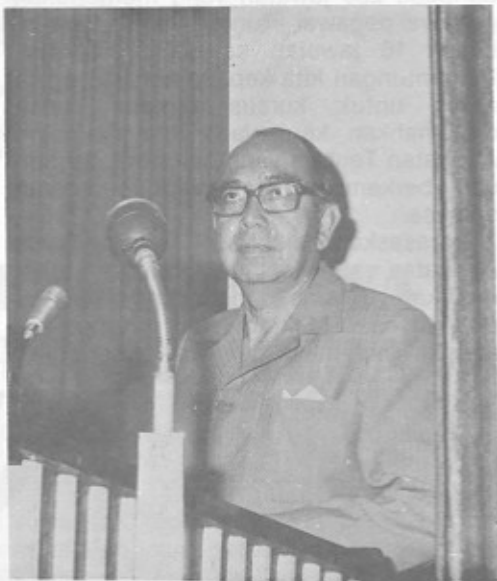
DOKTRIN PEPERANGAN

Walaupun objektif MTAT hanya menekankan kepada dua aspek seperti mana yang telah dinyatakan, ianya secara langsung merupakan institusi yang terlibat terus dalam pengajaran dan perkembangan doktrin Angkatan Tentera.² Sungguhpun carta maktab menggariskan had yang tertentu di dalam pengajaran doktrin di MTAT, suasana dan peredaran masa memerlukan ajaran-ajaran baru disesuaikan untuk kegunaan Angkatan Tentera Malaysia. Doktrin bukanlah satu pengajaran yang statik malah ia berkembang mengikut perubahan suasana, keadaan, pemikiran, rekaan dan sebagainya. Perubahan dan perkembangan yang berlaku di dalam rekaan teknologi mempunyai kesan terus kepada konsep dan ilmu peperangan. Di dalam keadaan perubahan teknologi dengan rekaan pesat yang berlaku, konsep peperangan dan ajarannya perlu dirombak dan disesuaikan seajar dengan perubahan tersebut. Dengan demikian di dalam konteks ini MTAT memainkan peranannya sebagai penyebar dan pengembang doktrin; malah ia perlu lebih giat menjalankan kajian, meneliti perkembangan dan perubahan yang berlaku,

menyesuai serta mengemaskinikan pengajaran semasa untuk suasana setempat.

PERJAWATAN AWAL

Penubuhan MTAT adalah diasaskan kepada keperluan Angkatan Tentera yang terdesak dengan kekurangan pegawai-pegawai peringkat menengah yang terlatih. Dengan demikian objektif utama MTAT ialah untuk melatih dan mengeluarkan pegawai-pegawai yang berupaya dan berkecukupan. Walaupun demikian pada permulaannya dalam tahun 1972, hanya sejumlah 30 orang penuntut sahaja dapat diterima. Ini adalah kerana beberapa kesukitan yang dihadapi di kala itu.



Ucapan Allahyarham YAB Tun Abdul Razak pada Hari Penyampaian Diploma Pertama 1972

Sebahagian daripadanya adalah disebabkan kerumitan kewangan, tempat, tenaga pengajar dan kemudahan. Selaras dengan kekuatan penuntut, organisasi MTAT telah dirumuskan supaya berupaya dan berkesan di dalam menjalankan fungsinya. Organisasinya walaupun kecil tetapi telah disusun rapi dengan semua bahagian membantu sesama sendiri bertujuan memberi kesan yang maksima dalam melatih penuntut-penuntut.

Di dalam konteks penyebaran dan pembelajaran doktrin, badan yang bertanggungjawab adalah Cawangan Juruarah dan Penyelidikan. Cawangan inilah menjadi media penyampaian. Penting dinyatakan di sini bahawa jawatan di dalam cawangan ini dibahagikan kepada tujuh orang juruarah pengajar³ dan tiga orang juruarah penyelidik. Cawangan Juruarah berfungsi semata-mata untuk menyampaikan pengetahuan kepada penuntut. Cawangan Penyelidikan pula mempunyai fungsinya sebagai badan yang menjalankan penyelidikan ketenteraan (doktrin) untuk disampaikan kepada penuntut, menulis dan mengemaskinikan risalah-risalah, menyediakan latihan-latihan model, merancang latihan-latihan tektikal serta badan yang berhubung dengan agensi-agensi luar untuk keperluan latihan. Dengan kata ringkasnya fungsi Cawangan Juruarah dan Penyelidikan ini semata-mata mempunyai tujuan melatih penuntut-penuntut yang mengikuti kursus di MTAT.

PEMBESARAN

Di dalam tahun 1980, Angkatan Tentera Malaysia telah diperbesarkan dengan pesatnya. Sejar dengan ini keperluan tenaga pegawai yang terlatih Maktab Turus telah semakin bertambah. Kini keperluan ini dialami oleh ketiga-tiga perkhidmatan. Rancangan pembesaran Maktab Turus yang dijadualkan⁴ terpaksa dikaji semula dan hasilnya ialah pembesaran yang berlipat ganda. Dalam kursus tahun 1981 sejumlah 137 orang penuntut telah diterima dengan mengakibatkan Cawangan Juruarah dan Penyelidikan disusun semula. Cawangan Juruarah telah dipecahkan kepada dua divisyen (bahagian), tiap-tiap satunya diketuai oleh seorang *Kolonel*. Cawangan Penyelidikan telah dipisahkan tersendiri dan kekuatannya ditambah daripada tiga kepada lima orang pegawai berpangkat Leftenan Kolonel.⁵

Dengan perubahan baharu yang berlaku ini, fungsi Cawangan Juruarah masih kekal. Disebaliknya fungsi Cawangan Penyelidikan telah dirombak. Cawangan ini telah diberi tanggungjawab untuk mengkaji semula doktrin semasa

yang diajar di MTAT selain daripada tanggungjawab asalnya. Di dalam tugas tambahan ini cawangan ini dikehendaki mengerjakan kajian berterusan, menjalankan ujian-ujian tatacara staf sama ada untuk tujuan gerakan ataupun penadbiran serta mencari, menguji teknik-teknik baru dalam penyampaian latihan.

PERKEMBANGAN DOKTRIN

Sebagai institusi pengajian tinggi ketenteraan di dalam Angkatan Tentera Malaysia, MTAT telah diberi mandat mengajar serta melatih pegawai-pegawai tentera di dalam ilmu peperangan khususnya Doktrin Peperangan Tentera Darat. Di ketika itu Tentera Darat Malaysia masih belum berkesempatan merumuskan doktrinnya yang tersendiri dan khusus.⁶ Untuk mengatasi masalah tersebut pegawai-pegawai tertentu telah dipilih khas terutamanya dari mereka yang telah berkursus Maktab Turus di negara-negara Komonwel dan Amerika untuk memulakan kajian, mengumpul serta mengemaskinikan doktrin Tentera Darat Malaysia untuk diajar di MTAT. Di dalam tugas tersebut tumpuan mereka telah didorong memperhitungkan sistem latihan warisan peninggalan Tentera British dan pengalaman-pengalaman yang didapati dalam penglibatan Tentera Darat Malaysia dalam Perang Dunia Ke 2, Dharurat pertama, penglibatan tentera kita di Congo, Konfrantasi berserta dengan pergolakan disekitar dunia seperti Peperangan Vietnam, Pencerobohan di Afghanistan, dan Ketidadaan Kesetabilan di negara-negara Timur Tengah. Memandangkan tugas ini memerlukan masa yang panjang disertai pula dengan desakan MTAT memerlukan doktrin yang khusus untuk diajar, mereka telah diarah merumuskan doktrin sementara untuk tujuan ini.

Setelah dikaji doktrin-doktrin peperangan darat tentera-tentera asing, didapati bahawa doktrin peperangan darat Tentera Darat Australia adalah sesuai untuk diambil sebagai doktrin sementara. Ini adalah berasaskan yang doktrin tersebut mempunyai unsur dan bermanifestasikan peperangan selaras dengan keadaan dan suasana negara ini.⁷ Walaupun demikian terdapat juga

pelajaran-pelajaran yang tidak didapati sesuai dan memerlukan perubahsuaian tertentu; oleh itu doktrin tersebut telah diambil sebagai doktrin pembelajaran. Di sebalik penerimaan doktrin ini, kajian dan penyelidikan yang teliti telah dilakukan berterusan dengan tujuan utamanya memenuhi keperluan asas untuk perumusan dan perkembangan doktrin 'indigenous' Tentera Darat Malaysia. Tenaga pengajaran dan penyelidik di MTAT dikerah untuk menjalankan kajian, menganalisis pelajaran-pelajaran baru dalam mencari dan mengemaskinikan doktrin yang diajar supaya sesuai dengan suasana setempat dan semasa. Walaupun dari segi fungsinya MTAT hanya dianggap sebagai agen penyebar doktrin (agent of dissemination), pada hakikat sebenarnya ianya adalah agen yang aktif di dalam perumusan, pembentukan dan perkembangan doktrin seluruhnya.

Sungguhpun pembelajaran doktrin peperangan yang diajar lebih memberatkan kepada pelajaran Tentera Darat, pembelajaran doktrin peperangan laut dan udara tidak pula diketepikan. Daripada tahun 1973 hingga tahun 1980 pegawai-pegawai Tentera Laut dan Tentera Udara terpaksa mengikuti kursus yang sama yang dirancang untuk pegawai Tentera Darat. Pelajaran mengenai Tentera Laut dan Tentera Udara hanya diajar diperingkat umum tanpa pengkhususan. Sejajar dengan hasrat untuk membangunkan MTAT sebagai institusi pengajian tinggi Angkatan Tentera di dalam tahun 1981, pelajaran peperangan Laut dan Udara telah diberi penekanan yang sama dengan pelajaran peperangan Tentera Darat dan dalam kursus tahun 1981 jua telah dimulakan sistem⁸ pengkhususan pembelajaran doktrin Darat, Laut dan Udara.

PUSAT PEMBELAJARAN DOKTRIN

Tahun 1982 merupakan tahun yang penting di dalam perkembangan doktrin peperangan antarabangsa. Amerika Syarikat United Kingdom dan Australia telah mengambil langkah untuk merombak, mengkaji, menganalisa serta mengemaskinikan doktrin peperangan mereka. Mencontohi langkah negara-

negara tersebut, Panglima Tentera Darat telah mengarahkan kerja perumusan doktrin Tentera Darat diusahakan. Dengan hasrat untuk memberi tanggungjawab ini kepada MTAT, satu Jawatankuasa Doktrin Peperangan Darat telah ditubuhkan dengan Komandan MTAT di lantik sebagai Pengerusinya.

Kerja-kerja merumus dan membentuk doktrin peperangan ini memerlukan suasana yang sesuai dari segi infrastruktur dan juga kepakaran. MTAT adalah dianggap sesuai kerana mempunyai kehendak-kehendak tersebut. Cawangan Penyelidikan yang sedia di MTAT telah dijadikan badan yang akan menjalankan penyelidikan doktrin dan dengan adanya pegawai-pegawai yang dipilih khas yang mempunyai kepakaran di bidang masing-masing, MTAT telah dianggap sebagai institusi yang berkemampuan memikul tanggungjawab ini.

DOKTRIN KESBAN

Sumbangan yang penting dihulurkan oleh MTAT dalam konsep keselamatan negara ialah doktrin KESBAN. Doktrin ini telah pun diterima sebagai doktrin resmi Kerajaan di dalam menentang ancaman komunis dalam negeri.⁹

Perkembangan doktrin KESBAN sehingga mendapati pengiktirafan sebagai doktrin rasmi negara adalah hasil kajian yang dipelopori oleh MTAT. Ajaran KESBAN ini mula diperkenalkan di MTAT pada tahun 1972 dan menjadi satu daripada pelajaran yang terpenting. Di ketika itu ajaran ini lebih terkenal dengan akronim IDAD (Internal Defence and Development) yang diperkembangkan oleh Tentera Amerika Syarikat. Doktrin IDAD ini mengandungi banyak teori dan konsep yang bernas, boleh diambil dan digunakan untuk menindak-balas kegiatan komunis dalam negeri, tetapi; tidak kesemuanya sesuai kepada keadaan dan suasana setempat. Malaysia juga tidak kurang dalam pengalaman ini. Pengalamannya dalam dharurat pertama dan konfrantasi memberinya asas yang cukup untuk menilai Doktrin IDAD. Sambil mengajar, Doktrin IDAD ini telah dikaji dengan membandingkan pelajaran-

pelajaran yang diterima melalui pengalaman sendiri. Secara beransur doktrin yang khusus untuk kegunaan setempat telah dapat dibentuk.

Dalam tahun 1974 Brig Jen ZAIN MAHMUD HASHIM¹⁰ telah memegang jawatan Komandan MTAT. Beliau telah meningkatkan lagi penekanan kepada pembelajaran, kajian dan penyelidikan doktrin tersebut. Hasil selanjutnya telah menonjolkan dua unsur yang terpenting iaitu *Keselamatan* dan *Pembangunan* yang memberi penekanan berbeza dari doktrin IDAD (Pertahanan dan Pembangunan). Selaras dengan penekanan baru dan untuk menginstitusikan identiti doktrin tersendiri, akronim *KESBAN* telah diberi kepada doktrin ini. Doktrin *KESBAN* mula diperkenalkan secara rasmi dalam tahun tersebut oleh MTAT.

'WARGAMING' DAN 'TEWT'

'TEWT' (Tactical Exercise Without Troops), adalah satu latihan taktikal yang terpenting dalam pembelajaran doktrin peperangan darat. Dahulunya latihan ini dijalankan semata-mata untuk melatih penuntut dalam mekanik merancang peperangan tektikal. Kawasan yang dipilih berpandukan kepada masaalah yang hendak ditonjolkan. Tetapi mulai tahun 1981 petua memilih kawasan untuk latihan ini telah diubah. Kawasan-kawasan yang dianggap mungkin menjadi

medan peperangan (Probable Battle Area) telah dipilih melalui penyelidikan dan latihan TEWT yang dilakukan di dalam kawasan tersebut. Konsep ini dipandang lebih bermunafaat kerana pertamanya matlamat melatih penuntut-penuntut boleh tercapai dan keduanya kawasan yang mungkin menjadi medan peperangan dapat dikaji dengan mendalam untuk perancangan strategi pertahanan.



Seri Paduka Baginda dibilik Model 'Medan perang'



Lawatan Seri Paduka Baginda Yang Dipertuan Agung 23 Mac 1982

"War game" adalah satu alat latihan amali yang dilaksanakan di MTAT. Cara latihan ini baharu sahaja diperkenalkan di dalam Angkatan Tentera dan MTAT adalah satu daripada institusi mempelopori cara latihan ini. Kecuali Tentera Darat, cara latihan ini telah berkembang di dalam Tentera Laut dan Udara. Ianya telah menjadi alat yang berkesan untuk menilai, mengkaji dan menyelidik doktrin serta melatih penuntut dalam pelajaran tersebut. Kini, di MTAT latihan "War-game" ini telah diberi tumpuan khas. Buat ketika ini hanya penuntut-penuntut Tentera Laut dan Udara sahaja berkesempatan diperkenalkan kepada latihan tersebut. Ini adalah disebabkan kepakaran yang ada di MTAT terbatas kepada kedua-dua perkhidmatan itu sahaja. Bagaimanapun tindakan untuk memperkenalkan latihan ini kepada penuntut tentera darat akan diselenggarakan untuk kursus tahun 1983.

PEMBELAJARAN STRATEJIK & PENGURUSAN

Selain daripada pelajaran pengkhususan 'professional', pelajaran am juga diberi perhatian dalam tujuan melengkap penuntut-penuntut dengan ilmu pengetahuan yang sesuai. Di atas tujuan itu pelajaran strategik dan pengurusan telah diperkenalkan.

Pada dasarnya pengenalan kepada pelajaran strategik dan pengurusan ini hanyalah setakat menambah pengetahuan penuntut-penuntut di dalam ertikata pengetahuan am dan ini telah memberikan implikasi terus-menerus kepada mereka. Dengan itu sejak kursus pertama dalam tahun 1972 hinggalah kursus yang kesebelas dalam tahun 1982 sukatan pelajaran yang dikhaskan untuk kedua-dua pelajaran ini hanyalah diperingkat pengelatan. Di dalam tahun 1982 telah timbul pendapat bahawa pelajaran strategik dan pengurusan yang diperuntukkan di MTAT perlu ditambah sekiranya ia bertujuan untuk meningkatkan ilmu penuntut-penuntut. Berasaskan pertelingkahan politik antarabangsa, perkembangan teknologi yang pesat berlaku di arena ketenteraan dan keadaan sosial

yang sentiasa berubah mempunyai kesan dan penglibatan kepada doktrin peperangan, keanggotaan dan pengurusan amnya, maka ilmu statistik dan pengurusan moden perlulah dituntut oleh pegawai-pegawai angkatan tentera dengan menyesuaikan keadaan perubahan ini untuk kebaikan angkatan tentera kita. Di atas anggapan ini penuntut-penuntut perlulah diberi pengetahuan yang cukup dengan merombak semula dan menambah sukatan pelajaran yang biasa diikuti. Ini telah dilakukan dan untuk kursus kedua belas yang bermula pada awal 1983, pelajaran strategik dan pengurusan yang diajar di MTAT telah diberi tumpuan yang sewajarnya dengan masa pelajaran ditambah seratus peratus.

DOKTRIN STAF

Telah dinyatakan bahawa kursus di MTAT ini menekankan pembelajaran doktrin peperangan dari segi konsep, taktik dan makenik peperangan. Sama penting juga ialah pelajaran mengenai *Tugas Staf* dalam mengendalikan operasi seperti melaksanakan 'appreciation', menulis arahan, menulis laporan dan lain-lain tugas pejabat yang mempunyai penglibatan dengan gerakan. Pelajaran ini juga diberi penekanan yang sama berat.



Pintu utama maktab kini

Di dalam perumusan doktrin staf, MTAT secara tidak langsung diberi dengan tanggungjawab ini. Satu Jawatankuasa Peraturan Turus Angkatan Tentera telah ditubuhkan dan Komandan MTAT dilantik sebagai *Pengerusi* tetap.

Tugas Jawatankuasa ini tertumpu dengan sepenuhnya kepada pembentukan peraturan turus untuk ketiga-tiga perkhidmatan Tentera Darat, Laut dan Udara.

KESIMPULAN

Maktab Turus Angkatan Tentera mengikut objektifnya adalah bertanggungjawab melatih pegawai-pegawai tentera peringkat menengah pertamanya untuk melengkapkan mereka di dalam jawatan turus gred dua dan keduanya sebagai persiapan membolehkan mereka memenuhi jawatan di peringkat yang lebih tinggi. Di sebaliknya MTAT adalah suatu institusi yang mempunyai peranan penting menyumbang kepada pembed-

udukan dan perkembangan doktrin Angkatan Tentera khususnya doktrin peperangan darat. Peranan ini telah timbul secara kebetulan sejak maktab tersebut ditubuhkan dan memulakan fungsinya, tetapi tidak begitu giat seperti sekarang. Sumbangannya kepada pembentukan dan perkembangan doktrin ini akan meningkat dari masa ke semasa Insya-Allah. Rancangan yang dinyatakan oleh Panglima Tentera Darat untuk memberi mandat sepenuhnya kepada MTAT di dalam tanggungjawab perkembangan doktrin peperangan darat adalah kena pada tempat dan masanya kerana MTAT mempunyai keupayaan menyelenggarakan tugas ini dengan berkesan.

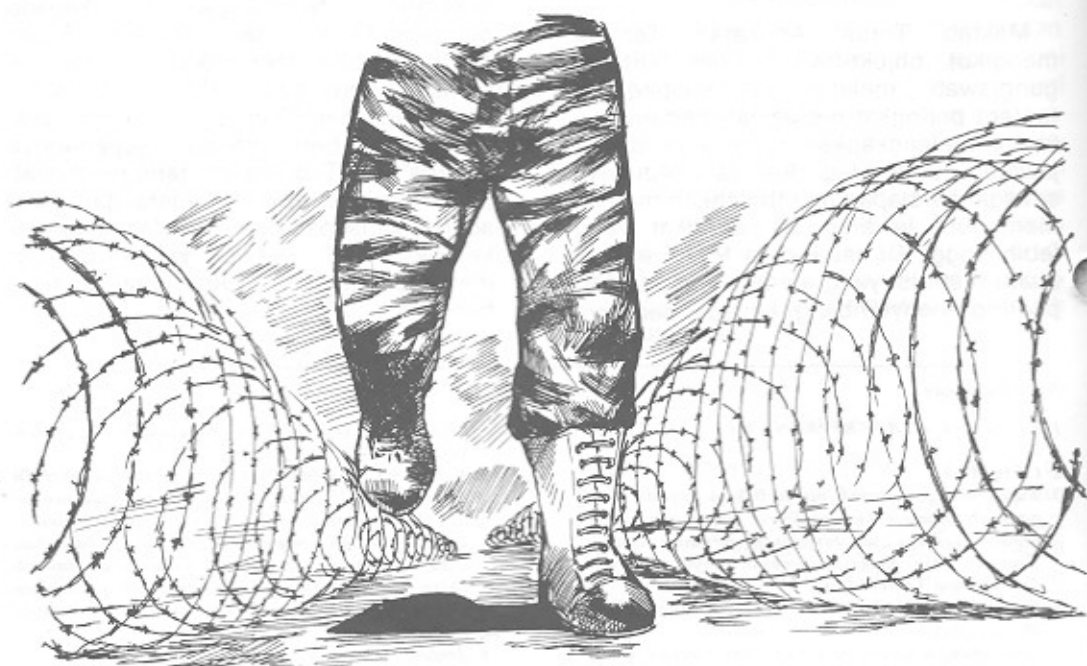
Nota Rujukkan:

1. Kertas oleh KTAT. KP/RANI/1013/4 bth 22 Okt 70.
2. Carta MTAT.
3. Tujuh orang juruarah ini terbahagi kepada lima juruarah pegawai Tentera Darat, seorang juruarah pegawai Tentera Laut dan seorang juruarah pegawai Tentera Udara. Kesemua juruarah penyelidik terdiri dari pegawai Tentera Darat.
4. Kertas kerja KTAT, KP/RANI/1013/4 bth 22 Okt 70.
5. Lima orang pegawai ini terdiri dari 3 pegawai dari Tentera Darat, seorang dari Tentera Laut dan seorang dari Tentera Udara.
6. Ucapan PTD 25 Mei 1982.
7. Strategi pertahanan Australia di ketika itu adalah berkonsepkan Pertahanan Hadapan (Forward Defence). Negara tersebut berpendapat bahawa pertahanan Australia hanya dapat dijamin dengan memerangi musuh luar dari tanah besar Australia. Berpanduan rantau Tenggara Asia merupakan kawasan yang terancam oleh hegemoni komunis, persepsi ancaman negara tersebut tertumpu kepada kuasa komunis yang timbul dari rantau ini. Dengan itu doktrin peperangan yang dirumuskan adalah

- bersesuaian kepada cara peperangan di dalam konteks suasana Tenggara Asia.
8. Kursus MTAT dirancang dalam tiga penggal. Di dalam penggal pertama dan kedua kesemua penuntut akan mengikuti sukatan pelajaran yang umum untuk angkatan tentera. Penggal kedua diikhaskan untuk pembelajaran doktrin peperangan dan di dalam penggal inilah ketiga-tiga perkhidmatan ini diasingkan untuk mengkhusus di dalam pelajaran masing-masing.
 9. Arahan Majlis Keselamatan Negara No 11.
 10. Kini Jen Tan Sri Dato' ZAIN MAHMUD HASHIM, Panglima Tentera Darat.
 11. Istilah 'War-game' bolehlah didefinisikan sebagai latihan peperangan yang menggunakan dua kumpulan menentang sama sendiri. Di dalam konteks ini latihan CPX (Command Post Exercise) dan hala yang biasa dilaksanakan dalam Angkatan Tentera boleh diklasifikasikan sebagai 'war-game'. Tetapi di dalam konteks rencana ini 'war-game' dimaknakan sistem latihan amali khusus yang menggunakan pendekatan saintifik berpanduan kepada sistem dan mekanisme tertentu yang telah dirumuskan.

Brigedier Jeneral Hj Mustaffa B Awang, Komandan MTAT telah ditauliahkan di dalam Rejimen Askar Melayu Diraja, setelah menghadiri Akademi Tentera Diraja Sandhurst pada Bulan Dis 1958. Pada Tahun 1969 beliau telah menghadiri Maktab Turus Pertahanan Wellington India dan pada Tahun 1975 pula beliau menghadiri Maktab Turus Bersama Canberra, Australia. Telah juga mengendalikan tugas-tugas turus termasuk perkhidmatan di bawah Panji-panji Pertubuhan Bangsa-bangsa Bersatu di Congo 1961-63. Di antara tugas-tugas lain beliau jua telah berkhidmat selaku Komandan PULADA dan Panglima 2 Beriged Infanteri Malaysia.



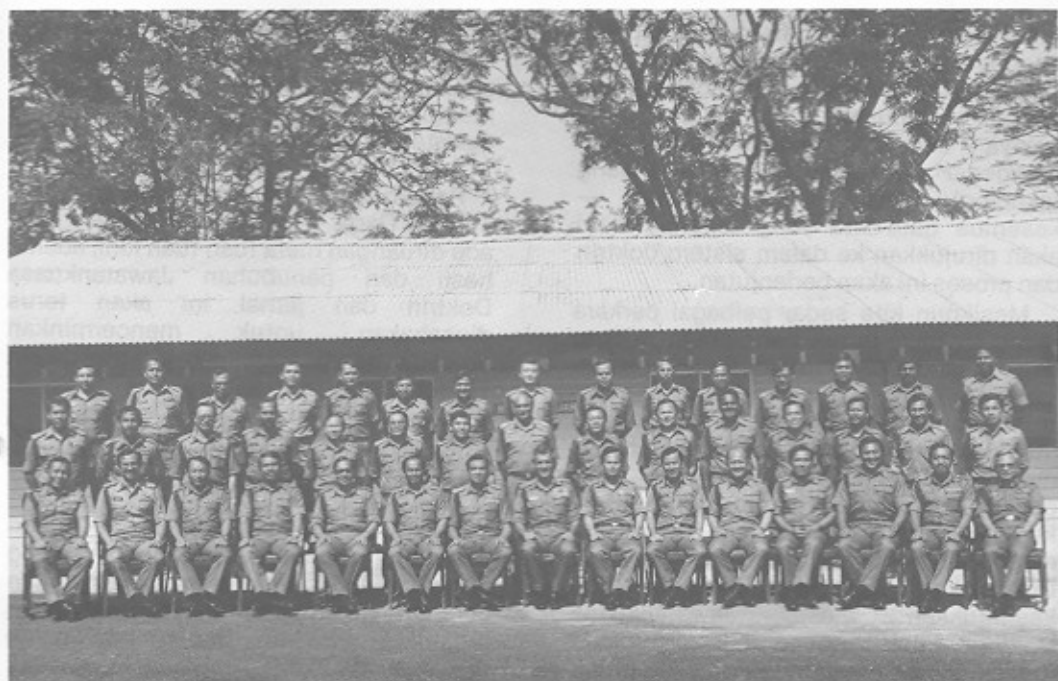


KEMAJUAN SEJAK INSEPSI

JAWATANKUASA DOKTRIN PEPERANGAN TENTERA DARAT

Komandan MTAT
Merangkap Pengerusi Jawatankuasa Doktrin Tentera Darat

Suatu tinjauan selang pandang mengenai pencapaian Jawatankuasa Doktrin Peperangan Tentera Darat. Pelbagai aspek kemajuan yang dipaparkan adalah di dalam proses penyusunan dan matalamatnya adalah ditunggu bersama.



Jawatankuasa Doktrin Tentera Darat Persidangan Pertama Mei 1982

Jawatankuasa Doktrin Peperangan Tentera Darat telah memulakan fungsinya pada 5 Mei 1982. Berasaskan pendekatan seperti yang tentera di gambarajah 1, Jawatankuasa ini telah memulakan tugas mengolah, merumus dan membetulkan doktrin-doktrin peperangan mengikut aliran-aliran seperti yang tertera di-dalam gambarajah :

- **Pemungutan.** Di peringkat ini pihak Sekretariat Doktrin Peperangan TD menghimpun, mengolah dan menyusun semua data dari pelbagai sumber-sumber. Di peringkat ini jua segala tiori-tiori yang spesifik diperkembangkan melalui proses 'Conceptualization' and 'Generalization'.
- **Perumusan.** Tiori-tiori ini kemudiannya akan dianalisa, di sorot sebelum sesuatu doktrin itu dirumuskan. Sebelum doktrin ini diresmikan ianya perlu diuji. Dengan ini deraf doktrin-doktrin tersebut disebarkan ke yunit-yunit dan kepada anggota-anggota untuk mendapatkan

komen-komen mereka; ini pula diikuti oleh diskusi-diskusi melalui Seminar, Simposium atau sekiranya perlu melalui ujian medan. Kesankembalinya akan dirujuk pula ke peringkat pemungutan untuk mengembangkan lagi tiori-tiori asal. Sekali-lagi tiori-tiori ini akan dianalisa dan disorot kembali untuk mencipta doktrin. Proses ujian dan penerimaan kesankembali ini akan diulang-ulangkan sehinggalah sesuatu doktrin itu diterima keunggulannya. Setelah beres tugas ini, proses ini akan bergerak ke pemeringkatan yang lain pula.

- **Penyebaran.** Di peringkat ini, doktrin dicetak dan diolah mengikut sistem katalog serta kod. Doktrin-doktrin ini kemudiannya disebarkan kepada pasukan-pasukan untuk diamalkan.

Proses perumusan doktrin-doktrin ini akan berlanjutan dari masa ke semasa. Kelemahan-kelemahan yang dialami dari operasi-operasi sebenar, akan menjadi sumber memperbaiki lagi sistem

perumusan doktrin tersebut. Pelbagai pendapat dari Seminar-seminar dan Simposium akan disematkan kembali kepada sistem perumusan tadi; begitulah pula halnya dengan perubahan-perubahan mengenai kemajuan dalam bidang teknologi serta sistem senjata — kesemua data-data yang diperolehi ini akan dirujuk ke dalam sistem doktrin dan proses ini akan berlanjutan.

Meskipun kita sedar pelbagai perkara mestilah ujud untuk penciptaan doktrin asli, misalnya pengujudanan tenaga pengajar yang mahir, fasilitis yang lengkap serta suatu perjawatan yang wajar, yang mana kesemuanya ini akan pula dapat mengecap pelbagai maklumat dari operasi, jernal-jernal tentera, dan kempen-kempen yang lalu; Tentera Darat kita masih tiada mempunyai keupayaan ini. Disebabkan oleh kekecohan ini dan kesuntukkan masa, Jawatankuasa Doktrin telah mengambil keputusan mengamalkan pendekatan duahala untuk mengatasi masalah ini.

• **Pendekatan segera.** Pendekatan ini diamalkan kerana keadaan kian mendesak mengadakan doktrin kita sendiri. Pendekatan ini adalah untuk sementara waktu sahaja. Matalamat dari pendekatan ini akan menjadi asas kepada perumusan selanjutnya. Tiga aspek yang menjadi tumpuan pendekatan ini terdiri dari

- Doktrin khas untuk pasukan dan doktrin untuk perkhidmatan-perkhidmatan.
- Doktrin kombatan.
- Mengemaskinikan rujukan-rujukan doktrin serta dokumentasi.

• **Pendekatan dari aspek Penyelenggaraan dan Proses Perkembangan Doktrin.** Pendekatan ini akan melanjutkan usaha-usaha merumuskan doktrin-doktrin secara saintifik dan lebih teratur lagi. Pendekatan ini berasas kepada perkara-perkara berikut:

• **Infrastruktur pembentukan.** Infrastruktur ini akan diperkembangkan pada aspek-aspek *Perjawatan, Fizikal, dan Organisasi*.

Ketiga-tiga aspek perkembangan doktrin ini akan diteliti dan diatur secara rapi sehingga benar-benar dapat berfungsi mengikut kehendak-kehendaki Jawatankuasa Doktrin.

• **Penerbitan Jernal Tentera Darat.** Jernal Tentera Darat — SOROTAN DARAT yang ada diruangan mata tuan-tuan kini, adalah hasil dari penubuhan Jawatankuasa Doktrin dan jernal ini akan terus diusahakan untuk mencerminkan pelbagai aspek kemajuan doktrin dalam Tentera Darat.

CEBISAN-CEBISAN KEMAJUAN YANG TERCAPAI

• **Badan Penterjemahan.** Tujuan penubuhan Badan Penterjemah yang sedang diujudkan akan memainkan peranan penting untuk melengkapkan organisasi doktrin. Badan ini adalah di bawah naungan Timbalan Komandan MTAT dan diwakili oleh ahli-ahli dari semua Jabatanarah dan Cawangan-Cawangan yang terlibat dalam penyusunan doktrin.

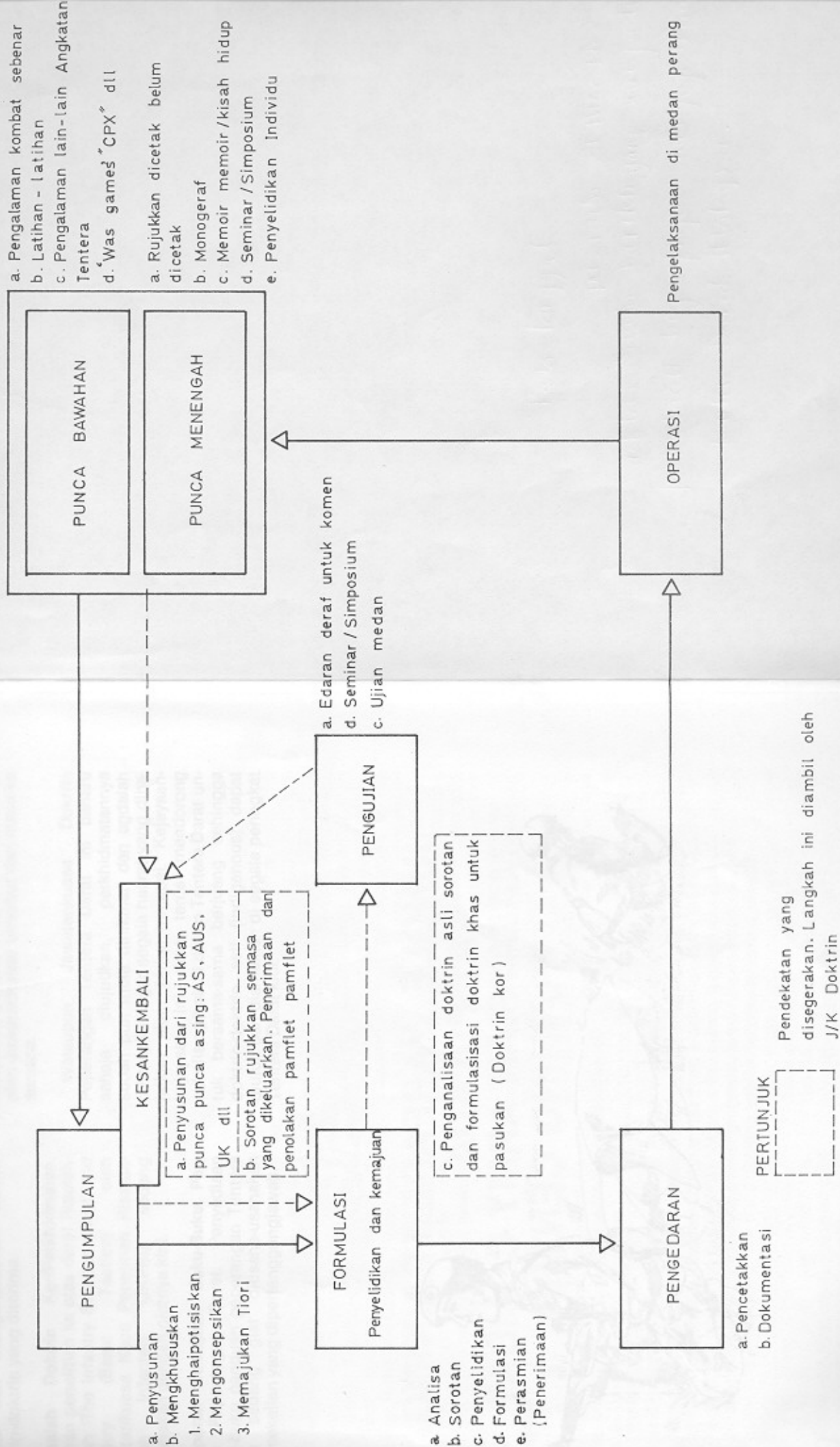
• **Lembaga SOROTAN DARAT.** Suatu Lembaga Pentadbir jua telah diujudkan untuk menyelaraskan pengeluaran-pengeluaran jernal tersebut. Lembaga ini terdiri dari:

Komandan MTAT	— Pengerusi
Pengarah Latihan Tentera Darat	— Penasihat
Kolonel Turus Am Dep TD	— Penasihat

• **Sidang Redaksi SOROTAN DARAT.** Sidang Redaksi bagi pengelolaan Jernal Tentera Darat — SOROTAN DARAT telah pun ditubuhkan. Sidang ini telah berjaya mengeluarkan penerbitan ulung SOROTAN DARAT. Komposisi Sidang Redaksi terdiri dari:

Lt Kol K R Panikkar	— Ketua
Mej Yusoff Khan B	— Penyunting
Rahim Khan	1
Mej Raymond Sinnathamboo	— Penyunting
Mej K D Richard	2
Veerasingha	— Setiausaha

PROSES PENYELENGGARAAN DOKTRIN



• **Laporan 'Tactical Terrain Analysis'.**

Semua Markas Divisyen sedang meneliti dan menyatukan laporan tersebut dan setelah lengkap akan mengantarnya ke Sekretariat Jawatankuasa Doktrin. Ini akan memulakan proses berpanjangan menilai dan menganalisiskan semua doktrin-doktrin yang diterima.

• **Risalah Doktrin Kor/Perkhidmatan.**

Laporan penelitian ke atas draf Risalah-risalah 'The Infantry Battalion (Gen)' and 'Infantry (Basic Tactics)' oleh Jawatankuasa Kecil Penelitian Risalah-risalah Infanteri (JKPRI) sedang diusahakan dengan giatnya kini.

• **Laporan Kemajuan Buku-Buku Panduan Peperangan Darat.** Penyediaan buku-buku panduan peperangan Tentera Darat sedang giat diusaha-usahakan oleh sekalian yang dipertanggungjawab.

• **The Guide to Professional Conduct Of An Army Officer'.**

Bagi Tahun 1982, Jawatankuasa Doktrin Tentera Darat telah berjaya menerbitkan sebuah risalah yang kini sedang diedarkan kepada semua pasukan-pasukan. Lebih banyak lagi kejayaan-kejayaan adalah diharapkan oleh Jawatankuasa tersebut dari masa ke semasa.

Walaupun Jawatankuasa Doktrin Peperangan Tentera Darat ini baharu sahaja diwujudkan, perkhidmatannya sudah pun mula dinikmati dan agdalah diharapkan agar segala hasrat yang diha-jatkan akan terus tercapai. Kejayaan-kejayaan ini akan terus mendorong sekalian pihak di dalam Tentera Darat untuk bersama-sama berjuang sehingga doktrin-doktrin asli (indigenous) dapat diujud dan diamalkan di segala peringkat Tentera Darat kita.





JUNGLE WARFARE TRAINING AT PULADA — THE MALAYSIAN ARMY COMBAT TRAINING CENTRE

Contributed by PULADA

In jungle warfare, the environment favours the communist terrorist (CT) enemy. Compared with his ancestors of the First Emergency, today's CT is a far more formidable adversary since he has acquired some of the latest weapons and developed superior tactics and fieldcraft. PULADA plays a leading part in the challenging task of developing new techniques and battle procedures to outwit the enemy.

BRIEF HISTORY OF THE SCHOOL

PULADA stands on the site of the former British Army Battle School established in 1951 and, subsequently, renamed the Jungle Warfare School. The

original school was raised to train Commonwealth Forces personnel for jungle operations. Following their withdrawal from the South East Asian theatre, the British Army formally closed the school at the end of 1970. PULADA (Pusat

Latihan Darat) was officially established at this site on 14 January 1971 as the foremost Combat Training Centre for the Malaysian Army.

PECULIARITIES OF JUNGLE WARFARE

Jungle warfare has its own peculiarities. There are no set answers because of the numerous imponderables. Tactics that work one day may be outdated the next, hence there is a constant need for revision of existing doctrines and formulation of new techniques.

In the final analysis, to destroy the enemy in the jungle, it is essential to know him and fight him on his ground but on our terms. His weaknesses must be turned to our advantage. Above all, the key to success lies in knowledge and skilful use of deception.

The methods employed and the means used can vary greatly, depending on whether jungle warfare is waged against insurgents in one's own territory or in a foreign land. Troops operating within their own country are subject to numerous restraints such as public reaction to and long-term implications of the methods used. Therefore the conduct of operations must fall within the parameters of the national policy for internal defence and development.

THE ENEMY

The communist terrorists (CTs) operating in the Malaysian jungle and its fringes are far more formidable adversaries in many respects compared with their predecessors of the 1948-60 Emergency. In the jungle and its fringe areas they are able to conduct and maintain protracted guerrilla warfare. They have the ability of operating dispersed in small groups, or, on a larger scale, depending on the task or nature of the mission undertaken. They also have a foothold in certain urban areas in the form of subversive and underground cells which are capable of undertaking tasks such as terror-bombing, assassination and sabotage.

In terms of weaponry and equipment, the CTs are almost on equal footing with the security forces. They have mastered

the techniques of improvisation and have a particular flair for the employment of mines and booby traps.

THE COMBAT ENVIRONMENT

The CTs live and operate as guerrillas mainly in the jungle. They have developed superior tactics and fieldcraft appropriate for the jungle environment. They, quite naturally, have an edge over security forces in the knowledge of jungle terrain, for the moment at least.

Unlike conventional war in open or temperate regions of the world, where the conduct of operations is heavily influenced by the development of new or improved weapon systems, jungle war in the Malaysian terrain and climate tends to limit the use of some modern military weapons and equipment.

The jungle environment favours the CTs because it is difficult to locate them and their sanctuaries in that environment. The variation in vegetation from isolated open grassland (lalang), rubber and oil palm plantations to dense secondary and primary jungle is advantageous to the CTs as they can approach unseen. In these areas they can operate in relative security. The northern and central regions of Malaysia are very hilly and rugged with numerous mountain ranges. Movement on foot, especially for large numbers of troops, can be very slow and strenuous, requiring elaborate logistic support.

Resupply in deep jungle areas is almost entirely dependent on air with its inherent vulnerability to bad weather and prejudice to secrecy. In recent times air resupply has become a target of enemy interference in the form of helicopter ambushes, especially in the vicinity of Landing Points (LPs) and Landing Zones (LZs).

From the point of view of tactical operations, the Malaysian jungle has some forbidding characteristics: vision is often limited to about ten metres or less; fields of fire are limited or non-existent; the going is very tiring and hazardous; map reading is difficult; and, the jungle creates apprehension of the unknown.

TRAINING CONCEPT

Training conducted at PULADA is geared primarily towards fulfilling the pro-

fessional criteria of the combat commanders who must be equipped with the skills of the trade to function effectively in the current combat environment. In addition, commanders are given a sound grounding in the roles they may have to undertake in the predictable future long-term environment.

Guerrilla warfare demands more from the soldier than any other form of warfare, including the total utilization of his resourcefulness, dedication and determination. It demands the ultimate in his mental and physical endurance. The soldier must possess the highest skills in the use of weapons because the enemy is elusive and glimpses of a few seconds are the most that is seen of him in the jungle, if at all. Therefore weapons must be used to telling effect.

The soldier must also master the art of improvisation and jungle survival to compensate for the CT's superiority in junglecraft. He does not merely make up the number to complete the groupings in a section or platoon to effect manoeuvre. On the contrary, he must be a highly proficient individual, a specialist contributing fully to the capability of his group in meeting with the imponderables of guerrilla warfare. In short, he must possess not only the mastery of the conventional soldier's trade but, more importantly, he must also possess the dedication and resourcefulness of an unconventional guerrilla fighter. The theme of all training conducted at PULADA is geared towards meeting exactly this requirement.

PULADA is charged with the task of providing closely supervised training in a variety of individual and collective skills relevant to the prevailing jungle combat environment. The Centre produces trained soldiers and officers who will be able to contribute effectively to their units' conduct of counter-terrorist operations.

Training is geared to producing troops who are tough, cunning and skilful enough to outfight the CTs on their own ground. While it is emphasized that full use must be made of the technical superiority in firepower, mobility and equipment, troops are trained to such a pitch to create the awareness that, man for man, they are better fighters than the CTs.

The three most important training requirements are *supreme mental endurance, physical fitness, and rapid and accurate shooting at fleeting targets at short range*. PULADA believes that a soldier must be capable of living in and surviving the conditions however arduous they may be. This presupposes professionalism in patrolling, navigation, ambush, search and tracking techniques.

These skills are developed by training junior leaders and stressing fieldcraft skills at section and platoon levels. The skills are further supplemented by contact drills which cultivate instinctive offensive reaction to counter ambushes and other tactical situations.

Training at the Centre adopts a very functional approach with emphasis on practical application. Every effort is made in simulating as many realistic operational hazards as possible, under extreme conditions. Realism and professionalism are the keys to PULADA's concept of training.

TRAINING DETAILS

INDIVIDUAL TRAINING

Students arrive at PULADA already equipped with a basic knowledge of jungle warfare acquired as officer cadets, basic recruits or personnel who have been on operational duty with their units. Therefore the task of the Centre is to further develop the individual as a jungle fighter. To accomplish this, the courses aim at the following objectives.

Personal Discipline. The individual is trained to endure isolation, deprivation of personal comfort and restricted recreational facilities, as well as to develop the ability to exercise patience and restraint for prolonged periods. The need for irreproachable behaviour is heavily stressed. This is essential because any deviation from the strictest standards of behaviour may be used for hostile propaganda by the enemy.

Endurance. This includes both physical and mental endurance. Physical endurance is developed progressively through various physical activities set in a jungle environment including skill-at-arms courses and assault courses. Men-

tal endurance is injected through application of pressure, harassment and hardship. Intensity of strain is programmed as close as possible to the combat situations experienced in jungle operations. Individuals are taught to think and react professionally under extremes of pressure.

Knowledge of the Enemy. No effort is spared in ensuring that troops acquire a thorough knowledge of the enemy. His objectives, organization, characteristics, tactics and capabilities are studied in detail. Ground research teams are despatched to scenes of contacts to conduct immediate, on-the-spot investigations, to identify changes in enemy pattern of activity or tactics, if any, or failure of our own techniques, if any. Findings are analysed and counter-measures developed and injected into the training system as rapidly as possible. This responsibility, of staying one jump ahead of the enemy, is vested in the Centre's Tactical Evaluation Wing.

Tactical Proficiency. Mastery of minor tactics is given the highest priority while variations to contact drills are taught to avoid falling into the enemy's planned traps. Section and platoon commanders are trained not to apply contact drills rigidly since inflexibility in applying them have had unpleasant consequences: the enemy does not take long to study our pattern of drills and turn it against us. Commanders are taught to think first, think fast, and appreciate the possibilities before reacting. Although set drills exist, practical alternatives must be employed depending on the assessment of the situation.

Shooting. The CT has developed a very high sense of reaction in the jungle and disappears at the flicker of an eyelid, when encountered. Hence training concentrates on jungle shooting techniques. This includes rapid and effective shooting at fleeting targets along jungle lane and sneaker ranges utilizing both mechanically and electronically controlled targets.

Confidence. This aspect is instilled primarily through battle inoculation as well as abseiling and repelling training from helicopters into dense jungle.

Map Reading. Owing to the density of

the jungle and ruggedness of terrain, training emphasis is placed on the intelligent use of compass bearing and distance measurement as the main aids to accurate map reading. However, the ability to read and interpret the map in relation to the ground is not neglected either. Navigation training is conducted for day and night movements.

SPECIALIST TRAINING

There are two vital requirements to the successful conduct of jungle operations. Firstly, one must be able to locate and follow an enemy moving in the jungle. Secondly, the long duration of an operation coupled with the need for quick mobility may necessitate living off the jungle. PULADA conducts the Combat Survival and the Combat Tracker courses to cater for these requirements.

Combat Survival Training. The fundamentals and principles of jungle survival are taught to the students. They are then put through three intensive test exercises. Skills taught include recognition of edible plants and plants of medicinal value, making of animal and fish traps, construction of shelters from jungle materials, lighting of fire without matches or with limited resources and making of rafts and paddles. During the final test exercise, individuals are left in the jungle in groups of two or three equipped only with personal weapons, machete, water sterilizing tablets, a box of matches and a field dressing. No food is provided and students have to survive under extreme simulated combat conditions for a period of eight days.

The Combat Tracking Course. It trains individuals in the art of tracking in the jungle. The art taught combines the collective skills of the Iban and the Orang Asli, the aborigines of Sarawak and Peninsular Malaysia respectively. On completion of the course, the participants become invaluable to their units. Some are retained in the Dog Unit of the Centre for employment as visual trackers with the Combat Tracker Dog Teams.

RELATED TRAINING

Apart from individual and specialist

training for jungle operations, PULADA also specializes in related training, such as anti-vehicle ambush, air-mobile operations, fire support bases, booby traps and assault on CT camps.

Anti-Vehicle Ambush. CT ambushes along roads in remote areas and logging tracks used to produce the highest percentage of casualties sustained by security forces. The normal accepted anti-vehicle ambush drills proved largely ineffective against the ingenuity of the CT in his choice of ground and the skilful use of booby traps and mines. To counter this, PULADA now advocates foresight and aggressiveness — the principle of staying one jump ahead. All moves along black roads and logging tracks are planned and executed as an 'advance to contact' operation, including pre-planned fire support. It does not however preclude the taking of risks, providing they are calculated risks.

Airmobile Operations. Helicopter support is vital in remote areas and in deep jungle operations. However, the number of helicopters and fire support resources available to the Army, though adequate, are in no way comparable to what was available to the American and other forces operating in Vietnam. Hence the Malaysian Army has had to produce its own airmobile doctrine to ensure the most effective utilization of the limited resources. Training is concentrated on troop-lifts into the jungle, resupply, casualty evacuation and helicopter gunship support. It includes the techniques of constructing LPs and LZs, with reliance, mainly, on machetes and explosives. Initial security of LPs and LZs, where possible, is done by troops moving in on foot rather than by airmobile assault, to enhance security. Initial ground security must extend to a radius of 300 metres around the LP to prevent CT ambush of helicopters with small arms fire. All combat troops are trained in abseiling so that, for airmobile assaults, initial sorties do not have to be landed, thus minimizing danger of damage to aircraft from booby traps and mines which may be planted on LPs.

Fire Support Bases. The fire support base concept is used extensively for all jungle operations. As the Artillery current-

ly has only a close support capability, fire support bases have to be redeployed frequently to stay abreast of the fluid situation. Redeployment is essentially by air. Fire support bases vary from troop positions to full regimental positions. Mutual support between bases is difficult at times because of the vastness of the area of operations, coupled with the limited resources. Training places very great emphasis on the requirement for reliable and extensive local defence arrangements.

Booby Traps. The clever and effective use of booby traps by the CTs has resulted in many casualties amongst troops. The possibility of stepping on enemy booby traps has also a tendency to slow down or freeze reactions at vital moments. This tendency is more dangerous than the booby traps. Training in PULADA emphasises that a booby trap is an obstacle rather than a weapon. It inflicts fewer casualties than a machine gun or any other small arm. All combat troops are trained in detection and marking of booby traps for subsequent disposal by combat engineer teams or assault pioneers. PULADA also trains and provides operational Search Dog Teams to operational units for detecting mines, booby traps, weapon and food caches.

Assault On Insurgent Camps. The CT camps encountered fall into two basic categories. They are either staging camps or permanent camps. Permanent camps have complex bunker and tunnel systems which can withstand attacks by even rockets and 500-pound bombs. Staging camps are less sophisticated but have strong points and trench systems.

A feature common to both types of camps is the extensive use of booby traps. Booby traps are sited as far as 1000 to 1500 metres from camps, along all likely approaches. They serve a dual purpose — as early warning devices, and, to impede the progress of security forces. The booby traps increase in intensity closer to camps and within the camp areas. These are designed to inflict maximum casualties on the attacker during the assault and subsequent reorganization.

The location of camps is invariably on narrow ridges offering, at best, one or two approaches and an extremely difficult target to engage effectively with guns or

mortars. Any conventional means of assaulting these camps would be very costly in casualties.

Training for the assault of these insurgent camps, in essence, involves the maximum use of deception, multi-directional attacks, sound breaching techniques and large numbers of well-trained troops. PULADA has constructed exact replicas of these camps within the training areas to practise troops in all the complexities of assaulting such camps.

RESULT

PULADA does not claim to have found the ultimate answer in fighting the CTs in the jungle. However its methods have worked and produced good results. The training has produced soldiers who are tough, skilful, resourceful and patient, who can outfight and outlast the enemy in a fight which is normally protracted and consists of fleeting encounters.

ACKNOWLEDGEMENT

The Chairman, Army Doctrine Committee, wishes to acknowledge the following assistance which made it possible to bring out this issue of SOROTAN DARAT in time for the Golden Jubilee celebrations of the Army.

Commandant	— Services of the Chief Editor; typing
MPAT	and other assistance.
Armed Forces	— Services of a typist.
Library	
Chief Engineer,	— Services of a draughtsman.
Engineer Branch	



COMBAT INTELLIGENCE IN COUNTER-INSURGENCY WARFARE

Brigadier Jeneral Abdul Rahman B Abdul Hamid

A number of circumstances have led to our field commanders relying heavily on the Special Branch and the Military Intelligence Special Branch for the intelligence required in the planning and conduct of their operations. Intelligence is, in fact, a *command* function. The over-reliance on the SB and the MISC has resulted in the non-utilisation or misemployment of other intelligence resources available to the commanders, to the detriment of operational success. The situation calls for urgent review and correction.

INTRODUCTION

Combat Intelligence is one of the main ingredients required for the success of tactical operations. In our more than 35 years of experience in fighting Communist terrorists, combat intelligence has contributed immensely towards the suc-

cesses we have achieved. The successful outcome of the 1948-60 Emergency was mainly due to the proper and timely use of intelligence and the adoption of the right concept for operations. Presently, our ability to suppress and contain the Malayan Communist Party's activities has come about also through the effective

use of combat intelligence.

Combat intelligence, within the Malaysian environment, is not only confined to knowledge about the enemy but also about the terrain, weather and population. The collection, collation and interpretation of intelligence is one of the main functions of a commander. He must utilise all the resources within his command to procure intelligence and use it to support his tactical operations. However, since our constitution has made the Special Branch (SB) of the Royal Malaysia Police responsible for procuring Internal Security intelligence, most commanders tend to neglect their responsibility for gathering intelligence.

AIM

This paper attempts to discuss the problems of obtaining combat intelligence within the context of the Malaysian environment.

SCOPE

Combat intelligence is a complex subject for discussion, particularly in a counter-insurgency situation, as it differs from one situation to another. The discussion in this paper is confined to the current practice of intelligence procurement within the Malaysian Armed Forces and its shortcomings.

NEED FOR MILITARY INTELLIGENCE

In view of the fact that the threat posed by the communists affects the security of the people, the Police, being the law-enforcement agency, have been given the responsibility to procure Internal Security intelligence. This responsibility is vested in the SB.

The primary role of our Armed Forces is, and has always been, to defend the nation against external aggression. However, the escalation of the threat posed by the Communist Terrorist Organization (CTO) and the Sarawak Communist Organization (SCO) in the post-Confrontation period and the shortage of manpower in the Police Force, necessitated the commitment of most of

the resources of the Armed Forces in countering the communist threat. Subsequently, by the mid-seventies, the Army had virtually taken over the responsibility for Internal Security operations from the Police. Hence, the Army became the main user of intelligence collected by the SB. This led to the tendency of relying on the SB for intelligence.

This reliance on the SB had also come about for another reason. The Army had earlier found that the SB, on its own, was unable to fulfil the Military Intelligence requirement. To overcome the problem, the Army then decided to radically expand the military component of the SB, the Military Intelligence Special Branch (MISB). From then on, military commanders became accustomed to being dependent on the MISB for combat intelligence and, in the process, inadvertently neglected to utilise other resources placed at their disposal in the meantime.

COMMANDER'S RESPONSIBILITY

Intelligence is a command function. It is the responsibility of the commander to use his own resources to procure combat intelligence. In short, a commander must actively involve himself in planning and directing the collection of intelligence. To date there has been little or no attempt by commanders to determine the intelligence requirement during their operational planning. Most commanders are keen to get 'kills' and insist that the intelligence agencies provide them only with 'hot' intelligence. On the other hand, they themselves are reluctant to decide and determine what they need to know. Thus the intelligence agencies are not directed to channel their efforts in the acquisition of any specific intelligence.

In a given area of operations, when intelligence on the enemy is not available, it is the commander's responsibility to divert his resources and effort towards acquiring the other aspects of intelligence on terrain, weather and population. Information on these elements is vital to the planning and conduct of tactical operations. But little emphasis is being given to these aspects of combat intelligence by our commanders in using

their own resources to direct the collection of information.

Intelligence procurement in a counter-insurgency situation is a complex task. It entails proper planning, direction, supervision and full use of all available resources. Above all, it requires well-trained intelligence officers, with sufficient maturity and considerable experience, to undertake the job effectively. To-day, however, the officers selected to hold intelligence appointments seldom meet these requirements. They are invariably young and inexperienced. As a result, these officers fail to live up to the performance expected of them and, more often than not, they are misemployed. This has also contributed to the commanders' reliance on the SB for their intelligence requirements. Such a situation could have been avoided if intelligence training had been emphasized and suitable officers selected to fill intelligence appointments.

In most units to-day, the commanders tend to burden their intelligence officers with the responsibilities of running their respective unit's operations. Due to this added responsibility, the intelligence officer is hardly left with any time to devote his attention in his intelligence work. The intelligence officer becomes chairbound and his primary task of intelligence acquisition is, therefore, neglected. Over and above this added responsibility, the intelligence officer, because of his acquaintance with the general situation, is also made to attend the numerous civil/military/police meetings which are held within the unit area of operation. Consequently, arising from the misemployment of the intelligence officer, operations are often mounted without due attention being given to intelligence requirements.

MILITARY INTELLIGENCE RESOURCES

Basically, these resources are divided into two: military intelligence units and the combat units. In counter-insurgency operations, military intelligence units provide support to their operational units through their staff and operators attached to the SB. In addition, they also have the capability to provide combat intelligence

procured independently through their specialist and technical units.

Intelligence organisations are organic to all combat units. An Intelligence Section is established right down to regimental and battalion level. Within the battalion, some of the organic elements that could be used to procure combat intelligence are screens, patrols, observation posts, assault pioneer elements, the Unit Combat Intelligence Section (UCIS) and Mobile Fire Controllers (MFCs). In an area of operation, in addition to these resources, intelligence support could also be obtained through government/quasi-government agencies, the local populace and other services.

When planning an operation, the commander needs detailed knowledge of the enemy, weather, terrain and population. The resources mentioned earlier have the capabilities to acquire the intelligence needed. Some examples of what these resources are capable of doing are:

- * Detection of enemy activities and movement, such as determining infiltration routes, camps, RVs, dumps, and dead letter boxes (DLBs).
- * Study of enemy tactics and techniques, such as signs, siting of camps and booby traps.
- * Study and updating of terrain intelligence, including familiarization of the area of operation.
- * Determination of the local population in respect of distribution, racial breakdown, activities, key communicators and their sensitivities.

INTELLIGENCE AWARENESS

Materials found or recovered during encounters or by chance patrolling, are potential sources of invaluable information. Such information can only be extracted if the materials are carefully examined and noted. Unfortunately, in most cases, these items are often ransacked by our troops without following a systematic procedure. Information of great potential is, therefore, lost when the items are unwisely tampered with. The necessity for troops to search all items found on these occasions is understandable. However, it

should be done with care and the items should be replaced exactly as found, until they are examined further by the MIOs and other specialist intelligence officers. There is also a tendency on the part of some individuals to pilfer some of the items found, to keep as their personal souvenirs. Findings of resting places, camps and dumps should also be similarly treated. Regrettably, in most cases, they are destroyed by our troops at the first available opportunity.

CONCLUSION

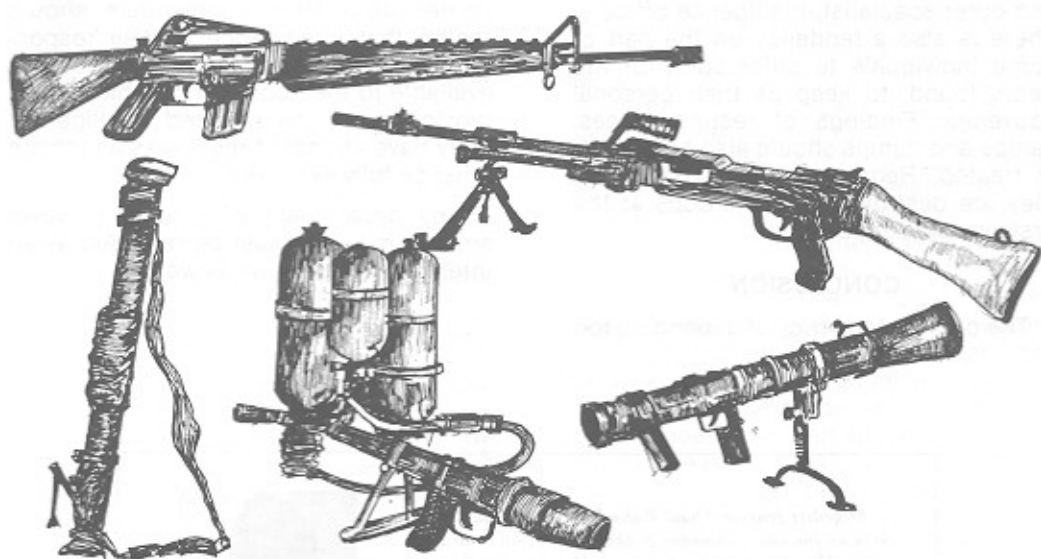
The present tendency of depending too

much on the SB and the Military Intelligence Specialist Units for intelligence must be reviewed immediately. Unit commanders should realize that intelligence is their responsibility and should examine the resources available to their commands which could provide them the required intelligence. They have abundant resources and these must be fully exploited.

Any deployment of troops, however small it may be, must be regarded as an intelligence operation as well.

Brigadier General Abdul Rahman B Abdul Hamid has held all the key commands in the Infantry up to Brigade level. His speciality is, however, Military Intelligence, having been battalion IO, Staff Officer (Intelligence) at Divisional Headquarters and Deputy Director, Military Intelligence, Ministry of Defence. He has also served as Defence Attache in the Philippines. Currently he is the Deputy Chief of Defence Intelligence Staff Division.





INFANTRY WEAPONS AND THEIR APPLICATIONS

Leftenan Kolonel Abdul Kadir B Nordin

Despite the increasing employment of highly sophisticated weapons on the battlefield, the evidence furnished by recent wars supports the contention that the infantry is still supreme on the battlefield. This being so, it is imperative to gain familiarity with the characteristics and employment of infantry weapons. Our infantry will shortly be acquiring the 12.7 mm HMG and the 106mm RR. But these additions will not completely erase existing deficiencies in the anti-armour capability of the infantry.

INFANTRY — THE KING OF THE BATTLEFIELD

In the Yom Kippur War of 1973, the 'invincibility' of Israel's Self Defence Forces (SDF) was, at last, shown to be a myth by

the Egyptians. The Egyptian *infantry* played the leading role in effacing the halo surrounding the SDF. For instance, in the initial phase of that war, the Egyptian infantry destroyed an entire SDF armoured brigade by the effective use of anti-tank weapons such as Swatter (AT-2),

Sagger (AT-3) and RPG-7 (Rocket Precision Guided). In the Vietnam War again, the military reputation which the Viet Minh and the Viet Cong earned in defeating the French and the Americans was derived mainly from the performance of their infantry. The successes of the North Vietnamese and Viet Cong infantry against the tanks, armoured vehicles and helicopters of the United States were the envy of all armies regardless of their political orientation.

The ongoing Iran-Iraq War has also demonstrated that it is the infantry which ultimately wins wars. When the Iraqis first stormed into Iran, they seemed to be under the impression that all they needed to carry them to Teheran were tanks and armoured personnel carriers (APCs). But the Iranian infantry counter-attacked and, before the Iraqis realised what had happened, they were embroiled in full-scale street-fighting in Khorramshar. The Iraqis had to withdraw, reorganise and reequip themselves with light infantry weapons and equipment before they could recapture Khorramshar. It is a disturbing fact that when an inexperienced army is given plenty of vehicles, everyone gets the idea of motoring along, enjoying the ease and protection afforded by the vehicles. The business of getting out on one's feet and actually fighting is easily forgotten — until something like what happened in Khorramshar gets in the way.

It is believed that the Soviets are learning similar lessons in Afghanistan. Their armoured troops which initially stormed into Afghanistan with their airborne divisions have since left and been replaced with infantry. There are still plenty of light armoured infantry combat vehicles left behind, but most of the fighting is now done by men in lorries who get out and walk over the hills and valleys to engage the 'Mujahidins', the freedom-fighters opposed to the Soviets. The Soviets also use helicopter gunships but the Afghans, having learnt to shoot at aircraft from the time the British tried to pacify them in 1919, are increasingly able to cope with these gunships.

All the foregoing examples support the contention that, despite rapid advances in technology and sophistication, the in-

fantry continues to play the central role in the combat zone. In other words, infantry is still 'King of the Battlefield'. Indeed, the reason why the Malaysian Army is 'infantry-heavy' may be traced back to this firm conviction. However, the infantry must be positively trained both physically and spiritually and appropriately equipped if they are to know exactly how to apply their training and use their weapons and equipment on the ground to win. It is nothing less than a crime for an infantry officer not to know the basic characteristics of infantry weapons in the current inventory. This article is intended to be a contribution towards spreading knowledge about the infantry weapons in use in the Malaysian Army and their applications.

PLATOON AND SECTION WEAPONS

For the purpose of clarity, the weapons and their characteristics will be described under three categories: Platoon and Section Weapons; Company Weapons; Battalion Weapons.

M16 and LMG 7.62mm

The principal weapons of the Platoon and the Section are the M16 assault rifle and the light machine-gun (LMG) 7.62mm. Combined, these two weapons enable the Platoon and the Section to provide the most effective fire-power up to a range of 800 metres. This is the range within which most infantry action takes place, because the primary role of the infantry is to *close* with the enemy and destroy him whatever the terrain and weather, whether it is day or night. Thus the two weapons are vital for the accomplishment of the Battalion mission.

It is, in fact, not essential for infantry small arms such as assault rifles to have an effective range of, say, 1000 metres because, in the heat of battle, a rifleman rarely opens fire beyond a range of 200-300 metres; often it is less than that. A recent study on the casualties produced by small arms in past wars has confirmed this view.¹ Besides, a rifle which could shoot up to 1000 metres would have to be heavy to have that range; it would, therefore, put the infantryman at a

disadvantage. When one talks about infantry 'pitched battles', one refers to combat at a maximum range of 300 metres, more often at 200 metres. To put it more specifically, what is required is that an infantryman in a defensive position, say in a trench, must be able to engage the enemy effectively at the maximum range of 300 metres. This is the critical combat range which will determine the outcome, victory or defeat.

The Army slogan 'satu peluru satu musuh' needs interpretation from this viewpoint. Perhaps it is not wrong to say that the slogan specifically demands that every infantryman must be a first-class shot at 300 metres and a marksman at 200 metres. If this interpretation is correct, then our current classification shoot requires modification, not only to achieve the goal of the slogan, but also because the former self-loading rifle (SLR) 7.62mm and the current M16 5.56mm assault rifle are of different breeds.

COMPANY WEAPONS

The infantry rifle company has four principal weapons, viz, 60mm mortar; 84mm recoilless gun (RCL); general purpose machine-gun (GPMG) 7.62mm; and, flame-thrower (for reorganised battalions). These weapons, manned by the Company Support Section, provide additional combat capability when the whole Company is tasked to accomplish a mission. In other words, the Company has an indirect-fire weapon capability, an anti-tank capability, a sustained anti-personnel fire capability and a flame capability.

The Company weapons are supportive in nature but are more lethal than those of the Platoon and the Section. Their principal roles are to destroy, suppress and reduce the enemy's effectiveness and to enable the Platoons in organised formation to achieve their missions, either to capture or to defend an objective. It is therefore necessary to address them briefly and individually.

60mm Mortar

By definition, a mortar is a high trajectory fire weapon in which the recoil force

is passed directly to the ground through a base plate. The mortar was one of the earliest forms of artillery. It is known to have been used by Muslim forces in the siege of Constantinople in 1451. The 'conventional mortar' is a muzzle-loading, smooth-bore weapon which fires fin-stabilized subsonic bombs to establish zones of fire by variation of charge-weight. Range is adjusted by alteration of the tangent elevation. Mortars are usually divided into three classes: light — calibre up to 60mm; medium — calibre between 60 and 100mm; heavy — calibre in excess of 100mm.

The 60mm mortar in our service is the Commando Type 'A'. Its biggest drawback is the absence of a sight-unit, a deficiency which creates problems in accuracy and adjustment of fire. A similar mortar, Type 'V', would have been a more effective and dependable weapon because it has a sight-unit. PULADA has improvised some modifications for our Type 'A' mortar to rectify the sight-deficiency, but the fact remains that the mortar crew have to be highly proficient in the operation of the weapon, in order to avoid killing more friends than foes in the heat of battle.

84mm RCL

This highly dependable anti-tank weapon has been in our service for sometime. It has been reported that this *anti-tank* weapon was used by the British in the recent Falklands War to shoot down a hovering Argentinian *helicopter*. In recent years the Swedish manufacturers of this gun have further improved this weapon to increase its maximum effective range to 700 metres. Its armour-penetration capability has been further enhanced by the use of FFV 551 RAP (rocket assisted) projectiles. However, being recoilless, the weapon has some major disadvantages. It cannot be employed where stealth and surprise are the essence of success, because its backblast and noise easily give away its position. In other words, it is best employed in a noisy conventional battle scenario.

GPMG 7.62mm

This weapon is derived from the MG 34

which the Germans introduced in the Second World War. A GPMG falls midway between an LMG and a medium machine-gun (MMG). Since the MMG is steadily losing its popularity with most armies, the GPMG is, more and more, assuming the role of an MMG. Normally it has two roles: an LMG-role up to a maximum range of 800 metres, and, a sustained fire role up to a maximum range of 1800 metres. It is in the latter role that the GPMG is most useful, as an area weapon. With the use of a dial-sight, the weapon can also engage targets effectively at night or in ambient light. To employ the weapon in the first role, i.e. as an LMG, is tactically unsound, unless it becomes unavoidable. Careful siting by employing the enfilade/defilade technique, is equally important. By using armour-piercing rounds, the weapon can also neutralise light armoured vehicles.

Flame-Thrower

Although flame-throwers have been in use since the early years of this century, its development has received comparatively little attention. The weapon in our service is the Model T-148/A, from Italy. It is extremely light, efficient and safe in operation. One of its important features is that its lance has an electronic device for igniting the inflammable gelatin. This arrangement produces a much superior flame-power compared to that obtained from the incendiary cartridges used in other types. This flame weapon has a maximum effective range of 70 metres. It is deadly dangerous in indiscriminating hands because, once fired, its flame could be beyond one's control. It is, however, useful in tunnel-clearing and denial operations. It can also be used against tanks at close range and in counter-ambush action if an opportunity presents itself.

BATTALION WEAPONS

The principal battalion weapons are: 81mm mortar; 12.7mm HMG (heavy machine-gun); 106mm RR (recoilless gun). The last two are yet to be issued to the reorganised battalions. Assuming that these weapons will soon be made

available, they are the main assets available to the Commanding Officer to influence the course and outcome of his battles. Success or failure will depend, among other factors, on his expertise and ability to employ these assets to outwit and outgun the enemy.

81mm Mortar

Like the 60mm mortar, this weapon is highly lethal and equally dangerous in the hands of an unskilled crew. Good map-reading and computerization of correct data are essential for its effective and safe employment. With the recent introduction of the computer data system, MORCOS, the effectiveness of the Mortar Platoon has been greatly enhanced. However, this innovation requires that the mortar crew must be technically proficient for tactical employment.

12.7mm HMG

Machine-guns are classified under various labels, viz, machine-pistol, light machine-gun, general purpose machine-gun, medium machine-gun and heavy machine-gun. The term HMG is used to denote a gun which is less than 20mm in calibre and which fires solid bullets rather than shells. The HMG first appeared in 1918 as the M2. Despite its comparatively



12.7mm Heavy Machine-Gun

long lineage, the HMG is becoming increasingly popular with most armies of the world. This weapon has four principal roles:

- * Provide protection for vehicle movement and parking and for train bivouacs.
- * Provide defence against low-flying aircraft.
- * Destroy lightly armoured vehicles.
- * Reconnoitre suspected enemy positions by fire.

Being similar to the GPMG, this weapon could be considered a fire-unit for the purpose of fire-planning. It has two principal ground mounts, viz, the tripod mount (M 3) and the antiaircraft mount (M 63) and three principal vehicular mounts, viz, the truck mount (M 36), the pedestal truck mount (M 31 C and M 24 A2) and the commander's cupola (M 113) mount for an APC.

The Battalion will soon be equipped with HMGs and three types of mounts (the tripod, pedestal and antiaircraft). The HMG carrier is a 1/4 ton 4 x 4 which could carry 1000 rounds and the crew. The weapon would use two types of link ammunition, viz, ball and tracer; armour-piercing incendiary hard core (APIHC) and tracer. It requires highly proficient crew for its effective employment. The various techniques of fire and of engaging hostile aircraft require much drilling and practice to master. The gun's maximum effective range in the antiaircraft role is 800 metres; it can engage a variety of aircraft:

surveillance, reconnaissance, liaison, troop-carrier, helicopter and drone.

106mm RR

This weapon came into use in the mid-1950s and is now found in substantial numbers in many armies. It is the first recoilless gun to come equipped with a spotting rifle for the gunner. In addition, a laser range finder has been developed for this gun recently. The weapon is designed for both anti-tank and anti-personnel roles. The Battalion will be equipped with this gun shortly and each will be mounted on a 1/4 ton 4 x 4 carrier; for the ground role, it will use a tripod mount. It is a simple flat-trajectory weapon and requires a 4-man crew, including the driver, for its operation. Two points need stressing in the employment of this gun.

- * Range Determination. The time available to fire in combat conditions is usually limited. Therefore quick and accurate determination of range is critically important to ensure a first round hit. (By equipping the gun with a laser range finder, the chances of getting a second shot at a moving target can be improved.)
- * Speed and Lead Determination of Target. The primary method of determining lead is to estimate the apparent speed of the tank and convert it to lead. Space does not allow detailed elaboration but, suffice to say, the core of professionalism is expertise, which is acquired through training.



106mm Recoilless Gun

The ranges of the infantry weapons discussed above are shown on the attached sheet.

CONCLUSION

The rapid progress in weapon technology has not made the infantry obsolescent. Territorial claims can be sustained only by physical occupation by man. The Malaysian environment dictates that the infantry will continue to remain 'King of the Battlefield' because our tropical terrain has been proven many a time to be the ideal battlefield of the infantry. This is not to deny that the infantry will always require the support of other essential combat support elements, particularly that of an efficient logistical system.

Our infantry is adequately equipped in essential weapons, but its capacity is limited in certain areas. At Section/Platoon level, the indirect-fire capability needs to be improved by providing either a sight-unit for the 60mm mortar or an ef-

ficient launch-grenade for the rifle. This level is also vulnerable to tanks and other armoured vehicles. To overcome this deficiency, it needs to be equipped with a light anti-armour weapon (LAW) which has a maximum effective range of 300 metres. At Battalion level, the 106mm RR is a good anti-armour weapon in places where the tank is not a major threat. The provision of anti tank guided missiles (ATGM) at this level would be more cost-effective in the long run, in terms of hit probability, armour penetration and the absence of back-blast.

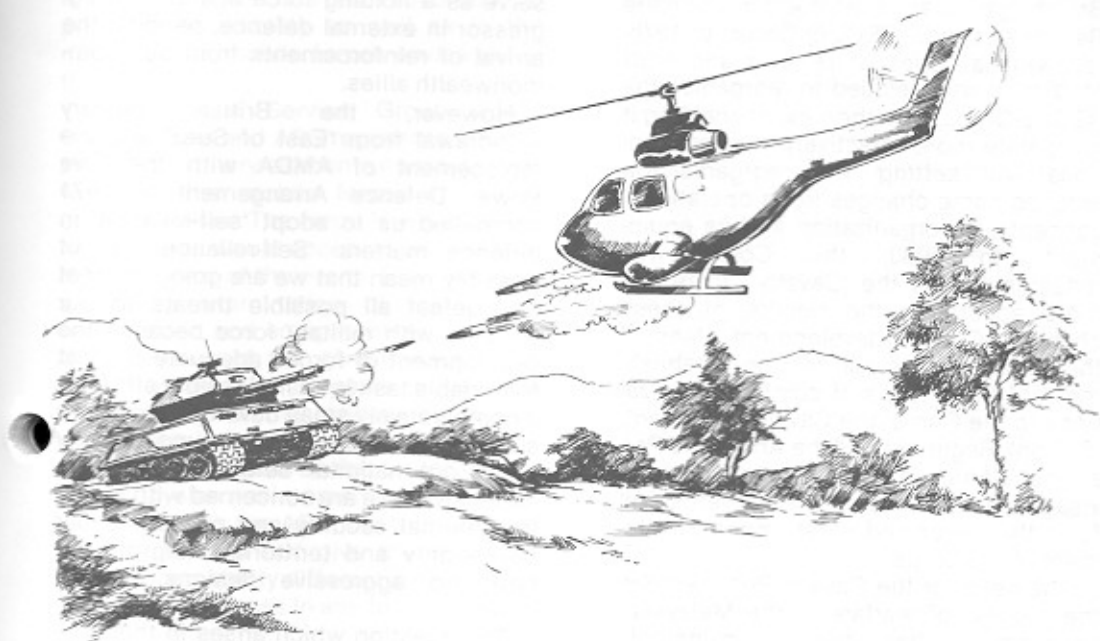
Weapons alone do not make the infantry the 'King'. The infantry must also improve its training efficiency and proficiency in handling its equipment. The capabilities of every weapon must be maximised and the vulnerabilities minimised by the application of common sense in order to accomplish war missions. The infantry must go for more performance-oriented training in which tactical applications of weapons are emphasized.

Note

1. 'Recent Studies on Casualties'
in *Jane's Infantry Weapons 1981/82*, p. 101.

Leftenan Kolonel Abdul Kadir B Nordin, of the Royal Malay Regiment, won the PGB for his gallant actions in operations against Indonesian infiltrators in Johore during Confrontation. He has been Military Assistant to the Chief of the Armed Forces Staff and Commanding Officer of 20 RAMD. Currently he is Staff Officer Grade 1 (Technical) in the Infantry Directorate.





A CRITIQUE OF THE DEVELOPMENT PLANS OF THE ROYAL CAVALRY

Leftenan Kolonel E.W. Rodrigues

This is the condensed version of a long and strongly worded article entitled 'The Development of Doctrines and Organizations of the Cavalry Corps', written by Leftenan Kolonel Rodrigues on behalf of the Cavalry Directorate and forwarded to us by that Directorate — which implied that it approved of its contents. Since the original article tended to stray into sensitive areas outside the scope of its title, it became necessary for us to recast it to focus on the main issue which the author appeared to be pursuing. Even in this milder and truncated version, the article is provocative, but it is being published in deference to our belief that controversy has the constructive role of stimulating thought and discussion. The author's main argument is that, instead of establishing a Tank Regiment, the Army should go for air-mobility. His arguments and contentions suffer from failure to quote relevant published sources.

INTRODUCTION

The Cavalry Corps of the Malaysian Army had its origin in the Federation Armoured Car Regiment (FACR) which was

established in 1952. In 1960 the FACR, a cavalry organization based on the British Army's Armoured Car Regiment, was amalgamated with the Federation Regiment, an organization patterned after the

British light infantry regiment, to form the Reconnaissance (RECCE) Corps. In 1978, following a series of reviews and staff studies, it was decided to reorganise the RECCE Corps, with the view of enabling it to operate more effectively in a 'conventional war' setting. This reorganisation entailed some changes in its operational concepts, its organization and its equipment. In 1980, the Corps was redesignated as the 'Cavalry', to reflect more accurately the results of these changes. Current development plans of the Cavalry Corps call for the establishment of three types of combat organizations in the Corps: the Cavalry Regiment, the Tank Regiment and the Armoured Personnel Carrier (APC) Regiment. It is envisaged that the Cavalry Regiments will form the major and most important element of the Corps.

The need for the Cavalry Regiments in the context of warfare in the Malaysian environment has been convincingly argued and established. The requirement for the Tank and the APC Regiments, on the other hand, is not so convincing. It is submitted that the development plans for the Cavalry merit a reexamination with due consideration given to the paramount importance of gaining mobility on the battlefield.

THE ROLE OF THE CAVALRY

When the FACR was established in 1952, Britain was fully responsible for the security of Malaya. Consequently, the Regiment was created to serve as an adjunct to the more powerful armoured forces then deployed by the British in Malaya to suppress the Communist rebellion which had brought about the First Emergency (1948-60). The signing of the Anglo-Malayan Defence Agreement (AMDA) on the attainment of independence meant that we would continue to enjoy military protection from Britain. Britain, in fact, honoured her treaty commitment by coming to our aid in the Confrontation episode. Thus, we find that, in the period of its development between 1952 and 1965, the defence role that was conceptualised for the Malaysian Army was oriented towards internal security, coupled with the defence capability to

serve as a holding force against the aggressor in external defence, pending the arrival of reinforcements from our Commonwealth allies.

However, the British military withdrawal from 'East of Suez' and the replacement of AMDA with the Five Power Defence Arrangement in 1971 compelled us to adopt 'self-reliance' in defence matters. 'Self-reliance' cannot possibly mean that we are going to meet and defeat all possible threats to our security with military force because the development of forces adequate for that formidable task is an impossible effort for a comparatively small developing country such as ours. One thing is undoubtedly clear: our national defence posture is 'defensive'. We are concerned with ensuring internal security and protecting our sovereignty and territorial integrity. We have no aggressive designs against others.

The question which arises in this context concerns the nature and magnitude of the threats which we are likely to be confronted with in the foreseeable future. In general, it is anticipated that the likely threats to our security will be mainly from Communism — external as well as internal. Military operations in this context could range from internal security operations to war against developed guerrilla forces. There is also the possibility of overt aggression by Communist forces from without, in the form of limited attacks or even limited war. Such seems to be the threat assessment on which the Army Development Plan of 1979/80, of which the Cavalry Development Plan is a part, is based.

DEVELOPMENT PLANS FOR THE CAVALRY

The Army Plan calls for the establishment of Cavalry Regiments on the basis of one Regiment to a Division and a Tank Regiment and an APC Regiment to be centralised under Army control. No reserve forces are envisaged for the Cavalry Corps. The Plan is infantry-biased and clearly influenced by our past operational experience against communist terrorists (CTs) as well as certain rigid doctrinal perspectives. This is evident in the

low priority which has been accorded the principle of mobility as well as in the nature of the mobile forces envisaged in the Plan.

The Special Service Group (SSG), Cavalry, Tank and APC regiments and the attached Artillery elements constitute the whole of the mobile forces envisaged under the Plan. The force levels of these components would appear to be balanced in the context of the overall Plan, but even a cursory examination of their roles, organization and equipment would show that they would not give the Army the *necessary mobility potential* to meet the requirements of the modern battlefield, particularly in the Malaysian environment. It is the contention of this writer that, in the Malaysian environment, the main battle tank (MBT), the APC, the truck and the paratrooper will not give the Army the necessary mobility differential that will be needed for success in any future conflict.

MOBILITY

Historically, the effectiveness of ground forces has been directly proportional to the ability of those forces to move and shoot. More importantly, the success or failure of those forces has been dependent more on their *mobility* than upon the extent of their firepower. Over the years progress in the ability to move has been slow and tedious because battlefield conditions impose serious limitations on the ground-based or mechanised vehicle. Rivers, marshes, swamps, mountains and man-made obstacles have, in general, slowed armies to the pace of the individual foot soldier. On the whole, improvements in surface mobility have been marginal. The history of warfare shows one constant, that victory on the battlefield goes to the side that can best manoeuvre and employ its firepower flexibly. The progressive modernisation of armies has been very largely a story of the effort of land forces to gain a conclusive advantage in their ability to move and employ their weapons against their enemies. This advantage today clearly lies in *tactical air-mobility*.

Advances in aviation technology and the adoption of air-mobility systems employing the Army helicopter and the

Army light fixed-wing aircraft to replace in part and augment the traditional ground systems of the truck, the armoured combat vehicle and ground-based fire-support systems have greatly improved the combat-effectiveness of the modern army and given it a mobility advantage over its more traditional enemies. The advent of the helicopter has been more instrumental in the evolution of modern ground warfare than any other single effort since the advent of tactical nuclear firepower. It gives modern land forces a tremendous boost in battle area mobility for all military missions dependent on mobility. Air-mobility offers the battlefield commander tremendous gains in his ability to find, surprise, and fight the enemy, to bypass obstacles and strong points, and to concentrate forces quickly at the point of decision with a maximum of surprise and a minimum of casualties. The air-mobility concept combines aircraft for battlefield transport, aircraft for immediate and continuous fire-support and aircraft for combat service support into an integrated concept of operations. In this integrated concept, surface means of transport, and some surface means of fire delivery are replaced by aerial means. This gives the Army an order of magnitude increase in the mobility of ground combat forces which can never be matched by any improvements in surface means of mobility, and which could prove decisive in the Malaysian operational environment.

AIRMOBILITY FOR THE MALAYSIAN ARMY

A review of the various forms of conflict — from counter-revolutionary warfare to conventional warfare — which have taken place in the last 15 years shows clearly the overwhelming superiority of air-mobile forces over those without the same capability. In Vietnam, Afghanistan and in the Middle East, where open warfare has occurred, the air-mobility concept has proven itself. It is therefore very clear that for any army to remain progressive and cost-effective in the modern context of warfare, the development of an air-mobile capability is a prime requirement. In the present

writer's view, the Malaysian Army should now develop an air-mobile capability in order to operate effectively in our environment. However, cost-effectiveness being a crucial consideration, air-mobility can only be provided to selected elements of the Army and to particular activities and weapon systems. Air-mobility fits into our continuing and overriding aim of progressive improvement in our combat effectiveness. In pursuing this objective, everything we buy, use and do has to contribute directly to the success of the soldier in battle. Accordingly, our plans for air-mobility must be kept in this context, both conceptually and equipment-wise. The Army's mission is to perform combat on land. Therefore 'air-mobility' is used to denote the employment of Army aerial battlefield vehicles (ABVs) — be they rotary-wing or fixed-wing vehicles — to move personnel, equipment and cargo in the combat zone and to furnish aerial platforms for our weapons and fire-support systems. In this regard, our air-mobility plans should be premised on two general lines as described below.

Firstly, Army air-mobility should cover the employment of ABVs to improve and extend the effectiveness of particular activities such as command and control, observation, reconnaissance, target acquisition and quick reaction drills and weapons and fire support systems for such tasks as anti-armour, direct fire support, battlefield interdiction and harassing fire tasks. Other important activities would include casualty evacuation and replenishment.

Secondly, to develop an integrated concept for the use of aircraft of various types in lieu of ground vehicles, to improve battlefield mobility and, thus, the effectiveness of the Army. This concept can be logically evolved from a review of the major functions of the Army in combat, as follows:

- * Command and control, observation, reconnaissance, target acquisition and battlefield communications will require mainly light ABVs such as Aerospatiale SA 342 Gazelle, the Bell Texastranger, the Hughes 500 MD Defender II or the MBB BO 105.
- * Battlefield transport will require such

utility tactical transport aircraft systems (UTTAS) such as the Bell UH series of helicopters (UH-1D, UH-212, UH-412), the Westland Battlefield Lynx or the Sikorsky UH-60 Blackhawk.

- * Immediate, intimate close fire support could be provided by suitably equipped light ABVs or the heavier-lift utility ABVs, depending on mission requirements. The utility ABVs would be preferable because of their heavier-lift capability for this role. (The highly specialized AH-1S Huey-Cobra, the Augusta A-129 Mangusta or the Hughes AH-64 Apache are considered to be unsuitable to our requirements for reasons of cost-effectiveness and their configuration inflexibility).
- * Battlefield logistic support would be carried out mainly by the UTTAS helicopters described above.

As noted earlier, air-mobility can be provided to only selected elements of the Army and to particular activities and weapon systems. The selected elements would logically be the SSG Regiments, the Cavalry Corps, the attached elements of the Artillery and the Signals and elements of the Transport Corps.

With regard to the particular activities which demand an air-mobile capability, these would be: command and control, observation, reconnaissance, communications, target acquisition and casualty evacuation. This implies the provision of air-mobility to the HQ of formations and to those of the mechanized units, elements of the Signals, Artillery observers and certain elements of the transport services.

CAVALRY CORPS

The Cavalry or Armour in the Western armies has been notable for establishing and exploiting mobility and firepower in proper combinations and relationships. In this regard, the air-mobility concept has been proven conclusively in the variety of cavalry roles, especially for reconnaissance and surveillance, security and economy-of-force tasks. In the Malaysian Army, the Cavalry Corps is, logically, the arm most suited to the air-mobility concept. Air cavalry units in the US, French

and Israeli armies have conclusively demonstrated the need to possess an air-mobile capability to function effectively on the modern battlefield.

It will clearly be prohibitively expensive to attempt to transform the whole of the Cavalry Corps into an air-mobile organization. Furthermore, such a move is not desirable from the point of view of overall operational flexibility and cost-effectiveness. Besides the formidable problems of procurement, fuel consumption and maintenance, the air-mobility concept is not the panacea for every military situation. There is no denying that there will be the continued requirement, and a major one at that, for ground-based mobile forces in our environment. What is suggested here is that the creation of elements possessing air-mobility in the Cavalry Corps will complement and enhance the combat-effectiveness of the groundbased forces.

CAVALRY REGIMENTS

It is envisaged that the Cavalry Regiments, the major and most important constituent of the Cavalry Corps, will continue to remain as the ground-based units of the Corps. However, in keeping with their operational philosophy, they will need to be given an organic air-mobile capability to improve and extend their combat effectiveness. This could take the form of an Air Cavalry Troop established under the Support Squadron. This Troop will greatly improve the capabilities of the Regiment for deep reconnaissance, area surveillance, wide-ranging security operations and, in some situations, economy-of-force operations. The Air Cavalry Troop may be equipped with the following ABVs:

- * A Troop HQ provided with three UTTAS helicopters, including one for supply and the other for the maintenance detachment.
- * An Aeroscout Section provided with five light ABVs, all armed and equipped for reconnaissance, observation, surveillance and target acquisition.
- * A Reconnaissance Section provided with three UTTAS helicopters manned by air assault troopers.

The organization of the Cavalry Regiment will require some modifications to improve its combat effectiveness with the acquisition of the Air Cavalry Troops. Briefly:

- * The APC elements of the Cavalry Troop will require to be reconfigured to provide two anti-armour detachments mounted in one APC. These detachments should be equipped with medium range anti-tank guided weapons (ATGWs). The other APC would carry two anti-aircraft detachments equipped with handheld surface-to-air guided missiles (SAGMs). This reconfiguration in the Cavalry Troop would provide the Cavalry Squadron with an effective and viable anti-armour and anti-aircraft capability when operating independently in support of brigades.
- * Support Squadron will have to be enlarged to include, besides the current AA Troop and the Assault Pioneer Troop, the Air Cavalry Troop described earlier, a Mortar Troop equipped with 120mm Mortars, and an Anti-Armour Troop equipped with long-range ATGWs. All Troops should have four self-contained Sections which could be detached to the respective Cavalry Squadrons in the Regiment.
- * The AA Troop in Support Squadron will have to be reorganised to provide a combination of rapid-fire AA guns and SAGMs in each of its four Sections.

The Cavalry Regiment, organized and equipped as suggested above, will give the Divisional Commander an optimum force for highly flexible and sustained operations against any opposing ground forces. This capability could be greatly enhanced and extended by the attachment of airmobile elements from the Air Cavalry Regiment (discussed below).

TANK REGIMENT

The provision in the Army Master Plan for the establishment of a Tank Regiment needs a reappraisal in the light of the overwhelming evidence that the tank as we know it has lost its preminent posi-

tion on the modern battlefield. Contrary to the claims of the proponents of the tank, it is not by any means a cost-effective proposition for the Malaysian Army. The advocates of the tank point out its cross-country mobility, its protective armour and its formidable firepower and argue that it (the tank) is likely to remain the single most important weapon for fighting the land battle. The fallacy of this claim is easily borne out by the wealth of evidence emerging from recent military conflicts around the world and from an objective observation of the facts.

The cross-country mobility of the tank is by no means a decisive characteristic, particularly in the Malaysian environment. The facts of terrain, both developed and undeveloped do not permit the tank to move freely about the modern battlefield. In the Malaysian environment, all movement will be channelled by terrain features that are untraversable to tanks — rivers, marshes, swamps, primary forest, mountains, and even the built-up areas of the urban complexes. This channelling of movement will obviously be exploited by opposing forces to the detriment of our own. Should these opposing forces possess air-mobile units and precision-guided munitions (PGMs), our tank and other armoured forces will be stopped in their tracks! Armoured fighting vehicles (AFVs), especially tracked AFVs, are not very mobile in the Malaysian terrain. This restriction in mobility adds another adverse feature to the tank — the lack of agility to avoid fire, which is a component of the characteristic of protection.

With regard to the "protective" armour of the tank, it is becoming increasingly clear that armour protection is not keeping pace with developments in armour-penetrating munitions. The fact that the newer MBTs in the inventories of the armies of the more advanced countries weigh well over 60 tonnes bears eloquent testimony to the fact that adequate armoured protection for today's AFVs has resulted in increases in vehicle weight which are quite unacceptable in the context of mobile armoured forces. It can be said that today, any AFV weighing less than 60 tonnes does not possess adequate armour protection for survival on the modern battlefield. This vulnerability

of the armour protection of the tank becomes all the more significant, particularly so when its other component of protection, its mobility, is also severely limited in the Malaysian environment. Thus, the use of relatively inexpensive munitions such as mines and PGMs, coupled with the great cost of a tank, will curtail its use in combat. Developments in the accuracy and lethality of modern weapons have led to the dictum that 'What can be seen can be hit, and what can be hit can be killed'. The advent of the Army ABV and the development of highly effective detection and target acquisition systems are making it increasingly difficult to conceal AFVs on the battlefield. Indeed, the tank has become highly vulnerable to a variety of threats, and is not likely to be very cost-effective.

The third characteristic of the MBT is its formidable firepower. The improvements in tank weaponry and the attendant target acquisition systems have given the tank great and effective firepower. However, the importance of tank firepower on the battlefield is in its mobility, armour protection and direct fire application. Without these capabilities, tank firepower becomes ineffective and is reduced to a supporting role.

The fourth characteristic of the tank is its flexibility. This flexibility stems from the three characteristics briefly discussed above. Flexibility is complementary to mobility. It should enable a commander to concentrate and switch firepower and combat power on the battlefield. It is also complementary to armour protection. The comparative immunity to fire gives the tank the power to close with the enemy in circumstances where this might otherwise be impossible. The loss of these other complementary characteristics, as discussed above, will reduce this flexibility of the tank.

The arguments above make a persuasive case against the acquisition of tanks for the Malaysian Army or their employment in the Malaysian environment. To add to these arguments, we need only to study the recent conflicts in Vietnam, West Asia and Afghanistan to glean further evidence that the days of the tank as we know it are numbered.

Coincidentally, the single most important development that is hastening the demise of the tank is another mobile vehicle, the Army ABV, or more specifically, the armed and armoured helicopter.

It is true that the helicopter is vulnerable to a wide spectrum of fire, but it is also true that it has a tremendous ability to avoid fire through speed, and by using the protective cover and concealment of the ground. Experience has shown that the helicopter is no more vulnerable than land-tied vehicles. Different flight patterns, the presence of flank and covering aerial fire, coordination with ground fire and close air support provided by the Air Force, air battle drills, very low altitude flying, evasive action, design improvements and the application of surprise, have all served to reduce the vulnerability of the helicopter to enemy air and ground action. There are many items of equipment in the Army's combat inventory which, in isolation, appear to be very vulnerable. A prime example is the individual soldier. The survival of the helicopter, like the survival of the soldier, depends on a proper assessment of the threat and the proper employment of the men and their equipment in the face of that threat.

It can be concluded from the arguments presented above that the tank is unlikely to perform effectively in the Malaysian environment. The axiom that the 'best anti-tank weapon is another tank' is no longer valid. The armed and armoured helicopter has clearly shown its superiority over the tank. In this regard, the Russians may have produced the answer to the tank in their formidable, all-purpose battlefield helicopter the Mi-24 Hind. This is clearly a fighting vehicle which *happens* to be a helicopter. Senior Soviet officers are reported as regarding the Mi-24 Hind as a combat vehicle for all occasions, probably one that will replace the tank in due course.

The warning flags are up. The evidence is there before us. The establishment of the Tank Regiment in the Malaysian Army will be a big mistake, particularly from the financial standpoint. The financial outlays that will be needed to procure, operate and maintain the tanks, not to mention the training of the crews and

maintenance specialists, would be better spent on developing an air-mobile capability for the Cavalry. The tank can be utilised in only one setting — that of combat, whereas the helicopter can be employed on a wide variety of tasks in war and in peace. In this respect, the helicopter must be viewed more as a surface vehicle than as a suprasurface vehicle in that it is terrain-dependent for its survival in combat. Furthermore, its unique capability to land almost anywhere, create a mass anywhere on the surface, or extract a mass makes it, in essence more of a terrain-oriented platform than an airplane.

AIR CAVALRY IN LIEU OF TANKS

The foregoing arguments and discussion naturally lead to the suggestion that instead of establishing a Tank Regiment in the Cavalry Corps, an Air Cavalry Regiment should be formed as a Corps asset, with the following organization.

- * An RHQ group, to include air mobile elements for the support of the Corps HQ. This group should comprise air-mobile command and control elements, an Air Cavalry Troop, an Attack Helicopter Troop and a Service and Supply Troop.
- * One Air Cavalry Squadron comprising four Air Cavalry Troops and a supply and service Troop. Air Cavalry Troops would perform the same missions as the ground-based Cavalry Squadron — reconnaissance, security and economy-of-force tasks — and extend those capabilities over larger areas using their scout and attack helicopters.
- * One Attack Helicopter Squadron comprising four Attack Helicopter Troops and a Supply and Service Troop. The Attack Helicopter Squadron would perform the same missions as the Tank Regiment.
- * Finally, the ubiquitous HQ Squadron, with its Supply and Maintenance Troop, Transport Helicopter Troop, Air Medical Troop and its General Services Troop.

The Air Cavalry Regiment would

enhance ground force capabilities by complementing the ground tactical plan. The Attack Helicopter Squadron will be the swiftest and deadliest manoeuvre unit on the modern battlefield, while the Air Cavalry Squadron will be highly flexible and provide the ground commanders with unique reconnaissance and security capabilities. The Regiment will provide high-speed, extremely manoeuvrable combat and firepower that are readily available to Division, Brigade or Task Force commanders. The employment of the Air Cavalry Squadron would be very similar to the groundbased Cavalry Regiment, while the employment of the Attack Helicopter Squadron would be very similar to that of the Tank Regiment. Because of their high manoeuvrability and attendant logistical requirements, elements of the Air Cavalry Regiment are normally assigned to the Division and Cavalry battle groups.

The suggested Air Cavalry Squadron would possess an anti-armour capability, but this would not be its primary mission. Anti-armour is one of the primary missions of the Attack Helicopter Squadron, which is similar to a tank unit, as it is able to manoeuvre and employ its massive fire against enemy armour. The Attack Helicopter Squadron, however, would have the ability to extend these capabilities over a considerably larger area and to do it very much faster than a tank unit.

Both Squadrons would employ aerial scouts as part of their missions. However, the missions of these aerial scouts would differ from one another. The Air Cavalry Scout's primary mission would be to seek out the enemy and fix his position avoiding, as far as possible, any fighting to achieve this. The Attack Scout would then take over and formulate the plan to annihilate the enemy. The Attack Scout would conduct reconnaissance of routes and approaches, holding areas and firing and assault positions for the combat elements of the Attack Helicopter Squadron and then take control of the engagement by observing the target area, providing target data to the gunships and directing the employ-

ment of their firepower. In this respect, he would not be very much different from the Artillery Air Observation Post (AOP) officer in his tasks.

Besides its anti-armour capabilities, the Air Cavalry Regiment would be the key to unleashing the manoeuvre capability of the ground forces, especially when used jointly with close air support aircraft of the Air Force. Units from the Regiment would be able to seek out enemy HQ elements, anti-aircraft artillery, electronic warfare (EW) systems and artillery gun positions. Attack helicopters could then attack those targets, disrupting command and control, dissipating the EW and the artillery capability, and puncturing the anti-aircraft umbrella to enable the Air Force close support aircraft to add their firepower to the land battle without interference.

THE APC REGIMENT

Another arguable provision in the Army Master Development Plan is the establishment of the APC Regiment. The APC Regiment is a concept initiated and developed by the Australian Army and currently being implemented on an experimental basis in that army. It is yet to be tested in the crucible of combat. This writer has not been able to obtain any specific information on the underlying principles for the establishment of the APC Regiment in the Australian Army, but an educated guess would indicate that an overriding consideration was economy of resources and effort. Nevertheless, a thoughtful and objective appraisal of the concept, viewed against the background of experience gained from our own experiments in Corps hybridisation during the period of the early development of the Cavalry Corps, has cast doubts on its efficacy for the Malaysian Army.

The establishment of the APC Regiment in the Malaysian Army was conceptualized on two premises:

Firstly, the APC Regiment would be established to provide armour-protected transportation for the Infantry and other arms and services in a CRW operational environment, not amounting to limited war. In this context, it was envisaged that mounted combat by the Infantry would be

incidental to their overriding primary mission of operations on foot against the CTs in fringe areas and in their deep jungle sanctuaries. The APCs would normally be utilised for tactical administrative movement — operational roulements and combat service support in the forward areas — and for escorts. It was therefore concluded that, unlike the mechanized infantry forces of other modern armies, the Infantry in the Malaysian Army would require nothing more in armoured mechanization than armour-protected personnel and cargo carriers, operated and maintained by another arm — the Cavalry —, to counter the vehicle-ambush tactics of the CTs.

Secondly, economic considerations and misconceptions of the technical maintenance capabilities of the Infantry dictated that the APC Regiment should be established as a unit of the Cavalry. In this, the example of the Australian Army was obviously a major influential factor. It was envisaged that major economies could be effected by the adoption of this posture. There would be economy of resources — fewer APCs would be required and smaller numbers of people would be involved; economy in operating effort — the Infantry would be relieved of the tasks of operating, protecting and maintaining the APCs; economy in maintenance — maintenance facilities and expertise already existed in the Cavalry; economy of training — the Infantry would be relieved of the task of having to train their personnel to operate the APCs, thereby enabling them to concentrate on their primary mission; and, finally, economy in utilisation — centralization would maximise utilization for a larger number of customers.

The concept of the APC as the battlefield alternative for the truck is clearly incorrect, and obviously postulated on combat in a CRW setting. However, the characteristics of modern conventional warfare demand that the Infantry utilise their APCs as extensions of their legs — to move them faster in a faster-paced battle environment. The APC has given way to the mechanized infantry combat vehicle (MICV), for ground combat and the UT-TAS helicopter, for deployment, flanking moves, envelopment and redeployment

on the battlefield. The tempo of warfare has increased in speed and intensity. The Infantry must now be prepared to fight, in some cases at 25 km/h, and, in others, at 180 km/h instead of 100 m per minute. In this context, the Infantry must mechanize some of its units, and airmobilize others, while retaining the bulk of its other units in its traditional 'foot-slogging' role.

The APC Regiment, as a unit of the Cavalry Corps, is clearly an anachronistic concept that must be discarded in the light of the new realities of combat today. As a transport-oriented organization operating in a combat environment, it is unlikely to perform effectively in either the combat role or the transport role. The paradox is that the APC is to be manned and operated by the Cavalry — the combat arm of mobile warfare, solely for utilisation by the Infantry, the combat arm of deliberate and more static warfare, and for the utilisation of the other arms and services. The contrasting operational perceptions and combat styles of the Cavalry and these other Corps are likely to create problems in execution at the critical time, and this could prove fatal on the modern battlefield. There is no place in the Cavalry Corps for an organization such should be consigned to the transport service organization, and as such should be consigned to the transport companies. Indeed, on the modern battlefield today, there will be the prime requirement for the Services organizations to be combat-oriented, and hence, the need for armoured transport companies!

MORE ON AIRMOBILITY

It should now be apparent that for any army to be progressive, the development of an air-mobile capability is an unavoidable requirement. The range, accuracy and lethality of modern weapons make them at least ten times more effective than the weapon systems of World War II. The proliferation of PGMs, especially the ATGM, and the development of "smart" munitions for the artillery with extended ranges and order of magnitude increases in accuracy and lethality have made survival on the battlefield all the more difficult. Armies are

increasingly able to fight at night, using new, sophisticated and highly effective sighting and sensing devices. But the most striking observation to be made is the tremendous increase in the speed and tempo of battle resulting from the extensive use of ABVs, AFVs and MICVs. Of these, the ABV, especially the helicopter in its many configurations, stands out as the most significant battlefield weapon system for fighting the land battle. The Malaysian Army should develop an organic air-mobile capability if it is to be an effective land combat force in any future conflict.

Here it remains to be emphasized that the air-mobility concept advocated in this article will not infringe on the missions and responsibilities of the Air Force. Army air-mobility will not duplicate the tactical air support missions which are clearly the responsibility of the Air Force. There will be the requirement for Air Force fighter-bomber aircraft, operating in close support of the ground battle, to counter enemy aircraft, and for interdiction, deep reconnaissance and close air support missions. The Army will also depend on the Air Force for inter-theatre troop-carrying and intra-theatre airlift. The Army will need large-scale movements by Air Force aircraft to bases as far forward as practical. But above all, and by far the most important contribution that the Air Force could make to the land battle, will be the achievement of air superiority. Without air superiority over the battle area, Army air-mobility will not be able to function effectively.

COST-EFFECTIVENESS

In any discussion on air-mobility, the question of cost invariably crops up. The doubters and adversaries of the concept will claim that procurement, operating and maintenance costs and problems are formidable enough to reject the whole idea of air-mobility for the Army. It is the fervent hope of this writer that the Army will not succumb to such claims. Today we should not be asking whether we can afford the cost of going air-mobile. We should, instead, be determining the numbers and types of aircraft required and the organizations which we will need

to give us fast-moving, hard-hitting combat outfits.

A brief review of the characteristics of the air-mobility concept will show that it can be very cost-effective in relation to many of the existing but out-dated concepts for land combat. First and foremost is the mobility differential provided by the air-mobility concept. The high mobility of air-mobile units is the combat multiplier that will allow the Army to maintain *much smaller*, but more effective combat ready forces with great flexibility. The savings in cost that these smaller, more efficient forces represent will be quite considerable. It is a well-known fact that by far the largest slice of the defence budget is spent on simply maintaining the Army — pay and emoluments, food, fuel, transport, accommodation, etc. A smaller army made possible by the air-mobility concept will allow a sizeable saving in this category of defence expenditure.

Secondly, an in-depth study of our operational requirements will show that even in the area of procurement, economies in expenditure are possible in the choice of equipment, and in their various configurations. We do not require the more complex and highly-sophisticated or highly specialised ABVs that can be found in the inventories of the armies of the more advanced countries. The less sophisticated and general-purpose ABVs would cost much less to procure and maintain. Furthermore, surplus military sales and refurbished ABVs, not to mention military assistance programmes, will further reduce procurement costs.

Thirdly, the siting of air-mobile forces will not be as critical as with ground-based conventional forces. They may be located in areas that are remote from the likely battlefields, but which invariably are well developed and contain well-established facilities for Army maintenance. The mobility differential possessed by air-mobile units will enable them to react quickly and over long ranges to widespread operational situations. This mobility and flexibility of response will enable savings in expenditure to be made that could offset the maintenance costs of the air-mobile units.

Fourthly, the flexibility and speed of reaction of air-mobile units will act as a positive deterrent to any would-be aggressor. Should an aggressor decide to invade our country, it is not far-fetched to imagine that he would expect us to contest his initial assault, whether it be amphibious or from the air. It is a well-accepted doctrine that invading forces usually achieve massive superiority in combat power at the points of decision, which in this case, are the amphibious objectives or airheads. For us to contest him at these points of strength would draw us into the enemy's schemes and purposes, resulting in the rapid destruction of our military forces, for he will have the initiative. However, with highly air-mobile forces at our disposal, there will always be times and places where we can engage him in battle on terms advantageous to us, and of our own choosing. In close collaboration with the Navy and the Air Force, our highly mobile land forces will be able to strike the enemy where he is most vulnerable, thereby disrupting his plans and making his venture uneconomical and prohibitive.

Fifthly, the training of aviators and maintenance specialists will not be a formidable undertaking. As Army aviators will not be specialists like their counterparts in the Air Force, their training will not be so complex and expensive. For the Army officer or NCO assigned to air

mobile units, army aviation will be just another skill in the Army's trade structure.

Finally, air-mobility in the Malaysian Army need not mean the establishment of a separate aviation corps, as in the British Army. For those officers and NCOs assigned to the air-mobile units, flying will be a skill and not a way of life. None of the officers and NCOs who are rated Army aviation specialists will need to confine their careers to piloting aircraft, or commanding and staffing Army air mobile units. At any given time, many of those rated Army aviators will be completely divorced from aviation activities. They may be commanding Infantry, Cavalry or Artillery units or sub-units, serving in various staff or instructor appointments or attending courses. In this regard, it is considered that, apart from the few officers and NCOs who will have to specialise in aviation technology and maintenance, the general duties officer or NCO who is rated an Army aviator will not draw any specialist allowances for the skill. In this sense, his specialisation is not unlike that of the Technical Adjutant, the Regimental Signals Officer or the Weapon Training Instructor. Thus, any officer or NCO with an aptitude for flying could be assigned to the Army's air mobile units and rated Army aviators. The exception will, of course, be the Air Cavalry units, where manning will be from personnel who are all cavalymen.



Is This a Diminishing Military Asset?

CONCLUSION

The Army Master Development Plan, insofar as it pertains to the development of mobile forces, needs to be reviewed to reflect the realities of modern warfare in the Malaysian environment.

The realities of warfare today demand that the Malaysian Army should take a hard and pragmatic look at the question of Army air mobility in its development plans. The dramatic changes in warfare and the tremendous advances in the accuracy, rate of fire and lethality of modern

weapon systems have largely reduced the effectiveness of ground-based combat vehicles. The high cost and relatively limited mobility of the ground-based AFV, and its vulnerability to modern weapon systems have curtailed its usefulness in combat. Today, the ABV, especially the helicopter, has assumed a pre-eminent position in the combat inventories of modern armies. Its effectiveness over a wide spectrum of warfare, from low intensity insurgency to limited war, is a proven fact. The logical step in the progressive modernization of the Malaysian Army is for it to go air-mobile.

Leftenan Kolonel E. W. Rodrigues, ironically enough, is the Commanding Officer of 11 Regiment Royal Cavalry, the regiment designated to be the Tank Regiment of the Army. A graduate of RMA Sandhurst, he has been Brigade Major, Directing Staff at AFSC and Military Attache' in Vietnam.





SISTEM LOJISTIK ANGKATAN TENTERA MALAYSIA

Suatu Analisa Stratejik

Leftenan Kolonel Mohd Khir B Abd Razak

Di dalam rencana ini pengarang menganalisa dari aspek strategi struktur organisasi, peranan, fungsi dan praktis akan Sistem Logistik ATM bagi mengesan kelemahan-kelemahan yang wujud; pendekatan beliau pula adalah dari sudut makro. Selanjutnya beliau mengemukakan cadangan-cadangannya untuk memperbaiki keadaan.

Sistem Logistik

Sesebuah negara perlu mempunyai angkatan tenteranya sendiri bagi memelihara kedaulatan dan kemerdekaannya; bentuk dan besarnya angkatan tentera itu bergantunglah

kepada kemampuan negara dan ancaman dari musuh terhadapnya. Bagi Angkatan Tentera Malaysia bentuknya banyak menekankan kepada kuasa kombat dari perkhidmatan logistik jika dibandingkan dengan negara-negara yang telah membangun seperti di barat. Begitu juga

kekuatan ATM sekarang yang dianggar 100,000 termasuk tentera sukarela, adalah jumlah yang agak memadai memandangkan kepada ancaman sama ada dari dalam atau luar negeri.

Bagi membentuk kekuatan angkatan kombat yang begitu besar, ATM perlu mempunyai sistem perkhidmatan logistiknya yang lengkap. Untuk membincangkan hakikat ini perlulah kita meneliti apakah susunan sistem logistik dalam ATM dari berbagai aspek termasuklah konsep, peranan, aturcara, tanggungjawab dan fungsinya.

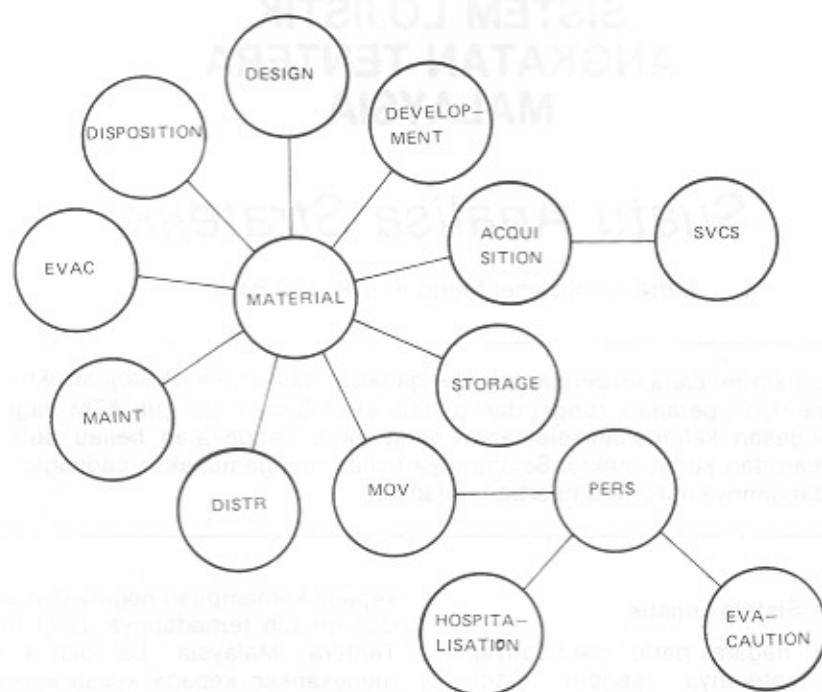
Definisi

Logistik bolehlah didefinisikan sebagai suatu sains yang melibatkan rekaan, perkembangan, perolehan, simpanan, pergerakan, pengedaran, penyelenggaraan dan pengeluaran berbagai jenis barang keperluan tentera; pemindahan dan perubatan untuk anggota; dan seterusnya melibatkan perbekalan untuk perkhidmatan. Rajah 1 menerangkan definisi ini dengan lebih jelas lagi.

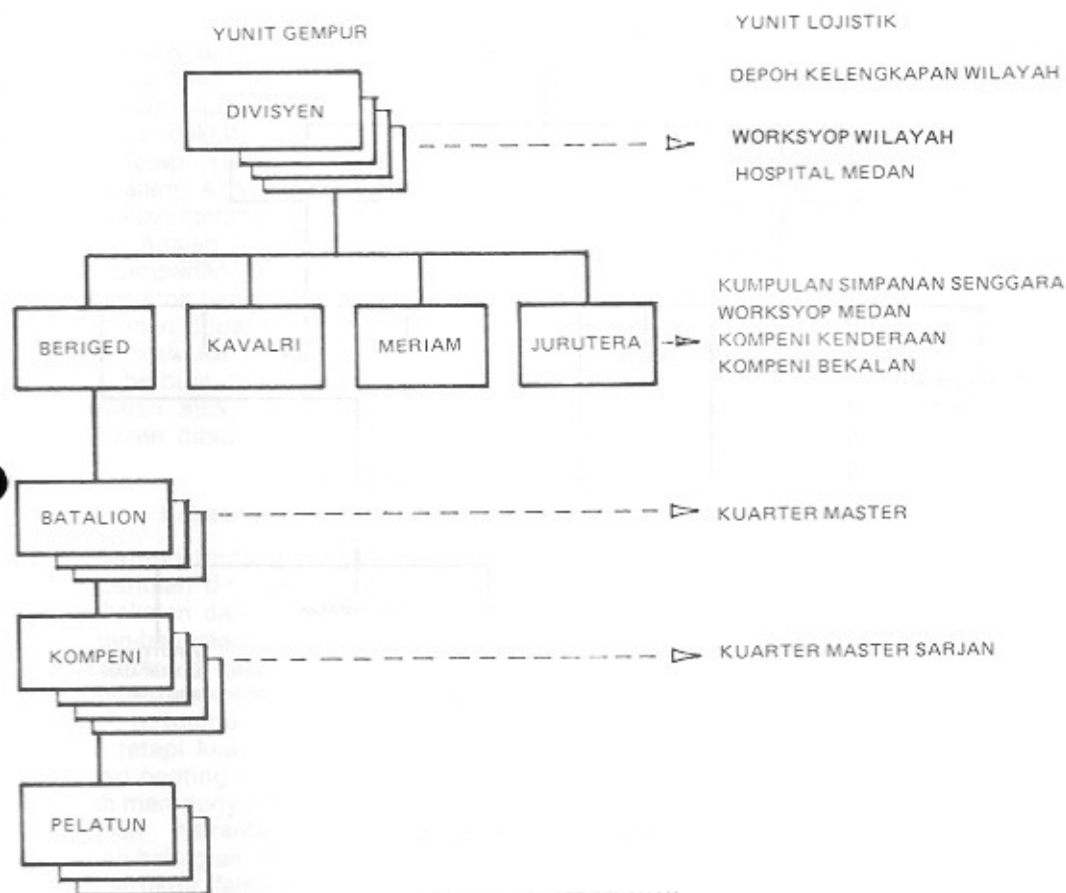
Konsep Wilayah

Asas yang digunakan bagi menubuhkan yunit-yunit logistik ialah apa yang dipanggil Konsep Wilayah. Konsep ini adalah berpandukan kepada kawasan-kawasan Wilayah yang mana bagi kawasan tentera, negara ini telah dibahagikan kepada empat wilayah. Wilayah Pertama meliputi Sabah dan Sarawak; Wilayah Kedua mengandungi Perlis, Kedah, P. Pinang, dan Perak; Wilayah Ketiga pula terdiri daripada Selangor, N. Sembilan, Malacca, dan Johor; Wilayah Keempat meliputi Kelantan, Trengganu dan Pahang.

Konsep wilayah yang diterangkan di atas adalah sebenarnya kawasan tanggungjawab divisyen. Sebuah divisyen biasanya mengandungi tiga beriged (satu beriged mengandungi tiga batalion, satu batalion terdiri daripada empat kompeni, dan satu kompeni mempunyai tiga pelatun seramai 30 orang). Pertalian antara yunit-yunit gempur dengan yunit-



RAJAH. 1 ELEMEN LOGISTIK



RAJAH 2. KONSEP WILAYAH

yunit lojistik boleh ditunjukkan dengan secara rajah seperti di atas:

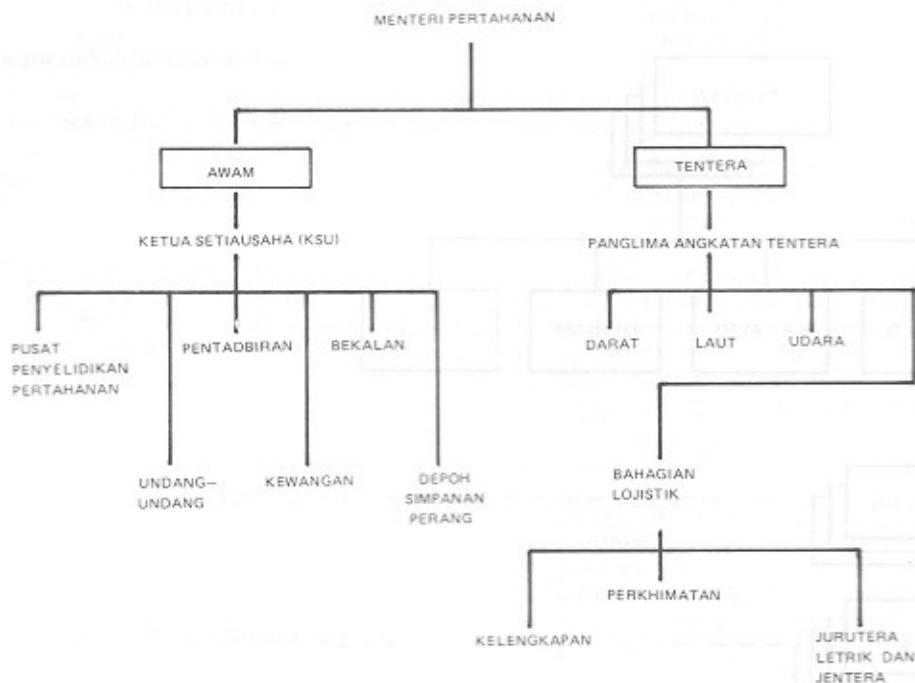
Organisasi Kini

Dari teorinya adalah didapati bahawa organisasi yang telah diterangkan berorientasikan tentera; tetapi dari praktisnya adalah didapati bahawa sistem lojistik dalam ATM dikuasai secara terbesar oleh pihak awam. Di sini akan dibincangkan mengenai penglibatan pihak awam dalam sistem lojistik dari segi organisasi, kuasa dan tanggungjawab.

Pada keseluruhannya adalah didapati bahawa organisasi yang dianggotai oleh pihak awam tidaklah dicampur dengan anggota tentera. Tetapi jika dilihat dengan lebih terperinci adalah didapati bahawa di peringkat atas fenomena ini

memanglah jelas, sementara jika dilihat keanggotaan di dalam yunit-yunit lojistik di peringkat bawah anggotanya adalah terdiri daripada tentera dan awam. Untuk memudahkan perbincangan mengenai elemen awam dalam sistem lojistik ATM eloklah dikenalkan organisasi lojistik secara keseluruhannya.

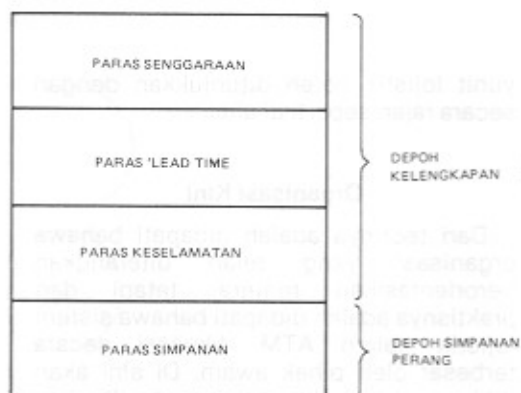
Dari rajah 3 jelaslah bahawa organisasi lojistik dalam ATM adalah berorientasikan awam. Kenyataan ini akan menjadi terang apabila dibincangkan peranan tiap-tiap bahagian dalam organisasi awam. Ketua Setiausaha (KSU) adalah bertanggungjawab kepada Menteri Pertahanan mengenai hal-hal pengurusan berkaitan dengan kewangan dan bekalan kepada Angkatan Tentera. Berhubung dengan fungsi ini beliau akan berhubung terus kepada Perbendaharaan untuk mendapatkan peruntukan kewangan dan



RAJAH 3. ORGANISASI LOJISTIK

kontrek-kontrek untuk pembelian barang-barang. Kesemua bahagian-bahagian yang ditunjukkan di bawah KSU itu adalah dianggotai oleh kakitangan awam. Pusat Penyelidikan Pertahanan yang perannya ialah untuk menjalankan penyelidikan saintifik dan teknologi adalah hampir seratus-peratus dianggotai oleh kakitangan awam. Begitu juga lain-lain bahagian seperti Undang-Undang, Pentadbiran, Kewangan dan Bekalan.

Apa yang anihnya ialah Depoh Simpanan Perang telah di 'civilianise' dan ini bererti bahawa depoh tersebut diletakkan bawah arahan KSU. Barang-barang yang disimpan dalam Depoh Simpanan Perang itu adalah sama dengan barang kelengkapan yang berada di depoh-depoh bawah kawalan Bahagian Logistik. Apa yang berbeza antara barang-barang di Depoh Simpanan Perang dengan Depoh Kelengkapan ialah kegunaannya. Kegunaan ini bolehlah diterangkan dengan lebih mudah dengan menggunakan rajah.



Rajah 4. PARAS STOK

Tiap-tiap barang dikawal mengikut parasnya. Pada prinsipnya stok adalah dibahagikan kepada beberapa paras iaitu senggaraan, lead time, keselamatan dan simpanan. Untuk menentukan stok itu

sentiasa baik terutama sekali jika ianya mempunyai 'shelt-life' stok itu hendaklah dipusingkan supaya yang mana dahulu masuk hendaklah dikeluarkan dahulu (FIFO). Tetapi sistem lojistik yang terdapat dalam ATM sekarang ini nampaknya telah melanggar prinsip pusingan stok itu. Adalah lebih baik jika stok di Depoh Simpanan Perang itu diserapkan ke dalam stok yang ada di Depoh Pusat Kelengkapan supaya barang yang sama dikawal oleh satu badan atau agensi. Dengan berbuat demikian segala urusan pengawalan stok, pembelian, dan anggaran boleh dibuat dengan lebih kemas lagi.

Kakitangan Awam

Menyentuh tentang fungsi pembelian maka perlulah dibincang mengenai Bahagian Bekalan dan Bahagian Kewangan. Bahagian-bahagian ini adalah dianggotai keseluruhannya oleh kakitangan awam. Walaupun perkhidmatan yang diberi adalah tertumpu kepada yunit-yunit tentera tetapi keanggotaan di bahagian-bahagian penting di bawah kawalan KSU tidaklah mempunyai anggota tentera. Dari itu tidak hairanlah jika organisasi bahagian-bahagian di bawah KSU mempunyai struktur, falsafah dan prinsip yang berlainan sekali dari apa yang terdapat dalam organisasi di bawah Panglima Angkatan Tentera. Bahagian ini bertanggungjawab mengadakan kontrek dan sebutharga bagi keperluan pertahanan dan ianya diketuai oleh seorang Setiausaha Bahagian yang mana dibantu oleh enam orang Ketua Penolong Setiausaha. Mereka ini semuanya adalah terdiri daripada pegawai-pegawai Pentadbiran Awam. Oleh sebab latar belakang mereka dari segi profesion, latihan dan pengalaman adalah berlainan daripada pegawai-pegawai tentera maka suasana disekitar *Bahagian Bekalan* adalah berlainan daripada yang terdapat di *Bahagian Lojistik* umpamanya. Di dalam organisasi tentera pendekatan kepada mana-mana kerja adalah banyak tertumpu kepada disiplin antara ketua dan yang diperintah. Seorang ketua tentera apabila memberi satu arahan boleh mengharap arahan itu akan dipatuhi dengan spontan. Perhubungan seperti ini antara seorang ketua tentera dengan

pekerja awam mungkin akan menimbulkan konflik sebab pendekatannya adalah berbeza dengan pendekatan seorang ketua awam. Seorang ketua tentera adalah berorientasikan kepada krisis dan ia sering menggunakan Teori X yang dipelopori oleh Mc Greggor. Mengikut teori ini seseorang individu itu akan dianggap oleh ketuanya sebagai malas, tidak matang, tidak bermotivasi, bodoh, dan perlu diberi arahan. Tetapi seorang ketua awam tidak berorientasikan kepada krisis dan ia tidak perlu menggunakan Teori X. Sebaliknya ia akan menggunakan Teori Y di mana sangkanya ialah individu itu seorang yang rajin, matang, cerdik, bermotivasi, dan tidak perlu diberi arahan.

Kelemahan

Di dalam Bahagian Bekalan dan Bahagian Kewangan di mana keanggotaannya adalah sepenuhnya dari kakitangan awam boleh dilihat perbezaan dalam pengurusan jika dibandingkan dengan Bahagian Lojistik. Bahagian Bekalan dan Bahagian Kewangan adalah mengurus berasaskan kepada kewangan dan Arahan Perbendaharaan digunakan sebagai kuasa. Sementara Bahagian Lojistik adalah berasaskan kepada perkhidmatan di mana faktor kewangan menjadi faktor kedua; jadi, jelaslah falsafah antara bahagian-bahagian di bawah KSU dengan bahagian-bahagian di bawah Panglima Angkatan Tentera adalah berbeza. Yang lebih ketara lagi perbezaannya ialah KSU diberi kuasa kewangan oleh Perbendaharaan tetapi Panglima Angkatan Tentera adalah memikul tanggungjawab untuk memberi perkhidmatan lojistik ketenteraan tanpa kuasa tersebut. Oleh yang demikian nampaklah kelemahan tentang struktur organisasi dalam Angkatan Tentera yang berhubung dengan lojistik sekarang ini. Ada lebih baiknya jika Bahagian Bekalan dianggotai juga oleh anggota-anggota tentera supaya keperluan yang diujudkan oleh pihak tentera boleh diproses dengan lebih responsif lagi.

Penyenggaraan

Setelah membincangkan mengenai organisasi, teori, prinsip dan praktisnya,

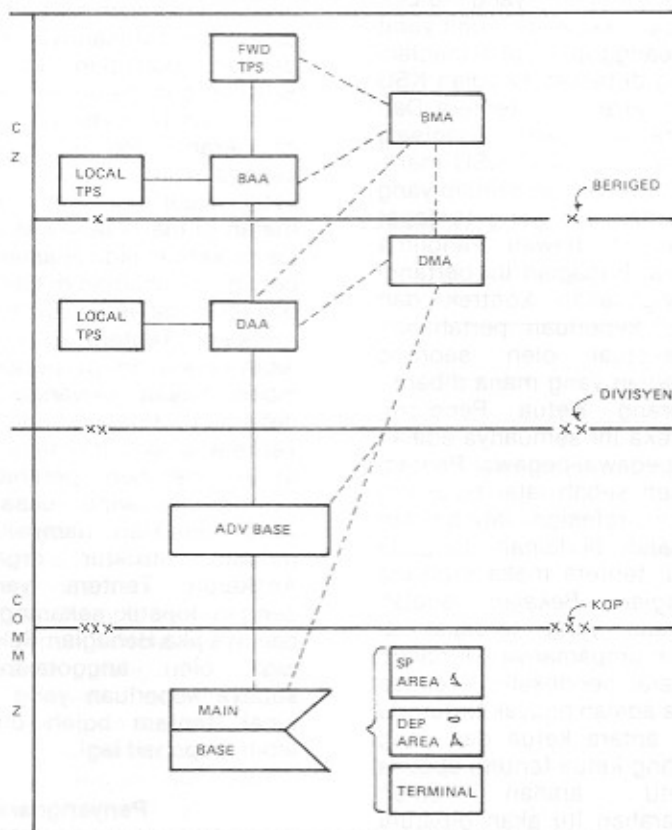
eloklah beralih pula kepada aspek-aspek penting dalam sistem penyenggaraan (maintenance system) semasa aman dan semasa perang. Sistem penyenggaraan ini termasuklah bekalan alat-alat kelengkapan, minyak dan makanan untuk anggota dan alatan kemana sahaja kawasan yang menjadi tanggungjawab tentera. Semasa aman sistem bekalannya adalah seperti yang telah diterangkan di atas. Jika dilihat daripada konsep wilayah bolehlah dikatakan bahawa 'line of communication' antara depoh-depoh pengkalan dengan yunit-yunit di kawasan depan telah dipendekkan dengan adanya depoh-depoh menengah (secondary depots) dan depoh-depoh medan (tertiary depots).

Semasa perang pula ATM ada menyusun satu sistem penyenggaraan yang khusus untuk menghadapi keperluan peperangan. Sistem penyenggaraan ini adalah seperti yang ditunjukkan dalam Rajah 5.

Sistem Penyenggaraan

Mengikut sistem ini medan peperangan dibahagikan kepada "combat zone (CZ)" dan 'communication zone (Comm Z)'. Zon kombat adalah diduduki oleh yunit-yunit medan di bawah pemerintahan beriged dan divisyen. Di zon komunikasi boleh didapati Markas Kor yang diperintah oleh seorang Lt Jeneral dan dibelakang kor terdapat semua depoh-depoh pengkalan. Jaraknya antara sebuah beriged di kawasan depan dengan depoh-depoh pengkalan boleh menjadi beratus batu. Oleh itu perlulah 'line of communication' itu dipendekkan supaya bekalan boleh dibawa dari kawasan pengkalan ke medan perang. Untuk tujuan itu telah ditubuhkan beberapa kawasan yang dipanggil dengan nama 'Administrative Area' dan 'Maintenance Area'.

Mengikut definasi yang diberi oleh Buku Panduan MTAT 'administrative area'



Rajah 5. SISTEM PENYenggaraan ATM

ialah:

'The static area in which administrative units are located and from which they carry out their tasks including logistic support. Stocks are not normally held on wheels. The mobile sub-units of the administrative units when deployed and grouped together forms maintenance areas'.

'Maintenance Area' pula diberi definisi seperti berikut:

'An area established on a temporary basis, where stocks are held either on the ground or on wheels to maintain a force in operations. Maintenance areas are formed from the mobile elements or sub-units of the logistic units to supplement or replace certain functions of administrative areas depending on the technical situation'.

Daripada definisi yang diberi di atas bermaknalah pada masa perang sesebuah divisyen atau beriged harus menubuhkan 'administrative' dan 'maintenance area' untuk memberi bantuan logistik kepada yunit-yunit di barisan hadapan. Dalam pada itu dengan adanya konsep wilayah perlulah juga diadakan 'administrative' and 'maintenance area' di peringkat wilayah.

ANALISA STRATEJIK

Kini eloklah dibuat analisa stratejik bagi merumuskan apakah langkah yang patut diwujudkan untuk meningkatkan lagi mutu sistem logistik dalam ATM. Analisa ini menumpukan kepada aspek inventori, komputerisasi dan pengurusan.

Inventori

Inventori yang dimaksudkan ialah item-item yang disimpan sebagai stok untuk memenuhi keperluan barang-barang. 'Di dalam seluruh Malaysia dianggarkan nilai stok yang dipegang oleh stor-stor kerajaan dalam tahun 1974 ialah \$300 juta dan dalam tahun 1981 nilai itu telah meningkat kepada \$1,500 juta. Dalam tahun 1982 kerajaan dianggarkan membelanja sebanyak \$15,000 juta untuk membeli alat kelengkapan dan alat ganti'. Bagi Kementerian Pertahanan sahaja

sebanyak \$911 juta telah diuntukkan bagi Bahagian Logistik dari jumlah peruntukan (operating expense) sebanyak \$2,150 juta bagi Kementerian itu. Ini bererti 42% dari jumlah peruntukkan itu dibahagikan kepada logistik.

Jika dilihat dari segi organisasi Bahagian Logistik ATM ketiga-tiga kor iaitu Kor Kelengkapan, Kor Perkhidmatan dan Kor Jutera Letrik dan Jentera, ada terlibat dengan pegangan stok. Walaupun ketiga-tiga ini mempunyai organisasi yang berlainan tetapi fungsi pengurusan stor adalah sama sahaja. Umpamanya pengurusan ke atas ransum (rations) dan minyak petrol dalam Kor Perkhidmatan adalah sama dengan pengurusan ke atas pakaian dalam Kor Kelengkapan dan alat ganti kenderaan dalam Kor Jutera Letrik dan Jentera. Satu sistem pengurusan inventori yang sama patutnya boleh dibentuk bagi tiap-tiap tiga organisasi itu supaya fungsi tersebut boleh diselaraskan supaya perkhidmatannya lebih cekap lagi dan kos operasinya dikurangkan.

Tiga-Khidmat

Idea untuk selaraskan fungsi pengurusan inventori tidak sepatutnya berhenti setakat Bahagian Logistik sahaja malah ianya harus disambungkan kepada ketiga-tiga Perkhidmatan iaitu Tentera Darat, Laut dan Udara. Perbincangan mengenai inventori dalam Tentera Darat telahpun dibuat di atas dan di sini patut disentuh juga mengenai inventori dalam Tentera Laut dan Udara. Jika dipandang dari mata kasar memanglah alat ganti kapal terbang dan kapal laut tidak sama dengan alat ganti kenderaan-kenderaan jalan raya tetapi, jika diteliti dengan mendalam akan terdapat banyak item yang sama seperti 'nuts, screws, dan 'bolts'. Buat masa sekarang ini tiap-tiap Perkhidmatan membeli barang-barang ini berasingan tetapi ada baiknya pembelian dibuat atas satu item yang sama sahaja.

Katalog

Sebelum matlamat untuk mencapai satu sistem pengurusan inventori yang sama bagi seluruh ATM, perlulah dahulu diwujudkan satu agensi yang boleh

menyatukan semua inventori oleh berbagai organisasi yang menjalankan fungsi pengurusan inventori yang sekarang ini mengikut cara masing-masing. Agensi yang dimaksudkan itu ialah bertanggungjawab atas menyatukan sistem katalog yang boleh mengenal satu-satu barang dengan koda (code) yang 'unique'. Agensi ini seharusnya ditubuhkan sebagai tiga perkhidmatan atau 'tri-service' yang mengembelikan Tentera Darat, Laut dan Udara. Usaha ke arah ini telahpun dibuat dan Malaysian Armed Forces Cataloguing Authority (MAFCA) telah ditubuhkan dalam tahun 1981 dan sistem koda yang diikuti oleh agensi itu ialah sistem NATO. Sistem NATO ini menggunakan 13 digit dan semua negara-negara yang menjadi ahli-ahli 'Kelab NATO' itu boleh menggunakan kemudahan dan maklumat yang telah disediakan bagi mengenal barang-barang yang digunakan dalam tentera. Dengan adanya sistem katalog seperti ini tentulah banyak 'item-item' yang bertindih (duplicate) akan dapat disatukan menjadi satu item sahaja. Tugas menyamakan sistem katalog ini tentu sahaja akan memakan masa yang lama kerana dalam ATM adalah dianggarkan mempunyai 500,000 'item'.

Rasionalisasi

Mengadakan satu sistem katalog yang sama bagi seluruh ATM adalah satu tindakan rasionalisasi yang wajar diambil kerana ini adalah cara menanam modal yang mana penjimatan dalam perbelanjaan wang kerajaan. Ada dua lagi cara dimana ATM boleh mengurangkan perbelanjaan iaitu pertama, dengan menyatukan pengurusan bagi barang-barang simpanan perang dengan barang-barang penyenggaraan dan kedua, dengan mengurangkan pembelian kenderaan-kenderaan yang berbagai buatan.

Cadangan yang pertama iaitu Depoh Simpanan perang diserapkan dengan Depoh Kelengkapan telahpun dibincangkan pada awal kertas ini dan tidak perlu lagi diulang analisisnya di sini. Apa yang perlu disebutkan ialah jika tidak disatukan barang-barang simpanan perang dengan barang-barang penyeng-

garan berkemungkinan besar stok simpanan tidak diputarakan dengan sempurna dan ini akan menyebabkan barang-barang itu menjadi rosak atau 'obsolete'. Juga satu perkara lagi ialah organisasi Depoh Simpanan Perang menjadi satu sasaran yang mana akan dikatakan tidak mempunyai aktiviti yang mencukupi pada hal aktiviti di Depoh Pusat Kelengkapan adalah terlalu tinggi. Keadaan aktiviti yang tidak seimbang ini boleh menumbulkan gegisiran (friction) dalam pentadbiran di Kementerian Pertahanan antara pihak militer dengan pihak awam.

Cadangan yang kedua ialah mengenai pembelian kenderaan-kenderaan yang modelnya adalah terlalu banyak. Model-model yang ada dalam perkhidmatan sekarang ini termasuklah Mercedes, Volvo, Hino, Austin, Bedford, International Harvester bagi kenderaan jenis 3 tan. Kemudian bagi kereta-kereta kecil terdiri daripada Austin, Toyota, Ford, Peugeot, Mercedes dan Volvo. Bagi kereta-kereta perisai pula ada jenis Cammando, Ferret dan Panhart. Ini tidaklah termasuk kereta-kereta perisai dan kereta kebal jenis Scorpion, Sibmas dan Condos yang akan dibeli. Tiap-tiap kenderaan ini mempunyai lebih kurang 2,000 hingga 3,000 'item' sebagai alat ganti. Ini tentulah sahaja menambahkan inventori hingga berpuluh ribu 'item' yang mana banyak diantaranya mempunyai fungsi yang sama tetapi mudah menjadi berlain kerana pembuatnya adalah daripada lain sumber. Jika model-model kenderaan ini boleh dikurangkan tentulah masalah terlalu banyak alat ganti tidak akan timbul. Perkara ini samalah juga berkaitan dengan kapal terbang, kapal laut, senjata dan radio set.

Industrialisasi

Sungguhpun cadangan supaya model-model alatan sepatutnya dikurangkan nampaknya mudah dari segi teorinya tetapi tidaklah begitu senang untuk dipraktikkan kecuali jika negara ini sudah mencapai taraf industrialisasi seperti negara-negara barat atau Latin America yang mengeksport alatan-alatan ini. Malaysia belumlah lagi berkemampuan untuk mencapai taraf itu kerana tekanan yang diberi sekarang ialah ke atas industri

elektronik dan kain. Industri 'heavy manufacturing' masih boleh dikatakan diperingkat awal lagi dan dalam 10 tahun akan datang pun belum boleh lagi negara ini berkemampuan untuk mengeksport alatan perang. Walaubagaimanapun di peringkat rancangan mestilah ada usaha supaya diintegrasikan pihak industri swasta dengan pertahanan agar boleh suatu masa nanti segala alatan asas seperti kenderaan, senjata, radio set and meriam dapat dikeluarkan sendiri oleh negara ini untuk keperluan ATM dan untuk eksport. Ini bukan sahaja memudahkan sistem logistik dalam tentera kita tetapi boleh menyelamatkan pertukaran luar negeri negara ini.

Komputerisasi

Satu lagi cara untuk memperbaiki sistem logistik sekarang ialah dengan menanam modal dalam komputer. Sudah menjadi kenyataan bahawa negara-negara yang mampu telah menggunakan komputer untuk menjalankan tugas-tugas perniagaan dan pengurusan terutama sekali dalam organisasi yang besar. Begitu juga dalam negara ini sudah banyak jabatan-jabatan kerajaan dan badan-badan perdagangan, perusahaan dan perniagaan swasta yang telah menggunakan komputer untuk memproses data. Pendek kata aplikasi komputer sudah bertapak di negara ini dan masa depannya sangatlah cerah. Bagaimanapun banyak instalasi komputer di negara ini adalah dari jenis mini-komputer yang harganya diantara \$20,000 hingga \$500,000. Dalam konteks inilah sistem logistik ATM patut dikomputerisasikan di bidang-bidang yang perlu seperti kawalan stok, gaji dan personnel. Tetapi sebelum projek komputer dimulakan mustahaklah persiapan dibuat terlebih dahulu. Persiapan yang dimaksudkan ialah latihan, dokumentasi, kajian permulaan, spesifikasi sistem dan analisa sistem. Bagi latihan adalah perlu ditumpukan kepada juruanalisa sistem, programmer, operator dan pengurus.

Kesimpulan

Kita telah membincang dan membuat analisa mengenai sistem logistik dalam

ATM dengan menyentuh tentang organisasi, falsafah, fungsi, sistem penyenggaraan dan rancangan untuk perkembangan pada masa hadapan. Perlulah dinyatakan lagi iaitu sistem logistik yang dibahaskan itu ialah tertumpu kepada logistik yang dikendalikan oleh Bahagian Logistik yang bercorak tiga Perkhidmatan. Dalam tiap-tiap tentera darat, laut dan udara ada juga fungsi logistik masing-masing yang dikelolakan oleh Pengarah Logistik dan mereka ini bertanggungjawab kepada Panglima tiap-tiap Perkhidmatan. Tetapi Bahagian Logistik adalah diketuai oleh seorang Ketua Staf Logistik dan ia bertanggungjawab kepada Panglima Angkatan Tentera (PAT). Peranan Bahagian Logistik ini ialah untuk mengurus bantuan logistik kepada Angkatan Tentera yang melibatkan 'materai', anggota dan perkhidmatan.

Kelemahan yang didapati dari analisa oleh kertas ini ialah tentang organisasi dan fungsi yang tidak diselaraskan. Mengenai organisasi kelemahan yang dimaksudkan ialah kurangnya elemen tentera laut dan udara dalam struktur Bahagian Logistik. Sementara itu Bahagian ini berupa satu badan eksekutif yang mana tidak diberi kuasa kewangan dan pembelian. Semua kuasa pembelian dan kuasa kewangan adalah dipegang oleh Bahagian Bekalan dan Bahagian Kewangan. Bahagian-bahagian ini adalah semuanya dianggotai oleh pihak awam dan 'adat resam' mereka adalah berbeza dengan anggota tentera. Dengan itu berlakulah kegisiran antara awam dan tentera. Lebih-lebih lagi ketara kegisiran ini apabila Depoh Simpanan Perang diletakkan di bawah pihak awam. Cuma motif yang logik dalam mengambil alih Depoh Simpanan Perang itu oleh pihak awam ialah untuk "check and balance" kuasa tetapi ini adalah bertentangan dengan prinsip pengurusan stor di peringkat operasi.

Kelemahan di segi fungsi adalah dimaksudkan terhadap bertindihnya pengurusan stor oleh Kor-kor Lengkap, Perkhidmatan, dan Jutra Letrik dan Jentera. Ketiga-tiga Kor ini memegang inventori yang berlainan sementara fungsinya adalah sama sahaja. Ini sudah tentulah menduakan tenaga dan

menambahkan kerumitan di segi organisasi.

Cadangan

Bagi memperbaiki lagi sistem logistik ATM yang ada sekarang adalah dicadangkan seperti berikut:

- * Bahagian Bekalan dan Bahagian Kewangan diintegrasikan dengan Bahagian Logistik supaya anggota awam dan tentera bekerja dalam alam sekitar yang sama yang mana boleh mewujudkan adat resam, pendekatan dan hubungan yang lebih rapat.
- * Depoh Simpanan Perang diserapkan dengan Depoh Pusat Kelengkapan supaya stok boleh dikawal dengan lebih baik dan aktiviti diseimbangkan.
- * Fungsi pengurusan stor dalam Bahagian Logistik diselaraskan supaya

tidak berlaku penindihan tenaga dan dengan itu mencapai kecekapan yang lebih tinggi hasil dari sistem yang lebih mudah.

- * Industri untuk pertahanan patutlah dirancang dari masa sekarang dan ini hendaklah diselaraskan oleh suatu badan yang tertinggi dalam kerajaan seelok-eloknya oleh Jabatan Perdana Menteri dengan Pengarah Operasi (Director of Operation) bertanggungjawab mengarah operasi semasa perang.
- * Bidang-bidang seperti kawalan stor, sistem maklumat pengurus, anggota dan gaji hendaklah dikaji untuk mewujudkan sistem komputer pada masa hadapan kerana banyak data perlu diproses secara letronic untuk membolehkan strategi yang betul diambil dan memudahkan 'decision-making'.

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Leftenan Kolonel Mohd Khir B Abd Razak, Pengarah Kumpulan sistem Komputer Logistik di Kementerian Pertahanan adalah seorang Pegawai Kanan Kor Kelengkapan ATM. Beliau mempunyai Ijazah Sarjana Pengurusan (MBA) dari Universiti Aston, UK dan telah juga menghadiri Kursus Staf di Maktab Turus Angkatan Tentera.





PERANCANGAN TENAGA KERJA ANGKATAN TENTERA

Mejar Badruzaman B A. Rani

Pengertian terhadap Perancangan Tenaga Kerja, pertaliannya dengan Pengurusan Anggota dan perlaksanaan yang efektif terhadapnya oleh anggota-anggota Tentera Darat dirasakan masih samar. Rencana ini cuba mengemukakan maksud Perancangan Tenaga Kerja, apa yang di praktikkan dan usul mengatasi masalah yang dialami.

Perancangan Tenaga Kerja di dalam satu-satu organisasi adalah mustahak kerana ia adalah asas untuk Pengurusan Anggota (Personnel Management). Pertalian di antara kedua-dua aspek ini tidak dapat dipertikaikan. Seandainya Perancangan Tenaga Kerja dilaksanakan dengan terperinci dan teratur, Pengurusan Anggota dapat dilaksanakan dengan lincin dan seterusnya objektif organisasi dapat dicapai. Rencana ini bertujuan untuk membentangkan aspek

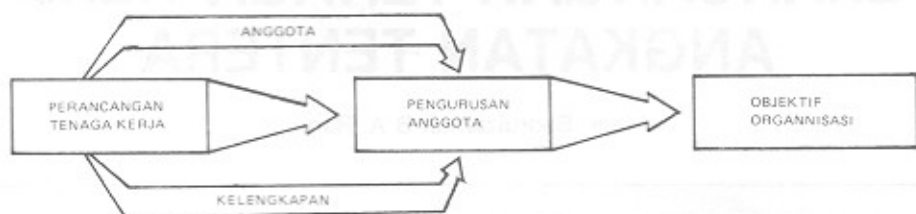
Perancangan Tenaga Kerja Tentera Darat Malaysia. Skop tulisan ini meliputi pengertian Perancangan Tenaga Kerja secara umum, memapar apa yang dipraktikkan oleh Tentera Darat Malaysia dan berusaha mengemukakan pemikiran baru mengenai aspek ini.

PENGERTIAN

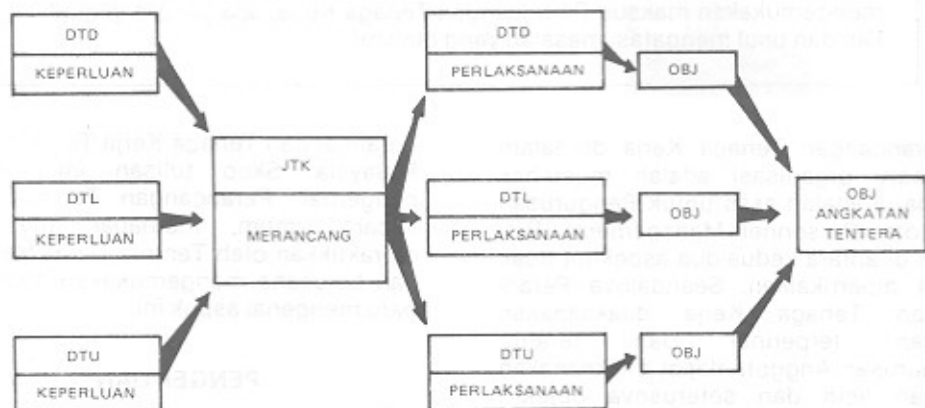
Secara umum maksud Perancangan Tenaga Kerja boleh diertikan sebagai

mengkaji keperluan keanggotaan, dengan mengambil kira 'variables' yang mempengaruhinya, merangka sistem memenuhi keperluan dan mengikuti kemajuan implimentasi rancangan tersebut. Berasaskan definasi ini, faktor yang berubah-ubah (variable factors) yang mempengaruhi secara langsung adalah banyak. Aspek sains perilaku (behavioural science), perkembangan organisasi (organizational development), objektif organisasi dan rintangan (constraints) memainkan peranan secara langsung dan tidak langsung terhadap perancangan ini. Justeru itu Perancangan Tenaga Kerja memerlukan penelitian yang rapi tanpa mengabaikan aspek-aspek yang telah dipertanyakan.

Untuk menentukan penempatan anggota yang baik, Pengurusan Anggota tidak dapat diketepikan. Pelaksanaan Pengurusan Anggota yang baik memerlukan Perancangan Tenaga Kerja yang benar-benar kemas dan terperinci. Pertalian di antara aspek-aspek ini adalah seperti di rajah 1.



Rajah 1. SISTEM PERANCANGAN



Rajah 2. ALIRAN TANGGUNGJAWAB

KEDUDUKAN KINI

Perancangan Tenaga Kerja Tentera Darat adalah salah satu daripada tanggungjawab Jabatanarah Tenaga Kerja yang mana merupakan 'trial service function'. Jabatanarah ini diletakkan di bawah Bahagian Perkhidmatan Anggota dan melaksanakan Perancangan Tenaga Kerja untuk Tentera Darat, Laut dan Udara. Di dalam konteks ini departmen-departmen hanya berfungsi sebagai 'implementors' iaitu mengemukakan keperluan dan melaksanakan rancangan yang telah dibuat oleh Jabatanarah Tenaga Kerja. Jika dipandang secara kasar rupa bentuk aliran tanggungjawab ini adalah seperti di rajah 2.

Daripada ilustrasi tersebut, departmen-departmen hanya menerima aspek-aspek perancangan Jabatanarah Tenaga Kerja. Selakju 'implementors' departmen-departmen adalah wajar diberi tanggungjawab merancangkannya sendiri kerana aspek-aspek 'variables' yang telah dipertanyakan dialami oleh departmen-departmen. Dengan cara ini proses implimentasi seterusnya dirasakan akan

lebih licin dan efektif lagi. Di dalam konteks ini Jabatanarah Tenaga Kerja akan hanya merupakan Pusat Penyatuan Perancangan Tenaga Kerja Departmen-Departmen.

Menyedari hakikat ini, Departmen Tentera Darat, di bawah Cawangan Tadbir, telah menubuhkan Sel Tenaga Kerja pada bulan Jul 80. Sel ini telah ditubuhkan dan sedang dijalankan secara 'ad hoc' iaitu menggunakan perjawatan lain. Fungsi sel ini ialah bertindak sebagai pusat statistik di dalam aspek perjawatan dan pegangan anggota kepada Departmen Tentera Darat. Mengkaji dan merangka sistem Perancangan/Pengurusan Tenaga Kerja Tentera Darat yang telah, sedang dan akan dilaksanakan untuk digunakan sebagai bimbingan di segi implimentasi.

Untuk memenuhi fungsi tersebut, sel ini dianggotai oleh seorang pegawai berpangkat *Mejar*, seorang pegawai berpangkat *Kapten* dan tiga orang *Lain-Lain Pangkat*. Sel ini bertanggungjawab terus kepada Pegawai Turus Satu Anggota Cawangan Tadbir dan seterusnya kepada *Kolonel Tadbir*. Seperti yang dikemukakan pada awal rencana ini, Perancangan Tenaga Kerja adalah asas penting untuk Pengurusan Anggota dan dipengaruhi oleh berbagai 'variables'. Untuk mendapatkan perancangan yang kemas 'variables' ini adalah perlu dikaji dan diatasi dari masa ke semasa. Oleh kerana sel ini baru ditubuhkan dan keanggotaannya terhad serta kesusahan mendapatkan data-data punca (Raw Data) yang tepat, apa yang upaya dilaksanakan setakat ini adalah aspek-aspek biasa, sahaja. Kalau pun ada kajian terhadap sesuatu aspek hanya secara kasar. Kajian yang kemaskini menggunakan 'tools' daripada 'school's of thought' tertentu tidak dapat dilaksanakan.

Memandangkan masalaah yang dihadapi dan kepentingan aspek ini, Cawangan Tadbir Departmen Tentera Darat telah mengemukakan cadangan baru sebagai tambahan kepada Sel Tenaga Kerja yang ujud sekarang. Ini bertujuan untuk membolehkan sel ini memainkan peranannya dengan lebih berkesan dan efektif lagi. Oleh kerana negara ketika ini menghadapi tekanan ekonomi dan Kementerian Pertahanan

terlibat secara langsung di dalam gerakan jimat cermat ini, cadangan tersebut terpaksa diketepikan hingga ke suatu masa di mana keadaan ekonomi stabil kembali.

KOMPUTER

Dewasa ini Urusan Gaji Angkatan Tentera telah pun menggunakan Sistem Komputer sepenuhnya. Komputer baru jenis 1100/10 UNIVAC telah pun disewa dari PERNAS UNIVAC dan akan digunakan untuk urusan Gaji Angkatan Tentera, Jabatanarah Rekod dan Pencen serta Pusat Penyelidikan Pertahanan. Kuasa 'memory' komputer tersebut ialah '196 K Word' yang mana dianggarkan secara kasar tiga kali ganda dari yang di perlukan untuk kegunaan keseluruhan Angkatan Tentera.

Sekarang ini Perancangan Tenaga Kerja dilaksanakan secara 'manual'. Oleh kerana aspek 'quantitative' dan 'forecasting' tidak dapat dielakkan, matlamat kepada sistem 'manual' ini tetap menjadi masalah. Menyedari hakikat ini, Departmen Tentera Darat telah mengemukakan usul kepada Bahagian Perkhidmatan Anggota untuk membenarkan Departmen ini menggunakan kemudahan komputer tersebut. Kelulusan telahpun diberi oleh Bahagian Perkhidmatan Anggota dan Departmen-Departmen Tentera Darat, Laut dan Udara dikategorikan sebagai pengguna sistem ini.

Memandang sistem 'DATA BASE' akan digunakan, tenaga pengendalian tidak akan menjadi masalah kepada pengguna kerana 'Programmers' dan 'System Analysis' akan dipusatkan. Penyampaian maklumat kepada pengguna akan dilakukan dengan cara mengadakan 'video' (Console Units) yang akan mengeluarkan maklumat yang diperlukan di atas kaca 'video' tersebut. 'Prints out' akan dikeluarkan oleh 'Prints out machine' di bilik komputer dan jika diperlukan bolehlah diambil oleh pengguna dengan cara 'manual'.

Ketika ini pengendalian 'system design' dikelolakan oleh Bahagian Prosesan Data Elektronik. Departmen Tentera Darat telahpun memajukan keperluannya dan mempunyai wakil di dalam Ahli Jawatankuasa Sistem Berkomputer Bahagian Perkhidmatan

Anggota ini. Adalah dianggarkan sistem ini mula digunakan pada awal tahun 1984.

MASALAH SEMASA

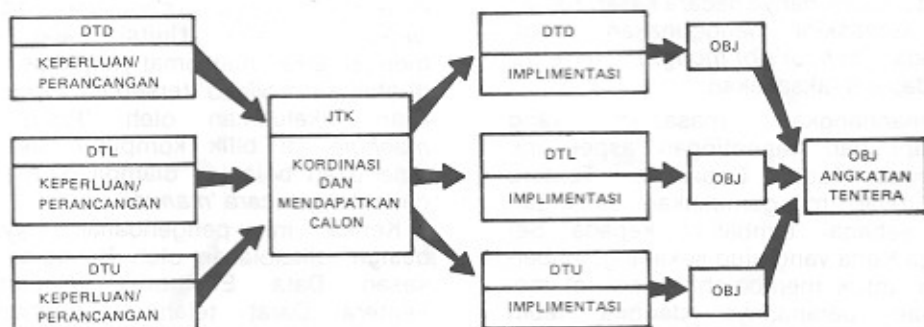
Seperti yang telah diterangkan Sistem Perancangan Tenaga Kerja sekarang ini dikendalikan secara manual. Faktor kelemahan manusia seperti tersilap, lupa dan lain-lain tidak boleh diketepikan. Justeru kesimpulan ini, disertai pula oleh keadaan aliran penyampaian maklumat yang panjang iaitu dari yunit ke Jabatanarah dan seterusnya ke departmen, ketepatan statistik-statistik masih diragui. Masalah ini telahpun diambil perhatian dan diharapkan dengan ujudnya sistem berkomputer kelak masalah ini dapat diatasi.

Seperti termaklum Perancangan Tenaga Kerja bertujuan menyediakan maklumat dengan cepat, tepat dan berkesan kepada pihak pengurusan tinggi (top management level) untuk mereka gunakan sebagai asas terhadap 'decision making'. Ekoran dari faktor sistem 'manual' dan ketiadaan data punca yang tepat fungsi ini sukar dilaksanakan. Justeru itu 'decision making' tidak dapat dilaksanakan dengan bimbingan statistik yang cepat dan tepat. Masalah ini jika tidak dapat diatasi boleh menjejaskan Pengurusan Anggota dan seterusnya morale and kebajikan anggota boleh juga terjejas.

Secara langsung Pengurusan Tenaga Kerja dipengaruhi oleh berbagai 'variables' yangmana perlu dikaji dan diatasi demi mendapatkan perancangan

yang tepat dan kemas. Dewasa ini, olehkerana kekurangan tenaga, Sel Tenaga Kerja tidak berupaya membuat kajian yang tepat dan 'quantitative' terhadap 'variables' ini. Sebagai contoh, keperluan anggota dipengaruhi oleh jumlah pemberhentian yang telah, sedang dan akan dialami. Jumlah ini pula berbeza-beza mengikut pangkat dan Kor. Secara kasar ini mungkin disebabkan faktor Kerjaya, Fasaliti Infra Struktur, Kepimpinan, Keadaan Individu atau Sosial. Tanpa membuat kajian yang terperinci terhadap faktor-faktor ini dan membuktikan 'hypothesis' terhadap 'variables' tersebut, anggaran pemberhentian yang tepat tidak boleh diperolehi dan seterusnya keperluan anggota tidak dapat dipaparkan dengan jelas.

Jabatanarah Tenaga Kerja dewasa ini merupakan agensi yang bertanggungjawab melaksanakan Perancangan Tenaga Kerja Angkatan Tentera. Sebagai 'implementor' Departmen Tentera Darat hanya mengemukakan keperluan dan melaksanakan keputusan. Adalah difikirkan sistem ini tidak sesuai. Olehkerana Departmen Tentera Darat lebih mengetahui 'variables' yang boleh mempengaruhi Perancangan Tenaga Kerjanya dan bertanggungjawab pula melaksanakan keputusan perancangan, adalah lebih licih jika Departmen Tentera Darat sendiri melaksanakan perancangan ini dan Jabatanarah Tenaga Kerja hanya berfungsi sebagai koordinator serta mendapatkan calon memenuhi keperluan yang dikemukakan. Di dalam kontek ini aliran tanggungjawab yang difikirkan sesuai adalah seperti di rajah 3.



Rajah 3. CADANGAN ALIRAN TANGGUNGJAWAB

Di dalam pengurusan anggota, 'Ergonomic' iaitu pertalian diantara 'Man Machine and Environment', perlu diambil kira demi mendapatkan daya pengeluaran (output) yang baik dari pekerja-pekerja. Kontek ini perlu dititikberatkan oleh organisasi Sel Tenaga Kerja. Seperti termaklum Perancangan Tenaga Kerja memerlukan pengkhususan dan konsentrasi yang wajar. Ini adalah disebabkan kajian-kajian yang bercorak 'quantitative' yang terpaksa dijalankan untuk mendapat keputusan (end result) yang kecil 'margine' kesilapannya. Masalah ini hanya dapat dicapai dengan ujudnya organisasi Sel Tenaga Kerja yang baru;

yangmana kertas cadangannya terpaksa dibekukan oleh NAZIRAN Perjawatan disebabkan keadaan ekonomi Negara ketika ini.

Perancangan Tenaga Kerja adalah satu aspek yang unik dan mustahak untuk pihak atasan (top management) membuat keputusan dan seterusnya menentukan pengendalian Pengurusan Anggota (Personnel Management) berjalan licin. Tanpa Perancangan Tenaga Kerja yang kemas, kepantasan dan ketepatan maklumat yang berkesan tidak dapat diperolehi, seterusnya Pengurusan Anggota terjejas dan akhir sekali objektif organisasi dan Negara tidak mungkin tercapai.

Majar Badruzaman bin A. Rani telah ditauliah dari Sekolah Pegawai Kedet Portsea Australia pada tahun 1973. Pernah berkursus selama satu tahun di bidang Sains Pengurusan Instituit Tadbir Negara, Kuala Lumpur. Kini berkhidmat di Departmen Tentera Darat, Kementerian pertahanan.





MEDICAL SUPPORT IN THE FIELD IN THE MALAYSIAN ENVIRONMENT

Contributed by the Medical and Dental Directorate

The paper claims that the existing organisation for the medical support of the Malaysian Army in the Field is inappropriate and inadequate and argues the case for reorganising medical resources in new Medical Battalions.

INTRODUCTION

The Field Medical Support System is an essential component of an army. Unless an appropriate organisation exists to attend to the wounded and the sick, the fighting strength of the army will be depleted at an unacceptable rate. Today, with sophisticated weaponry and greater mobility of armies, casualty figures are bound to be higher and occur at a quicker

rate. The medical support system has to be geared to preclude this eventuality.

The present organisation of field medical services in the Malaysian Army is based on the British experience in conventional warfare. We are, however, using it to meet our needs in counter-insurgency warfare.

In the kind of counter-insurgency warfare that we are engaged in to-day, the vast majority of injuries sustained by our

servicemen are booby trap injuries, gunshot wounds, blast injuries and burns.

The soldier who steps on a booby trap may die immediately, while those nearest him may have one or both legs blown off, as well as sustain multiple fragment wounds. In gunshot wounds, the velocity of the bullet on impact produces a large area of cavitation and tissue damage.

Whether these injuries will result in the loss of life or limb will depend largely on the availability of early vigorous resuscitation and urgent surgical intervention. These measures should keep the injured soldier alive and prevent unnecessary loss of limb.

The Malaysian Army has its Field Ambulances, Field Surgical and Transfusion Teams (FSTTs) and Mobile Dental Units for its medical and dental support in the field. The First Field Ambulance and FSTT were raised in 1965, based on the British Field Ambulance and FSTT organisations of World War II. Subsequent units of Field Ambulance and FSTT were raised in the years that followed, also based on the same organisational structures.

CURRENT POSITION

BATTALION MEDICAL SUPPORT

The basic fighting unit of the Army is the Infantry Battalion. The medical personnel organic to this unit comprise one Regimental Medical Officer and six Medical Assistants. There is no dental element. Other teeth arm units have even fewer medical personnel. Currently, operational casualties are evacuated directly from the scene of action to the nearest civilian hospital.

FIELD AMBULANCE

The Field Ambulances provide the second line of medical support in the field. Each Field Ambulance is assigned to support an Infantry Division. Of its two Companies, one is allocated the responsibility of maintaining a light field hospital of 50-100 beds under tentage. The second Company, with its three Sections, is responsible for the evacuation of

casualties within the Divisional area. This stretches the resources of this casualty collecting Company to one Section per Brigade.

FIELD SURGICAL AND TRANSFUSION TEAM

The first FSTT was raised in 1965 together with the Field Ambulance. The unit is intended to complement the Field Ambulance by providing the operation theatre (OT) staff. However, the unit does not have the necessary ancillary staff or the equipment to manage a proper OT. It lacks, in particular, the staff for X-rays, induction/resuscitation, post-operative nursing and central sterile supplies. The unit is not mobile and is completely dependent upon the Field Ambulance for transport as well as tentage to set up a field OT. The FSTT in its present form can only manage very minor surgery and resuscitation of battlefield casualties, prior to evacuation to a more adequate base hospital.

MOBILE DENTAL SECTIONS

The Mobile Dental Section was first introduced as a mobile dental detachment in Sarawak, in 1970. The unit consists of a dental surgeon and 4 ORs (including a dental technician) equipped with a light portable dental chair/drill and a portable generator. It was intended to provide temporary relief to troops serving in the forward operational locations, who could not be moved from their posts to a base area with a proper Dental Centre.

LESSONS FROM EX GONZALES

The shift in emphasis towards conventional warfare in the role of the Army, exemplified in the launching of the Exercise GONZALES series, brought to light the serious deficiencies and inadequacies of the present Field Medical Support System. The existing organisation was found to be ill-equipped to meet the demands of an Army committed to a limited conventional war with rapidly changing tactical situations.

SOLUTION

MEDICAL BATTALIONS AND MOBILE HOSPITALS

To overcome the weaknesses revealed, it has been proposed, and accepted in principle, that the combining of the resources of the Field Ambulances, the FSTTs and the Mobile Dental Sections into Medical Battalions would improve the medical support capability in battle. The reorganisation of these units into Medical Battalions, with appropriate increases in manpower, transport and equipment, would ensure maximum use of the resources available within the Medical and Dental Corps, in terms of technical skills and expertise, while providing the Army with a more up-to-date, efficient and comprehensive Field Medical Support System. It will also reduce the over-dependence upon civilian hospitals.

It is intended to organise the proposed Medical Battalions to provide the following:

- * Command and Control.
- * Administration.
- * Operational Medical Support.

The two main aspects under operational medical support are:

- * **Maintaining a Forward Hospital.** Each Medical Company is expected to operate independently and will have a Mobile Forward Hospital element, providing such services as: triage; resuscitation; induction and recovery; field surgery (including dental); nursing care (wards) and outpatient treatment. The intensive or post-operative care unit will accommodate up to 24 acute beds, while the normal wards will accommodate 50 beds under tentage. The two Medical Companies will be so organised that they can combine to form a Mobile Field Hospital.
- * **Casualty Evacuation.** Each Medical Company will have four Casualty Evacuation Units (CEUs), to convey casualties from Regimental Aid Posts (RAPs) back to the forward/field hospital.

CONCEPT OF OPERATION

Each Medical Battalion is expected to be assigned in support of an Infantry Division. On implementation of the 1:4:4 concept, additional Medical Companies can be superimposed on the standard organisation of the Medical Battalion, to a maximum of four Companies per Battalion, without strain on the command element.

The Medical Battalion may operate from either the Divisional area, or it may deploy its Medical Companies forward, in the Brigade areas. The concept of deployment is as follows:

- * **In Divisional Area.** When the Medical Battalion is located in the Divisional area, normally the Divisional Administrative Area, only the 8 CEUs will be deployed forward for casualty collection from units. This mode will enable the hospital elements of the two Medical Companies to operate a Mobile Field Hospital of 48 acute beds and 100 normal beds under tentage.
- * **In Brigade Areas.** When the Medical Companies are deployed in the Brigade Maintenance Area (BMA) on the scale of one Company per Brigade, the Medical Battalion HQ will remain in the Divisional area. Each Company could then operate a Mobile Forward Hospital with 24 acute beds and 50 normal beds in support of the brigade group, with its 4 CEUs deployed forward for casualty collection.

Deployment of the Medical Battalion, when assigned, will depend on the Divisional medical plan. The proposed alternatives will provide the Divisional Commander with some measure of flexibility. Whichever mode he chooses, the Medical Company will have to be deployed intact, in order to retain its effectiveness.

MOBILE FORWARD/FIELD HOSPITAL

Currently, most cases of operational casualties are evacuated by air to the nearest civilian hospital for attention. The procedure is time-consuming and dependent on aircraft availability, weather conditions and availability of landing pads. It

also taxes the facilities of the civilian hospitals. Above all, any delays will have an adverse effect on the casualties' chances of being saved. In a war situation, with aircraft being almost fully committed to operational missions and the civilian hospitals running with reduced efficiency, this procedure will not be effective. With the adoption of the proposed reorganisation, the Army will have its own comprehensive Field Medical Support System, including mobile forward/field hospitals.

The new Medical Battalion is expected to have a Mobile Forward Hospital with the following facilities.

- * 24 acute beds.
- * 2 mobile OTs.
- * One mobile induction/resuscitation unit.
- * One mobile X-ray unit.
- * One mobile laboratory and blood bank.
- * One mobile central sterile supplies unit (CSSU).
- * One mobile dental unit.
- * A mobile nursing unit to cater for 24 acute-bed patients.

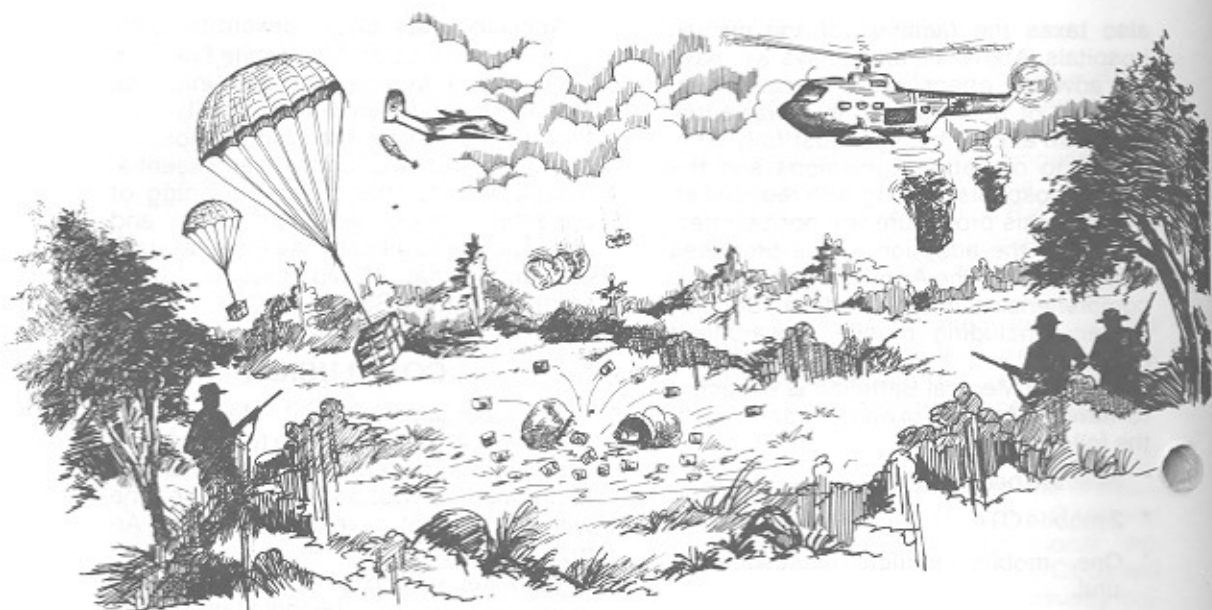
A fully functioning Forward Hospital can be expected to perform 12-15 surgeries within a 24-hour period.

Ancillary Units. Each Forward Hospital will have the support of a Mobile Field Kitchen and a Mobile Laundry Unit. The Mobile Field Kitchen will essentially cater for the meals of patients and the hospital staff. The Mobile Laundry is an essential requirement for the general washing of patients' clothes, bed linen, drapes and other garments used by the hospital staff, including what would require to be sterilised in the CSSU.

CONCLUSION

The reorganised Field Medical and Dental Services will be able to provide the Army with a modern and comprehensive Field Medical Support System, in line with the current development of the Army.

With the raising of the Medical Battalions, the Army will become less dependent on civilian hospitals for the treatment of operational casualties. The chain of casualty evacuation will be considerably shortened, and loss of manpower, due to delayed surgery and medical attention, will be minimised. The Medical Battalion, with its hospital elements, will be a useful complement to Military Base Hospitals during peacetime and will be of great assistance to the civil community in any emergency or national disaster.



CONCEPTUAL DEVELOPMENT OF AERIAL RESUPPLY BY FREE DROP — THE MALAYSIAN EXPERIENCE

Kolonel Nordin Yusof

The article outlines the evolution in the method of resupply by free drop in the Malaysian environment, resulting in the development of the Jamil Chute or J-Chute.

'The Army marches on its stomach'

Napoleon Bonaparte

INTRODUCTION

One of the conventional methods of resupply in the field to sustain combat operations is by air: the supplies are either landed from air or they are dropped by parachutes. The method of parachute delivery has, however, inherent problems. In jungle warfare, these problems are fur-

ther aggravated, as experienced by the British in Burma (1942-45), the French in Vietnam (1945-54) and the Americans, also in Vietnam (1954-75).

During the First Malayan Emergency (1948-60), operations conducted in the remote areas, more often than not, were resupplied by air. This was due to the fact that resupply by air-drop was not only

essential for operational success, as in a follow-up operation, but invariably it was the only practical means.

PROBLEMS IN PARACHUTE DELIVERY

The main problems encountered in parachute delivery are:

- * **Cost.** It is an expensive affair especially when operations are carried out for a protracted period.
- * **Preparation of Drop Zone (DZ).** It may take about two to four days to clear a jungle patch for resupply after a suitable site has been found for the DZ.
- * **Recovery of Parachutes.** Depending on the accuracy of drop and wind conditions, some parachutes are bound to drift or become entangled in tree tops or vines, making recovery a tedious and time-consuming chore at the expense of security.
- * **Damage to Parachutes.** Very often, parachutes are damaged by tree branches or vines or during storage as they are exposed to jungle pests like rodents, termites and other insects.
- * **Backloading Parachutes.** Normally, the parachutes are returned to the Supply Depot through a system of porters (using the Orang Asli) or backloaded from the forward areas by vehicular transport, helicopters or fixed wing aircraft.

EARLY EXPERIENCE IN MALAYA

Despite the problems enumerated above, most of the units operating in the deep jungle during the First Emergency were resupplied by air using parachutes. This was so because the aircraft then available were mainly of the fixed-wing type which, not being provided with landing strips in the combat zones, could only drop the supplies by parachutes. The alternative, helicopters, were few and limited in payload. During this period, the method of supplying by *free drop* from fixed-wing aircraft was employed in cases of emergency. This, as was to be expected, resulted in much wastage since a high proportion of the supplies were damaged by the impact.

In the post-Emergency period, the problem of finding a viable alternative to the expensive method of parachute delivery did not receive much attention for a number of reasons. The diminished nature of the communist terrorist (CT) threat considerably reduced the frequency of resupply by parachute delivery. Moreover, airstrips had been constructed by then in many of the remote static posts, such as the Orang Asli forts, so supplies could be air-landed. Helicopters also came into increasing use; they could air-land supplies without the provision of elaborately prepared DZs.

EXPERIENCE IN THE SEVENTIES

During the early 70s, the upsurge in CT activities in Peninsular Malaysia, which was inspired by the successes of the Viet Cong, led to an increase in the tempo of counter-CT operations, particularly in the states of Kedah, Kelantan, Perak and Pahang. With the increased commitment and deployment of the Security Forces for these operations, the problems of resupply rose to the fore again.

CONCEPT OF FREE DROP

In view of the many difficulties involved in resupply by parachute delivery, the Commander of 2 Malaysian Infantry Brigade, Brig-Gen Dato' Jaafar Onn, who was directly concerned with the resupply problem, came up with the idea of free-dropping rations from helicopters. The Commander's idea, which he originated in August 1975, was tried out by 16 Air Despatch Company in Taiping. A three-step procedure was developed from these trials:

- * Packed rations were stuffed in gunny sacks enveloped in a 'shock-absorbing' material such as coconut fibre, polythene material or rubber foam.
- * Rations thus prepared were dropped from Nuri helicopters from a height of 75-100 metres or just above tree-top level.
- * Packages thus prepared were dropped on to tree canopy which absorbed much of the initial momentum. The

stuffing in the gunny sacks absorbed much of the shock of final impact.

OPERATIONAL EXPERIENCE OF THE FREE DROP CONCEPT

When the method was put to operational use, the damage rate (15% to 35%) was found to be acceptable compared with parachutes lost to drift or entanglement in lofty trees. It was therefore accepted and used quite extensively by units operating in the 2 Brigade tactical area of operations. It was also employed by 2 Brigade troops involved in combined Malaysia-Thai operations in South Thailand such as, Op Doyai Musnah (January-April 1977), Op Cahaya Bena (July-August 1977) and Op Selamat Sawadee (April-October 1978).

This method of free drop was found to have several advantages over parachute delivery.

- * Accuracy was greater.
- * Manpower and time required to find suitable sites and prepare DZs were saved.
- * The materials used in packing were inexpensive and could therefore be disposed of.
- * Laborious backloading of parachutes was eliminated.
- * Less lead time was required to resupply and, consequently, it became possible to redeploy the troops at short notice on hot pursuit or follow-up.

However, there were some negative aspects as well.

- * The payloads were comparatively small.
- * Damage and wastage rates were fairly high.
- * Helicopters flying low were vulnerable to enemy small arms fire.

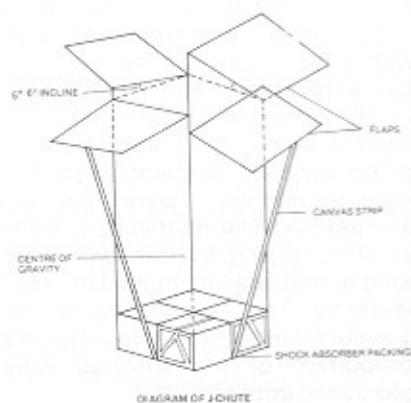
DEVELOPMENT OF THE FREE DROP J-CHUTE

After observing the employment of this method in 1978 in one of the combined Malaysia-Thai operations, the GOC 2 Division, Maj-Gen Dato' Abdul Jamil Ahmad,

thought up four major improvements which could be incorporated into the free drop concept.

- * Reduce damage to the rations by slowing down the acceleration of fall.
- * Eliminate the tumbling effect by providing direction and thereby achieve greater accuracy.
- * Reduce the vulnerability of the helicopter by making the drop at a higher altitude.
- * Keep the cost low by using inexpensive and disposable materials for packing.

Reduce Damage. To minimise damage to the rations, it was necessary to reduce the acceleration of the fall as well as to use suitable shock-absorbing materials. This requirement was met by designing a chute (J-Chute) in the form of a rectangular box made of corrugated cardboard with its bottom-end securely closed. Four flaps inclined at 6° were fixed to the upper free end of the box to reduce acceleration and to induce the spiral rotation necessary to achieve a degree of directional control. To prevent the flaps from folding back, a strip of canvas was used to fasten each flap to the bottom of the chute. This ensured a steady and stable descent. Triangular-shaped cardboard packing materials were designed and placed at the bottom of the chute to absorb the shock of impact. It was found that such a chute containing a set of ten-man pack rations, when dropped at an altitude of 250 metres from a helicopter moving at 40 knots, took about 16 seconds to reach the ground.



Eliminate Tumbling. To eliminate tumbling and to ensure that the chute would land on its bottom, the rations were placed in the lower half of the contraption. The position of the centre of gravity of the chute was thus lowered, which helped the chute to stabilise itself and assume the correct landing position.

Reduce Helicopter Vulnerability. With the added advantage of directional control and improved shock-absorbing packing materials, the height of the drop could now be increased from 100 metres to 300 metres. This meant a reduction in the vulnerability of the helicopter involved in the resupply mission from enemy small-arms fire. As an added protection for the pilot, certain portions of the helicopter's cockpit were made bullet-proof.

TRIAL OF THE HELIBOX CONCEPT

On the initiative of the GOC 2 Division, this Helibox Project (subsequently renamed as the J-Chute Project) was subject to extensive trials carried out in the background of his Divisional HQ in Sungei Besi. The contraption was called the 'Jamil Chute' or, in short, 'J-Chute'. Scientists from the Defence Research Centre of the Ministry of Defence were coopted into the J-Chute Project. After the initial trials in Sungei Besi, 16 Air Despatch Company carried out further trials in Taiping. Finally, at the end of these trials, the Defence Research Centre gave its seal of approval to the J-Chute and endorsed it as suitable for military use.

The development of the J-Chute received international attention at the 13th

Commonwealth Defence Conference on 'Operational Clothing and Combat Equipment' held in Kuala Lumpur on 12-13 September 1981. This subject was discussed, inter alia, among the delegates from the 14 participating countries namely: Australia, Bangladesh, Brunei, Canada, Ghana, India, Jamaica, Kenya, Malaysia (host), New Zealand, Tanzania, United Kingdom, the United States and Zimbabwe.

The trials and demonstrations of the J-Chute which have been carried out in this country have clearly shown the viability of the device. The minimal cost factor is another appealing feature in favour of the chute. These positive features may lead to the J-Chute being adopted by other countries for employment in resupply of combat operations.

CONCLUSION

The revival of the free drop method of supply in the mid-70s by the Commander 2 Brigade was, essentially, to support his concept of mobile operations against the CTs in Perak and Kedah. It was later successfully employed to support the combined Malaysia-Thai operations in South Thailand. It has, to a great extent, enhanced the tactical mobility, flexibility and initiative of the Security Forces operating against the CTs.

Although the J-Chute was developed at the tail-end of the combined operations in Thailand and its potential use in operations is yet to be fully exploited, it has been successfully used in EX TAIHAH TOMBAL II in 1979 and EX GONZALES IV in 1981.

As the Commanding Officer of 4 RMR, one of the battalions operating under the command of 2 Bde in 1977 and resupplied by the free drop method, Kolonel Nordin was involved in its practice and evaluation. Later, as a member of the Directing Staff of the Armed Forces Staff College, he observed several demonstrations of the J-Chute organised for the AFSC students.

