



ARMY DOCTRINE PUBLICATION

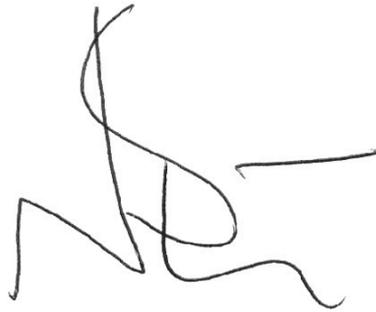
Army Doctrine Primer



ARMY DOCTRINE PUBLICATION

ARMY DOCTRINE PRIMER

Army Doctrine Primer (AC 71954), dated May 2011,
is promulgated
as directed by the Chief of the General Staff



Commander Force Development and Training

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ARMY DOCTRINE PRIMER

FOREWORD

Armies learn in 3 ways: through first-hand experience on operations; in training that seeks to replicate the challenge of operations; and through professional study. The 3 ways are not mutually exclusive, indeed they should be reinforcing. But our Army has a habit to over-rely on experience gained on operations. In the past we have made the mistake of not writing down our experiences; you will search in vain for valuable insights from operations in Northern Ireland, for example. As training opportunities become rarer, we must make the most of them and turn-up ready to apply our prior learning. Indeed, *learning* is key to transforming our Army.

We pride ourselves in being a profession, which by definition has a *body of knowledge* which it studies, it develops through interaction with it, and it shapes through its use; doctrine is our military body of knowledge. Yet the very mention of the word *doctrine* sends some into toxic shock, and claiming not to have read it is a badge of honour amongst some older officers. In fact, much of our doctrine in the past has been good stuff and others have used it effectively, even if we have not. To quote Erwin Rommel:

The British write some of the best doctrine in the world; it is fortunate their officers do not read it.

More recently, General Petraeus was impressed with Army Field Manual Volume 1 Part 10, *Countering Insurgency* and thought it was a 'superb product'. Frankly though, some doctrine has been written in gibberish which has unhelpfully distanced it from the user, namely those officers and soldiers who need to find an intellectual 'edge' in the constant battle to adapt, out-smart as well as out-fight, the adversary. We are determined to make it more relevant and in this Doctrine Primer we take a first step in making it more accessible.

I sense the generation of officer at the Intermediate Command and Staff Course (Land) and below, is keen to engage with a core (and in any case, inescapable) part of the Profession of Arms. To be able to exploit doctrine is as much a part of leadership as

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being able to demonstrate mastery of the basics of tactics and fieldcraft. This Primer is intended to provide a way through what appears at first glance to be a daunting and impenetrable mountain of publications. I commend it to you.

A handwritten signature in black ink, consisting of several overlapping loops and a long horizontal stroke extending to the right.

Commander Force Development and Training
May 2011

PREFACE

An army that is out-thought will almost always be out-fought, no matter how bravely or skilfully its soldiers perform on the battlefield. The Future Character of Conflict work of 2009 and 2010 stated that, in the conflicts to come, 'people will be our edge'. Why and how? If no plan survives contact with the enemy, and all equipment is designed with the last war in mind (and a best guess at the next), then every conflict will open with both sides improvising to make the best of what they have in a race to dictate the course of events. It is people, *thinking people*, who will improvise and who will seize and hold the initiative.

This Primer is about doctrine; it is written to make you think about your profession. It offers guiding principles and handrails. It provides a guide around the vast canon of doctrinal work, from strategic philosophy to the most tactical of practices and procedures. It gives you an introduction to how we think and work in the British Army: our style of command and our way of doing business. It encourages you to think for yourself, to act on your initiative, to follow the doctrine of *mission command*; which is to say understanding what the team is to achieve, and why, and then using your own training, experience, expertise, professional knowledge, imagination and gumption to achieve your part in that plan without prescriptive direction from above.

Doctrine is what is taught and believed, assimilated and applied. It is the professional body of knowledge of your trade. You would not employ a lawyer to fight for you in court if he professed to be uninterested in keeping up-to-date with changes in the law; you would not put your life in the hands of a surgeon who professed an ignorance of anatomy. You should not expect men and women to put their lives in your hands if you are ignorant of either the enduring truths or the current developments of your trade. Success in the profession of arms is more often about *minds* than it is about *stuff*. This Primer helps you to use your own mind, and it offers you the benefit of those, past and present, who have collectively applied their minds to the business of soldiering.

This Primer is divided into 2 distinct parts. Part 1 is structured around 5 questions, the sum of which explains why doctrine is important and advises how to approach it; what to read, when and how. Part 1 requires no previous knowledge of doctrine. It

incorporates a variety of historical examples and vignettes to bring it to life. Part 2 brings together Sir Ernest Swinton's timeless essay *The Defence of Duffer's Drift* with a more recent paper *Conflict on Land*. *The Defence of Duffer's Drift* remains important because it describes and rationalises simple lessons against a tactical scenario (of relevance in the early 1900s), in an army where professionalisation and reorganisation were increasingly dominant issues (following the Second Boer War). The *Conflict on Land* paper examines both the enduring nature and the changing character of conflict in the land environment and was written to provide a foundation from which deductions can be made about how UK land forces may be required to operate and fight in the future.

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PART 1

Doctrine is not just what is taught, or what is published, but what is believed.



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QUESTION 1 - WHAT IS DOCTRINE

What Is Military Doctrine?

Doctrine is a set of beliefs or principles held and taught. Military doctrine contains the fundamental principles that guide how military forces conduct their actions, and provides military professionals with their body of professional knowledge. It provides the armed forces with a common basis for understanding the nature and conduct of armed conflict. In other words, it provides the fundamentals necessary for the effective and practical application of force.

The central idea of an army is known as its doctrine, which to be sound must be principles of war, and which to be effective must be elastic enough to admit mutation in accordance with change in circumstance. In its ultimate relationship to the human understanding this central idea or doctrine is nothing else than common-sense – that is, action adapted to circumstance.

J F C Fuller, *The Foundations of the Science of War*, (Fort Leavenworth, KS: U.S. Army Command and General Staff College Press, 1993 (Reprinted from the original 1926 edition))

Doctrine represents and codifies best practice, based on enduring principles, examples from history and validated lessons from experience and operations. Professor Richard Holmes described doctrine as:

An approved set of principles and methods, intended to provide large military organisations with a common outlook and a uniform basis for action.

The successful conduct of military operations requires an intellectually rigorous, clearly articulated and experience-based understanding that gives advantage to a country's armed forces, and its likely partners, in the management of conflict. This common basis of understanding is provided by doctrine which is designed to guide - not constrain - and which needs to be applied judiciously. To quote Professor Holmes once more:

Doctrine is not just what is taught, or what is published, but what is believed.

Doctrine endures when it is taught, assimilated, acted on appropriately and adjusted as conditions change. It is based on the hard-won experiences of war,

but it also allows for its own evolution in response to developments in the security environment, availability of resources, advances in technology, experience of contemporary operations and trial on exercise. As such, it has 3 functions: philosophical, based on enduring lessons from the past; practical, making it relevant to contemporary operations; and predictive, taking in foreseeable developments in terms of threats, technology and domestic policy.

The principle purpose of military doctrine therefore, is to provide the armed forces with a framework of guidance for the conduct of operations. It steers military forces in their actions while also situating the context in which those actions will be taken. Importantly, British military doctrine is not dogma – it instructs on how to think, not what to think.

Where Does Doctrine Come From?

Doctrine concerns today and the immediate future. It is forged from experience, but it is not about the past (although careful study of military history does ensure an explicit link between doctrine and historical analysis). Nor is it about the *distant* future. It captures what is good and enduring from our

experience and also weaves in more recent insights. Its development can be controversial, because this is where points of view become points of principle and then authority. Doctrine turns the sum of subjective thinking into an objective guide for action. It should be the essence of past experience, clearly expressed to deal with future challenges.

Military doctrine refers to the point of view from which military history is understood and its experience and lessons understood. Doctrine is the daughter of history... Doctrine is needed so that in the realm of military thought an army [does] not represent human dust, but a cohesive whole... should be predatory and stern, ruthless toward defeat and the defeated.

General A.A. Svechin, quoted by Peter G Tsouras, *Dictionary of Military Quotations*, (London: Greenhill Books, 2005)

An understanding of history and past experience is vital in the formulation of doctrine, but, given the tempo of change in the land environment, the Army requires doctrine that is timely, relevant, easily understood and consistent with best practice; balancing anticipation of the future with exploiting lessons from past and current operations. A balance should

be drawn between revolutionary and evolutionary approaches to developing Army doctrine, while recognising the speed of adaptation of some adversaries and threats. Armies should be learning and adaptive organisations, with the agility to update doctrine quickly while maintaining the confidence to retain the enduring themes.

I am tempted indeed to declare dogmatically that whatever doctrine the Armed Forces are working on now, that they have got it wrong. I am also tempted to declare that it does not matter that they have got it wrong. What matters is their capacity to get it right quickly when the moment arrives

Professor Michael Howard, *Military Science in the Age of Peace*, (The RUSI Journal, Volume 19, No. 2, March 1974)

A lesson can only truly be said to be learned once it has been incorporated into doctrine and put into practice. Lessons can be derived from a number of sources, most notably current training

and operations. Within the Army, the Lessons Exploitation Centre is responsible for capturing, assessing and fusing best practice and lessons from operations in order to provide the most up-to-date operational and tactical knowledge to the Field Army.

Doctrine and Fighting Power

Fighting power, as described in *British Defence Doctrine and ADP Operations*, Chapter 2, consists of 3 components:

a conceptual component (the ideas behind how to fight); **a moral component** (the ability to get people to fight); and a **physical component** (the means to fight). Of the 3 components, the conceptual is the cheapest in terms of financial investment, but acts as a powerful *force multiplier* to the others. Figure 1.1 illustrates how doctrine, in combination with other drivers, contributes to the conceptual component, providing a framework of understanding and guidance for the use of military power.

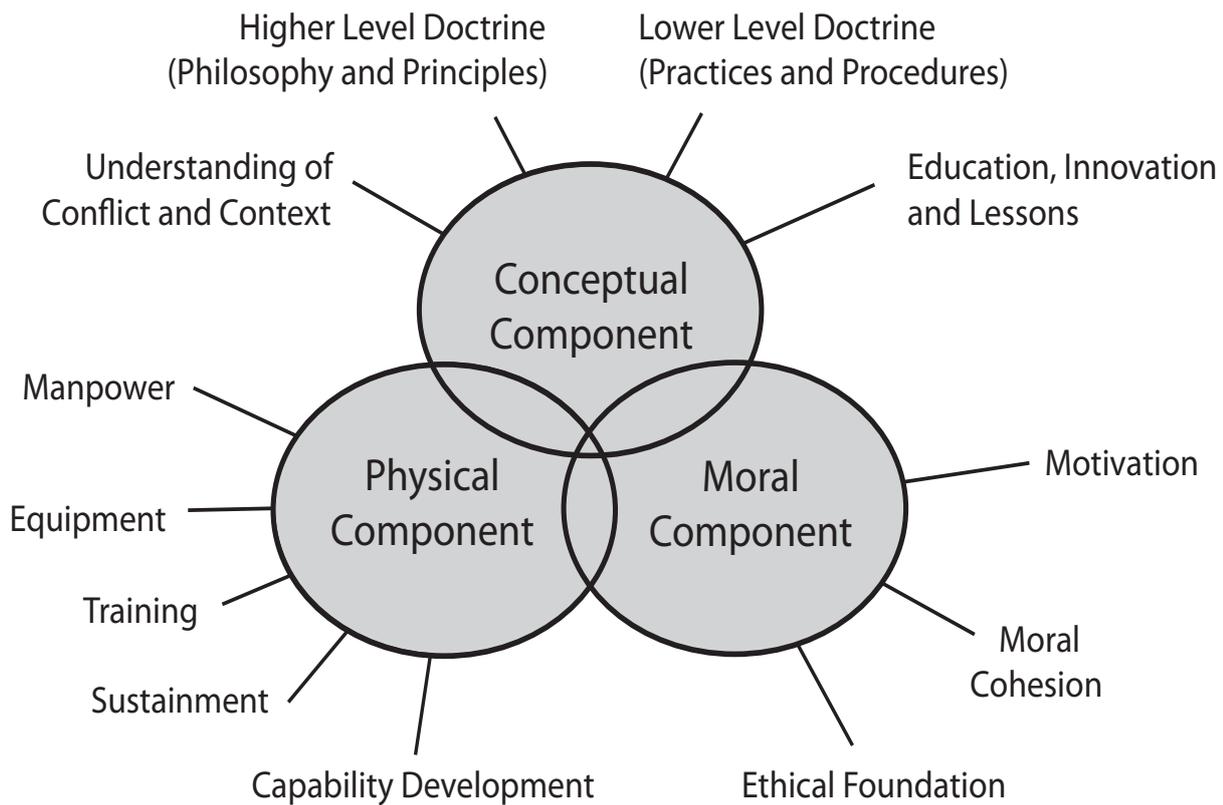


Figure 1.1 – The Components of Fighting Power

The conceptual component of fighting power provides the ideas behind the ability to fight. Clausewitz explained its importance to the military as follows:

It exists so that one need not have to start afresh each time, sorting out the material and ploughing through it, but

will find it ready to hand and in good order. The conceptual component is meant to educate the mind of the future commander, or, more accurately, to guide him in his self-education.

At the heart of the conceptual component is doctrine.

DOCTRINE'S CONTRIBUTION TO FIGHTING POWER

The British/Indian Army (1942 – 1945)

In 1941 and 1942 the Imperial Japanese Army swept all before it. In 3 months it defeated the British/Indian Army in Burma and drove it a thousand miles back into India; the longest retreat in British military history. Yet from this defeated force, limping back across the Chin Hills into Assam, rose an army that would later outmatch the Japanese in virtually every respect; and when in May 1945 the leading elements of the 17th and 26th Indian Divisions, 14th Army, met north of Rangoon, the British/Indian Army had inflicted the worst land defeat that the Imperial Japanese Army had ever suffered.

The British/Indian Army became so successful not just because of superior strategy, leadership or operational art, but because it learnt from what it had done wrong. This was an army willing to learn, that analysed its mistakes, and changed rapidly. After defeat in 1942, it established that its main failing was in jungle tactics and training, mainly at low level. It developed new tactics, and the training required to make those tactics work. It

also changed its organisation, at army command, formation and unit level. General Slim may have been the architect of success in the Burma campaign, but he could do nothing without the tactical craftsmanship of the battalions under his command.



British Mortar Detachments Supporting the Advance of 19th Indian Division, July 1944

In the defeats of the first Burma Campaign in January to April 1942 and the first Arakan campaign of late 1942, some battalions were woefully unprepared to fight a jungle war; they had trained for the Middle East, and had lost many of their experienced officers and men to assist the expansion of the Army. When the Japanese attacked, the British/Indian

Army was road-bound, had no answer to Japanese enveloping tactics, did not dig in, adopted linear defences and built positions that were not mutually supporting.

At first, there was no central organisation to direct the process of change. Units learnt from their own experiences, or from lessons circulated at formation level. In June 1943 the Infantry Committee was established formally to analyse the lessons to date, and tactical development across the India Command was rationalised. Initially this was through a series of pamphlets and training manuals, such as the *Jungle Book*, subsequently complemented by a comprehensive training system. The Army gradually improved; mostly through trial and error. The chief element of success was continuous patrolling, supported by other critical tactics: all round defence; attack by infiltration (preferably in the flank or rear

of the enemy); and digging slit trenches whenever troops halted. Supply systems were designed to support jungle fighting: mule trains to free battalions from roads; and aerial re-supply to permit units to accept Japanese envelopment and still hold and fight.

By 1945 these tactics were second nature to the British/Indian Army; they were supremely confident in their use, frequently beating Japanese forces even when significantly outnumbered. As George Macdonald Fraser said, in his memoir as a Border Regiment JNCO in Burma, *“the Army is fond of describing itself today as the professionals; we weren’t professionals – we were experts”*.

Drawn from Daniel P Marston, *Phoenix from the Ashes – the Indian Army in the Burma Campaign*, (London: Praeger, 2003)

DOCTRINE'S CONTRIBUTION TO FIGHTING POWER

The Battle for France (1940)

French military doctrine of the 1930s centred on the concept of the *methodical battle*. This in turn required a rigid centralisation and strict obedience to top-down orders, thus stifling initiative in low-level commanders. Field commanders were neither trained nor intellectually equipped to respond to the unexpected. The first phase of any new war was defensive; the enemy halted by concentrated artillery fire and stubborn defence in depth rather than dynamic counter-attack. Local reserves would be placed in front of any enemy who penetrated a position, a process known as *colmater*, or filling, with the idea of gradually slowing any advance to a standstill. Only when superiority in men and material had been accumulated would the battle change to the offensive.

The whole process lacked a sense of urgency and was further hampered by inadequate communications. Few radios were available and communication relied on the telephone or messengers. The first was open to disruption by enemy action in

the forward areas and the second was so slow that senior and middle ranking commanders remote from the action were quickly out of touch. The flaws in such a system seeking to counter swift-moving armoured warfare are obvious in hindsight.



The German Army advances through the Ardennes Forest, May 1940

In contrast, German doctrine stressed decentralisation and personal initiative at all levels. In general, German officers commanded units at one rank lower than their British contemporaries; with majors commanding battalions, captains companies and colonels regiments (the equivalents of a brigade). At the same

time officers and NCOs were routinely trained to be able to command at one level up, so that sub-unit commanders had more responsibility than their British and French equivalent, and were able to take more senior commands in moments of crisis.

Tactically, German methods evolved from those of the *Sturmtruppen* of World War I, where small bands of stormtroopers probed the front looking for a weak spot, then attacked. This doctrine was considered less wasteful of manpower than the formal set-piece attack supported by massed artillery, so beloved of the French, and could be applied to armour as well. The mission-orientated system of command that many armies use today evolved from this tradition of identifying the commander's intent, and acting to achieve that intent even if beyond the strict remit of formal orders.

Momentum was a key principle in German doctrine and applied to every arm – assault pioneers as well as tanks or infantry. Reserves were used to reinforce success, not react to enemy initiatives, and the resulting maintenance of momentum was demonstrated often in the 1940 campaign, and again in 1941 in Russia. Also, the concept of the all-arms battle was fully imbued into the Wehrmacht by 1940, uniquely among the armies of the time German field commanders being able to call quickly for Luftwaffe dive-bomber support in neutralising centres of opposition. Full use was made of radios between the various arms, ground-to-air and tank-to-tank, making an enormous contribution to control of the battle.

Drawn from Professor Brian Bond and Michael Taylor, *The Battle for France and Flanders: Sixty Years On*, (Barnsley: Leo Cooper, 2001)

QUESTION 2 – WHY IS DOCTRINE IMPORTANT?

Military doctrine is defined by NATO as *fundamental principles by which military forces guide their actions in support of objectives. It is authoritative, but requires judgement in application.* It provides a common basis for understanding the nature of armed conflict and its conduct, describing how military activities and operations are directed, mounted, commanded, executed, sustained and recovered.

Doctrine is indispensable to an army... it provides a military organisation with a common philosophy, a common language, a common purpose, and a unity of effort.

General George Decker, quoted by Michael Dewar, *An Anthology of Military Quotations*, (London: Robert Hale, 1990)

Military doctrine is essential to deal with the natural fog of war. It provides a handrail of commonly agreed and understood principles and procedures which assist in many situations, especially when the situation is chaotic. It helps to bring coherence to decisions and actions by suggesting what is important and what

is essential. Although every situation needs to be evaluated in its own right rather than through a set formula, without doctrinal foundations evaluation and subsequent execution will be subjective and unguided. Hence, it is through the application of doctrine that the chaotic situation may be exploited.

Rationale for Doctrine's Existence

In conflict the side that learns and adapts the fastest holds the initiative and makes its own luck. As a result of intensive operations over several years, a generation of servicemen and women have a depth of hard-won experience, unparalleled since World War II. Doctrine, and its continual development, allows us to draw upon that experience, evaluate it, codify the most profound insights and so use the relevant lessons to educate and train the commanders and staff of tomorrow.

Military doctrine underpins all military activity, in planning and execution. It helps to order how to think, not what to think. Due to the constantly evolving character of warfare, a guide is required

to deal with varying contexts and interpretations, advances in technology, miscalculations, set-backs, as well as adjustments and shocks to policy. Military doctrine provides this guide. Clausewitz summarised the issue well. He said:

Doctrinal theory becomes a guide to anyone who wants to learn about war from books; it will light his way, ease his progress, train his judgement and help him to avoid pitfalls ... [it] is meant to educate the mind of the future commander, or, more accurately, to guide him in his self-education, not to accompany him to the battlefield.

If an army is to represent an effective deterrent in peacetime, it must be seen to be physically capable of fighting, and mentally and morally prepared to do so. Such an army must be clear how the complex situations, difficulties and hardships that will inevitably arise in combat are to be tackled. Conduct of war is a matter of applying both science and art.

War is a science which depends upon art for its application.

B H Liddell Hart, *Thoughts on War*, (London: Faber and Faber, 1944)

The Army's doctrine must attend to both aspects, but it should also seek to influence the way in which its officers (and non-commissioned officers) think. Hence the function of military doctrine is to establish the framework of understanding of the approach to warfare – not a set of rules – and provide direction as an aid to understanding. The importance to an army of being able to think was articulated by Major General Fuller as follows:

... 'what to think' of itself is not sufficient; it may be said to supply the raw material - historical facts etc - in which 'how to think' operates. 'What to think' supplies us with the bricks and mortar, 'how to think' with craftsmanship.

Hence, it is Fuller's craftsmanship which formal doctrine must develop in peacetime, and continue to evolve in times of conflict, by engendering a sense of purpose in what is done. Its rationale is to guide, explain and educate, as well as provide the basis for further study and informed debate.

Doctrine's Purpose

Military doctrine provides the British Army with:

- The text-books for the teaching and understanding of the British approach to warfare at every level.
- The framework for a common, and commonly understood, approach to operations.
- The guide-books to lead us through what is constant in the nature of war, and what is changing in the evolving character of warfare.

Beyond the British Army, our doctrine provides:

- Allies and potential coalition partners with an understanding of the UK's military ethos and approach.
- A wide civilian audience, including academics, industrialists, journalists and members of the general public with a legitimate insight into the British approach to warfare.
- A clear message to potential adversaries that the UK is militarily well prepared; thus contributing to deterrence in the broadest sense.

DOCTRINE'S IMPORTANCE

Transformation in Contact



We all know of the apocryphal tale of armies historically preparing to fight the last war rather than the next. Successful armed forces adapt and transform at a pace faster than their potential adversaries. Cromwell, as an example of which I am particularly fond, unlocked the synergy of discipline, training, new equipment and new tactics in a manner that left the Royalists looking like barely gifted amateurs. This process can be found throughout history although rarely is it accelerated with the vision and drive

demonstrated by Cromwell. Indeed in the 1920s, as an example, Basil Liddell Hart and 'Boney' Fuller sought to persuade soldiers everywhere that the era of the horse had been replaced by that of the tank. It was during this period that Liddell Hart noted ruefully that *there is only one thing harder than getting a new idea into the military's mind and that is getting an old one out!* We must be determined that we do not fall into that trap.

There is a collective belief that historically most wars have been primarily inter-state in nature. Driven by national interests, success was often easy to define, normally by overwhelming your opponent militarily in order to force a political outcome on your terms. Clear-cut victory was feasible and indeed frequently achieved. It is this thinking that dominated the development of our armed forces. Many analysts argue convincingly that the approach being taken to future conflict today by many countries has still not substantially changed.

Now these countries may not be so wrong, in principle, if one believes that

traditional state-on-state warfare is what it is all about and that the type of operations we are conducting in Afghanistan are aberrant. In fact, even a cursory examination of history suggests that such wars are the norm; whilst hugely important when they occur, state-on-state conflict is far less frequent. Whether one chooses to accept this or not, I for one believe that our generation is in the midst of a paradigm shift, is facing its own 'horse and tank' moment if you like, born in our case chiefly but not exclusively of the global revolution in communications and associated technology.

The British Armed Forces are adapting to the challenges of war in Afghanistan. Self-critically however, this *transformation in*

contact is still localised and small in scale. Whilst certainly on the case, we have yet to import the population-focused, often subtle and certainly hi-tech ways of fighting that we now take for granted in places like Helmand into the core of the Armed Forces, as we train and equip for generic operations. US forces are doing better; they now give stabilisation operations the same doctrinal weighting as those related to conventional offensive and defensive operations.¹

Adapted from a series of speeches given by General Sir David Richards (as Commander in Chief Land Forces and designate Chief of the General Staff), *Royal United Services Institute*, (London: June 2009)

¹ The subsequent publication of Joint Doctrine Publication 3-40 *Security and Stabilisation: The Military Contribution* in November 2009 addressed the need for approved UK doctrine for stabilisation.

DOCTRINE'S IMPORTANCE

Reform of the Prussian Army



Gerhard Scharnhorst (1755-1813)

Disaster at Jena and Austerlitz in 1806 shook the foundations of Prussian military theory and practice, furnishing an impetus for analysis and reform. Never before had any first-class army been so swiftly and decisively reduced to impotence. The lack of a clear political objective, coupled with a military high command that resembled, as historian David Chandler has said, "a junta of septuagenarians", led to a profusion of conflicting plans. Some of the crucial defects in military leadership

might have been surmounted had the Prussian Army possessed a unified command structure and a sound tactical doctrine. But it did not.

So Prussia, clinging to the great traditions of its Frederician past, marched to war in 1806 engulfed in a conceit of invincibility. The true extent of the mental deterioration that had afflicted leaders, who believed an unthinking Spartan obedience was the key to success, was never fully recognised until that October afternoon at Jena and Austerlitz. There, the veteran French Army, imbued with the deadly national enthusiasm that comes from opening careers to talent, annihilated the Prussian Army and left little doubt that a drastic overhauling of the robot-like Prussian war machine was necessary.

Instrumental in leading the reform of the Prussian Army after Jena was Gerhard David von Scharnhorst. From the beginning of his military career, Scharnhorst's primary concern was the educational training and development of the soldier. In sharp contrast to previous ideas that all an army required to fight

was a proper amount of training and drill, Scharnhorst recognised that disciplined intellect was essential to the profession of arms.

The Prussian Army's amazing recovery following its catastrophic defeat in 1806 remains one of the most remarkable feats in military history. In just 6 years Prussia fielded an army that played a decisive role in the defeat of Napoleon. This rapid regeneration, accomplished under severe constraints, was the work of a small group of reformers led by Scharnhorst. The

receptive audience Scharnhorst found in the *Militarische Gesellschaft* society gave him an ideal opportunity for presenting his concept of military professionalism and the nation-in-arms. Although his ideas were largely ignored before 1806, Scharnhorst had nevertheless laid the foundation for the later reform of the Prussian Army.

Drawn from Charles Edward White, *The Enlightened Soldier*, (New York: Praeger, 1989)

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QUESTION 3 – HOW IS DOCTRINE ORGANISED?

Responsibilities

There are 3 broad groups involved in the development of doctrine; the writers, the teachers and the practitioners. Doctrine at the strategic and operational level is, by definition, joint. Responsibility for its development lies with the Development, Concepts and Doctrine Centre (DCDC). Tactical level doctrine that has joint-applicability is primarily the responsibility of the Permanent Joint Headquarters (PJHQ). Tactical level doctrine that predominantly applies to one environment will be allocated a single-Service lead. For example, Army Doctrine Publication (ADP) *Operations* is written on behalf of CGS by the Land Team within DCDC. Within the Army, responsibility

for lower-level tactical doctrine rests with Director Doctrine and Lessons on behalf of Director General Land Warfare.

Structure

The Levels of Doctrine. Higher levels of doctrine establish the *philosophy* and *principles* underpinning the approach to military activity. Such doctrine provides a framework of understanding for the employment of the military instrument and a foundation for its practical application. The lower levels of doctrine, which are broader, describe the *practices* and *procedures* for that practical application. The levels of doctrine are depicted in Figure 3.1.

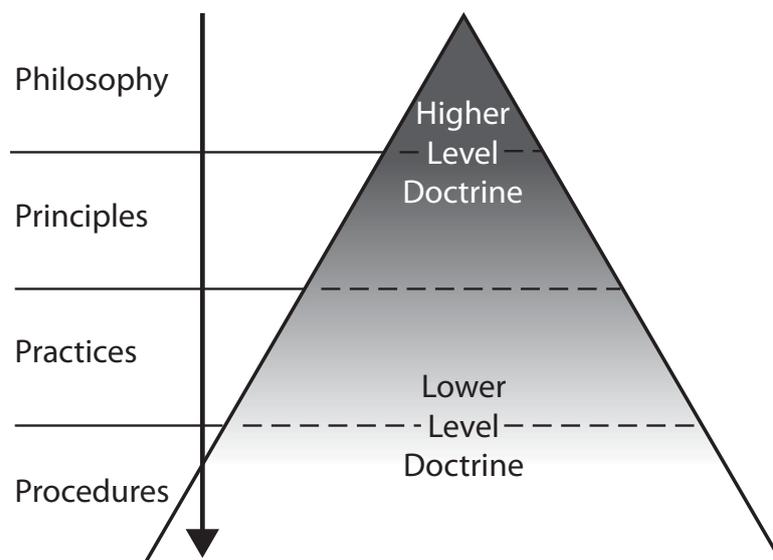


Figure 3.1 – The Levels of Doctrine

Philosophy is conceptual, enduring, pervading and largely *descriptive*. Principles are more specific and are often listed as short statements and build upon philosophical foundations. Practices describe the ways in which activity is conducted. Procedures are intended to be *prescriptive*, to ensure uniformity of approach. They describe how lower-level tasks should be conducted. *Tactics, Techniques and Procedures* describe the lowest levels of doctrine, which are the most voluminous. Levels of doctrine are not aligned to a particular level of warfare; for example, a command philosophy applies as much to a corporal as to a corps commander.

The Joint Doctrine Hierarchy

The Joint Doctrine Hierarchy is described in ADP *Operations*, Chapter 2. At the higher levels, UK doctrine is joint and divided into capstone, keystone, functional (J1 to J9), environmental (for example maritime, land or air), and thematic (specific to a conflict theme or type of campaign) doctrine. Land doctrine sits

within the joint hierarchy from which it derives its authority and consistency. It is always necessary to understand the position of an element of doctrine in order to exploit it fully. As such, Figure 3.2 shows the UK's joint capstone, keystone, functional, environmental and thematic doctrine as a hierarchy.

Strategic Doctrine. The capstone Joint Doctrine Publication (JDP) 0-01 *British Defence Doctrine* (BDD) sits at the apex of the UK's doctrine hierarchy. It sets out the philosophy of defence as an instrument of national power and the British military approach to operations when that instrument is employed. BDD explains the relationship between defence policy and military strategy, and – while highlighting the utility of force – emphasises the importance of a integrated, rather than an exclusively military, approach to security. Beneath BDD is the joint keystone publication, JDP 01 *Campaigning*. This sets out the principles of joint campaigning, is set at the operational level and acknowledges the increasingly multinational and multi-agency context of campaigns.



Figure 3.2 – The Joint Doctrine Hierarchy

Functional, Environmental and Thematic Doctrine

Functional Doctrine. Functional doctrine is categorised by a J1-J9 function. It describes joint practices and is set at the operational and campaigning level. Supporting publications provide additional detail for discrete areas of functional doctrine.

Environmental Doctrine.

Environmental doctrine draws on functional and thematic doctrine that is specific to the maritime, land, air, space, information (including cyberspace), and electromagnetic environments. It describes doctrine within the context of the surroundings or conditions within which operations occur. This distinguishes environmental doctrine from single-Service doctrine; although a single-Service's doctrine may coincide with one environment in particular and one service may take the lead, as the Army does with *ADP Operations*.

Thematic Doctrine. Thematic doctrine is operational doctrine within a specific context. For example, JDP 3-40 *Security and Stabilisation: The Military Contribution*

draws on joint functional doctrine and adapts it for use within a stabilisation setting. It is not intended to represent a template for a specific operational theatre but rather a conflict theme. Thematic doctrine is then reflected in environmental publications and lower level doctrine, for example JDP 3-40 feeds the Army Field Manual (AFM) for counter-insurgency activities (AFM Volume 1 Part 10 *Countering Insurgency*).

Multinational Doctrine

The NATO standardisation process provides agreed standardisation for operations, tactics, techniques and procedures, including terminology. Once ratified, allied publications are reflected in the UK's joint and single-Service doctrine. Likewise, the American, British, Canadian, Australian and New Zealand Armies (ABCA) programme aims to improve current and future interoperability, mutual understanding and commonality of approach in support of coalition operations. In addition, given that US forces are routinely pre-eminent in contemporary coalition operations involving UK forces, the UK doctrine organisations maintain close links with their US counterparts.

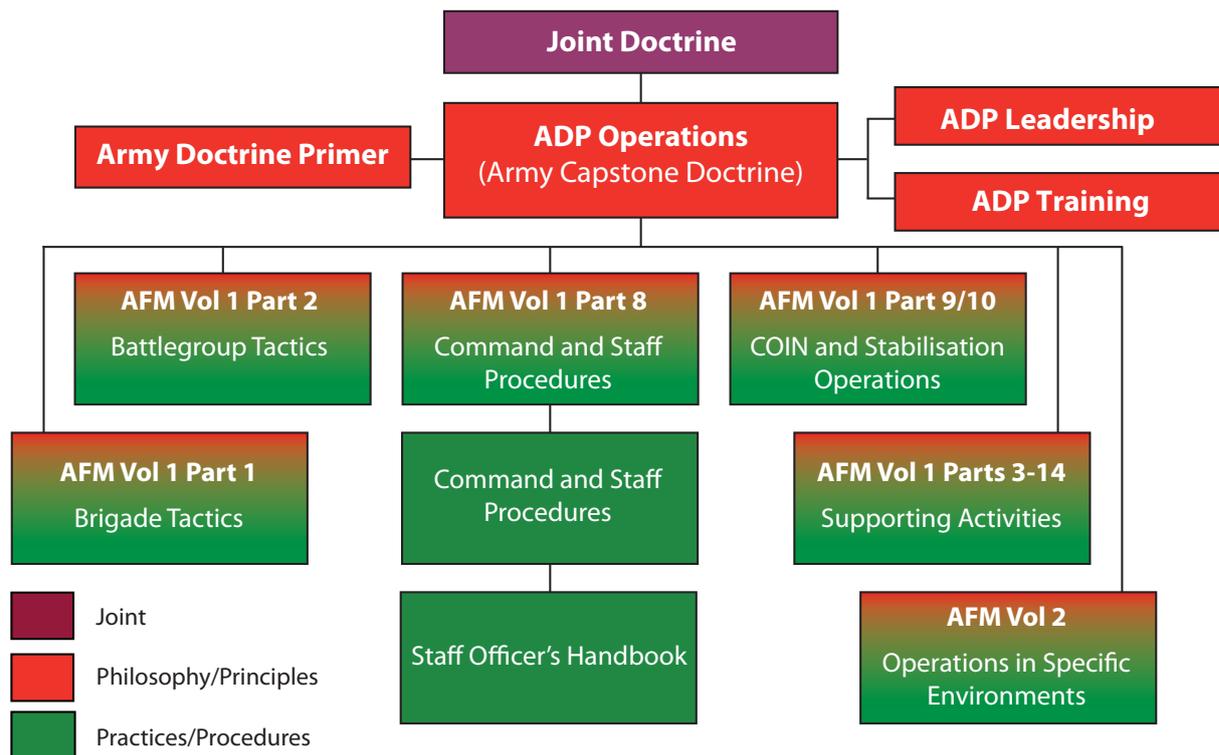


Figure 3.3 – Army Doctrine Landscape

The Army's Doctrine Landscape

The Army's doctrine landscape is shown at Figure 3.3. Bearing in mind the differences between philosophy and principles versus practices and procedures, only the red boxes provide the former. The green boxes are about putting them into practice (although there are likely to be some brief introductory linkages).

Access to Doctrine

Military doctrine is available in a variety of formats. Joint strategic and operational

level doctrine, including BDD and JDPs, are posted on the DCDC defence intranet, and the internet (www.mod.uk/dcdc). Army doctrine including *ADP Operations*, the Army Field Manual (AFM) series and lower-level handbooks, guides, *aide memoires*, and arms and service publications are accessible via the British Army Battle Box (<http://www.baebb.dii.r.mil.uk/baebb/>) and the Army Knowledge Exchange (AKX). (<https://wss.armynet.mod.uk/sites/akx/default.aspx>). Publications are also widely available in hard copy, on the Army portal, the Land Warfare Centre website, ArmyNet, and *Vital Ground*.

ORGANISING DOCTRINE

Fighting Instructions

Over the past 30 years or so we have trained, organised and equipped ourselves as an Army to fight a particular and essentially defensive campaign, although concurrently with this activity units and formations have deployed to fight quite different actions in other campaigns of varying intensity. We have been teaching and rehearsing our practice, because we thought we knew where and what we were to do and, to a large extent, our practice has become our principle. We face now a new situation where the certainties of the previous deterrent and defensive campaign are absent, fewer forces are readily available and their deployment and missions cannot be predicted. In these new circumstances we need to establish a thorough understanding of how we want to fight in principle so that as the situation unfolds appropriate practice can be taken rapidly, flexibly and co-operatively.

The object of these Fighting Instructions¹ is to lay down the *Principles* upon which we fight in order that we should have a

common *Philosophy* of battle, know how we want to fight, and equip, organise and train ourselves to that end. These instructions are in 2 parts. The first, *The Philosophy of Battle*, provides that essential understanding of those imperatives for battle which stem from our Principles of war. The second, *The Application*, is the basis for the conduct of operations.



Drawn from Major General Rupert Smith (then GOC 1 Armoured Division), *Fighting Instructions Edition 5*, (June 1992)

¹ *Fighting Instructions* were first introduced by Major General (later Field Marshal) Nigel Bagnall in the late 1970s as part of his drive to introduce standard operating procedures into the British Army of the Rhine.

ORGANISING DOCTRINE

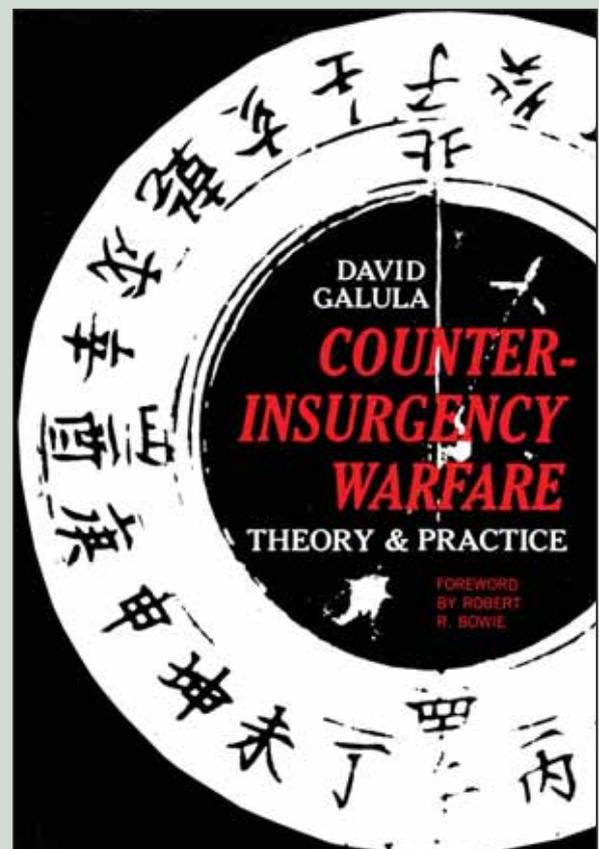
The Laws and Principles of War

The profusion of variables in war has never discouraged the search for foolproof systems. Because war can be a matter of life and death to states and nations, few other fields of human activity have been so consistently, thoroughly, and actively analysed. Ever since men have thought and fought (sometimes in the reverse order), attempts have been made to study war – philosophically, because the human mind loves, and needs, to lean on a frame of reference; practically, with the object of drawing useful lessons for the next war.

Such studies have led, in extreme cases, to the denial that any lesson at all can be inferred from past wars, if it is asserted that the conduct of war is only a matter of inspiration and circumstances; or conversely, they have led to the construction of doctrines and their retention as rigid articles of faith, regardless of facts and situation. French military history offers a remarkable example of oscillation between these 2 poles. The French had no theory or plan in the 1870-71 France-Prussian War. In 1940, they duplicated a recipe provided during World War I and fought a 1918-

type of war against the German panzer divisions. The result in both cases was disastrous.

Nevertheless, from studies and accumulated experience, observations have emerged of certain recurrent facts that have been formulated into *laws* of war. They do not, of course, have the same strict value as laws in physical science. However, they cannot be seriously challenged, if only because they



confirm what common sense tells us. And they are very few in number.

It is the first law that the strongest camp usually wins; hence Napoleon's axiom *victory goes to the large battalion*. If the contending camps are equally strong, the more resolute wins; this is the second law. If resolution is equally strong, then victory belongs to the camp that seizes and keeps the initiative – the third law. Surprise, according to the fourth law, may play a decisive role.

These laws, substantiated by countless cases, constitute the ABC's of warfare. They have, in turn, begotten guiding principles such as concentration of efforts, economy of forces, freedom of action, safety. Application of these principles may change from epoch to epoch as technology, armament, and other factors change, but they retain in general their value throughout the evolution of warfare.

Drawn from David Galula, *Counter-insurgency Warfare: Theory and Practice*, (New York: Praeger, 1964)

QUESTION 4 – WHAT IS THE BRITISH ARMY’S DOCTRINE?

ADP *Operations* provides the primary source of UK higher level tactical doctrine for the land environment and is the capstone doctrine for the British Army. Drawing from other higher-level publications, it includes a number of key themes and tenets that are worthy of introduction in this primer.

The Principles of War

A full explanation of the Principles of War is included in *British Defence Doctrine (BDD) (Chapter 2)* and *ADP Operations (Chapter 2, Annex A)*.

Principles of military art shine in history like the sun on the horizon, so much the worse for blind men incapable of seeing them.

Napoleon, quoted in *The Principles of Combined Arms Battle* (Moscow 1992)

The Principles of War provide comprehensive considerations for planning and executing all campaigns and operations, not just warfare. The principles are not absolute or prescriptive, but provide a foundation for

all military activity and doctrine. They provide a timeless and overarching checklist of things to be remembered at all levels of warfare. The Principles of War, which form part of the conceptual component of fighting power, are listed below.

Selection and Maintenance of the

Aim. A single, unambiguous aim is at the heart of successful operations. Selection and maintenance of the aim is regarded as the master principle of war.

Maintenance of Morale. Morale is a positive state of mind derived from inspired political and military leadership, a shared sense of purpose and values, well-being, perceptions of worth and group cohesion.

Offensive Action. Offensive action is the practical way in which a commander seeks to gain advantage, sustain momentum and seize the initiative.

Security. Security is the provision and maintenance of an operating environment that affords the freedom of action, when and where required, to achieve objectives.

Surprise. Surprise is a feeling of relative confusion, or perhaps shock, induced by the introduction of the unexpected.

Concentration of Force. Concentration of force involves the decisive, synchronised application of superior fighting power to realise intended effects, when and where required.

Economy of Effort. Economy of effort is the judicious exploitation of manpower, materiel, time and influence in relation to the achievement of objectives.

Flexibility. Flexibility entails the ability to change readily to meet new circumstances; it comprises versatility, responsiveness, resilience, acuity and adaptability.

Co-operation. Co-operation entails the incorporation of teamwork and a sharing of dangers, burdens, risks and opportunities in every aspect of warfare.

Sustainability. To sustain a force is to generate, and deliver, the means by which its fighting power and freedom of action are maintained.

Conflict Themes

The Conflict Themes are described in ADP Operations (Chapter 3), and form the central thesis of the Conflict on Land paper included at the rear of this publication.

If there are no wars in the present in which the professional soldier can learn his trade, he is almost compelled to study the wars of the past. For after all allowances have been made for historical differences, wars still resemble each other more than they resemble any other human activity. All are fought, as Clausewitz insisted, in a special element of danger and fear and confusion. In all, large bodies of men are trying to impose their will on one another by violence; and in all, events occur which are inconceivable in any other field of experience. Of course the differences brought about between one war and another by social or technological changes are immense.

Professor Michael Howard, *The Use and Abuse of Military History*, (The RUSI Journal 138: 1993).

The Nature of Conflict. Nature and character are 2 different things. Nature is inherent and endures, character evolves. While there will always be a need to rationalise conflict in a contemporary setting in order to engage in it effectively, its enduring nature will never change. Conflict will always be a violent contest: a mix of chance, risk and policy whose underlying nature is human and volatile. There is always friction,

uncertainty and chaos, violence and danger, and human stress.

War has 2 components that endure: its nature (the objective) remains constant under all circumstances; while its character (the subjective) alters according to context.

Karl von Clausewitz, *On War*, translated by Michael Howard and Peter Paret (Oxford: Oxford University Press, 2007).

The Character of Conflict. The character of conflict evolves. It changes because of human experience, innovation and the dynamics of conflict themselves. The character of conflict is changed by the consequences of war, as human beings adapt to it, and as a result of human development.

The activities will remain the same, albeit with altered frequencies; it is their purpose and context that has changed utterly.

Major General Jonathon Shaw, Synopsis of General Rupert Smith's *The Utility of Force - 5 Years On*, 29 September 2009.

Core Tenets

The 2 core tenets of the British Army's approach to operations –

the Manoeuvrist Approach and Mission Command – are examined in ADP Operations (Chapters 5 and 6 respectively).

The Manoeuvrist Approach. This is an indirect approach to operations that involves using and threatening to use force in a combination of violent and non-violent means. It concentrates on seizing the initiative and applying strength against weakness and vulnerability, while protecting the same on our own side. To amplify this description further, the opposite of the manoeuvrist approach is the attritional approach; the warfighting philosophy which seeks to destroy the enemy physically through incremental attrition. That is not to say that some attrition will not take place in exploiting the manoeuvrist approach, but it is the intention with which they are used that defines the 2 approaches.

Now an army may be likened to water, for just as flowing water avoids the heights and hastens to the lowlands, so an army avoids strength and strikes weakness. As water shapes its flow in accordance with the ground, so an army manages its victory in accordance with the situation of the enemy. And as water has no constant form, there are in war no constant conditions. Thus, one

able to gain victory by modifying his tactics in accordance with the enemy situation may be said to be divine.

Sun Tzu, *The Art of War*, translated by Samuel B. Griffith (Oxford: Oxford University Press, 1963)

Mission Command. Mission command underpins the manoeuvrist approach by upholding a command philosophy of centralised intent and decentralised execution that promotes freedom of action and initiative. It relies on commanders giving orders in a manner that ensures that subordinates understand their intentions, telling them what effect they are to achieve and the reason why it is required. Subordinates then decide how best to achieve their missions in line with their commander's intent.

We produce first class commanding officers and sub-unit commanders. Giving them both authority and responsibility as part of a genuine need to decentralise decision-making is not only welcome by them (provided we resource training and education appropriately) but central to success at the tactical and operational level.

Brigadier Andrew McKay, Commander Task Force Helmand (Operation HERRICK 7), Post Operational Interview, 3 July 2008.

Using Land Fighting Power

Adapted from Brigadier K D Abraham and Lieutenant Colonel C J Beattie, *Land Fighting Power – How UK Land Forces must Fight in the Future*, (March 2011).

An army must be able to fight; it is its core purpose and foundation. Fighting, or the deterrent effect of having the capability to do so, underpins nearly all military operations. To prevail in battle we must man, equip, train and fight in a way that joins together and multiplies the effects of all the tools available to us. This demands the integration and co-ordination of different types of military capability in such a way that maximises their strengths and minimises their vulnerabilities. The ability to conduct what is called *combined arms manoeuvre* is at the heart of an army's ability to fight. The term *combined arms* indicates that action is being undertaken by several 'arms' (infantry, armour, aviation, artillery, engineers, air, etc) in a co-ordinated manner to achieve a common mission.

An army consists of building blocks of increasing size and capability. Combining these blocks effectively allows a land force to manoeuvre which, at its

simplest, combines agile thinking with fire and movement to put an enemy at a disadvantage. In more complex forms this may be to gain temporal and psychological advantage using a broader range of non-lethal and indirect means. Armies have been conducting combined arms manoeuvre for centuries – the co-ordinated use of infantry, cavalry, archers, artillery and engineers by Hannibal, Alexander and the Roman Legions was no different conceptually than the use of tanks, infantry, engineers, artillery and close air support in Iraq in 2003. British forces in Helmand conducted combined arms manoeuvre daily, not on a *battlefield* but within a stabilisation setting, combining infantry movement (in protected vehicles, helicopters or dismounted) with the use of multiple weapons systems, close air support, electronic warfare, counter-IED operations, unmanned aerial surveillance and the delivery of *soft effects* such as mentoring and support to governance.

The most basic building block is the individual soldier. The next grouping is either an 8 man section (armed with a range of weapons) or a tank or vehicle crew. These combine to form a platoon; a number of platoons form a sub-unit and so on until a battle group, brigade or division is formed. At each level more

capability is added – more advanced and potent weaponry and, importantly, greater capacity for command, control, information management and analysis. Each level sees the further involvement of specialists such as reconnaissance troops, combat engineers, human-intelligence specialists and artillery forces. When organised, trained or operating together, the whole is infinitely more effective than the sum of the parts.

This is at the heart of the employment of land fighting power, and the modern army must operate not just with the foundation capabilities such as armour, infantry, artillery and engineers, but also with an ever-increasing array of other capabilities and techniques (such as manoeuvre by air and sea, fast air and missile attack, cyber and wider influence activity) to achieve combined arms impact.

Influence

The main doctrinal references to influence are contained within JDP 3-00 Campaign Execution, Edition 3, (Chapter 3), JDP 3-40 Security and Stabilisation: The Military Contribution (Chapter 3), and ADP Operations (Chapter 5).

Influence is an outcome – a result of activity – rather than an activity in itself. It is achieved when perceptions and behaviour are changed through the use of power; directly or indirectly. Influence is a contest, in which narratives compete to be heard and to shape perceptions.

All activity has influence. As such, all military action should be assessed by its contribution toward influencing the key conflict relationship and shaping the eventual political settlement. The perceptions, beliefs, attitudes and opinions of individuals and groups are all fundamental to this outcome, so influence is the guiding idea for the conduct of operations.

We conduct all operations in order to influence people and events, to bring about change, whether by 155mm artillery shells or hosting visits; these are all influence operations. We sought to make use of every lever we had to influence events.

Major General G J Binns CBE DSO MC, GOC MND(SE) (Operation TELIC 10-11), Post Operational Interview, 15 April 2008.

The Doctrinal Frameworks

The Doctrinal Frameworks are described in full in ADP Operations (Chapter 7).

Doctrinal frameworks are used to organise and visualise activity in the land environment. They are used to articulate courses of action. The doctrinal frameworks are: the *Operational Framework*, the *Tactical Framework*, and the *Geographic Framework* along with the *Tactical Functions*.

The Operational Framework. The operational framework helps to describe how the missions of subordinates interact in terms of their purposes. It consists of *shaping, decisive, sustaining and protecting* acts and tasks.

The Tactical Framework. In order to achieve success at the tactical level, a narrower focus is required. The priority is the achievement of tactical missions derived from a campaign plan. To do this a tactical framework, based on the following core functions is used: *find, fix, strike* and *exploit*.

The Geographic Framework. The way in which land operations relate to each other can also be described

geographically, in terms of a *deep, close* and *rear* framework. Geography in the land environment is important in so far as it describes where the intended operation takes place. Even in a non-linear battlespace, the concepts of deep, close and rear – and a sense of range and proximity – aid understanding.

The Tactical Functions. At the tactical level, the 6 tactical functions describe tactical battlefield dimensions, representing the practical expression of the physical component of fighting power. They provide a useful way of organising tactical activity. The tactical functions are: *Command, Information and Intelligence, Firepower, Manoeuvre, Protection* and *Sustainment*.

The doctrinal frameworks are summarised in Figure 4.1.

Military Activities in the Land Environment

The military activities that take place as part of operations in the land environment are described in ADP Operations (Chapter 8).

The military activities are: Deliberate Intervention (DI) and Focused Intervention (FI); Military Assistance to Stabilisation and Development (MASD); Counter-Insurgency (COIN); Peace Support; Peacetime Military Engagement (PME) and Conflict Prevention; and Home Defence and Military Aid to the Civil Authorities (MACA). These overlapping categories help to understand, organise and execute military activity.

The military activities in the land environment are summarised in Figure 4.2.

Operational Framework	Tactical Framework	Geographic Framework
Shaping Tasks	Find	Deep
The Decisive Act – Engagement	Fix	Close
The Decisive Act – Exploitation	Strike	Rear
Sustaining Tasks	Exploit	
Protecting Tasks		
Tactical Functions		
Command	Firepower	Protection
Information and Intelligence	Manoeuvre	Sustainment

Figure 4.1 – The Doctrinal Frameworks

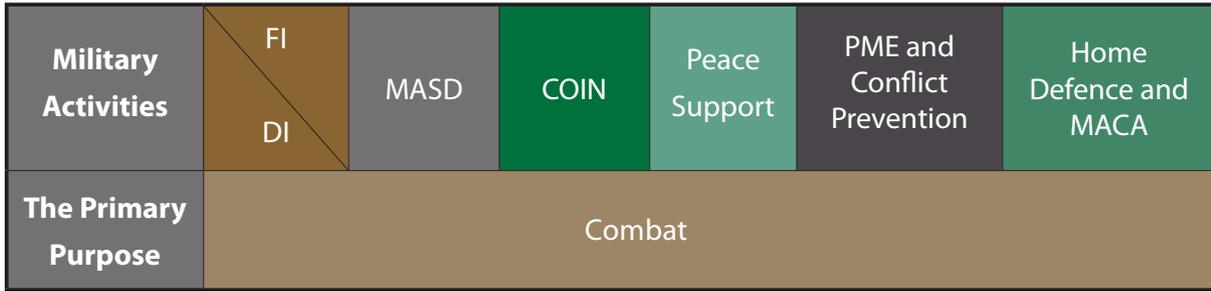


Figure 4.2 – Military Activities in the Land Environment

All 6 military activities are linked by the primary purpose of land forces executing operations in the land environment:

Combat. Combat is a fight or struggle between armed groups. Combat is ultimately what armies are for. The primary purpose of an effective army should be the application of force, or the threat of force, through combat.

Deliberate Intervention. As part of a DI, UK forces will conduct operations to remove an aggressor from territory and protect it from further aggression. DI is likely to be conducted as part of a coalition.

Focused Intervention. FIs are normally intended to be of short duration and limited in their objectives and scope. They can be offensive in nature and may be a precursor to a larger, more deliberate intervention.

Military Assistance to Stabilisation and Development. MASD operations that feature security and stabilisation are

highly likely to require elements of, and overlap with, other activities; for example conflict prevention. They could also follow a DI. *JDP 3-40 Security and Stabilisation: The Military Contribution* provides guidance into the way the military should think about their contribution to stabilisation.

Counter-Insurgency. COIN can be described as those military, paramilitary, political, economic, psychological and civil actions taken by a government or its partners to defeat insurgency. COIN may feature in MASD and may have a direct link to home defence within the UK. *Army Field Manual (AFM) Volume 1, Part 10 Countering Insurgency* describes how the British Army plans and conducts COIN activities at the tactical level in the context of a COIN campaign.

Peace Support. Military peace support activities are defined as those contributing to an operation that impartially make use of diplomatic, civil and military means, normally in pursuit of UN Charter purposes

and principles, to restore or maintain peace, in accordance with a mandate. Such operations could include military activities such as military contributions to peacemaking, peace enforcement, peacekeeping, peace building and humanitarian emergency operations. Joint Warfare Publication (JWP) 3-50 *The Military Contribution to Peace Support Operations* provides guidance for military personnel involved in peace support activities.

Peacetime Military Engagement and Conflict Prevention. PME and conflict prevention encompass all military activities intended to shape the security environment in peacetime. Activities within this area are normally long-term, and are aimed at encouraging local or regional stability.

Home Defence and Military Aid to the Civil Authorities. The security of UK territory itself should be the primary concern of the Government and hence the priority for the use of military forces. Land forces should be prepared to support the civil authorities within the UK. Military support to internal operations are described under the generic heading of MACA. This is divided into 3 distinct categories: Military Aid to the Civil Community (MACC); Military Aid to

Government Departments (MAGD); and Military Aid to the Civil Powers (MACP).

Tactical Actions in the Land Environment

The tactical actions that take place in the land environment are described in detail within ADP Operations (Chapter 8).

Within the 6 military activities, land forces conduct all or some of a range of tactical actions, often concurrently. Tactical actions provide the ways in which the activities are implemented. Land tactical actions are grouped into **offensive, defensive, stabilising** and **enabling actions** and are tabulated in Figure 4.3.

Offensive Actions	Defensive Actions	Stabilising Actions
Attack		
Raid		Framework Security
Exploitation		Security sector reform and military capacity building
Pursuit		
Feint	Mobile defence	Support to the delivery of essential services
Demonstration	Area defence	
Reconnaissance in force	Delay	Support to governance, economic development and reconstruction
Ambush		
Breakout of encircled forces		
Infiltration		
Enabling Actions		
Reconnaissance	Link-up	Retirement
Security	Relief of encircled forces	March
Advance to contact	Relief of troops	Breaching and crossing obstacles
Meeting engagement	Withdrawal	

Figure 4.3 – Land Tactical Actions

Offensive Actions. The primary purpose of offensive actions is to defeat an enemy through the use or threat of force. In offensive actions, the attacker seeks to: create the conditions for freedom of movement and manoeuvre; shatter the enemy’s understanding, will and cohesion; and defeat his forces selectively, thereby creating and sustaining momentum.

During the morning of 26 March 2003, an armoured raid into Az Zubayr by the 2nd Royal Tank Regiment Battle Group

(2RTR BG) achieved shock and surprise in practice. The objective was an enemy command and control centre, which was to be attacked just before H-Hr with 8 x 1,000lb precision munitions. An armoured squadron would then assault the objective, supported by armoured infantry. The enemy was completely paralysed by the surprise attack, especially the JDAMs.¹ What had previously been a concentrated area of enemy strength was neutralised by the shock and surprise of the bombing,

¹ JDAMs - Joint Direct Attack Munitions.

followed up by tanks into the heart of the enemy's perceived stronghold. That there was no resistance during the conduct of the raid, demonstrated the psychological effect as well as the physical blow this achieved. The enemy tried to reorganise but only offered limited resistance further in depth.

Lieutenant Colonel Piers Hankinson,
Commanding Officer 2RTR BG (Operation
TELIC 1), 2100/16/OA dated 30 April 2003.

Defensive Actions. The purpose of defensive actions is to defeat or deter a threat. They are generally intended to provide the right conditions for offensive actions. Defensive actions alone are not usually decisive, without a subsequent offensive action, but they can be strategically decisive, for example by creating the secure conditions required to defeat an insurgency.

As we became more familiar with the ground, the Company began to push the FLETs² where possible in order to have an effect on the Taliban. However, it was important at all times and at all levels of command to weigh up risk against reward. Some might argue that the mission in Kajaki could be achieved by merely remaining static

and defending the Forward Operating Base (FOB). However to do this would be to ignore one of the fundamental principles of defence; that of offensive spirit. Not least by doing so would inevitably have led to the Taliban having greater freedom of movement and being able to more freely plant improvised explosive devices and engage the forward operating base and Dam complex with indirect fire. Yet the requirement to maintain the offensive spirit and keep pressure on the Taliban had to be carefully managed. The Taliban were not going anywhere. If a patrol did not develop into a situation of our choosing then there would always be another day. V Company did not have the resources to begin clearing through compounds and known enemy strongholds on the FLET, even less so as R and R³ took hold. Any ground that was taken would be retaken by the Taliban when the Company would eventually have to return to the forward operating base, and therefore there was a careful balance to be drawn between maintaining the offensive spirit, and not unnecessarily risking lives.

Captain T Finn RM, *Defending the Kajaki Dam*, The Infantryman, 2010.

² FLET - Forward Line of Enemy Troops

³ R and R - Rest and Recuperation

Stabilising Actions. Stabilising actions are the bespoke tactical methods for implementing military assistance to security and stabilisation. They operate in conjunction with the other tactical actions. All stabilising actions need to take place as part of a comprehensive, inter-agency approach.

The history of UK COIN activities, greatly reinforced by recent operations, highlights the essential and enduring nature of Military Capacity Building (MCB) activity in setting the conditions for indigenous security forces to play their part in defeating an insurgency. Without sufficiently large, capable, reliable and confident indigenous security forces, a coalition is unlikely to be able to create lasting security. The ability to develop a credible indigenous army capable of contributing to its country's long-term security is the vital component of UK military support to Security Sector Reform (SSR).

Extracted from AFM Volume 1, Part 10, *Countering Insurgency*, January 2010.

Enabling Actions. Enabling actions are never conducted for their own sake: their purpose is to enable or link other actions and activities. They include those intended to make or break contact with

the enemy, and those conducted out of contact. They were formerly called transitional phases.

Within 3 weeks of arrival 40 Commando, for example, found themselves conducting a night river crossing under contact in order to allow the Warrior Company, an Immediate Replenishment Group and a half Mastiff Squadron to conduct a passage of lines that enabled them to deploy east of Musa Qal'eh. The fact that this was 40 Commando's first night river crossing with so much armour, and that they had to find innovative solutions, on the hoof, of floating WIMIK across (an apple over the exhaust pipe) was not important. What was important was the mindset – at both the Task Force and Battlegroup level – that this could be done and problems overcome.

Brigadier Andrew McKay, Commander Task Force Helmand (Operation HERRICK 7), Post Operational Interview, 3 July 2008.

QUESTION 5 – HOW SHOULD DOCTRINE BE USED?

There is no place in today's Army for the gifted amateur. We must get better at studying the profession of arms and establishing greater coherence and consistency in how we operate, across our activities. While our doctrine emphasises the importance of minimising prescription, the land operating environment is just too dangerous and complicated to make it up as we go along.

The Chief of The General Staff, November 2010.

British doctrine is written to guide the professional soldier. While an inclination exists to demand prescription (a template or *DS solution*) we should arrest this tendency if we are to gain the edge we seek. To be agile we must be capable of operating at the philosophy and principles end of the doctrine spectrum, as opposed to seeking a formulaic set of practices and procedures (accepting that practices and procedures provide important *instruction manuals* for many of our basic and tactical skills and drills).

Although doctrine is authoritative, it requires judgement in its application. It seeks to guide thinking and does not prescribe actions or outcomes. As such, British doctrine allows commanders and subordinates the latitude and encouragement to use their initiative and exploit opportunities. It is about how to think, not what to do. It should aid both understanding and analysis, but should not constrain decision-making.

Engagement with Doctrine

There is an argument that attempting to codify doctrine leads to rigidity of thought and even dogma. Whether or not this is the case is a question of approach. The Army has a requirement to be able to resolve complex activity. Yet warfare is an activity for which few hard and fast rules can exist. At low levels activities can be reduced to a number of drills. But an army that is to succeed in war must have the ability to adapt rapidly to changing circumstances as well as endure chaotic conditions and seize the initiative; drills alone will not suffice.

Given the vast quantity and scope of military doctrine publications available, selective engagement is required throughout an officer's career in order to gain maximum benefit. As an officer progresses through a series of ranks and appointments his level of engagement with, and ultimately understanding of, individual doctrinal publications will necessarily alter. As such, it would not be possible to prescribe an exact course through the doctrinal publications that would suit every individual and circumstance. That said, the paragraphs that follow as to how to approach the body of doctrine assume that awareness and understanding of doctrine develops incrementally over time, through a combination of study and application, while exploiting the overlap within the doctrine hierarchy to develop a layered approach supported by strong doctrinal foundations.

Approaching Doctrine

There is no general who has not heard of doctrine. Those who master it will win; those who do not will be defeated.

Adapted from Sun Tzu, *The Art of War*, translated by Samuel B. Griffith (Oxford: Oxford University Press, 1963)

By considering the doctrine landscape as how one might view terrain from high ground before crossing the line of departure to embark on a battle-run, the reader can navigate a path through the canon of doctrine. The full doctrinal landscape consists of an array of different publications, ranging from the strategic to the tactical as tabulated in Figure 5.1. Not everyone needs to be aware of the intricacies of every single document, but everyone should be aware of what documents exist and their relationship to each other; and have the confidence to know where to find them and what to read.

To understand the full context of the land operating environment the reader should be familiar with higher-level doctrine, including *British Defence Doctrine* (Joint Doctrine Publication (JDP) 0-01), *Campaigning* (JDP 01), and *Security and Stabilisation: The Military Contribution* (JDP 3-40). This level of doctrine sits very much at the apex of the doctrinal landscape, and is more pertinent to the senior commander and the mid-level staff officer. That is not to say that junior commanders and staff officers need not read this doctrine, but their understanding of it at this stage need not be as developed. Returning to the *high ground* analogy, the senior commander and mid-level staff

Doctrinal Series	Title	Known As	Level	Remarks
Higher Level Doctrine	JDP 0-01 <i>British Defence Doctrine</i>	BDD	Strategic	Joint Capstone
	JDP 01 <i>Campaigning</i>	JDP 01	Operational	Joint Keystone
	JDP 3-40 <i>Security and Stabilisation: The Military Contribution</i>	JDP 3-40	Operational	Thematic
	ADP <i>Operations</i>	ADP Ops	Higher Tactical	Army/Land Capstone
AFM Volume 1	Part 1 <i>Brigade Tactics</i>	Brigade Tactics	Lower Tactical	Combined Arms Operations
	Part 2 <i>Battlegroup Tactics</i>	Battlegroup Tactics	Lower Tactical	
	Part 3 <i>ISTAR</i>	Tactics	Lower Tactical	
	Part 4 <i>Counter Surveillance, OPSEC and Deception</i>		Lower Tactical	
	Part 5 <i>Operations in CBRN Conditions</i>		Lower Tactical	
	Part 6 <i>Combat Service Support</i>		Lower Tactical	
	Part 7 <i>Training for Operations</i>		Lower Tactical	
	Part 8 <i>Command and Staff Procedures</i>	Command and Staff Procedures	Lower Tactical	
	Part 9 <i>Tactics for Stability Operations</i>		Lower Tactical	
	Part 10 <i>Countering Insurgency</i>		Lower Tactical	
	Part 11 <i>Battlespace Management</i>		Lower Tactical	
	Part 12 <i>Air Manoeuvre</i>		Lower Tactical	
	Part 13 <i>Air Land Integration</i>		Lower Tactical	
AFM Volume 2	Part 1 <i>Mountain Operations</i>		Lower Tactical	Operations in Specific Environments
	Part 2 <i>Tropical Operations</i>		Lower Tactical	
	Part 3 <i>Desert Operations</i>		Lower Tactical	
	Part 4 <i>Cold Weather Operations</i>		Lower Tactical	
	Part 5 <i>Urban Operations</i>		Lower Tactical	
	Part 6 <i>Operations in Woods and Forests</i>		Lower Tactical	
Land Handbooks	<i>Staff Officers' Handbook</i>	SOHB	Lower Tactical	
	<i>Formation Standard Operating Procedures</i>	Formation SOPs	Lower Tactical	
	<i>Unit Standard Operating Procedures</i>	Unit SOPs	Lower Tactical	
	<i>Field Army ISTAR Handbook</i>		Lower Tactical	
Aide Memoires and Guides	All Arms Tactical Aide Memoire		Lower Tactical	
	Arms and Service Pocket Books		Lower Tactical	

Figure 5.1 – The Canon of Army UK Doctrine

officer must have a good understanding of our strategic and operational level doctrine before they cross the line of departure to commence their battle-run. As they progress *down the hill* they will be faced with numerous challenges. The aforementioned higher-level doctrine has provided them with context and thus they are well placed to understand the battle-picture, but they will need to be aware of more tactical level doctrine to deal appropriately with specific challenges. For example, although the senior commander/mid-level staff officer already has a good understanding of JDP 3-40 *Security and Stabilisation: The Military Contribution*, they will need a deeper understanding of how to conduct counter-insurgency within the land environment. Therefore they need to be familiar with Army Field Manual (AFM) Volume 1 Part 10 *Countering Insurgency*.

However, for the more junior commander or staff officer the doctrinal landscape may look slightly different. To understand the wider doctrinal context before embarking on their battle-run, they should be more familiar with slightly different publications; for instance they may need a detailed understanding of AFM Volume 1 Part 10 *Countering Insurgency*). Then, as they cross the line of departure and embark on their

battle-run, they will call on more lower-level doctrine to help prepare them to face specific challenges, or, to continue the analogy, to engage specific targets. For instance, while the battle-run may be stabilisation-orientated there could be a requirement to clear insurgents from a compound, or a need to clear a route of improvised explosive devices: 2 immediate targets. In both instances, a detailed understanding of Tactics, Techniques and Procedures (TTPs) will be required, specifically Infantry Tactical Doctrine Volume 1 *The Infantry Company Group and the Operation Herrick Tactical Aide Memoire* respectively.

In summary, everyone needs to know the context – *the battle-picture* – but no-one will be expected to knock down every target from the outset. As we progress down our individual battle-runs, moving further into the doctrinal landscape, targets will be engaged as they present themselves. In this way, we can build on the knowledge gained in previous engagements with doctrine, broaden our understanding of the Profession of Arms, thereby making more informed military judgements and decisions.

USING DOCTRINE

World War I

In the spring of 1918, the German Army inflicted a series of major defeats on the allies. Although their offensives finally ran out of steam, it was clear that they had discovered a solution to some of the tactical problems of positional warfare. The German Army considered effectiveness in combat to be the decisive factor. Its attainment therefore became the Army's *Schwerpunkt*.¹ Every energy was focused on achieving combat effectiveness, expressed in 3 primary means: doctrine, adaptability and training.

The Germans developed a comprehensive doctrine of war designed to make

the most effective use of the combat power available. This doctrine operated on 2 levels. The first level was the more theoretical and philosophical, concentrating on the decisive factor and pitting strength against weakness. These concepts applied at all levels and in every aspect of military operations. The second level of doctrine was more directly tactical in application, adopting a highly manoeuvre-orientated approach to battle, both in offence and defence, which sought to seize and maintain tempo.

In contrast the British Army made no comprehensive analysis of its purpose. It



German soldiers training in Sedan prior to the 1918 offensive

¹ Schwerpunkt – centre of gravity, focal point (derived from *Schwer* (weighty) and *punkt* (point)).

lacked the concept of *Schwerpunkt* and its priorities were uncertain. The British command system was characterised by centralisation of decision-making. If circumstances did not accord with plans made in advance, commanders had to refer back to their superiors for fresh instructions. Local initiative was discouraged. The effect of this dogma of restrictive control was that British operations tended to be rigid and inflexible.

The British Army in World War I was characterised by its unsubtle and inflexible approach to battle. Having once adopted this approach, it proved virtually impossible to alter it. The whole system of training produced soldiers and officers unused to independent thought, men unable to develop a more dynamic doctrine or to put it into practice. Near catastrophe was the result.

Drawn from Martin Samuels, *Doctrine and Dogma: German and British Infantry Tactics in the First World War*, (Connecticut: Greenwood Press, 1992.

USING DOCTRINE

The 1991 Gulf War

On 16 Jan 91 at about 0300 hours a US Army Apache helicopter was 12 kms from the electrical power generating station at an Iraqi air defence radar site protecting Baghdad. This was to be one of the first targets of the air campaign to liberate Kuwait. The pilot could see the building on his forward looking infra red sensor. The time of flight of his hellfire missile to the target was 20 seconds. He launched and he observed the missile descend like an arrow into the target.

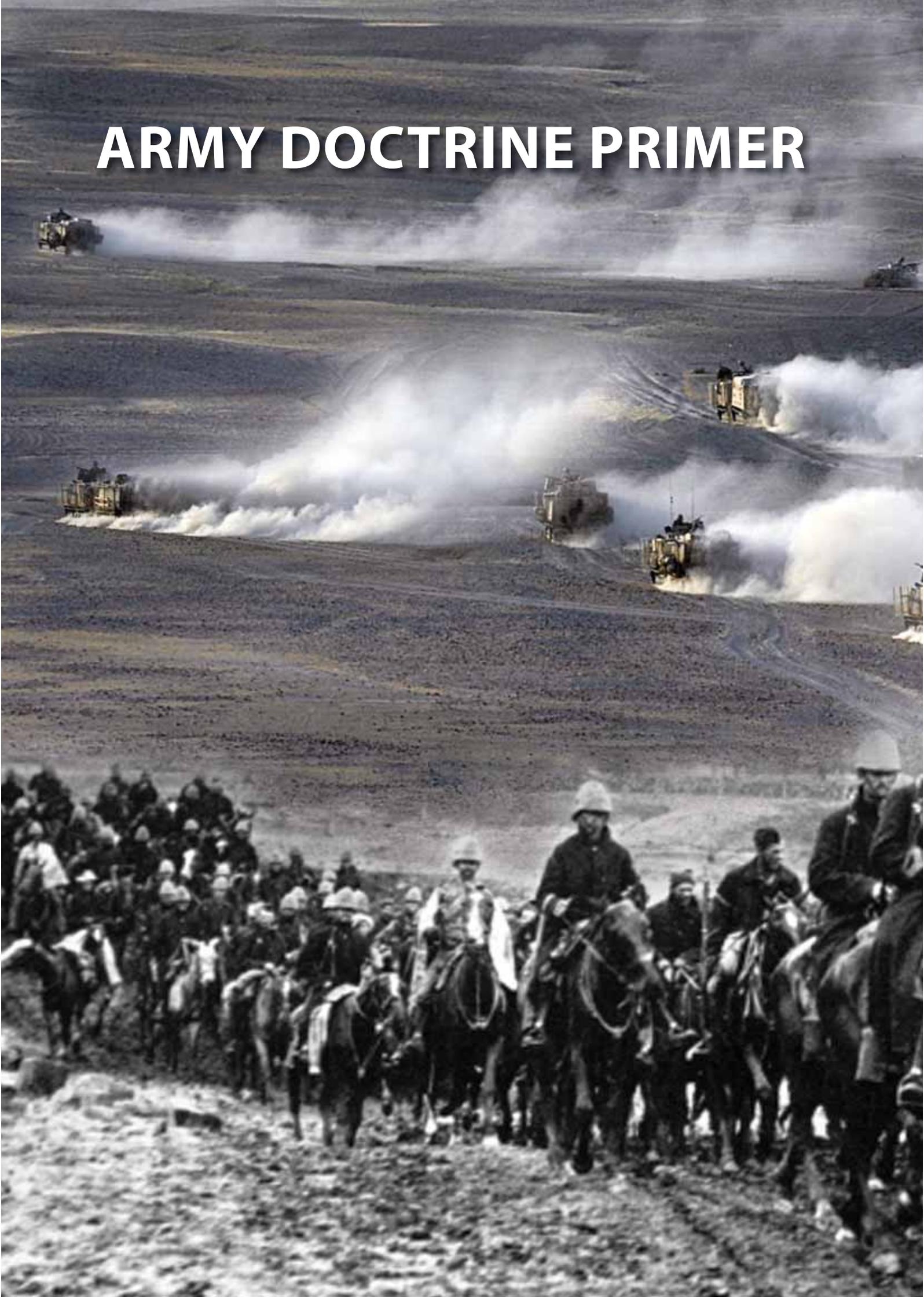
Thousands of miles away allied heads of state checked the time as CNN reporters spoke live from Baghdad with explosions splitting the sky above them. [President] Bush turned to his aids, "just the way it was scheduled" he said. The coalition's offensive operations to liberate Kuwait had commenced at midnight GMT. The outbreak of hostilities had been characterised by widespread and synchronised air and missile strikes, attacking command centres and air defence systems, thereby creating a number of safe air lanes into Iraq. For nearly 40 days and nights precision attacks – almost surgical in their execution

– were made to shape the battlefield, by shattering the Iraqi Armed Forces' cohesion, morale and capability. Then on 24 Feb 91 the Land campaign unfolded. 4 days later the coalition forces had overrun Kuwait and southern Iraq, destroying Saddam's Army, routing the Republican Guard, dictating the terms of peace.

The US led plan was executed with extraordinary precision and skill by formations and units whose commanders fully understood not only the operational plan but also their tactical part in that plan. The concept of operations and missions issued by General Schwarzkopf to his commanders, reflected a grasp and understanding of joint, operational and tactical doctrine which was to be fully endorsed in a conflict which saw the plan being executed virtually unchanged.

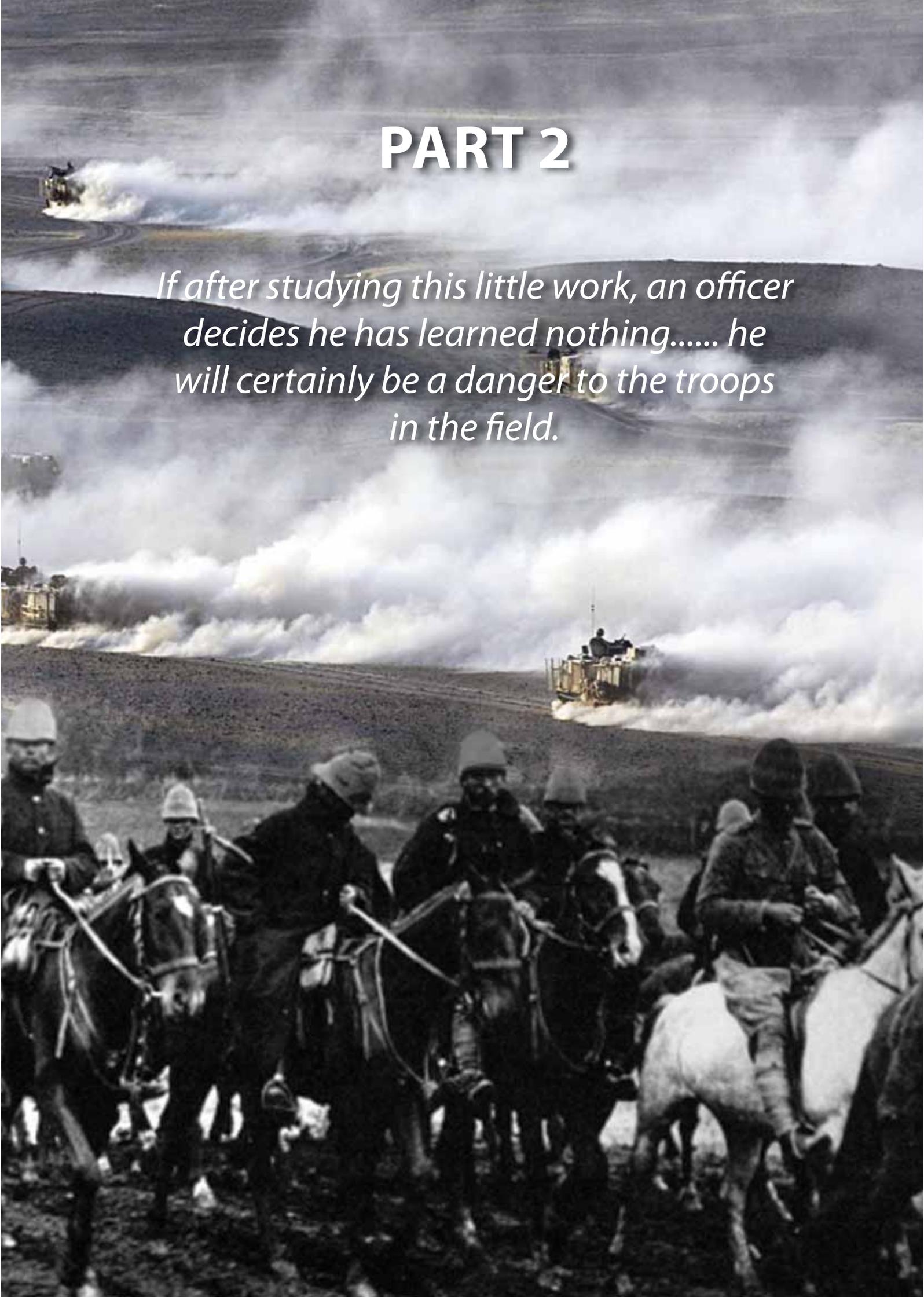
Drawn from Colonel R Baxter and Major K Jones, *Study Day Papers*, (Director General Development and Doctrine: January 1997).

ARMY DOCTRINE PRIMER



PART 2

If after studying this little work, an officer decides he has learned nothing..... he will certainly be a danger to the troops in the field.



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INTRODUCING THE DEFENCE OF DUFFER'S DRIFT

By Colonel S J Downey MBE

Of all life's endeavours, war and conflict are arguably the most demanding, the options for success the hardest to calculate and the cost of failure so telling. But in the face of the complexities of modern conflict, how does the soldier, the junior officer or the senior commander understand the real nature of the challenge he faces, the specifics of the threat, and the essence of an approach that will best deliver mission success? *In deciding what to do, where are the guides to his decisions and actions?*

It was Bismarck who suggested that it was better to learn from the mistakes of others than to learn from your own. While every circumstance is to an extent unique, no human activity occurs in a vacuum. Previous assumptions will have shaped the nature of the forces involved, previous decisions the equipment used, previous study the tactics at hand. Beyond these are the collected experiences of previous combatants, successful or otherwise, faced with circumstances partially similar. With a willingness to learn, the wise commander can use this past catalogue to his advantage, exploiting and interpreting lessons *where* relevant to inform his decisions and actions in the present.

Major General Sir Ernest Swinton's account of *The Defence of Duffer's Drift* makes this timeless point in fine style. A military classic, still widely read today, it was first published in the United Service Magazine in 1903. Written in the light of the British Army's painful learning experience of the Second Boer War (1899-1902), it was aimed at a British Officer Corps who knew first hand how British commanders and tactics had struggled to adapt to the mobile and often asymmetric operations of the Boers. Over 4 years of war and with 21,942 British deaths, the Boers had, in Rudyard Kipling's stern verdict, taught the British 'no end of a lesson'. But it had been a lesson slowly absorbed by an Army that lacked the rigor of honest self-examination and the discipline of a doctrine system that ruthlessly codified best practice. In entertaining and thought provoking style, Swinton makes the case for innovative thinking, the desire to learn from the past rather than be a prisoner of it and the constant need to adapt to the future. As a piece of work, *The*

Defence of Duffer's Drift, was in stark contrast to the staid field manuals of its day,¹ rooting its lessons in the context of what was then considered modern war. Aside from its historical interest, Swinton's theme is as applicable today and to every level of command.

The story recounts the 6 dreams of a young officer in command of a small detachment, charged with defending a river crossing (drift) in South Africa. In each of the 6 dreams, the protagonist (Lieutenant Backsight Forethought) is confronted by a repetition of the same tactical challenge, commencing the deployment from the same start point and with the same forces at his command. But in each dream he has the benefit of the principle lessons gained from the setbacks or failures of the previous dreams; in essence, an opportunity to learn from his own bitter experience without paying the actual price of military defeat or loss of life. By the sixth dream, in an approach that melds the best of his own hard won experiences, Backsight Forethought successfully achieves his mission and is finally ready to wake up, one last time, and commence the *actual* operation.

Clearly, no commander will ever be blessed with the opportunity, like Backsight Forethought, of personally trying out a military challenge 6 times before he gets it right, but there are a wealth of lessons to inform our decisions and actions; some may be from our own experience but others will be the lessons of others; lessons from training, lessons from operations, lessons accessible through wider reading and considered thought. These lessons have been carefully considered, judged to have relevance and wider applicability and collected in our body of doctrine. Some inform what we believe to be the enduring character of conflict, the Principles of War or the essence of success on operations, such as the manoeuvrist approach and mission command. Others are collected 'best practice' on the mechanics of war: tactics, techniques and procedures (TTPs) that illustrate how forces can be best employed; the concepts that guide their use; and the procedures to integrate and optimise their capabilities. These TTPs reflect the demands of current operations with its range of modern challenges from media scrutiny to legal constraints - a far cry from the comparative simplicity of operations on the South African veldt. All have been gleaned by hard won experience, the 'dreams' of many, codified so that as soldiers, commanders, an army and the armed forces, we continue to learn, to adapt and to succeed. Our duty as soldiers and commanders it to read it, to

¹ Michael Glover, *The Defence of Duffer's Drift*, (London: Leo Cooper, 1990).

consider it, to mature it and to apply it with intelligence and relevance; an unending task to master our profession and hone it to the challenges and circumstances of today and tomorrow.

It was this requirement that Field Marshal Wavell had in mind when, in 1944, he issued The Defence of Duffer's Drift to his regimental officers with a good humoured admonition that stands good today:

If after studying this little work, an officer decides that he has learned nothing, I can only recommend him to apply for employment in an administrative branch of the War Office; for he will certainly be a danger to troops in the field.

THE DEFENCE OF DUFFER'S DRIFT

By Captain E D Swinton DSO

What Would You Do?



Lieutenant Backsight Forethought (BF to his friends) has been left in command of a 50 man reinforced platoon to hold Duffer's Drift, the only ford on the Silliasvogel River available to wheeled traffic. Here is his chance for fame and glory. He has passed his officers courses and special qualifications. "Now if they had given me a job," says BF, "like fighting the Battle of Waterloo, I knew all about that, as I had crammed it up..." While BF's task appears simple enough, the Boer enemy causes a multitude of problems, but you, smart reader, with a quick mind and sharp intellect will, no doubt, solve the problem before the first shot is fired.

Background Information (The Boer War)

The Boers (Dutch for farmer) first settled in what is now Cape Province, South Africa in 1652. After Great Britain annexed this territory in 1806, many of the Boers departed on the 'Great Trek' and created the Republic of Natal, the Orange Free State, and the Transvaal. Gradual commercial control by the British and discovery of gold and diamonds, among other things, served to create hostility between the Boers and British, resulting in the South African War or Boer War from 1899 to 1902. The Boers initially outnumbered the British and were well equipped, scoring impressive victories in the areas adjacent to their territories. Even though the Boer armies finally surrendered, apparent victory for the British was retarded by extensive and co-ordinated guerrilla warfare. The war was finally ended by the systematic destruction of the Boer guerrilla units and hostilities were terminated by the Treaty of Vereeniging in May 1902. The Boer territories were annexed by Great Britain and were organised into the Union of South Africa 8 years later.

Preface

It was our own fault, and our very grave fault, and now we must turn it to use. We have 40 million reasons for failure, but not a single excuse.

Kipling

This tale of a dream is dedicated to the 'gilded Popinjays' and 'hired assassins' of the British nation, especially those who are now knocking at the door, to wit the very junior. It embodies some recollections of things actually done and undone in South Africa, 1899-1902. It is hoped that its fantastic guise may really help to emphasise the necessity for the practical application of some very old principles, and assist to an appreciation of what may happen when they are not applied, even on small operations. This practical application has often been lost sight of in the stress of the moment, with dire results, quite unrealized until the horrible instant of actual experience. Should this tale, by arousing the imagination, assist to prevent in the future even one such case of disregard of principles, it will not have been written in vain. The dreams are not anticipations, but merely a record of petty experiences against one kind of enemy in one kind of country only, with certain deductions based thereupon. But from these, given the conditions, it is not difficult to deduce the variations suitable for other countries, or for those occasions when a different foe with different methods of fighting and different weapons has to be met. BF.

Prologue

Upon an evening after a long and tiring trek, I arrived at Dreamdorp. The local atmosphere, combined with a heavy meal, is responsible for the following nightmare, consisting of a series of dreams. To make the sequence of the whole intelligible, it is necessary to explain that though the scene of each vision was the same, by some curious mental process I had no recollection of the place whatsoever. In each dream the locality was totally new to me, and I had an entirely fresh detachment. Thus, I had not the great advantage of working over familiar ground. One thing, and one only, was carried on from dream to dream, and that was the vivid recollection of the general lessons previously learnt. These finally produced success. The whole series of dreams, however, remained in my memory as a connected whole when I awoke.

First Dream

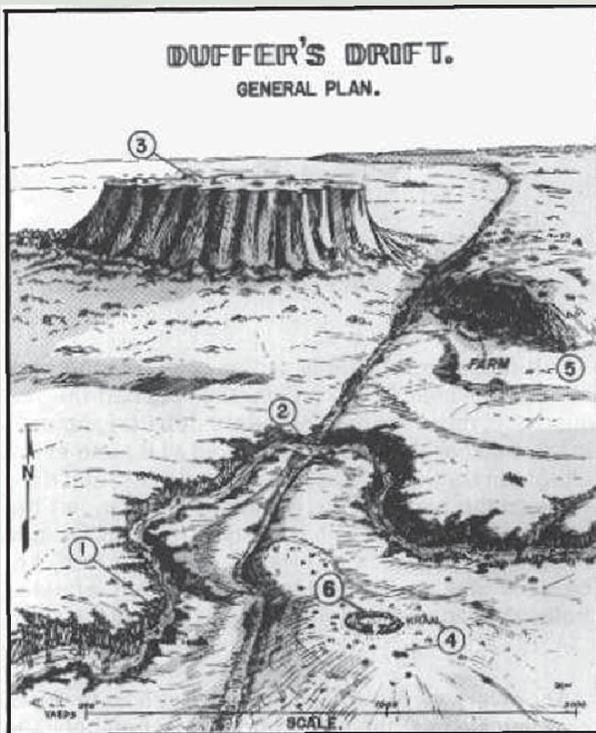
Any fool can get into a hole.

Old Chinese Proverb.

If left to you, for defence make spades.

Bridge Maxim.

I felt lonely, and not a little sad, as I stood on the bank of the river near Duffer's Drift and watched the red dust haze, raised by the southward departing column in the distance, turn slowly into gold as it hung in the afternoon sunlight. It was just 3 o'clock, and here I was on the banks of the Silliaasvogel river, left behind by my column with a party of 50 NCOs and men to hold the drift. It was an important ford, because it was the only one across which wheeled traffic could pass for some miles up or down the river.



Map 1

- | | |
|---------------------------|-------------------|
| (1) SILLIAASVOGEL RIVER | (2) DRIFT |
| (3) REGRET TABLE MOUNTAIN | (4) WASCHOUT HILL |
| (5) INCIDENTAMBIA | (6) KRAAL |

The river was a sluggish stream, not now in flood, crawling along at the very bottom of its bed between steep banks which were almost vertical, or at any rate too steep for wagons anywhere except at the drift itself. The banks from the river edge to their tops and some distance outwards, were covered with dense thorn and other bushes, which formed a screen impenetrable to the sight. They were also broken by small ravines and holes, where the earth had been eaten away by the river when in flood, and were consequently very rough.

Some 2000 odd meters north of the drift was a flat-topped, rocky mountain, and about a mile to the north-east appeared

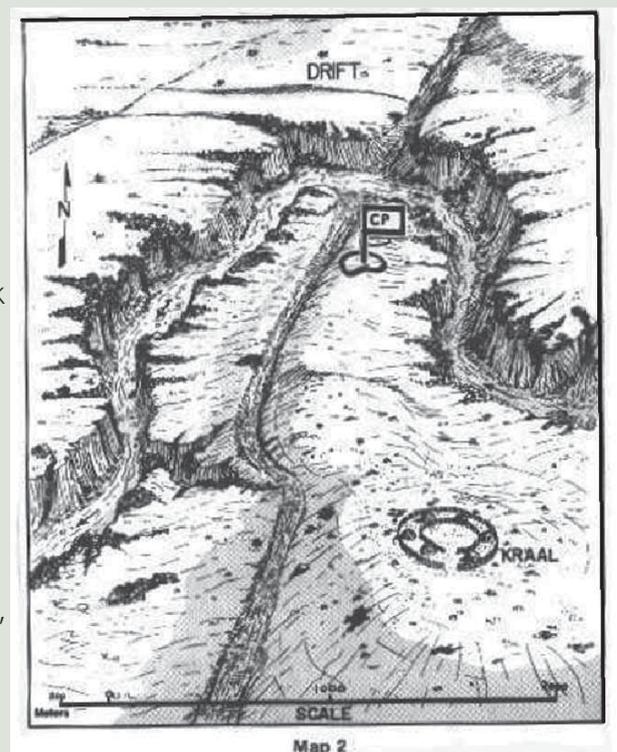
the usual sugarloaf kopje, covered with bushes and boulders steep on the south, but gently falling to the north; this had a farm on the near side of it. About 1000 meters south of the drift was a convex and smooth hill, somewhat like an inverted basin, sparsely sown with small boulders, and with a Kaffir kraal, consisting of a few grass mud huts

on top. Between the river and the hills on the north the ground consisted of open and almost level veld; on the south bank the veld was more undulating, and equally open. The whole place was covered with ant-hills. My orders were to hold Duffer's Drift at all costs. I should probably be visited by some column within 3 or 4 days time. I might possibly be attacked before that time, but this was very unlikely, as no enemy were known to be within a hundred miles.

The enemy had guns. It all seemed plain enough, except that the true inwardness of the last piece of information did not strike me at the time. Though in company with 50 'good men and true,' it certainly made me feel somewhat lonely and marooned to be left out there comparatively alone on the boundless veld; but the chance of an attack filled me, and I am quite sure, my men, with martial ardour. At last here was the chance I had so often longed for. This was my first 'show,' my first independent command, and I was determined to carry out my order to the bitter end. I was young and inexperienced, it is true, but I had passed all my examinations with fair success; my men were a good willing lot, with the traditions of a glorious regiment to uphold, and would, I knew, do all I should require of them. We were also well supplied with ammunition and rations and had a number of picks, shovels, and sandbags, etc., which I confess had been rather forced on me.

As I turned towards my gallant little detachment, visions of a bloody and desperate fight crossed my mind a fight to the last cartridge, and then an appeal to cold steel, with ultimate victory and-but a discreet cough at my elbow brought me back to realities, and warned me that my colour-sergeant was waiting for orders.

After a moment's consideration, I decided to pitch my small camp on a spot just south of the drift, because it was slightly rising ground, which I knew should be chosen for a camp whenever possible. It was, moreover, quite



close to the drift, which was also in its favour, for, as every one knows, if you are told to guard anything, you mount a guard quite close to it, and place a sentry, if possible, standing on top of it. The place I picked out also had the river circling round 3 sides of it in a regular horse-shoe bend, which formed a kind of ditch, or, as the book says, 'a natural obstacle.' I was indeed lucky to have such an ideal place close at hand; nothing could have been more suitable.

I came to the conclusion that, as the enemy were not within a hundred miles, there would be no need to place the camp in a state of defence till the following day. Besides, the men were tired after their long trek, and it would be quite as much as they could do comfortably to arrange nice and shipshape all the stores and tools, which had been dumped down anyhow in a heap, pitch the camp, and get their teas before dark.

Between you and me, I was really relieved to be able to put off my defensive measures till the morrow, because I was a wee bit puzzled as to what to do. In fact, the more I thought, the more puzzled I grew. The only 'measures of defence' I could recall for the moment were, how to tie 'a thumb or overhand knot,' and how long it takes to cut down an apple tree of six inches diameter. Unluckily neither of these useful facts seemed quite to apply. Now, if they had given me a job like fighting the battle of Waterloo, or Sedan, or Bull Run, I knew all about that, as I had crammed it up and been examined in it too. I also knew how to take up a position for a division, or even an army corps, but the stupid little subaltern's game of the defence of a drift with a small detachment was, curiously enough, most perplexing. I had never really considered such a thing. However, in the light of my habitual dealings with army corps, it would, no doubt, be child's-play after a little thought.

Having issued my immediate orders accordingly, I decided to explore the neighbourhood, but was for a moment puzzled as to which direction I should take; for, having no horse, I could not possibly get all round before dark. After a little thought, it flashed across my mind that obviously I should go to the north. The bulk of the enemy being away to the north, that of course must be the front. I knew naturally that there must be a front, because in all the schemes I had to prepare, or the exams I had undergone, there was always a front, or - 'the place where the enemies come from.' How often, also, had I not had trouble in getting out of a dull sentry which his 'front' and what

his 'beat' was. The north, then, being my front, the east and west were my flanks, where there might possibly be enemies, and the south was my rear, where naturally there were none.

I settled these knotty points to my satisfaction, and off I trudged, with my field-glasses, and, of course, my Kodak, directing my steps towards the gleaming white walls of the little Dutch farm, nestling under the kopje to the north-east. It was quite a snug little farm for South Africa, and was surrounded by blue gums and fruit trees. About a quarter of a mile from the farm I was met by the owner, Mr. Andreas Brink, a tame or surrendered Boer farmer, and his two sons, Piet and Gert. Such a nice man too, with a pleasant face and long beard. He would insist on calling me 'Captain,' and as any correction might have confused him, I did not think it worth while to make any, and after all I wasn't so very far from my 'company.' The 3 of them positively bristled with dog's-eared and dirty passes from every Provost Marshal in South Africa, and these they insisted on showing me. I had not thought of asking for them, and was much impressed; to have so many they must be special men. They escorted me to the farm, where the good wife and several daughters met us, and gave me a drink of milk, which was most acceptable after my long and dusty trek. The whole family appeared either to speak or to understand English, and we had a very friendly chat, during the course of which I gathered that there were no Boer commandos anywhere within miles, that the whole family cordially hoped that there never would be again, and that Brink was really a most loyal Briton, and had been much against the war, but had been forced to go on a commando with his 2 sons. Their loyalty was evident, because there was an oleograph of the Queen on the wall, and one of the numerous flappers was playing our National Anthem on the harmonium as I entered.

The farmer and the boys took a great interest in all my personal gear, especially a brand-new pair of the latest-pattern field-glasses, which they tried with much delight, and many exclamations of 'Allermachtig.' They evidently appreciated them extremely, but could not imagine any use for my Kodak in war-time, even after I had taken a family group. Funny, simple fellows! They asked and got permission from me to sell milk, eggs and butter in the camp, and I strolled on my way, congratulating myself on the good turn I was thus able to do myself and detachment, none of whom had even smelt such luxuries for weeks.

After an uneventful round, I directed my steps back towards the thin blue threads of smoke, rising vertically in the still air, which alone showed the position of my little post, and as I walked the peacefulness of the whole scene impressed me. The landscape lay bathed in the warm light of the setting sun, whose parting rays tinged most strongly the various heights within view, and the hush of approaching evening was only broken by the distant lowing of oxen, and by the indistinct and cheerful camp noises, which gradually grew louder as I approached. I strolled along in quite a pleasant frame of mind, meditating over the rather curious names which Mr. Brink had given me for the surrounding features of the landscape. The kopje above his farm was called Incidentamba, the flat-topped mountain some 2 miles to the north was called *Regret Table Mountain*, and the gently rising hill close to the drift on the south of the river they called *Waschout Hill*. Everything was going on well, and the men were at their teas when I got back. The nice Dutchman with his apostolic face and the lanky Piet and Gert were already there, surrounded by a swarm of men, to whom they were selling their wares at exorbitant rates. The 3 of them strolled about the camp, showing great interest in everything, asking most intelligent questions about the British forces and the general position of affairs and seemed really relieved to have a strong British post near. They did not even take offence when some of the rougher men called them 'blasted Dutchmen,' and refused to converse with them, or buy their 'skoff.' About dusk they left, with many promises to return with a fresh supply on the morrow.

After writing out my orders for next day, one of which was for digging some trenches round the camp, an operation which I knew my men, as becomes good British soldiers, disliked very much, and regarded as fatigues. I saw the 2 guards mounted, one at the drift, and the other some little way down the river, each furnishing one sentry on the river bank.

When all had turned in, and the camp was quite silent, it was almost comforting to hear the half-hourly cry of the sentries. "Number one-all is well!; Number two-all is well!" By this sound I was able to locate them, and knew they were at their proper posts. On-going round sentries about midnight, I was pleased to find that they were both alert, and that, as it was a cold night, each guard had built a bonfire silhouetted in the cheerful blaze of which stood the sentry-a clear-cut monument to all around that here was a British sentry fully on the *qui-vive*. After impressing them with their orders, the extent

of their 'beat,' and the direction of their 'front,' etc., I turned in. The fires they had built, besides being a comfort to themselves, were also useful to me, because twice during the night when I looked out I could, without leaving my tent, plainly see them at their posts. I finally fell asleep, and dreamt of being decorated with a crossbelt made of VCs and DSOs, and of wearing red tabs all down my back.

I was suddenly awoken, about the grey of dawn, by a hoarse cry, "Halt! who goes. . . ." cut short by the unmistakable 'plipplop' of a Mauser rifle. Before I was off my valise, the reports of Mausers rang round the camp from every side, these, mingled with the smack of the bullets as they hit the ground and stripped, the 'zipzip' of the leaden hail through the tents, and the curses and groans of men who were hit as they lay or stumbled about trying to get out, made a hellish din. There was some wild shooting in return from my men, but it was all over in a moment, and as I managed to wriggle out of my tent the whole place was swarming with bearded men, shooting into the heaving canvas. At that moment I must have been clubbed on the head for I knew no more until I found myself seated on an empty case having my head, which was dripping with blood, tied up by one of my men.

Our losses were 10 men killed, including both sentries, and 21 wounded; the Boers' had one killed and 2 wounded.

Later on, as, at the order of the not ill-natured but very frowzy Boer commandant, I was gloomily taking off the saucy warm spotted waistcoat knitted for me by my sister, I noticed our friends of the previous evening in very animated and friendly conversation with the burghers, and 'Pappa' was, curiously enough, carrying a rifle and bandolier and my new field-glasses. He was laughing and pointing towards something lying on the ground, through which he finally put his foot. This, to my horror, I recognized as my unhappy camera. Here, I suppose, my mind must have slightly wandered, for I found myself repeating some Latin lines, once my favourite imposition, but forgotten since my school-days - "*Timeo Danaos et dona ferentes*" - when suddenly the voice of the field cornet broke into my musing with "Your breeches too, captain." Trekking all that day on foot, sockless, and in the boots of another, I had much to think of besides my throbbing head. The sight of the long Boer convoy with guns, which had succeeded so easily in

crossing the drift I was to have held, was a continual reminder of my failure and of my responsibility for the dreadful losses to my poor detachment. I gradually gathered from the Boers what I had already partly guessed, namely, that they had been fetched and guided all round our camp by friend Brink, had surrounded it in the dark, crawling about in the bush on the river bank, and had carefully marked down our 2 poor sentries. These they had at once shot on the alarm being given, and had then rushed the camp from the dense cover on 3 sides. Towards evening my head got worse, and its rhythmic throbbing seemed gradually to take a meaning, and hammered out the following lessons, the result of much pondering on my failure:

1. Do not put off taking your measures of defence till the morrow, as these are more important than the comfort of your men or the shipshape arrangement of your camp. Choose the position of your camp mainly with reference to your defence.
2. Do not in war-time show stray men of the enemy's breed all over your camp, be they never so kind and full of butter, and do not be hypnotised, by numerous 'passes,' at once to confide in them.
3. Do not let your sentries advertise their position to the whole world, including the enemy, by standing in the full glare of a fire, and making much noise every half-hour.
4. Do not, if avoidable, be in tents when bullets are ripping through them; at such times a hole in the ground is worth many tents.

After these lessons had been dinned into my soul millions and millions of times, so that I could never forget them, a strange thing came to pass-there was a kaleidoscopic change – I had another dream.

Second Dream

*And what did ye look they should compass?
Warcraft learnt in a breath,
Knowledge unto occasion
at the first far view of Death?*

Kipling

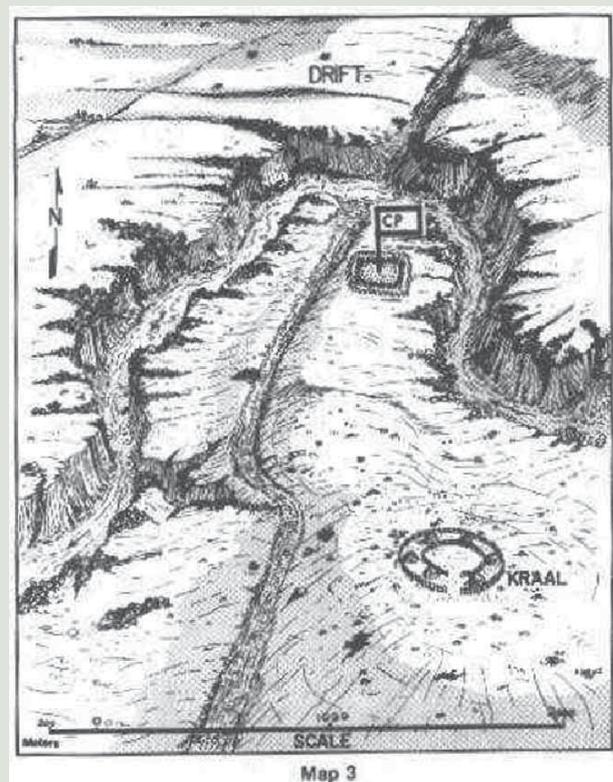
I suddenly found myself dumped down at Duffer's Drift with the same orders as already detailed, and an equal detachment composed of entirely different men. As before, and on every subsequent occasion, I had ample stores, ammunition, and tools. My position was precisely similar to my former one, with this important exception, running through my brain were 4 lessons.

As soon as I received my orders, therefore, I began to make out my plan of operations without wasting any time over the landscape, the setting sun, or the departing column, which, having off-loaded all our stores, soon vanished. I was determined to carry out all the lessons I had learnt as well as I knew how.

To prevent any strangers, friendly or otherwise, from coming into my position and spying out the elaborate defences I was going to make, I sent out at once 2 examining posts of one NCO and 3 men each, one to the top of Waschout Hill, and the other some 1000 metres out on the veld to the north of the drift. Their orders were to watch the surrounding country, and give the alarm in the event of the approach of any body of men whatever (Boers were, of course, improbable, but still just possible), and also to stop any individuals, friendly or not, from coming anywhere near camp and to shoot at once on noncompliance with the order to halt.

If the newcomers had any provisions to sell, these were to be sent in with a list by one of the guard, who would return with the money, but the strangers were not to be allowed nearer the camp on any account.

Having thus arranged a safeguard against spies, I proceeded to choose a camping ground. I chose the site already described in my former dream, and for the same reasons, which still appealed to me. So long as I was entrenched, it appeared the best place around. We started making our trenches as soon as I had marked off a nice squarish little



enclosure which would about contain our small camp. Though, of course, the north was the front, I thought, having a camp, it would be best to have an all-round defence as a sort of obstacle. The majority of the men were told to dig, which they did not relish, a few being detailed to pitch camp and prepare tea. As the length of trench was rather great for the available number of diggers, and the soil was hard, we were only able by dark, by which time the men were quite done up by their hard day, to make quite a low parapet and shallow trench. Still we were 'entrenched,' which was the great thing, and the trench was all round our camp, so we were well-prepared, even should we be attacked during the night or early next morning, which was quite unlikely.

During this time one or 2 strangers had approached the guard of the north from a farm under Incidentamba. As they had eggs and butter, etc., to sell, these were brought in as arranged for. The man sent in with the stuff reported that the elder of the Dutchmen was a most pleasant man, and had sent me a present of a pat of butter and some eggs, with his compliments, and would I allow him to come in and speak to me? However, not being such a fool as to allow him in my defences, I went out instead, in case he had any information. His only information was that there were no Boers anywhere near. He was an old man, but though he had a museum of 'passes,' I was not to be chloroformed by them into confidence. As he seemed friendly, and possibly loyal, I walked part of the way back to his farm with him, in order to look around. At dark the 2 examining posts came in, and 2 guards were mounted close by the object I was to watch, namely, the drift, at the same places as in my previous dream. This time, however, there was no half-hourly shouting, nor were there any fires, and the sentries had orders not to challenge but to shoot any person they might see outside camp at once. They were placed standing down the river bank, just high enough to see over the top, and were thus not unnecessarily exposed. Teas had been eaten, and all fires put out at dusk, and after dark all turned in, but in the trenches instead of in tents. After going round sentries to see everything snug for the night, I lay down myself with a sense of having done my duty, and neglected no possible precaution for our safety.

Just before dawn much the same happened as already described in my first dream, except that the ball was started by a shot without challenge from one of our sentries at something moving among the bush, which resulted in close-range fire opening up to us from all sides. This time we were not rushed, but a perfect hail of bullets whistled in from

every direction from in front of each trench, and over and through our parapet. It was sufficient to put a hand or head up to have a dozen bullets through and all round it, and the strange part was, we saw no one. As the detachment wag plaintively remarked, we could have seen lots of Boers, 'if it wasn't for the bushes in between.'

After vainly trying until bright daylight to see the enemy in order to do some damage in return, so many men were hit, and the position seemed so utterly hopeless, that I had to hoist the white flag. We had by then 24 men killed and 6 wounded. As soon as the white flag went up the Boers ceased firing at once, and stood up; every bush and ant-hill up to 100 metres range seemed to have hid a Boer behind it. This close range explained the marvellous accuracy of their shooting, and the great proportion of our killed (who were nearly all shot through the head) to our wounded.

As we were collecting ourselves preparatory to marching off there were one or 2 things which struck me; one was that the Dutchman who had presented me with eggs and butter was in earnest confabulation with the Boer commandant, who was calling him 'Oom' most affectionately. I also noticed that all male Kaffirs from the neighbouring kraal had been fetched and impressed to assist in getting the Boer guns and wagons across the drift and to load up our captured gear, and generally do odd and dirty jobs. These same Kaffirs did their work with amazing alacrity, and looked as if they enjoyed it; there was no 'back chat' when an order was given - usually by friend 'Oom.'

Again, as I trudged with blistered feet that livelong day, did I think over my failure. It seemed so strange, I had done all I knew, and yet, here we were, ignominiously captured, 24 of us killed, and the Boers over the drift. "Ah, BF, my boy," I thought, "there must be a few more lessons to be learnt besides those you already know." In order to find out what these were, I pondered deeply over the details of the fight.

The Boers must have known of our position, but how had they managed to get close up all round within snap shooting range without being discovered? What a tremendous advantage they had gained in shooting from among the bushes on the bank, where they could not be seen, over us who had to show up over a parapet every time we looked for an enemy, and show up, moreover, just in the very place where every Boer expected us to. There seemed to be some fault in the position. How the bullets seemed

sometimes to come through the parapet, and how those that passed over one side hit the men defending the other side in the back. How, on the whole, that 'natural obstacle,' the river-bed, seemed to be more of a disadvantage than a protection.

Eventually the following lessons framed themselves in my head - some of them quite new, some of them supplementing those 4 I had already learnt:

5. With modern rifles, to guard a drift or locality does not necessitate sitting on top of it (as if it could be picked up and carried away), unless the locality is suitable to hold for other and defensive reasons. It may even be much better to take up your defensive position some way from the spot, and so away from concealed ground, which enables the enemy to crawl up to very close range, concealed and unperceived, and to fire from cover which hides them even when shooting. It would be better, if possible, to have the enemy in the open, or to have what is called a clear 'field of fire.' A non-bullet-proof parapet or shelter which is visible serves merely to attract bullets instead of keeping them out - the proof of thickness can be easily and practically tested. When fired at by an enemy at close range from nearly all round, a low parapet and shallow trench are not of much use, as what bullets do not hit the defenders on one side hit those on another.
6. It is not enough to keep strange men of the enemy's breed away from your actual defences, letting them go free to warn their friends of your existence and whereabouts - even though they should not be under temptation to impart any knowledge they may have obtained. 'Another way,' as the cookery book says, more economical in lives, would be as follows: Gather and warmly greet a sufficiency of strangers. Stuff well with chestnuts as to the large force about to join you in a few hours; garnish with corroborative detail, and season according to taste with whiskey or tobacco. This will very likely be sufficient for the nearest commando. Probable cost - some heavy and glib lying, but no lives will be expended.
7. It is not business to allow lazy men (even though they be brothers and neutrals) to sit and pick their teeth outside their kraals whilst tired soldiers are breaking their hearts trying to do heavy labour in short time. It is more the duty of a soldier to

teach the lazy neutral the dignity of labour, and by keeping him under guard to prevent his going away to talk about it.

By the time the above lessons had been well burnt into my brain, beyond all chance of forgetfulness, a strange thing happened. I had a fresh dream.

Third Dream

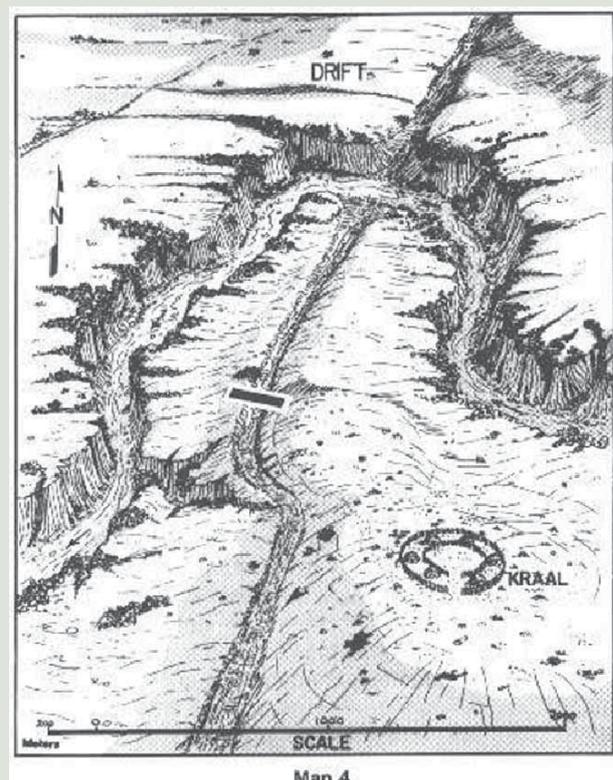
So when we take tea with a few guns, o'course you will know what to do - hoo! hoo!

Kipling

I was at Duffer's Drift on a similar sunny afternoon and under precisely similar conditions, except that I now had 7 lessons running through my mind.

I at once sent out 2 patrols, each of one NCO and 3 men, one to the north and one to the south. They were to visit all neighbouring farms and kraals and bring in all able-bodied Dutch men and boys and male Kaffirs, by persuasion if possible, but by force if necessary. This would prevent the news of our arrival being carried round to any adjacent commandos, and would also assist to solve the labour question. A small guard was mounted on the top of Waschout Hill as a look-out.

I decided that as the drift could not get up and run away, it was not necessary to take up my post or position quite close to it, especially as such a position would be under close rifle fire from the river bank, to which the approaches were quite concealed, and which gave excellent cover. The very worst place for such a position seemed to be anywhere within the horseshoe bend of the river, as this would allow an enemy practically to surround it. My choice therefore fell on a spot to which the ground gently



rose from the river bank, some 700 to 800 metres south of the drift. Here I arranged to dig a trench roughly facing the front (north), which thus would have about 800 metres clear ground on its front. We started to make a trench about 50 metres long for my 50 men, according to the usual rule.

Some little time after beginning, the patrols came in, having collected 3 Dutchmen and 2 boys, and about 13 Kaffirs. The former, the leader of whom seemed a man of education and some importance, were at first inclined to protest when they were given tools to dig trenches for themselves, showed bundles of 'passes,' and talked very big about complaining to the general, and even as to a question in the 'House' about our brutality. This momentarily staggered me, as I could not help wondering what might happen to poor BF if the member for Upper Tooting should raise the point; but Westminster was far away, and I hardened my heart. Finally they had the humour to see the force of the argument, that it was, after all, necessary for their own health, should the post be attacked, as they would otherwise be out in the open veld.

The Kaffirs served as a welcome relief to my men as they got tired. They also dug a separate hole for themselves on one side of and behind our trench, in a small ravine.

By evening we had quite a decent trench dug - the parapet was 2 feet 6 inches thick at the top, and was quite bulletproof, as I tested it. Our trench was not all in one straight line, but in 2 portions, broken back at a slight angle, so as to get a more divergent fire (rather cunning of me), though each half was of course as straight as I could get it.

It was astonishing what difficulty I had to get the men to dig in a nice straight line. I was particular as to this point, because I once heard a certain captain severely 'told off' at manoeuvres by a very senior officer for having his trenches 'out of dressing.' No one could tell whether some 'brass hat' might not come round and inspect us next day, so it was as well to be prepared for anything.

At dusk the guard on Waschout Hill, for whom a trench had also been dug, was relieved and increased to 6 men, and after teas and giving out the orders for the next day, we all 'turned in' in our trenches. The tents were not pitched, as we were not going to occupy them, and it was no good merely showing up our position. A guard was mounted over

our prisoners, or rather 'guests,' and furnished one sentry to watch over them.

Before falling asleep I ran over my 7 lessons, and it seemed to me I had left nothing undone which could possibly help towards success. We were entrenched, had a good bulletproof defence, all our rations and ammunition close at hand in the trenches, and water bottles filled. It was with a contented feeling of having done everything right and of being quite 'the little white-haired boy,' that I gradually dozed off.

Next morning dawned brightly and uneventfully, and we had about an hour's work improving details of our trenches before breakfasts were ready. Just as breakfast was over, the sentry on Waschout Hill reported a cloud of dust away to the north, by Regret Table Mountain. This was caused by a large party of mounted men with wheeled transport of some sort. They were most probably the enemy, and seemed to be trekking in all innocence of our presence for the drift.

What a 'scoop' I thought, if they come on quite unsuspecting, and cross the drift in a lump without discerning our position. I shall lie low, let the advanced party go past without a shot, and wait until the main body gets over the side within close range, and then open magazine fire into the thick of them. Yes, it will be just when they reach that broken ant-hill about 400 metres away that I shall give the word "Fire!"

However, it was not to be. After a short time the enemy halted, apparently for consideration. The advanced men seemed to have a consultation, and then gradually approached Incidentamba farm with much caution. 2 or 3 women ran out and waved, whereupon these men galloped up to the farm at once. What passed, of course, we could not tell, but evidently the women gave information as to our arrival and position, because the effect was electrical. The advanced Boers split up into 2 main parties, one riding towards the river a long way to the east, and another going similarly to the west. One man galloped back with the information obtained to the main body, which became all bustle, and started off with their wagons behind Incidentamba, when they were lost to sight. Of course, they were all well out of range, and as we were quite ready, the only thing to do was to wait till they came out in the open within range, and then to shoot them down. The minutes seemed to crawl - 5, then 10 minutes passed with no further sign of the enemy. Suddenly, "Beg pardon, sir; I think I see something on top of that kopje on the

fur side yonder." One of the men drew my attention to a few specks which looked like wagons moving about on the flattish shoulder of Incidentamba. Whilst I was focusing my glasses there was a 'boom' from the hill, followed by a sharp report and a puff of smoke up in the air quite close by, then the sound as of heavy rain pattering down some 200 feet in front of the trench, each drop raising its own little cloud of dust. This, of course, called forth the time-honoured remarks of "What ho, she bumps!" and "Now we shan't be long," which proved only too true. I was aghast, I had quite forgotten the possibility of guns being used against me, though, had I remembered their existence, I do not know, with my then knowledge, what difference it would have made to my defensive measures. As there was some little uneasiness among my men, I, quite cheerfully in the security of our nice trench with the thick bulletproof parapet, at once shouted out, "It's all right, men; keep under cover, and they can't touch us." A moment later there was a second boom, the shell whistled over our heads, and the hillside some way behind the trench was spattered with bullets.

By this time we were crouching as close as possible to the parapet, which, though it had seemed only quite a short time before so complete, now suddenly felt most woefully inadequate, with those beastly shells dropping their bullets down from the sky. Another boom. This time the shell burst well, and the whole ground in front of the trench was covered with bullets, one man being hit. At this moment rifle fire began on Waschout Hill, but no bullets came our way. Almost immediately another shot followed which showered bullets all over us; a few more men were hit, whose groans were unpleasant to listen to. Tools were seized, and men began frantically to try and dig themselves deeper into the hard earth, as our trench seemed to give no more protection from the dropping bullets than a saucer would from a storm of rain - but it was too late. We could not sink into the earth fast enough. The Boers had got the range of the trench to a nicety, and the shells burst over us now with a horrible methodic precision. Several men were hit, and there was no reason why the enemy should cease to rain shrapnel over us until we were all killed. As we were absolutely powerless to do anything, I put up the white flag. All I could do was to thank Providence that the enemy had no quick-firing field guns or, though 'we had not been long,' we should have been blotted out before we could have hoisted it.

As soon as the gunfire ceased, I was greatly surprised to find that no party of Boers came down from their artillery position on Incidentamba to take our surrender, but within 3 minutes some 50 Boers galloped up from the river bank on the east and the west, and a few more came up from the south round Waschout Hill. The guard on Waschout Hill, which had done a certain amount of damage to the enemy, had 2 men wounded by rifle fire. Not a single shell had come near them, though they were close to the Kaffir huts, which were plain enough.

What an anti-climax the reality had been from the pleasurable anticipations of the early morn, when I had first sighted the Boers.

Of course, the women on the farm had betrayed us, but it was difficult to make out why the Boers had at first halted and begun to be suspicious before they had seen the women at the farm. What could they have discovered? I failed entirely to solve this mystery. During the day's trek the following lessons slowly evolved themselves, and were stored in my mind in addition to those already learnt:

8. When collecting the friendly stranger and his sons in order to prevent their taking information to the enemy of your existence and whereabouts, if you are wishful for a 'surprise packet,' do not forget also to gather his wife and his daughter, his manservant and his maidservant (who also have tongues), and his ox and his ass (which may possibly serve the enemy). Of course, if they are very numerous or very far off, this is impossible; only do not then hope to surprise the enemy.
9. Do not forget that, if guns are going to be used against you, a shallow trench with a low parapet some way from it is worse than useless, even though the parapet be bulletproof ten times over. The trench gives the gunners an object to lay on, and gives no protection from shrapnel. Against well-aimed long-range artillery fire it would be better to scatter the defenders in the open hidden in grass and bushes, or behind stones or ant hills, than to keep them huddled in such a trench. With your men scattered around, you can safely let the enemy fill your trench to the brim with shrapnel bullets.

10. Though to stop a shrapnel bullet much less actual thickness of earth is necessary than to stop a rifle bullet, yet this earth must be in the right place. For protection you must be able to get right close under cover. As narrow a trench as possible, with the sides and inside of the parapet as steep as they will stand, will give you the best chance. To hollow out the bottom of the trench sides to give extra room will be even better, because the open top of the trench can be kept the less wide. The more like a mere slit the open top of the trench is, the fewer the shrapnel bullets will get in.

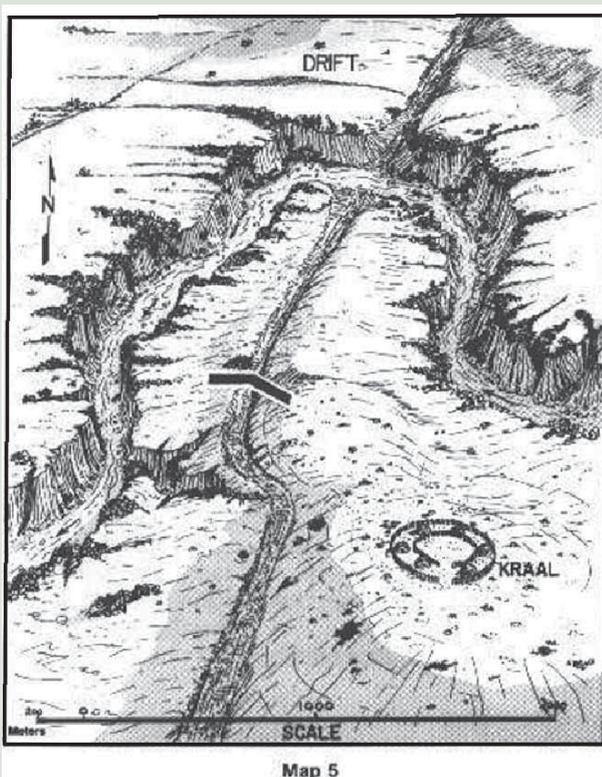
While chewing over these lessons learnt from bitter experience, I had yet another dream.

Fourth Dream

O was some power the gittie gie us, To see oursels as others see us!

Burns

Again did I find myself facing the same problem, this time with 10 lessons to guide me. I started off by sending our patrols as described in my last dream, but their orders were slightly different. All human beings were to be brought into our post, and any animals which could be of use to the enemy were to be shot, as we had no place for them.



For my defensive post I chose the position already described in my last dream, which seemed very suitable, for the reasons already given. We consequently dug a trench similar in plan to that already described, but, as I feared the possibility of guns being used against us, it was of a very different section. In plan it faced north generally, and was slightly broken forward to the front, each half being quite straight. In section it was about 3 feet 6 inches deep, with a parapet about 12 inches high in front of it; we made the trench as narrow as possible at the top compatible with free movement. Each man hollowed out the

under part of the trench to suit himself, and made his own portion of the parapet to suit his height. The parapet was about 2 feet 6 inches thick at the top and quite steep inside, being built up of pieces of broken ant-hill, which were nearly as hard as stone.

The patrols returned shortly with their bag of a few men, women and children. The women indulged in much useless abuse, and refused to obey orders, taking the matter less philosophically than their mankind. Here was evidently an opportunity of making use of the short training I had once had as an *Aide-de-Camp*. I tried it. I treated the ladies with tons of 'tact' in my suavest manner, and repeated the only Dutch words of comfort I knew "Wacht een beetje" - "Al zal rech kom" - but to no purpose. They had not been brought up to appreciate tact; in fact, they were not taking any. I turned regretfully round to the colour-sergeant, winked solemnly and officially, and seeing an answering but respectful quiver in his left eyelid, said:

"Colour-sergeant."

"Sir?"

"Which do you think is the best way of setting alight to a farm?"

"Well, sir, some prefer the large bedstead and straw, but I think the 'armonium and a little kerosene in one corner is as neat as anything."

There was no need for more. The ladies quite understood this sort of tact; the trouble was over.

The Dutchmen and Kaffirs were at once started digging shelters for themselves and the women and children. The latter were placed together, and were put into a small ravine not far from the trench, as it was necessary to place them in a really deep trench, firstly to keep them safe, and secondly to prevent their waving or signalling to the enemy. The existence of this ravine, therefore, saved much digging, as it only required some hollowing out at the bottom and a little excavation to suit admirably.

All dug with a will, and by night the shelters for the women and children, men prisoners, and the firing trench, were nearly done. All arrangements for the guards and sentries were the same as those described in the last dream, and after seeing everything was all correct and the ladies provided with tents to crawl under (they had their own blankets), I went to sleep with a feeling of well-earned security.

At daybreak next morning, as there were no signs of any enemy, we continued to improve our trench, altering the depth and alignment where necessary, each man suiting the size of the trench to his own legs. In the end the trench looked quite neat – ‘almost as nice as mother makes it,’ with the fresh red earth contrasting with the yellow of the veld. As one of my reservists remarked, it only wanted an edging of oyster shells or ginger beer bottles to be like his little broccoli patch at home. Upon these important details and breakfast a good 2 hours had been spent, when a force was reported to the north in the same position as described in the previous dream. It advanced in the same manner, except, of course, the advanced men were met by no one at the farm. When I saw this, I could not help patting myself on the back and smiling at the Dutch ladies in the pit, who only scowled at me in return, and (whisper) spat!

The advanced party of the enemy came on, scouting carefully and stalking the farm as they came. As they appeared quite unwarned, I was wondering if I should be able to surprise them, all innocent of our presence, with a close-range volley, and then magazine fire into their midst, when suddenly one man stopped and the others gathered round him. This was when they were some 1800 metres away, about on a level with the end of Incidentamba. They had evidently seen something and sniffed danger, for there was a short palaver and much pointing. A messenger then galloped back to the main body, which turned off behind Incidentamba with its wagons, etc. A small number, including a man on a white horse, rode off in a vague way to the west. The object of this move I could not quite see. They appeared to have a vehicle with them of some sort. The advanced party split up as already described. As all were still at long range, we could only wait.

Very shortly ‘boom’ went a gun from the top of Incidentamba, and a shrapnel shell burst not far from us. A second and third followed, after which they soon picked up our range exactly, and the shell began to burst all about us; however, we were quite snug and happy in our nice deep trench, where we contentedly crouched. The waste of good and valuable shrapnel shell by the enemy was the cause of much amusement to the men, who were in great spirits, and, as one of them remarked, were “as cosy as cockroaches in a crack.” At the expenditure of many shells only 2 men were hit in the legs.

After a time the guns ceased fire, and we at once manned the parapet and stood up to

repel an attack, but we could see no Boers though the air began at once to whistle and hum with bullets. Nearly all these seemed to come from the riverbank in front, to the north and northeast, and kept the parapet one continual spurt of dust as they smacked into it. All we could do was to fire by sound at various likely bushes on the riverbank, and this we did with the greatest possible diligence, but no visible results.

In about a quarter of an hour, we had had 5 men shot through the head, the most exposed part. The mere raising of a head to fire seemed to be absolutely fatal, as it had on a former occasion when we were attempting to fire at close range over a parapet against the enemy concealed. I saw 2 poor fellows trying to build up a pitiful little kind of house of cards with stones and pieces of ant-hill through which to fire. This was as conspicuous as a chimney-pot on top of the parapet, and was at once shot to powder before they had even used it, but not before it had suggested to me the remedy for this state of affairs. Of course, we wanted in such a case 'head cover' and 'loopholes.' As usual, I was wise after the event, for we had no chance of making them then, even had we not been otherwise busy. Suddenly the noise of firing became much more intense, but with the smack of the bullets striking the earth all round quite close it was not easy to tell from which direction this fresh firing came. At the same time the men seemed to be dropping much oftener, and I was impressing them with the necessity of keeping up a brisker fire to the front, when I noticed a bullet hit our side of the parapet. It then became clear, the enemy must evidently have got into the donga behind us (to which I had paid no attention, as it was to the rear), and were shooting us in the back as we stood up to our parapet.

This, I thought, must be what is called being 'taken in reverse,' and it was.

By the time I had gathered what was happening, about a dozen more men had been bowled over. I then ordered the whole lot to take cover in the trench, and only to pop up to take a shot to the front or rear. But no more could be done by us towards the rear than to the front. The conditions were the same-no Boers to be seen. At this moment 2 of the guard from Waschout Hill started to run in to our trench, and a terrific fusillade was opened on to them, the bullets kicking up the dust all round them as they ran. One poor fellow was dropped, but the other managed to reach our trench and fall into it. He too was badly hit, but just had the strength to gasp out that except himself and the man

who started with him, all the guard on Waschout Hill had been killed or wounded and that the Boers were gradually working their way up to the top. This was indeed cheering.

So hot was the fire now that no one could raise his head above ground without being shot, and by crouching down altogether and not attempting to aim, but merely firing our rifles over the edge of the trench, we remained for a short time without casualties. This respite, however, was short, for the men in the right half of the trench began to drop unaccountably whilst they were sitting well under cover, and not exposing themselves at all. I gradually discovered the cause of this. Some snipers must have reached the top of Waschout Hill, and were shooting straight down our right half trench. As the bullets snicked in thicker and thicker, it was plain the number of snipers was being increased.

This, I thought, must be being 'enfiladed from a flank.' It was so.

Without any order, we had all instinctively vacated the right half of our trench and crowded into the left half, which by great good luck could not be enfiladed from any point on the south side of the river, nor indeed by rifle-fire from anywhere, as, owing to the ground, its prolongation on the right was up above ground for some 3000 metres away on the veld on the north bank.

Though we were huddled together quite helpless like rats in a trap, still it was in a small degree comforting to think that, short of charging, the enemy could do nothing. For that we fixed bayonets and grimly waited. If they did make an assault, we had bayonets, and they had not, and we could sell our lives very dearly in a rough-and-tumble.

Alas! I was again deceived. There was to be no chance of close quarters and cold steel, for suddenly we heard, far away out on the veld to the north, a sound as of someone beating a tin tray, and a covey of little shells whistled into the ground close by the trench; 2 of these burst on touching the ground. Right out of rifle-range, away on the open veld on the north, I saw a party of Boers, with a white horse and a vehicle. Then I knew. But how had they managed to hit off so well the right spot to go to enfilade our trench before they even knew where we were?

Pom-pom-pom-pom-pom again, and the little steel devils ploughed their way into the

middle of us in our shell-trap, mangling 7 men. I at once diagnosed the position with great professional acumen; we were now enfiladed from both flanks, but the knowledge was acquired too late to help us, for "We lay bare as the paunch of the purser's sow, to the hail of the Nordenfeldt." This was the last straw; there was nothing left but surrender or entire annihilation at long range. I surrendered.

Boers, as usual, sprang up from all round. We had fought for 3 hours, and had 25 killed and 17 wounded. Of these, 7 only had been hit by the shrapnel and rifle-fire from the front. All the rest had been killed or hit from the flanks, where there should be few enemies, or the rear, where there should be none! This fact convinced me that my preconceived notions as to the front, and its danger relative to the other points of the compass, needed considerable modification. All my cherished ideas were being ruthlessly swept away, and I was plunged into a sea of doubt, groping for something certain or fixed to lay hold of. Could Longfellow, when he wrote that immortal line, "Things are not what they seem," ever have been in my position?

The survivors were naturally a little disheartened at their total discomfiture, when all had started so well with them in their 'crack.' This expressed itself in different ways. As one man said to a corporal, who was plugging a hole in his ear with a bit of rag - "Something sickening, I call it, this enfilading racket; you never know which way it will take yer. I'm fairly fed up." To which the gloomy reply, "Enfiladed? Of course we've been enfiladed. This 'ere trench should have been wiggled about a bit, and then there would not have been quite so much of it. Yes, wiggled about - that's what it should have been." To which chipped in a third, "Yes, and something to keep the blighters from shooting us in the back wouldn't ave done us much arm, anyway."

There were evidently more things in earth than I had hitherto dreamt of in my philosophy!

As we trekked away to the north under a detached guard of Boers, many little points such as the above sank into my soul, but I could not for some time solve the mystery of why we had not succeeded in surprising the enemy. There were no men, women, children or Kaffirs who, knowing of our arrival, could have warned them. How did they spot our presence so soon, as they evidently must have done when they stopped and

consulted in the morning? It was not until passing Incidentamba, as I casually happened to look round and survey the scene of the fight from the enemy's point of view, that I discovered the simple answer to the riddle. There on the smooth yellow slope of the veld just south of the drift was a brownish-red streak, as conspicuous as the Long Man of Wilmington on the dear old Sussex downs, which positively shrieked aloud, "Hi! Hi! Hi!-- this way for the British defence." I then grimly smiled to think of myself sitting like a 'slick Alick' in that poster of a trench and expecting to surprise anybody!

Besides having been enfiladed and also taken in reverse, we had again found ourselves at a disadvantage as compared with the concealed enemy shooting at close range, from having to show up at a fixed place in order to fire. Eventually I collected the following lessons:

11. For a small isolated post and an active enemy, there are no flanks, no rear, or, to put it otherwise, it is front all round.
12. Beware of being taken in reverse; take care, when placing and making your defences, that when you are engaged in shooting the enemy to the front of your trench, his pal cannot sneak up and shoot you in the back.
13. Beware of being enfiladed. It is nasty from one flank - far worse from both flanks. Remember, also, that though you may arrange matters so that you cannot be enfiladed by rifle fire, yet you may be open to it from long range, by means of gun or pompom fire. There are few straight trenches that cannot be enfiladed from somewhere, if the enemy can only get there. You can sometimes avoid being enfiladed by so placing your trench that no one can get into prolongation of it to fire down it, or you can 'wiggle' it about in many ways, so that it is not straight, or make 'traverses' across it, or dig separate trenches for every 2 or 3 men.
14. Do not have your trench near rising ground over which you cannot see, and which you cannot hold.
15. Do not huddle all your men together in a small trench like sheep in a pen. Give them air.

16. As once before - cover from sight is of often worth more than cover from bullets. For close shooting from a non-concealed trench, head cover with loopholes is an advantage. This should be bulletproof and not be conspicuously on the top of the parapet, so as to draw fire, or it will be far more dangerous than having none.
17. To surprise the enemy is a great advantage.
18. If you wish to obtain this advantage, conceal your position. Though for promotion it may be sound to advertise your position, for defence it is not.
19. To test the concealment or otherwise of your position, look at it from the enemy's point of view.

Fifth Dream

*Jack Frost looked forth one still clear night,
And he said, `Now I shall be out of sight;
So over the valley and over the height,
In silence I'll take my way.*

Gould

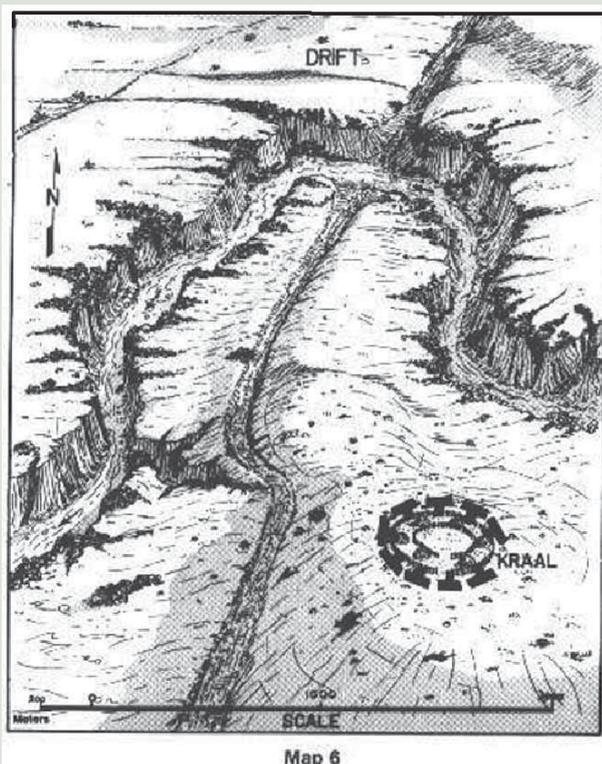
Again I faced the same task with a fresh mind and fresh hopes, all that remained with me of my former attempts being 19 lessons.

Having detailed the 2 patrols and the guard on Waschout Hill as already described, I spent some 20 minutes - while the stores, etc., were being arranged - in walking about to choose a position to hold in the light of my 19 lessons.

I came to the conclusion that it was not any good being near the top of a hill and yet not at the top. I would make my post on the top of Waschout Hill, where I could not be overlooked from any place within rifle range, and where I should, I believed, have 'command.' I was not quite certain what 'command' meant, but I knew it was important - it says so in the book, besides, in all the manoeuvres I had attended and tactical schemes I had seen, the 'defence' always held a position on top of a hill or ridge. My duty was plain: Waschout Hill seemed the only place which did not contravene any of

the 19 lessons I had learnt, and up it I walked. As I stood near one of the huts, I got an excellent view of the drift and its southern approach just over the bulge of the hill, and a clear view of the river further east and west. I thought at first I would demolish the few grass and matting huts which, with some empty kerosene tins and heaps of bones and debris, formed the Kaffir kraal; but on consideration I decided to play cunning, and that this same innocent-looking Kaffir kraal would materially assist me to hide my defences. I made out my plan of operations in detail, and we had soon conveyed all our stores up to the top of the hill, and started work.

Upon the return of the patrols with their prisoners, the Dutchmen and 'boys' were told off to dig for themselves and their females. The Kaffirs of the kraal we had impressed to assist at once.



My arrangements were as follows: all round the huts on the hilltop and close to them, we dug some 10 short lengths of deep-firing trenches, curved in plan, and each long enough to hold 5 men. These trenches had extremely low parapets, really only serving as rifle rests, some of the excavated earth being heaped up behind the trenches to the height of a foot or so, the remainder being dealt with as described later. In most cases the parapets were provided with grooves to fire through at ground-level, the parapet on each side being high enough to just protect the head. As with the background the men's heads

were not really visible, it was unnecessary to provide proper loopholes, which would have necessitated also the use of new sandbags, which would be rather conspicuous and troublesome to conceal. When the men using these trenches were firing, their heads would be just above the level of the ground. Once these firing trenches were well under way, the communication trenches were started. These were to be narrow and deep, leading from one trench to the next, and also leading from each trench back to 4 of the

huts, which were to be arranged as follows, to allow men to fire standing up without being seen. Round the inside of the walls of these huts part of the excavated earth, of which there was ample, would be built up with sandbags, pieces of anthill, stones, etc., to a height that a man can fire over, about 4 and a half feet, and to a thickness of some 2 and a half feet at the top, and loopholes, which would be quite invisible, cut through the hut sides above this parapet. There was room in each hut for 3 men to fire. In 3 of them I meant to place my best shots, to act as snipers, as they would have a more favourable position than the men in the trenches below, and the fourth was a conning-tower for myself. All the tents and stores were stacked inside one of the huts out of sight.

That evening, in spite of the hardness of the work, which caused much grouching among my men, we had got the firing trenches complete, but the others were not finished - they were only half the necessary depth. The earth walls inside the huts were also not quite completed. The Kaffirs and Dutch had deep pits, as before, in 3 of the huts. Ammunition and rations were distributed round the trenches the last thing before we turned in. I also had all water bottles and every vessel that would hold water, such as empty tins, Kaffir gourds, and cooking pots, filled and distributed in case of a long and protracted fight. Having issued orders as to the necessity for the greatest secrecy in not giving away our position should Boers turn up early next morning, I went to sleep with confidence. We had, anyhow, a very good position, and though our communications were not perfect quite, these we could soon improve if we had any time to ourselves the next morning.

Next morning broke; no enemy in sight. This was excellent, and before daylight we were hard at it, finishing the work still undone. By this time the men had fully entered into the spirit of the thing, and were quite keen on surprising Brother Boer if possible. While the digging was proceeding, the 'dixies' were being boiled for the breakfasts inside 4 grass screens, some of which we found lying about, so as to show nothing but some very natural smoke above the kraal. I picked out one or 2 of my smartest NCOs, and instructed them to walk down the hill in different directions to the riverbank and try if they could see the heads of the men in the firing trenches against the sky. If so, the heaps of earth, tins, bones, grass, screens, etc., should be rearranged so as to give a background to every man's head.

To review the place generally, I and my orderly walked off some half-mile to the north

of the river. As we were going some distance, we doffed our helmets and wrapped ourselves in 2 beautiful orange and magenta striped blankets, borrowed from our Kaffir lady guests, in case any stray Boer should be lurking around, as he might be interested to see 2 'khakis' wandering about on the veld. It was awkward trying to walk with our rifles hidden under our blankets, and, moreover, every 2 minutes we had to look round to see if the sentry at the camp had signalled any enemy in sight. This was to be done by raising a pole on the highest hut. The result of our work was splendid. We saw a Kaffir kraal on a hill, and to us 'it was nothing more.' There were the heaps of debris usually round a kraal, looking most natural, but no heads were visible, and no trenches. There was only one fault, and that was that a few thoughtless men began, as we looked, to spread their brown army blankets out in the sun on top of the huts and on the veld. To the veriest new chum these square blots, like squares of brown sticking-plaster all around the kraal, would have betokened something unusual. To remedy this before it was too late I hastened back.

After we had done our breakfasts, and some 3 hours after dawn, the sentry in one of the huts reported a force to the north. We could do nothing but wait and hope; everything was ready, and every man knew what to do. No head was to be raised nor a rifle fired until I whistled from conning-tower; then every man would pop up and empty his magazine into any of the enemy in range. If we were shelled, the men in the huts could at once drop into the deep trenches and be safe. Standing in my conning-tower, from the loopholes of which I could see the drift, I thought over the possibilities before us.

With great luck perhaps the Boer scouts would pass us on either side, and so allow us to lie low for the main body. With a view to seeing exactly how far I would let the latter come before opening fire, and to marking the exact spot when it would be best to give the word, I got down into the firing trenches facing the drift and the road south to see how matters appeared from the level of the rifles. To my intense horror, I found that from these trenches neither the drift nor the road on the near bank of the river, until it got a long way south of Waschout Hill, could be seen! The bulging convexity of the hill hid all this; it must be dead ground! It was. The very spot where I could best catch the enemy, where they must pass, was not under my fire! At most, the northern loopholes of the conning-tower and one other hut alone could give fire on the drift. How I cursed my stupidity! However, it was no-good. I could not now start digging fresh trenches

further down the hill; it would betray our whole position at once. I determined to make the best of it, and if we were not discovered by the scouts, to open fire on the main body when they were just on the other side of the river bunched up on the bank, waiting for those in front. Here we could fire on them; but it would be at a much longer range than I had intended. It was really a stroke of luck that I had discovered this serious fault, for otherwise we might have let the bulk of the enemy cross the drift without discovering the little fact of the dead ground till too late. I reflected, also (though it was not much consolation), that I had erred in good company, for how often had I not seen a 'brass-hat' ride along on horseback, and from that height, fix the exact position for trenches in which the rifles would be little above the ground. These trenches, however, had not been put to the test of actual use. My error was not going to escape the same way.

Meanwhile the enemy's scouts had advanced in much the same way as detailed before, except that after coming past Incidentamba Farm, they had not halted suspiciously, but came on in small groups or clumps. They crossed the river in several places and examined the bushy banks most carefully, but finding no 'khakis' there, they evidently expected none on the open veld beyond them, for they advanced 'anyway' without care. Several of the clumps joined together, and came on chatting in one body of some 30 men. Would they examine the kraal, or would they pass on? My heart pounded. The little hill we were on would, unluckily, be certain to prove an attraction for them, because it was an excellent vantage ground whence to scan the horizon to the south, and to signal back to the main body to the north. The kraal was also a suitable place to off-saddle for a few minutes while the main body came up to the drift, and it meant possibly a fire, and therefore a cup of coffee. They rode up towards it laughing, chatting and smoking quite unsuspectingly. We uttered no sound. Our Dutch and Kaffir guests uttered no sound either, for in their pits was a man with a rifle alongside them. At last they halted a moment some 250 metres away on the northeast, where the slope of the hill was more gradual and showed them all up. A few dismounted, the rest started again straight towards us. It was not magnificent, but it was war. I whistled.

About 10 of them succeeded in galloping off, also some loose horses; 5 or 6 of them on the ground threw up their hands and came into the post. On the ground there remained a mass of kicking horses and dead or groaning men. The other parties of scouts to east and west had at once galloped back to the river where they dismounted under cover

and began to pepper us. Anyway, we had done something.

As soon as our immediate enemy were disposed of, we opened fire on the main body some 1500 metres away, who had at once halted and opened out. To these we did a good deal of damage, causing great confusion, which was comforting to watch. The Boer in command of the main body must have gathered that the river-bed was clear, for he made a very bold move; he drove the whole of the wagons, etc., straight on as fast as possible over the odd 400 metres to the river and down the drift into the riverbed, where they were safe from our fire. Their losses must have been heavy over this short distance, for they had to abandon 2 of their wagons on the way to the river. This was done under cover of the fire from a large number of riflemen, who had at once galloped up to the river-bank, dismounted, and opened fire at us, and from 2 guns and a pompom, which had immediately been driven a short distance back and then outwards to the east and west. It was really the best thing he could have done, and if he had only known that we could not fire on the ground to the south of the drift, he might have come straight on with a rush.

We had so far scored; but now ensued a period of stalemate. We were being fired at from the riverbank on the north, and from ant-hills, etc., pretty well all round, and were also under the intermittent shellfire from the 2 guns. They made most excellent practise at the huts, which were soon knocked to bits, but not till they had well served their turn. Some of the new white sandbags from inside the huts were scattered out in full view of the enemy, and it was instructive to see what a splendid target they made, and how often they were hit. They must have drawn a lot of fire away from the actual trenches. Until the Boers discovered that they could advance south from the drift without being under rifle fire from our position, they were held up.

Would they discover it? As they had ridden all round us, by now, well out of range, they must know all about us and our isolation.

After dark, by which time we had one man killed and 2 wounded, the firing died away into a continuous but desultory rifle fire, with an occasional dropping shell from the guns. Under cover of dark, I tried to guard the drift and dead ground to the south of it, by making men stand up and fire at that level; but towards midnight I was forced to

withdraw them into the trenches, after several casualties, as the enemy then apparently woke up and kept up a furious rifle fire upon us for over an hour. During this time the guns went through some mysterious evolutions. At first we got it very hot from the north, where the guns had been all along. Then suddenly a gun was opened on us away from the southwest, and we were shelled for a short time from both sides. After a little while the shelling on the north ceased, and continued from the southwest only for 20 minutes. After this the guns ceased, and the rifle fire also gradually died away.

When day dawned not a living soul was to be seen; there were the dead men, horses, and the deserted wagons. I feared a trap, but gradually came to the conclusion the Boers had retired. After a little we discovered the riverbed was deserted as well, but the Boers had not retired. They had discovered the dead ground, and under the mutually supporting fire of their guns, which had kept us to our trenches, had all crossed the drift and trekked south!

True, we were not captured, and had very few losses, and had severely mauled the enemy, but they had crossed the drift. It must have evidently been of great importance to them to go on, or they would have attempted to capture us, as they were about 500 to our 50.

I had failed in my duty.

During the next few hours we buried the dead, tended the wounded, and took some well earned rest, and I had ample leisure to consider my failure and the causes. The lessons I derived from the fight were:

20. Beware of convex hills and dead ground. Especially take care to have some place where the enemy must come under your fire. Choose the exact position of your firing trenches, with your eye at the level of the men who will eventually use them.
21. A hill may not, after all, though it has 'command,' necessarily be the best place to hold.
22. A conspicuous 'bluff' trench may cause the enemy to waste much ammunition, and draw fire away from the actual defences.

In addition to these lessons, another little matter on my mind was what my colonel would say at my failure. Lying on my back, looking up at the sky, I was trying to get a few winks of sleep myself before we started to improve our defences against a possible further attack, but it was no use, sleep evaded me.

The clear blue vault of heaven was suddenly overcast by clouds which gradually assumed the frowning face of my colonel. "What? You mean to say, Mr. Forethought, the Boers have crossed?" But, luckily for me, before more could be said, the face began slowly to fade away like that of the Cheshire puss in 'Alice in Wonderland,' leaving nothing but the awful frown across the sky. This too finally dissolved, and the whole scene changed. I had another dream.

Sixth Dream

Sweet are the uses of adversity.

Anon

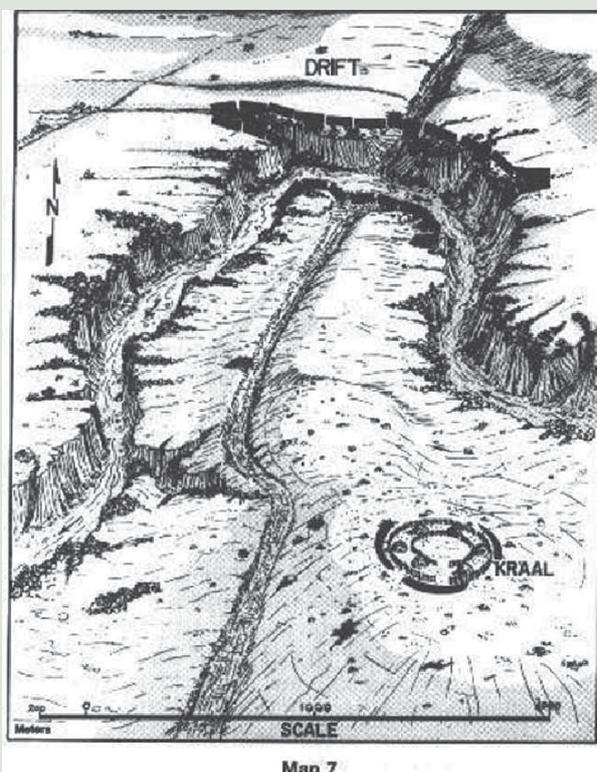
Once more was I fated to essay the task of defending Duffer's Drift. This time I had 22 lessons under my belt to help me out, and in the oblivion of my dream I was spared that sense of monotony which by now may possibly have overtaken you, 'gentle reader.'

After sending out the patrols, and placing a guard on Waschout Hill, as already described, and whilst the stores were being collected, I considered deeply what position I should take up, and walked up to the top of Waschout Hill to spy out the land. On the top I found a Kaffir kraal, which I saw would assist me much as concealment should I decide to hold this hill. This I was much inclined to do, but after a few minutes' trial of the shape of the ground, with the help of some men walking about down below, and my eyes a little above ground level, I found that its convexity was such that, to see and fire on the drift and the approach on the south side, I should have to abandon the top of the hill, and so the friendly concealment of the Kaffir huts, and take up a position on the open hillside some way down. This was, of course, quite feasible, especially if I held a position at the top of the hill as well, near the huts on the east and southeast sides; but, as it would be impossible to really conceal ourselves on the bare hillside, it meant giving up all idea of surprising the enemy, which I wished to do. I must, therefore, find some other place

which would lend itself to easy and good concealment, and also have the drift or its approaches under close rifle fire. But where to find such a place?

As I stood deep in thought, considering this knotty problem, an idea gently wormed itself into my mind, which I at once threw out again as being absurd and out of the question. This idea was to hold the riverbed and banks on each side of the drift! To give up all idea of command, and, instead of seeking the nearest high ground, which comes as natural to the student of tactics as rushing for a tree does to a squirrel, to take the lowest ground, even though it should be all among thick cover, instead of being nicely in the open.

No, it was absolutely revolutionary, and against every canon I had ever read or heard of; it was evidently the freak of a sorely tried and worried brain. I would have none of it, and I put it firmly from me. But the more I argued to myself the absurdity of it, the more this idea obtained possession of me. The more I said it was impossible, the more allurements were spread before me in its favour, until each of my conscientious objections was enmeshed and smothered in a network of spacious reasons as to the advantages of the proposal.



I resisted, I struggled, but finally fell to temptation, dressed up in the plausible guise of reason. I would hold the riverbed. The advantages I thus hoped to obtain were: perfect concealment and cover from sight; trenches and protection against both rifle and gunfire practically ready made; communications under good cover; the enemy would be out in the open veld except along the riverbank, where we, being in position first, would still have the advantage; plentiful water supply at hand.

True, there were a few dead animals near the drift, and the tainted air seemed to hang heavy over the riverbed, but the

carcasses could be quickly buried under the steep banks, and, after all, one could not expect every luxury.

As our clear field of fire, which in the north was only bounded by the range of our rifles, was on the south limited by Waschout Hill, a suitable position for the enemy to occupy, I decided to hold the top of it as well as the riverbed. All I could spare for this would be 2 NCOs and 8 men, who would be able to defend the south side of the hill, the north being under our fire from the riverbank.

Having detailed this party, I gave my instructions for the work, which was soon started. In about a couple of hours the patrols returned with their prisoners, which were dealt with as before.

For the post on Waschout Hill, the scheme was that the trenches should be concealed much in the same way as described in the last dream, but great care should be taken that no one in the post should be exposed to rifle fire from our main position in the river. I did not wish the fire of the main body to be in any degree hampered by a fear of hitting the men on Waschout Hill, especially at night. If we knew it was not possible to hit them, we could shoot freely all over the hill. This detachment was to have a double lot of water bottles, besides every available receptacle collected in the kraal, filled with water, in anticipation of a prolonged struggle.

The general idea for the main defensive position was to hold both sides of the river, improving the existing steep banks and ravines into rifle-pits to contain from one to 4 men. These could, with very little work, be made to give cover from all sides. As such a large amount of the work was already done for us, we were enabled to dig many more of these pits than the exact number required for our party. Pathways leading between these were to be cut into the bank, so that we should be able to shift about from one position to another. Besides the advantage this would give us in the way of moving about, according as we wished to fire, it also meant that we should probably be able to mislead the enemy as to our numbers-which, by such shifting tactics might, for a time at least, be much exaggerated. The pits for fire to the north and south were nearly all so placed as to allow the occupants to fire at ground level over the veld. They were placed well among the bushes, only just sufficient scrub being cut away to allow a man to see

all round, without exposing the position of his trench. On each side of the river, just by the drift, were some spoil heaps of earth, excavated from the road ramp. These stood some 5 or 6 feet above the general level, and were as rough as the banks in outline. These heaps were large enough to allow a few pits being made on them, which had the extra advantage of height. In some of the pits, to give head-cover, loopholes of sandbags were made, though in most cases this was not needed, owing to the concealment of the bushes. I found it was necessary to examine personally every loophole, and correct the numerous mistakes made in their construction. Some had the new clean sandbags exposed to full view, thus serving as mere whited sepulchres to their occupants, others were equally conspicuous from their absurd cock-shy appearance, others were not bulletproof, while others again would only allow of shooting in one direction, or into the ground at a few metres range, or up into the blue sky. As I corrected all these faults I thought that loopholes not made under supervision might prove rather a snare.

The result was, in the way of concealment, splendid. From these pits with our heads at ground level we could see quite clearly out on to the veld beyond, either from under the thicker part of the bushes or even through those which were close to our eyes. From the open, on the other hand, we were quite invisible, even from 300 metres distance, and would have been more so had we had the whiskers of the 'brethren'. It was quite evident to me that these same whiskers were a wise precaution of nature for this very purpose, and part of her universal scheme of protective mimicry.

The numerous small dongas and rifts lent themselves readily to flanking fire, and in many places the vertical banks required no cutting in order to give ideal protection against even artillery. In others, the sides of the crooked waterways had to be merely scooped out a little, or a shelf cut to stand upon.

In one of these deeper ravines 2 tents, which, being below ground level, were quite invisible, were pitched for the women and children, and small caves cut for them in case of a bombardment. The position extended for a length of some 150 metres on each side of the drift along both banks of the river, and at its extremities, where an attack was most to be feared, pits were dug down the riverbanks and across the dry riverbed. These also were concealed as well as possible. The flanks or ends were, of course, our greatest danger, for it was from here we might expect to be rushed, and not from the open veld.

I was undecided for some time as to whether to clear a field of fire along the river-banks or not, as I had no wish to give away our presence by any suspicious nudity of the banks at each end of our position. I finally decided, in order to prevent this, to clear the scrub for as great a range as possible from the ends of the position, everywhere below the ground level, and also on the level ground, except for a good fringe just on the edges of the banks. This fringe I thought would be sufficient to hide the clearance to any one not very close. I now blessed the man who had left us some cutting tools. While all this was being carried out, I paced out some ranges to the north and south, and these we marked by a few empty tins placed on ant-heaps, etc.

At dusk, when we had nearly all the pits finished and some of the clearance done, tents and gear were hidden, ammunition and rations distributed to all, and orders in case of an attack given out. As I could not be everywhere, I had to rely on the outlying groups of men fully understanding my aims beforehand, and acting on their own. To prevent our chance of a close-range volley into the enemy being spoilt by some over-zealous or jumpy man opening fire at long range, I gave orders that fire was to be held as long as possible, and that no man was to fire a shot until firing had already commenced elsewhere (which sounded rather Irish), or my whistle sounded. This was unless the enemy were so close to him that further silence was useless. Firing having once started, every man was to blaze away at any enemy within range as judged by our range marks. Finally we turned in to our pit for the night with some complacency, each 8 men furnishing their own sentry.

We had about 3 hours next morning before any enemy were reported from Waschout Hill (the prearranged signal for this was the raising of a pole from one of the huts). This time was employed in perfecting our defences in various ways. We managed to clear away the scrub in the dry riverbed and banks for some 200 metres beyond our line of pits on each side, and actually attained to the refinement of an 'obstacle'; for at the extremity of this clearance a sort of abatis entanglement was made with the wire from an adjacent fence which the men had discovered. During the morning I visited the post on Waschout Hill, found everything all correct, and took the opportunity of showing the detachment the exact limits of our position in the riverbed, and explained what we were going to do. After about 3 hours work, somebody in sight was signalled, and we soon after saw from our position a cloud of dust away to the north. This force, which

proved to be a commando, approached as already described in the last dream; all we could do meanwhile was to sit tight in concealment. Their scouts came in clumps of 2s and 3s which extended over some mile of front, the centre of the line heading for the drift. As the scouts got closer, the natural impulse to make for the easiest crossing place was obeyed by 2 or 3 of the parties on each side of the one approaching the drift, and they inclined inwards and joined forces with it. This was evidently the largest party we could hope to surprise, and we accordingly lay for it. When about 300 metres away, the brethren stopped rather suspiciously. This was too much for some man on the east side, who let fly, and the air was rent by the rattle as we emptied our magazines, killing 5 of this special scouting party and 2 from other groups further out on either side. We continued to fire at the scouts as they galloped back, dropping 2 more, and also at the column which was about a mile away, but afforded a splendid target till it opened out. In a very few moments our position was being shelled by 3 guns, but with the only result, as far we were concerned of having one man wounded by shell-fire, though the firing went on slowly till dark. To be accurate, I should say the river was being shelled, our position incidentally, for shells were bursting along the river for some half-mile. The Boers were evidently quite at sea as regards to the extent of our position and strength, and wasted many shells. We noticed much galloping of men away to the east and west, out of range, and guessed that these were parties who intended to strike the river at some distance away, and gradually work along the bed, in order probably to get into close range during the night.

We exchanged a few shots during the night along the riverbed, and not much was done on either side, though of course we were on the *qui vive* all the time; but it was not till near one in the morning that Waschout Hill had an inning.

As I had hoped, the fact that we held the kraal had not been spotted by the enemy, and a large body of them, crawling up the south side of the hill in order to get a good fire on to us in the river, struck a snag in the shape of a close-range volley from our detachment. As the night was not very dark, in the panic following the first volley our men were able (as I learnt afterwards) to stand right up and shoot at the surprised burghers bolting down the hill. However, their panic did not last long, to judge by the sound, for after the first volley from our Lee-Metfords and the subsequent minutes of independent firing, the reports of our rifles were soon mingled with the softer reports of the Mausers, and

we shortly observed flashes on our side of Waschout Hill. As these could not be our men, we knew the enemy was endeavouring to surround the detachment. We knew the ranges fairly well, and though, as we could not see our sights, the shooting was rather guesswork, we soon put a stop to this manoeuvre by firing a small volley from 3 or 4 rifles at each flash on the hillside. So the night passed without much incident.

During the dark we had taken the opportunity to cunningly place some new sandbags (which I had found among the stores) in full view at some little distance from our actual trenches and pits. Some men had even gone further, and added a helmet here and a coat there peeping over the top. This ruse had been postponed until our position was discovered, so as not to betray our presence, but after the fighting had begun no harm was done by it. Next morning it was quite a pleasure to see the very accurate shooting made by Brother at these sandbags, as betokened by the little spurts of dust. During this day the veld to the north and south was deserted by the enemy except at out-of-range distance, but a continuous sniping fire was kept up along the riverbanks on each side. The Boer guns were shifted - one to the top of Incidentamba and one to the east and west in order to enfilade the river bank but, owing to our good cover, we escaped with 2 killed and 3 wounded. The enemy did not shell quite such a length of river this time. I confidently expected an attack along the riverbank that night, and slightly strengthened my flanks, even at the risk of dangerously denuding the north bank. I was not disappointed.

Under cover of the dark, the enemy came up to within, perhaps, 600 metres of the open veld on the north and round the edges of Waschout Hill on the south, and kept up a furious fire, probably to distract our attention, whilst the guns shelled us for about an hour. As soon as the gunfire ceased they tried to rush us along the riverbed east and west, but, owing to the abates and the holes in the ground, and the fact that it was not a very dark night, they were unsuccessful. However, it was touch-and-go, and a few of the Boers did succeed in getting into our position, only to be bayoneted. Luckily the enemy did not know our strength, or rather our weakness, or they would have persisted in their attempt and succeeded; as it was, they must have lost 20 or 30 men killed and wounded.

Next morning, with so many men out of my original 40 out of action (not to include Waschout Hill, whose losses I did not know) matters seemed to be serious, and I was

greatly afraid that another night would be the end of us. I was pleased to see that the detachment on Waschout Hill had still got its tail well up, for they had hoisted a red rag at the masthead. True, this was not the national flag, probably only a mere handkerchief, but it was not white. The day wore on with intermittent shelling and sniping, and we all felt that the enemy must have by now guessed our weakness, and were saving themselves for another night attack, relying upon our being tired out. We did our best to snatch a little sleep by turns during the day, and I did all I could to keep the spirits of the little force up by saying that relief could not be very far off. But it was with a gloomy desperation at best that we saw the day wear on and morning turn into afternoon.

The Boer guns had not been firing for some 2 hours, and the silence was just beginning to get irritating and mysterious, when the booming of guns in the distance aroused us to the highest pitch of excitement. We were saved! We could not say what guns these were—they might be British or Boer but, anyway, it proved the neighbourhood of another force. All faces lighted up, for somehow the welcome sound at once drew the tired feeling out of us.

In order to prevent any chance of the fresh force missing our whereabouts, I collected a few men and at once started to fire some good old British volleys into the scrub, "Ready present fire!" which were not to be mistaken. Shortly afterwards we heard musketry in the distance, and saw a cloud of dust to the northeast. We were relieved!

Our total losses were 11 killed and 15 wounded; but we had held the drift, and so enabled a victory to be won. I need not here touch upon the well-known and far-reaching results of the holding of Duffer's Drift, of the prevention thereby of Boer guns, ammunition, and reinforcements reaching one of their sorely pressed forces at a critical moment, and the ensuing victory gained by our side. It is now, of course, public knowledge that this was the turning point in the war, though we, the humble instruments, did not know what vital results hung upon our action.

That evening the relieving force halted at the drift, and, after burying the dead, we spent some time examining the lairs of the Boer snipers, the men collecting bits of shell and cartridge cases as mementos—only to be thrown away at once. We found some 25 dead and partly buried Boers, to whom we gave burial.

That night I did not trek, but lay down (in my own breeches and spotted waistcoat). As the smoke from the prime cigar, presented to me by the Colonel, was eddying in spirals over my head, these gradually changed into clouds of rosy glory, and I heard brass bands in the distance playing a familiar air: 'See the Conquering Hero comes', it sounded like.

I felt a rap on my shoulder, and heard a gentle voice say, "Arise, Sir Backsight Forethought"; but in a trice my dream of bliss was shattered-the gentle voice changed into the well-known croak of my servant. "Time to pack your kit on the wagon, Sir. Corfy's been up some time now, Sir." I was still in stinking old Dreamdorp.

Glossary

Abatis: A barricade of felled trees with branches facing the enemy.

Ant Hill: A large cone-shaped mound of earth.

Boer: Descendents of Dutch Colonists in South Africa.

Donga: South African gully or ravine.

Drift: A ford, a shallow place in a stream or river that can be crossed by walking or riding on horseback.

Duffer: An incompetent, awkward or stupid person.

Kaffir: A fierce black tribe of South Africa (19th Century).

Kopje: A rocky hill or butte of South Africa usually 200 - 800 metres high.

Kraals: A village of South African natives surrounded by a stockade for protection.

Qui Vive: A sentry's challenge; "who goes there?"

Subaltern: A British officer holding a commission below that of captain.

Veld: A grassy plain of South Africa.

The Author

Major General Sir Ernest Swinton (1868-1951) joined the Royal Engineers in 1888. In the Boer War he won the DSO, was awarded the Queen's medal with 3 clasps, the King's Medal with 2 clasps and was mentioned in despatches. He is credited with the invention of the Tank, and was Colonel Commandant of the Royal Tank Corps from 1934 to 1938. He was Chichele Professor of Military History at Oxford University from 1925 to 1939.

CONFLICT ON LAND - A CONCEPTUAL DESCRIPTION OF THE LAND OPERATING ENVIRONMENT

By Brigadier A R D Sharpe OBE

This paper concentrates on the land environment (the principal operating space for the Army, Royal Marines, and RAF Regiment). It does so cognisant that Britain is an island nation with a history of the use of maritime power and a dependency on trade, but also that having NATO as a central pillar to its defence brings obligations and continental commitment; and that any land force that operates in the modern battlespace without dominance of the air does so at a marked disadvantage.

Introduction

History repeats itself.

Karl Marx

History does not repeat itself, but it sure does rhyme.

Mark Twain

1. **Aim.** The aim of this paper is to examine both the enduring nature and the changing character of conflict in the land environment, in order to provide a foundation from which deductions can be made about how UK land forces should be developed, manned, equipped and structured, and how they may be required to operate and fight.
2. **Structure and Evidence.** The paper combines a review of historical evidence alongside the Defence-agreed view of the changed and changing character of conflict. First, the fundamental distinction between the nature and character of conflict is made clear. Then deductions about the land environment, and the forces required to operate and fight there, are drawn from each, providing an enduring foundation and a relevant superstructure for force development.¹ At the centre of the evidence

¹ Definitions: the conflict environments are: maritime, land, air, space, information (including cyberspace) and electromagnetic. Operate means to engage in operations generally; fight means to engage in combat or to use force. The forces that operate in the Land environment, for the UK, include the British Army, the Royal Marines and the RAF Regiment.

base for the changing character of land operations is the MOD's Future Character of Conflict (FCOC) paper and its subsequent VCDS-led experiment.² FCOC drew on the MOD Global Strategic Trends Programme³ which in turn was based on comprehensive research. The base was widened around these core sources to include the Future Land Operating Concept (FLOC)⁴ and its Deductions Paper⁵ which made specific land-centric contributions, as the FCOC debate took place. Previous UK concepts and current doctrine for the land environment were also considered and comparisons were made with US and other allied versions.⁶ Policy sources were generally not referred to, in order to keep the analysis objective and unconstrained.

The Nature and Character of Conflict and the Land Environment

While the face of war may alter, some things have not changed since Joshua stood before Jericho and Xenophon marched to the sea.

George MacDonald Fraser

3. **Distinguishing Nature and Character.** The *nature* and the *character* of conflict are different things. Understanding this distinction is fundamental to designing forces capable of operating in the land environment. A land force must be structured and equipped both to deal with those elements of land conflict that are enduring and constant, and with those that are evolving or particular to current or future contexts. Planning and resource allocation must start somewhere, but breaking conflict down into constituent tasks, without understanding the distinction between its nature and character, leads to superficial binary choices and false dichotomies; for example, forcing a seminal choice between developing forces 'optimised for war-fighting' or 'geared for stabilisation'. While it makes eminent sense to structure and develop forces to cope

² Development, Concepts and Doctrine Centre (DCDC), Deductions from the FCOC Experiment, dated 16 April 2010.

³ DCDC, *Global Strategic Trends Out to 2040*, Fourth Edition, benchmarked 12 January 2010.

⁴ DCDC, *Future Land Operating Concept (FLOC)*, October 2008.

⁵ DCDC, *FLOC Deductions Paper*, July 2009.

⁶ DGD&D *Develop the Army of Tomorrow*, 28-29 September 2005. To ensure coherence with US thinking a wide number of current US publications were consulted, including: the US Joint Operating Environment; the US Army Capstone Concept and the developing US Army Operating Concept. Recent international experience (such as that of the Israeli Defence Force in 2006) has also been taken into account.

with the most likely threats, even in the most stringent of budgetary times these choices must not be made while ignoring the demands of the constant nature of war. There is no such thing as ‘the foreseeable future’, and history has also demonstrated, time and again, that armed forces that prepare themselves based solely on the requirements of the last or current conflict are repeatedly found wanting at the outset of the next. To be relevant, therefore, a force must be structured to cope with both the enduring nature and changing character of conflict.

4. **Combining Nature and Character.** It is conflict’s fundamental *nature* that provides the clearest point of reference when orchestrating policy and building the foundations for the development of a land force. On the other hand, what Clausewitz called conflict’s ‘subjective identity’ – the means by which it is undertaken – does change. While its nature endures, conflict is shaped by human experience, so that it also evolves. Human developments (such as technology, laws, social attitudes, philosophy, religion, inter-connectivity, and international relationships) will all cause the way that conflicts are prosecuted to change. This evolution is referred to as conflict’s changing *character*, and military forces must be capable of responding to such change. But we should beware of the delusion that change will make conflict less of its nature, or that we can change the nature-driven foundation on which we must build without risking the stability or utility of the whole. Those who study warfare, either academically or professionally, should beware of the temptation to identify the changing character of conflict and, labelling the facets of this new character as an aid to understanding and explanation, lose sight of the essential and enduring truths that will always out-live those transient fashion labels. Military forces should therefore be built on a balanced understanding, using a foundation of the constant and a superstructure designed to address current, and likely future, demands. The resulting combination will then be robust and agile enough to deal with the inevitable unpredictability of the land fight. The consequence of failure to get the balance right would be rapid reform, in contact, with the price invariably being paid by those on the front line.⁷

⁷ As was graphically demonstrated by the events in Lebanon in 2006. The 2010 RAND report on Military Capabilities for Hybrid War analysing Israel’s experiences in Lebanon in 2006 and Gaza in 2008 is as enlightening as it is instructional.

War has 2 components that endure: its nature (the objective) remains constant under all circumstances; while its character (the subjective) alters according to context.

Karl von Clausewitz

The Nature of Conflict

5. The nature of conflict is unchanging. It cannot change; otherwise, by definition, it would cease to be conflict. It is, in this context, a human activity, and therefore it is driven by human attitudes and states of mind, and it is subject to the strengths and frailties of human nature. War, which is the most intense form of conflict, is an inherently confrontational, volatile, dangerous and chaotic violent contest; it is a mixture of chance, risk, and reward; deliberate policy and unintended consequences. It concerns the confrontational friction between competing human interests and interest groups. It is an extension of politics and policy, and it exists in an inevitable and dynamic triangular relationship between people, governments and militaries. It causes uncertainty, exertion, friction, damage, shock and human stress, as well as casualties. Engagement in conflict is often less discretionary than expected, and this can drive its development; this can mean that, while war remains an extension of policy, policy often has to catch up with the unexpected turns of war.

6. Clausewitz, Sun Tzu, Machiavelli, Jomini, Thucydides et al remain as relevant today as they ever were. Provided they are seen in their historical context, enduring truths emerge from them. No surgeon would qualify without having a knowledge of Grey's Anatomy – no one responsibly pursuing the profession of arms should seek to ply his trade without a similar understanding of his profession's seminal and enduring works. Without an understanding of the enduring constants there is a temptation, as conflict evolves, to focus on what is different and new, and to forget or ignore what is timeless. This is particularly true of those who are most closely involved in an ongoing conflict, as it must be their priority to identify and resolve the problems of the current fight. This temptation must be resisted by those responsible for developing a force, or for the policies that underpin that force.

It is well that war is so terrible – otherwise we would grow too fond of it.

General Robert E Lee

7. Policy-makers, rightly, will normally seek to avoid conflict and, in particular, seek to avoid the use of military force to resolve conflict; but history demonstrates that involvement in conflict, and governments' decisions to use force, may be less 'discretionary' than policy-makers would wish. For example, against a background of a policy of appeasement, Britain was finally drawn into the World War II through treaty obligations with Poland. (NATO treaty obligations, arguably, give 21st century Britain a similar East European commitment.) The re-taking of the Falkland Islands in 1982 could be seen as the result of a discretionary decision, but it could equally be argued that it would have been political suicide for the Prime Minister had she decided not to act so robustly, giving her little actual 'discretion'. Britain's involvement in Afghanistan post-9/11 was equally 'discretionary' – but Britain would have needed very clear rationale not to support the US in the decision to act against al-Qaeda and the Afghan Taliban regime; thereafter, in 2006, alliance obligations drove our commitment to NATO expansion. Furthermore, an assumption that short-term light-scale commitments (such as the successful short-term intervention into Sierra Leone in 2000) will always follow the planned pattern is a dangerous assumption; as a contrast, the committal of a single battalion for 6 months to support the UN effort in Bosnia in 1992 peaked at divisional strength and endured for 15 years. In short, not only is the use of military force less discretionary than policy-makers would wish it to be, but discretionary decisions to use limited force for limited periods have a disconcerting habit of evolving into non-discretionary commitments to employ different force packages for more extended periods. This is not an argument against the use of military power, rather it is a caution against forming flawed assumptions based on the hoped-for, but often illusive, choices surrounding their use.

You may not be interested in war, but war is interested in you.

Leon Trotsky

The Nature of Conflict in the Land Environment

8. The land operating environment is defined as the terrain-based or ground area of operations, including the littoral seam and the lower airspace as they directly affect the ground. The main, but certainly not exclusive, operators in this environment are land forces and those operating in support of them (although it is important to take account of forces whose operations exclusively in other environments are designed to have effect on land).

9. This environment derives much of its enduring identity from the nature of conflict. It will always be a physically, physiologically and psychologically demanding, dangerous and harmful place in which human beings fight and survive. The nature of the land fight demands a particular underpinning ethos for those who operate within it. The nature of the environment in which they operate is derived from: terrain, climate, human dynamics, logistic complexity and the consequences of military action.

a. **Ethos.** The 3 armed forces, by necessity, each have a distinct ethos. In an army, and it is particularly true of the British Army, the ethos revolves around team cohesion and the placing of the welfare and wellbeing of the soldiers above those who lead them. While this is portrayed as (and has become) an ethos based on moral, ethical and principled grounds it is also based on pragmatic realities. In a land force the fighting soldier, the private soldier, will always be the capability – the ‘equipment’, the ‘tool’ – for doing the business of the force, be it moving among and reassuring a population under stress, or applying extreme physical violence. It makes clear pragmatic sense that those responsible (the NCOs and officers) ensure that that ‘capability’ is in the best working order possible – so it is rested, fed, properly equipped and with high morale. A failure to put the soldier first is therefore not only a failure in the ethical sense, but also one in the practical sense. Because soldiers are individuals with all of an individual’s concerns and complexities, and because a unity of action and purpose is essential in land operations, these individuals must be welded together with a strong sense of team spirit and common good.⁸ This produces an uneasy dynamic whereby land forces are both physically large assemblies and yet independently thinking and acting individuals at the same time. Each person is an individual manoeuvre unit, with individual instincts, perceptions, attitudes to risk and decision-making techniques. Forces therefore use structures and drills, to ensure unity of action from the simplest task (for example ensuring that they all move in the same direction) to the most complex. But they need to balance some prescription, with trust and experience, because military action on land cannot be choreographed in every

⁸ This ethos is, and must necessarily and rightly be, different from the ethos of services in the other environments: in an air force, for example, the key individuals, who are placed in harm’s way and upon whom the delivery of fighting effect depends, are normally the pilots and aircrew; and it is therefore right and proper that the ethos of this service should include a focus on the wellbeing and importance of the pilot and aircrew as the ‘fighting capability’.

detail and because 'no plan survives contact with the enemy'. Finally, military action in the land environment often involves human conflict at its most base and basic level, being 'up-close-and-personal', where the killing and destruction cannot be left behind: the sight, smell, noise and feel of injury and death, both delivered and received, are personally felt. Soldiers often see, at first hand, the immediate effects of the violence that they deliver. This requires an uneasy mix of robustness, compassion, ruthlessness and restraint. So, a land force ethos can be summarised as: soldiers (the capability) first; team spirit; individual action; recognised drills; and 'up close and personal'.

b. **Terrain.** The land environment is, and always has been, defined by terrain: open grassland, cultivated land, forests, mountains, deserts, jungles, rivers, swamps, villages, conurbations, shanty towns, slums, littoral regions – every kind of terrain has its own characteristics and therefore effects on land forces. Each creates its own constraints and freedoms, placing different demands on people and equipment. Both need to be capable of operating flexibly across this terrain. Terrain not only enables, but also blocks communication and movement; slowing it, but also providing cover for it. Technology helps to deal with terrain, shortening distances, enabling mobility and providing protection from its demands. Human beings can manipulate terrain by clearing it, obstructing it, or isolating and bypassing it. But ultimately they must engage personally with the physical world they inhabit: they have to see it, move through it, feel its texture, smell it, hear its sounds and experience the discomfort it causes. It takes very little for the trappings of technology to be stripped away, leaving the human being to survive, as part of the landscape and in primeval terms, using instinct, knowledge, endurance, cunning, camouflage and brute strength. By definition terrain – the land – will always be a defining feature of land operations and it will always have decisive effects on the planning and execution of land operations.

My campaign, led by General Winter, is just beginning.

Tsar Alexander I, 1812

Generals January and February will take care of the French and British.

Tsar Nicholas I, 1854

c. **Climate.** The demands of terrain are accentuated by climate (heat, cold and precipitation) and by the seasons. Climate degrades and enhances terrain,

sometimes changing it permanently. It affects visibility, going, speed of movement; and physical and virtual communication. Human beings are highly susceptible to the impacts of climate, physically and psychologically. Climate can isolate, debilitate and kill them. But it also sustains life, affords protection and provides opportunity. Climate interacts with terrain fundamentally to affect the operating environment, for example by redirecting rivers, cutting off mountain passes and flooding coastal plains. These effects can rarely be mitigated by technology and they need to be overridden by human will and endurance, or by a new plan. And, ultimately, climate can decide the outcome of campaigns.

People make war because of: fear, honour, and interest.

Thucydides

d. **Human Dynamics.** Thucydides' identification of what motivates humans remains valid, and their behaviour is naturally competitive and not always rational; so their actions can lead to unintended as well as intended consequences. Human beings seek to control, exploit and protect their environment. They will fight for, or migrate to, resources if necessary. The spread and development of populations alters terrain. Human beings are fundamentally innovative, always seeking explanations and solutions; capable of questioning everything, and driven by the pursuit of power, prosperity and progress, and by belief. These dynamics ultimately lead to confrontations and conflicts of varying degrees of intensity, including violent conflict. This conflict is indiscriminate in those who it involves – regardless of which of the basic instincts they follow: 'fight, freeze or flight'. It will inevitably lead to loss, damage and death. Because human beings live in the land environment, it is here that the effects of conflict – this fundamentally human activity – are most keenly seen and felt; and where many of the causes can be found and the resolutions sought.

Amateurs talk tactics, professionals talk logistics.

Omar Bradley

e. **Logistic Complexity.** Every individual person in the land environment is an independently moving demander of logistic effort. Land forces consume materiel which needs to be moved to them, often daily, and often in the most dangerous and demanding of circumstances, since they cannot easily disengage

themselves to be administered in logistic hubs. Casualties will almost always need to be recovered, under demanding conditions, from the point of wounding, and evacuated for treatment. Furthermore, when large land formations move within a battlespace they create physical trails across the landscape, like comets. These trails, if cut or closed off, quickly cause the moving formation either to halt, or to run short of supply, or both.

f. **The Consequences of Military Action.** Military involvement in conflict immediately changes its character. Land forces manoeuvre, and they seek to protect themselves by altering the landscape, or by hiding – sometimes away from the bystanders, and sometimes amongst them. They attack or defend themselves by using firepower, which may be direct or indirect; and by a range of physical and psychological devices. They use violence and non-violent means to break apart an opponent's cohesion or shatter his will, or to protect their own and those of their own population. These means can cause great damage, which may feed as well as resolve the causes of conflict. Land forces throughout history have usually operated among people, many of whom will not be participants in the conflict. How the resulting multiple interactions play out can have a decisive impact both on all those involved (either directly or indirectly) and on the outcome of the conflict. A wide variety of actions taking place concurrently and in close proximity to each other, with the effects of terrain, climate and the human dynamics, makes the land environment the most complex and challenging of them all. And, because war starts and finishes with politics, it is in the land environment that the consequences of all military action will ultimately be felt.

War (on land) moves in an atmosphere composed of danger, physical effort, uncertainty and chance. Everything in war is simple, but even the simplest of things is difficult, and these difficulties, largely unforeseen or unpredictable, accumulate and produce a friction, a retarding break on the absolute extension and discharge of violence. These difficulties consist of danger, bodily exertion, information or the lack of it, and innumerable other small and incalculable circumstances and uncertainties originated by chance. These are some of the inevitable things that always prevent wars in reality from ever approaching war on paper and in plans. Karl von Clausewitz

The Changing Character of Conflict

10. The *character* of conflict is constantly changing. Smart adversaries have moved quickly to counter our considerable conventional strengths and they will continue to do so. The sources of potential conflict are increasing and their forms diversifying. The global system is becoming increasingly interdependent and interconnected. The character of conflict is changed by the consequences of war, as humans adapt to it, and as a result of human development, for example in knowledge, need or interest. The evidence points to conflict's contemporary character being dominated by contest, congestion, clutter, connection and constraint:

- a. **Contest.** It is the degree and complexity of the contest that characterises the contemporary environment: an interconnected web of elements, such as access, freedom of manoeuvre, legitimacy and narratives will be contested and will need to be fought for. Adversaries will contest *all* areas in which we could once assume an advantage through technology. Technological diffusion and the ability of adversaries to match or outstrip our rate of investment and progress will force contest upon us in ways we have previously planned to avoid through dominance. Adversaries will also contest physical and virtual space – close, deep and rear – using multiple means, old and new. And ideas, ways of life, traditions and social trends will be contested, sometimes violently, at home.
- b. **Congestion.** Construction, population growth and the concentration of people around scarce resources will create congestion. We will be unavoidably drawn into urban areas, the littoral and lower airspace. The ground will often be densely populated, possibly with dissatisfied and disadvantaged people, many of whom will be armed. Instability and adversary tactics will unavoidably draw the conduct of operations into these areas. Congestion will increase the uncertainty of second and third order effects and will inhibit manoeuvre and the use of firepower. The offshore seas, the airspace and orbital space will also grow more congested, with platforms and fixed structures, as human expansion reaches outwards and upwards.
- c. **Clutter.** As a result of congestion, growth and deregulation the operating space is growing more cluttered and filled with things arranged in a disorderly

fashion. A mass of ambiguous targets will challenge our ability to understand and discriminate. Clutter aids concealment, particularly for indigenous actors with local knowledge, and this will confound technical sensors and put new emphasis on the need for local, human, engagement and understanding. Adversaries will exploit neutral spaces, thereby increasing the risk of possibly unacceptable collateral damage if they are attacked.

d. **Connection.** Human action and interaction, our own and that of our adversaries, is gravitating towards inter-connected nodes. These nodes are centres of activity, for example air and sea ports, confluences of movement and communications, and centres of governance and commerce. The nodes are connected by networks, such as supply and trade routes and computer networks. The accelerated and all-pervasive expansion of cyber inter-connectivity, and the internet, continues to have a major effect. Both nodes and networks will require protection and will be threatened with attack, exploitation and disruption. All aspects of globalisation have accelerated and exaggerated both the progress and the effects of inter-connection.

e. **Constraint.** Legal and social norms, which are essential to the legitimacy of our actions, will limit us, but not necessarily our adversaries. Risk aversion, a lack of tolerance for widespread damage and long-term commitment (particularly if operations are seen as 'discretionary'), and pervasive media coverage are increasingly constraining our freedom to operate, but will not affect all sides in conflict equally. Debates over ethics, legitimacy, human rights, proportionality and the definition of success will obstruct a coherent narrative and handicap the operational freedom to seize and hold the initiative. Periodically, particularly in democracies, economics will constrain defence spending, forcing unwelcome or potentially debilitating choices over capability.

11. **Contemporary Trends.** Five trends act as drivers for these contemporary characteristics of conflict: *globalisation* (the internationalisation of markets); the *breakdown of boundaries* between the land, sea, airspace and cyberspace environments, and between traditional state and non-state constructs and thinking; *innovation* leading to exponential technological progress at a rate which is impossible for one party to control; *acute competition* caused by a scarcity of the resources essential to support

human life, climate change and global inequality; and conflict that involves varied, *hybrid threats*, operating concurrently and in close proximity to each other.

12. **Resultant Challenges.** The evolving character of conflict and its driving trends will result in a series of security challenges that must be addressed:

a. **Adversaries.** It may no longer be possible to categorise our adversaries as either 'state' or 'non-state', and there will be an increasing blurring between these various groups in terms of their ends, ways and means. Some states could use the full range of capabilities against us, flexing between kinetic, non-kinetic, information operations and proxy activity in order to stretch us. Non-state actors, whether state-sponsored or acting independently, may use a wide variety of capabilities (Hezbollah's use of anti-ship missiles is an example). Identifying exactly what constitutes our adversary, and therefore both understanding him and countering him, is going to be increasingly complex and difficult. This evolution in the character of potential adversaries requires a re-examination of the blurred or 'hybrid' nature of the threats we face.

b. **Hybrid Threats.** By nature, conflict causes combinations of concurrent threats. The threat is never one-dimensional. The contemporary character of conflict is highly complicated and the boundaries between types of threat are increasingly unclear. Conflict could involve a range of trans-national, state, group and individual participants who will be able to concentrate locally or act globally. The categorisation of combatants and their means is becoming less clear. Motives for conflict are timelessly derived from self-interest, fear and survival, and values. But the organisational vehicles for mobilising these motives are changing and are not monopolised by states; al-Qaeda for example could be characterised as a franchise of ideas, rather than as an organisation of any kind. The most obvious manifestation of these vehicles is well-armed groups that do not, by design, look or act like fielded forces. However, these are not new to warfare. We must be careful not to categorise conflict as 'conventional' or 'hybrid.' The notion of hybrid threats is useful because it forces us to consider the full range of challenges of conflict – the identifiable force on the battlefield; the para-military group attacking the supply area; the hostile population; the terrorist at home. The theoretical conventional

confrontations of the Cold War, and the marginal post-imperial insurgencies of the same period, encouraged us to see conflict in an unhelpful and binary way. That veil has now been lifted, but what is revealed is not, in substance, new.

c. **Global Joint Operational Area.** Globalisation will link future challenges across large geographic distances and virtual domains, thereby creating a global Joint Operations Area. Each of the environments will be affected differently, and will be interlinked and porous, with activities in one having effect in others. Our adversaries will attack at seams between the environments or at perceived vulnerabilities such as the civilian element of a comprehensive approach to operations, or will focus on areas that fall outside of the traditional battlespace, such as in cyberspace.

d. **Declining Technological Advantage.** Our qualitative technological advantage is being eroded. Cheap technology is widely available and many of our potential adversaries are unconstrained by our procurement methodologies and restrictions. Where we have a technological advantage it should be exploited, but it cannot be relied upon alone to achieve superiority. Furthermore, a technological edge cannot be relied upon to lower force densities: future operations, particularly those 'among the people' are likely to continue to require large numbers of personnel to be 'among the people' effectively.

e. **Discretion.** A binary distinction between discretionary or non-discretionary conflict (as discussed in paragraph 7) has become even more inappropriate, as the motivations for resorting to conflict have evolved and the world has become increasingly inter-connected.

13. These evolutions are all serious challenges to military organisational culture and mindsets. To retain or regain an edge, twenty-first century land forces will need first to put new emphasis on trying to understand the nature of environments, challenges and adversaries; and thereafter may have to rely not just on having the right kit and platforms, but more on other tools, such as: the right people; a fully effective comprehensive approach; non-traditional areas such as cyberspace; and a mindset that allows the agile application of all of the above. This is not to say that more conventional threats have

gone away, but rather that they are now wrapped into a much more complex mosaic. Forces that simply replace capabilities with more up-to-date versions of the same and hope that this alone will retain an edge over potential adversaries are likely to be found wanting.

The Changing Character of the Land Environment

14. From the conclusions of the FCOC, further deductions can be made concerning the contemporary and likely future land environment. Those that are most likely further to influence land force development are:

- a. The threats that will have to be addressed by land forces will emanate from complex sources, defying neat categorisation. Their diffuse nature means that there are no longer any 'rear areas', even at home.
- b. Although adversaries will come in many guises and vary in scale, they may well exhibit some of the basic characteristics of a fielded force, such as a formed military or para-military force, or a command system and a common ethos. Land forces will continue to be required to deal with 'conventional' threats, even from 'hybrid' adversaries.
- c. Alongside fielded components other elements of the adversary could be as diverse as criminal gangs, or a nebulous franchise of ideologically joined individuals. The varied but amalgamated character of potential adversaries creates a new level of complexity, not just in action, but also in force structures, approaches and mind-sets, for land forces. This diffuse nature of adversaries also means that the constraints that apply to our own forces, but not to adversaries, (legal, ethical, media scrutiny and public perception for example) will need to be understood during both planning and execution.
- d. The character of these hybrid adversaries means that military activities in the land environment cannot be easily categorised or separated out as they will probably never take place in isolation: most conflicts will require concurrent or overlapping military activities, sometimes in the same place. The relationship of

these activities, combined with complexity and hybrid threats, makes a mosaic, or changing kaleidoscope, a more accurate way of visualising the contemporary operating environment than the more traditional 'spectrum of conflict'.

e. The complexity of future adversaries and operating environments will require a new approach to intelligence and information-gathering, and a new approach to understanding all elements of the environment in which land operations will be conducted, including, and especially, the cultural aspects.

f. Time, space and strategic compression are increasingly constricting. The speed of communication and change, and increasing physical congestion, are reducing the freedom to manoeuvre in the land environment, physically and mentally. The margins for error are reducing. Tactical mistakes have always had the potential to have strategic impacts, but the chances of that happening are increasing exponentially.

g. Operations in the land environment cannot be conducted in isolation of the others: air, space and cyber will always have a direct, and sometimes decisive, effect; and they will almost always be key enablers for operations on land. As a maritime nation, the sea will have an effect directly or indirectly in all that we do, especially if anything but the lightest of forces are required to deploy abroad.

h. The traditional physical limits of land operating areas are becoming harder to define and sustain as borders become more porous, instability more regional, and threats more global and interconnected. Areas of responsibility will become increasingly hard to define.

i. It appears likely that most large land operations will involve multinational coalitions. This has a breadth of implications from headquarters size and structures, through force sizes required to retain credibility and influence, right down to developing the necessary language skills.

j. The amorphous and diffuse nature of potential adversaries means that seeking solutions through technological dominance as a substitute for mass may

be an unrealistic goal. The ability to revert to low-technology methods, if high-technology solutions fail, will remain essential for land operations.

k. Conversely, technology must be exploited to retain an asymmetric edge over less developed adversaries wherever possible⁹ but the wide availability of advanced technology, coupled to adversaries' access to funding and lack of procurement constraints, may make the maintenance of a technological edge in the land environment increasingly difficult.

l. It is unrealistic to hope that modern technological solutions will 'sanitise' conflict in the land environment: a degree of 'collateral damage' will remain an almost inevitable unintended side-effect of kinetic action, regardless of advances in precision technology, particularly if adversaries choose to operate and hide among the population.

m. Coherent narratives are an increasingly important aspect of operations in the land environment because of the ubiquity of onlookers, cyberspace and media coverage.

n. The physical environment, described above in paragraph 9, will become even more demanding than it is in its nature, perhaps because of increasing temperatures or climatic variation, but certainly through urbanisation and declining natural resources.

o. Logistic activity in the land environment is more difficult if the layout of the battlespace becomes less linear, and lines of supply and communication correspondingly more vulnerable. The enduring realities of demand, dispersal, duration and distance will mean that only land forces of sufficient mass and logistic resilience will thrive.

⁹ Paragraph 17a offers ideas for where the emphasis should be placed.

The Nature and Character of the Land Force Combined

*Hail, soldier, huddled in the rain,
Hail, soldier, squelching through the mud,
Hail soldier, sick of dirt and pain,
The sight of death, the smell of blood.
New men, new weapons, bear the brunt;
New slogans gild the ancient game:
The infantry are still in front,
And mud and dust are much the same.*

A P Herbert

15. **Nothing is New, Everything is New.** It is fashionable to make a distinction between ‘conventional war’, that is to say war between 2 or more state-sponsored military forces arrayed against each other on a battlefield, and ‘unconventional war’, which is to say guerrilla wars, small wars, COIN campaigns or wars amongst the people. The distinction is a false one, exacerbated by years of Cold War thinking in which the civil population played little part in military calculations. Like so many labels, the label ‘conventional’ is as false as the distinction, because it suggests that this sort of warfare is the norm. Warfare has always been a combination of pitched battles and military interaction with civilian populations – that is absolutely the nature of warfare, it is only the balance and character of the combination that changes. Caesar’s subjugation of Gaul consisted as much of diplomacy, governance, tribal dynamics, trade and negotiation as it did of war-fighting. Pitched battles such as Crécy and Agincourt were the exceptions in the Hundred Years War, whereas the *chevauchée* and the siege (in which the civilian population were the focus of most of the harm and suffering) were the norms. The Napoleonic wars are, in many imaginations, the archetypal example of a war of battlefields, and yet the ‘Spanish Ulcer’ of the Peninsular War remains a timeless example of a failed COIN campaign. For the people of France, or Poland, World War II was fought very much ‘among the people’. It is not the distinction between ‘conventional’ and ‘unconventional’ warfare that is new, nor the predominance of one over the other: what matters for the development of a force for land operations in the twenty-first century is to understand the likely balance between battlefield and non-battlefield engagement, and the developments that will form the unique character of modern operations.

It was only here in Spain that we learned how terrible it is to fight against a people. On the one hand there is no glory, for what glory could be gained by defeating this rabble of elderly shopkeepers, ignorant peasants, fanatical priests, excited women and all the other creatures who made up the garrison? On the other hand there were extreme discomfort and danger, for these people would give you no rest, would observe no rules of war, and were desperately earnest in their desire by hook or by crook to do you an injury.

Brigadier Gerard describing the Peninsular War¹⁰

The Nature of the Land Force

16. **The Development of an Enduring Land Force.** From the nature of the land operating environment, a number of deductions about the essential characteristics of land forces can be made. These are the constants that must be the foundation of the development of a land force, regardless of the implications that the changing character of conflict may superimpose upon them.

a. **People are the Capability.** Although high-quality people are a bedrock requirement of all armed services, land forces, by necessity, must place a different emphasis on their people, in that their people are their capability. Air and maritime forces generally man the equipment. Land forces generally equip the man. This may have become a cliché, but like most clichés it has become so because it is inherently true. In air and maritime forces the aim is usually for people to get a piece of equipment into a position from which it can have an effect. For land forces, the aim is usually to employ equipment to get people into positions from which they can have an effect. These distinctions fundamentally affect doctrine, ethos, leadership, and the way that resources are used. They lie at the heart of the enduring utility of land forces, but they are also their greatest vulnerability; when land forces lose people, or reduce the number of people that they have, they lose capability.

b. **People are the 'Edge'.** The unpredictability of conflict in the land environment means that some courses of action that should work, do not.

¹⁰ Sir Arthur Conan Doyle, *The Complete Brigadier Gerard*, (Edinburgh: Canongate Classics, 1995).

Flexibility, experience and common sense come together to achieve practical, but usually not pure, results. Land forces should therefore be comfortable with ambiguity and expert at improvisation. At the same time, although we must continue to develop modern equipment, and our equipment programme must be based upon a best guess of the future requirement, our best guess at the detail of future conflict is likely to be wrong in varying degrees, so it will be our ability to adapt to the new and unpredicted that will give us an edge over our opponents. Developing and deploying new equipment takes time. The development, distribution and digestion of new doctrine takes time. It is the quality, education, experience, flexibility and attitudes of our people that will enable us to adapt how we use and apply our equipment, doctrine, tactics and procedures that will, in turn, allow us to stay ahead in the battle for the initiative. The force that can improvise most effectively, while its formal doctrine absorption and equipment procurement catch up, will maintain the edge; and it is people who will do that improvisation, and thus people who will provide that edge.

c. **Numbers Count.** Since 1996, UK Defence has routinely exceeded endorsed concurrency sets by 92%, nearly doubling the planned activity levels.¹¹ The reality is that force levels deployed have continued to far exceed defence planning assumptions. Since 1945 the British Army has been almost continuously committed to operations, with a steady increase in commitment since the end of the Cold War. Of these operations, 61% have been at Divisional or above 'scale of effort'. Commitments have been rarely entered into against the background of actively interventionist policy: more often than not, even when a mood of 'liberal interventionism' as been fashionable, the UK has intervened because circumstances have demanded it, rather than through purely discretionary choice. Collective historical lessons from both our own national and other nations' experiences in conflict provide a clear evidential base that demonstrates that mass is critical to ensuring operational success.¹² While it would be unwise to rely solely upon mathematical models to provide answers to the imprecise business of conflict, common sense suggests that large numbers of people are required to have effect

¹¹ Strategy Management, *Concurrency Analysis*, Defence Science and Technology Laboratory ongoing study.

¹² The 'surges' in Iraq and Afghanistan both demonstrated the effect of numbers in conducting COIN and stabilisation operations.

if operating among large numbers of people.¹³ Furthermore, the Israeli experience of 2006, from which we can learn much, brought previous assumptions about replacing force density with focused targeting, and technologically advanced and precise weaponry, into sharp question. The events at Bint Jbeil in July 2006 alone provide a salutary lesson that we ignore at our peril.¹⁴ Finally, it should also be noted that Military Aid to the Civil Authorities (MACA) and home defence can frequently absorb significant resource. Recent experience demonstrates the force levels required for MACA; examples include Northern Ireland¹⁵ and the Fire Brigade Union strikes (Operation FRESCO).¹⁶

d. **Using a Philosophy and Principles, not Prescription.** In the land environment prescription should be limited to basic drills and structures; providing a coherence to the body of individuals and creating space for freedom of action based on clear philosophy and principles. A premium is placed on understanding the intent, the situation, the threats and the capabilities of the force, rather than on following a procedure. Agile operations in the land environment must therefore be more about the application of philosophy and an acceptance of uncertainties than about the application of process and maths, and a search for certainties. This understanding has to be exploited, using an indirect approach which applies strength against weakness, out-thinking an enemy rather than relying solely on out-fighting or simply overwhelming him. This capability should be underpinned by a philosophy of command that centralises intent and decentralises the direction of the specifics of execution.

¹³ A number of studies have proposed mathematical ratios, for example: James T Quinlivan, in *Burden of Victory The Painful Arithmetic of Stability Operations*, RAND Review, Summer 2003. 'Although numbers alone do not constitute a security strategy, successful strategies for population security and control have required force ratios either as large or larger than 20 security personnel (troops and police combined) per thousand inhabitants...'. Models such as this should be used to inform (rather than dictate) force generation.

¹⁴ Failures in intelligence, attitudes, mindsets and training, coupled with a catalogue of forgotten lessons (for example, that urban warfare absorbs very large numbers of infantrymen) led to a major miscalculation. The Hezbollah force was estimated to be between 20-30 fighters in well prepared urban defensive positions (more than 600 subterranean structures, some as close to 800m to the border - most were built within or near to densely populated areas) within Bint Jbeil (approx 1km x 1km). After 2 days of artillery bombardment, 3 brigades were committed to clear and hold the town. After 3 days of inconclusive fighting the IDF withdrew and resorted to aerial bombardments to flatten the town.

¹⁵ An average force level of approx 12,000 was required to maintain security throughout the province.

¹⁶ A force of 14,800 was deployed.

e. **Overcoming Complexity.** In the land environment the complexity is such that causes do not lead to effects with any certainty. Furthermore, generating and using land fighting power takes time and a great deal of fine-tuning. This fundamentally affects command, staff work and methods of operating and fighting, leading to a requirement for headquarters capable of spanning the complexity faced, and of engaging with the full range of actors, national and international, governmental and non-governmental, that will be involved in the pursuit of a comprehensive approach. Complexity also demands people who are adept at understanding the environment, with all its nuances, visualising it and then producing and executing simple plans, recognising the exact moments when the fulcrum tips. This cannot be achieved without correctly scaled and staffed headquarters, flexible and adaptable organisations, repeated collective training and individual education.

f. **Taking Risks.** Risk is neutral, not negative. It offers opportunities as much as it presents threats. Since Murphy's Law (what can go wrong, probably will) applies ubiquitously in the land environment, a confident attitude to risk is required. The environment requires commanders and operators who are capable of calculating, exploiting and mitigating risk, making decisions and communicating them clearly. Those who understand that the calculus that needs to be made is simply about *when to take the decisive risks* (as opposed to how to *avoid* taking risks) will succeed in maintaining the initiative. This mind-set should be a cultural norm in an effective land force, which may draw its people from a society where the norm is very different.

g. **Understanding Asymmetry.** Operations in the land environment are by definition asymmetric because adversaries always differ, perhaps sometimes only marginally. These differences may be reflected in physical attributes - organisation, equipment, tactics, numbers - or in more abstract ways, for example intent, culture and values. Furthermore, this natural asymmetry is accentuated deliberately as adversaries seek an advantage, enhancing their own strength and targeting the other side's weakness. No sensible adversary will seek to confront us on terms which are to his disadvantage: he will not present himself for destruction on terms that suit our doctrine, structures or capabilities wherever they are superior to his own. Understanding asymmetry requires a subtlety that is obscured by

simplistic binary distinctions and categorisations of conflict. The valuable question is not: is the conflict asymmetric, but rather: how and in what way is the conflict asymmetric?

h. **Manoeuvring, Striking and Protecting.** There is an enduring requirement, unchanging in its essential nature, to manoeuvre across ground, with some form of protection and materiel support, in order to reach a place from which to strike, including the ability to use firepower, in order to achieve a decisive condition. To move without organic protection and integrated firepower in a high threat environment, against a capable hybrid adversary, will result in defeat. These capabilities cannot be bolted together just before contact: such combined arms manoeuvre requires a great deal of integration, practice and expertise.

i. **Seizing the Initiative.** The initiative supplies the ability to dictate events, a prerequisite for success in conflict. In the land environment the initiative may be hard to recognise and fleeting. Land forces should be capable of recognising it, seizing it and then protecting it, either from being seized by an opponent or from culmination. This depends on understanding, experience, physical and mental agility, and robustness.

j. **Maintaining Cohesion.** Land forces without cohesion rapidly dissolve into independently acting individuals. The complexity and uncertainty of the environment and its physical demands, require forces which are capable of exploiting chaos rather than adding to it. Cohesion holds the moral, physical and conceptual dimensions of a force together. It will be the primary target of a thinking enemy. Moral cohesion binds people together with a shared sense of purpose; doctrine, education and training provide conceptual cohesion; and physical cohesion is provided by balanced, robust organisations with common goals, drills and tactics. Cohesion provides a unity of purpose and direction, and a resistance against shock.

k. **Exclusive Roles.** This paper does not make judgments about the relative importance of the environments; indeed it emphasises their mutual dependency. However, understanding the enduring nature of land forces is aided by considering

roles which are exclusive to them. For example, land forces exclusively are able to: secure, hold and protect ground; or to interact with, or sustain physical security for, a population.

The Character of the Land Force

17. **The Development of a Land Force Relevant for the Twenty-First Century.**

From the changed, and changing character of the land operating environment, it is possible to make deductions about the key requirements for the development of a force specifically relevant to the twenty-first century.

- a. **Technology.** Despite a closing of the technology gap there are areas in which it is still possible to maintain an advantage. Wherever it is possible to use technology to retain an asymmetric edge over less advanced opponents such opportunities must be exploited. Research and development for force development should concentrate on areas where this advantage can be maximised, such as: stealth, protection, precision, lethality, mobility (especially from the air), electronic counter-measures, and ownership of the night.
- b. **Homogeneity.** Land forces' structures derive their agility from homogeneity. The greater the degree of unit specialisation and variation, the lower the force's overall level of versatility. Examples of how homogeneity is achieved are: training based on an adaptive foundation, living doctrine and common standards; maximising the number of skills that are treated as core rather than specialised; robust force structures that do not require augmentation; and equipment with as few variants as possible.
- c. **Expeditionary.** An expeditionary mindset (go anywhere, at any time, for any task) should underpin individuals' and the collective ethos. This attitude, which requires a purposeful, energetic and assertive institutional culture, must be reinforced by: preparedness to fight; high standards of individual physical and mental robustness; a philosophy of clear, centralised intent and properly-resourced decentralised execution; suitable terms and conditions of service, and the ability to project force strategically and quickly, and then to sustain it. Expeditionary is not

the same as 'rapid response': an expeditionary approach should have an element of continuous engagement in order to anticipate and prevent conflict, as well as to understand and to react to it.

d. **Defence of the Homeland.** While it makes sense to aspire to deal with threats to the UK at a distance, using an expeditionary mindset, defence of the homeland may require large numbers of security forces to be deployed at home. In November 2008, 10 terrorists launched an attack against down-town Mumbai. 166 civilians and security forces were killed and 308 were wounded. It took 3 days for large numbers of the Indian security forces from the Rapid Action Force, the Marine Commandos and the National Security Guard Commandos to bring the situation under control, killing 9 of the terrorists and capturing one. Alongside the protection of the integrity of British coastal waters and British airspace there is a responsibility to assure the physical security of the homeland, on land, and MACA may be required to step well beyond the deployment of very small numbers of highly-trained special forces.

e. **Education.** A thorough working familiarity with professional doctrine, coupled with the need for improvisation in the face of the unexpected, and an increasingly complex environment, all require a new emphasis on education.¹⁷ This is what gives people an edge over their rivals. Forces need to be capable of understanding the character of the conflict in which they find themselves: the general situation, the threats, the sources of power, the likely dynamics, and the consequences of actions. Imagination is also important because it feeds innovation, improvisation and the exploitation of indirect approaches and the unexpected. The force requires people who can think to the finish, able to consider second- and third-order consequences and beyond. All of this requires a culture of education and learning, led, and sometimes enforced, from the top of the organisation and penetrating down to the lowest ranks.

¹⁷ 'Education', as opposed to 'training'. Training is for the specific and the anticipated, education enhances the ability to improvise and adapt to cope with the un-anticipated.

- f. **Understanding.** It will not be enough simply to seek to find methods of gathering more and more information or intelligence. The effective resolution of threats will require a new emphasis on understanding the environments in which they develop, and in which we may be required to operate. This will require, at close proximity and over a prolonged period, exposure to diverse people, places and cultures; and to potential and developing problems and threats. It will require complex relationships to be fostered and developed. This will require a new attitude and approach that will entail continuous service and engagement abroad. The magnitude of change that will be required in terms of: foreign area officer numbers and career paths; deployed training teams; training facilities and locations; and terms and conditions of service, should not be under-estimated.
- g. **Headquarters Structures.** The demands of the twenty-first century land environment are such that small, mobile formation headquarters are likely to be unable to collate, process and disseminate the level of information and understanding required to generate the mixture of comprehension and agility that is needed to retain the initiative in complex modern conflict. Headquarters will need to be structured and resourced to deal with the demands of modern complexity, the management of the relationships required of a comprehensive and multinational approach, and the spans of command and control on the ground, while also able to handle the demands and downward pressure from governments and higher headquarters. Larger, more static, main headquarters will need to be supplemented by more mobile, tactical and deployable elements that will allow commanders to remain engaged closely with the conduct of operations when and where the situation demands.
- h. **Partnerships.** The military instrument must act as part of a comprehensive response, and not in isolation. Given that we seek to deal with intractable problems at reach, there will be an increasing range of political, legal, moral, financial and burden-sharing imperatives to build teams of like-minded partners; and a need for a willingness to work with unfamiliar partners. This will require a comprehensive approach that will require the integration of all levers of state power, often in partnership with allies. Furthermore, the need for mass and favourable force ratios will often be best achieved by integration with, operation alongside, or the development of, indigenous forces.

- i. **The Battle of the Narratives.** Greater weight will need to be given to influence, and to winning the battle of the narratives. Messages must be better synchronised and articulated across joint, inter-agency and multinational seams. We will need to be on a positive front foot, not a refutational back foot, across the full range of our audiences.

- j. **Balance of Current and Future Operations.** Because land forces cannot anticipate the exact character of their next fight, they must be sufficiently robustly structured not only to succeed in current operations, but also to adapt rapidly to the demands of the next fight. The highest priority must always be success in current operations, but equipment and structures, and training and education should always be balanced to meet the demands of both. Contingency capability can be modulated, but not sacrificed, in the face of immediate demands.

Summary

18. The *nature* and *character* of conflict are different. *Nature* endures; *character* evolves. This distinction applies to the land operating environment more fundamentally than any other. From an analysis of both, balanced deductions can be made about what land forces need to be, in their nature and their character. Deductions from nature alone would lead to a force good only for testing the timeless theory of conflict. A land force design based on an analysis of character alone, even if it were created on time, might perform superbly once, but would plant the seeds of consistent failure thereafter. Furthermore, as the future is unforeseeable, equipment, manpower levels, structures, training, education, doctrine and mindsets must all be based on a combination of enduring truths and current context, equipping those charged with conducting the land fight both the best chance of initial success and the crucial ability to improvise and adapt fast as the inevitable gaps between the anticipated and the actual become apparent. A balanced approach is essential; nature as the enduring foundation, and character as the evolving superstructure.

19. Finally, regardless of the best intentions of the policy-formers, the actual employment of land forces in violent conflict is often not as discretionary as we would

wish. The committal of land forces is the most tangible military gesture of commitment to an alliance or coalition, and, after the nuclear deterrent, credible land forces are possibly the next main capability in the essential ladder of capabilities that must be available to exercise plausible deterrence as a national policy. And land forces get used: regardless of the ebbs and flows of policy in the years since World War II ended, British land forces have been deployed on operations, somewhere in the world, at some scale, during every year since then, and in all but one of those years at least one British soldier has been killed in action.

Plus ça change, plus c'est la même chose.

Alphonse Karr, Les Guêpes, 1849

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