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# CANADIAN FORCES COLLEGE / COLLÈGE DES FORCES CANADIENNES CSC 31 / CCEM N° 31

#### EXERCISE NEW HORIZONS/EXERCICE NEW HORIZONS

# FORCE BEDDOWN - FINDING THE RIGHT MIX

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# **Abstract**

The Canadian Forces have been deploying troops overseas on a continuous basis since the end of the Second World War. As every new mission is announced, the life support systems for the deployed personnel must be considered. The creation of a base camp is called force beddown. The task of force beddown has been and continues to be the responsibility of the Canadian Military Engineers, which has evolved with the introduction of contractors on the battlefield. There are proponents of contractors taking on the responsibility of force beddown while others believe only the Military Engineers should take on this task. This paper demonstrates that the dual use of military engineers and civilian contractors for deployed force beddown operations is the best way ahead for the CF for reasons of efficiency, flexibility and operational effectiveness. Force beddown is defined and previous missions in East Timor, Aviano, Kosovo and Kabul are examined to demonstrate the wide scope of possible future beddown missions. The CF doctrine and policy is outlined giving the task to the Canadian Military Engineers and outlining the current role of the Joint Support Group and the CF Contractor Augmentation Programme (CANCAP). The resources of the CME Branch and the current CANCAP contractor are examined and their relative strengths and weaknesses are compared in light of the factors of efficiency, flexibility and operational effectiveness. The possibility of sole-sourcing to one of these two elements is discussed and it is determined that neither can totally fulfil the overall requirements by themselves. The best approach to be taken in order to fulfil the three key factors must be an integration of the best of both approaches.

"There will be no decline in the demand for the Canadian Forces overseas." 1

# INTRODUCTION

The Canadian Forces' first priority is, has always been and will always be the Defence of Canada.<sup>2</sup> It is paramount for a democratic society to be able to defend itself and protect its peoples from outside threats. It is the lack of a clear and substantial threat that has caused Canada to look elsewhere for the use of her military forces. NATO and the Cold War gave it considerable focus from the end of the Second World War to the fall of the Warsaw Pact in 1989. Canada also began to flex its international muscle through the United Nation's peacekeeping process. It is during these early peacekeeping missions that Canada re-established its role as an expeditionary, armed force. Since Lester Pearson's first foray into peacekeeping in 1947, Canada has participated in 72 international operations, not including those ongoing today.<sup>3</sup> Since then, over 100,000 members of her armed forces have deployed overseas, at a cost of over 100 lives and countless injuries.<sup>4</sup> Today, there are over 1,567 Canadian service personnel serving in 15 missions on four continents.<sup>5</sup> With the recently released vision for the Canadian Forces (CF), this pace will continue. One of the major issues facing the CF each and every time

<sup>&</sup>lt;sup>1</sup> Department of National Defence, A-JS-005-000/AG-001 Canada's International Policy Statement: Defence, A Role of Pride and Influence in the World (Ottawa: DND Canada, 2005), 10.

<sup>&</sup>lt;sup>2</sup> Don MacNamara, "Canadian Defence Policy – A Contemporary Historical Perspective," in *Towards the Brave New World: Canada's Army in the 21<sup>st</sup> Century*, ed. Bernd Horn and Peter Gizewski, 33-44 (Kingston: Director of Land Strategic Concepts, 2003), 36-37.

<sup>&</sup>lt;sup>3</sup> DND, "Current Operations," <a href="http://www.forces.gc.ca/site/operations/current\_ops\_e.asp">http://www.forces.gc.ca/site/operations/current\_ops\_e.asp</a>; Internet; accessed 20 March 2005.

<sup>&</sup>lt;sup>4</sup> Veterans Affairs Canada, "Veteran's Week 5-11 November 2001 – In the Service of Peace," <a href="http://www.vac-acc.gc.ca/general/sub.cfm?source=feature/week2001/natnews/servpeace;">http://www.vac-acc.gc.ca/general/sub.cfm?source=feature/week2001/natnews/servpeace;</a> Internet; accessed 20 March 2005.

<sup>&</sup>lt;sup>5</sup> DND, "Current Operations," <a href="http://www.forces.gc.ca/site/operations/current\_ops\_e.asp">http://www.forces.gc.ca/site/operations/current\_ops\_e.asp</a>; Internet; accessed 20 March 2005.

it deploys is how it will look after its personnel in a foreign land. If Canada is sending a couple of staff officers or observers, it will normally just use the existing UN or coalition infrastructure and support elements. However, when it dispatches sub-unit-sized forces, there is considerable effort put into their life support systems. This process of creating a home for the deployed personnel is known as *force beddown*. This task has normally been the sole responsibility of the Canadian Military Engineer (CME) Branch. However, as Alternative Service Delivery (ASD) means were looked at in the 1990s, there has been an increased emphasis on using civilian contractors in lieu of military personnel to conduct this task. First in Bosnia, and more recently in Kabul, the CF has started to use contractors on the battlefield for force beddown.

The use of contractors within the CF is a contentious issue with viewpoints ranging from their sole use to no-use of them for force beddown. This paper will demonstrate that the dual use of military engineers and civilian contractors for deployed forces beddown operations is the best way ahead for the CF for reasons of efficiency, flexibility and, most importantly, operational effectiveness. These terms will first be defined in the context of this paper. The background of CF deployed operations will be examined to include outlining current CF beddown doctrine. Some key previous missions will be outlined to demonstrate key variables in beddown missions. Current CF policy will then be outlined with an emphasis on examining the Joint Support Group (JSG) and the Canadian Contractor Augmentation Programme (CANCAP). The factors of efficiency, flexibility and operational effectiveness will be examined in light of current capabilities of the CF and CANCAP. An analysis on the key factors of efficiency, flexibility and operational effectiveness will outline where each of these organisations

has strengths to be leveraged and weaknesses to be offset in order to come up with the right force mix.

# **BACKGROUND**

#### **Definitions**

Before looking at the specifics of force beddown, it is necessary to define the three key factors that will be used throughout this paper. This will allow the reader the context with which to consider that facts and arguments. The first factor is efficiency. Efficiency is defined as the quality of "working productively with no waste of money or effort." The key element of this definition is getting the job done for the best price and least amount of labour (these two are usually intertwined). The ideal solution will entail getting the job done for the least cost with the fewest people and resources involved. Flexibility is key to military operations as the situation is usually very fluid. Flexibility is defined as the ability "to change or be changed to adapt to different circumstances." An organisation executing force beddown will have to be adaptable for the potential of a rapidly changing situation. The final factor, which is the bottom line in military operations, that of operational effectiveness. It is defined as "the degree to which operational forces are capable of performing their assigned missions in relation to known enemy capabilities." For the purposes of this paper, enemy capabilities does not only include hostile acts, but any factor that will inhibit a successful force beddown, such as the terrain, environment, local populace and political constraints, to name a few. This

<sup>&</sup>lt;sup>6</sup> Catherine Soanes, ed, Pocket Oxford English Dictionary, 9<sup>th</sup> Edition (New York: Oxford University Press Inc, 2002), 284.

<sup>&</sup>lt;sup>7</sup> Ibid., 343.

<sup>&</sup>lt;sup>8</sup> DND, B-GL-303-002/JX-Z03 Army Vocabulary (Ottawa: DND Canada, 1991), O-8.

factor boils down to the ability to get the job done despite the frictions and impediments that are in the way.

#### Force Beddown

When military forces deploy overseas, they are required to set up a base camp from which to operate. This solid foot on the ground gives the forces a place to administer themselves to permit the successful prosecution of their mission. This base camp will usually have accommodation for the soldiers, messing & dining facilities, warehouses, maintenance shops, offices, headquarters, ablution facilities and recreation/fitness areas. The size and complexity of the base camp will vary depending on who is occupying the site, for how long and for what purpose. The requirements for a base camp housing a squadron of CF-18 Hornets is obviously more complex and involved than an infantry platoon house. No matter the size, the process of establishing these base camps is called force beddown. The definition of force beddown is:

The provision of engineer services, installations and systems to allow a task force to move into a theatre, survive and commence operations. It includes primarily general support engineer tasks in support of establishing force protection, sustainment and projections. <sup>9</sup>

It is important to note that there is a clear emphasis on the engineering aspect of the tasks and the focus on protecting and sustaining the force to allow operations to commence.

# **Previous Mission Examples**

Since the end of the Second World War, Canada has contributed to numerous missions across the globe and the CF has been used as an expeditionary army in support

<sup>&</sup>lt;sup>9</sup> "Canadian Forces Joint Operations Group," (briefing, Force Beddown Lessons Learned Working Group, Ottawa, 24 May 2000).

of foreign policy goals vice in the direct defence of the Canadian homeland. <sup>10</sup> Each mission brings its own unique requirements to force beddown due to the nature of the mission, size and composition of forces and unique geographical characteristics of each location as well as any political or diplomatic constraints and restraints. In order to illustrate the varying requirement of force beddown planning and execution, the recent CF missions in East Timor, Aviano, Kosovo and Kabul will be briefly outlined.

In October 1999, the deployment of a 250 person Company Group of infantry and engineers on Op TOUCAN to East Timor posed a unique challenge as to how to set up the base camp in tropical conditions. <sup>11</sup> The key was to protect the troops from their environment and allow them to carry out their assigned tasks. The final design was the construction of steel-framed, plywood decked, CGI-roofed, screened-in jungle-huts built on 0.6 metre stilts. <sup>12</sup> This deployment was significant as it was one of the first times that the chain of command recognized how important force beddown was to mission success. In a comment from the deployed commander, it was stated that "The construction of the jungle huts was a force multiplier" as the Canadian Contingent had far fewer health issues than all the other contingents and therefore more troops available for tasking, making it a more operationally effective unit. <sup>13</sup> While the CF was bedding down forces in the Pacific, two other missions were also being bedded down in Europe.

<sup>&</sup>lt;sup>10</sup> Kim Nossal, "The Army as an Instrument of Canadian Foreign Policy: Implications for the 'Army of Tomorrow"," in *Towards the Brave New World: Canada's Army in the 21<sup>st</sup> Century*, ed. Bernd Horn and Peter Gizewski, 33-44 (Kingston: Director of Land Strategic Concepts, 2003), 26-28.

<sup>&</sup>lt;sup>11</sup> DND, "Operation TOUCAN," <a href="http://www.forces.gc.ca/site/operations/toucan\_e.asp">http://www.forces.gc.ca/site/operations/toucan\_e.asp</a>; Internet; accessed 20 March 2005.

<sup>&</sup>lt;sup>12</sup> Captain Nick Pilon, "Op TOUCAN (East Timor)," (briefing, Force Beddown Lessons Learned Working Group, Ottawa, 24 May 2000).

<sup>&</sup>lt;sup>13</sup> Lieutenant-Colonel Dan Genest, "Force Beddown: A Strategic Perspective," (briefing, Force Beddown Lessons Learned Working Group, Ottawa, 24 May 2000).

The operations in Aviano (Op ECHO – June 1998 to December 2000) and Kosovo (Op KINETIC – June 1999 to June 2000) demonstrate the spectrum of force beddown requirements, even in the same Joint Operations Area (JOA). Op ECHO was the Canadian contribution to the NATO 79-day bombing campaign of Serbia consisting of 300 personnel and 18 CF-18 Hornet aircraft being based out of a NATO airbase in Aviano, Italy. Op KINETIC was the Canadian contribution to NATO's Kosovo Force (KFOR), which eventually consisted of over 1,500 troops on the ground in the Former Yugoslav Republic of Macedonia (FYROM) and Kosovo. At Aviano, the Engineers

to the force. The beddown challenge was to design and build multiple camps in Kosovo in undetermined locations. Once in Kosovo, there would be little infrastructure, utilities or HNS to draw upon. <sup>17</sup> These circumstances stretched the capabilities of the deployed military engineers. <sup>18</sup> Flexibility in adapting the plan to the changing requirements was key to mission success in Kosovo. As will be discussed later in this paper, the CF began to start to use contractors to assist in many support areas, one of which was force beddown. The first use of this capability was in Kabul in 2003 as part of the International Security Force (ISAF), Op ATHENA.

For Op ATHENA the majority of the construction of the two greenfield-site camps was not done by military engineers, but rather by a contractor. A military engineer team oversaw the project, but the contractor implemented the work. The overall process was a success, but not without considerable issues. As stated by the Commander of the Kabul Multi-National Brigade, Canadian Colonel Peter Devlin, "the contractor has not achieved a number of significant performance standards set in the task order and remains unable to fulfill many of DND's requirements". <sup>19</sup> It should also be noted that although this was the first contingent of Canadian troops into Kabul, ISAF had been on the ground for almost two years, thereby minimizing many of the security concerns. It could be argued that this force beddown was neither efficient nor flexible while trying to achieve operational effectiveness. These examples were meant to demonstrate the wide

<sup>&</sup>lt;sup>17</sup> Most of the potential useable military buildings were bombed during the air campaign, utilities were in poor repair and there was no internal economy to draw upon.

<sup>&</sup>lt;sup>18</sup> Major Al Mulawyshyn, "Op KINETIC Lessons Learned – Force Beddown," *The Bulletin* 7, no. 1 (June 2000): 14-17.

<sup>&</sup>lt;sup>19</sup> Brigadier-General Peter Devlin, "A Mid-Tour Update from Commander KMNB – Op ATHENA R00," *The Bulletin* 10, no. 2 (June 2004): 8-9.

variety of locations, circumstances, conditions and force packages that may have to be bedded down in the future.

# The Future...

Canada will continue to send troops overseas to demonstrate our nation's interest

#### CURRENT DOCTRINE AND POLICY

# **Canadian Forces Doctrine**

The primary role of the Engineers is "to assist friendly troops to fight, move and live..."<sup>22</sup> within a theatre of operations. Although the previous definition is technically Army doctrine, the CF recognizes one of the tasks of the Military Engineers as the "provision and maintenance of accommodations, utilities and services... to the TF (Task Force) as a whole."<sup>23</sup> The CF doctrine for force beddown is primarily contained in the DCDS Direction for International Operations (DDIO). It states that the DCDS will issue direction and guidance on the beddown including authorized accommodation standards and well as any geographical limitations. The TF Engineer will be responsible for executing the beddown in conjunction with the Theatre Activation Team.<sup>24</sup> The technical standards for these camps are contained in the Army publication: Accommodations, Installations and Engineering Services for Deployed Operations. It lays out generic planning guidelines, scales of accommodation and engineering services, design requirements and some specific environment considerations that will be adapted to each situation.<sup>25</sup> Each beddown will be unique in some ways and require the application of this doctrine, sound engineering analysis and a liberal application of common sense. Flexibility of minds, plans and procedures will be essential. It should be noted that none

 $<sup>^{22}</sup>$  DND, B-GL-361-001/FP-001  $\it Land\ Force\ Engineer\ Operations-Volume\ 1$  (Ottawa: DND Canada, 1998), 1.

<sup>&</sup>lt;sup>23</sup> DND, B-GG-005-004/AF-000 *Canadian Forces Operations* (Ottawa: DND Canada, 2000), 23-2.

<sup>&</sup>lt;sup>24</sup> DND, DDIO 2/2001, *DCDS Direction for International Operations*; http://dcds.mil.ca/cosj3/ndcc/docs/sops/DDIO\_e.pdf; Internet; accessed 20 March 2005, 6-7/11.

<sup>&</sup>lt;sup>25</sup> DND, B-GL-361-012/FP-000 Accommodation, Installations and Engineering Services for Deployed Operations (Ottawa: DND Canada, 1997).

of these publications deal specifically with issue of deployed contractors. The US Army has recognized the need for common doctrine on this matter and has issued a Field Manual covering the use of contractors on the battlefield.<sup>26</sup> Once a mission has been ordered by the government, the Theatre Activation Team is launched based on the Joint Support Group (JSG) located in Kingston.

# JSG/CANCAP Policies

Due to the sustained tempo of deployed operations, it was clear that the CF needed a centralized ability to support its deployed operations. A project was implemented in 1999 in order to develop this capability with one of the outcomes being the formation of the Joint Support Group (JSG).<sup>27</sup> The JSG was stood up in June 2003 with a mandate to "be a rapidly deployable formation, providing and arranging operational level support to CF international and domestic operations".<sup>28</sup> 1 Engineer Support Unit (1 ESU) is assigned to the JSG with a mission "to provide or arrange the full range of military engineer general support to contingency operations".<sup>29</sup> From an engineering perspective, this means that there will be a coordinated central command and control of engineering resources and it would be able to draw resources from all three

<sup>&</sup>lt;sup>26</sup> US Army, FM-100-21 *Contractors on the Battlefield* (Washington D.C.: Department of the Army, 2000).

<sup>&</sup>lt;sup>27</sup> DND, "Backgrounder, National Military Support Capability (NMSC) Project BG-01.029 - 18 August 2001," <a href="http://www.forces.gc.ca/site/newsroom/view\_news\_e.asp?id=201">http://www.forces.gc.ca/site/newsroom/view\_news\_e.asp?id=201</a>; Internet; accessed 3 December 2004.

<sup>&</sup>lt;sup>28</sup> DND, "Canadian Forces Joint Support Group," <a href="http://cfjog.kingston.mil.ca/cfjsg/cfjsg\_e.asp">http://cfjog.kingston.mil.ca/cfjsg/cfjsg\_e.asp</a>; DIN; accessed 20 March 2005.

<sup>&</sup>lt;sup>29</sup> Ibid.

services.<sup>30</sup> Note that both the JSG and 1 ESU missions include the term 'or arrange'. Other resources could be utilized, such as a civilian contractor.

Concurrent with the development of the JSG, the CF was examining the use of contractor support as an Alternative Service Delivery (ASD) initiative with the intent "to help DND/CF modernize its business practices and gain maximum value for each Defence dollar." However, for DND it was not just about saving money; it was about improving its combat capability.<sup>31</sup> One way it would do this was to free up uniformed personnel from static base functions to allow them to be used in the deployable field force. The logical extension of this thought process was the use of contractors to support the CF on overseas deployments which was first attempted in the Balkans in 2000.<sup>32</sup> This contract, however, was very specifically designed for the situation in Bosnia. The CF needed a more flexible, robust contract to allow for the task tailoring of support to contingency operations, thereby making it more efficient and flexible. In July 2000, the DCDS initiated the CF Contractor Augmentation Program (CANCAP) and a five-year, \$200 million contract was awarded to SNC-Lavalin/PAE Government Services in December 2002. The CANCAP program has a list of services that could be provided and

<sup>30</sup> DND, "1 ESU Unit History," <a href="http://cfjog.kingston.mil.ca/cfjsg/1esu/reports/main\_e.asp;">http://cfjog.kingston.mil.ca/cfjsg/1esu/reports/main\_e.asp;</a> DIN; accessed 20 March 2005.

<sup>&</sup>lt;sup>31</sup> DND, "Alternative Service Delivery – About ASD," http://www.vcds.forces.gc.ca/dgsc/pubs/support/asd/about\_e.asp; Internet; accessed 21 March 2005.

<sup>&</sup>lt;sup>32</sup> DND, "Backgrounder, Balkans Rationalization – Contract Support Project BG-00.006a - 15 December 2001," <a href="http://www.forces.gc.ca/site/newsroom/view\_news\_e.asp?id=210">http://www.forces.gc.ca/site/newsroom/view\_news\_e.asp?id=210</a>; Internet; accessed 20 March 2005.

is based on the support required for one 1,500-person mission.<sup>33</sup> The management of the CANCAP project is the responsibility of the JSG.

# **KEY FACTORS**

#### Resources Available

There are two main sources of resources available to conduct force beddown, the CME Branch and civilian contractors. The CME Branch has available various elements of expertise to draw from across the CF. The first are the Engineers within the JSG itself including the staff officers within the headquarters and the technical design experts within 1 ESU.<sup>34</sup> Within the JSG HQ, the Engineers are primarily responsible for the coordination of resources and the contract management of CANCAP engineering services while 1 ESU is responsible for the technical design and on-site project management of the force beddown. The Engineers in the JSG provide the 'brains' of the organization while the three major services provide the 'brawn'. The CME Branch trade structure currently fields six primary construction trades who are employed within specific deployable elements in the three services or at static positions at the various CF bases and wings. The current deployable units are four Construction Troops within the Land Force, one Airfield Engineering Squadron within the Air Force and two Naval Construction Troops within the Maritime Forces, putting about one-half of all the 900 tradespersons in deployable positions.<sup>35</sup>

<sup>&</sup>lt;sup>33</sup> DND, "Backgrounder, Canadian Forces Contractor Augmentation Program BG-04.010 - 14 July 2004," <a href="http://www.forces.gc.ca/site/newsroom/view\_news\_e.asp?id=1409">http://www.forces.gc.ca/site/newsroom/view\_news\_e.asp?id=1409</a>; Internet; accessed 20 March 2005.

The name of 1 CEU was changed to 1 ESU on 18 Jun 2003 when it moved from being an independent DCDS unit to an integral unit of the JSG. DND, "1 ESU Unit History," <a href="http://cfjog.kingston.mil.ca/cfjsg/lesu/reports/main\_e.asp;">http://cfjog.kingston.mil.ca/cfjsg/lesu/reports/main\_e.asp;</a> DIN; accessed 20 March 2005.

<sup>&</sup>lt;sup>35</sup> Numbers are from the 640 Series Career Manager Annual Briefing, 2005.

The current contract for CANCAP is held by the multi-national partnership company of SNC-Lavalin/PAE Inc. A huge multi-national corporation partnership can bring incredible assets to bear on operations. SNC-Lavalin currently has projects ongoing in 100 countries<sup>36</sup> and PAE has over 6,000 employees worldwide.<sup>37</sup> Given the available resources, the key factors will be examined in light of the capabilities and deficiencies each brings with it.

# Efficiency

The CF has been conducting a high tempo of operations over the past 15 years and has only a limited number of tradespersons able to deploy. Although the military tradespersons are very well trained, many times they lack either a specific skill or knowledge that is required for a mission, or do not have the needed depth of knowledge. As most trades encompass multiple civilian trades, it is impossible to have the breadth and depth of knowledge on all skill sets. If the skill sets are outside of the military capabilities, tapping into the contracts and resources of the CANCAP contractor is the clear option.

As a corporation, CANACP can bring together worldwide resources, experience and local knowledge that the military could not hope to match and maintain for sheer size and scope issues. They may have contacts and local area knowledge already developed in many of the areas the CF may deploy. They have access to professionals and specific technical skill sets that the military does not have in its inventory. These skill sets can be

<sup>&</sup>lt;sup>36</sup> SNC-Lavalin Profac, "Management Services – Welcome," <a href="http://snclavalinprofac.com/indesEng.htm">http://snclavalinprofac.com/indesEng.htm</a>; Internet; accessed 21 March 2005.

<sup>&</sup>lt;sup>37</sup> PAE, "Overview & History," <a href="http://www.paechl.com/overview.html">http://www.paechl.com/overview.html</a>; Internet; accessed 21 March 2005.

brought to an operation, utilized and then quickly re-deployed. The military does not have to make the initial training investment or maintain that skill.<sup>38</sup>

All of the organized Military Engineer elements are based on an approximately 40-person troop or flight of mixed trades. Although this gives a unique flexible capability, it does not give the military tradespersons, especially the supervisors, the experience at managing large, complex, expensive projects. The project management and engineer logistical skills are not developed to the level necessary to run such a large operation. If the task is to beddown a small contingent in one or two small camps, that falls within the parameters of a composite troop of Military Engineers, but not large camps housing a contingent larger than a battalion-sized organization. CANCAP is accustomed to managing very large projects utilizing many sub and sub-sub contractors. They have the ability to contract personnel and services much more quickly than the government. This ability to contract out work is one of the key enablers of the CANCAP organization. Finding this balance of division of responsibilities will be critical. To facilitate this need, training together during peacetime exercises would be one way in which the level of understanding and professionalism is built up.<sup>39</sup>

It must be recognized that contracting out services to CANCAP is not usually a cost saving measure. Contractors are hired for two reasons: to provide services that either reduce the number of military persons who must deploy; and/or bring unique

<sup>&</sup>lt;sup>38</sup> Gordon L. Campbell, "Contractors on the Battlefield: The Ethics of Paying Civilians to Enter Harm's Way and Requiring Soldiers to Depend Upon Them," Joint Services Conference on Professional Ethics 2000 (Springfield VA, 27-28 January 2000), available from <a href="http://usafa.af.mil/jscope/JSCOPE00/Campbell00.html">http://usafa.af.mil/jscope/JSCOPE00/Campbell00.html</a>; Internet; accessed 15 September 2004.

<sup>&</sup>lt;sup>39</sup> Joe A. Fortner, "Managing, Deploying, Sustaining, and Protecting Contractors on the Battlefield," *Army Logistician* 32, issue 5 (September/October 2000): 3-7; <a href="http://atoz.ebsco.com">http://atoz.ebsco.com</a>; Internet; accessed 21 March 2005.

capabilities that are not inherent in the military structure. The efficiencies are made not while on the initial beddown, but in not having to maintain the number of troops and skills set when they are not deployed.

# **Flexibility**

The primary advantage of using military tradespersons is the fact that they are all trained at the basic soldier level first and can protect themselves while doing their technical job in hostile areas. They are working in an environment that they are familiar with and with other members of the military whom they understand and trust. 40 Their training is specifically geared for deployment on that type of mission. As a formed group, they are used to helping each other and hence gain some residual cross training knowledge that allow them to be used in roles that might not be exactly within their job specification. Young tradespersons are led by senior non-commissioned officers who usually have gained a wealth of experience overseas that allow them to be adaptable and overcome problems as they arise. Beddown operations allow the tradesmen to deploy and use their skills in real settings. Even if a contractor could do the jobs, the CF derives a benefit of training and experience that it would not otherwise receive. <sup>41</sup> The tradespersons in the operational units are kept at a level of training and administrative readiness that allow for a quick deployment if necessary. They can be used for a shortterm technical assistance visit or deployed for the long haul. The military ethos and attitude of mind contribute to the can-do attitude that permeates the military member and

<sup>&</sup>lt;sup>40</sup> Campbell. "Contractors on the Battlefield...."

<sup>&</sup>lt;sup>41</sup> Ibid.

the focus is getting the work done right, not just well enough to satisfy a contract and make a profit. They offer unrivaled flexibility to the mission commander.

There is no such attitude or incentive for contract workers. Depending on how the sub-contract is written, there may actually be a personal incentive in pay for dragging out the work over a longer billing timeframe. In the current CANCAP contract, there is a 90-day warning time that is supposed to be given to the contractor. In the face of an immediate operational need, this will not suffice. Even for the 90-day window, their readiness must be monitored, tested and evaluated as part of the contract in order to ensure as best as possible that they will be ready when the call is made. For an initial beddown under tight deployment timelines, the military engineers offer the best flexible response.

# **Operational Effectiveness**

The primary concern for contractors is for their safety and security. The CF does not typically deploy into peaceable regions and there are always concerns about a contractor's security, protection, medical coverage and legal status.<sup>44</sup> This has become of particular importance, as the battlefields we will now find ourselves on will be asymmetric in nature with no rear area where the contractors could safely work.<sup>45</sup> Given this new threat, there will also be a security clearance requirement for access to areas of

<sup>&</sup>lt;sup>42</sup> DND; "CANCAP Project Charter 2001," http://www.forces.gc.ca/j4log/cancap/proj\_chart/main\_e.htm; Internet; accessed 22 March 2005, para 11.

<sup>&</sup>lt;sup>43</sup> Eric A. Orsini and Gary T. Bublitz, "Contractors on the Battlefield: Risks on the Road Ahead," *Army Logistician*, vol 31, issue 1 (January/February 1999): 130-132; <a href="http://atoz.ebsco.com">http://atoz.ebsco.com</a>; Internet; accessed 21 March 2005.

<sup>44</sup> Ibid.

<sup>&</sup>lt;sup>45</sup> Sam Hamontree, "Contractors on the Battlefield: Plan Now or Pay Later," *Armed Forces Journal International* 139, issue 11 (June 2002): 68.

the camp and to ensure trustworthy locals are hired. This will be next to impossible to accomplish if local workers are hired in a failed state. If local tradesmen are hired or local contractors engaged, their capabilities and work quality will be unknown facts that that will have to be carefully monitored. For a mission that is occurring in a high-risk environment, the military engineer is the preferred choice. If CANCAP is used, additional forces will have to be assigned to protect them during their tasks, hence mitigating the savings on personnel that may have been realized. The security and risk factor will have to be seriously analyzed during the mission planning and a command decision will need to be made on what risks will be tolerated. As a theatre is stabilized over time, the contractors may be able to begin to take over maintenance of the camps and any further camp development.

The people are one concern; however, another concern arises from a business perspective. The CANCAP contractor will always be a business whose primary goal is to worry about the bottom fiscal line and make money for their shareholders. They are not supporting the CF for altruistic reasons, but rather for profit. There is little inherent incentive to please their primary customer; that is to say the common soldier. The US Army has implemented a unique solution to the issue by having performance evaluation bonuses built into the contract, with the feedback from the line soldiers carrying the most weight. As it is an arrangement by contract, there is little inherent flexibility to change

<sup>&</sup>lt;sup>46</sup> Major J.M Stephens, "Expeditionary Warfare and the Cheap Camp," *The Royal Engineers Journal* 117, no. 1 (April 2003): 7.

<sup>&</sup>lt;sup>47</sup> Isolde K. Garcia-Perez, "Contractors on the Battlefield in the 21<sup>st</sup> Century," *Army Logistician*. 31, issue 6 (November/December 1999): 40-43; <a href="http://atoz.ebsco.com">http://atoz.ebsco.com</a>; Internet; accessed 21 March 2005.

<sup>&</sup>lt;sup>48</sup> George Cahlick, "Army of Contractors," *Government Executive* 34, issue 2 (February 2002): 43-45; <a href="http://atoz.ebsco.com">http://atoz.ebsco.com</a>; Internet; accessed 21 March 2005.

aspects of the contract. If changes are made, the company will charge a premium to do so. The CANCAP contract will not be the only one on the company's books. In the end, if the situation becomes either unsafe or not profitable enough to make it worth their while, the company can pull out, accept its financial penalties and move on, leaving the military to fend for themselves.<sup>49</sup> The operational mission must be accomplished and the beddown forces must be able to complete the tasks despite the roadblocks and challenges that will present themselves.

#### **The Sole-Source Solution**

While examining the two sets of available resources, it may be asked why the process is not streamlined and the task given either solely to the Military Engineers or a contractor? Solely contracting out the entire process would initially look like a good solution. The CF would not have to maintain forces and skill sets to conduct such operations. The savings in personnel and training could be re-focussed into other areas that are more combat focussed. The contractor could be kept in the wings, on a retainer, ready to be used when needed. This would certainly meet the key factor of efficiency, as the resources would only be used when required. It is also flexible as it allows for focussed contracts and the ability to "increase or decrease available support resources quickly in response to changing requirements." However, another aspect of flexibility is the ability to react quickly within a contractual setting, which may be difficult for a large corporation. The factor that makes this option unfeasible, though, is

<sup>&</sup>lt;sup>49</sup> Garcia-Perez, "Contractors on the Battlefield in the 21<sup>st</sup> Century."

<sup>&</sup>lt;sup>50</sup> Stephen Blizzard, "Increasing Reliance on Contractors on the Battlefield," *Air Force Journal of Logistics* XXVIII, no. 1 (Spring 2004), 5.

<sup>&</sup>lt;sup>51</sup> Joe Fortner & Ron Jaeckle, "Institutionalizing Contractors on the Battlefield," *Army Logistician* 30, issue 6 (Nov-Dec 1998), 11.

that of operational effectiveness. CANCAP can not and will not operate in a hostile environment; it must be permissive. The CF must remain capable of conducting these operations, perhaps more limited in scope, in the event a contract will not do so due to hostile conditions, lack of resources or will or for financial reasons.<sup>52</sup> As it is clear that there must be some military capability, why not maintain the required resources within the CF structure?

The use of contractors to support military forces is not a new phenomenon of the 21<sup>st</sup> century. Contractors have been used to assist armies, particularly in logistical goods, since the 16th century. <sup>53</sup> The recent emphasis on the use of contractors has been due cuts in military establishments, increased sophistication in weapons systems, attempts at achieving efficiencies and political constraints, such as capping the number of armed troops allowed in a theatre of operations. <sup>54</sup> The reality of today is that no military force has the resources to conduct all required aspects without some sort of outside support; not even the superpower of the United States of America. Some countries have moved towards the extensive use of Reservists, including the concept of the *sponsored reservist*, that is giving civilians' Reserve status in order to circumvent some of the Law of Armed Conflict issues. <sup>55</sup> However, these options are not available to Canada at this time due to the size and structure of its Reserve Force. So neither a solely military nor solely

<sup>&</sup>lt;sup>52</sup> Fortner & Jaeckle, "Institutionalizing Contractors on the Battlefield," 11.

<sup>&</sup>lt;sup>53</sup> Martin van Creveld, *Supplying War: Logistics from Wallenstein to Patton* (Cambridge: Cambridge University Press, 1977), 7-8.

<sup>&</sup>lt;sup>54</sup> Blizzard, Increasing Reliance on Contractors..., 4.

<sup>&</sup>lt;sup>55</sup> Ibid., 11.

contractor option is feasible at this time. The right mix of military engineers and civilian contractors must be brought together to ensure mission success.

#### **CONCLUSION**

The Canadian government will continue to exert its influence in world events by deploying military troops to trouble spots in the world. It appears that the pace of deployments of the CF over the past 15 years will only continue. The CF must be ready and capable of deploying its forces overseas and successfully executing a force beddown to allow the force to execute the task that it was designed to do. The examples of previous recent beddown missions highlight the mix of variables and the unique nature of each mission. Flexibility is key to meeting the new challenges offered at each new mission. The CF doctrine clearly mandates the CME Branch to lead the beddown process and be able to use all resources at its disposal. The Branch is structured with key capabilities within its trade and organisational structure. The recent introduction of the Joint Support Group into the Theatre Activation Team process has given a clear, coordinated, national focus to the issue. The awarding of the CANCAP contract to SNC-Lavalin/PAE has now put into place the ability to tap into resources well above those available to the CF, allowing for a more efficient approach to some unique, non-core skills. Both the CME Branch and CANCAP bring with them inherent capabilities and limitations; which must be recognised. The key enabler for a successful force beddown operation is to harness and reinforce the strengths of each entity and to properly apply it to the problem. In the examination of the total package, it is clear that the military must have the capability to lead and execute force beddown options. The military must be able to do so, as there may be hostile situations where contractors can not be used. The

military must also be able to manage large contracts and integrate the CANCAP resources into the plans at an early stage. Good co-ordination and co-operation in addition to mutual respect will be key to put the entire package together. The CME will never be large enough to conduct a large force beddown with its own integral resources and must embrace the use of contractors on the battlefield, always being cognisant of their limitations and being prepared to adapt them to the situation. There are many legal, ethical and organisational issues that are of concern in using contractors on the battlefield, but are beyond the scope of this paper. Contractors on the battlefield are here to stay and it is vital for the military to learn how to best use this resource. For force beddown, the Canadian Military Engineers must maintain the lead on the issue, but fully embrace the concept of CANCAP as a force multiplier, not a competitor. The right mix of military engineers and civilian contractors will lead to an efficient, flexible and operationally effective force ready to execute beddown operations across the globe for the Canadian Forces.

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