ADVICE FROM THE CANADIAN ASSOCIATION OF DEFENCE AND SECURITY INDUSTRIES (CADSI)

TO THE MINISTER OF INDUSTRY

ON THE GOVERNMENT'S INDUSTRIAL AND REGIONAL BENEFITS (IRB) PROGRAM

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EXECUTIVE SUMMARY

CADSI is pleased to respond to the request from the Minister of Industry for advice from the defence & security industry on the effectiveness of the Industrial and Regional Benefits (IRB) policy and its implementation.

In conducting our study we collected input from a representative group of 34 companies across the spectrum of the IRB program, including: foreign and domestic OEMs and other companies with direct and flow through obligations; domestic companies including SMEs that are the recipients of IRBs; and, Canadian companies that are active in the international marketplace and who therefore work directly with the offset programs of other countries.

The Problem: Canada was one of the first countries to introduce an offset (IRB) program. Today however, and despite the 2009 changes to the program, its IRB program from both a policy and program management perspective is not competitive with offset programs that exist in many other countries. This is a problem because IRB credits are the result of investments in the economy that represent value and are seen as a ‘commodity’ by those who carry obligations through their sales of defence and security materials around the world. This means that a company’s willingness to invest in strategic technology and sustain business activity in a country beyond the life of an obligation depends directly on how competitive or attractive Canada’s offset program is vis a vis those of other countries. Canada’s IRB program, therefore, plays multiple roles in this environment. It is a manager of domestic obligations for a domestic or foreign OEM, an advocate of economic development in Canada of national interest and, it is an enabler of Canadian industrial success in international markets. These multiple roles need to create a climate that will attract and retain the investment and business presence of major corporations interested in the Canadian defense and security market.

Canada’s defence and security industry makes an important contribution to Canada’s prosperity and international competitiveness - it generates annual revenues of $12.6 billion, half of which is derived from exports, and provides 109,000 full time jobs. The Canada First Defence Strategy (CFDS) presents a once in a generation opportunity to grow these contributions significantly.

However, our study concludes overwhelmingly that:

- The IRB program is not being provided the broad government policy support that it needs for success;
- That while improved in principle in some areas since 2009, the IRB program is inadequate overall from a policy perspective because it does not provide incentives for industry to be creative and take the calculated risks that are part of the decision-making process;
- The IRB program is being managed and implemented in a way that will not produce the intended results; and,
- Because of these problems, the IRB program will not maximize economic benefits to Canada, and, by discouraging some companies from bidding, may be restricting the Canadian Forces ability to access capabilities that fully meet their operational requirements.

Unless the IRB program offers a more positive, progressive, competitive policy environment
and much more practical, business-friendly management practices, it will not achieve the government’s objective of maximizing jobs, developing unique technological innovations and creating maximum economic activity in Canada from defence and security spending.

Government can ensure that the full potential of offsets related to CFDS is achieved by adopting two sets of recommendations:

- First, the Canadian government should commit to securing long term industrial and economic benefits from military procurement by providing the IRB program with the broad government policy support it requires to be successful; and,

- Second, the policies and implementation of the IRB program should be reformed to provide: the business climate required to attract investments; and, the Canadian business opportunities required to drive industrial and economic benefits.

**Recommendation 1:** Provide the broad government policy support required for the IRB program to succeed through:

a. Develop with industry a defence and security industrial strategy framework that seeks to leverage defence and security procurement to maximize jobs, develop unique technological innovations, and create the business climate required to generate maximum economic activity in Canada from defence and security spending by exploiting Canada’s industrial strengths and emerging capabilities;

b. Engage the government’s industrial development programs to support achievement of the industrial and economic development objectives in the framework (these programs could include IRB, SADI, IRAP, regional development agencies, BDC, CCC, EDC, the Office of Small and Medium Enterprises (OSME) at PWGSC, and the International and Industry Programs Directorate (DGIIP) at DND);

c. Cabinet to approve an industrial and economic development plan for major procurements at the options analysis phase of the procurement, before preliminary project approval (PPA) is requested from Treasury Board; and,

d. Include points for the bidder’s IRB proposal on the rated requirements in the procurement process for major procurements.

**Recommendation 2:** Reform the IRB policy and implementation process to create the business climate required to attract the investments and business opportunities that will drive future industrial and economic benefits for Canada through:

a. Build on the 2009 IRB policy changes and make new policy changes:
   
   - Implement the planned new policy framework for cash and in-kind investment in R&D and commercialization at SMEs;

   - Stimulate increased Canadian business opportunities in priority capability areas by implementing policy improvements to each of the 2009 policy changes including:
- Work with industry to broaden the scope of technologies in the Enhanced Priority Technology List (EPTL);
- Implement the recommended improvements to banking and pooling that are identified in this report;
- Increase prospects for SMEs to secure successful collaborations with obligors by providing enhanced incentives for obligors to work with SMEs, and by providing more targeted information and support to SMEs from industrial development programs; and,
- Support Canadian business exports and reduce inefficiencies by introducing trading, swaps and abatements of IRB credits.

a. Reform the process for implementing the IRB policy to make it more effective:
   - Speed up and enhance the effectiveness of the IRB decision-making process by:
     - Empower and equip IRB managers to make business decisions in a more open and productive environment with a focus on anticipated outcomes;
     - Increase the role of the Industry Sector of Industry Canada, DFAIT, and the regional development agencies in IRB decision-making to bring more of an industry development approach;
     - Scale back the onerous and time consuming verification and crediting processes currently being employed and focus more on assessing the outcomes of business transactions and investments;
     - Streamline reporting processes and implement a new computerized reporting and information retrieval system to improve efficiency and facilitate outcome assessments;
     - Implement performance standards for the timing, transparency and industry feedback in the responses from the IRB Directorate; and,
     - Create an off-line IRB appeal process;
   - Expand IRB promotion/education activities within the defence and security industry, and in government with the Industry Sector, the industrial development programs, including the regional development agencies, and with the OSME office at PWGSC and DGIIP at DND;

b. Publish an annual or bi-annual evaluation of the economic benefits created by the IRB program; and,

c. Carry out ongoing collaborations with industry on how government policies and programs can be improved.
1. INTRODUCTION

CADSI has carried out a review of Canada's Industrial and Regional Benefits policy and its application in response to a request from the Minister of Industry. The scope of the review centers on the development of answers to the following four questions:

1. Do the stated goals and underlying principles of Canada's IRB policy maximize jobs, innovation and economic activity in Canada's defence and security sector?

2. Consider the impact of the October 2009 changes (announced or implemented) to the IRB policy on Canada's defence and security sector specifically, and on the Canadian economy more generally. Have the 2009 changes affected, in a positive way, how the program is being managed and have they resulted in improved outcomes for Canada's defence and security sector e.g. access to global supply chains and export opportunities; encouraging indigenous innovation; development and sustainment of technology clusters/centres of excellence?

3. What changes would you propose to Canada's IRB policy, to the program’s strategic and critical technology lists and/or to the management of the policy to advance the interests of Canada's defence and security industries e.g. rating IRBs vs pass fail; accounting for and publicly reporting on jobs and economic activity generated within Canada's defence and security sector; establish domestic industrial objectives as part of the approval of project definition funding?

4. How could you use the IRB program to incent global defence contractors to develop global lines of business from Canadian soil?

In addition, CADSI was invited to comment on government policies and programs broader than the IRB policy itself that have a bearing on the achievement of Canadian industrial and regional benefits in the defence and security industries.

In conducting our study we collected input from a representative group of 34 companies across the spectrum of the IRB program, including: foreign and domestic OEMs and other companies with direct and flow through obligations; domestic companies including SMEs that are the recipients of IRBs; and, Canadian companies that are active in the international marketplace and who therefore work directly with the offset programs of other countries.

The process CADSI employed to assemble expert advice comprised the following five steps:

- An open solicitation of CADSI member company written advice via a questionnaire and/or the submission of a company white paper;

- Interviews of a selected, representative group of defence and security industry companies

(In total 41 companies were contacted and 34 provided written and/or verbal advice for the review. A description of the survey and summary of the views)
expressed by companies in the defence and security industry is attached as Annex A);

- The preparation of advice from a Working Group of IRB experts from the defence and security industry assisted by two Project Managers;

- Review by the CADSI Small Business and Government Relations Committees; and,

- Approval by the CADSI Board of Directors.

This paper outlines the challenges and opportunities facing Canada related to industrial and regional benefits derived from defence and security procurement, and proposes specific policy and program changes required for Canada to achieve increased value in the innovation, economic and employment benefits derived from its IRB policy.

There is an overwhelming recognition among defence and security companies of the important role that Canada’s IRB policies have played in the evolution of our industry, together with a sincere commitment to ensure that this influence is strengthened in the future. However, there is equal consensus that a more forward-looking and ambitious IRB policy is required and that this would yield far more valuable benefits to both the industry and the national economy.

Culturally, government and industry have become separated, and tending almost to an adversarial, contractual relationship on IRB matters, which is highly counter-productive. IRB projects should ideally be a grand collaboration between government and industry, with government having the ability to attract business into our economy, and industry having the skills and motivation to best exploit these opportunities.

Our suggestion is that we work together to create this healthy cycle, and while retaining the essence of the recent policy enhancements, work cooperatively to design a higher level of incentives and outcome targets with a streamlined, time-efficient set of processes that allow us to maximize the net advantage to our economy, and equitably allocate risk, in accordance with those best equipped to manage it.
2. THE PROBLEM, AND ELEMENTS OF A SOLUTION

Canada was one of the first countries to introduce an offset (IRB) program. Today however, and despite the 2009 changes to the program, its IRB program from both a policy and program management perspective is not competitive with offset programs that exist in many other countries. This is a problem because IRB credits are the result of investments in the economy that represent value and are seen as a ‘commodity’ by those who carry obligations through their sales of defence and security materials around the world. This means that a company’s willingness to invest in strategic technology and sustain business activity in a country beyond the life of an obligation depends directly on how competitive or attractive Canada’s offset program is vis-à-vis those of other countries. Canada’s IRB program, therefore, plays multiple roles in this environment. It is a manager of domestic obligations for a domestic or foreign OEM, an advocate of economic development in Canada of national interest and, it is an enabler of Canadian industrial success in international markets. These multiple roles need to combine to create a climate that will attract and retain the investment and business presence of major corporations interested in the Canadian defense and security market.

Canada’s defence and security industry makes an important contribution to Canada’s prosperity and international competitiveness - it generates annual revenues of $12.6 billion, half of which is derived from exports, contributes $9 billion annually to GDP, as well as 109,000 full time jobs. For every $1 billion in new defence and security revenue earned by Canadian firms:

- GDP expands by $710 million
- An additional $1 billion in export revenue is created
- 18,000 jobs are created or sustained

The Canada First Defence Strategy (CFDS) presents a once in a generation opportunity to grow these contributions significantly.

However, our study concludes overwhelmingly that:

- The IRB program is not being provided the broad government policy support that it needs for success;
- That while improved in principle in some areas since 2009, the IRB program is inadequate overall from a policy perspective because it does not provide incentives for industry to be creative and take the calculated risks that are part of the decision-making process;
- The IRB program is being managed and implemented in a way that will not produce the intended results; and,
- Because of these problems, the IRB program will not maximize economic benefits to Canada, and, by discouraging some companies from bidding, may be restricting the Canadian Forces ability to access capabilities that fully meet their operational requirements.

Unless the IRB program offers a more positive, progressive, competitive policy environment and much more practical, business-friendly management practices, it will not achieve the government’s objective of maximizing jobs, developing unique technological innovations and creating maximum economic activity in Canada from defence and security spending.
Elements of a Solution

Certain unambiguous, consensual elements of a solution flow from the views and judgments of industry experts:

- The goals of the IRB policy are appropriate, but they need to be imbedded within an industrial strategy for the development of the Canadian defence and security industry which engages the active coordinated support of the government’s key industrial development and export promotion programs;

- The IRB policy has been improved by the 2009 changes but the current management practice and interpretation of how to implement the enhancements are unlikely to produce the government’s desired outcomes, and significant additional improvements are required to design more internationally competitive incentives and to engage support from industrial development programs;

- The effort to attract valuable offsets from defence and security procurement has an international competitive dimension. To be successful a country must have not only competitive companies, but also a competitive investment climate and offset incentives relative to other countries that are also trying to attract investments and global value chain (GVC) products. Global defence and security companies try to focus more of their long-term commercial investments in those countries that offer, within acceptable risk parameters, the greatest commercial potential over the long term.

This commercial logic also applies to the actions of domestic obligors who, although firmly rooted in Canada, are likely to be global companies as well, with investment opportunities and offset obligations in other defence and security and commercial markets to consider. IRB policies need to recognize and promote the export potential associated with domestic obligors.

- The Canadian IRB policy does not appear to be as competitive as the IRB policies in leading developed countries (Annex B compares key IRB policy features between Canada and some leading developed and developing countries). Also, Canada represents a relatively small domestic defence and security market compared with the G-7 countries. Canada will need to be ambitious in targeting higher value global export niches if it is to have long term success. This will be difficult to accomplish under current IRB rules that are viewed by industry to be more “restrictive” than similar programs offered by our international peers. The current approach serves more to incent tactical rather than strategic actions by our obligors.

- In addition to being contract obligations, IRB credits are also business assets and investments and need to be treated as such by administrators – this implies banking (but without depreciation), pooling, and the transferability of credits through trading, swaps and abatements – the aim of these being to create and sustain business activity in Canada in key industrial capabilities that make business sense to obligors and recipients alike, and that stimulate exports;

- If technology transfer and capability clusters/centres of excellence are a high priority target for Canada, particularly in key capability areas, then this will require a much different position vis a vis multipliers and incentives - we are competing against the
world for obligor commitments on technology transfer – we have to have an IRB program that, on a relative basis, encourages not discourages their activity in this area. This issue is first and foremost about strategic national interests. It is also about increasing the participation SMEs, including high technology research intensive SMEs;

- Current management practice for the implementation of the IRB policy needs to become less contract-administration-focused and more business development oriented and business savvy; less prescriptive on mechanisms to generate benefits and more focused on desired outcomes and collaboration; less bureaucratic and burdensome, and more streamlined with computerized reporting, faster response times, less guesswork, more useful metrics and a simplified, less onerous IRB system for smaller projects. IRB managers should have a mandate to exercise more business acumen and be more business development aware as well as exercising the role of contract managers, and the Industry Sector and industrial development and export promotion agencies should be more involved in IRB decision-making – the current environment is not conducive to creating strategic, sustainable business activity in Canada in key capability areas.

- Government should do more to promote the IRB program within industry, the financial sector, and within government, and should publish an annual or bi-annual public report on the economic impacts of the program.

- Government and industry need to work closely together in ongoing collaboration to propose new policies and approaches to increase the value of IRB benefits in Canada.

The next sections of the paper provides specific advice and proposals on how the IRB policy and its administration can be improved to drive higher quality, sustainable industrial benefits that will expand innovation, economic and employment growth decades into the future. These proposals will allow government to maximize the economic returns to the country from the government’s increased commitment to investing in our armed forces.

Government can ensure that the full potential of IRB offsets related to CFDS is achieved by adopting two sets of policy proposals:

- First, the Canadian government should commit to securing long term industrial and economic benefits from military procurement by providing the IRB program with the broad government policy support it requires to be successful; and,

- Second, the policies and implementation of the IRB program should be reformed to provide: the business climate required to attract the investments; and, the Canadian business opportunities required to drive industrial and economic benefits.
3. BROAD GOVERNMENT POLICY SUPPORT FOR THE IRB PROGRAM

The current overall goal of the IRB policy is stated as:

*It is the intent of (the IRB Policy) that (identified) projects provide industrial and regional benefits that will contribute to the continuing viability of Canadian companies’ capabilities in high technology manufacturing and services and to improve their ability to compete in both domestic and international markets.*

The goals of the IRB policy are appropriate, but they need to be imbedded within an industrial strategy for the development of the Canadian defence and security industry that engages the active coordinated support of the government’s key industrial development programs within the Industry Portfolio.

This strategy should identify a series of broad key industrial capabilities (like shipbuilding) where Canada is on a path to becoming more world-competitive and/or where the development of new world competitive capacity is a national priority (much as the government’s S&T Strategy identifies a series of national priorities for S&T investment). Industry Canada is the government responsibility center for Canada’s national industrial interests and should take responsibility for the development of such a strategy. The IRB program could then embrace a policy of achieving strategic outcomes that produce sustained business activity in key industrial capabilities that are of national interest to Canada.

The federal instruments employed to stimulate and promote industry (IRB, SADI, IRAP, regional development agencies, BDC, CCC, EDC), the Industry Sector of Industry Canada, the Office of Small and Medium Enterprises (OSME) at PWGSC, and the International and Industry Programs Directorate at DND (DGIIP) are all useful in their own right, but they act independently and fail to achieve the required synergies for success. There is a compelling case for a far more integrated approach, built around a national defence and security industrial strategy. IRB is but one component of such an integrated approach, but it is the key enabling component, particularly the context of maximizing benefits from the expenditures associated with the Canada First Defence Strategy (CFDS). In order to bring a more cohesive and effective approach to maximizing the economic benefits from military procurement, the Industry Sector of Industry Canada assisted by the above agencies needs to play an increased role in bringing more of an industry development focus to decision-making in the IRB program.

This can help to make SMEs and regional industries more attractive in the first instance to obligors. It can also reduce the adversarial element in the obligor/recipient relationship borne of the imposition by government of parameters and targets without either sufficient coordinated government support, or, through in-kind and investment credits, obligor marketplace support. Government should explicitly target IRB-related business opportunities and emerging new industrial capabilities in these other federal industry development instruments.

We also need a more coherent process for identifying and pursuing clear Canadian industry development priorities in the procurement process. DND and PWGSC are the two departments most involved in carrying out early options analysis and proposing a procurement strategy, but it is Industry Canada that has the mandate for industry development and IRBs. To provide a more coherent approach Cabinet should have the
opportunity to approve a proposal from the Industry Minister for a Canadian industrial benefit plan prior to the completion of the options analysis, procurement strategy and PPA stages of the procurement process.

Despite the government’s stated good intentions, the IRB program is not achieving the desired results. The program as currently structured is not really stimulating the kind of IP/technology transfer to create innovation and export prowess.

Part of the reason for this is that the IRB program under the current pass/fail system is not having any meaningful effect on the government’s buying decisions, and companies know that. The belief in industry is that no company will risk losing a bid on something DND wants because of a weak IRB plan.

IRBs can be made more relevant if the IRB plan is rated in the procurement process. Then companies start to pay more attention and view IRBs as a truly important part of the bid. This, coupled with a few other enhancements such as multipliers, gives bidders a chance to be more competitive in the bidding environment versus their competitors by offering better IRB transactions. Making the Canadian industrial development proposal a real determining factor in a bid will create the right behaviours.

With respect to SME participation, the 15% SME target does nothing to address obligor risk and obligator reluctance to deal with SMEs, and the new investment framework is not likely, by itself, to motivate obligors to change their behaviour. Rating, coupled with more significant investment incentives will achieve the objective.

The process for rating IRB plans should be implemented in a manner that is consistent with normal business practices. Rating IRBs will introduce additional work, but CADSI believes that rating is worth the return on investment. Since we would all have to learn along the way, it might make sense to start with a pilot project – maybe FWSAR, maybe something else.

Unless these constraining influences are dealt with – the preparation of a defence and security industry strategy, Cabinet approval of a Canadian industry participation and development plan prior to the PPA approval stage, and rating IRB plans – improvements to the IRB program will be of little value.

**Recommendation:** Develop with industry a defence and security industrial strategy framework that seeks to leverage defence and security procurement to maximize jobs, develop unique technological innovations, and create the business climate required to generate maximum economic activity in Canada from defence and security spending by exploiting Canada’s industrial strengths and emerging capabilities;

**Recommendation:** Engage the government’s industrial development programs to support achievement of the industrial and economic development objectives in the framework (these programs could include IRB, SADI, IRAP, regional development agencies, BDC, CCC, EDC, the Office of Small and Medium Enterprises (OSME) at PWGSC, and the International and Industry Programs Directorate (DGIIP) at DND);
Recommendation: Cabinet to approve an industrial and economic development plan for major procurements at the options analysis phase of the procurement, before preliminary project approval (PPA) is requested from Treasury Board; and Industry Canada to take on the responsibility of producing an annual or regular update on the “strength of Canada’s defence and security industrial base to meet Canada’s national interests” and the effectiveness of the IRB policy in advancing this objective;

Recommendation: Include points for the bidder’s IRB proposal on the rated requirements in the procurement process for major procurements.
4. BUILD ON THE 2009 IRB POLICY CHANGES

In this section we consider what can be done in the following eight IRB policy areas to achieve more high value, sustainable, export-successful business outcomes. We begin the discussion of each topic with a consideration of the relevant policy changes announced in 2009 and then move on to consider further specific policy change required in each of these areas:

- Investment incentives
- Phasing in the identification of eligible IRB activities
- Incenting public private consortia
- Promoting the participation of Canadian companies in global value chains (GVC)
- Strategic plans and pooling
- Banking
- Enhanced priority technology list (EPTL)

And the recently added commitment for

- SME participation (the 15% target)

There has been insufficient experience with the 2009 changes to undertake detailed quantitative analysis of the impact of the changes based on documented factual data. However, the CADSI company representatives that participated in formulating this IRB policy advice are world-class experts in the application of IRB policies, not only in Canada but also around the world. The policy positions and conclusions presented here are based on the valuable judgments of these experts.

The consensus among industry experts is that the 2009 changes are useful and represent movement in the right direction, but they do not go far enough to make a significant difference in the decision-making of global defence and security contractors on how much to invest in Canadian-based industrial operations, and in particular, whether to invest in long term, higher value global-targeted products supplied from Canada. The 2009 policy changes are not close enough to best practices in the international offset marketplace, and do not address sufficiently the need to help make the business relationships between SMEs and large defence and security contractors more productive and successful.

4.1 Investment incentives

CADSI is aware that Industry Canada will soon decide on a new investment framework for encouraging obligors to invest in long-term, innovation-focused activities in Canadian SMEs. The objectives of this new incentive are to establish long-term, strategic relationships with primes, leading to increased R&D activities, market-driven technology development and more robust business development approaches. This new policy can potentially play a key role in helping to realize the types of cooperation between primes and SMEs required to drive innovation and the establishment of new global areas of Canadian competitiveness.
This new policy should be implemented as soon as possible. It is important to understand that an obligor likely only has a certain amount of investment dollars available. These monies are typically dispersed to international offset programs, including in Canada, where the obligor will achieve the greatest IRB/offset credit return and business return for the monies invested, and at the least risk. If Industry Canada continues with the current IRB investment policy, they will have little success in attracting IRB investment monies because the obligor will invest internationally instead of in Canada.

**Recommendation:** Implement the new investment framework.

### 4.2 Phasing in the identification of IRB activities

Phasing-in the 60% up front requirement has been beneficial to most proposers in recent files. It makes the overall approach to achieving a 100% IRB contribution somewhat less intimidating and provides a level of flexibility for companies to reshape their plans en-route to the close of year one into a program. As the commitment to the 100% never changes, the means by which they are achieved allows IRB managers and their supply management counterparts to implement the required strategies to seek out additional partners going into year two, or to replace any non-performers picked up in year one.

Phasing in reduces bid preparation costs and increases the likelihood of more realistic and doable projects. Companies have limited budgets for bid preparation and far more budget after contract award. So phasing is more cost effective and provides lower risk in a proposal. It also minimizes coordination and renegotiation between IC and the obligor when projects change, as they will. Also, putting together creative projects (investments, R&D, technology transfer, etc.) is almost impossible to arrange without a contract in place. Obligors do not want to go to great lengths in this area without knowing there is a real requirement/benefit.

While phasing in is sound and beneficial in principle, the IRB program design pays insufficient attention to the overall span of the program. OEMs view their participation in a large project as a 20-plus year continuous process, not a disjointed series of short-term contracts. If one takes the long-term view, then the establishment of supply chains, the building of collaborative relationships, and the investment in broader infrastructure can proceed at a pace that produces an optimal, sustainable result. The business realities involved in structuring and implementing productive business collaborations and investments need to be better appreciated by IRB managers.

### 4.3 Incenting public private consortia (PPC)

This is a creative approach that can potentially achieve success in generating innovative development, investment/support for SMEs, technology transfer and resulting employment. It is structured in such a way that obligors are only going to do a project where their R&D need is real and beneficial to the company. However, it is often difficult to find a beneficiary that is willing or capable to invest enough funds to commit to this type of program. This policy could be more effective if the obligor received a higher multiple (e.g. 10 times or higher) on their investment and were not limited to matching the SME’s investment value. If an OEM is willing to share his IP amongst concerned parties, then he should be provided with an appropriate incentive to do so, over and above any benefits derived from future sales, as there are no guarantees that future sales may actually happen.
The Crown should not be too prescriptive on the content of a PPC, should provide higher multipliers, avoid making marriages that do not work, should allow industry to innovate here, and judge proposals on the value of the anticipated outcomes. For example, the policy would be more effective if it accommodated the fostering of technology transfers, not only among industry, academia and research, but also by incentivizing the use of SME or small technology incubators to take a technology to the next level, and by supporting consortia that do not involve academic participants.

**Recommendation:** Stimulate the creation of more, and more effective PPCs by increasing the multiplier, eliminating matching, broadening the PPC definition (e.g. to industry-private research organization PPCs), judging PPCs on the basis of anticipated value, and incenting SMEs to move to the next technology development level.

### 4.4 Promoting the participation of Canadian companies in global value chains (GVC)

The 2009 change to expand the definition of GVC work to include work on other major platforms is a good idea that allows obligors to develop and bid better IRB projects. The IRB policy defines ‘global value chain’ (GVC) as follows:

> “Global Value Chain” means a platform which is similar to the platform being proposed for a particular project, which has a market potential (measured by market size and longevity) equal to or greater than the platform proposed for a given project, and offers significant opportunities for technological advancement, growth in the level of system integration, small and medium-sized business (SMB) participation, and has large-scale and sustainable acquisition and/or sustainment opportunities.

This definition of GVC is too ambiguous and restrictive; it should be broadened and made clearer. Any use of a Canadian supplier in a similar product should be included in the definition if Canada wants to capture more work from the OEMs and their suppliers. If an obligor could use more components and services from Canadian companies for IRB credits, this would encourage obligors to broaden their search. Also, the current GVC provisions would encourage more access to value chains if there were more focus on providing materials and components rather than the assembly of parts.

In an initial given program, the elements of direct IRB for GVC will become saturated within the first three to five years of an acquisition program. As these begin to drop off, there should be a consideration for related indirect IRB to be attributable to GVC. An example would be on a vehicle platform, whereby the supply of a military vehicle will be on the horizon for export to a foreign country, so the technology employed for use of the Canadian vehicle will receive a direct IRB credit against a GVC scenario. Should the Canadian component for the military vehicle be utilized on a commercial vehicle that will be exported, then a credit should be attributed to that component, as well, due to the fact it was deployed as part from the obligor to the recipient. Similarly, an increased focus on indirect benefits would help Canadian companies to participate in major opportunities outside Canada with products and capabilities where they are strong.

**Recommendation:** Stimulate the participation of more Canadian companies in high-value global value chain (GVC) production by broadening and clarifying the GVC definition, increasing the focus on supplying products and services vs assembly, and attributing GVC credit to related indirect benefits achieved.
4.5 Strategic plans and pooling

The element of strategic plans can be a beneficial experience for IRB obligors, but the single most important part of the strategic planning policy change is the ability to bundle or pool programs. All companies have strategic plans, so the question is whether a company wants to develop and share an IRB portion of its strategic plan. Over the longer-term horizon, strategic IRB planning could play a paramount role for planning purposes. Beyond just the paper itself, it necessitates some important changes within the corporation as to how it operates, purchases, manufactures, services and supports.

The scope of the 2009 pooling change associated with strategic plans should be broadened and made easier to access. Without effective pooling, IRB activities are identified for specific projects and they can only be used on the specific project for which the activity was identified and proposed. This is a disincentive for companies to identify activities that would have long-term high dollar value results (beyond the current commitment). The potential for pooling via corporate supply chains can lead to greater amounts of Canadian-sourced procurements. With effective pooling, banking and swaps (to be discussed later) government can be more ambitious in setting goals and outcomes because it will have created more favourable IRB incentives that are fully competitive with other advanced economies and that will incent investment in higher value, sustainable industry capabilities and technologies.

**Recommendation:** Achieve more, higher value business outcomes for Canadian companies that reach beyond a particular project by broadening the scope of pooling and making it easier to access;

4.6 Banking

The new 2009 banking provisions are a good start but major improvements are required to generate the full scope of the intended benefits.

The timeframes are too short. Depending on the program undertaken, there may never be an opportunity for some companies to utilize their banked activities since once the acquisition for their product is completed, the next RFP they could bid on may be 10 to 15 years down the road. The current approach allows for a maximum of five years on a declining scale. Depreciation works against IRB goals and should be eliminated or pushed out to 10 years with a residual amount in the 10th year that could be carried forward for a remaining five years. This would make Canada more competitive with countries that do not depreciate banked credits.

Real banking with transferability and with the earlier establishment of pre-contract banking would encourage more proactive and possibly larger and longer IRB projects, as there would be an outlet for surplus IRB credits. This would certainly significantly increase the likelihood of meeting the objectives.

**Recommendation:** Stimulate more proactive, larger and longer IRB projects by eliminating banking depreciation or pushing it out to ten years, and introduce transferability and earlier pre-contract banking.
4.7 Enhanced priority technology list (EPTL)

The 2009 EPTL policy is a useful advance, but the range of technologies covered is too narrow. The scope of EPTL investment areas needs to be expanded to new technology classes and to include industrial investment opportunities with the potential to drive more benefits. This would help to make Canada a more attractive investment destination.

Expanding the scope of EPTL should be achieved via an open, collaborative process between government and industry that could include IC, DND, CADSI, and government and university R&D centers. The collaborative process could be designed to keep both government (DND) and industry confident that their R&D is kept confidential. The current requirements that appear on this list are narrow and may be dated by three to five years due to the need to evaluate a technology and the time it takes to get it accepted, adopted, planned for and budgeted before going out for proposal. This initiative also needs incentives to make it more attractive to obligors.

More generally, greater emphasis could be placed in the IRB program on the “intellectual quality” of a transaction. Some obligors operate in a very sophisticated, knowledge-based environment where the transfer of IP and establishment of Canadian centers of excellence can reach well beyond the basic provisions in the IRB rules, and can have profound implications for Canadian high-technology sectors. Current IRB rules provide no “multiplier” to incent such visionary, beneficial actions.

Recommendation: Expand the innovation and industry growth potential of the enhanced priority technology list (EPTL) for Canadian companies in key technology capability areas by dramatically expanding the scope of the technologies in EPTL via an open collaborative process with industry, providing attractive incentives, and placing greater emphasis on the ‘intellectual quality’ of a transaction.

4.8 SME participation

Large business typically view SMEs as a higher risk; however, there are insufficient incentives within the IRB Policy to offset this risk and reward obligors for more actively engaging with SMEs. Small business set-asides, such as requiring a mandatory percentage of the obligation to be fulfilled through SME IRBs, do not address the risk equation of the obligor. More policy actions are required to complement the 15% target.

In addition, while Canadian SMEs have proven they can be competitive when given an opportunity to participate in the supply chains of larger organizations, there exist certain barriers to market which the IRB Policy does not address that establish a disincentive to work with SMEs.

The government can increase the participation of SMEs in high value business opportunities by taking the following policy actions:

- The obligor is required to assume all risk for “strategic” IRBs, with investments, technology transfers, market development, and R&D being credited only on the basis of success. Since SMEs are perceived as higher risk this results in fewer strategic transactions with SMEs. This risk equation should be rebalanced;
SME participation in global value chains provides a significant benefit in access to new global markets and a reduced sales cost. However, most large obligors manage IRB or offset obligations in many nations. The transfer of supply sourcing from a Canadian SME to another country is more easily accomplished than replacing a large incumbent supplier. The current application of the IRB eligibility criteria, and in particular incrementality, needs to change to provide an incentive for obligors to retain business with Canadian SMEs;

The IRB Policy enhancements have effectively established more rules than incentivizers for industry. The banking and GVC enhancements do provide some encouragement, but the “rules” significantly reduce the potential number of SMEs and types of business activity that can be developed. The consortia enhancement is a highly complex type of IRB where an SME could be the Canadian company participant. However, how the consortia “rules” will support SME participation and establishment of a viable business case for the consortia parties is unclear. IRB entry “rules” for consortia should be flexed with an increased focus directed to targeting and evaluating practical outcomes;

- Incorporate the rating of IRBs into the procurement process as discussed in Section 3.

- The SME sector is recognized as the growth engine of Canada. The enhanced priority technology list highlights technologies of the future of interest to the Department of National Defence (technology readiness level TRL 1 or 2), yet the IRB crediting does not acknowledge the risk and long-term development cycle. Modifying the IRB crediting to share the risk across a wider TRL range would support the creation of more high technology commercial capabilities from the critical technology list;

- The current IRB policy provides limited benefit and support to Canadian industry’s capability to export. Measures should be implemented to provide additional benefits to assist Canadian industry in the global competitive environment. Many global IRB obligors have extensive international market footprints but the current IRB policy limits the benefits of market access assistance from the obligor to Canadian companies. Most other countries with offset requirements recognize and accept marketing assistance as a tool to promote international trade for the domestic industry. Exports could be further supported by using EDC and CCC to provide guarantees and/or insurance to Canadian companies, and especially to SMEs. This would help SMEs actualize the results they are capable of after receiving investment and business expertise advice from obligors;

- The success of SMEs in global markets is often accompanied by an IRB (offset) obligation to other nations. Recognition that preservation of economic value in Canada is as important as the development of new economic value is needed. In keeping with the role of Industry Canada to develop and promote a domestic defence industrial strategy that enhances exports, the IRB Directorate should support trading and swaps with other nations, particularly for SMEs.

The government can also take actions to support the participation of SMEs by improving the effectiveness of the IRB implementation process:

- The focus of Industry Canada as a ministry needs to evolve from a concern with whether IRB eligibility criteria have been achieved, to include the roles of a business development partner and advocate for Canadian SMEs;
- Access to lower-tier technical requirements of the defence project and technical specifications is managed through DND and the Prime. Industry Canada could play a greater advocacy role to identify work packages for which SMEs could quality and secure access to technical data to support their direct participation;

- Permit longer term reporting and crediting without penalty to enable business relationships to continue;

- Confirm up-front disclosure of exactly what credits (and crediting methodology) will be applied for strategic IRBs;

- Establish what types of business activities are eligible to be performed in fulfillment of an obligation, and allow industry the flexibility to structure the activity in their best interests. Make the rules for investment, banking and GVC less prescriptive. Increase the benefits (crediting) for obligors to engage with SMEs to enhance the business case for all parties;

- The IRB Policy involves an administrative burden for SMEs. Canadian SMEs are the beneficiaries of the IRB Policy, yet verification requirements are onerous. Duplication of effort for the calculation of Canadian Content Value could be reduced through recognition of other government departments CCV or “Made-in-Canada” product designations.

Recommendation: Increase SME participation in high value business opportunities at or beyond the new target of 15% by providing broader (e.g. include export assistance) and more significant SME incentives to obligors, having Industry Canada advocate more effectively for Canadian industrial and SME benefits, introducing more flexibility in IRB rules, incentivizing risk-taking more effectively for R&D and technology development projects, using CCC and EDC to support SME exports, increasing the business acumen and perspective within the IRB program, and providing more targeted information and support to SMEs from industrial development programs.
5. ADDITIONAL KEY POLICY PROPOSALS

5.1 Trading, Swaps and Mutual Abatements

Canadian exports can be supported more effectively by allowing banked credits to be traded between companies and countries to keep up with other country offset policies (see Annex B for a table comparing Canada’s IRB policy with some leading offset countries). Many nations are making use of mutual abatement provisions that allow for swaps of offset obligations in those instances where no useful purpose would be served by the establishment of temporary in-country capabilities. Allowing swaps can drive improved efficiency and lower costs while increasing jobs and economic activity in Canada.

The recent experience of a Canadian obligor in Europe illustrates the benefits of swap arrangements. The company in question made a sale to the Netherlands that included an obligation to purchase a certain number of pieces of military equipment, and collaborated with a Dutch company to produce these units. When the Danish government wanted to purchase a smaller number of the same units, rather than establishing an inefficient manufacturing capability in Denmark, the Canadian company had the option of meeting the offset obligation to Denmark by manufacturing the units more efficiently in the already-existing Dutch facility, and swapping the resulting surplus Dutch credits with a Danish company that had an offset obligation to the Netherlands. All countries benefit from trading and swaps because this allows international investments to be allocated more in accordance with national comparative advantages. Annex C provides a more complete description of this example and the several options that were available to this Canadian company.

As an example of international cooperation in swap offset agreements, a tri-party agreement regarding increased cooperation in the field of defence related offsets was signed between the Netherlands, the United Kingdom and Denmark in 2008. Representatives of the three countries signed a document named “Best Practice for the Application of Abatements in Offset” regarding the abatements or swaps of offset obligations. The agreement describes the main principles of offset abatements that will be decided on a case-by-case basis between the three countries. The agreement represented an important step by the authorities of these countries towards greater cooperation between European countries in the area of defence and security procurements and offsets. The governments of the Netherlands, the UK and Denmark have invited other governments to join this initiative. Annex D provides the text of an announcement on this agreement. Also in Europe, the EU Code of Conduct promulgated in 2008 encourages signatory member states to use mutual abatements to reduce reciprocal offset commitments.

Trading and swaps (including with surplus credits) can help to drive OEM commitments to Canada beyond the project timeline and beyond simply meeting the minimum possible commitment – just ‘going through the motions’.

In CADSI's IRB consultations a Canadian company stated that,

The Canadian IRB policy provides little incentive to foreign IRB obligors to do more than the bare minimum. Referring to banking, pooling and swap provisions the company stated that the IRB policy speaks of long term relationships and participation in the global value chain, but without provisions in the policy to address IRB credits as a transferable commodity, or to make investing in Canada more attractive, those aims will not be achieved.
**Recommendation:** Support Canadian business development and exports, and eliminate unnecessary costs, by introducing trading, swaps and abatements of IRB credits and obligations, not only within Canada, but also with countries where Canadian companies exert an important presence.

### 5.2 Implement ‘IRB Lite’ for projects in the $2 million to $100 million range

Implement an IRB Lite approach that streamlines the process and reduces the burden for projects under $100M. Projects in the $2-$100M range that have been identified for application of the IRB policy should not have the same level of response and detail as Major Crown Projects. Projects of lesser value do not provide the opportunities to achieve regional distribution or small business participation. In addition these projects are a target of Canadian industry that has limited ability to develop and deliver indirect benefits and retain their cost competiveness.

For these projects the IRB proposal requirements should be reduced through the elimination of the IRB Company Business Plan, the Regional Development Plan, and the Small and Medium Business Development Plan. In addition serious consideration should be given to reducing the commitment to achieve 100% of the contract value to a lesser amount appropriate to the nature of the particular project in order to encourage Canadian company completion and to reduce the overall cost burden in competing and delivering these projects.

**Recommendation:** Achieve industrial and economic benefits for Canada while reducing unnecessary administrative burden on obligors and SMEs by implementing an ‘IRB Lite’ approach for projects in the $2 million to $100 million range as described in this paper.
6. REFORM THE PROCESS FOR IMPLEMENTING THE IRB POLICY TO MAKE IT MORE EFFECTIVE

Companies in the Canadian defence and security industry identified a number of improvements to the manner in which IRB policies are implemented that can secure higher value, sustainable Canadian industrial benefits.

6.1 More industrial development focus

Empower and equip IRB managers to make business judgments on IRB transactions based on anticipated outcomes, not intermediate generic prescriptions from government. Companies view the implementation of IRB policies as a partnership between industry and government and would appreciate seeing IRB officers granted the tools, training and freedom to allow them to evaluate company IRB propositions in a more open and productive environment. SMEs in particular find the complexity and paper burden of the current process excessively bureaucratic, confusing and frustrating.

**Recommendation:** Create a more productive business climate and improve the performance of the IRB program by increasing the role of the Industry Sector of Industry Canada, DFAIT, and the regional development agencies in IRB decision-making to bring more of an industry development focus, and by empowering and equipping IRB managers to make business decisions in a more open and productive environment with a focus on anticipated outcomes.

6.2 Streamline the reporting, verification and crediting processes and strengthen public accounting

The verification and crediting review processes currently being implemented by Industry Canada, including detailed audits which seek to verify historical company correspondence, are far beyond what is necessary to verify the worth of IRB projects developed by reputable large companies, and far exceed the processes employed by other major developed countries, or even Securities and Exchange Commissions. Companies that commit to IRB projects are on the hook for making those anticipated benefits real and for ensuring that the recipient delivers. Their credibility and company reputation depend on it. Industry Canada should concentrate more on assessing the outcomes from IRB projects than on the minutia related to the project itself.

Defence and security companies find the processes currently being used for filing reports, verifying eligibility, and providing credits to be overly complex and time-and-resource-consuming. They recommend

One obligor has stated,

Implementation of the IRB policy has become progressively prescriptive and risk averse, which encourages equally negative behavior from industry. This is bad for all, and we suspect not particularly satisfying for IRB Managers. We need to break this cycle, establish a more collaborative relationship between government and industry, and focus more on securing maximum beneficial economic outcomes, rather than slavishly following a "process". This demands a significantly higher level of mutual trust, respect and cooperation between Industry and Government.
that government streamline the reporting and crediting process by making use of an automated IT system as has been done in the UK and elsewhere. Industry Canada should review systems that are being developed in Canada for this.

Having an efficient IT system for inputting reports, data and information on IRB projects and business transactions would also provide a greatly improved capability to document, analyse and evaluate the success of the IRB program by accessing this information in systematic ways. This information, organized into business and economic frameworks and output reports would provide an important tool for managing the effectiveness of the program and would build an internal capability to assess new policy changes in real time. It would also allow Industry Canada to provide easy-access reports on the outcomes and impacts of the IRB policy to stakeholders like the regional development agencies, managers of the IRAP and SADI programs and companies seeking potential IRB involvements.

A streamlined reporting and information system would also allow the government to increase its public accounting for industrial, innovation, and economic outcomes of the IRB program. Industry Canada should produce an annual or bi-annual report on the economic efficiency and economic impact benefits of the overall investments occurring in the Canadian economy from IRBs. Building the tracking systems and metrics to estimate the economic efficiency impacts of the IRB policy would be much easier with a computerized IRB information system. Public reporting is important so that Industry Canada can demonstrate to the public and to Canadian industry the beneficial returns being provided to Canada from the IRB program.

Industry Canada should set specific performance standards for the timing, transparency and industry feedback from the IRB Directorate which include giving a quick response on a yes-no-maybe basis, and introduce into the process for judging and approving causality a better understanding of how industry works and how this translates into identifying and selecting Canadian companies so that government properly understands commercial risk. Industry Canada should implement a consistent approach for reporting to IC managers and a streamlined, universal, online, secure electronic reporting system for annual reports.

**Recommendation:** Increase the efficiency and effectiveness of the IRB program and create a more attractive business climate for long term business investment in Canada by scaling back the onerous and time consuming verification, causality and crediting processes currently being employed, introducing a better understanding of industry risk-taking and increased focus on assessing the outcomes of business transactions and investments, streamlining reporting processes and implement a new computerized reporting and information retrieval system to improve efficiency and facilitate outcome assessments, implementing performance standards for the timing, transparency and industry feedback in the responses from the IRB Directorate, and creating an off-line IRB appeal process.

6.3 Promote/educate on IRBs

Government should do more to promote/educate on IRBs, not only within industry so that more companies and financial investors are aware of IRB opportunities (especially SMEs), but also within the government (e.g. within the Industry Sector, Industry Portfolio and regional development agencies to facilitate their more active involvement in IRB decision-making, and to create a more equitable playing field across the country for firms dealing with regional development agencies, especially in Southern Ontario. The Office of Small and Medium Enterprises (OSME) at PWGSC has a mandate to inform Canadian suppliers about
business opportunities with the federal government and can help make SMEs and other companies aware of the IRB program and defence and security procurement opportunities. Industry Canada should publish an annual or bi-annual evaluation of the economic benefits created by the IRB program to inform all stakeholders and the public.

**Recommendation:** Increase the participation of Canadian companies in the IRB program and the effectiveness of business development support from government industry development programs by expanding IRB promotion/education activities within industry, with the Industry Sector and industrial development programs, and with the OSME office at PWGSC and the DGIIP Directorate at DND. Publish an annual or bi-annual evaluation of the economic benefits created by the IRB program.

6.4 Increase collaboration between government and industry

The task of making Canada’s IRB program more effective in generating high quality, sustainable Canadian industrial benefits requires close cooperation between government and industry. There should be an ongoing collaborative process between Industry Canada and the defence and security industry with a mandate to propose improvements to Canada’s IRB policies and the process under which they are implemented.

**Recommendation:** Increase the overall performance of the defence and security industrial strategy and the effectiveness of the IRB program by carrying out ongoing collaborations with industry on how government policies and programs can be improved.
7. CONCLUSIONS AND RECOMMENDATIONS

Conclusions

Certain unambiguous, consensual conclusions flow from the views and judgements of CADSI industry experts:

- The goals of the IRB policy are appropriate, but they need to be imbedded within an industrial strategy for the development of the Canadian defence and security industry which engages the active coordinated support of the government’s key industrial development programs;

- The IRB policy has been improved by the 2009 changes but the current management practice and interpretation of how to implement the enhancements are unlikely to produce the government's desired outcomes, and significant additional improvements are required to design more internationally competitive incentives and to engage support from industrial development programs;

- In addition to being contract obligations, IRB credits are also business assets and investments and need to be treated as such by administrators – this implies banking (but without depreciation), pooling, and the transferability of credits through trading, swaps and abatements – the aim of these being to create and sustain business activity in Canada in key industrial capabilities that make business sense to obligors and recipients alike;

- If technology transfer and capability clusters/centres of excellence are a high priority target for Canada, particularly in key capability areas, then this will require a much different position vis a vis multipliers and incentives – we are competing against the world for obligor commitments on technology transfer – we have to have an IRB program that, on a relative basis, encourages not discourages their activity in this area. This issue is first and foremost about strategic national interests. It is also about increasing the participation SMEs, including high technology research intensive SMEs;

- The process for the implementation of the IRB policy needs to become less contract-administration-focused and more business development oriented and business savvy; less prescriptive on mechanisms to generate benefits and more focused on desired outcomes and collaboration; less bureaucratic and burdensome, and more streamlined with computerized reporting;

- There should be a commitment to shorter response timelines for industry reports submitted to the IRB Directorate and there should be improved metrics available to the business community and to the government on the impact of the IRB program on the Canadian economy, and on the defence and security industrial base in particular;

- The IRB systems should be simplified for smaller requirements and the level of effort required significantly reduced for both obligor and recipient;

- Government should do more to promote the IRB program within industry, the financial sector, and within government, and should publish an annual or bi-annual public report on the economic impacts of the program; and,
- Government and industry need to work closely together in an ongoing collaborative process to propose new policies and approaches to increase the value of IRB benefits in Canada.

Recommendations

Government can ensure that the full potential of offsets related to CFDS is achieved by adopting two sets of recommendations:

- First, the Canadian government should commit to securing long term industrial and economic benefits from military procurement by providing the IRB program with the broad government policy support it requires to be successful; and,

- Second, the policies and implementation of the IRB program should be reformed to provide: the business climate required to attract investments; and, the Canadian business opportunities required to drive industrial and economic benefits.

Recommendation 1: Provide the broad government policy support required for the IRB program to succeed through:

a. Develop with industry a defence and security industrial strategy framework that seeks to leverage defence and security procurement to maximize jobs, develop unique technological innovations, and create the business climate required to generate maximum economic activity in Canada from defence and security spending by exploiting Canada’s industrial strengths and emerging capabilities;

b. Engage the government’s industrial development programs to support achievement of the industrial and economic development objectives in the framework (these programs could include IRB, SADI, IRAP, regional development agencies, BDC, CCC, EDC, the Office of Small and Medium Enterprises (OSME) at PWGSC, and the International and Industry Programs Directorate (DGIIP) at DND);

c. Cabinet to approve an industrial and economic development plan for major procurements at the options analysis phase of the procurement, before preliminary project approval (PPA) is requested from Treasury Board;

d. Include points for the bidder’s IRB proposal on the rated requirements in the procurement process for major procurements; and,

e. Industry Canada to take on the responsibility of producing an annual or regular update on the “strength of Canada’s defence and security industrial base to meet Canada’s national interests” and the effectiveness of the IRB policy in advancing this objective.

Recommendation 2: Reform the IRB policy and implementation process to create the business climate required to attract the investments and business opportunities that will drive future industrial and economic benefits for Canada through:

a. Build on the 2009 IRB policy changes and make new policy changes:
Stimulate increased Canadian business opportunities in priority capability areas by implementing policy improvements to each of the 2009 policy changes including:

- Implement the planned new policy framework for cash and in-kind investment in R&D and commercialization at SMEs;
- Stimulate the creation of additional, more effective PPCs by increasing the multiplier, eliminating matching, broadening the PPC definition (e.g. to industry-private research organization PPCs), judging PPCs on the basis of anticipated value, and incenting SMEs to move to the next technology development level;
- Stimulate the participation of more Canadian companies in high-value global value chain (GVC) production by broadening and clarifying the GVC definition, increasing the focus on supplying products and services vs assembly, and attributing GVC credit to related indirect benefits achieved;
- Implement the recommended improvements to banking and pooling that are identified in this report:
  - Achieve more, higher value business outcomes for Canadian companies that reach beyond a particular project by broadening the scope of pooling and making it easier to access;
  - Stimulate more proactive, larger and longer IRB projects by eliminating banking depreciation or pushing it out to ten years, and by introducing transferability and earlier pre-contract banking;
- Expand the innovation and industry growth potential of the enhanced priority technology list (EPTL) for Canadian companies in key technology capability areas by dramatically expanding the scope of the technologies in EPTL via an open collaborative process with industry, providing attractive incentives, and placing greater emphasis on the ‘intellectual quality’ of a transaction;
- Increase SME participation in high value business opportunities at or beyond the new target of 15% by providing broader (e.g. include export assistance) and more significant SME incentives to obligors, having Industry Canada advocate more effectively for Canadian industrial and SME benefits, introducing more flexibility in IRB rules, incentivizing risk-taking more effectively for R&D and technology development projects, using CCC and EDC to support SME exports, increasing the business acumen and perspective within the IRB program, and providing more targeted information and support to SMEs from industrial development programs; and,
- Support Canadian business development and exports, and eliminate unnecessary costs, by introducing trading, swaps and abatements of IRB
credits and obligations, not only within Canada, but also with countries where Canadian companies exert an important presence;

b. Reform the process for implementing the IRB policy to make it more effective:

> Speed up and enhance the effectiveness of the IRB decision-making process by:

> - Achieve industrial and economic benefits for Canada while reducing unnecessary administrative burden on obligors and SMEs by implementing an 'IRB Lite' approach for projects in the $2 million to $100 million range as described in this paper;

> - Create a more productive business climate and improve the performance of the IRB program by increasing the role of the Industry Sector of Industry Canada, DFAIT, and the regional development agencies in IRB decision-making to bring more of an industry development focus, and by empowering and equipping IRB managers to make business decisions in a more open and productive environment with a focus on anticipated outcomes;

> - Scale back the onerous and time consuming verification and crediting processes currently being employed and focus more on assessing the outcomes of business transactions and investments;

> - Streamline reporting processes and implement a new computerized reporting and information retrieval system to improve efficiency and facilitate outcome assessments;

> - Implement performance standards for the timing, transparency and industry feedback in the responses from the IRB Directorate;

> - Create an off-line IRB appeal process; and,

> - Increase the participation of Canadian companies in the IRB program and the effectiveness of business development support from government industry development programs by expanding IRB promotion/education activities within industry, with the Industry Sector and industry development programs, and with the OSME office at PWGSC and the DGIIP Directorate at DND;

c. Publish an annual or bi-annual evaluation of the economic benefits created by the IRB program; and,

d. Increase the overall performance of the defence and security industrial strategy and the effectiveness of the IRB program by carrying out ongoing collaborations with industry on how government policies and programs can be improved.
1. THE MEMBER SURVEY

In order to complement the work of the WG, a sample-based survey of the general membership is being completed.

It utilizes three tools:
— A multi-choice based questionnaire
— A request for a White Paper, addressing the five questions being addressed by the WG
— The opportunity to engage in a free-form interview

A representative slice of our membership was selected, comprising 41 companies, with an equal balance between Obligors, Mezzanine (Obligor/Receptors) and Receptors, who were directly solicited. The balance of the membership were also invited to contribute, by CADSI Newsletter broadcast.

We have obtained 34 useful inputs, representing an 83% response rate.
2. SURVEY ANALYSIS

The Member Survey was crafted to make it as user-friendly as practical, thus maximize uptake. That said, divergent data sources and formats are difficult to analyze, and therefore have marginal value, unless normalized.

Thus, all received inputs (be they free-form or questionnaire responses) have been converted into the five-question format that the Working Group (WG) is addressing, essentially in the form of a “virtual white paper”

Arriving at this did require some interpretation by the Project Managers, and therefore may be prone to some subjective bias

Where respondents selected a live interview, their inputs have been converted to a white paper format, and been provided back to them for their confirmation that views documented correspond to their inputs

The intent was to seek a 1:1 correlation between the WG’s deliberations, and the views expressed by the general membership

3. MEMBER INPUTS

We used five fundamental questions:

—What is the current IRB scorecard?

—Did the 2009 changes make it better or worse?

—What else needs to change?

—How do we create new globally empowered, centres of capability?

—Other ideas

4. THE QUESTIONNAIRE - Defence and Security Industries Survey on Canada’s IRB Program

BACKGROUND

CADSI has been asked for advice by the Minister of Industry on Canada’s IRB program. Specifically, on how effective the existing policy and its implementation are in achieving meaningful outcomes for the Canadian defence and security sector.

CADSI’s Board of Directors will consider this issue at its June 27th meeting. Members interested in contributing their views to CADSI are invited to do so in one of four ways: through a phone interview with CADSI’s project manager for this initiative; participation in person or by phone as part of a short term CADSI Working Group chaired by Neil Rutter, a member of CADSI Government Relations Committee and former Chairman of
the Global Offset and Countertrade Association; responding in writing; completing the
attached survey.

Our task is to offer the Minister advice as it relates to the following questions:

- Do the stated goals and underlying principles of Canada’s IRB policy maximize jobs,
innovation and economic activity in Canada’s defence and security sector?
- Consider the impact of the October 2009 changes (announced or implemented) to
the IRB policy on Canada’s defence and security sector specifically and on the
Canadian economy more generally. Do the 2009 changes affect in a positive way
how the program is being managed, and have they resulted or will they result in
improved outcomes for Canada’s defence and security sector e.g. access to global
supply chains and export opportunities; encouraging indigenous innovation;
development and sustainment of technology clusters/centres of excellence?
- What changes would you propose to Canada’s IRB policy, to the program’s strategic
and critical technology lists and/or to the management of the policy to advance the
interests of Canada’s defence and security industries, e.g. rating IRBs vs pass fail;
accounting for and publicly reporting on jobs and economic activity generated within
Canada’s defence and security sector; establish domestic industrial objectives as
part of the approval of project definition funding; or other changes?
- How could you use the IRB program to incent global defence contractors to develop
global lines of business from Canadian soil?
- What other ideas, opinions or comments would you like to offer?

CADSI thanks you for your assistance in this project

Note to all respondents: The information being requested by CADSI is being gathered for the express and
exclusive purpose of assessing activities in the defence and security industries of Canada. No other use is
planned or intended. Any results of this study that may be disclosed to third parties, or released in the
public domain, will be purged to ensure no disclosure of proprietary or competition sensitive
information.

SECTION A – For all Participants

A.1 Name of Participant Company: ……………………………………………………………

A.2 Principal location(s) …………………………………………………………………………………

A.3 Participant Point of Contact (POC)
……………………………………………………………………………..

Address …………………………………………………………………Postal Code
……………………………..

Tel ………………………………………... E-mail
………………………………………………………………………..

A.4 Significant Areas of Expertise (mark all that are applicable)

Aerospace    □     Land    □     Maritime    □
Integrator  □  Structures  □  Elect Systems  □  Propulsion  □  
MRO/ILS  □  Software  □  Fabrication  □  Finishing  □  
Other Areas

A.5  Principal Supply Chain Role (see Attachment 1 for definitions)
OEM  □  Tier 1  □  Tier 2  □  Tier 3  □  Tier 4  □  

A.6  Corporate Position
Whole Company  □  Operating Division  □  Subsidiary  □  
Other

A.7  Business Size (Canada) for business replying
People:  1-50  □  51-100  □  101-250  □  251-1000  □  1000+  □  
Revenue  \leq 10M  □  10-100M  □  100M+  □  

A.8  Domestic/Export Ratio (consider indirect, i.e. via higher-tier, exports, where known)
0-25% Export  □  25-75%  □  75%+  □  

A.10  Business Size (Global) for total corporation:
Revenue  \leq 100M  □  100-1B  □  1B+  □  

SECTION B  - For OEMs/OBLIGORS Only
B.1  Are you familiar with Canada’s IRB policy?
Yes  □  No  □  

B.2a  Have you accessed the services of Industry Canada’s IRB team in assisting you in identifying or exploring potential IRB projects?
Yes  □  No  □  

B.2b  Was this support useful?
Yes  □  No  □  N/A  □  

40
B.3a Have you accessed the services of Canada’s Regional Agencies in assisting you in identifying or exploring potential IRB projects?

Yes □  No □

B.3b Was this support useful?

Yes □  No □  N/A □

Comments:______________________________________________________________

________________________________________________________________________

________________________________________________________________________

B.4 Does Canada’s IRB policy lead you to select any particular type of project (identify all that apply):

A. Build to print (subcontracting)  High □  Modest □  Low □

B. Indirect projects  High □  Modest □  Low □

C. Regional IRB transactions  High □  Modest □  Low □  N/A □

D. SME/SMB transactions  High □  Modest □  Low □  N/A □

E. World Product Mandate-GVC  High □  Modest □  Low □  N/A □

F. Technology Transfer  High □  Modest □  Low □  N/A □

G. Investment & PPP  High □  Modest □  Low □  N/A □

H. IRB Credits Banking/Pooling  High □  Modest □  Low □  N/A □
B.5 Please comment on the implementation of Canada’s IRB policies:

<table>
<thead>
<tr>
<th></th>
<th>Causality</th>
<th>Excessive</th>
<th>Reasonable</th>
<th>More emphasis needed</th>
</tr>
</thead>
<tbody>
<tr>
<td>A</td>
<td></td>
<td>☐</td>
<td>☐</td>
<td>☑</td>
</tr>
<tr>
<td>B</td>
<td>Incrementality</td>
<td>☐</td>
<td>☐</td>
<td>☑</td>
</tr>
<tr>
<td>C</td>
<td>Regional requirements</td>
<td>☐</td>
<td>☐</td>
<td>☑</td>
</tr>
<tr>
<td>D</td>
<td>SME/SMB</td>
<td>☐</td>
<td>☐</td>
<td>☑</td>
</tr>
<tr>
<td>E</td>
<td>Verification</td>
<td>☐</td>
<td>☐</td>
<td>☑</td>
</tr>
</tbody>
</table>

Comments:______________________________________________________________
________________________________________________________________________
________________________________________________________________________
________________________________________________________________________

SECTION C – Impact of recent IRB Enhancements on OEMs/Obligors

In 2009, substantial revision and enhancements to the IRB Policy were announced. Since that date, these revisions have been incrementally implemented. These changes include provisions for:

- Phase in 60 percent up-front requirement
- Incentive for the creation of Public-Private Consortia
- Improved recognition of the value of Canadian firms' participation in GVC
- Strategic Plans from Prime Contractors with Major IRB Obligations
- Banking of Industrial and Regional Benefit Transactions
- Enhanced Priority Technology List (EPTL)
- Firm-Level R&D and Commercialization (not implemented)

**For a description of these changes see Attachment 2.**

**C.1** Are you familiar with these recent changes?
Yes ☐ No ☐ Some ☐

**C.2** Please comment on the recent IRB enhancements to Canada’s IRB policies:

A. Phased in 60% requirement Useful ☐ A start ☐ Not useful ☐ N/A ☐

B. Incentive for Consortia Useful ☐ A start ☐ Not useful ☐ N/A ☐

C. Global Value Chain Useful ☐ A start ☐ Not useful ☐ N/A ☐

D. Strategic plan Useful ☐ A start ☐ Not useful ☐ N/A ☐

E. Banking Useful ☐ A start ☐ Not useful ☐ N/A ☐

F. EPTL Useful ☐ A start ☐ Not useful ☐ N/A ☐

G. ☐

Comments:______________________________________________________________

________________________________________________________________________

________________________________________________________________________

C.3 Industry Canada is seeking a minimum of fifteen percent (15%) fulfillment of IRBs with SME/SMB businesses. What are your thoughts on this requirement?

Comments:______________________________________________________________

___________
C.4 Some of the changes are intended to increase Global Market Access for Canadian beneficiaries. Do you think these will be effective in encouraging obligors to provide greater access to your GVC?

No  □  Somewhat  □  Yes  □  N/A  □

C.5 How might the current provisions be “tweaked” to encourage more Canadian defence and security businesses access to your GVC?

Describe ………………
…………………………………………………………………………………………………………..

C.6 What more radical changes might be in order to achieve this goal?
…………………………………………………………………………………………………………………………………………

C.7 What changes would you like to see to Canada’s IRB policies, including implementation?

Comments:______________________________________________________________
______________

SECTION D – For IRB Recipients Only

D.1 Are you familiar with the content of Industry Canada’s IRB policy?

Yes  □  No  □

D.2 If so, have you accessed the services of Industry Canada’s IRB policy team in assisting you in identifying or exploring IRB opportunities?

Yes  □  No  □
D.3 If “Yes”, have you ever benefited from an IRB-related contractual transaction?

Yes [ ] No [ ] N/A [ ]

D.4 Were any of these transactions significant in the strategic growth of your company?

Yes [ ] No [ ] N/A [ ]

D.5 How effective do you think Canada’s IRB policy is in providing you access to legitimate business opportunities for:

i. Your Company

Poor [ ] Significant [ ] Very Valuable [ ] No Opinion [ ]

ii. The Defence and Security community

Poor [ ] Significant [ ] Very Valuable [ ] No Opinion [ ]

- Phase in 60 percent up-front requirement
- Incentive for the creation of Public-Private Consortia
- Improved recognition of the value of Canadian firms' participation in GVC
- Strategic Plans from Prime Contractors with Major IRB Obligations
- Banking of Industrial and Regional Benefit Transactions
- Enhanced Priority Technology List (EPTL)
- Firm-Level R&D and Commercialization (not implemented)

For a description of these changes see Attachment 2.

D.6 Are you aware of these recent changes?

Yes [ ] No [ ]

D.7 If “Yes”, do you believe they will be useful to you, in expanding your business and creating jobs?
D.8 Many of the changes are intended to increase Global Market Access for the recipients, and have an impact on sustainable job creation. Do you think these will be effective?

No □ Somewhat □ Yes □ N/A □

D.9 How might the current provisions be “tweaked” to strengthen positive outcomes?

Describe …………………
………………………………………………………………………………………………………………………………………………

D.10 Other candidate mechanisms have been proposed to further improve IRB performance, some of which are listed below. Please indicate your support for each.

A. Incentive for Industrial Clusters

High □ Modest □ Low □ N/A □

B. Higher Public Profile for IRB Results

High □ Modest □ Low □ N/A □

C. IRB Value a Direct Factor in Bid Awards

High □ Modest □ Low □ N/A □

D.11 What more radical changes might be in order to achieve these goals?

………………………………………………………………………………………………………………………………………………

………………
OEM – Platform Manufacturers

Tier 1 – Systems Integrators: companies that engage in the integrated design, development, manufacture and marketing of major aircraft & defence systems, such as landing gear systems, environmental conditioning systems, navigation systems, communications systems, avionics systems, etc.; and companies that design and manufacture complete large, complex structures such as fuselage sections, empennage assemblies, or wings.

Tier 2 – Equipment Providers: companies that are engaged in the design, development, manufacture, and marketing of engineered equipment (proprietary) and sub-systems, such as sensors, instruments, actuators, displays, communications antennae, etc. Tier 2 suppliers have their own company name on the drawings for the products they produce and sell.

Tier 3 – Parts and Assemblies: subcontractors who manufacture/supply components and sub-assemblies, such as machined components, assemblies, etc. to OEMs and to companies in Tiers 1 and 2 and to other Tier 3 firms. Tier 3 suppliers that deliver complex products with many components from a variety of outside suppliers may be described as ‘integrators’.

Tier 4 – Processors, Materials and Standard Components suppliers: companies who provide processing services for components, such as shot peening, heat treatment, plating, coating, etc.; companies who provide materials, such as aluminum, steel, titanium, etc.; companies who supply standard components such as hardware, wiring, etc.

Notes:

1. A company may operate at more than one tier level, depending on the nature of their activity in a particular product area.
ATTACHMENT 2

Industry Canada’s Policy Improvements

Phase 1 (now effective)

1. **Phase in 60 percent up-front requirement**
   30 percent of obligations will need to be identified at time of contract signing, 30 percent one year later, and the remaining 40 percent over the remainder of the contract. Implementing this requirement over a longer period will provide firms with time to identify and negotiate the high-value-added business transactions typical of the Aerospace and Defence sector.
   - New Approach
   - Frequently Asked Questions

2. **Incentive for the creation of Public-Private Consortia**
   Encourage Industry-Academia-Research Consortia to develop next-generation technologies and services in aerospace, defence and related sectors. This change will significantly incent business-led innovation activities between global multinationals, Canadian industry, academia and the public sector S&T community.
   - New Approach
   - Frequently Asked Questions

Phase 2 (now effective)

1. **Improved recognition of the value of Canadian firms' participation in GVC**
   Encourage original equipment manufacturers (OEM) to add Canadian suppliers to their GVC by crediting Canadian work done on international platforms against Direct IRB requirements. This policy change provides a critical lever to achieve the IRB policy industrial development and export objectives.
   - New Approach
   - Frequently Asked Questions

2. **Strategic Plans from Prime Contractors with Major IRB Obligations**
   Strategic plans from prime contractors with major corporate obligations to Canada will be required. The prime will be asked to provide a medium and long-term outlook on its broad corporate plans for Canada. This will encourage more strategic relationships between primes and Canadian companies in terms of investments and subcontracts.
   - New Approach
   - Frequently Asked Questions

Phase 3

1. **Banking of Industrial and Regional Benefit Transactions (now effective)**
   Prime contractors will be offered a limited form of banking of IRB transactions both in advance of award, and in the event of over-commitment of IRB transactions. It will allow new business opportunities to be secured when they are most likely to arise.
   - New Approach
   - Frequently Asked Questions
   - Guidelines for Banking of IRB Transactions

2. **Enhanced Priority Technology List (now effective)**
   The new Enhanced Priority Technology List aligns the IRB Policy with the emerging critical technologies of the Canadian military and encourages the development of advanced technologies in the Canadian aerospace and defence sector.
3. **Firm-Level R&D and Commercialization (upcoming)**

Encourage primes, to invest in long term, innovation-focused activities in Canadian SMEs. It will establish long term, strategic relationships with primes, leading to increased R&D activities, market-driven technology development and more robust business development approaches.
## Industry View of Current Program

<table>
<thead>
<tr>
<th>Item</th>
<th>Sentiment</th>
<th>Key Observation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Overall Program</td>
<td>95</td>
<td>Overly process driven</td>
</tr>
<tr>
<td>Incrementality</td>
<td>70</td>
<td>Penalizes existing, Canadian-Based Obligors</td>
</tr>
<tr>
<td>Causality</td>
<td>20</td>
<td>Process excessive</td>
</tr>
<tr>
<td>Timeliness</td>
<td>10</td>
<td>Very slow, with no firm decision time-line</td>
</tr>
<tr>
<td>Admin Burden</td>
<td>60</td>
<td>Needs serious IT solution</td>
</tr>
<tr>
<td>Global Image</td>
<td>20</td>
<td>Non-competitive with peers</td>
</tr>
</tbody>
</table>

**Legend:**
- Size of traffic-light is proportional to the per cent of respondents who expressed that sentiment (% included within the traffic-light).
- Colour of light = sentiment (_positive, neutral, negative)
# Scorecard on 2009 Enhancements

<table>
<thead>
<tr>
<th>Item</th>
<th>Sentiment</th>
<th>Key Observation</th>
</tr>
</thead>
<tbody>
<tr>
<td>30-60 Rule</td>
<td>50</td>
<td>Good, may need extension for major, or protracted programs</td>
</tr>
<tr>
<td>PPC</td>
<td>50</td>
<td>Content of PPC too prescriptive</td>
</tr>
<tr>
<td>GVC</td>
<td>40</td>
<td>Positive, needs stronger incentive</td>
</tr>
<tr>
<td>Strategic Plans</td>
<td>40</td>
<td>Positive, but pooling off-limits to majority</td>
</tr>
<tr>
<td>Banking</td>
<td>40</td>
<td>Mean-spirited, needs pre-banking feature</td>
</tr>
<tr>
<td>EPTL</td>
<td>40</td>
<td>Needs to nationally relevant, not DRDC wish-list</td>
</tr>
<tr>
<td>Firm-level R&amp;D</td>
<td>30</td>
<td>New investment framework desperately needed</td>
</tr>
<tr>
<td>15% SME</td>
<td>50</td>
<td>Nice idea, needs to be tailored to industrial capabilities in each niche area</td>
</tr>
</tbody>
</table>

**Legend:**
- Size of traffic-light is proportional to the per cent of respondents who expressed that sentiment (% included within the traffic-light).
- Colour of light = sentiment (\(\text{\textcolor{green}{positive}}, \text{\textcolor{yellow}{neutral}}, \text{\textcolor{red}{negative}}\))
## NEW IDEAS PROPOSED BY INDUSTRY

<table>
<thead>
<tr>
<th>ITEM</th>
<th>SENTIMENT</th>
<th>KEY OBSERVATION</th>
</tr>
</thead>
<tbody>
<tr>
<td>INCREMENTALITY</td>
<td></td>
<td>ELIMINATE, OR SOFTEN. NO CONSIDERATION OF JOBS SUSTAINED. ABANDONED BY OTHER COUNTRIES</td>
</tr>
<tr>
<td>CAUSALITY</td>
<td></td>
<td>NEEDS TO BE RELAXED. OVER-AUDITED. DISCOURAGES PROC-ACTIVE, PRE-CONTRACT INVESTMENT</td>
</tr>
<tr>
<td>STREAMLINING</td>
<td></td>
<td>CURRENT PROCESS TOO BUREAUCRATIC. RISK AVERSE, NON-AUTOMATED. NEED FAST-TRACK FOR SMALLER TRANSACTIONS</td>
</tr>
<tr>
<td>TRADING &amp; SWAPS</td>
<td></td>
<td>NEEDED. CONSISTENT WITH INTERNATIONAL PEERS. GENERATES USEFUL ECONOMIC ACTIVITY. AVOIDS NON-SUSTAINABLE “BUBBLES”</td>
</tr>
<tr>
<td>RISK-SHARING</td>
<td></td>
<td>RISK SHOULD ALWAYS BE ALLOCATED TO THE PARTNER BEST EQUIPPED TO MANAGE IT. IRB IS A GOV-INDUSTRY PARTNERSHIP</td>
</tr>
<tr>
<td>ENHANCED INCENTIVES</td>
<td></td>
<td>NEED TO EQUATE TO INTERNATIONAL PEERS. EXISTING LEVELS SUSTAIN THE “BUILD TO PRINT” MENTALITY</td>
</tr>
<tr>
<td>MARKET ASSISTANCE</td>
<td></td>
<td>THIS CAN BE A VERY VALUABLE CONTRIBUTION FROM OBLIGORS/OEMS. IT SHOULD BE RECOGNIZED AS SUCH</td>
</tr>
<tr>
<td>IRB BUSINESS OFFICE</td>
<td></td>
<td>IRB OFFICERS NEED TO BE EMPOWERED TO NEGOTIATE MORE EFFECTIVELY WITH INDUSTRY, THEREFORE THEY SHOULD HAVE THE OPPORTUNITY TO LEARN BUSINESS ACUMEN</td>
</tr>
<tr>
<td>CCV</td>
<td></td>
<td>CANADIAN DEFINITIONS ARE TOO RESTRICTIVE AND OUT OF DATE. WE SHOULD MATCH OUR PEERS</td>
</tr>
</tbody>
</table>

**Legend:**

- **Size of traffic-light is proportional to the per cent of respondents who expressed that sentiment (% included within the traffic-light).**
- **Colour of light = sentiment** | **30** | **POSITIVE** | **NEUTRAL** | **NEGATIVE** |
## ANNEX B: COMPARISON OF CANADA’S IRB PROGRAM WITH THE OFFSET PROGRAMS OF OTHER COUNTRIES

<table>
<thead>
<tr>
<th>Offset Policy</th>
<th>Canada</th>
<th>Norway</th>
<th>Finland</th>
<th>Spain</th>
<th>South Korea</th>
<th>Taiwan</th>
<th>Turkey</th>
<th>Israel</th>
<th>Romania</th>
<th>France</th>
<th>Germany</th>
<th>Italy</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Transfer of credits between companies (within Country)</strong></td>
<td>Not allowed</td>
<td>Ad hoc</td>
<td>Ad hoc</td>
<td>Ad hoc</td>
<td>Ad hoc</td>
<td>Ad hoc</td>
<td>Ad hoc</td>
<td>Ad hoc</td>
<td>Ad hoc</td>
<td>Ad hoc</td>
<td>Ad hoc</td>
<td>N/A</td>
</tr>
<tr>
<td><strong>Multippliers for advanced tech projects, R&amp;D, tech transfer, venture capital</strong></td>
<td>Very limited</td>
<td>Yes</td>
<td>Yes</td>
<td>X</td>
<td>Yes</td>
<td>Ad hoc</td>
<td>Ad hoc</td>
<td>Ad hoc</td>
<td>Yes</td>
<td>Limited</td>
<td>Yes</td>
<td>N/A</td>
</tr>
<tr>
<td><strong>Incrementality</strong></td>
<td>Restricted: No consideration for long term commitment</td>
<td>N/A</td>
<td>N/A</td>
<td>N/A</td>
<td>N/A</td>
<td>Yes</td>
<td>N/A</td>
<td>N/A</td>
<td>N/A</td>
<td>N/A</td>
<td>N/A</td>
<td>N/A</td>
</tr>
<tr>
<td><strong>Banking</strong></td>
<td>Very Limited</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Limited</td>
<td>Ad hoc</td>
<td>Very Limited</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td><strong>Marketing Support/Assistance</strong></td>
<td>Not allowed</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>N/A</td>
<td>Yes</td>
<td>X</td>
<td>Ad hoc</td>
<td>Yes</td>
</tr>
<tr>
<td><strong>Causality</strong></td>
<td>Onerous</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>N/A</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td><strong>Verification</strong></td>
<td>Onerous, detailed, in person often</td>
<td>Electronic via email</td>
<td>Electronic via email</td>
<td>Electronic via email (pdf)</td>
<td>Electronic via email</td>
<td>Electronic via email</td>
<td>Electronic via email</td>
<td>Electronic via email</td>
<td>Electronic via email (pdf)</td>
<td>Delivered In Person</td>
<td>N/A</td>
<td>N/A</td>
</tr>
<tr>
<td><strong>Trades / Swaps / Abatements between Countries</strong></td>
<td>Not allowed</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>N/A</td>
<td>N/A</td>
<td>Ad hoc</td>
<td>Yes</td>
<td>Ad hoc</td>
<td>Yes</td>
<td>Ad hoc</td>
</tr>
</tbody>
</table>

---

1. Europe in general is doing away with offsets as contrary to treaty and Directive.
2. U.K. is phasing out offset requirement.

Notes/Comments:
1. Countries selected above are most similar to Canada.
2. Data represented above, is based on practical feedback received from OEMs.
3. Generally for most countries, offset transactions/projects can be negotiated and pre-approved.
4. Incrementality is generally not applicable in other countries; seen as a disincentive to sustain jobs.
5. Full Banking/Trading occurs in most other countries.
6. With the possible exception of Turkey, Canada has the most demanding, detailed causality and verification process of all the countries surveyed.
ANNEX C: DUTCH OFFSET SWAP EXAMPLE

Because of a confidentiality clause, fictitious company names are used in this example.

1. Canuck, a Canadian company, has a world-class product. It is about to conclude a contract for components and accessories worth C$ 50 million. Canuck can be classed as an SME. The Dutch Ministry of Economic Affairs (MEA) requires a 100% offset obligation. The offset plan submitted includes direct and indirect projects. Canuck selects Windmill, a Dutch company, to make a component X. Given the nature of Canuck’s product outsourcing parts is a complex matter:
   a. **Regulatory:** both US and Canadian government approvals are required for the transfer of technology which takes close to a year (delivery of the contract is within three years);
   b. **Commercial:** shop rate in the Netherlands is the same as in Canada however in Euros. The exchange rate at the time of contracting is C$ 1.50, i.e. 50% higher, obviously affecting competitiveness;
   c. **Technical:** Windmill takes a year to produce a compliant first article and because of late deliveries Canuck is close to incurring penalties.

2. MEA and Canuck agree:
   a. Canuck will purchase a specific quantity of component X from Windmill;
   b. MEA will award a 2x multiplier for the whole order once the agreed quantity has been reached;
   c. MEA will continue to award a 2x multiplier for additional deliveries by Windmill for end-use in Denmark;
   d. MEA will award 1.5x multiplier for deliveries by Windmill for end-use elsewhere.

3. Canuck has an offset obligation in Denmark for smaller quantities of its product. Outsourcing component X to a Danish company makes even less sense than in the Netherlands. Given the agreement with the MEA Canuck has the following options:
   a. Canuck can bank excess credits in the Netherlands for future requirements;
   b. Canuck can transfer excess credits to:
      i. another company with an offset obligation in the Netherlands. This transaction would not affect the Danish obligation;
      ii. a Danish company with an obligation to the Netherlands and this transaction would satisfy Danish offset requirements;
      iii. a company with excess Danish credits who requires Dutch credits.
   c. Canuck can apply to have the excess credits transferred to Denmark under the tri-country agreement.

4. Conclusion: by offering the multiplier, banking, and transfers the MEA has made continued purchasing from Windmill more attractive despite the above-mentioned drawbacks.
ANNEX D: ABATEMENT ON OFFSETS MOU SIGNED BETWEEN THE NETHERLANDS, UNITED KINGDOM AND DENMARK

A tri-party agreement regarding increased cooperation in the field of defence related offsets was signed between the Netherlands, the United Kingdom and Denmark on September 24th 2008. Representatives of the three aforementioned countries signed a document named “Best practice for the application of abatements in Offset” regarding the abatements or swaps of offset obligations. The agreement is the result of prolonged negotiations between the three countries and is an interesting development if we take into consideration that Defence offset policies is a rather complex subject which is greatly influenced by national defence interests and legislations, the current defense industrial environment and the technological capabilities and potential that each country wants to attain.

A simple look at the general objectives of the offset policies of Great Britain, Netherlands and Denmark will provide more insight into the different approaches towards offsets and the complexity of the subject.

The general objective of the offset policy in Netherlands is to contribute to the industrial base of the country through technological advancement, thereby broadening its technological capabilities, improving its level of quality, expanding its markets and enhancing employment within Netherlands. Therefore the main objective of Netherlands’ offset policy is the involvement of the national defence related industries and R&D institutes in the development and production of defence equipment and related services.

The Denmark offset policy doctrine puts the emphasis on securing work for its national industry. Offset strategy is oriented towards improving Danish defence-related companies’ technology level. Additionally, Danish offset policy doctrine aims at improving the access of the national defence companies to international markets and promote cooperation with foreign suppliers of defence material through R&D and high technology projects.

The United Kingdom operates an Industrial Participation (IP) policy as a counterbalance of barriers to trade that UK companies face in defence procurements in the form of protectionist measures or stringent offset regimes. IP is considered a flexible response to these barriers as it encourages offshore companies to use the UK’s defence industry in a relative free environment in order for UK companies to be placed in the international supply chain.

The different Offset policies in Europe give an additional dimension to the efficient operation of the European defence market. Currently there are several initiatives being launched in the context of a more harmonised European defence environment such as for example the signing of the Code of Conduct on Offsets by the Steering Board of European Defence Agency (EDA) on 24th of October. The document signed between the Netherlands, the United Kingdom and Denmark is in accordance with this.

The signing of the Memorandum does not mean that these three countries will abandon their offset policies. The Memorandum is more an act of intend than a concrete policy. It describes the main principles of offset abatements that will be decided on a case by case basis between the three countries. In light of this, the document represents an important step by the authorities of these countries towards a greater cooperation between European countries in the area of defence procurements and offsets.
The governments of the Netherlands, the UK and Denmark invite other governments to join this initiative.

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Cell: +31 6 46152287
Email: L.dejong@minez.nl
WWW: http://www.cmp.ez.nl