Public Works and Government Services Canada | Travaux publics et Services gouvernementaux Canada

RETURN BIDS TO:
RETOURNER LES SOUMISSIONS À:
Bid Receiving - PWGSC / Réception des soumissions - TPSGC
11 Laurier St. / 11, rue Laurier
Place du Portage, Phase III
Core 0B2 / Noyau 0B2
Gatineau, Québec K1A 0S5
Bid Fax: (819) 997-9776

SOLICITATION AMENDMENT
MODIFICATION DE L'INVITATION

The referenced document is hereby revised; unless otherwise indicated, all other terms and conditions of the Solicitation remain the same.

Ce document est par la présente révisé; sauf indication contraire, les modalités de l'invitation demeurent les mêmes.

Comments - Commentaires

Vendor/Firm Name and Address
Raison sociale et adresse du fournisseur/de l'entrepreneur

Issuing Office - Bureau de distribution
Industrial Vehicles & Machinery Products Division
11 Laurier St./11, rue Laurier
7B1, Place du Portage, Phase III
Gatineau
Québec
K1A 0S5

Title - Sujet RELC - DDR	
Solicitation No. - N° de l'invitation W8476-185840/A	**Amendment No. - N° modif.** 002
Client Reference No. - N° de référence du client W8476-185840	**Date** 2018-06-11
GETS Reference No. - N° de référence de SEAG PW-$$HS-634-74903	
File No. - N° de dossier hs634.W8476-185840	**CCC No./N° CCC - FMS No./N° VME**
Solicitation Closes - L'invitation prend fin **at - à 02:00 PM** **on - le 2018-07-31**	**Time Zone** **Fuseau horaire** Eastern Daylight Saving Time EDT
F.O.B. - F.A.B. Specified Herein - Précisé dans les présentes **Plant-Usine:** ☐ **Destination:** ☐ **Other-Autre:** ☑	
Address Enquiries to: - Adresser toutes questions à: Paquin, Benoit	**Buyer Id - Id de l'acheteur** hs634
Telephone No. - N° de téléphone (873) 469-3401 ( )	**FAX No. - N° de FAX** ( ) -
Destination - of Goods, Services, and Construction: **Destination - des biens, services et construction:**	

Instructions: See Herein

Instructions: Voir aux présentes

Delivery Required - Livraison exigée	**Delivery Offered - Livraison proposée**
Vendor/Firm Name and Address **Raison sociale et adresse du fournisseur/de l'entrepreneur** **Telephone No. - N° de téléphone** **Facsimile No. - N° de télécopieur**	
Name and title of person authorized to sign on behalf of Vendor/Firm (type or print) **Nom et titre de la personne autorisée à signer au nom du fournisseur/ de l'entrepreneur (taper ou écrire en caractères d'imprimerie)** **Signature** **Date**	

Canada

Amendment 002

This amendment is raised to provide the presentation presented on the industry day on June 5th 2018.

Serving GOVERNMENT, Serving CANADIANS.

Respect • Integrity • Excellence • Leadership

Industry Day

Common Heavy Equipment Replacement (CHER) Project

5 June 2018

Agenda

0900 – PSPC, Opening Remarks

0910 – PSPC, Request For Information (RFI)

0920 – PSPC, Annex E – Procurement Information

0935 – DND, Annex A – Project Overview

1015 – Networking Break

1045 – DND, Annex B - Sustainment Requirements

1115 – DND, Annex C – Costing

1120 – ISED, Annex D – Industrial and Technological Benefits Policy

Opening Remarks

- Welcome
- Emergency exits
- Washrooms

Respect ◆ Integrity ◆ Excellence ◆ Leadership

Serving GOVERNMENT, Serving CANADIANS.

Industry Day

Common Heavy Equipment Replacement (CHER) Project

Request For Information

Benoît Paquin, PSPC, Contracting Authority

For Your Information

- All documentation presented today will be posted on buyandsell.gc.ca (B&S).

- If any new information is provided during the Industry Day and one-on-one sessions, it will be posted on B&S.

- Industry Engagement
  - RFI Phase 1 : Early engagement
  - RFI Phase 2 : Draft Request For Proposal (RFP)

Proposed Schedule

Procurement Milestones	Target Date / Timeframe
RFI Closing	31 July 2018
RFI – Draft RFP	March 2020
RFP (Multiple Release)	Starting Summer 2021
Contract Awards / TB Contract Approvals (if required)	Starting Winter 2021

Objective

- Develop a shared understanding with Industry about the CHER Project.

- Provide information to Industry and obtain feedback on the CHER procurement, requirement, sustainment, costing, and Industrial and Technological Benefit (ITB) policy.

Request For Information (RFI)

- National Security Exception (NSE) may apply
- RFI Part 1, Section 1.2 Nature of the RFI
- Canada will not reimburse any respondent for expenses incurred in responding to this RFI.
- Respondents should indicate and mark any portions of their response that they consider proprietary or confidential
- Part 5 – Questions to industry

Annex E – Procurement Information

- Canadian Content policy
- IP Rights and licensing
- Green procurement questions
- Bid validity of 12 months
- Security Clearance

Common Heavy Equipment Replacement Project (CHER)

Canadian Armed Forces Requirements

RFI Industry Day Brief

June 2018

Major François Langis – Project Director

THE NEED

To provide to the Canadian Armed Forces a dependable and sustainable Heavy Support Equipment capable of enabling the generation of deployable and effective earth working and cargo handling capabilities.

PROJECT OVERVIEW

DELIVERABLES:

- Heavy Support Equipment to improve CAF mobility, counter-mobility, survivability, and sustainment capabilities. Comprised of Heavy Construction Equipment (HCE), Material Handling Equipment (MHE), and Reserve Force Commercial Off-The-Shelf (ResF COTS)

REQUIREMENT CONSIDERATIONS:

HCE:
- Dozer
- Grader
- Excavator
- Loader
- Crane
- High Speed Backhoe
- Compactor
- Lowbed Trailer
- Dump Box
- Simulator

Armoured

MHE:
- Light Rough Terrain Forklift
- Medium Rough Terrain Forklift
- Heavy Rough Terrain Forklift
- Telescopic Rough Terrain Forklift
- Rough Terrain Container Handler

- **Reserve Force COTS**
- Dump Truck
- Backhoe
- Tilt Trailer

PROJECT STATUS:

- In Options Analysis
  - Enter Definition – 2018/2019
  - Implementation Approval – 2020/2021
  - Contract Award - 2021
  - Final Delivery - 2025

- FUNDING
  - Total Project Value - $250-499 M

CAF STAKEHOLDERS:

- Canadian Army (Project Sponsor)
- Royal Canadian Air Force
- Canadian Joint Operation Command
- Military Personnel Command
- Canadian Special Operations Forces Command

HIGH LEVEL MANDATORY REQUIREMENTS

- Protection
  - Armoured Operator Protection System
  - Surfaces CBRN resistant
- Mobility
  - Air (CC-177 and/or CC-130 – depending on the vehicle)
  - Sea
  - Land (rail, road and cross-country)
- Effects
  - Capable of completing engineer and material handling tasks
  - Domestic and deployed operations
  - Extreme climatic conditions
  - NATO standard fuel
- Communications
  - Heavy Construction Equipment fitted for not equip with C^2
  - No communications for the Reserve Equipment
  - No communications for the Material Handling Equipment
- Human Factors
  - Operator with personnel protection equipment, personnel weapon & combat supply
  - Protects operator from environmental temperature effects
  - Ergonomic
- Sustainment
  - Minimum life expectancy of 20 years
  - Sustainment Contract

DELIVERABLES (Heavy Construction Equipment)

36 Dozers + 6 Armoured Operator Protection Systems

25 Graders + 6 Armoured Operator Protection Systems

12 High Speed Armoured Backhoes

25 Excavators + 6 Armoured Operator Protection Systems

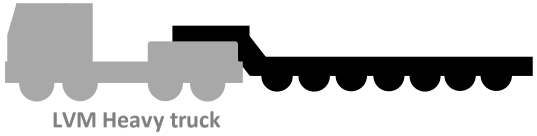
30 Loaders + 6 Armoured Operator Protection Systems

14 Cranes + 4 Armoured Operator Protection Systems

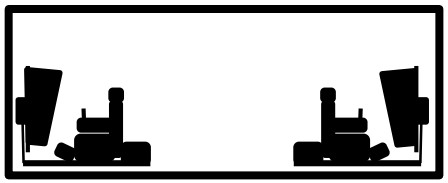
17 Compactors +4 Armoured Operator Protection Systems

40 Dump Box

8 Lowbed Trailer



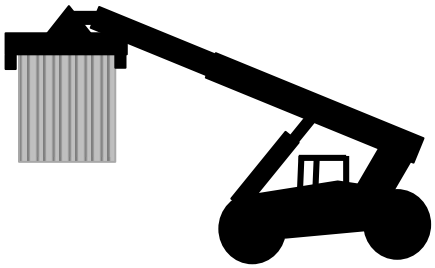
8 Simulators Systems



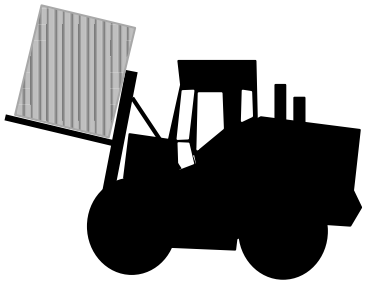
Representative Images

DELIVERABLES (Material Handling Equipment)

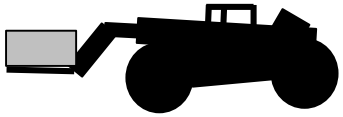
12 RTCH



20 RTFL (H)

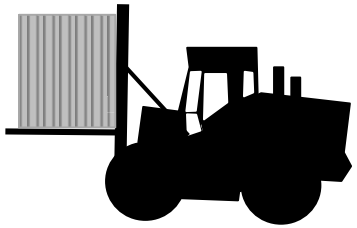


113 RTFL (T)



81 RTFL (L)

66 RTFL (M)

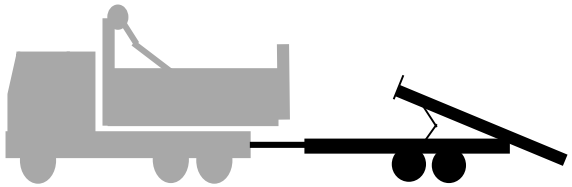


Representative Images

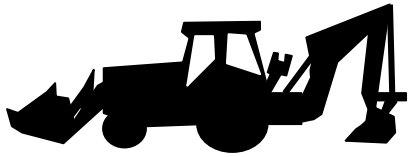
DELIVERABLES (Reserve Force COTS)

31 COTS Dump Truck

69 Tilt Trailer/beavertail



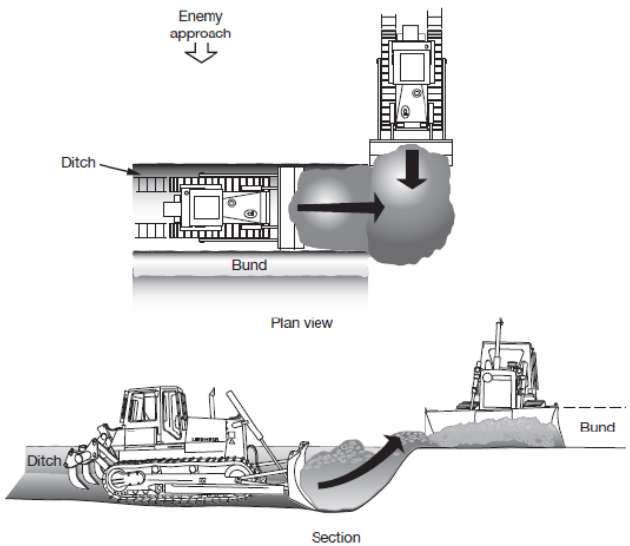
31 COTS Backhoe



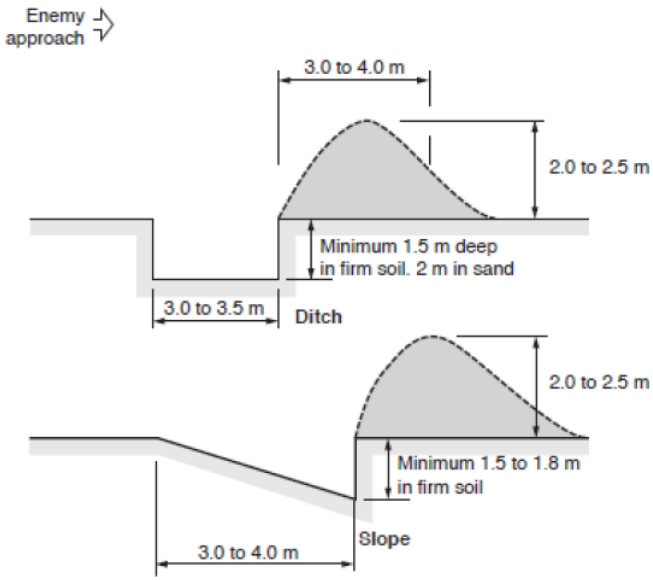
Representative Images

SOME EXAMPLES OF MILITARY SPECIFIC TASKS FOR HCE

- Build/maintain combat roads
- Build/maintain roads/bridges/airstrips
- Build/maintain camps
- Create lanes through obstacles
- Remove obstacles
- Construct/excavate obstacles
- Construct/excavate field fortifications
- Remediate combat damage



<<T Push>> Method to build Anti-Tank Ditches



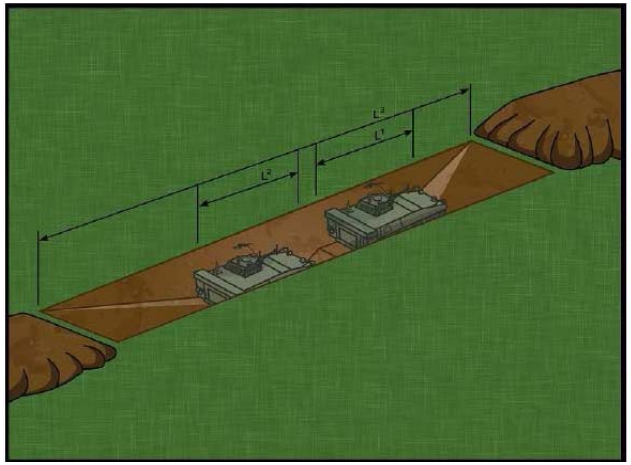
Anti-Tank Ditches

FIELD FORTIFICATIONS FOR VEHICLE

LAV 6.0

Size/Weight:

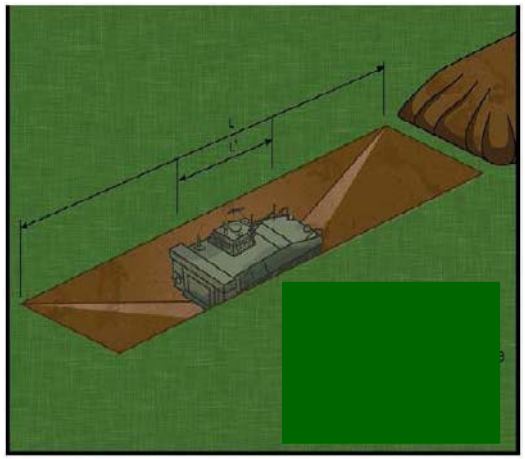
Length:	7,620 mm
Width:	2,780 mm
Height:	3,160 mm
GVWR:	28,636 kg



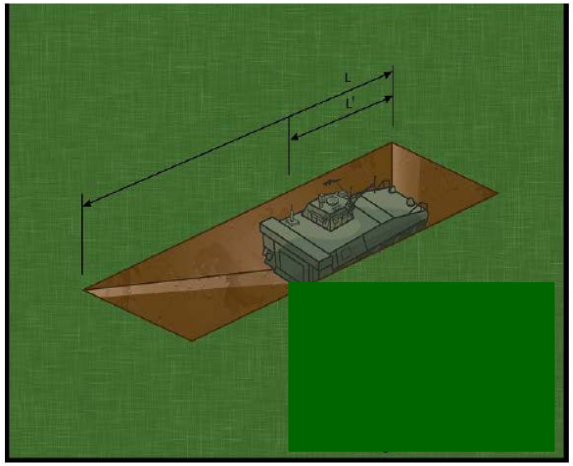
LEO 2

Size/Weight:

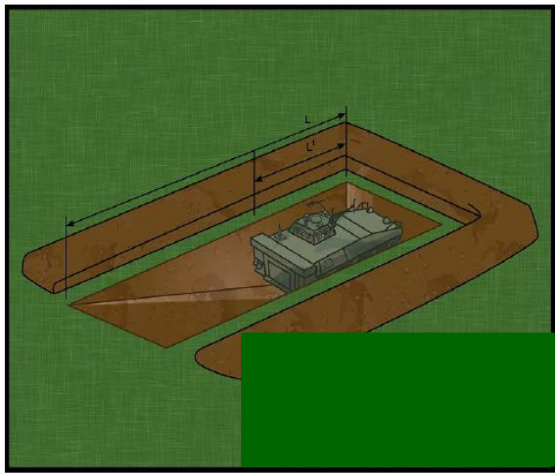
Length:	9,670 mm
Width:	3,700 mm
Height:	2,790 mm
GVWR:	55,150 kg



Type A



Type B



Type C

LINKS TO OTHER PROJECTS

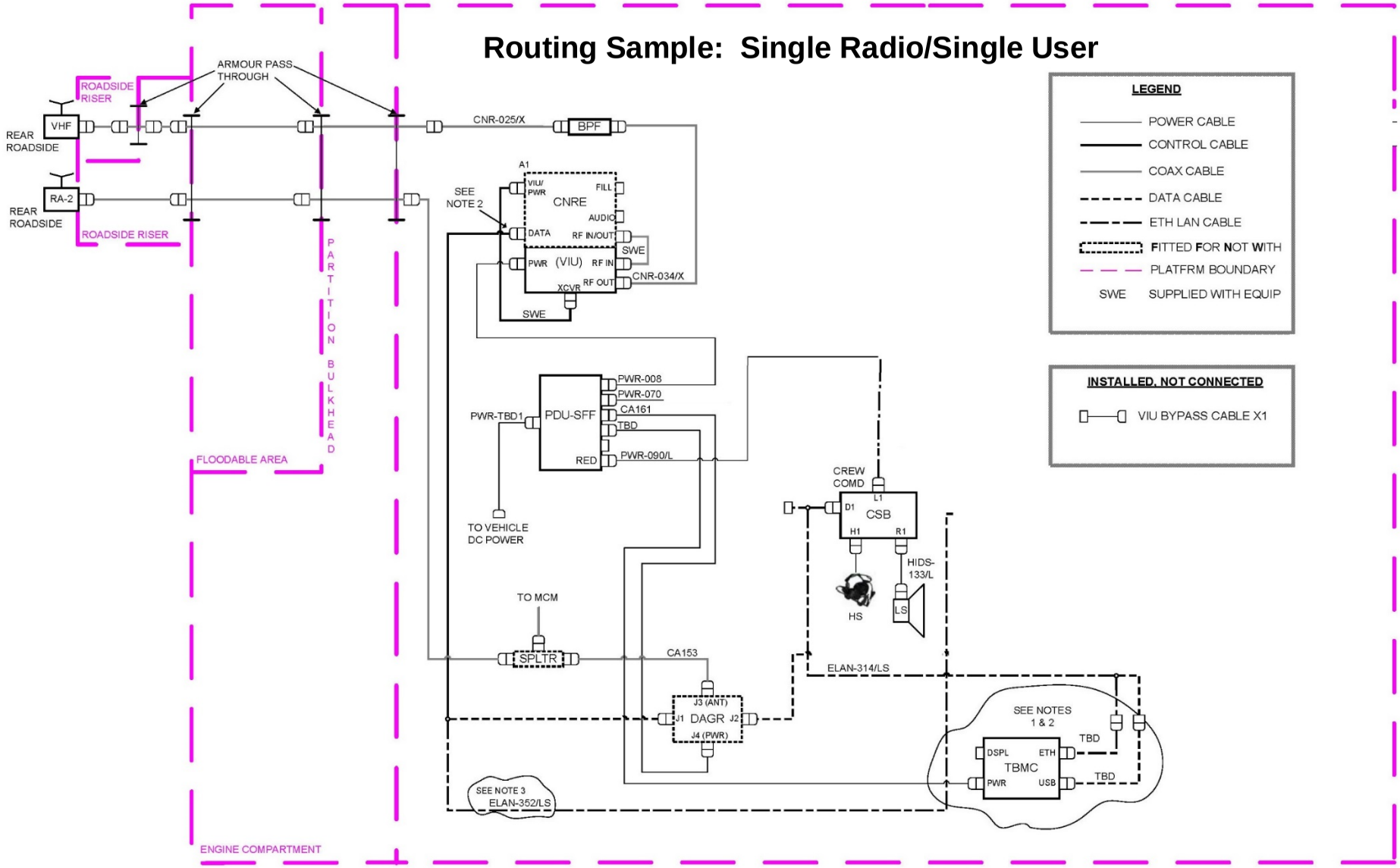
Other Projects	Links	Effects
Logistic Vehicle Modernisation	• Provide tractor for the lowbed trailer • Provide chassis for the dump box • 16.5 Tons payloads	➢ Lowbed must be compatible with LVM (Heavy) ➢ Dump box must be compatible ➢ Max payload for dump box to be 16.5 Tons. CHER MHE must be capable of handling 16.5 Tons
Enhanced Recovery Capability	• ERC can recover 16.5 Tons containers to a distance to be confirmed.	➢ CHER crane must be more capable to support situations outside ERC capabilities
Tactical Communication Modernisation Project	• Will provide command and communications systems	➢ Integration for each platform to be <<Fit for not Equipped with>>

FIT FOR NOT EQUIPPED WITH C2

Communication Components

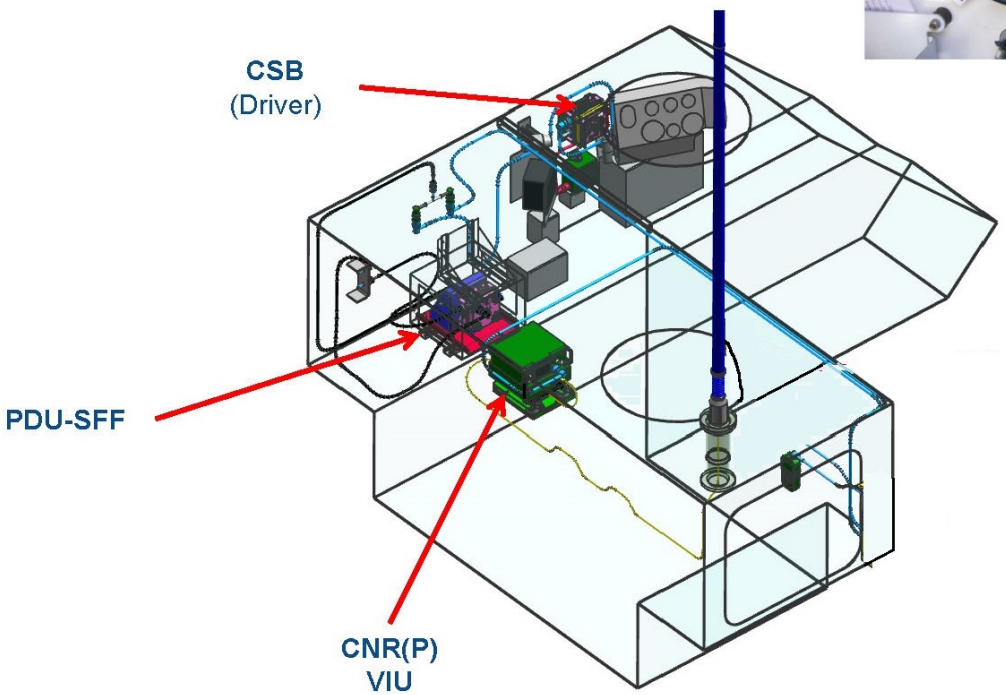
- Assuming one user, one Combat Net Radio Enhanced (CNRE)
  - CNRE tray with amp
  - CNRE
  - Communication Selector Box (CSB)
  - Power Distribution Unit Small Form Factor (PDU SFF)
  - Defence Advanced GPS Receiver (DAGR)
  - External Antenna (1 x CNRE, 1 x DAGR)
  - Tactical Battlefield Management Computer (TBMC)
  - Associated cable, trays and mounting brackets/hardware

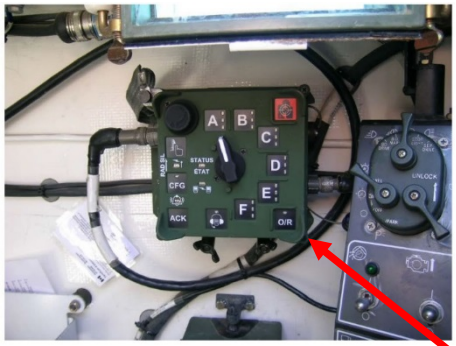
FIT FOR NOT EQUIPPED WITH C2



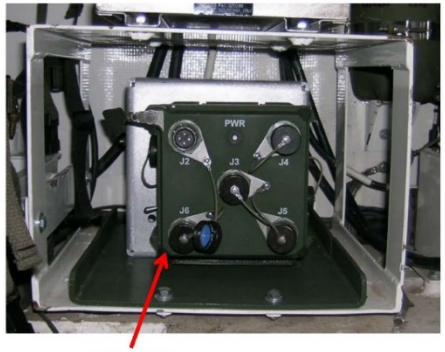
FIT FOR NOT EQUIPPED WITH C2

Component Examples





CSB



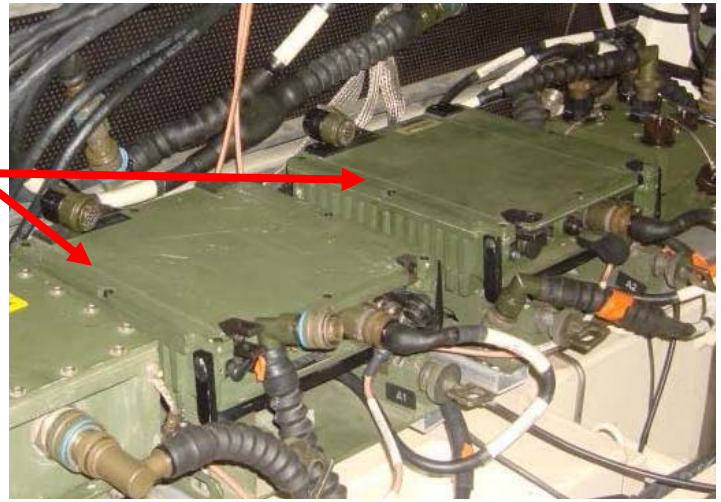
PDU-SFF
(Installed vertically as shown)

FIT FOR NOT EQUIPPED WITH C2

Component Examples

CNRE Radio

CNRE Trays with Amps



Tactical Battlefield Management Computer Example - 11.5” (L) x 7.8” (W) x 1.6” (D)

DAGR

FIT FOR NOT EQUIPPED WITH C2

Example of CNRP in an External Box

BIG QUESTIONS

- Which model (size) for each type of equipment would you recommend?
- For each type of equipment, what attachments would you recommend?
- What's the maximum level of protection for the operators that can be achieved and what are the trade-offs on other capabilities (mobility, visibility etc…)?
- For military operations and taking in consideration the Enhanced Recovery Capability Project capabilities and the MHE capabilities CHER project will also deliver; would you recommend a Mobile or Rough Terrain Crane, what are the advantages / disadvantages?

Requirement Package for RFI

Annex A – Project Overview

- Appendix 1 – Diagram
- Appendices 2-19 – Equipment Specific Lists of Questions

(20 documents in English and 20 documents in French)

National Defence | Défense nationale

ASSISTANT DEPUTY MINISTER (MATERIEL)

DIRECTOR GENERAL LAND EQUIPMENT PROGRAM MANAGEMENT

COMMON HEAVY EQUIPMENT REPLACEMENT (CHER)

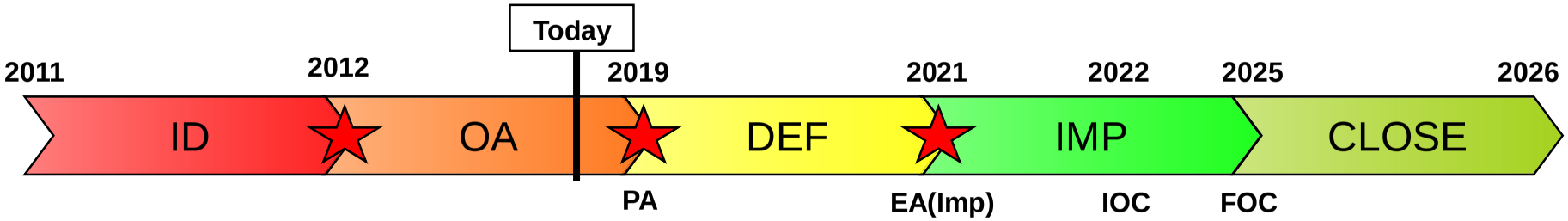
Request For Information
Industry Day
Sustainment Requirements

5 June 2018

Elizabeth Brandon-Williams – Project Manager

Canada

Project Status



Canada's Defence Policy

Strong, Secure, Engaged

Long-Term Investments to Enhance the Canadian Armed Forces' Capabilities and Capacity

- ***40. Modernize logistics vehicles, heavy engineer equipment and light utility vehicles.***

Google “Sustainment” …

Sustainment Initiative

Concepts

- Supply Chain
- Levels of Maintenance - 1st / 2nd Line Repair
- Levels of Maintenance – 3rd / 4th Line Repair
- Logistics Support Analysis
- Preventative Maintenance
- Corrective Maintenance
- Operator Training
- Technician Training
- Project Management Office vs. Equipment Management Team
- DRMIS (Defence Resource Management Information System)

Sustainment Initiative (cont.)

Requirements

- Availability
- Training
- Planned Preventative and Corrective Maintenance
- Spare Parts
- Field Service Representative (FSR)
- Service Facilities
- Engineering Services
- Technical Data Package
- Configuration / Obsolescence Management
- Intellectual Property Rights
- Testing

Annex B – Sustainment Requirements

- Appendix 1 – Sustainment Heavy Support Equipment (HSE)
- Appendix 2 – Sustainment Simulator
- Appendix 3 – Sustainment HSE Leasing

(4 document in English and 4 documents in French)

Annex C – Costing

Section 1

Item Reference Annex A	Description	Product Description i.e. Manufacturer, Year, Model and etc.	Quantity	Firm unit price 0 = No Cost
Appendix 2	**Dozer - Firm Quantity**		36	$ -
	Shipping cost to Montreal Depot			$ -
	Average operating cost per hour including tires, fuel,oils...etc Please provide a detailed response.			
	Any economy of scale for a certain quantity procured? If so please provide additional information.			
	Armoured Operator Protection System for Dozer - Firm Quantity		6	$ -
	Shipping cost to Montreal Depot			$ -
	Any economy of scale for a certain quantity procured? If so please provide additional information.			

Annex C – Costing

Section 2

Platform:				
Annex B Paragraph Reference	Description	Please provide additional information if applicable	Quantity	Firm unit price 0 = No Cost
2.3	Training based on recommendation from response			
2.5	Spares Parts			
2.5.4	Special Tool and Test Equipment (STTE) for the preventive and corrective maintenance the CHER vehicle			
2.6	Fielding support, respondent can provide the total cost or a breakdown by activities or unit prices:	Hourly Rate		
2.7	Service Facilities			
2.8.2	Technical Investigation and Engineering Services (TIES)	Hourly Rate		
2.8.2	Additional Work Requirement (AWR)	Hourly Rate		
2.9	Technical Data Package			
2.9.2	Provision of Technical Publications			
2.10	Configuration Management (CM)			
2.10.2	Obsolescence Management (OM)			
2.11	Licence to IP rights specified (if applicable)			
2.12	Testing			
	Warranty Period			

Industry Engagement for Common Heavy Equipment Replacement Project

Industrial and Technological Benefits/ Value Proposition

June 5, 2018

Building a prosperous and innovative Canada

Outline

- Objective
- Defence Procurement Strategy
- Industrial and Technological Benefits including Value Proposition
- Skills Development and Training Pillar
- Key Industrial Capabilities (KICs)
- Industry Consultation
- Next Steps

Objective

- The Government of Canada is consulting with industry to support the development of an approach for leveraging economic benefit for the Common Heavy Equipment Replacement (CHER)Project.

- Feedback from industry will be used to:

  - Validate the Government of Canada's analysis of the Canadian automotive/heavy industry sector and related capabilities; and,

  - Develop an economic leveraging approach in support of the CHER.

Canada's Defence Procurement Strategy

- Announced in February 2014, by the Ministers of:
  - Public Works and Government Services (now Public Services and Procurement Canada)
  - National Defence
  - Industry Canada (now Innovation, Science and Economic Development Canada)
- Goals:
  - Deliver the right equipment to the Canadian Armed Forces and the Canadian Coast Guard in a timely manner
  - Leverage purchases of defence equipment and services to create jobs and economic growth in Canada
  - Streamline the defence procurement process

Industrial and Technological Benefits (ITB) Policy

- The Industrial and Technological Benefits (ITB) Policy has been in place since 1986. In 2014, it was transformed to include the Value Proposition (VP).
  - Winning bidders are selected on the basis of price, technical merit and their Value Proposition
  - The VP includes bidder's commitment to undertake work in Canada and will generally account for 10 percent of the overall score
  - Companies awarded procurement contracts must undertake business activity in Canada equal to the value of the contract

Value Proposition

- Commitments/activities proposed at bid time
- Rated and weighted during bid evaluation

Outstanding Obligation

- Activities identified after contract award
- Brings identified activities up to 100 percent of contract value

Value Proposition Pillars

- Supports the long-term sustainability and growth of Canada's defence industry;
- Supports the growth of bidders' Canadian operations as well as their suppliers in Canada, including SMBs in all regions of the country;
- Enhances innovation through research and development (R&D) in Canada;
- Increases the export potential of Canadian-based firms; and
- Promotes skills development and training to advance employment opportunities for Canadians. (NEW)

Skills Development & Training Pillar (NEW)

- The Skills Development & Training Pillar was created to address current or anticipated skills gaps and training opportunities

- Bidders will be encouraged to identify initiatives to develop skills and training through:
  - ✓ Work integrated learning programs (e.g., co-operative education; work placements)
  - ✓ Apprenticeship programs
  - ✓ A new or existing skill development program at or through a post-secondary institution
  - ✓ Other activities that align with the ITB objectives for skills development and training

The VP is a flexible framework

On a procurement-by-procurement basis, there is flexibility to:

- Increase/decrease the 10% weight of the VP
- Weigh individual evaluation criteria differently
- Apply all or some of the evaluation criteria
- Add additional evaluation criteria
- Apply mandatory requirements
- Develop different rating grids

Informed by:

Industry engagement

Research and analysis

3rd party experts

Key Industrial Capabilities (KICs)

- Key Industrial Capabilities (KICs) were introduced in April 2018 to ensure that defence procurements can better drive innovation, exports and the growth of firms through the ITB Policy.

- KICs represent areas of emerging technology with the potential for rapid growth, established capabilities where Canada is globally competitive, and areas where domestic capacity is essential to national security.

- KICs are defined as the skills, technologies, and supply chains required to support the growth of these capabilities. They are broader than the companies associated with the end solution; they include the post-secondary institutions that develop skills and research, the SMEs that form part of the value chain, and intellectual property that is developed in Canada.

Key Industrial Capabilities

EMERGING TECHNOLOGIES

- Advanced Materials
- Cyber Resilience
- Remotely-piloted Systems and Autonomous Technologies
- Artificial Intelligence
- Space Systems

LEADING COMPETENCIES & CRITICAL INDUSTRIAL SERVICES

- Aerospace Systems & Components
- Defence Systems Integration
- Ground Vehicle Solutions
- Marine Ship-Borne Mission and Platform Systems
- Shipbuilding, Design and Engineering Services
- Training & Simulation
- Armour
- Electro Optical / Infrared Systems
- In-Service Support
- Munitions
- Sonar & Acoustic Systems

Industry Consultation

- The Government of Canada is seeking industry feedback to support the development of the economic leveraging approach for the CHER project

- Industry engagement questions were published on Buyandsell in advance of the CHER Industry Day.

- We encourage all potential bidders and suppliers to provide comments.

Next Steps

- Written feedback regarding the ITB/VP questions is to be submitted to the PSPC Contracting Authority.
- Information provided to the Government of Canada will be considered in the development of the economic leveraging approach for the CHER project.
- For more information on Canada's Industrial and Technological Benefits Policy, please visit: http://www.canada.ca/itb

For any ITB related questions, contact:

Mr. Mathieu Belanger

Project Manager

Industrial and Technological Benefits Branch

Innovation, Science and Economic Development Canada

Tel: (613) 410 2344

Email: mathieu.belanger@canada.ca

Website: http://www.canada.ca/itb

Questions

- Benoît Paquin, PSPC, Request For Information
- Maj Francois Langis, DND, Project Overview
- Elizabeth Brandon-Williams, DND, Sustainment Requirement
- Eric Carrière, DND, Costing
- Mathieu Belanger, ISED, ITB Policy

Contacts

- PSPC Contracting Authority:
  Benoit Paquin
  Supply Team Leader
  Tel: 873-469-3401
  benoit.paquin@tpsgc-pwgsc.gc.ca

- PSPC Contracting Authority:
  Annie Therien
  Supply Officer
  Tel: 819-420-5526
  annie.therien@tpsgc-pwgsc.gc.ca