



**RETURN BIDS TO:  
RETOURNER LES SOUMISSIONS À:**

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**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**  
Civilian Aircraft Division/Division des Avions Civils  
Portage III 8C1 - 50  
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<b>Title - Sujet</b> Remotely Piloted Aircraft System	
<b>Solicitation No. - N° de l'invitation</b> T8493-150035/C	<b>Amendment No. - N° modif.</b> 007
<b>Client Reference No. - N° de référence du client</b> T8493-150035	<b>Date</b> 2019-12-02
<b>GETS Reference No. - N° de référence de SEAG</b> PW-\$CAG-004-27353	
<b>File No. - N° de dossier</b> 004cag.T8493-150035	<b>CCC No./N° CCC - FMS No./N° VME</b>
<b>Solicitation Closes - L'invitation prend fin</b> <b>at - à 02:00 PM</b> <b>on - le 2019-12-17</b>	
<b>F.O.B. - F.A.B.</b> <b>Plant-Usine:</b> <input type="checkbox"/> <b>Destination:</b> <input checked="" type="checkbox"/> <b>Other-Autre:</b> <input type="checkbox"/>	
<b>Address Enquiries to: - Adresser toutes questions à:</b> Bootsma, Lena	<b>Buyer Id - Id de l'acheteur</b> 004cag
<b>Telephone No. - N° de téléphone</b> (873) 469-3864 ( )	<b>FAX No. - N° de FAX</b> ( ) -
<b>Destination - of Goods, Services, and Construction:</b> <b>Destination - des biens, services et construction:</b>	

**Instructions: See Herein**

**Instructions: Voir aux présentes**

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



# Summary of Feedback and Outcomes

## Industry Engagement

Remotely Piloted Aircraft System  
for the National Aerial Surveillance Program in Canada's Arctic  
Letter of Interest (LOI) T8493-150035/C



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## 1 Introduction

Transport Canada (TC) requires a Remotely Piloted Aircraft System (RPAS) that is capable of operation Beyond Visual Line of Sight (BVLOS). TC will operate the RPAS as a proof of concept in order to evaluate RPAS technology to support the National Aerial Surveillance Program (NASP) in conjunction with the existing fleet of manned surveillance aircraft to maintain persistent domain awareness in Canada's Arctic. The RPAS must include a Remotely Piloted Aircraft (RPA) or Optionally Piloted Aircraft (OPA), sensor equipment to be carried as payload on board the RPA, communication links, and the RPAS mission control station and launch and recovery elements. The Contractor must provide initial training. The Contractor must provide the Optional Goods, such as spares, equipment, and parts necessary to maintain and operate the RPAS, and additional components of the RPAS, on an as and when requested basis by Canada.

On 11 June 2019, Canada posted a Letter of Interest (LOI) with draft RFP on this Tender Notice, T8493-150035/C. The LOI invited potential suppliers to provide feedback on the draft RFP and opened up 1-on-1 meetings with Canada's RPAS project team to potential bidders upon their request. The purpose was to identify if the requirements of the draft RFP were understood and could be met by Industry within the stated budget. The engagement activities gave Industry the forum to provide their input into the development of the final RFP and make known any issues, comments, suggestions and questions for Canada to consider when finalizing the RFP for solicitation.

## 2 Purpose

The purpose of this document is to:

- A. Summarize the feedback received from Industry during the recent Industry Engagement Activities and the outcome on the development of the final RFP;
- B. Ask interested potential bidders to indicate to Canada of their ability to meet the requirements;
- C. Inform Industry of the next proposed step in the procurement process.

## 3 Industry Consultative Process

The Consultative Process and the Engagement Activities that have taken place are summarized below. A third party Fairness Monitor was, and continues to be, an integral part of the process.

<b>Aboriginal Consultation</b>	Prior to initiating consultation with Industry, Transport Canada engaged with Aboriginal groups in the North where operations would take place, and PSPC provided a Notification of Procurement to the applicable Comprehensive Land Claims Agreement (CLCA) groups. As applicable to the activity to be performed under the resulting contract and for any potential future activity in the North, TC consults community leaders, aboriginal associations, local governments, and academia and obtains authorizations and permits as required to conduct operations.
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<b>Period</b>	<p>The Consultative Process began March 9, 2016 with a Letter of Interest (LOI) posted on BuyandSell.gc.ca (T8493-150035/A), and will conclude with the publication of the official final RFP, or when the Contracting Authority notifies industry participants, whichever is sooner.</p> <p>Participants are reminded that they are welcome to contact the Contracting Authority during this period with any questions, comments or additional feedback.</p>
<b>Letter of Interest T8493-150035/A</b>	<p><b>March 9, 2016</b></p> <p>The LOI invited interested parties to register as Participants in the Consultative Process. 43 companies registered:</p> <ul style="list-style-type: none"> <li>▪ 18 UAS Suppliers</li> <li>▪ 16 potential major subcontractors to UAS suppliers (sensor, surveillance, communication systems, simulation, platform)</li> <li>▪ 9 other companies (academia, distributors, consultants)</li> </ul> <p>Canada provided the Participants with the Draft Baseline SOR, Mission Scenarios, Draft Evaluation Plan, and Questions for Industry that requested written responses to specific areas Canada is looking for feedback on.</p>
<b>Initial Written Response</b>	15 companies provided an initial written response to the Questions for Industry before Industry Day or their One-on-One meeting.
<b>Industry Day</b>	<p><b>April 27, 2016</b></p> <p>Canada held an Industry Day which was open to all Participants.</p> <p>42 individuals representing 30 of the Participant companies were in attendance.</p> <p>Canada provided a Record of Discussion and list of attendees to all Participants.</p>
<b>One-on-One Meetings</b>	<p><b>April 25 - May 19, 2016</b></p> <p>One-on-One meetings were open to Participants that are potential prime bidders (UAS suppliers) and potential major subcontractors to a prime.</p> <p>Canada held 18 One-on-One meetings with 23 companies.</p> <p>Canada provided a Record of Discussion to the individual companies of each meeting for their review.</p>
<b>Final Written Response</b>	6 companies provided a final written response after their One-on-One meeting, as applicable to reflect any changes or additional feedback to their initial written response.
<b>Summary of Feedback and Outcomes T8493-150035/B</b>	<p><b>August 24, 2016</b></p> <p>Canada posted a second LOI, T8493-150035/B, giving an overview of the Industry Consultative Process that had taken place. Companies registered as Participants were provided with a detailed document summarizing the feedback received from Industry and the outcome on the development of the Request for Proposal (RFP).</p>

<p><b>Exploring Options</b></p>	<p><b>September 24, 2018 – June 3, 2019</b></p> <p>September 24, 2018, Canada notified Industry Participants that the potential acquisition of a surplus RPAS from the Federal Republic of Germany which meets the original mandatory requirements was being explored.</p> <p>June 3, 2019, Canada notified Industry Participants that the option exploration was complete and had determined to continue with Industry Engagement for an open competitive process.</p>
<p><b>Letter of Interest T8493-150035/C with Draft RFP</b></p>	<p><b>June 11, 2019</b></p> <p>The draft RFP was publicly posted with the LOI along with a set of Questions for Feedback. This draft RFP phase of the Consultative Process was intended for potential suppliers to the requirement, and the 1-on-1 meetings for potential bidders. All information provided by Canada was posted publicly and registration to participate in this stage of the process was not required. Previously registered Participants were informed that the email distribution list for registered Participants would no longer be used for communication from Canada and to visit buyandsell.gc.ca regularly.</p>
<p><b>Written Responses</b></p>	<p><b>July 2019</b></p> <p>Canada received eight (8) written responses to the Questions for Feedback. Respondents included RPAS manufacturers and sensor and integration companies.</p>
<p><b>One-on-One Meetings</b></p>	<p><b>August 6 – 12, 2019</b></p> <p>Canada’s RPAS for NASP project team held seven (7) One-on-One meetings with potential bidders. Some potential bidders included subcontractors at the meeting.</p>
<p><b>Follow Up Feedback</b></p>	<p><b>Mid August – Mid September</b></p> <p>Canada provided a Record of Discussion for the 1on1 meetings to each potential bidder that participated for their review and input. Follow-up feedback, presentation slides and any other comments or questions were received by Canada.</p> <p>An additional three (3) companies expressed interest, submitted information and/or had questions which were corresponded by phone, in person or email to PSPC.</p> <p><b>Mid November</b></p> <p>Canada received written letters of input from an additional four (4) entities.</p>

## 4 General Overview of Industry Feedback

Industry engagement with Canada through review of the draft RFP, response to the Questions for Feedback, and participation in 1-on-1 meetings proved very constructive. Canada recognizes and appreciates the time and effort taken by those who participated. The feedback is well received and has been productive in development of an RFP with a requirement that is achievable for solicitation of competitive proposals that will meet Transport Canada’s objectives.

The following topics form the primary focus for this summary:

1. Delivery
2. Financials
3. Bid Submission
4. Resulting Contract
5. Technical Certification and Other Operational Requirements
6. Remotely Piloted Aircraft Requirements
7. Payload and Sensor
8. Analytics, automation, fusion and data exploitation
9. Data Link
10. Mission Control Stations (MCS)
11. Training,
12. IP / Technical Data
13. Maintenance / Support, and Optional Goods

These areas have been addressed either through changes to the requirements or clarification, as described in the next sections. Some of these were also identified as cost drivers and/or items of non-compliance for potential bidders. Non-compliant requirements that were made known to Canada have been changed if feasible to also maintain Transport Canada's objectives. Canada has heard Industry's comments that some specification based requirements can be unnecessarily restrictive and should be performance based instead. Canada was able to revise the requirements where possible to identify the capability required rather than the equipment required. This will allow the bidder to determine how to best meet the capability requirement with their existing RPAS system. Revisions were made to the requirements for satcom and datalink as well as the Mission Control Stations.

A change document is attached to this Summary at Appendix II, which details the changes made to the Statement of Work and includes more changes than described in this Summary.

To give potential bidders notice to prepare if necessary, Canada would like to take this opportunity to bring to potential Bidders attention that a Security Requirement has been identified as applicable to the work of a resulting contract. For additional information, consult Part 6 - Security, Financial and Other Requirements at Section 5.3 below.

## 5 Summary of Feedback and Outcomes

**Important** – the RFP/Contract article numbers, SOW section numbers, and SOR IDS in this document refer to those in the draft RFP that was posted with the Letter of Interest on June 11, 2019. The numbering in the final RFP will change due to edits being made.

### 5.1 Delivery

<b>TOPIC</b>	Industry provided comments and questions regarding delivery.
<b>FEEDBACK</b>	
a)	Locations – Consideration was requested for preliminary RPAS testing at another location besides the Contractor's facilities. What the potential locations 350 km from Ottawa are for final delivery was requested for the RPAS as well as Optional Goods.

	<p>b) 24 months for delivery of the RPAS was considered reasonable by Industry, noting potential risk to schedule for acceptance testing and airworthiness.</p> <p>c) Delivery timeframe for Optional Goods was requested.</p> <p>d) Comments were received regarding the dates for the Project Milestones and Deliverables at SOW Section 15 as follows:</p> <ul style="list-style-type: none"> <li>• Deliverable 1. Project Initiation Meeting (also at SOW 8.1) – 25 working days from contract award is too aggressive.</li> <li>• Deliverable 45. Final Acceptance Test Plan (also at SOW 9.1) – 20 working days after Critical Design Review (CDR) is too aggressive.</li> <li>• Deliverable 99. Final Delivery – Should be a timeframe from contract award, not a specific date.</li> </ul>
<p><b>OUTCOME</b></p>	<p>Canada has made the following changes and clarifications:</p> <p>a) Preliminary RPAS acceptance test #1 has been changed to the Contractor’s designated facility. Final delivery of the RPAS and delivery ceremony has been changed to Iqaluit, NU, Canada. Delivery of Optional Goods, if requested, will be to Ottawa, ON, Canada.</p> <p>b) The Final Acceptance Test has been changed from Ottawa to Iqaluit, NU, Canada and preliminary acceptance test #2 has been removed with the applicable requirements included as part of the Final Acceptance Test. To clarify regarding flight approvals and airworthiness - the Project Authority of Transport Canada will obtain the flight approvals required for the acceptance testing in Iqaluit, and the Contractor is responsible for any operational approval required for the preliminary acceptance test #1.</p> <p>c) As per 7.1.1, the provision of Optional Goods will be on an “as and when requested basis” during the period of the Contract which is identified at 7.4.1.</p> <p>d) Project Milestones have been amended as follows:</p> <ul style="list-style-type: none"> <li>• Project Initiation Meeting – 40 working days from contract award.</li> <li>• Final Acceptance Test Plan – 40 working days from after CDR.</li> <li>• Final Delivery – on or before 24 months from date of Contract.</li> </ul>

## 5.2 Financials

<p><b>TOPIC</b></p>	<p>Canada asked Industry to indicate a cost range for their solution, as well as spares and equipment to support 2000 hours of operation, and if the mandatory requirements and many desirable requirements could be met within the Maximum Funding stated in the draft RFP (\$32M, CAD, taxes extra). Any other feedback relative to the Financial Bid was requested.</p>
<p><b>FEEDBACK</b></p>	
<p>Feedback from Respondents was received regarding the Financial Bid as well as Payment Terms of the resulting contract.</p>	

- a) The majority of the Respondents indicated a solution to meet the RPAS requirements would be greater than \$30M, and greater than \$2M for spares and equipment to support 2000 hours of operation.
- b) Payment in Canadian funds coupled with no foreign exchange risk mitigation increases the cost of risk to the bidder which will factor into the bid price. Will Canada consider pricing in USD or including a foreign exchange clause?
- c) Canada was requested to consider amending the Payment Milestones to provide more payment earlier in the process as substantial costs would be incurred before the first substantial payment in the draft RFP.

**OUTCOME**

Canada has made the following changes and clarifications:

- a) Changes have been made to the technical requirements, which are described throughout this document and detailed in the attached Change Document, many of which were identified as cost drivers by respondents. Among these include removal or changes to the requirements for:

- Airworthiness certification, TAWS B, TCAS II
- Onboard analytics, radar automated anomaly detection,
- An MX15HDi EO/IR will be provided as Government Furnished Equipment (GFE),
- Satellite and datalink requirements
- Mission Control Stations

In addition, as per the delivery changes noted in 5.1 above, final delivery is changed from Ottawa to Iqaluit, alleviating the need and cost to fly or transport the RPAS to Ottawa for acceptance.

Wording around the provision of Spares and Equipment will be made to clarify that the requirement is not to deliver 2000 hours of spares and equipment under the resulting contract, only a list is required, from which Canada will choose to purchase “as and when requested” within the limitation of expenditure for Optional Goods of the resulting contract.

The pricing for Optional Goods that is held for the term of the contract is a minimum discount percentage off list price, as per the Basis of Payment and Financial Bid. Once a Task Authorization is sent to the Contractor for a list of spares, firm pricing is requested from the Contractor for that potential order.

- b) Canada will include in Part 3, Section II Financial Bid, the SACC Manual clause C3010T, Exchange Rate Fluctuation Risk Mitigation, which can be found at the following link: <https://buyandsell.gc.ca/policy-and-guidelines/standard-acquisition-clauses-and-conditions-manual/5/C/C3010T/11>
- c) Canada intends to add another Payment Milestone before the Preliminary Acceptance Test #1, anticipated to provide payment for 25% of the Firm Price for 50% work completion.

### 5.3 Bid Submission

<b>TOPIC</b>	Canada asked potential bidders if there were any issues, questions or clarifications required regarding the bidding requirements in Part 1 through 6 of the RFP. Canada specifically requested if the solution could be provided via Direct Commercial Sale (DCS); if the Phased Bid Compliance Process (PBCP) was clear; if the Basis of Selection was clear, fair and reasonable; and if clarifications were needed regarding the Controlled Goods Program registration.
<b>FEEDBACK</b>	
<b>PART 1 – GENERAL INFORMATION and PART 2 – BIDDER INSTRUCTIONS</b>	
	<p>a) DCS – The majority of respondents indicated their solution can be provided via DCS. Some respondents indicated they may not be able to provide some components via DCS and clarification was requested on delivery of systems with crypto requirements.</p> <p>b) Canadian Content – Clarification was requested if there would be a requirement for Canadian Content or for a Canadian entity to be involved.</p> <p>c) Part 2 - Bidder Instructions, Section 2.1 – Does the deletion of 60 days and insertion of 240 days at Subsection 5.4 of SACC manual clause 2003 mean Canada intends to hold the RFP open for 240 days?</p>
<b>OUTCOME</b>	<p>Canada has made the following changes and clarifications:</p> <p>a) DCS - Canada intends to proceed with a standard competition for DCS. Encryption requirements are for commercially available, non-military systems.</p> <p>b) Canadian Content – The bid solicitation cannot be limited to suppliers of Canadian goods and/or services, as there are not known to be 2 or more suppliers in the marketplace that can certify provision of Canadian goods and/or services in accordance with the Canadian Content Policy (eg. That 80% of the value is Canadian Content). For information on the determination of origin of goods and/or services under the Canadian Content Policy, refer to the following link: <a href="#">Annex 3.6: Canadian Content Policy: Rules of Origin Determination</a>. Innovation, Science and Economic Development Canada (ISED) has determined that this procurement is not eligible for Industrial and Technological Benefits and Value Proposition. There is no mandatory requirement for a foreign entity to partner with a Canadian entity as a prime or major subcontractor for the work of the contract. All companies, including Canadian companies, which can provide an RPAS that meets the requirements are encouraged to submit a bid to the final RFP for evaluation as part of an open competitive process.</p> <p>c) 240 days is referring to the time period bids submitted by the closing date of the RFP are valid for after the closing date, as described in Subsection 5.4 of <a href="#">2003</a>, Standard Instructions - Goods or Services - Competitive Requirements.</p>
<b>FEEDBACK</b>	
<b>PART 3 – BID PREPARATION</b>	
	<p>a) 3.1 - Can Canada accept bids on USB?</p>

	<ul style="list-style-type: none"> <li>b) 3.1 Section I, Technical Bid - Request to drop requirement to identify the page numbers in their Technical Bid where a topic is addressed.</li> <li>c) 3.1.2 – Request to make Electronic Payment of Invoices precedent to contract award rather than at bid submission.</li> <li>d) Assumption made that the experience of subcontractor(s) and parent companies can be used in a bidder’s submission.</li> </ul>
<p><b>OUTCOME</b></p>	<p>Canada has made the following changes and clarifications:</p> <ul style="list-style-type: none"> <li>a) 3.1 – As per the draft RFP, bids may be submitted electronically by epost Connect, or in hard copy and soft copy on DVD. Bids on USB or by facsimile cannot be accepted. Canada encourages the use of epost Connect. See 2.1, 2.2 and 3.1 of the draft RFP for more information. Note the lead time that a Bidder must open a conversation with PWGSC Bid Receiving if the Bidder is not using its own Canada Post licensing agreement for epost Connect.</li> <li>b) 3.1 Section I, Technical Bid – The Technical bid should identify at a minimum the section number and paragraph where each topic is addressed, and should also include the page number if possible.</li> <li>c) 3.1.2 – Electronic Payment of Invoices does not impact bid compliance. The following statement will be added: “It should be submitted with the bid but may be submitted afterwards”.</li> <li>d) If subcontractor and parent company experience is used in a bidder’s submission, the entities and work associated to those entities must be identified in the submission. See also draft RFP 5.1.2, List of Proposed Subcontractors.</li> </ul>
<b>FEEDBACK</b>	
<b>PART 4 – EVALUATION PROCEDURES AND BASIS OF SELECTION</b>	
	<ul style="list-style-type: none"> <li>a) 4.1.1 PBCP – there were no questions received or clarifications requested regarding this process and the comments Canada did receive indicated the process was clear.</li> <li>b) 4.2 Basis of Selection – request to distinguish between “Eligible” criteria (referred in the PBCP at 4.1) and all other mandatory criteria.</li> <li>c) 4.2 Basis of Selection – clarification requested regarding what is meant by “Conditions for Contracting in the time allotted for contracting”.</li> </ul>
<p><b>OUTCOME</b></p>	<p>Canada has made the following changes and clarifications:</p> <ul style="list-style-type: none"> <li>a) 4.1.1 PBCP – no change.</li> <li>b) As per 4.1.1.3, Eligible Mandatory Criteria are all mandatory technical criteria that are identified in the solicitation as being subject to the PBCP. As noted at 4.1.2.1, the PBCP will apply to all Mandatory Technical Criteria.</li> <li>c) 4.2 “Conditions for Contracting in the time allotted for contracting” refers to those conditions noted within the solicitation document where a time period is given or indicated will be given within which the bidder must meet that condition.</li> </ul>

<b>FEEDBACK</b>	
<b>PART 5 – CERTIFICATIONS AND ADDITIONAL INFORMATION</b>	
<p>5.2.3 - Rate or Price Certification for Optional Goods feedback received:</p> <ul style="list-style-type: none"> <li>a) Requesting clarification if this clause solely refers to Optional Goods and what is defined as Optional Goods.</li> <li>b) There is no comparison to other programs for this type of certification,</li> <li>c) Certification cannot be provided on behalf of a bidder’s suppliers,</li> <li>d) Customer information may not be able to be disclosed.</li> </ul>	
<b>OUTCOME</b>	<p>Canada has made the following changes and clarifications:</p> <ul style="list-style-type: none"> <li>a) This clause solely refers to Optional Goods as referenced in the resulting Contract at 7.1.1. This use of this clause is applied during the contract and is included in Annex B, Basis of Payment, of the resulting Contract. The wording will be edited at 5.2.3 to clarify this.</li> <li>b) The intent of this clause is for the Bidder / Contractor to be able to demonstrate that fair and reasonable pricing is provided. In the absence of competitive prices solicited for Optional Goods in the RFP, the method available is to solicit a minimum discount percentage off list and include the clause for price certification and price support.</li> <li>c) This Certification pertains to the bidder, as Optional Goods would be provided to Canada by the winning bidder. It is expected that the bidder would work with their suppliers to pass on favourable pricing to Canada and be able to demonstrate that if requested during the contract.</li> <li>d) If copies of paid invoices are requested to demonstrate fair pricing, the identifying customer information can be removed before providing to Canada.</li> </ul>
<b>FEEDBACK</b>	
<b>PART 6 – SECURITY, FINANCIAL AND OTHER REQUIREMENTS</b>	
<ul style="list-style-type: none"> <li>a) Assume the requirements in Part 6 only apply to the Prime Contractor.</li> <li>b) Controlled Goods Program (CGP) – What is the scope of the contract for controlled goods? How does this extend to non-Canadian contractors and sub-contractors? Is a Canadian subcontractor required to meet the CGP requirements?</li> </ul>	
<b>OUTCOME</b>	<p>Canada has made the following changes and clarifications:</p> <ul style="list-style-type: none"> <li>a) Yes, the Prime Contractor is responsible for these requirements. Note also the responsibilities of the contractor in regards to subcontractors at Subsection 06 of <a href="#">2030 (2018-06-21)</a>, General Conditions - Higher Complexity – Goods and <a href="#">2035 (2018-06-21)</a>, General Conditions – Higher Complexity – Services, which apply to and form part of the Contract.</li> <li>b) Canada will identify in the requirement that the EO/IR MX15HDi, which will be provided as GFE, is a Controlled Good. It is the responsibility of the Contractor to identify those items of their solution that are Controlled Goods and comply with the requirements of the CGP as applicable.</li> </ul>

As the resulting contract will require the production of or access to controlled goods, the winning supplier must be registered with the Controlled Goods Program. Within Canada only persons who are registered, exempt or excluded under the Controlled Goods Program (CGP) are lawfully entitled to examine, possess or transfer controlled goods. To register in the Controlled Goods Program, an organization must appoint an employee as a Designated Official, who must be a Canadian citizen or permanent resident who lives in Canada on a regular basis.

In the event that the winning supplier is foreign, they must be registered in an approved program recognized by Canada that is responsible for the safe handling of controlled goods or its equivalent and provide satisfactory proof.

The suppliers may obtain information on how to become involved in the CGP by contacting the CGP Call Centre at 613-948-4176 or 1-866-368-4646 or at [SSIDMC-ISSCGD@tpsgc-pwgsc.gc.ca](mailto:SSIDMC-ISSCGD@tpsgc-pwgsc.gc.ca). Please see the following link for more information regarding the Controlled Goods Program: <https://www.tpsgc-pwgsc.gc.ca/pmc-cgp/index-eng.html>.

### **Security Requirement**

To give potential bidders notice to prepare if necessary, Canada would like to take this opportunity to bring to potential Bidders attention that a Security Requirement has been identified as applicable to the work of a resulting contract. For more information on personnel and organization security screening or security clauses, Bidders should refer to the [Contract Security Program](http://www.tpsgc-pwgsc.gc.ca/esc-src/introduction-eng.html) of Public Works and Government Services Canada (<http://www.tpsgc-pwgsc.gc.ca/esc-src/introduction-eng.html>) website.

The following clauses will be added to the final RFP and resulting contract:

#### **SECURITY REQUIREMENT FOR CANADIAN SUPPLIER:**

##### **PWGSC FILE No T8493-150035**

1. The Contractor/Offeror must, at all times during the performance of the Contract/Standing Offer, hold a valid Designated Organization Screening (DOS), issued by the Contract Security Program (CSP) of the Industrial Security Sector (ISS), Public Works and Government Services (PWGSC).
2. This contract includes access to Controlled Goods. Prior to access, the contractor must be registered in the Controlled Goods Program of Public Works and Government Services Canada (PWGSC).
3. The Contractor/Offeror personnel requiring access to sensitive work site(s) must EACH hold a valid RELIABILITY STATUS, granted or approved by the CSP/ISS/PWGSC. Until the security screening of the Contractor personnel required by this Contract has been completed satisfactorily by the CSP/ISS/PWGSC, the Contractor personnel MAY NOT ENTER sites without an escort.
4. Subcontracts which contain security requirements are NOT to be awarded without the prior written permission of the CSP/ISS/PWGSC.

5. The Contractor/Offeror must comply with the provisions of the:
  - a) Security Requirements Check List and security guide (if applicable), attached at Annex \_\_\_\_; *(please see LOI Appendix I)*
  - b) *Industrial Security Manual* (Latest Edition).

**SECURITY REQUIREMENTS FOR FOREIGN SUPPLIERS**

**PWGSC FILE #: T8493-150035, REQUEST FOR PROPOSAL (RFP), RELIABILITY, SITE ACCESS**

The following foreign security clauses must be inserted into the solicitation documentation:

The Canadian Designated Security Authority (Canadian DSA) for industrial security matters in Canada is the Industrial Security Sector (ISS), Public Works and Government Services Canada (PWGSC), administered by International Industrial Security Directorate (IISD), PWGSC. The Canadian DSA is the authority for confirming **Contractor/Subcontractor** compliance with the security requirements for foreign suppliers. The following security requirements apply to the foreign recipient **Contractor/Subcontractor** incorporated or authorized to do business in a jurisdiction other than Canada and delivering outside of Canada the services listed and described in the subsequent **contract/subcontract**.

1. The Foreign recipient **Contractor/Subcontractor** must be from a Country within the North Atlantic Treaty Organization (NATO), the European Union (EU) or from a country with which Canada has an international bilateral security instrument. The Contract Security Program (CSP) has international bilateral security instruments with the countries listed on the following PWGSC website: <http://www.tpsgc-pwgsc.gc.ca/esc-src/international-eng.html>.
2. The Foreign recipient **Contractor/Subcontractor** must, at all times during the performance of the **contract/subcontract**, hold an equivalence to a valid Designated Organization Screening (DOS), issued by the Canadian DSA as follows:
  - i. The Foreign recipient **Contractor/Subcontractor** must provide proof that they are incorporated or authorized to do business in their jurisdiction.
  - ii. The Foreign recipient **Contractor/Subcontractor** must not begin the work, services or performance until the Canadian Designated Security Authority (DSA) is satisfied that all contract security requirement conditions have been met. Canadian DSA confirmation must be provided, in writing, to the foreign recipient **Contractor/Subcontractor** in an Attestation Form, to provide confirmation of compliance and authorization for services to be performed.
  - iii. The Foreign recipient **Contractor/Subcontractor** must identify an authorized Contract Security Officer (CSO) and an Alternate Contract Security Officer (ACSO) (if applicable) to be responsible for the overseeing of the security requirements, as defined in this contract. This individual will be appointed by the proponent foreign recipient **Contractor's/Subcontractor's** Chief Executive officer or Designated Key Senior Official, defined as an owner, officer, director, executive, and or partner who occupy a position which would enable them to adversely affect the organization's policies or practices in the performance of the **contract/subcontract**.

iv. The Foreign recipient **Contractor/Subcontractor** must not permit access to Canadian restricted sites, except to its personnel subject to the following conditions:

- a. Personnel have a need-to-know for the performance of the **contract/subcontract**;
- b. Personnel have been subject to a Criminal Record Check, with favourable results, from a recognized governmental agency or private sector organization in **their country** as well as a Background Verification, validated by the Canadian DSA;
- c. The Foreign recipient **Contractor/Subcontractor** must ensure that personnel provide consent to share results of the Criminal Record and Background Checks with the Canadian DSA and other Canadian Government Officials, if requested; and
- d. The Government of Canada reserves the right to deny access to Canadian restricted sites to a foreign recipient **Contractor/Subcontractor** for cause.

3. **CANADA PROTECTED** information/assets provided or generated pursuant to this **contract/subcontract** must not be further provided to a third party Foreign recipient Subcontractor unless:

- a. written assurance is obtained from the Canadian DSA to the effect that the third-party Foreign recipient Subcontractor has been approved for access to **CANADA PROTECTED** information/assets by the Canadian DSA; and
- b. written consent is obtained from the Canadian DSA, if the third-party Foreign recipient Subcontractor is located in a third country.

4. The foreign recipient **Contractor/Subcontractor** requiring access to Canadian restricted sites, under this **contract/subcontract**, must submit a Request for Site Access to the Chief Security Officer of Transport Canada.

5. Throughout the duration of this **contract / subcontract**, the Foreign recipient **Contractor /Subcontractor** must adhere to its respective National Policies pertaining to the examination, possession and / or transfer of Canadian Controlled Goods and must immediately report to its responsible national security authority all cases in which it is known or there is reason to suspect that Canadian Controlled Good, furnished or generated pursuant to this **contract / subcontract** have been lost or disclosed to unauthorized persons, including but not limited to a third party government, person, firm, or representative thereof. Canadian Controlled Goods which are lost or compromised while handled outside of Canada, should be immediately reported to the Canadian Government Authority owner of the Canadian Controlled Goods, for example the Canadian Department that issued the Canadian Controlled Goods to the Foreign recipient **Contractor /Subcontractor**, as part of this **contract / subcontract**. The Defence Production Act defines Canadian Controlled Goods as certain goods listed in Canada's Export Control List, a regulation made pursuant to the Export and Import Permits Act (EIPA).

6. In the event that a Foreign recipient **Contractor/Subcontractor** is chosen as a supplier for this **contract/subcontract**, subsequent country-specific foreign security requirement clauses must be generated and promulgated by the Canadian DSA, and provided to the Government

	<p>of Canada Contracting Authority, to ensure compliance with the security provisions, as defined by the Canadian DSA, in relation to equivalencies.</p> <p>7. Subcontracts which contain security requirements are <b>NOT</b> to be awarded without the prior written permission of the Canadian DSA.</p> <p>8. The Foreign recipient <b>Contractor/Subcontractor</b> must comply with the provisions of the Security Requirements Check List attached at Annex __. <i>(see LOI Appendix I)</i></p>
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## 5.4 Resulting Contract

<b>TOPIC</b>	<p>Canada asked potential bidders if they could comply with the clauses and conditions of the resulting Contract (Part 7) and if not, to identify the issue. Canada specifically asked: Does the requirement include hardware purchase, software development or modification, and/or the provision of software for which the Supplemental General Conditions apply?</p> <p>These Supplemental General Conditions in the draft RFP are:</p> <p>4001 (2015-04-01), Hardware Purchase, Lease and Maintenance;          4002 (2010-08-16), Software Development or Modification Services;          4003 (2010-08-16), Licensed Software;          4006 (2010-08-16), Contractor to Own Intellectual Property Rights in Foreground Information.</p>
<b>FEEDBACK</b>	
<b>PART 7 – RESULTING CONTRACT</b>	
<p>a) Request to specify which SACC manual clauses would apply to this NASP contract.</p> <p>b) One comment received that could not sign up to the Liability as contained within General Conditions 2030, Article 26 and General Conditions 2035, Article 24.</p> <p>c) Almost all responses indicated that the Supplemental General Conditions above do apply. One comment noted restriction to providing source code and also clarification of what Intellectual Property is needed.</p> <p>d) 7.6.6 Discretionary audit clause C0705C, is not reasonable for a firm price contract and is expensive.</p> <p>e) 7.13 Controlled Good Program – Contract. Questions were received as noted in 5.3 Part 6 b above.</p> <p>f) 7.18 b) – The assignment of warranties conflicts with the Warranty clause at 7.2.1 General Conditions.</p> <p>g) Additional Clauses to consider:</p> <ul style="list-style-type: none"> <li>i. B1000T (2014-06-26) Condition of Material – Bid (for the sensors)</li> <li>ii. B5007C (2010-01-22) Procedures for Design Change or Additional Work (by client)</li> <li>iii. B5001C Procedures for Design changes (by Contractor)</li> <li>iv. A9051C Existing Technical Publication – Translation</li> <li>v. A9068C Gov’t Site Regulations</li> <li>vi. C3010T (2014-11-27) Exchange Rate Fluctuation Risk Mitigation</li> <li>vii. C3015 (2017-08-17) Exchange Rate Fluctuation Adjustment</li> </ul>	

<p><b>OUTCOME</b></p>	<p>Canada has made the following changes and clarifications:</p> <p>a) All the SACC manual clauses that apply to and form part of the Contract are either spelled out in full text, or identified by number, date, and title in the Contract. The latter can be found in the SACC manual.</p> <p>As per Article 7.2: <i>All clauses and conditions identified in the Contract by number, date and title are set out in the <a href="https://buyandsell.gc.ca/policy-and-guidelines/standard-acquisition-clauses-and-conditions-manual">Standard Acquisition Clauses and Conditions Manual</a> (<a href="https://buyandsell.gc.ca/policy-and-guidelines/standard-acquisition-clauses-and-conditions-manual">https://buyandsell.gc.ca/policy-and-guidelines/standard-acquisition-clauses-and-conditions-manual</a>) issued by Public Works and Government Services Canada.</i></p> <p>b) The Liability terms in the General Conditions remains applicable to the resulting contract.</p> <p>c) Canada understands and respects the manufacturer’s protection of their IP. The IP and source codes, where applicable, are restricted to the functions as noted in the SOW section 12.7, Engineering Data, and under Technical Data Requirements starting ID 94 of Appendix A to the Statement of Work, Baseline Statement of Requirements Document.</p> <p>d) The audit clause is applicable to the resulting contract. For more information, the clause can be found at the following link: <a href="https://buyandsell.gc.ca/policy-and-guidelines/standard-acquisition-clauses-and-conditions-manual/5/C/C0705C/7">https://buyandsell.gc.ca/policy-and-guidelines/standard-acquisition-clauses-and-conditions-manual/5/C/C0705C/7</a></p> <p>e) See clarifications in the Outcome at 5.3 Part 6 b above.</p> <p>f) Assignment of warranties will be required if the warranty is more favourable to Canada than the conditions of the Contract.</p> <p>g) Additional Clauses considered:</p> <ol style="list-style-type: none"> <li>i. B1000T is redundant as the statement that sensors must be new is already indicated in text of requirement.</li> <li>ii. B5007C is not necessary as it is accounted for in the Statement of Work.</li> <li>iii. B5001C is not necessary as it is accounted for in the Statement of Work.</li> <li>iv. A9051C has been added to the resulting Contract.</li> <li>v. A9068C has been added to the resulting Contract.</li> <li>vi. C3010T has been added to Part 3 – Bid Preparation Instructions</li> <li>vii. C3015 has been added to the contract on condition was requested by bidder in financial bid in accordance with C3010T.</li> </ol> <p>The following two clauses will be added to the Insurance Requirements as applicable to the MX15HDi government furnished equipment:</p> <ul style="list-style-type: none"> <li>• G3001C, All Risk Property Insurance - <a href="https://buyandsell.gc.ca/policy-and-guidelines/standard-acquisition-clauses-and-conditions-manual/5/G/G3001C/2">https://buyandsell.gc.ca/policy-and-guidelines/standard-acquisition-clauses-and-conditions-manual/5/G/G3001C/2</a></li> <li>• G3010C, All Risk in Transit Insurance - <a href="https://buyandsell.gc.ca/policy-and-guidelines/standard-acquisition-clauses-and-conditions-manual/5/G/G3010C/2">https://buyandsell.gc.ca/policy-and-guidelines/standard-acquisition-clauses-and-conditions-manual/5/G/G3010C/2</a></li> </ul>
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## 5.5 Technical Certification and other Operational Requirements

<p><b>TOPIC</b></p>	<p>Industry had comments and issues regarding the technical certifications or approvals in the Statement of Work, Appendix A, Baseline Statement of Requirements.</p> <p>Industry was also specifically asked: To what Latitude has your solution been tested? Can you meet the requirement for up to 72 degrees of north latitude?</p>
<p><b>FEEDBACK</b></p>	
	<ul style="list-style-type: none"> <li>a) Clarifications were requested on the airworthiness certification and operational approval requirements at SOR ID 1 and 2.</li> <li>b) SOR ID 6 - Canada heard concerns that STANAG certification is expensive and puts some systems at a disadvantage.</li> <li>c) Stanag Compliance Matrix at Appendix B - Most respondents stated they could provide all the information requested for the Preliminary Design Review Meeting. There was some confusion over what is required regarding STANAG.</li> <li>d) Certificate of Airworthiness for an Optionally Piloted Vehicle - Clarification was requested when this would be required.</li> <li>e) 72N Latitude – Most respondents indicated their system could meet the requirement for up to 72N latitude, even if it has not yet actually operated to that latitude. Question received on how proof of compliance can be demonstrated.</li> </ul>
<p><b>OUTCOME</b></p>	<ul style="list-style-type: none"> <li>a) ID 1 for airworthiness certification has been removed as this is not applicable to all jurisdictions of potential bidders. ID 2 for an operational approval is deemed sufficient.</li> </ul> <p>It will be clarified in the final RFP that the operational approval required to be demonstrated as compliant in the bid is for the existing configuration of the platform being bid and not for the changes required to meet TCs configuration. Once awarded, the RPAS that the winning contractor delivers to meet Transport Canada's requirements must have received an operational approval.</p> <ul style="list-style-type: none"> <li>b) Canada would like to clarify that the STANAG certification at draft RFP SOR ID 6 is not a mandatory requirement, it is a desirable point-rated requirement. Canada has reduced the points allocated in the evaluation.</li> <li>c) Canada will clarify in the final RFP and resulting contract that this information is not requested in the bid, rather it is mandatory during contract performance for the Contractor to provide the information and gap analysis.</li> <li>d) This requirement is not part of the Bid Evaluation. This certification is required upon delivery of the RPAS of the winning bidder, if that bid was for an OPA.</li> <li>e) The evaluation criteria specifies the following with regards to the requirement for 72N Latitude: "Provide certificate, Technical Specifications or other substantiating documentation illustrating that the RPAS is equipped with the specified equipment to allow the RPAS to operate up to 72 degrees north latitude during all phases of flight"</li> </ul>

## 5.6 Remotely Piloted Aircraft Requirements

<b>TOPIC</b>	<p>Specific Questions from Canada for Industry Feedback were:</p> <ul style="list-style-type: none"> <li>a) Can your solution meet the minimum range requirements identified in the SOW? Can you exceed these requirements?</li> <li>b) Is Induction System Icing Protection standard on your solution? Is an Ice Protection System standard on your solution?</li> <li>c) Is ADS-B, TCAS, and TAWS integrated on your system and is this equipment TSO'd?</li> </ul>
<b>FEEDBACK</b>	
<ul style="list-style-type: none"> <li>a) Range - Clarifications were requested regarding range including where it will occur; why the 2000nm for max points; what specific gravity to use for calculations; how to show compliance in the bid; and the definition of RSVM definition.</li> <li>b) Icing Protection and environmental conditions - Feedback from Industry indicated that induction and icing protection systems are available for their solutions. There were questions received regarding types of systems that are acceptable as well as temperature and cold start.</li> <li>c) ADS-B/TCAS/TAWS - Industry feedback presented no issues for ADS-B. TCAS II was identified as not suitable for an RPAS. Viable solutions exist that are not TAW B but provide the same function.</li> <li>d) Clarification regarding the dual VHF AM and FM requirement was requested.</li> </ul>	
<b>OUTCOME</b>	<ul style="list-style-type: none"> <li>a) Range - The 1400nm mandatory range requirement at SOR ID 12 is round trip and the examples of where it would take place are provided in the Mission Scenarios at Appendix E of the Statement of Work in the draft RFP. 2000nm or greater range gives max points as it provides for greater capability for potential future missions, as an example to reach Inuvik from Iqaluit with room to loiter on station if necessary. <p>The specific gravity to use for calculations is sea level and will be indicated in the requirement. The "Proof of Compliance from Bidder" column in Attachments 1 and 2 to Part 4 provides a description of how to show compliance in the bid. This is a paper exercise of calculations with flight scenarios. A physical flight demonstration witnessed by Canada has not been requested for bid evaluation.</p> <p>The RSVM definition will be added to the definitions section of the SOW and is as follows:</p> <p>RSVM = Reduced vertical separation minimum is the reduction, from 2,000 feet to 1,000 feet, of the standard vertical separation required between aircraft flying between flight level 290 and flight level 410.</p> </li> <li>b) Icing Protection and environmental conditions – <ul style="list-style-type: none"> <li>1) The desirable requirement in the draft RFP SOR ID16 is for the RPA to have suitable ice protection systems and does not stipulate specific types of systems to meet this.</li> <li>2) The lower temperature limit in the mandatory requirement at SOR ID 19 has changed from -55C to -30C.</li> </ul> </li> </ul>

	<p>3) The mandatory cold start requirement at SOR ID 20 has been edited to clarify that auxiliary heating equipment may be used if necessary.</p> <p>4) The supply of auxiliary heating equipment at SOR ID 21 is not stored on the platform.</p> <p>c) ADS-B/TCAS/TAWS - Canada has changed the desirable requirement for TCAS II to TCAS I. Canada has changed the specification for TAWS-B in this desirable requirement to a terrain awareness system.</p> <p>d) SOR ID 40 and 41 for a dual VHF AM and FM communication system have been combined for clarity that these requirements are on one radio set.</p>
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### 5.7 Payload and Sensor

<b>TOPIC</b>	<p>In the Questions for Feedback, Canada asked Industry: Can you provide a Maritime Search Radar that meets TC’s mandatory requirements?</p> <p>Industry also had comments and questions regarding the sensor suite, including the high resolution still camera, data recording and RTCA.</p>
<b>FEEDBACK</b>	
	<p>a) EO/IR - Many questions were received regarding the EO/IR specifications and requested to be more performance based. The requirements were regarded as high end and expensive.</p> <p>b) Flight altitudes for the payloads were requested to be specified. Also, payload definition needs to be clear.</p> <p>c) Radar (SOR ID 52 and its’ subsets)- Industry Feedback specifically identified two (2) radars that meet the requirements. Other feedback indicated not all the mandatories can be met, particularly the anomaly detection. Clarification of Target Information Integration requested. Comment received that oil, ice, and mammal detection, and simultaneous air-to-air modes are modes that may not all exist on one maritime radar.</p> <p>d) Payload data recorder (SOR ID 55) – Feedback received from Industry indicated there are 3 possible solutions: recording only in the MCS, only in the RPA, or in both.</p> <p>e) High Resolution Still Camera – Comments from Industry were received mainly regarding the purpose of the camera, how it is used and if the specifications are restrictive. Image transmission to the MCS requires very high bandwidth.</p> <p>f) RTCA DO-160G – Comment received that this standard requirement may be overly limiting. Request for how an equivalent will be determined.</p>
<b>OUTCOME</b>	<p>a) EO/IR - The requirement for the contractor to provide the EO/IR has been removed. Transport Canada now has the opportunity to provide an MX15HDI as government furnished equipment (GFE) to the contractor to integrate into their solution.</p> <p>b) Specification of flight altitudes has been determined as not necessary to provide and each bidder decides the flight altitude based on performance of their RPAS and installed sensors. Definitions of payload will be clarified in the SOW.</p>

	<p>c) Radar - Requirements in the radar for onboard anomaly detection and Target Information Integration have been removed. These can be accomplished in the MCS. All other radar requirements were reviewed and not found to be restrictive. Air-to-air mode of the radar is not a mandatory requirement, therefore it does not impact compliance if it cannot be provided.</p> <p>d) Payload data recorder - The requirement is changed to allow for various configurations. As it is valuable to operations for the recording to be done onboard and even more valuable if done both onboard and in the MCS, desirable requirements have been added for this and will be allocated points in the technical evaluation.</p> <p>e) High Resolution Still Camera - Clarification that the camera is for mapping and orthomosaics has been made in the requirement. The requirement to transmit the images to the MCS has been removed. As the specifications are determined to be at a very high level, Canada has not found them to be restrictive.</p> <p>f) RTCA DO-160G – The requirement has been removed.</p>
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## 5.8 Analytics, automation, fusion and data exploitation

<b>TOPIC</b>	Industry presented issues related to analytics, automation, fusion and data exploitation. This relates to requirements in the Statement of Requirements under the Sections “Payload and Sensor” as well as “Mission Control Station”.
<b>FEEDBACK</b>	
	<p>a) Radar anomaly detection and automatic notification to the MCS (SOR ID 52.3) - Common feedback received this does not currently exist in the marketplace and would be a significant cost driver to develop.</p> <p>b) Onboard analytics, integration and fusion (SOW 4.1, Subsets of SOR ID 54) – This was noted as an issue by some respondents and could be accomplished in the MCS instead.</p> <p>c) Change detection (SOR ID 89) – indication that this may require development and so be a cost driver.</p> <p>d) Tagging and cataloguing (SOR ID 91) – clarification requested if this is a requirement for the operator to tag and label a target.</p> <p>e) Moving map display overlay (SOR ID 79, 80, 81) – requested if this overlay can be displayed on a separate screen.</p>
<b>OUTCOME</b>	<p>a) The requirement at SOR ID 52.3 has been removed to align with current radar equipment capabilities and eliminate the cost for development and integration.</p> <p>b) The requirements have been edited to allow this to occur either onboard or in the MCS. The mandatory correlation requirement in the MCS at SOR ID 90 and desirable data fusion requirement in the MCS at SOR ID 92 remain as is.</p> <p>c) Change detection at SOR ID 89 remains. Note this is not a mandatory requirement and is on the MCS not onboard the RPA.</p> <p>d) The requirement at SOR ID 91 has been edited to clarify that this function is done manually.</p>

	<p>e) The configuration of the MCS may include more than one screen at the pilot, co-pilot and sensor operator station. The expectation is that the RPA navigation screen can display standard VFR/IFR maps and charts and overlay the RPAS heading, position and track information for navigation. Additionally, selected sensor data can be overlaid on a moving map display to provide situational awareness to the pilot. The sensor operator screen must also provide overlay and selected sensor data display.</p>
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## 5.9 Data Link Requirements

<b>TOPIC</b>	<p>In the Questions for Feedback, Canada asked Industry:</p> <ol style="list-style-type: none"> <li>1) Can you provide a Data Link solution that is suitable for communication (full duplex) between the RPA and the ground station over all Canadian airspace up to 72 degrees north latitude?</li> <li>2) Can you provide a Command and Control (C2) System for Radio Line of Sight and Satellite communications that is secure in all phases of operation over all Canadian airspace up to 72 degrees north latitude? Describe the level of redundancy, encryption and protections against jamming and spoofing technologies.</li> </ol>
<b>FEEDBACK</b>	
<ol style="list-style-type: none"> <li>a) Feedback from respondents revealed that there are several different configurations of satcom and data links that are able to provide command and control, data streaming, and redundancy. Detailing specific Lband and wideband requirements does not allow for the various systems to provide the required capability with their existing configurations and will incur unnecessary cost.</li> <li>b) Will the Satcom ground hub and bandwidth be provided by Canada?</li> <li>c) Request for Canada to provide what bands will be used in UHF and VHF so Industry can determine their availability and apply for frequency clearance.</li> <li>d) Clarification needed regarding mandatory and desirable requirements for different editions of the STANAG.</li> <li>e) Near real-time requirements clarification requested as latency can be an issue over Satcom.</li> <li>f) Clarification requested if the requirement includes provision of satellite time to Transport Canada by the Contractor for the duration of the contract.</li> <li>g) Question received if a LAN connection exists between Ottawa and Iqaluit.</li> <li>h) SOR ID 68 - What are the commercially available aircraft broadband satellite services?</li> </ol>	

<b>OUTCOME</b>	<ul style="list-style-type: none"> <li>a) Transport Canada has reviewed the extensive feedback received regarding data link requirements and revised its requirements to be based on a performance capability rather than a prescriptive set of equipment requirements. This posture will allow bidders to determine the most cost effective solution to meet the requirement and eliminate undue complexity, engineering and cost.</li> <li>b) Transport Canada will engage a commercially available satellite service provider using a fee for service subscription model for acceptance test #2 and ongoing operations. The access to the service provider satellite ground hub and LAN connections to the MOB in Ottawa will be provided by Canada.</li> <li>c) Bidders will be required to contact Industry Canada <a href="https://www.ic.gc.ca/eic/site/smt-gst.nsf/eng/h_sf01678.html">https://www.ic.gc.ca/eic/site/smt-gst.nsf/eng/h_sf01678.html</a> the department responsible for radio spectrum management and licencing in Canada to determine specific equipment standards and frequency bandwidths and licencing requirements. Transport Canada has conducted surrogate RPAS missions utilizing 800Mhz UHF and 2.4Ghz UHF for radio line of sight command and control.</li> <li>d) References to different editions of the STANAG have been rectified in the SOW.</li> <li>e) The references in the SOW to near-real time pertain to the transmission timeliness of data or information which has been delayed by the time required for electronic communication and automatic data processing. This latency is understood.</li> <li>f) The contractor will be responsible for the cost of satellite services for the preliminary flight test phase only. Satellite services for the final acceptance will be the responsibility of Canada.</li> <li>g) There is no LAN connection between Iqaluit and Ottawa.</li> <li>h) There is a selection of satellite service providers that can provide this service. Transport Canada is not prescriptive in the satellite service provider to be used.</li> </ul>
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## 5.10 Mission Control Stations (MCS)

<b>TOPIC</b>	<p>In the Questions for Feedback, Canada asked Industry:</p> <ul style="list-style-type: none"> <li>1) Is the concept of operations that TC describes for the Mission Control Station main operating base (MOB) viable?</li> <li>2) Confirm your ability to operate from a Forward Operating Base (FOB) as described in the SOW? Are there any issues regarding this concept that you would like to make TC aware of?</li> </ul>
<b>FEEDBACK</b>	
<p>Feedback from respondents affirmed that the CONCOPS for the MOB MCS is viable and respondents confirmed their ability to operate from the FOB. Additional comments received from respondents are summarized in the following points:</p> <ul style="list-style-type: none"> <li>a. How Canada intends to use the mission control stations and what each of the stations capabilities are requires clarity. Screen size was requested.</li> </ul>	

	<ul style="list-style-type: none"> <li>b. There were particularly a lot of clarification requests over the need for the Mobile MCS, the size of the screens, the CONOPS of its' use, and the vehicle size and configuration and the meaning of "unimproved roads". Adds cost but unsure of need for the requirement.</li> <li>c. Not all systems require a launch and recovery component (LRC) MCS with Radio Line of Sight (RLOS) at the FOB as described in the SOW.</li> <li>d. Can a bidder offer different configurations in their bid?</li> </ul>
<b>OUTCOME</b>	<ul style="list-style-type: none"> <li>a) Transport Canada has reviewed the extensive feedback received regarding the Conops and MCS/LRC requirements and revised its requirements to be based on a performance capability rather than a prescriptive set of equipment requirements. This posture will allow bidders to determine the most cost effective solution to meet the requirement and eliminate undue complexity, engineering and cost. The requirement has been revised from one fixed MCS in Ottawa and one mobile MCS with a LRC in Iqaluit to one fixed MCS in Ottawa and one mobile LRC and one LRC in Iqaluit. The RPAS main operating base will remain in Ottawa, Canada. The RPA will be located at a forward operating base in Iqaluit, NU (CYFB) for northern evaluations and may be relocated to other regions within Canada to augment NASP operations. It should be noted that transportation of equipment in and out of Iqaluit is very difficult and accomplished primarily by air or seasonal ship delivery. In order to provide redundancy and added utility, the requirement for mobile equipment to launch and recover the RPA from locations other than Ottawa and Iqaluit is a mandatory requirement. Therefore the RPAS must include a fixed (primary) MCS located in Ottawa Canada. The MCS must include two RPA operator consoles and one payload operator console. The RPAS must include all equipment necessary at the MOB to enable the RPA to take off and land and manage all available sensor data. The equipment required at the FOB and for mobile operations must allow for safe launch and recovery of the RPA and transition of command and control to the main MCS in Ottawa.</li> <li>b) The requirement for a mobile MCS has been revised to reflect that TC will require the equipment necessary to take off and land from the MOB, the FOB or from any location where the RPA may be deployed. A truck or van based MCS with all equipment that is in the fixed MCS is no longer a requirement. Minimum screen size requirement applies to the main fixed MCS only.</li> <li>c) The capability requirements have been clarified and the bidder need only supply the equipment required to deliver the capability requested.</li> <li>d) Bidders may offer different configurations as long as they meet the mandatory requirements. Offers of different configurations must be submitted as, and will be evaluated as, separate bids.</li> </ul>

### 5.11 Training

<b>TOPIC</b>	<p>In the Questions for Feedback, Canada asked Industry:</p> <ul style="list-style-type: none"> <li>1) Do you foresee any issues with the training requirements? Can you provide full training?</li> </ul>
<b>FEEDBACK</b>	
<p>All responses received indicated full training can be provided as requested. Questions from respondents included:</p>	

	<p>a) Does training include train the trainer?</p> <p>b) Will pilots have previous RPAS flying experience?</p> <p>c) Is there any reoccurring training?</p>
<b>OUTCOME</b>	<p>Canada provides the following clarifications:</p> <p>a) Train the trainer is not included in the requirement under this contract.</p> <p>b) As per the SOW, the RPA operators will be licensed pilots. Training assumes no previous RPAS flying experience.</p> <p>c) This procurement does not currently include provisions for reoccurring training.</p>

## 5.12 IP / Technical Data

<b>TOPIC</b>	<p>In the Questions for Feedback, Canada asked Industry:</p> <ol style="list-style-type: none"> <li>1) Do you have any issues or comments on the requirements for the provision of engineering and technical data? Will you be able to provide the level of engineering and technical data requested?</li> <li>2) What level of IP will you be able to provide to TC?</li> <li>3) Is there any specialized software development required for you to meet TC's requirements?</li> </ol>
<b>FEEDBACK</b>	
	<p>a) Technical Data - there was a range of responses, including:</p> <ul style="list-style-type: none"> <li>• will provide as requested</li> <li>• will provide what is required for O-level Maintenance</li> <li>• Will provide what the OEM provides</li> <li>• Question if an operation manual is required.</li> </ul> <p>b) IP - there was a range of responses, including:</p> <ul style="list-style-type: none"> <li>• Can provide IP requested, subject to commercial terms</li> <li>• Can provide what is required to operate and maintain the RPAS</li> <li>• Will not provide source codes</li> <li>• SOW needs to state the IP Canada requires.</li> </ul> <p>c) Software development – Most respondents indicated that some level of software development or modification would be required, particularly for the integration of sensors and in the MCS.</p>
<b>OUTCOME</b>	<p>a) As per SOR ID 111–“The Contractor must provide Technical Data to enable Canada to conduct in-house level 1,2,3 Maintenance.” This requirement will be modified to “enable Canada to conduct in-house maintenance as provided for in the manufacturer’s maintenance manuals to</p>

	<p>a minimum of level 1 (O level) and limited level 2 (I Level)”. If the manufacturer produces an operations manual for the RPAS system they must be provided.</p> <p>b) As per SOW 12.7, Engineering Data and SOR ID 112 - Canada requires access to intellectual property when required to establish Type Design airworthiness requirements of the RPAS and payloads in order to carry out future repairs and modifications (including the future integration of new payloads.) Canada wishes to clarify that what Canada requires is no more than what is considered as normal practice in Industry to support the ability for a customer to perform the functions as described above and to ensure the customer will be able to operate and maintain in the event that a product that is in use by Canada is no longer supported by a manufacturer. Canada understands and respects the manufacturer’s protection of their IP. The IP and source codes, where applicable, are restricted to the functions as noted in the SOW section 12.7, Engineering Data, and under Technical Data Requirements starting ID 94 of Appendix A to the Statement of Work, Baseline Statement of Requirements Document.</p> <p>c) It is understood that there is some level of software development required for integration. The IP related to all products developed as a response to this RFP will be shared with Canada.</p>
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### 5.13 Maintenance / Support and Optional Goods

<b>TOPIC</b>	<p>In the Questions for Feedback, Canada asked Industry:</p> <ol style="list-style-type: none"> <li>1) Will you be able to provide a list of recommended spares for the first 2000 hours?</li> <li>2) Are there any issues with providing TC with a Maintenance Plan (MP) and Schedule so that TC can set up a maintenance program for your solution?</li> <li>3) As identified in the SOW, TC is expecting to perform RPAS maintenance activities in house at the main operating base (MOB) in Ottawa. Do you see any issues with this approach? What level of maintenance activities do you foresee TC being able to perform at the MOB? Are there any specialized maintenance activities that TC will not be able to perform at the MOB?</li> </ol>
<b>FEEDBACK</b>	
<ol style="list-style-type: none"> <li>a) Spares List - All responses received confirmed this can be provided. Some clarification requests and comments were received:             <ol style="list-style-type: none"> <li>a) What spares will be purchased under this contract for TC RPAS technology evaluation phase? Will it include spare radar, EO/IR, other missional equipment?</li> <li>b) What pricing is held for the term of the contract?</li> <li>c) 4 years / 2000 hours of spares and equipment is expensive.</li> </ol> </li> <li>b) MP - Respondents did not have any issues with providing an MP and Schedule so TC can set up a maintenance program.</li> <li>c) TC in-house maintenance - Most feedback indicated 1st level (or O-level) aircraft maintenance should be able to be performed by TC. Payload and specialized equipment likely to require 3rd line maintenance or back to the OEM. Clarification requested on what maintenance TC is expecting to do.</li> </ol>	

<b>OUTCOME</b>	<p>a) Wording around the provision of Spares and Equipment has been revised to clarify that the requirement is not to deliver 2000 hours of spares and equipment under the resulting contract, only a list is required, from which Canada will choose to purchase “as and when requested” within the limitation of expenditure for Optional Goods of the resulting contract. The pricing for Optional Goods that is held for the term of the contract is a minimum discount percentage off list price, as per the Basis of Payment and Financial Bid. Once a Task Authorization is sent to the Contractor for a list of spares, firm pricing is requested from the Contractor for that potential order.</p> <p>b) Canada has changed the MP requirement from “for 15 years, 7500 hours and 375 landings” to “for all maintenance activities for the projected design life of the RPAS and include engine/propeller, instrumentation, sensors and avionics, and all MCS equipment.”</p> <p>c) See Outcome at 5.12, IP/Technical Data.</p>
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## 6 Request for Response of Potential Bidders

Before releasing the final RFP with the described changes, Canada is asking potential bidders to advise whether or not, after taking into account the described changes, they would be able to submit a compliant bid. Compliance includes a Financial Bid being within the maximum funding. If not, Canada provides this opportunity for potential bidders to indicate what would prevent them from meeting the requirements.

Response is requested to be sent by email to the PWGSC Contracting Authority by the closing date of this LOI.

### **PWGSC Contracting Authority:**

Lena Bootsma  
 Public Works and Government Services Canada  
 Acquisitions Branch  
 Place du Portage, Phase III, 8C1  
 11 Laurier Street  
 Gatineau, QC K1A 0S5  
 Telephone: 873-469-3864  
 E-mail: [lena.bootsma@tpsgc-pwgsc.gc.ca](mailto:lena.bootsma@tpsgc-pwgsc.gc.ca)

## 7 Next Steps

After Canada has considered the responses requested above, Industry Consultation will be complete and the final RFP will be released. This is likely to occur in January, 2020.

## 8 Important Note

This document is subsequent and conditional to the LOI with draft RFP, T8493-150035/C. This is neither a call for tender nor Request for Proposal (RFP). The issuance of this notice is not to be considered in any way a commitment by the Government of Canada. The information provided is for consultation purposes only and is subject to change prior to the final RFP.

## APPENDIX I - SECURITY REQUIRMENTS CHECK LIST



**SECURITY REQUIREMENTS CHECK LIST (SRCL)  
LISTE DE VÉRIFICATION DES EXIGENCES RELATIVES À LA SÉCURITÉ (LVERS)**

**PART A - CONTRACT INFORMATION / PARTIE A - INFORMATION CONTRACTUELLE**

1. Originating Government Department or Organization / Transport Canada / Ministère ou organisme gouvernemental d'origine  
2. Branch or Directorate / Direction générale ou Direction Aircraft Services Directorate

3. a) Subcontract Number / Numéro du contrat de sous-traitance  
3. b) Name and Address of Subcontractor / Nom et adresse du sous-traitant

4. Brief Description of Work / Brève description du travail  
The Contractor will provide a complete Remotely Piloted Aircraft System (RPAS) according to the attached requirements. The RPAS will include a Remotely Piloted Aircraft (RPA), sensor equipment including Electro Optical/Infrared camera, Maritime Search Radar, and Infrared/Ultraviolet scanner, satellite communication links, and the RPAS mission control station (s) (MCS). The Contractor will provide initial training and initial spangng.

5. a) Will the supplier require access to Controlled Goods? / Le fournisseur aura-t-il accès à des marchandises contrôlées?  No / Non  Yes / Oui

5. b) Will the supplier require access to unclassified military technical data subject to the provisions of the Technical Data Control Regulations? / Le fournisseur aura-t-il accès à des données techniques militaires non classifiées qui sont assujetties aux dispositions du Règlement sur le contrôle des données techniques?  No / Non  Yes / Oui

6. Indicate the type of access required / Indiquer le type d'accès requis

6. a) Will the supplier and its employees require access to PROTECTED and/or CLASSIFIED information or assets? / Le fournisseur ainsi que les employés auront-ils accès à des renseignements ou à des biens PROTÉGÉS et/ou CLASSIFIÉS?  No / Non  Yes / Oui  
(Specify the level of access using the chart in Question 7. c) / (Préciser le niveau d'accès en utilisant le tableau qui se trouve à la question 7. c)

6. b) Will the supplier and its employees (e.g. cleaners, maintenance personnel) require access to restricted access areas? No access to PROTECTED and/or CLASSIFIED information or assets is permitted. / Le fournisseur et ses employés (p. ex. nettoyeurs, personnel d'entretien) auront-ils accès à des zones d'accès restreintes? L'accès à des renseignements ou à des biens PROTÉGÉS et/ou CLASSIFIÉS n'est pas autorisé.  No / Non  Yes / Oui

6. c) Is this a commercial courier or delivery requirement with no overnight storage? / S'agit-il d'un contrat de messagerie ou de livraison commerciale sans entreposage de nuit?  No / Non  Yes / Oui

7. a) Indicate the type of information that the supplier will be required to access / Indiquer le type d'information auquel le fournisseur devra avoir accès

Canada <input type="checkbox"/>	NATO / OTAN <input type="checkbox"/>	Foreign / Étranger <input type="checkbox"/>
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7. b) Release restrictions / Restrictions relatives à la diffusion

No release restrictions / Aucune restriction relative à la diffusion <input type="checkbox"/>	All NATO countries / Tous les pays de l'OTAN <input type="checkbox"/>	No release restrictions / Aucune restriction relative à la diffusion <input type="checkbox"/>
Not releasable / À ne pas diffuser <input type="checkbox"/>		
Restricted to: / Limité à: <input type="checkbox"/>	Restricted to: / Limité à: <input type="checkbox"/>	Restricted to: / Limité à: <input type="checkbox"/>
Specify country(ies): / Préciser le(s) pays:	Specify country(ies): / Préciser le(s) pays:	Specify country(ies): / Préciser le(s) pays:

7. c) Level of information / Niveau d'information

PROTECTED A / PROTÉGÉ A <input type="checkbox"/>	NATO UNCLASSIFIED / NATO NON CLASSIFIÉ <input type="checkbox"/>	PROTECTED A / PROTÉGÉ A <input type="checkbox"/>
PROTECTED B / PROTÉGÉ B <input type="checkbox"/>	NATO RESTRICTED / NATO DIFFUSION RESTREINTE <input type="checkbox"/>	PROTECTED B / PROTÉGÉ B <input type="checkbox"/>
PROTECTED C / PROTÉGÉ C <input type="checkbox"/>	NATO CONFIDENTIAL / NATO CONFIDENTIEL <input type="checkbox"/>	PROTECTED C / PROTÉGÉ C <input type="checkbox"/>
CONFIDENTIAL / CONFIDENTIEL <input type="checkbox"/>	NATO SECRET / NATO SECRET <input type="checkbox"/>	CONFIDENTIAL / CONFIDENTIEL <input type="checkbox"/>
SECRET / SECRET <input type="checkbox"/>	COSMIC TOP SECRET / COSMIC TRÈS SECRET <input type="checkbox"/>	SECRET / SECRET <input type="checkbox"/>
TOP SECRET / TRÈS SECRET <input type="checkbox"/>		TOP SECRET / TRÈS SECRET <input type="checkbox"/>
TOP SECRET (SIGINT) / TRÈS SECRET (SIGINT) <input type="checkbox"/>		TOP SECRET (SIGINT) / TRÈS SECRET (SIGINT) <input type="checkbox"/>



**PART A (continued) / PARTIE A (suite)**

8. Will the supplier require access to PROTECTED and/or CLASSIFIED COMSEC information or assets?  
Le fournisseur aura-t-il accès à des renseignements ou à des biens COMSEC désignés PROTÉGÉS et/ou CLASSIFIÉS?  No / Non  Yes / Oui  
If Yes, indicate the level of sensitivity:  
Dans l'affirmative, indiquer le niveau de sensibilité :

9. Will the supplier require access to extremely sensitive INFOSEC information or assets?  
Le fournisseur aura-t-il accès à des renseignements ou à des biens INFOSEC de nature extrêmement délicate?  No / Non  Yes / Oui

Short Title(s) of material / Titre(s) abrégé(s) du matériel :  
Document Number / Numéro du document :

**PART B - PERSONNEL (SUPPLIER) / PARTIE B - PERSONNEL (FOURNISSEUR)**

10. a) Personnel security screening level required / Niveau de contrôle de la sécurité du personnel requis

- |   |   |   |  |
|---|---|---|--|
| <input checked="" type="checkbox"/> RELIABILITY STATUS<br>COTE DE FIABILITÉ | <input type="checkbox"/> CONFIDENTIAL<br>CONFIDENTIEL           | <input type="checkbox"/> SECRET<br>SECRET           | <input type="checkbox"/> TOP SECRET<br>TRÈS SECRET               |
| <input type="checkbox"/> TOP SECRET - SIGINT<br>TRÈS SECRET - SIGINT        | <input type="checkbox"/> NATO CONFIDENTIAL<br>NATO CONFIDENTIEL | <input type="checkbox"/> NATO SECRET<br>NATO SECRET | <input type="checkbox"/> COSMIC TOP SECRET<br>COSMIC TRÈS SECRET |
| <input type="checkbox"/> SITE ACCESS<br>ACCÈS AUX EMPLACEMENTS              |   |   |  |

Special comments:

Commentaires spéciaux : \_\_\_\_\_

NOTE: If multiple levels of screening are identified, a Security Classification Guide must be provided.

REMARQUE: Si plusieurs niveaux de contrôle de sécurité sont requis, un guide de classification de la sécurité doit être fourni.

10. b) May unscreened personnel be used for portions of the work?  
Du personnel sans autorisation sécuritaire peut-il se voir confier des parties du travail?  No / Non  Yes / Oui  
If Yes, will unscreened personnel be escorted?  
Dans l'affirmative, le personnel en question sera-t-il escorté?  No / Non  Yes / Oui

**PART C - SAFEGUARDS (SUPPLIER) / PARTIE C - MESURES DE PROTECTION (FOURNISSEUR)**

**INFORMATION / ASSETS / RENSEIGNEMENTS / BIENS**

11. a) Will the supplier be required to receive and store PROTECTED and/or CLASSIFIED information or assets on its site or premises?  
Le fournisseur sera-t-il tenu de recevoir et d'entreposer sur place des renseignements ou des biens PROTÉGÉS et/ou CLASSIFIÉS?  No / Non  Yes / Oui

11. b) Will the supplier be required to safeguard COMSEC information or assets?  
Le fournisseur sera-t-il tenu de protéger des renseignements ou des biens COMSEC?  No / Non  Yes / Oui

**PRODUCTION**

11. c) Will the production (manufacture, and/or repair and/or modification) of PROTECTED and/or CLASSIFIED material or equipment occur at the supplier's site or premises?  
Les installations du fournisseur serviront-elles à la production (fabrication et/ou réparation et/ou modification) de matériel PROTÉGÉ et/ou CLASSIFIÉ?  No / Non  Yes / Oui

**INFORMATION TECHNOLOGY (IT) MEDIA / SUPPORT RELATIF À LA TECHNOLOGIE DE L'INFORMATION (TI)**

11. d) Will the supplier be required to use its IT systems to electronically process, produce or store PROTECTED and/or CLASSIFIED information or data?  
Le fournisseur sera-t-il tenu d'utiliser ses propres systèmes informatiques pour traiter, produire ou stocker électroniquement des renseignements ou des données PROTÉGÉS et/ou CLASSIFIÉS?  No / Non  Yes / Oui

11. e) Will there be an electronic link between the supplier's IT systems and the government department or agency?  
Disposera-t-on d'un lien électronique entre le système informatique du fournisseur et celui du ministère ou de l'agence gouvernementale?  No / Non  Yes / Oui



**PART C - (continued) / PARTIE C - (suite)**

For users completing the form manually use the summary chart below to indicate the category(ies) and level(s) of safeguarding required at the supplier's site(s) or premises.  
Les utilisateurs qui remplissent le formulaire manuellement doivent utiliser le tableau récapitulatif ci-dessous pour indiquer, pour chaque catégorie, les niveaux de sauvegarde requis aux installations du fournisseur.

For users completing the form online (via the Internet), the summary chart is automatically populated by your responses to previous questions.  
Dans le cas des utilisateurs qui remplissent le formulaire en ligne (par Internet), les réponses aux questions précédentes sont automatiquement saisies dans le tableau récapitulatif.

**SUMMARY CHART / TABLEAU RÉCAPITULATIF**

Category / Catégorie	PROTECTED / PROTÉGÉ			CLASSIFIED / CLASSIFIÉ			NATO				COMSEC					
	A	B	C	CONFIDENTIAL / CONFIDENTIEL	SECRET	TOP SECRET / TRÈS SECRET	NATO RESTRICTED / NATO DIFFUSION RESTREINTE	NATO CONFIDENTIAL / NATO CONFIDENTIEL	NATO SECRET	COSMIC TOP SECRET / COSMIC TRÈS SECRET	PROTECTED / PROTÉGÉ			CONFIDENTIAL / CONFIDENTIEL	SECRET	TOP SECRET / TRÈS SECRET
											A	B	C			
Information / Assets / Renseignements / Biens / Production																
IT Media / Support TI																
IT Link / Lien électronique																

12. a) Is the description of the work contained within this SRCL PROTECTED and/or CLASSIFIED? / La description du travail visé par la présente LVERS est-elle de nature PROTÉGÉE et/ou CLASSIFIÉE?  No / Non  Yes / Oui

If Yes, classify this form by annotating the top and bottom in the area entitled "Security Classification".  
Dans l'affirmative, classifiez le présent formulaire en indiquant le niveau de sécurité dans la case intitulée « Classification de sécurité » au haut et au bas du formulaire.

12. b) Will the documentation attached to this SRCL be PROTECTED and/or CLASSIFIED? / La documentation associée à la présente LVERS sera-t-elle PROTÉGÉE et/ou CLASSIFIÉE?  No / Non  Yes / Oui

If Yes, classify this form by annotating the top and bottom in the area entitled "Security Classification" and indicate with attachments (e.g. SECRET with Attachments).  
Dans l'affirmative, classifiez le présent formulaire en indiquant le niveau de sécurité dans la case intitulée « Classification de sécurité » au haut et au bas du formulaire et indiquez qu'il y a des pièces jointes (p. ex. SECRET avec des pièces jointes).

**Appendix II – Statement of Work Change Document**

<b>Changes to Statement of Work (SOW)</b>			<b>Comments</b>
<b>Draft RFP SOW Section</b>	<b>Feedback Received</b>	<b>Action Taken/Changes Made</b>	
Section 3		Parameters of what TC considers a “new” and “used” RPA have been added as follows: “To be considered as “new” the RPA must have only flight time accumulated as part as the post production test and evaluation test phases. For a “used” RPA to be considered it must have less than 250 hours total airframe time including engine, propeller and all sub-components. The used RPA must have a complete and documented maintenance and flight log record from new with no damage history (major accident or repair). The used RPA must not have not served in a military or combat operation but may have served as a factory demonstrator or test RPA. The used RPA must meet the same post production test and evaluation criteria as a new RPA of the same type. “	
Section 4		Wordng added to indicate that TC will supply an Electro-optical/Infrared (EO/IR) camera as Government Furnished Equipment (GFE)	
Section 4	Clarification needed as to the type of physical connectors and international standards required	Wordng changed to “standard aviation industry connectors and communications protocols”	
Section 4	Clarification needed with regards to (WRT) system availability	Wordng changed to “The overall system availability must be no less than 40 hours per week while deployed, to a maximum of 500 hours per year”	
Section 4.1		Iqaluit NU (CYFB) identified as location of Forward Operating Base	
Section 4.1	Feedback received that not all systems are required to use a Line of Sight communication link for ATOL	“if required” added at reference to line of sight communication link	
Section 4.1		Minor wording changes with regards to (WRT) personnel and equipment required at FOB	

## Appendix II – Statement of Work Change Document

Section 4.1	Clarification was requested WRT the necessity and potential use of a mobile GCS	Reference to Mobile, secondary truck based MCS have been removed and the following wording has been inserted in its place: “The RPAS must include all equipment necessary at the MOB, FOB, and at any location where the RPA may be deployed to enable the RPA to take off and land from all of the above locations.	
Section 4.1		Wording changed WRT to Radio Line of Sight communication links as follows “The RPAS must be equipped with ground based communication link (s) capable of supporting RPA auxiliary control for automatic takeoff and landing”	
Section 4.1	Feedback was received that the requirement for automatic anomaly detection and automatic MCS notification does not exist and would be a significant cost driver	This requirement has been removed however the following wording has been added to the section “The RPAS architecture must be capable of storing all sensor surveillance data for each complete mission and provide redundancy to prevent any loss of data during regular operations. The RPAS system must be able to communicate any in flight sensor failure to the operator so that a decision can be made to discontinue surveillance and return to base.”	
Section 5		Wording has been added to indicate that TC will “Provide as Government Furnished Equipment (GFE) an L-3 WESCAM MX-15HDI to the contractor for integration into the RPAS.” and, “provide satellite bandwidth service for final acceptance testing in Iqaluit, NU.”	
Section 6	Feedback was received that TC should consider RPAS acceptance testing at the contractor’s facility or at another location such as a Canadian RPAS test range	Wording has been added as follows: “Preliminary RPAS acceptance test #1. will be executed at the Contractor’s facilities (or a mutually agreed upon suitable alternative).	
Section 6		Preliminary Acceptance Test #2 has been removed and the Final Acceptance Test will be performed at Iqaluit, NU, Canada	
Section 6		Final RPAS delivery will be conducted at Iqaluit, NU, Canada.	

## Appendix II – Statement of Work Change Document

Section 8.1	Feedback was received that the date to schedule the project initiation meeting 25 working days after contract award is too aggressive.	This date has been extended to 40 working days after contract award.
Section 9.1	Feedback was received that the date to deliver the Acceptance Test Plan 20 working days after the Critical Design Review (CDR) meeting is too aggressive.	This date has been extended to 40 working days after the CDR
Section 9.1a	Feedback was received that TC should consider RPAS acceptance testing at the contractor's facility or at another location such as a Canadian RPAS test range	Wording has been added as follows: "Preliminary RPAS acceptance test #1 will be executed at the Contractor's facilities (or a mutually agreed upon suitable alternative).
Section 9.1b,c		Preliminary Acceptance Test #2 has been removed and the Final Acceptance Test will be performed at Iqaluit, NU, Canada
Section 9.1c		Contractual acceptance to be held at the Iqaluit Airport, Nunavut on completion of a verification that all deliverables in the contract have been accepted by the Project Authority.
Section 9.4.1		Wording has been added as follows: "Preliminary RPAS acceptance test #1 meeting will be held at the Contractor's facilities (or a mutually agreed upon suitable alternative).
Section 9.4.2		Preliminary Acceptance Test #2 meeting has been removed and the Final Acceptance Test meeting will be performed at Iqaluit, NU, Canada
Section 10		Final RPAS delivery, meeting and title transfer will take place in Iqaluit, NU, Canada
Section 11		Wording added as follows: "Travel and living costs for trainees will be paid directly to trainees by TC."
Section 11.1		Wording added as follows: "All training must be completed before contractual acceptance."
Section 12.1c		Wording has been changed as follows "all maintenance activities for the projected design life of the RPAS and include engine/propeller, instrumentation, sensors and avionics, and all MCS equipment. " Referenced to 15 years, 7500 hours and 375 landings have been removed.

## Appendix II – Statement of Work Change Document

Section 12.3, 12.4, 12.5	There was some confusion WRT the provision of spares, tooling and equipment, and ground support equipment as part of the contract.	The following sentence has been added to each section to clarify TC's intentions: "Transport Canada will use this list to determine which (if any) spares they will acquire as part of this contract.	
Section 12.4,	There was some confusion WRT the provision of tooling and equipment as part of the contract.	The following sentence has been added to each section to clarify TC's intentions: "Transport Canada will use this list to determine which (if any) tooling and equipment they will acquire as part of this contract.	
Section 12.5	There was some confusion WRT the provision of ground support equipment as part of the contract.	The following sentence has been added to each section to clarify TC's intentions: "Transport Canada will use this list to determine which (if any) GSE they will acquire as part of this contract.	
Section 12.7	Feedback received that some contractors do not provide an operators manual, only a flight and maintenance manual.	Wording has been changed as follows: "Therefore, the Contractor must provide access (electronic, Web preferred) to the latest revisions of flight/operating/maintenance manuals (as applicable).	
12.8.4	Feedback received that references to the AEP 4761 USAR U17 were confusing.	Reference has been removed and a definition of Design Usage Spectrum has been added for clarification. "The design usage spectrum is descriptive, rather than prescriptive and contains a breakdown of the typical Sortie Profiles Codes (SPCs) or any equivalent for the RPAS type in each of its roles and at each typical operating location. SPCs or any equivalent are expressed in terms of altitude, time, speed, mass and configuration data, which are derived from recorded sortie information."	
14.7		Delivery Ceremony location has been changed to Iqaluit NU, Canada	

### Changes to Baseline Statement of Requirements

Draft RFP SOR Item #	New SOR Item #	Feedback Received	Action Taken/Changes Made	Comments
1	deleted	Clarification was requested WRT the meaning of Certification	This requirement has been deleted	A type certificate is not required in order to meet this requirement
	4		New desirable requirement added as follows: "Contractors should provide a "new" RPA that has only flight time	

## Appendix II – Statement of Work Change Document

			accumulated as part of the post production test and evaluation test phases.”	
5			Requirement changed to: If providing a “used” RPA it must have less than 250 hours total airframe time including engine, propeller and all sub-components. The aircraft must not have served in a military or combat operation.”	
	5.1		New requirement “The “used” RPA must have a complete and documented maintenance and flight log record from new with no damage history (major accident or repair).”	
6	7		Reference to STANAG 4671 edition 3 added	
8	9		Wording changed to “The overall system availability must be no less than 40 hours per week while deployed, to a maximum of 500 hours per year.”	
9	10		A reference to Canadian Northern Domestic Airspace (per the Canadian Flight Supplement) has been added. Wording “under Instrument Flight Rules (IFR)” has been removed.	
10	10.1		Wording “under Instrument Flight Rules (IFR)” has been removed.	
30.1	10.2		Requirement 30.1 has been moved and renumbered to 10.2	
31	11		Requirement 31 has been moved and renumbered to 11. The reference to inflight power up has been removed	
32	11.1		Requirement 32 has been moved and renumbered to 11.1. The reference to inflight power up has been removed	
11	12	There was a request to specify the altitudes associated with RVSM airspace	A definition of RVSM airspace and associated altitudes has been added to the definitions section of the RFP. Wording added as follows: “Assume sea level specific gravity for fuel calculation”	
11.1	12.1		Wording added as follows: “Assume sea level specific gravity for fuel calculation”	
12	13	There was a question as to whether the requirement for total flying range was round trip or one way	The wording “round trip” has been added to the item. Wording added as follows: “Assume sea level specific gravity for fuel calculation”	

## Appendix II – Statement of Work Change Document

12.1	13.1	There was a question as to whether the requirement for total flying range was round trip or one way	The wording "round trip" has been added to the item. Wording added as follows: "Assume sea level specific gravity for fuel calculation"	
18	19		The requirement to meet AEP-4671 USAR-1385 to USAR1401 inclusive has been removed.	
19	20		Ambient outside temperature has been changed to -30°C from -55°C	
20	21	Clarity was requested WRT the ability to successfully start the RPA after sustaining storage temperatures of between -30°C and +30°C for up to 12 hours.	The wording "(with auxiliary heating equipment if necessary)" has been added to the requirement	This requirement can be met by the use of auxiliary heating equipment before startup
28	29	Feedback was received by multiple contractors that a flight data recording capability that does not meet AEP/STANAG 4671 could be supplied that could meet the applicable performance standards.	The wording of the requirement has been changed to the following: "The RPAS must be equipped with a flight data recording capability on the RPA or the MCS (or both)."	STANAG compliance is not necessary
29.2		Feedback was received by multiple contractors that an underwater locating device capability that does not meet AEP/STANAG 4671 could be supplied that could meet the applicable performance standards.	The wording of the requirement has been changed to the following: "The RPA should be equipped with an underwater location device meeting the requirements of TSO C121B – 90 day transmission"	
30	deleted		Deleted to avoid repetition	
30.1	10.2		Requirement 30.1 has been moved and renumbered to 10.2.	
31	11	Feedback received that INS heading system is not capable of inflight power up	Requirement 31 has been moved and renumbered to 11. The reference to inflight power up has been removed	
32	11.1	Feedback received that INS heading system is not capable of inflight power up	Requirement 32 has been moved and renumbered to 11.1. The reference to inflight power up has been removed	
37	34	Feedback received that TCAS II is not suitable for RPAS as de-confliction and resolution is not suitable for RPAS	Requirement re-worded to require TCAS I only	

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38	35	Feedback received that there are different ways to obtain terrain awareness that don't require TAWS B	Requirement for TAWS B has been removed. A terrain awareness system is required
40	38		Requirement 40 and 41 have been combined for clarity
41	deleted		Deleted as combined with the above
49	45	Clarification needed as to the type of physical connectors and international standards required	Wording changed to "standard aviation industry connectors and communications protocols"
52	48		Reference to "target integration information" removed
52.3	deleted		Requirement has been removed
53	49		The requirement has been changed to indicate that TC will "Provide as Government Furnished Equipment (GFE) an L-3 WESCAM MX-15HDI to the contractor for integration into the RPAS."
53.1-53-36	deleted		Requirements have been deleted
54.3	50.3		Requirement changed to indicate that Radar and AIS data fusion can occur either in the MCS or on board the RPA.
54.4	50.4		Requirement now only mandatory if data is merged on the RPA
55	51	Feedback received that there are different ways to record data such as on board or in the MCS or both.	The requirement has been changed to reflect this feedback and the new wording is as follows: "The RPAS must include a data recording system either on board the RPA or at the MCS (or both) that will record all payload data."
	51.1		New Desirable requirement: "The RPAS should include a data recording system on board the RPA that will record all payload data."
	51.2		New Desirable requirement: "The RPAS should include a data recording system both on board the RPA and in the MCS that will record all payload data."
55.1	51.3	Feedback received that there are different ways to record data such as on board or in the MCS or both.	The requirement has been changed to remove the requirement for recording and storage of payload data onboard the RPA. It can now be met by storage on-board the RPA or in the MCS or both.
56	52	Clarification was sought by multiple contractors regarding the type of high	The reference to "industrial grade" WRT the camera has been removed and details on how it would be deployed have been

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56.4	deleted	resolution still image camera was required and more detail on how it would be deployed.	added as follows: The payload must include a high-resolution still image camera system, to be used for mapping and the production of orthomosaics, as a configurable payload to be integrated in a manner which allows initialization and termination of the image sequence from the ground station. This requirement has been deleted	
56.5	52.5		The word “automatically” has been added WRT the geo-referencing of images as follows: Images captured by the camera system must be automatically geo-referenced, or be capable of being georeferenced based on RPA or camera system positional data	
57	deleted	Comment received that RTCA DO-160G standard requirement may limit the availability of sensors.	The requirement has been deleted	
58	deleted		Deleted	
59	53		References to later editions to STANAG 4671 (editions 1, 2, or 3) have been added.	
59.1	deleted	There was some confusion WRT mandatory and desirable requirements for different editions of the STANAG/AEP 4671 and a need for clarity was requested	Requirement has been deleted	
54	54	Clarity was requested WRT required satellite data link requirements	A requirement has been added to ensure that the RPAS has redundant C2 links as follows: “The RPAS must include double redundant satellite Command and Control Data Links.”	This can include multiple. Separate L or KU band links, or a combination of Ku and L band links to ensure redundancy.
62	54.1		Requirement 62 moved and renumbered. Reference to “L-Band” removed and “double redundant satellite Command and Control Data Links” added	
60	54.2		Wording of the requirement has been modified slightly for clarity. Reference to STANAG removed	
62-64		Feedback received that not all systems are required to use a Line of Sight communication link for ATOL	Requirements 62, 63, and 64 have been removed.	Item 69.5 has been added below in relation to this requirement.
65-67			The requirement for an L-Band communication system compatible with both Iridium and Inmarsat has been deleted.	This requirement can be met by requirement 54 above

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68	56	Several contractors indicated that Ka satellite communications would be too narrow of a beam to be suitable for RPAS operations and that there is no Ka coverage in the Eastern Arctic which is the area of operations of the RPAS pilot project	References to Ka have been removed	
69	56.1	As above	As above	
70	56.2	Feedback was received that 500 Kbps data rate for upload to the satellite constellation was too high, difficult to achieve and not required.	500kbps has been lowered to 200kbps	
71	deleted	All contractors indicated that a dual Ka/Ku band satellite communication system that is capable of automatic switching was unrealistic and unachievable	This requirement has been deleted	
73 – 73.5	Deleted	Clarity was requested WRT the proposed use of a Mobile MCS. Feedback received that not all systems are required to use a Line of Sight communication link for ATOL and launch and recovery	Requirements for mobile MCS deleted. Requirements for LRC deleted	
73.6	58		New Requirement to address requirements for LRC and Mobile capability as follows: "The RPAS must include launch and recovery equipment (including communications equipment) necessary to enable the RPA to take off and land while it is located at the MOB at Ottawa, Canada; the FOB at Iqaluit, Canada; and, at any other location where the RPA may be deployed."	
73.7	59		Reference to LRC changed to RPAS	
	60		Reference to LRC changed to RPAS and minor wording changes as follows: The RPAS must include equipment to enable safety	

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74	61		monitoring and manual intervention during automatic takeoff and landing (ATOL).	
74.1	deleted		STANAG edition changed to edition 3	
77	64		This desirable requirement has been removed A minimum computer display size of 24 inches has been added to the requirement as follows: The MCS must include multi-function electronic displays ( <i>minimum 24 inches</i> ) at all crew stations for the presentation of flight or sensor information (does not apply to LRC).	
89	76		The reference to "data exploitation system" has been changed to "MCS"	
90	77		The reference to "data exploitation system" has been changed to "MCS"	
91	78		The reference to "data exploitation system" has been changed to "MCS". The word "manual" has been added so that the requirement reads "The MCS must support the <u>manual</u> tagging and cataloging of selected sensor data."	
92	79		The reference to "data exploitation system" has been changed to "MCS"	
93	80		The reference to "data exploitation system" has been changed to "MCS"	
111	99		The requirement has been amended as follows "The Contractor must provide sufficient Technical Data Packages (TDP) (including Level II Engineering Drawings) to enable Canada to conduct in-house Level 1 (O level) and limited Level 2 (I Level) Maintenance activities."	