N00014-17-S-B008 Electronic Warfare Technology
Amendment 0005

The purpose of Amendment 0005 to BAA N00014-17-S-B008 to respond to questions submitted prior to 14 February 2017 and to amend the BAA.

1. The following provides questions and responses:

Research Area 1

Q1: What is the ultimate SWaP that is required for the multi-wavelength EO/IR high power beam steering subsystem?

A1: The ultimate SWAP will be determined by the end application. However, for the more severe SWAP constrained applications, it is desired that the ultimate volume of the system (laser, scanner, cooling, etc.) would not exceed 125 cubic inches (T), 75 cubic inches (O).

Q2: Regarding Area 1, we would appreciate some clarification regarding:

1) Aperture of the device
2) What is the operational range (min/max)
3) Required speed (we understand that mechanical scanners have near 1 ms speed)
4) Angular resolution (required or desired)
5) Size/weight and power limitations if any
6) For future it would be beneficial to know if any specific electrical interface is preferred
7) The minimal light throughput acceptable

A2: Please see Amendment (a) below.

Q3: I would appreciate if you can look at the initial draft of our white paper and provide some feedback.

A3: As per the BAA, the Government will not meet with offerors or hold discussions before white paper submissions. If you have an idea that might satisfy the requirement(s) in any of the Research Opportunity Areas, please submit a white paper as per the instructions in the solicitation.

Q4: We intend to submit a proposal that includes Collateral Secret information, and thus are requesting a DD254 be issued that allows us to work this proposal effort to include a government laboratory as a collaborative subcontractor. What information is required for the creation of a DD254 to support our proposal?

A4: The DD254 will be generated by the Program Office after awardees have been selected. Any additional information will be requested at that time.

Q5: For White Paper Submissions to Research Area 2, we are to include Attachment 2 (Listing of Leveraged Government-Funded S&T) using the template provided. Should this be submitted as a separate file and remain in MS Excel, or should we convert the file to an Adobe PDF and insert the pages into the final white paper? If submitting in MS Excel, are we able to upload two documents to the FTP site?

A5: Microsoft Excel is the preferred format for Attachment 2 but PDF files will also be accepted. Yes, multiple documents may be uploaded to the FTP site.

Q6: We request an extension to submit our white paper on a later date.

A6: As per page 7 of the BAA, the due dates for the submission of white papers and full proposals will not be extended.

2. The BAA is hereby amended as follows:

(a) Page 4, Part I, Section F – Under "Area 1 – Subsystem Demonstrator for EO/IR Beam Steering at Multiple Wavelengths", insert the following language after the last paragraph:

"The goal of the subsystem demonstrator (SSD) in Tech Area 1 is to demonstrate both the functional configuration and capability of a final EW subsystem, though not necessarily the physical configuration, packaging, or form factor. The SSD shall use technologies that are conducive to future tactical implementation on SWAP-constrained vehicles or platforms, but this can be demonstrated through analysis rather than physical measurement. It is ultimately desired that the system will have the following properties:

1) Aperture of the device: At this time a maximum aperture size has not been defined, as it will depend on the ultimate application and proposed approach. However, it is desired that the ultimate system will have a divergence < 1mrad with an M^2 < 3

2) Operational Range: Different applications have different range requirements. A flexible system design to allow operation at 10's of meters and 1000's of meters would be desired.

3) Scanning Speed: It is desired that the subsystem be capable of steering at < 1ms from any point in the FOV to any other point in the FOV.

4) Angular Resolution: Continuous (or near-continuous) random access steering is desired.

5) SWAP Limitations: The ultimate SWAP will be determined by the end application. However, for the more severe SWAP constrained applications, it is desired that the ultimate volume of the system (laser, scanner, cooling, etc.) would not exceed 125 cubic inches (T), 75 cubic inches (O).

6) Electrical Interface: At this time an electrical interface has not been defined. However, design choices that make use of a Modular Open System Architecture (MOSA) approach are preferred.

7) Minimal Light Throughput: Output powers of not less than 10 Watts (threshold) to greater than 20 Watts (objective) in EACH spectral band are preferred. Part of the analysis to show the proposed design could ultimately fit into a SWAP constrained platform, will need to take into account cooling and power requirements to produce the desired output powers."

3. All other terms and conditions remain unchanged.