Tender

Autonomous Waste Sorting and Segregation (Auto-SAS)

Nuclear Decommissioning Authority

F02: Contract notice
Notice identifier: 2024/S 000-019910
Procurement identifier (OCID): ocds-h6vhtk-0478a8
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Section I: Contracting authority

I.1) Name and addresses

Nuclear Decommissioning Authority

Herdus House Westlakes Science and Technology Park Moor Row

Cumbria

CA24 3HU

Contact

Madeline Jones

Email

madeline.jones@nda.gov.uk

Telephone

+44 1925802875

Country

United Kingdom

Region code

UK - United Kingdom

Internet address(es)

Main address

https://www.gov.uk/government/organisations/nuclear-decommissioning-authority

Buyer's address

https://www.gov.uk/government/organisations/nuclear-decommissioning-authority

I.3) Communication

The procurement documents are available for unrestricted and full direct access, free of charge, at

https://one-nda.force.com/s/Welcome

Additional information can be obtained from the above-mentioned address

Tenders or requests to participate must be submitted to the above-mentioned address

I.4) Type of the contracting authority

Body governed by public law

I.5) Main activity

Other activity

Nuclear

Section II: Object

II.1) Scope of the procurement

II.1.1) Title

Autonomous Waste Sorting and Segregation (Auto-SAS)

II.1.2) Main CPV code

- 73000000 - Research and development services and related consultancy services

II.1.3) Type of contract

Services

II.1.4) Short description

The NDA and its operating companies recognise that robotics and automation have a key role to play in reducing the time, cost and risk associated with our decommissioning mission. Auto-SAS aims to push the boundaries of robotic systems in the NDA group, acting as a steppingstone to the routine use of autonomous systems and continuous operations.
An area where robotic technologies provide a significant opportunity is nuclear waste handling. The characterisation, sentencing and disposal of radioactive waste is complicated, time consuming and expensive. It also poses both conventional and radiological risks to workers. Ideally waste would be handled once, segregated at source to the most appropriate waste route, properly utilising the waste hierarchy. Safety measures, alongside resource, time and space constraints, make in-situ sentencing challenging, meaning that accurate segregation is not always possible.
Auto-SAS will build upon the learning from the NDA funded Integrated Innovation for Nuclear Decommissioning – Sorting and Segregation (IIND-SAS) competition delivered through Innovate UK, which sought to demonstrate the feasibility of autonomous sort and segregation of mixed nuclear waste through the supply chain. Auto-SAS will go further by deploying an integrated system on a nuclear licenced site, for the sorting and segregation of specific radioactive waste material. The Nuclear Restoration Services (NRS) Strategic Innovation Team will be responsible for the overall delivery of the project, supported by an integrated team from across the NDA group.

Auto-SAS will be separated into two sequential phases. These phases are as follows:
1. Off-site Design, Testing and Build
2. On-Site Deployment and operation

The Autonomous Waste Sorting and Segregation (Auto-SAS) Innovation Partnership will be structured into 2 phases:

• Phase 1: Off-Site Development - Design, manufacture, commission and test an integrated sorting and segregation platform, in line with the requirements in section 7. Iterate and prototype as necessary, and thoroughly test the system to give confidence of suitable performance when brought to site. This will be verified by a successful and thorough Factory Acceptance Test and compliance with the NRS Safety and Design Justification Process (shared at ITT). Facilitate
stakeholder demonstrations of the developed platform.

• Phase 2: On-Site Deployment - Install and commission the SAS platform developed offsite, including Site Acceptance Testing (SATs). Operate it for a number of cycles within a defined time period to achieve the learning outcomes in the learning plan. Assist in the decisions around further development and future uses of the developed platform.

Estimated value

Phase Maximum Budget
Phase 1 – Off-Site Development £5,500,000
Phase 2 – On-Site Deployment £4,000,000

II.1.5) Estimated total value

Value excluding VAT: £9,500,000

II.1.6) Information about lots

This contract is divided into lots: No

II.2) Description

II.2.2) Additional CPV code(s)

- 79723000 - Waste analysis services
- 73300000 - Design and execution of research and development
- 42997300 - Industrial robots
- 79930000 - Specialty design services
- 79421200 - Project-design services other than for construction work

II.2.3) Place of performance

NUTS codes

- UK - United Kingdom

II.2.4) Description of the procurement

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Estimated value

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More information can be found here: https://one-nda.force.com/s/Welcome

II.2.5) Award criteria

Price is not the only award criterion and all criteria are stated only in the procurement documents

II.2.6) Estimated value

Value excluding VAT: £9,500,000

II.2.7) Duration of the contract, framework agreement or dynamic purchasing system

Start date

1 April 2025

End date

31 March 2029

This contract is subject to renewal

No

II.2.9) Information about the limits on the number of candidates to be invited

Envisaged minimum number: 1

Maximum number: 5

II.2.10) Information about variants

Variants will be accepted: No

II.2.11) Information about options

Options: No

II.2.13) Information about European Union Funds

The procurement is related to a project and/or programme financed by European Union funds: No

II.2.14) Additional information

https://one-nda.force.com/s/Welcome

Section III. Legal, economic, financial and technical information

III.1) Conditions for participation

III.1.1) Suitability to pursue the professional activity, including requirements relating to enrolment on professional or trade registers

List and brief description of conditions

Please see standard selection questionnaire - up to 5 suppliers with the highest scores will be down selected and continue to ITT stage.

1 supplier will be awarded this contract ultimately.

III.1.2) Economic and financial standing

List and brief description of selection criteria

As per SSQ

III.1.3) Technical and professional ability

List and brief description of selection criteria

As per SSQ

Section IV. Procedure

IV.1) Description

IV.1.1) Type of procedure

Innovation partnership

IV.1.8) Information about the Government Procurement Agreement (GPA)

The procurement is covered by the Government Procurement Agreement: Yes

IV.2) Administrative information

IV.2.2) Time limit for receipt of tenders or requests to participate

Date

30 July 2024

IV.2.4) Languages in which tenders or requests to participate may be submitted

English

IV.2.6) Minimum time frame during which the tenderer must maintain the tender

Duration in months: 8 (from the date stated for receipt of tender)

Section VI. Complementary information

VI.1) Information about recurrence

This is a recurrent procurement: No

VI.4) Procedures for review

VI.4.1) Review body

Nuclear Decommissioning Authority

Herdus House Westlakes Science and Technology Park Moor Row

Cumbria

CA24 3HU

Email

enquiries@nda.gov.uk

Country

United Kingdom

Internet address

https://www.gov.uk/government/organisations/nuclear-decommissioning-authority

VI.4.2) Body responsible for mediation procedures

Nuclear Decommissioning Authority

Herdus House Westlakes Science and Technology Park Moor Row

Cumbria

CA24 3HU

Email

enquiries@nda.gov.uk

Country

United Kingdom

Internet address

https://www.gov.uk/government/organisations/nuclear-decommissioning-authority

VI.4.4) Service from which information about the review procedure may be obtained

Nuclear Decommissioning Authority

Herdus House Westlakes Science and Technology Park Moor Row

Cumbria

CA24 3HU

Email

enquiries@nda.gov.uk

Country

United Kingdom

Internet address

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