

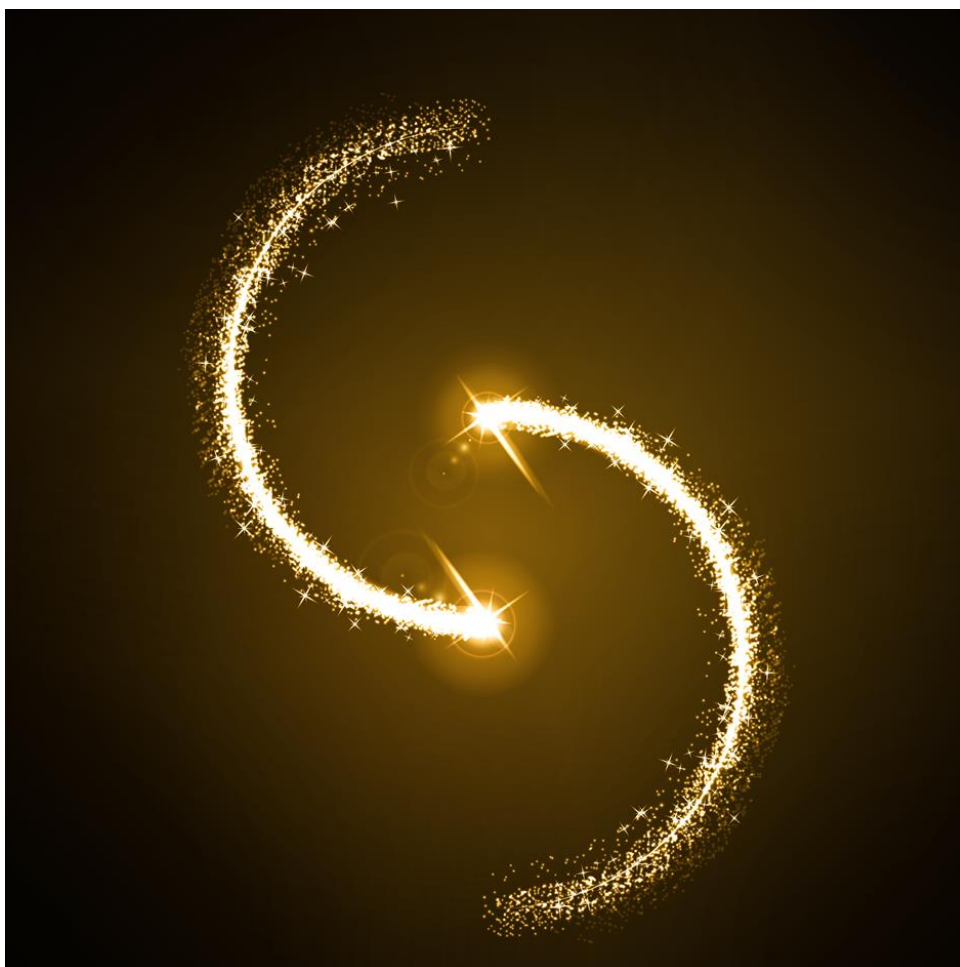


Crown  
Commercial  
Service

# Customer Needs

RM6094 Spark

Dynamic Purchasing System Agreement



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# **1. Introduction**

## **1.1 Customer Needs Statement**

Crown Commercial Service (CCS) is seeking to establish a Dynamic Purchasing Agreement (DPS) for the provision of Spark: The Technology Innovation Marketplace for all UK central government departments, wider public sector organisations and charities as listed in the OJEU Contract Notice.

This DPS Agreement will be managed by CCS and any contract(s) awarded under this DPS Agreement will be managed by individual Customers.

The intended duration period of the DPS Agreement is for 3 years (36 months). In the event that the DPS Agreement is terminated, CCS shall give the Supplier no less than three (3) Months written notice. CCS acknowledges this DPS Agreement will not be terminated within the initial first three (3) months from the commencement date.

CCS may extend the duration of this DPS Agreement for any period or periods up to a maximum of 1 year (12 months) in total from the expiry of the Initial RM6094 DPS Agreement period by giving the Supplier no less than three (3) Months' written notice.

The flexibility of the contracting period allows the Customer to determine appropriate contracting timelines required in order that the Supplier can meet the needs of the Customer for all projects, including those which are large and complex.

## **1.2 The Opportunity**

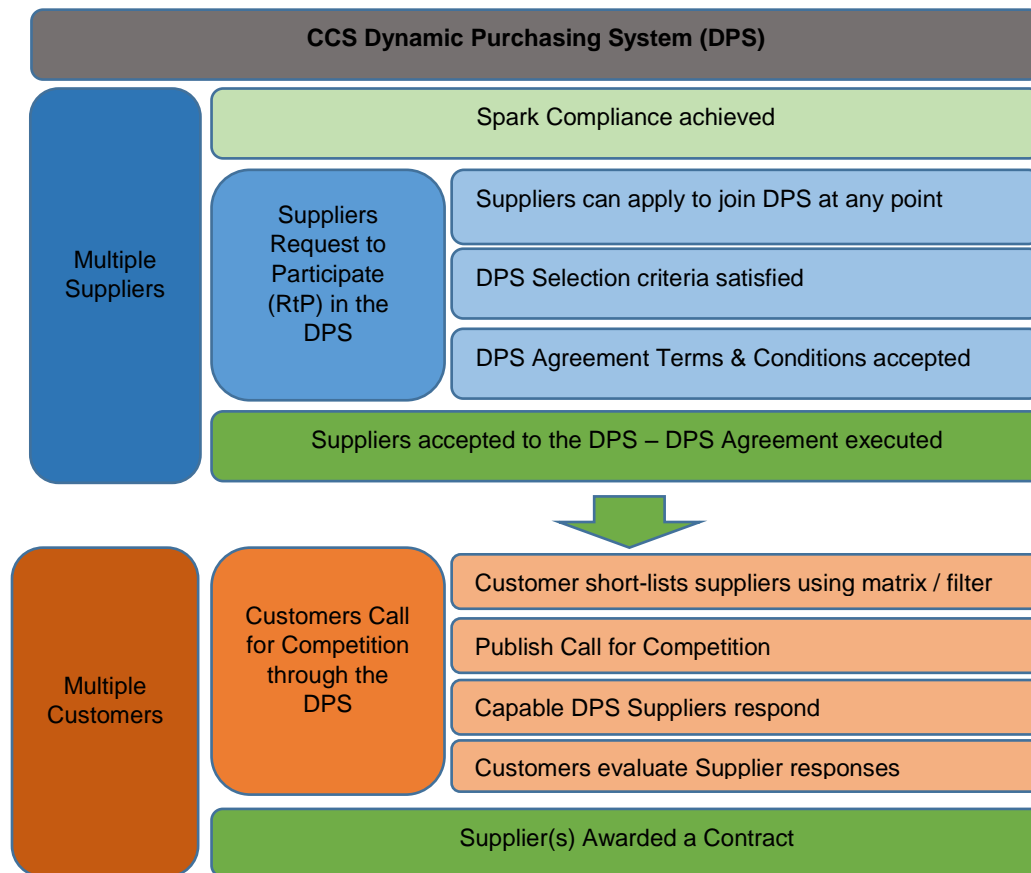
The DPS Agreement will provide central government and wider public sector departments with the opportunity to procure an extensive range of innovative technology products and services via a broad range of Suppliers.

Upon application to join the DPS Agreement, Bidders are required to indicate which categories and services they are able to bid for. It is therefore essential that Bidders select the exact elements relevant to their service offering in order to be invited to the relevant Competitions.

Customers will use the product and service element filters as detailed in Attachment 1 – Spark Product and Services Matrix, to short list appointed Suppliers offering their service requirements and invite to Competition.

### **What is a Dynamic Purchasing System (DPS)?**

A DPS is a public sector sourcing tool for common goods and services under regulation 34 (Dynamic Purchasing Systems) of the [PCR 2015](#). Bidders can apply to join at any point and don't require any special IT equipment as a DPS eliminates unnecessary activity for the Bidder, up front:



### How will the services within the DPS for RM6094 Spark be organised?

The DPS will be organised into distinct categories so:

- Bidders can indicate all elements relevant to their service offering, and
- Customers can filter the elements to produce a shortlist of appointed Suppliers to invite to a Competition.

The four (4) distinct categories comprise of:

- Subject/Problem Area;
- Delivery Method (Technology Type);
- Location; and
- Security level.

Full details of the four (4) distinct categories and the sub-categories can be found at Attachment 1 – Spark Product and Services Matrix.

## **Who are the Customers of the RM6094 Spark DPS Agreement?**

The DPS Agreement will be available to all central government and wider public sector customers as listed in the OJEU notice, including but not limited to the following:

Central government:

- Environment
- Defence
- Other central government

Wider Public Sector:

- Education
- Fire and Rescue
- Health
- Local government
- Not for Profit (Charitable)
- Police
- Housing Association

Other Wider Public Sector

## What are the benefits of the RM6094 Spark DPS Agreement?

- Simpler, quicker process – accessible for both SMEs and other suppliers seeking opportunities to provide services to the public sector.
- Automated, electronic process – streamlined electronic process.
- Flexible - new Bidders can apply to join at any point.
- Scalability – enables easy access to new technologies once proof of concept has been completed.
- Filtering of Supplier offering - ensures Suppliers receive notifications of Competitions that are relevant to their service offering and that Customers are able to easily identify potential Suppliers.
- Dynamic – Customers can create bespoke specifications, Competitions and contracts.
- Supports localism and Social Value - enabling appointed Suppliers to bid for business either locally, regionally or nationally.
- Value for money – drives value through the ‘Call for Competition’ procedure.
- Efficiencies – reduces Customers costs and process cycle time

### What is the estimated value of the RM6094 Spark DPS Agreement?

The estimated value is £20m (excluding VAT) in the first year, growing to £40m (excluding VAT) in year two and £50m (excluding VAT) in year three in line with targeted growth strategies. Total contract value over the life of all call-offs is estimated at £200m.

This will comprise multiple contracts with multiple Suppliers, however there is no guarantee of work or spend under this RM6094 DPS Agreement.

## 1.3 The Current Situation

This RM6094 Spark DPS Agreement is a new offering from CCS.

Having reviewed our approach to emerging technologies we are pursuing a new approach for immature markets that enables Customers access to genuine innovation and Suppliers a route to market which is adaptable as their capabilities change.

Outside of the cloud software and services at present CCS does not have any commercial offerings associated with the provision of new products emerging from technology innovation, such as those developed as proof of concepts between a public sector customer and a supplier.

This DPS will form one part of a wider programme of work to provide advice and guidance to Customers in order to ensure the right commercial and Supplier relationship approaches to innovation are being taken and that barriers to successful exploitation of

innovation are not unnecessarily created. This includes a focus on a collaborative relationship and a balanced approach to risk within the contract.

## **2. Specification (Schedule 2 Part A Goods and/or Services)**

### **2.1 Our priorities**

Crown Commercial Service (CCS) has three strategic priorities;

- Maximising Commercial Benefits
- Focus on the Customer (Contracting Authorities)
- Strengthening the UK Economy through Effective Policy Delivery

The Spark DPS will have a positive impact on all three of these priorities.

We will meet Contracting Authorities needs by providing support and guidance around the commercial approach to new technologies and enabling access to transformation technology.

The technologies covered will unlock new ways of working and effectively enables delivery of technology and commercial policy.

The DPS will enable new Suppliers to offer technologies to government through a quick yet robust process that will be suited to all Suppliers regardless of size.

### **2.2 Scope**

The Supplier shall demonstrate that they can provide at least one new/innovative technology for one or both Radical and Disruptive Innovation; that can be of benefit for the public sector and fits within the innovation definitions for the purposes of this DPS agreement, as detailed below.

#### **Disruptive Innovation**

Disruptive Innovation creates a new market and value network and eventually disrupts an existing market and value network, displacing established market-leading firms, products, and alliances.

#### **Radical Innovation**

Radical Innovation is when a new product, service, process or strategy is introduced to a market, but is designed to make a significant impact by completely replacing existing technologies and methods. Effectively, it “blows up” the existing system or process and replaces it with something entirely new.

Suppliers shall be required to provide technologies which fall within the scope of the products and services filter system, as detailed in Attachment 1 – Spark Products and Services Matrix:

The Filters consist of four (4) distinct categories:

1. Subject Area (two levels)
2. Delivery Method (two levels)
3. Location
4. Security

Within the filters for the Subject Area and Delivery Method there is a second level of identification required as described in further detail below:

### Subject Area - Level 1

Subject Area – Level 1	Subject Area – Level 2
Corporate	Finance
	HR
	Customer Service
	Facilities
	Data
Transport	Rail
	Road
	Air
	Maritime
Defence/Security	Army
	Airforce
	Navy
Health	Diagnostics
	Treatment
	Prevention (Health)
Local Government	Waste Management
	Planning
	Social Care
	Licencing
	Citizen Engagement
	Electoral
Police/Justice	Prevention (Justice)
	Prediction
	Evidence Gathering
	Protection
	Custodial
Fire and Rescue	Protection
	Inspecting
	Prevention (Fire)
	Locating
Education	Learning outcomes

	Testing
Geospatial and environment	Mapping
	Agriculture
	Fisheries

## Delivery Method

Delivery Method Level 1	Delivery Method Level 2	Definition
Internet of Things (IoT)	Devices (Things)	Non-standard computing devices (not end user devices or servers) that connect wirelessly to a network and have the ability to transmit data.
	Applications	Software applications to enable connected devices to identify and communicate with each other within the context of the internet of things (IoT).
	Data Management Platforms	Device management helps companies integrate, organise, monitor and remotely manage internet-enabled devices at scale, offering features critical to maintaining the health, connectivity and security of the IoT devices along their entire lifecycles.
	Security	Technology area concerned with safeguarding connected devices and networks in the internet of things.
	Connectivity	Network technology that enables devices to connect with each other, share information, and connect to the internet.
	Network Equipment	Equipment that facilitates the creation of network connections that enables devices to join up/connect with each other and share information across the different types of networks, including the internet. Equipment should be specifically for an IoT context.
Artificial Intelligence and Automation	Machine Learning	Applications that help to solve business problems utilising mathematical models that can extract knowledge and pattern from data.

		<p>Including:</p> <ul style="list-style-type: none"> <li>• Supervised learning, where observations contain input/output pairs (also known as "labelled data");</li> <li>• Unsupervised learning (where labels are omitted); and</li> <li>• Reinforcement learning (where evaluations are given of how good or bad a situation is).</li> </ul>
	Speech recognition	Speech recognition technology translates human speech into text for further processing.
	Intelligent applications	Enterprise applications with embedded or integrated AI technologies to support or replace manual human-based activities with intelligent automation and improved decision making.
	Deep Neural Networks	<p>Deep neural nets (DNNs) are large-scale neural networks, often with many processing layers.</p> <p>Enabling computers to process much more complex data than before, such as video, image, speech and textual data.</p>
	Robotic Process Automation	<p>Robotic process automation (RPA) is a combination of user interface recognition technologies and workflow execution used to automate repetitive simple tasks.</p> <p>It can mimic the mouse clicks and keystrokes of a human using screen and keyboard to drive applications and execute system-based work.</p> <p>It can also sometimes also be designed to automate application to application interaction.</p>
	Virtual Assistants	<p>Virtual assistants (VAs) help users or enterprises with a set of tasks previously only made possible by human guidance.</p> <p>VAs use AI and machine learning (such as natural-language processing,</p>

		<p>prediction models, recommendations and personalisation) to assist people or automate tasks.</p> <p>VAs listen to and observe behaviours, build and maintain data models, and predict and recommend actions.</p> <p>VAs can be deployed in several use cases, including virtual personal assistants, virtual customer assistants and virtual employee assistants.</p>
	Chatbots	<p>Stand-alone conversational interfaces that use an app, messaging platform, social network or chat solution for conversations.</p> <p>Chatbots can vary in sophistication, from simple, decision-tree-based marketing, to implementations built on feature-rich platforms.</p> <p>They can be text or voice-based, or a combination of both.</p>
	Conversational User Interfaces	<p>Conversational UI (CUI) is a high-level design model in which user and machine interactions primarily occur in the user's spoken or written natural language.</p> <p>Typically informal and bidirectional, these interactions range from simple interaction through to highly complex interactions, with subsequent highly complex results.</p> <p>As design models, CUI depends on implementation via applications or related services or on a conversational platform.</p>
	Natural Language Processing	<p>Natural-language processing (NLP) provides an intuitive form of communication between humans and systems, i.e. NLP includes computational linguistic techniques aimed at parsing, interpreting (and sometimes generating) human</p>

		<p>languages.</p> <p>NLP techniques deal with the pragmatics (contextual), semantics (meanings), grammatical (syntax) and lexical (words) aspects of natural languages.</p> <p>The phonetic part is often left to speech-processing technologies that are essentially signal-processing systems.</p>
	Predictive Analytics	<p>Predictive analytics is a form of advanced analytics that examines data or content to answer the question, "What is going to happen?" or more precisely, "What is likely to happen?"</p> <p>It is characterised by techniques such as regression analysis, multivariate statistics, pattern matching, predictive modelling and forecasting.</p>
	Prescriptive Analytics	<p>The term "prescriptive analytics" describes a set of analytical capabilities that specify a preferred course of action to meet a predefined objective.</p> <p>The most common examples of prescriptive analytics are optimisation methods (such as linear programming), a combination of predictive analytics and rules, heuristics, and decision analysis methods (such as influence diagrams).</p> <p>Prescriptive analytics differs from descriptive, diagnostic and predictive analytics in that the output is a recommended (and sometimes automated) action.</p>
	Smart Robots	<p>Smart robots are an AI system with an electromechanical form factors that work autonomously in the physical world, learning in short-term intervals from human-supervised training and demonstrations or by their supervised experiences on the job.</p>

		<p>They sense environmental conditions and recognise and solve problems. Some can interact with humans using voice language, while some have a specialised functional form, like warehouse robots.</p>
	Artificial General Intelligence	<p>Artificial general intelligence (AGI) also known as "strong AI" and "general-purpose machine intelligence" will handle a very broad range of use cases.</p> <p>Despite appearing to have human-like powers of learning, reasoning and adapting, they lack common sense, intelligence, and extensive means of self-maintenance and reproduction.</p>
	Computer Vision	<p>Computer vision (CV) is a process that involves capturing, processing and analysing real-world images and videos to allow machines to extract meaningful, contextual information from the physical world.</p> <p>There are numerous different and important CV technology areas, including machine vision, optical character recognition, image recognition, pattern recognition, facial recognition, edge detection and motion detection.</p>
	Artificial Intelligence Platform as a Service (PaaS)	<p>Cloud artificial intelligence and machine learning platform services are known collectively as AI platform as a service (PaaS).</p> <p>They provide AI model building tools, APIs and associated middleware that enable the building/training, deployment and consumption of machine learning models running on prebuilt infrastructure as cloud services.</p> <p>These cover vision, voice and general data classification and prediction models of any type.</p>

	Artificial Intelligence Related Consulting and Systems Integration	<p>Artificial intelligence related consulting and system integration services are a subset of intelligent automation services to help clients ideate use cases, design business or IT processes, select technologies, curate data, build and train models, deploy solutions, assess and mitigate risks, and adapt talent mix to successfully incorporate intelligent solutions.</p> <p>Intelligent solutions must involve one or more advanced technologies, such as machine learning, deep learning and natural-language processing.</p>
	Ensemble Learning	<p>Ensemble learning techniques are machine learning algorithms wherein a set of predictive models is created and its outputs combined to become the single output of the entire ensemble.</p> <p>This methodology draws heavily on the "wisdom of the crowd" principle, where the diversification of opinions or model outputs is key.</p> <p>The most well-known patterns of bagging, boosting and stacking techniques include random forests and gradient boosting.</p>
Simulated and Enhanced Environments	Spatial Computing	<p>Spatial computing is a platform that combines immersive large displays with gesture control.</p> <p>Unlike virtual reality (VR)/augmented reality (AR), spatial computing systems are physically immersive, typically installed in a large conference room with multiple large-screen displays, videoconferencing (connecting remote collaborators) and personal devices.</p>
	Virtual Reality	<p>An artificial environment which is experienced through sensory stimuli (such as sights and sounds) provided by a computer and in which one's actions partially determine what happens in the</p>

		environment. Most commonly delivered via an immersive headset but not necessarily.
	Augmented Reality	<p>Augmented reality (AR) is the real-time use of information in the form of text, graphics, audio and other virtual enhancements integrated with real-world objects and presented using a head-mounted-type display or projected graphics overlays.</p> <p>It is this "real world" element that differentiates AR from virtual reality.</p> <p>AR aims to enhance users' interaction with the environment, rather than separating them from it.</p>
	Brain-computer Interface	<p>A brain-computer interface (BCI) is a type of user interface whereby signals in the brain are interpreted, or written to, by a computer.</p> <p>Typically, data is either passively observed for research or used as commands to control an application or device.</p> <p>There are three approaches:</p> <ul style="list-style-type: none"> <li>• Invasive, where electrodes directly connect to the brain.</li> <li>• Partially invasive, where the skull is penetrated, but the brain is not.</li> <li>• Non-invasive, where commercially available caps or headbands are worn to interact with signals from outside the skull.</li> </ul>
Engineering and materials science	Flexible displays	Flexible displays are display panels constructed of thin or flexible substrate that can be bent, rolled, folded or flexed without loss of functionality.
	Neuromorphic hardware	<p>Neuromorphic hardware comprises semiconductor devices conceptually inspired by neurobiological architectures.</p> <p>Neuromorphic processors feature non-</p>

		<p>von-Neumann architectures and implement execution models that are dramatically different from traditional processors.</p> <p>They are characterised by simple processing elements, but very high interconnectivity.</p>
	Deep neural network (DNN) application-specific integrated circuit (ASIC)	A deep neural network (DNN) application-specific integrated circuit (ASIC) is a purpose-specific processor that accelerates DNN computations.
	Virtual Assistants (hardware)	Hardware designed to enable human interaction with a Virtual Assistant, may include audio and visual inputs and outputs.
	Field-programmable gate array (FPGA) accelerator	Field-programmable gate array (FPGA) accelerator is a server-based reconfigurable computing accelerator that delivers extremely high performance by enabling programmable hardware-level application acceleration.
	Graphics Processing Unit (GPU) - accelerated computing	GPU-accelerated computing is the use of a graphics processing unit (GPU) to accelerate highly parallel, compute-intensive portions of the workloads in conjunction with a CPU.
	Bioprinting	<p>3D bioprinted human tissue is the use of 3D printing technology to build functioning living tissue (e.g. skin) for human use.</p> <p>It involves representation of clinical imaging data as computer models, and translation into programs for controlling the motion of 3D cell-dispensing nozzles and other 3DP technologies.</p>
	3D Printing	The application of 3D printers for product design, development and prototyping, as well as their use in manufacturing processes to produce tools, jigs and fixtures, and finished goods.
	Acoustic sensing	Sensors designed to use sound for a variety of purposes, predominately in healthcare and infrastructure contexts

		for less intrusive and quick-to-implement ways to improve operational efficiency and performance in monitoring and diagnosing. Also law enforcement, for example to identify potential antisocial behaviour.
	Smart Fabrics	<p>Smart fabric refers to a range of technologies that transform textiles used in clothing, accessories, upholstery and more into devices that can be deployed as sensors, switches, connectors, batteries or displays.</p> <p>The components and electronics may be embedded in the fabric or, in some cases, within the fibres themselves.</p>
	Quantum Computing	<p>Non classical computing that operates on the quantum state of subatomic objects (e.g. electrons, ions).</p> <p>The particles represent information as elements denoted as quantum bits (qubits). A qubit can hold all possible results simultaneously (superposition) until read.</p> <p>Qubits can be linked with other qubits, a property known as entanglement. Quantum algorithms manipulate linked qubits in their undetermined, entangled state.</p> <p>The qubits resolve to the solution when read.</p>
Data	Human in the Loop Crowdsourcing	<p>Human-in-the-loop crowdsourcing is the complementary use of humans and algorithm based automation to solve a problem or perform a task, where the human input further improves the automated AI or data management solution.</p> <p>Human-in-the loop crowdsourcing has three key characteristics:</p> <ul style="list-style-type: none"> <li>• The ability to reach pre-qualified people at scale.</li> </ul>

		<ul style="list-style-type: none"> <li>• The ability to aggregate human (crowd) contributions into meaningful results.</li> <li>• Engaging contributors for a specific, mostly information-centric, task (not as full-time employees).</li> </ul>
	Blockchain / distributed ledger	<p>A blockchain is an expanding list of cryptographically signed, irrevocable transactional records shared by all participants in a network.</p> <p>Blockchain is one architectural design of the broader concept of distributed ledgers.</p> <p>Distributed Ledger is a consensus of replicated, shared, and synchronised digital data geographically spread across multiple sites, countries, or institutions.</p>
	Event Stream Processing	<p>An event stream is a sequence of event objects arranged in some order, typically by time. Event stream processing (ESP) is computing that is performed on the data in those event objects.</p> <p>Its purpose is stream data integration or stream analytics (also called complex-event processing (CEP)).</p> <p>Stream analytics can be executed:</p> <ul style="list-style-type: none"> <li>• as new data arrives, using event-driven ESP platform software;</li> <li>• shortly after it arrives, using real-time, on-demand queries; and</li> <li>• long after it has been stored, using on-demand queries on historical data.</li> </ul>
	Data Marketplaces and Trusts	<p>Marketplaces and trusts for access to, and exchange of, data within a public sector context.</p> <p>At a high level, a data trust should give people and organisations confidence when enabling access to data that</p>

		provide them with some value (either directly or indirectly) in return, for example within a health context or for better infrastructure planning.
	Fraud Detection	Products or services that help an organisation detect fraud using technology to do so.
	Data Loss Prevention	Products or services that provide visibility into data usage across an organisation and enable the dynamic application of local data security policies.  The technologies should seek to address data related threats including the risks of inadvertent or accidental data loss, and the exposure of sensitive data using monitoring, filtering, blocking and other remediation features.
	Location tracking	Products or services that enable the surveillance of location through use of the Global Positioning System (GPS), or another radio navigation satellite system, to track the location of an entity or object remotely. The technology can pinpoint longitude, latitude, ground speed, and course direction of the target.
	Data presentation	Tools and techniques used to communicate data or information through visual means. The goal is to communicate information clearly and efficiently to users.
Wearables	Displays	Headsets and other wearable display devices for use with virtual and augmented reality
	Exoskeleton / muscle computer interface	Wearable devices powered by actuators that is worn on the body.  Devices should use sensors and mechanical or hydraulic systems to assist, enable or enhance human movement such as walking, lifting and repetitive work tasks.
	Sensors	Sensors that can be integrated into various accessories such as garments,

		hats, wrist bands, socks, shoes, eyeglasses and other devices such as wristwatches, headphones and smartphones. Some sensors, mostly medical-grade ones, are used on a stand-alone basis, and can provide continuous physiological monitoring.
	Smart Cards / Rings etc.	<p>Wearable electronics devices with advanced mobile components that combine features of mobile devices with innovative features useful for mobile or handheld use.</p> <p>Uses include the ability to make payments, access control and other uses such as gesture control and activity tracking</p>
Transport	Personal On-demand transport	<p>Technology to enable improved access to transport, this includes;</p> <p>Demand-responsive transport like taxi or bus services using flexible routing and scheduling of vehicles rather than using a fixed route or timetable</p> <p>Technology enabled personal transport for example bike hire / sharing.</p>
	Autonomous Vehicles	<p>Autonomous or self-driving vehicles can navigate and drive certain parts or the whole distance from a starting point to a specified destination without human intervention by using various onboard sensing and localisation technologies, such as lidar, radar, cameras, GPS and map data, in combination with AI-based decision-making capability.</p> <p>The technology can also be applied to non-passenger vehicles for transportation of goods.</p>
	Commercial Unmanned Aerial Vehicles (Drones)	Commercial unmanned aerial vehicles (UAVs, also known as drones) are small helicopters, fixed-wing airplanes, multi rotors and hybrid aircrafts that have no human pilot on board.

		They are either remotely controlled by human pilots on the ground or outfitted for autonomous navigation. Unlike their consumer or military counterparts, they are used for commercial purposes.
Security	Threat prevention	Products and services deployed for the protection of devices, computers and/or IT networks from attack, damage or unauthorised access. Includes the reduction of threat and vulnerability, possible deterrence measures, (inter)national engagement, incident response procedures and capabilities, resilience, recovery policies and activities.
	Digital credentials	A digital credential is a proof of qualification, competence, or clearance that is attached to a person. Also, digital credentials prove something about their owner. Digital credentials are the digital equivalent of paper credentials, and examples could include but are not limited to a passport, driver's licence, membership certificate or public transport ticket.
	Cameras / visual detection / recording (not body-worn)	A mounted video camera used for the purpose of surveillance as part of security system with the facility to record/archive the video footage, and to the standard required to meet the legal/law enforcement standards, e.g. video data includes time, date, location information.
	Body-worn cameras	A video camera that can be worn and is therefore mobile, that can be used for the purpose of recording what can be seen by the wearer without needing to hold/operate it. Often but not only used by Law enforcement agencies where the facility to record/archive video footage is required to meet the legal/law enforcement standards for evidence gathering.

	Access control / biometrics / facial recognition	Products and services that establish a person's identity (authentication) as a means of providing security. May use human characteristics or some other form of credential as a unique identifier for an individual, e.g. fingerprints, hand geometry, earlobe geometry, facial geometry, retina and iris patterns, voice waves, DNA, and signatures. Applications may include allowing or preventing access to a physical location e.g. door in a building, or a protected system, e.g. an application or secured system.
	Drone countermeasures	Mitigation measures against drones. The aim of these will be to catch and land unwanted drones with the minimal collateral damage possible. These may include jammers, counter-drone capture methods such as other drones with payloads that can be deployed to counteract/capture a drone threat (e.g. a net), hacking/taking control of the drone and landing it safely, or passive countermeasures such as blocking areas from view or locking down certain zones.
	Hardware based security	Using a physical device rather than software, that is installed on the hardware of a computer system to provide vulnerability protection, e.g. devices used to scan a system or monitor network traffic, such as hardware firewalls and proxy servers, as well measures that provide protection of physical systems from harm. Often used in combination with software based security measures to provide additional layers of security for critical national infrastructure (includes systems, networks and assets whose continuous function is deemed necessary to ensure the security of a given nation, its economy, and the health and/or safety of the Public).

	Encryption	The translation/conversion of data in its original, readable form ('clear text') into a secret, unreadable code ('cipher text'). Encryption is the most effective way to achieve data security. Often requires a secret key or password as part of the process of encrypting the data.
	Decryption	The opposite process to encryption. The translation/conversion of an unreadable, secret code ('cipher text') back to data in its original, readable form ('clear text'). Often requires a secret key or password as part of the process of decryption of the data.
	Distributed Denial of Service (DDoS) Defence	A set of techniques or tools for resisting or mitigating the impact of distributed denial-of-service (DDoS) attacks on networks attached to the Internet by protecting the target and relay networks. A DDoS attack is when the incoming traffic flooding the victim originates from many different sources. This effectively makes it impossible to stop the attack simply by blocking a single source. A DDoS attack is like a group of people crowding the entry door of a shop, making it hard for legitimate customers to enter, disrupting trade.
	End-point protection	Refers to the approach of protecting a business network when accessed by remote devices like smartphones, laptops, tablets or other wireless devices. It includes monitoring status, software, and activities. Can include protection for the enterprise data that may be stored on these mobile devices/end points so that even if the device falls into the wrong hands (e.g. lost or stolen), the data should stay protected.

### **3. Mandatory Service Requirements:**

This section provides details of the mandatory Service delivery requirements that the Supplier shall be expected to fulfil in their entirety, in order to meet the requirements of this DPS Agreement.

It is important that the Supplier take time to fully understand this important part of the Service delivery requirement, all mandatory requirements as listed below shall be required at DPS Agreement commencement date with the Authority.

- Spark Products and Services – please refer to paragraph 3.1
- Standards – please refer to paragraph 3.2
- Security – please refer to paragraph 3.3
- Vetting – please refer to paragraph 3.4
- Intellectual Property – please refer to paragraph 3.5
- Order and Delivery – please refer to paragraph 3.6
- Maintenance and Costs – please refer to paragraph 3.7
- Training – please refer to paragraph 3.8
- Sustainability – please refer to paragraph 3.9
- Environmental – please refer to paragraph 3.10
- Social Value – please refer to paragraph 3.11
- Marketing and Communication – please refer to paragraph 3.12

#### **3.1. Spark Products and Services**

The Supplier shall assist in delivering open and interoperable technology in government so that Services can be delivered efficiently and respond more flexibly to the needs of citizens and businesses.

The Supplier shall, in addition to the products listed in section 2.2 of this Specification (Schedule 2 Part A Goods and/or Services) provide a full range of services across the lifecycle of a product, which shall include but not be limited to:

- design
- development
- testing
- installation
- integration
- support
- maintenance
- decommissioning
- disposal

The Supplier shall where required, ensure all technology is designed in line with the Government Digital Service (GDS) Digital Service Standard.

The Suppliers shall ensure that where applicable systems are either enabled for mobile use or can easily be integrated with mobile enabled interfaces.

### **3.2. Standards**

The Supplier shall comply with the appropriate standards (or equivalent) as updated and as applicable for the RM6094 Spark DPS which shall include but not be limited to:

#### **Service Management Standards**

- BS EN ISO 9001 “Quality Management System” standard or equivalent.
- ISO 10007 “Quality management systems – Guidelines for configuration management”.

#### **Environmental Standards**

- BS EN ISO 14001 Environmental Management System standard or equivalent.

#### **Accessible IT Standards**

- World Wide Web Consortium (W3C) Web Accessibility Initiative (WAI) Web Content Accessibility Guidelines (WCAG) 2.1 Conformance Level AA.
- ISO/IEC 13066-1:2011 Information Technology - Interoperability with assistive technology (AT) – Part 1: Requirements and recommendations for interoperability.

#### **Information Technology Standards**

- <https://www.gov.uk/government/publications/open-standards-principles>
- <https://www.gov.uk/guidance/government-design-principles>
- <https://www.gov.uk/service-manual/service-standard>
- <https://www.gov.uk/public-services-network#psn-standards>
- <https://www.gov.uk/government/publications/greening-government-ict-strategy>
- <https://www.gov.uk/government/publications/open-source-open-standards-and-re-use-government-action-plan>

#### **Architecture Standards**

- ISO 27001 Information Security Management standard or equivalent.

- ETSI TS 103 645 Cyber Security for Consumer Internet of Things

### **3.3. Security**

The Supplier shall be required to have their own security operating procedures that shall be made available to Contracting Authorities.

The Supplier shall ensure appropriate security standard, controls and measures in place such as access to premises.

The Supplier shall ensure that any suspected or actual security breaches are reported to the Contracting Authorities representative immediately.

The Supplier shall provide details of their personnel security procedures and upon request by Contracting Authorities, details of all personnel that they intend to use in the delivery of the Services.

### **3.4. Vetting**

The Supplier shall ensure that all their personnel vetting procedures, under the DPS Agreement and individual Contracts entered into under it by Contracting Authorities comply with the British Standard, Security Screening of Individuals Employed in a Security Environment – BS 7858:2012 or agreed equivalent, unless otherwise specified by the Contracting Authorities at the Competition stage.

### **3.5. Intellectual Property**

The Supplier shall in relation to IPR comply with the Escrow terms as set out in Clause 34.10 of DPS Schedule 4 – Contract Order Form and Contract Terms

### **3.6. Order and Delivery**

The Supplier shall provide an effective ordering facility to enable Contracting Authorities to submit orders for Goods and/or Services.

The Supplier shall provide a physical delivery service to Contracting Authorities for any Goods and/or Services ordered by Contracting Authorities.

### **3.7. Maintenance and Costs**

The Supplier shall provide support and maintenance services for all products purchased by Contracting Authorities via a Competition for a minimum of thirty six (36) months from the date of the original sale.

The Supplier shall ensure all support and maintenance charges are to include updates for changes to the taxation regime applied by HMRC, changes to law by legislators and changes in regulation by regulatory bodies.

The Supplier shall provide all quotations in a manner that enables Contracting Authorities to understand Whole Life Costs and clearly demonstrates to Contracting Authorities the different costs associated with their procurement. Such costs may include, but shall not be limited to hardware, software, services, on-going support and maintenance and any other costs and any limitations or assumptions that have been made in arriving at the proposed pricing such as anticipated number of days.

### **3.8. Training**

The Supplier shall be required to deliver focussed training where applicable, upon request by Contracting Authorities with suitable User Groups.

The Supplier shall be required to deliver focussed training where applicable at the Suppliers site or at a premises specified by Contracting Authorities.

### **3.9. Sustainability**

The Supplier shall, where requested by Contracting Authorities, work with the Contracting Authorities to identify opportunities to introduce innovation, reduce cost and waste and ensure sustainable development is at the heart of their operations.

The Supplier shall ensure that they consider the relevance of sustainability at all lifecycle stages of the Services provided under this DPS Agreement. This includes consideration of commercial needs, minimisation of negative impacts and the maximisation of positive impacts on society and the environment.

The Supplier shall comply with each of the following Government standards (hyperlinked) for the duration of this DPS Agreement: [Sustainable Development](#)

### **3.10. Environmental**

The Supplier shall ensure that all Electric and Electronic Equipment (EEE) provided in association with the delivery of the goods and/or services, is compliant with Restriction of Hazardous Substances (RoHs), Regulations and WEEE Regulations, where appropriate, including Producer Compliance Scheme registration. Full details can be accessed via the following links:

<https://www.gov.uk/guidance/rohs-compliance-and-guidance>

<http://www.hse.gov.uk/waste/waste-electrical.htm>

The Supplier shall, where applicable, effectively manage the Services supplied under this DPS Agreement, in order to minimise any impact on the environment.

The Supplier shall, where applicable, work proactively with Contracting Authorities in relation to the provision of Services, which includes but is not limited to, the following areas:

- noise reduction;
- removal of unwanted consumables;
- heat production reduction in confined spaces.

The Supplier shall be responsible, where applicable, for the collection and disposal of all packaging, materials and redundant or replacement spare parts in accordance with WEEE Regulations which can be accessed via the following link:

<http://www.legislation.gov.uk/ukxi/2013/3113/contents/made>

The Supplier shall, where applicable, take steps to encourage the reuse of any WEEE generated in the delivery of Services as promoted by the WEEE Directive.

The Supplier shall demonstrate their full re-use or recycling streams upon request from Contracting Authorities.

### **3.11. Social Value**

The Supplier shall identify [Social Value](#) options which are appropriate to Contracting Authorities at Contract award stage. Any Social Value options selected by Contracting Authorities at the point of Contract award, shall be in accordance with the Government's Social Values which are current at that point in time.

The Supplier shall complete annual Corporate Social Responsibility (CSR) assessments upon request from Contracting Authorities.

For more information on Social Value please see the following link

<https://www.gov.uk/government/publications/social-value-act-introductory-guide>

### **3.12. Marketing and Communication**

The Supplier shall pro-actively work with the Authority to establish and manage a Marketing and Communications Plan. This plan will detail all marketing activities including, but not limited to, producing case studies, running or attending events, direct mail campaigns, and Social Media campaigns.

The Supplier shall ensure that any documents produced as a result of the Framework award (e.g. catalogues) can be provided in a variety of formats upon request by the Authority and Contracting Authorities, to ensure they are accessible to all. This requirement shall include, but not limited to, large print or a bi-lingual format.

The Supplier shall ensure that the emphasis of any marketing effort relating to the DPS Agreement must focus on savings and benefits to be achieved through the DPS Agreement via, cost savings and/or operational efficiencies, for example, rather than benefits of the Supplier's own goods and services as an end in themselves.

The Supplier shall produce case studies of Contracting Authorities who have contracted through the DPS Agreement to highlight the savings and benefits achieved. The Supplier shall gain approval from Contracting Authorities prior to any release or publication.

The Supplier shall highlight Social Value, sustainability and environmental advantages and issues as part of any marketing material and specifically wherever it promotes awareness of and improvement in any of these areas.

The Supplier shall ensure that all marketing materials and communications which make reference to the DPS Agreement, including case studies, are approved by the Authority prior to any release or publication.

## ANNEX A – Glossary

Term	Definition
Competition	Also known as a mini-competition or a mini-tender, this is a competed procurement exercise between the awarded Suppliers on a DPS. An individual Contracting Authorities requirements are sent to the registered suppliers who are then invited to submit a specific tender to fulfil these requirements. This helps to ensure that Contracting Authorities are able to thoroughly test the market to ensure the best quality of products or services are received at the most competitive rate.
Contract Notice	means the Contract Notice published within the OJEU
Contracting Authorities	Means the bodies listed in the OJEU Notice;
Customer	means the Authority and/or any other Contracting Bodies (within the meaning of the Regulations) described in the OJEU Contract Notice;
Digital Service Standard	a set of criteria to help government create and run good digital services. The standard is detailed here <a href="https://www.gov.uk/service-manual/service-standard">https://www.gov.uk/service-manual/service-standard</a>
Disruptive Innovation	creates a new market and value network and eventually disrupts an existing market and value network, displacing established market-leading firms, products, and alliances.
Dynamic Purchasing System (DPS)	A DPS is a public sector sourcing tool for common goods and services under regulation 34 (Dynamic Purchasing Systems) of the <a href="#">PCR 2015</a> .
Escrow	An escrow agreement defines the arrangement by which one party (sometimes called the depositor) deposits an asset with a third person (called an escrow agent), who, in turn, makes a delivery to another party (the beneficiary) if and when the specified conditions of the contract are met
Innovation	means a new technology / way of working as described with Schedule 2 of the DPS contract
Radical Innovation	is when a new product, service, process or strategy is introduced to a market, but is designed to make a significant impact by completely replacing existing technologies and methods.
Social Value	means wider social, economic and environmental benefits that can be secured through the delivery of contract and defined with The Public Services (Social Value) Act which came into force on 31 January 2013.
Supplier	means Bidder who is successful in their tender for RM6094 (the DPS)

Whole Life Costs	means the total cost of an asset over its whole life. Taking account of the initial capital cost, as well as operational, maintenance, repair, upgrade and eventual disposal costs.
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