CREODIAS

Data type	Available (Yes/No)	Completeness of the archive per catalogue	Data Description/Specifications
Sentinel	yes	We provide collections of Sentinels data, locally and immediately available on the CREODIAS platform - currently over 10 PByte (as of Dec.2018) and still growing! Sentinel 1 (3/10/2014 - present, Sensor C-SAR, Spatial Coverage 180W, 180E, 90S, 90N (For details, see: https://sentinel.esa.int/web/sentinel/missions/sentinel-1/satellite-description/geographical-coverage) Sentinel 2 (23/07/2015 - present), Sensor MSI, Spatial Coverage 180W, 180E, 90S, 90N Sentinel 3 (24/05/2016 - present), Sensor OLCI, SLSTR, SRAL, Spatial Coverage 180W, 180E, 90S, 90N Sentinel 5P (13/10/2018 - present), Sensor TROPOMI, Spatial Coverage 180W, 180E, 90S, 90N	Link: https://discovery.creodias.eu/dataset . Additional data sets can be ordered to 1 PB cache throught the features for data ordering & processing (inside Finder and Finder API). This features is available after completing the registration on the CREODIAS portal.
HR/VHR	yes	Sentinel-2 (23/07/2015 - present)	We are under the implementation of VHR based on commercial sources. The VHR data will be available for order over GUI interface or the API. All downloaded data will be stored and accessible only for the customer who has ordered the data as private data.
Other EO data (please specify in the description)	yes	Landsat-5 (Sensor TM, Spatial Coverage: 180W, 180E, 90S, 90N, Covers all the Landsat 5 Thematic Mapper L1T dataset over Kiruna visibility mask), Landsat-7 (Sensor TM, Spatial Coverage: 180W, 180E, 90S, 90N), Landsat-8 (Sensor: OLI, TIRS, Spatial Coverage: 180W, 180E, 90S, 90N, Covers Kiruna and Matera visibility masks, see: https://earth.esa.int/web/sppa/mission-performance/esa-3rd-party-missions/landsat-8/oli-tirs/products-availability/level1) , Jason-3 (Sensor Altimeter, Spatial Coverage: 180W, 180E, 90S, 90N), Envisat (Sensor Meris, Spatial Coverage: 180W, 180E, 90S, 90N)	
Non-EO Data (please specify in the description)	yes	Mapzen Terrain Tiles (Digital Elevation Model, Zoom 0 - 12), SRTMGL1 (Digital Elevation Model)	On customer's demand non EO-data can be added to the local repository, if the data source policy allows to download, store and share data over DIAS
Other types of data (please specify in the description)	yes		It is possible to order data that we can place on the platform (example in-situ data). CREODIAS services are ready to add other types of data - indexing, search, discover and easy download for the customers
Copernicus core data available _locally_	yes	CAMS (Copernicus Atmosphere Monitoring Service), CMEMS (Copernicus Marine Environment Monitoring Service), CLMS (Copernicus Land Monitoring Service), CEMS (Copernicus Emergency Management Service)	C3S (Copernicus Climate Change Service) not available yet
Access interfaces to the data	yes	Data search interfaces: OpenSearch, OData, SPARQL Data access interfaces: - S3 - data are accessible over http request to a standard S3 object interface, - OGC WMS/WMTS/WCS interface - facilitates the access to EO data and simplifies the integration (e.g. with GIS), NFS - repository contents available directly through a POSIX filesystem interface. - Downloader compressed products via EO Finder to external environment (search and discover via Finder GUI or API). GUI - graphical user interface for search, discovery, preview and download EO data in EO Finder (https://finder.creodias.eu/www/) and EO Browser tools (https://browser.creodias.eu/).	

Services	Available (Yes/No)	Which ones?	Comments
DIAS commercial services	yes	Full Infrastructure as a Service (IaaS) offer available for EO data and non-EO data processing: Virtual Machines (VMs) with full root access: https://creodias.eu/processing Dedicated servers Virtual Machine - server fully dedicated for one VM with common management interface (Horizon) : https://creodias.eu/processing Dedicated Servers (bare metals) https://creodias.eu/servers Storage services https://creodias.eu/storage - distributed, redundant, highly available storage cluster with separate HDD and SSD tiers. The SSD tier provides high performance both in terms of transfer bandwidth and IOPS. The HDD tier provides cost-effective high capacity, scalable magnetic storage. In the IaaS platform we provide additional services like virtual appliances Firewalls (FWaaS) and VPN concentrators (VPNaaS), physical servers (bare metal) that can be integrated to the virtual world. GPU based processing - dedicated compute configuration with gpu for complex, intensive calculation Multi-tenant and multi-role cloud environment provide full security of Tenant data, application and environment (https://creodias.eu/general-information). Possible installation and management of private cloud with EO data in client's premises or data center in EU.	Cloud computing (IaaS) platform is based on OpenStack (opensource technology). Storage platform is based on CEPH with user friendly interface for self-manage services. Possibility of outsourcing experts placement on customer site premises
Backend services for developers	yes	All our services are accessible via REST API from virtual customer environments. Language bindings are provided for bash, Python, Java, C and other languages. The range of services includes: - OpenStack endpoints for compute (Nova), storage (Cinder), networking (Neutron), orchestration (Heat) and user management (Keystone), - Data-search services - OpenSearch/OData (based on RESTO) allows for querying the whole product database, SPARQL for Inspire-compliant semantic search - Data access services - data access over S3 object interface, NFS file mount, Sentinel Hub OGC WMS/WMTS/WCS, remote download of compressed files over HTTP - Container (Docker) support for building application using microservices, Kubernetes support for container orchestration	Possibility of customer's applications installation on CREODIAS platform with full root access to the system.
EO Processing Tools	yes	Dedicated VM images with EO processing tools included, SNAP (s1tbox, s2tbox, sen2cor, gpt), OSGeo ready-to-use operating system images, e.g. including QGIS, FWTools, Mapserver, Python with GDAL , Mapnik, Geoserver (https://www.osgeo.org), Batch Processing System	
EO applications	yes	EO Finder (advanced tool for EO data searching, downloading and product ordering over GUI or API), EO Browser (GUI interface for EO data view, statistical analysis and visualisation), Sentinel-hub (OGS/WMS/WMTS compliant) https://creodias.eu/data-related-services, The SPARQL interface	Please find links to CREODIAS tools: https://browser.creodias.eu, https://finder.creodias.eu/www/, https://sentinel-hub.com
Professional services	yes	Project Management, Custom Development, EO Data Experts, Cloud Computing Experts, Support for migration from other computing platforms like AWS, Azure, other DIAS	Full support for customers (sales, pre-sales, operational, development stage) with dedicated Project Manager, Development Support, EO Data Experts
Managed services	yes	Data Hosting - storing the customer data over different interfaces and granting the customer data access only to selected users or public access	
Other services	yes	3rd applications/services based on CREODIAS platform. Data cube services and tools based on Jupyter notebook for non advance users to play easily with EO data, share the results, code, know-how with CREODIAS community.	

Support	Available (Yes/No)	Comments	
Manuals	yes	Online Manuals & Knowledge base link: https://creodias.eu/knowledgebase	
Tutorials	yes	Basic tutorials link: https://creodias.eu/knowledgebase (FAQ, Forum and Blog)	
Support	yes	24/7/365 Support with professional staff (English & Polish language support) on board for maintenance of the whole system (processing, storage, data collection, setup, configuration), guiding in the use of our services, developing improvements and delivering new features in short time. Dedicated customer portal with service monitoring, billing and full history of communication archive	We are certified and compliant with ISO 9001 and 27001. We are also compliant with ESA policy rules and requirements. CREODIAS provide full, dedicated support team&resources for the customers in case of migration from other platforms like AWS, Azure or other DIAS.

Type of Cloud offer	Available (Yes/No)	Comments	
Pay-per-use	yes		Simple billing models: payments for number of VM/bare metals/storage instances. Access to EO data from CREODIAS platform is free of charge. Discounts are depending on the service contract length, size of computing environment. We can propose individual discounts as well. We offer a special discount of 18,5% for scientific institutions. The Free Trial 150 EUR is available for testing. Simple billing models: payments for number of VM/bare metals/storage instances.
Package offer	yes	We offer pay-per-use and fixed term pricing billing models (https://creodias.eu/billing-modes). We provide discount for long term contracts and big value orders. We grant special discount for scientific institutions. The whole description and price list is available on: https://creodias.eu/price-list	