

Maturity Dimension		Dimension Sub-Criteria	
Name	Definition	Label	Definition
Metadata	The identification of the minimal set of metadata to describe the catalogue and its semantic artefacts. Huge importance is also given to the use of metadata standards and schemas (e. g., DCAT or Schema.org), the adoption of machine-readable formats, the documentation associated, and the licenses used to release the metadata.	custom vocabulary	custom metadata is used to describe semantic artefacts
		standard vocabulary	a well-known, widely shared or standard metadata vocabulary is used
		primary metadata	metadata for each distribution/version of semantic artefact is available
		version metadata	metadata for each distribution/version of semantic artefact is available
		human readable	metadata is visible in the user interface in an harmonised manner
		machine readable	metadata is accessible via API or machine supported formats
Openness	The concept of being open from different perspectives. On the one hand, it concerns technical openness, referring to the metadata handled in the catalogue, the software used to run the catalogue, and the services and protocols used to access the metadata. On the other hand, openness also refers to the social attitude of enabling anyone interested in depositing and also helping govern the catalogue.	fully oss	based on open source software
		customised oss	the catalog is based on an open source software but the customised instance is not available for public
		open model	the metadata model / ontology used to document the semantic artefacts is openly available
		open contribution	external or registered users can add/propose new semantic artefacts for inclusion
Quality	The possibility of having mechanisms to check the quality of the metadata provided and, thus, of the catalogue itself. In particular, if processes and workflow are in place for peer reviewing new entities and curating the catalogue.	curation by owner	changes (or new submissions) to the semantic artefact can only be conducted by the catalog owner
		curation by maintainer	changes (or new submissions) to the semantic artefact can be made by the maintainers/curators of the artefact
		certified maintainer	the maintainers/curators of the semantic artefacts are certified and assigned by the catalogue owner
		metadata by editor	metadata is curated by a group of editors
		metadata by system	metadata is generated/curated by an assessment system

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Availability	It refers to the availability of the metadata and if there are methods in place for guaranteeing privacy and access only to certain data due to legal or other contextual issues.	no restriction	no authentication methods provided; contents are freely available without restrictions
		multilinguality	items are translated and available in several languages
		moderated services	some functionalities for access and modification of semantic artefact are available only to registered users and content creators
Statistics	The availability of statistics referred to the catalogue (number of semantic artefacts handled, number of users, etc.) in time to measure the usage of the catalogue and its growth.	catalog statistics	basic metrics about the metadata catalog
		resource statistics	metrics on each semantic artefact
		social metrics	social metrics for semantic artefacts, e.g., stars, likes, and number of contributors
PID	The use of persistent identifiers (PIDs) referring to the metadata of the various semantic artefacts described in the catalogue and their contextual entities (author, curator, etc.).	metadata record PID	PID metadata might be specified in the semantic artefact record (e.g. ORCIDs for curators)
		resource PID	PID used to identify the semantic artefact object
Governance	The rules to define the governance of the catalogue and its goals and purpose, which should allow community input and responsibility for the integrity of the metadata.	3rd party	items are managed via 3rd party tool, e.g. GitHub
		description	governance is described as part of the catalog
		rules	rules for proposing new items to the catalogue are introduced
Community	The mechanism in place to involve the community in the catalogue, identifying and reaching target users' expectations and attracting stakeholders from diverse lived experiences and viewpoints.	read only	no direct involvement is possible; users can only communicate to the catalog via read-only API and email
		read and write	curators and developers can use services to get information from the catalogue and be directly involved through the creation of their own records to be added to the catalogue and increase their visibility
		3rd party	community features delegated to 3rd party tool, e.g. GitHub issues
		suggestion	a dedicated page for content suggestion is available

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Sustainability	The models in place to sustain services financially and preserve the catalogue in the long run.	organization	the catalog is a service provided by an organization (university, institute or one of its research units)
		community	the catalogue is maintained by a community with members from various organizations or infrastructure
		management board	a multidisciplinary community-driven service, strongly sustained by an operational team
		(research) projects	sustained by funds coming from one or more projects
Technology	The tools that the catalogue should provide to enable users to have a better experience in exploring the data, such as REST APIs, Web search interfaces, SPARQL endpoints, etc.	REST API	a service to access semantic artefact information and/or metadata via a REST interface
		web search GUI	a service to access semantic artefact information and/or metadata via a web search GUI
		SPARQL endpoint	a service to access semantic artefact information and/or metadata via a SPARQL endpoint
		alignment	a service to align heterogeneous metadata that might be used within a catalogue
Transparency	The processes behind the catalogue, from the elections of new members of the various governing boards, curators, etc., to the clarity in exposing fees for the services offered by the catalogue itself and its revenue model.	documented curation	data flow of curation is documented
		automatic curation	curation process happened automatically based on a documented process flow
		resource versioning	records on previous version of items are available
Assessment	The presence of some practice in place for assessing the catalogue against all these dimensions, e.g. by adopting self-assessment exercises and/or by asking third parties to run an independent assessment of the catalogue.	shared metrics	assessment in terms of FAIRness is provided through FAIR Scores
		custom metrics	assessment against catalog own assessment metrics