| | A | B | C | D | E |
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| 1 | **Funder wanting to know which training resources have been created by a specific project (US 8)** | | | | |
| 2 | | | | | |
| 3 | **Generic Term** | **Description** | **Metadata req** | **Useful for Extended Doc** | **Comment / Notes** |
| 4 | title | The name of the resource. | Y | Y | |
| 5 | abstract | A brief overview of the item (container) | Recmnd | Y | |
| 6 | abstract_data | A brief synopsis about or description of the learning resource. | Recmnd | Y | |
| 7 | access_cost | Choice stating whether or not there is a fee for use of the resource (Boolean). | Recmnd | Y | |
| 8 | author(s) | List of full name of the author(s) | Y | Y | |
| 9 | author.familyName | Last or family name of person(s) authoring the resource. | Y | Y | |
| 10 | author.givenName | First or given name of person(s) authoring the  resource | Y | Y | |
| 11 | author_org | Name of organization authoring the resource. | Y | Y | |
| 12 | contributor(s) | List of full name of secondary person(s) contributing to the resource. | Y | Y | |
| 13 | contributor_orgs.name | Name of contributing organization(s) | Y | Y | Assuming a funder would want to check which project partners have contributed. Can contribution.entity be used for funder (and fundref id)? Could be way to include funder name, etc. as way of documenting their contribution. |
| 14 | contributor_orgs.type | Type of contribution made by the organization | Y | Y | |
| 15 | contributors.familyName | Family or last name of the contributor. | Y | Y | |
| 16 | contributors.givenName | Given or first name of contributor(s) | Y | Y | |
| 17 | name_identifier | The unique identifier for individual or organization referenced. | Recmnd | Y | |
| 18 | name_type | The name of the identifier scheme. | Recmnd | Y | |
| 19 | contributors.type | Type of contribution made by a person or organization. | Recmnd | Y | |
| 20 | contribution_date | Date of the contribution to the resource | N | N | |
| 21 | contribution_entity | Identification of and information about entities (i.e., people, organizations) contributing to the resource | N | N | |
| 22 | language_primary | Language in which the resource was orginally published or made available. | Y | Y | |
| 23 | languages_secondary | Additional languages in which the resource is available, if any. | Recmnd | Y | |
| 24 | keywords | Keywords or tags used to describe the resource. | Y | Y | |
| 25 | license | A license document that applies to this content, typically indicated by URL. | Y | Y | Very important |
| 26 | lr_type | The predominant type or kind that characterizes the learning resource. | Y | Y | |
| 27 | target_audience | Principle users(s) for which the resource was designed. | Recmnd | Y | |
| 28 | subject | Subject domain toward which the resource is targeted. | Recmnd | Recmnd | |
| 29 | skill_level | Target skill level in the topic being taught;  example values include:  beginner, intermediate, advanced. | Recmnd | Y | |
| 30 | typical_age_range | The typical range of ages for the content's intended end user. | N | N | |

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| 31 | difficulty | How hard it is to work with or through the resource for the typical intended target audience (very easy, easy, medium, difficult, very difficult, knowledge-dependent) | Recmnd | N | |
| 32 | published | Date of publication / broadcast. | Y | Y | |
| 33 | modification_date | Date at which the educational resource was most recently published or broadcast. | Y | Y | |
| 34 | version | The specific version of the resource, if declared. | Y | Y | |
| 35 | publisher | The organization credited with publishing or broadcasting the resource (does not include the repository where resource is stored). | Y | Y | |
| 36 | url | URL that resolves to the learning resource or to a "landing page" for the resource that contains important contextual information including the direct resolvable link to the resource, if applicable. | Y | Y | |
| 37 | usage_info | Text describing information about using the resource, not addressed by the license URL. | Y | Y | |
| 38 | usage_restrictions | Yes / No response to whether copyright or other restrictions apply to the use of the resource | Recmnd | Recmnd | |
| 39 | use_rights_url | The URL where the owner specifies permissions for using the resource | Y | Y | |
| 40 | learning_outcome | Descriptions of what knowledge, skills or abilities students should acquire on completion of the resource. | Recmnd | Y | |
| 41 | citation | Preferred form of citation | Recmnd | Recmnd | |
| 42 | locator.data | From DC "An unambiguous reference to the resources within a given context." Use a string that conforms to an ID system. See how FAIRsFAIR deals with this… | Recmnd | Recmnd | |
| 43 | locator.type | Controlled vocabulary designating the persistent identifier schemes used for the resource, e.g., DOI, ARK, Handle. | Recmnd | Recmnd | |
| 44 | completion_time | Approximate or typical time it takes to work with or through the resource for the typical, intended target audience. | N | Recmnd | |
| 45 | completion_status | Completion status or condition of the resource (draft, final, revised, unavailable) | Recmnd | Recmnd | |
| 46 | interactivity_level | Degree of interactivity characterizing the resource; refers to the degree to which the learner can influence the aspect of behavior of resource (e.g., very low, low, medium, high, very high). | N | Recmnd | |

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| 47 | interactivity_type | The predominant mode of learning supported by the learning resource (i.e., active, expositive, or mixed) | N | Recmnd | |
| 48 | credential_status | Type of credentialing offered for the resource, if any. | Recmnd | Recmnd | |
| 49 | contact | Name of person who has been asserted as the contact(s) for the resource in case of questions or follow-up by resource user. | Recmnd | Recmnd | |
| 50 | email | Email address of person or organization that has been asserted as the contact for the resource. | Recmnd | Recmnd | |
| 51 | org | Name of organization that has been asserted as the contact for the resource  in case of questions or follow-up by resource user. | Recmnd | Recmnd | |
| 52 | media_type |  From schema.org def:  "Media type of resource, typically expressed using a MIME format" from IANA site & MDN reference. | N | Recmnd | |
| 53 | ed_frameworks.name | The name of an framework to which the resource is aligned, if any. | N | Optional | |
| 54 | ed_frameworks.nodes.description | The description of a node in an educational framework | N | Optional | |
| 55 | ed_frameworks.nodes.name | The name of a node in an established educational framework. | N | Optional | |
| 56 | ed_frameworks.nodes.url | The URL of a node in an established educational framework. | N | Optional | |
| 57 | ed_frameworks.url | The URL of an established educational framework | N | Optional | |
| 58 | alignment_type | A category of alignment between the learning resource and the framework node. (See notes for Recmnd values). | N | Y | |
| 59 | hasPart | A sub-Training resource or externally referenced resource | N | Recmnd | |
| 60 | isPartOf | Course in which this resource was/will be used, or the resource in which this resource is a part (e.g., part of a book or slide-set associated with a course). | N | Recmnd | |
| 61 | is_based_on_url | A resource that was used in the creation of this resource (repeatable) | N | Recmnd | |
| 62 | resource_size | Size of the resource in bytes (uncompressed) | N | Recmnd | |
| 63 | accessibility_control | Indicates input methods that are sufficient to fully control the described resource (CV list of values at https://www.w3.org/wiki/WebSchemas/Accessibility | N | Optional | |
| 64 | accessibility_features | Content features of the resource, such as accessible media, alternatives and supported enhancements for accessibility (WebSchemas wiki lists possible values). Only 4 values of the entire list were available in the drupal production system; others are to be added to the CV for this field as called for. | N | Optional | |
| 65 | accessibility_hazard | A characteristic of the described resource that is physiologically dangerous to some users.  (CV list of values at:  https://www.w3.org/wiki/WebSchemas/Accessibility) | N | Optional | |

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| 66 | accessibility_summary | Human readable summary of accessibility features and deficiencies | N | Optional | |
| 67 | accessibilty_api | Indicates that the resource is compatible with the referenced accessibility API (CV list of values at https://www.w3.org/wiki/WebSchemas/Accessibility) | N | Optional | |
| 68 | date_created | The date on which the resource was created. | Y | Recmnd | |
| 69 | country_of_origin | Code for country from which resource was generated; | N | Optional | |
| 70 | coverage | Time, culture, geography or region to which this learning object applies.  The extent or scope of its content.  Coverage will typically include spatial location (a place name or geographic coordinates), temporal period (a period label, date, or date range) or jurisdiction (such as a named administratie entity). | N | Optional | |
| 71 | mentions | Data-sets, tools, technologies, entities, other training materials in the series, etc., to which the resource makes reference. ** | N | Optional | |
| 72 | context | Principal environment within which the learning & use of the resource is intended to take place, e.g., school, higher education, etc. | N | Optional | |
| 73 | purpose | The purpose of the work in the context of education. | N | N | |
| 74 | uses | Data-sets, tools, technolgies, entites, etc. that are actively utilised in this resource. | N | Optional | |
| 75 | rating | Placeholder for comments given by users assessing the educational resource after use. | N | Optional | |
| 76 | ratings | If applicable, placeholder for overall ratings for the educational resource, based on a collection of reviews or ratings. | N | Optional | |
| 77 | semantic_density | Degree of conciseness;  may be estimated in terms of its size, span or duration | N | Optional | Related to interactivity level.  May be difficult to discern. |
| 78 | **System MD fields below:** | | | | |
| 79 | id | System identifier for the MD record. | Y | Y | System field |
| 80 | md_record_id | Globally unique, persistent ID for the metadata record within the system for the resource being described. | Y | Y | Necessary for FAIR;  should be in the form of a resolvable ID, e.g., DOI, Handle, ARK, LSID, etc. |
| 81 | submitter_email | Person submitting the resource into the DMTC queue for publication. | N.A. | N.A. | Not necessary for discovery; useful for admin/system |
| 82 | submitter_name | Email address of person submitting the resource into the DMTC queue for publication. | N.A. | N.A. | Not necessary for discovery; useful for admin/system |
| 83 | created | The date on which the metadata record was created. | N.A. | N.A. | System field |
| 84 | creator | The login name of the person creating the MD record. | N.A. | N.A. | System field |

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| 85 | featured_event | Course instance or event where this training resource was or will be featured. (inverse of workFeatured) | N.A. | N.A. | Events out of scope. |
| 86 | | | | | |
| 87 | | | | | |
| 88 | resource_id_label | A globally unique label that identifies the learning object. | ? | ? | Used by ENVRI LOM:  identifier (General 1.1) |
| 89 | resource_id_scheme | Name or designator of the identification or cataloging scheme for the globally unique label (resource ID) | ? | ? | Used by ENVRI LOM:  catalog (General 1.2) |
| 90 | resource_id_value | Value of the identifier within the identification or cataloging scheme that designates or identifies the learning object.  Should be a namespace specific string. | ? | ? | Used by ENVRI LOM:  entry (General 1.3) |
| 91 | | | | | |
| 92 | REFERENCES | | | | |
| 93 | * Taken from https://zenodo.org/record/3903341(ENVRI LOM profile) | | | | |
| 94 | ** Taken from https://bioschemas.org/profiles/TrainingMaterial/0.7-DRAFT-2019_11_08/ | | | | |
| 95 | | | | | |
| 96 | | | | | |