Deliverable D1.3
Second Draft Data Management Plan

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Executive Summary

This Data Management Plan (DMP) provides an analysis of the main elements of the data management policy that will be used by the project with regard to all the datasets that will be generated by the project. The DMP is not a fixed document, but will evolve during the lifespan of the project.
Background

The purpose of this Data Management Plan (DMP) is to provide an analysis of the main elements of the data management policy that will be used by the project with regard to all the datasets that will be generated by the project.

The DMP is not a fixed document, but will evolve during the lifespan of the project.

The DMP will address the points below on a dataset by dataset basis and should reflect the current status of reflection within the consortium about the data that will be produced.

The approach to the DMP follows that outlined in the "Guidelines on Data Management in Horizon 2020" (Version 2.1, 15 February 2016).

Data set reference and name: Identifier for the data set to be produced.

Data set description: Description of the data that will be generated or collected, its origin (in case it is collected), nature and scale and to whom it could be useful, and whether it underpins a scientific publication. Information on the existence (or not) of similar data and the possibilities for integration and reuse.

Standards and metadata: Reference to existing suitable standards of the discipline. If these do not exist, an outline on how and what metadata will be created.

Data sharing: Description of how data will be shared, including access procedures, embargo periods (if any), outlines of technical mechanisms for dissemination and necessary software and other tools for enabling re-use, and definition of whether access will be widely open or restricted to specific groups. Identification of the repository where data will be stored, if already existing and identified, indicating in particular the type of repository (institutional, standard repository for the discipline, etc.). In case the dataset cannot be shared, the reasons for this should be mentioned (e.g. ethical, rules of personal data, intellectual property, commercial, privacy-related, security-related).

Archiving and preservation (including storage and backup): Description of the procedures that will be put in place for long-term preservation of the data. Indication of how long the data should be preserved, what is its approximated end volume, what the associated costs are and how these are planned to be covered.
1 Admin Details

**Project Title:** Audio Commons: An Ecosystem for Creative Reuse of Audio Content  
**Project Number:** 688382  
**Funder:** European Commission (Horizon 2020)  
**Lead Institution:** Universitat Pompeu Fabra (UPF)

**Project Coordinator:** Prof Xavier Serra  
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**Project Description:** The democratisation of multimedia content creation has changed the way in which multimedia content is created, shared and (re)used all over the world, yielding significant amounts of user-generated multimedia resources, big part shared under open licenses. At the same time, creative industries need to reduce production costs in order to remain competitive. There is, therefore, an opportunity for creative industries to incorporate such content in their productions, but there is a lack of technologies for easily accessing and incorporating that type content in their creative workflows. In the particular case of sound and music, a huge amount of audio material like sound samples, soundscapes and music pieces, is available and released under Creative Commons licenses, both coming from amateur and professional content creators. We refer to this content as the 'Audio Commons'. However, there exist no practical ways in which Audio Commons can be embedded in the production workflows of the creative industries, and licensing issues are not easily handled across the production chain. As a result, most of this content remains unused in professional environments. The aim of this project is to create an ecosystem of content, technologies and tools to bring the Audio Commons to the creative industries, enabling creation, access, retrieval and reuse of Creative Commons audio content in innovative ways that fit the requirements of the use cases considered (e.g., audiovisual, music and video games production). Furthermore, we tackle rights management challenges derived from the content reuse enabled by the created ecosystem and research about emerging business models that can arise from it. Our project will benefit creative industries by providing new and innovative creativity supporting tools and reducing production costs, and will benefit content creators by offering a channel to expose their works to professional environments and to allow them to (re)licence their content.
2 Dataset Information

Individual Dataset Information

Data set reference and name
DS 2.1.1: Requirements survey

Data set description
Results from survey of creative industry content users in Task 2.1: "Analysis of the requirements from creative industries". This data supports Deliverable D2.1: "Requirements report and use cases", and has over 660 responses.
WP: WP2 / Task: Task 2.1
Responsible: QMUL (& MTG-UPF)

Standards and metadata
Text document (CSV file)

Data sharing
Anonymized form to be made available with DOI.

Archiving and preservation (including storage and backup)
To be uploaded on Zenodo or other suitable research data repository.
Estimated final size (Bytes): 700K
Individual Dataset Information

Data set reference and name
DS 2.2.1: Audio Commons Ontology

Data set description
Definition of Audio Commons Ontology, the formal ontology for the Audio Commons Ecosystem. Data form of D2.2: Draft ontology specification and D2.3: Final ontology specification.
WP: WP2 / Task: Task 2.2
Responsible: QMUL

Standards and metadata
OWL Web Ontology Language

Data sharing
Public

Archiving and preservation (including storage and backup)
Stored on project document server (& github)
Estimated final size (Bytes): 10K
Individual Dataset Information

Data set reference and name
DS 2.3.1: ACE interconnection evaluation results

Data set description
Results of evaluation of technological solutions for the orchestration/interconnection of the different actors in the Audio Commons ecosystem. Supporting data for deliverable D2.5: Service integration technologies.
[Depending on the form of evaluation, this dataset may not be produced]
WP: WP2 / Task: Task 2.3
Responsible: QMUL (& MTG-UPF)

Standards and metadata
Tabular (e.g. CSV)

Data sharing
Public

Archiving and preservation (including storage and backup)
Project document store.
Estimated final size (Bytes): 100K
Individual Dataset Information

Data set reference and name
DS 2.5.1: ACE Service evaluation results

Data set description
Results of continuous assessment of ontologies, API specification and service orchestration through the lifetime of the project, including API usage statistics.
WP: WP2 / Task: Task 2.5
Responsible: QMUL (& MTG-UPF)

Standards and metadata
Tabular (e.g. CSV)

Data sharing
Public

Archiving and preservation (including storage and backup)
Project document store.
Estimated final size (Bytes): 1M
Individual Dataset Information

Data set reference and name
DS 2.6.1: ACE Service

Data set description
Freesound and Jamendo content exposed in the Audio Commons Ecosystem. Not strictly a "dataset", rather a service providing access to data.  
WP: WP2 / Task: Task 2.6  
Responsible: MTG-UPF (& Jamendo)

Standards and metadata
Audio Commons Ontology

Data sharing
Available via ACE service API

Archiving and preservation (including storage and backup)
Dynamic service availability, no plans to provide a "snapshot".  
Estimated final size (Bytes): N/A
Individual Dataset Information

Data set reference and name
DS 3.3.1: Business model workshop notes and interviews

Data set description
Notes/transcripts from workshop and structured interviews in Task 3.3 "Exploration of Business Models in the ACE". This data will support Deliverables D3.4 and D3.5.
WP: WP3 / Task: Task 3.3
Responsible: Surrey-CoDE

Standards and metadata
Text documents

Data sharing
Data collected and stored according to ethics policy and approval. Anonymized text data to be made available as Appendix to Deliverable D3.4: Report on business models emerging from the ACE.

Archiving and preservation (including storage and backup)
Stored on project document server.
Estimated final size (Bytes): 100K
Individual Dataset Information

Data set reference and name
DS 4.2.1: Semantic annotations of musical samples

Data set description
Results of semantically annotating musical properties such as the envelope, the particular note being played in a recording, or the instrument that plays that note. Supporting data for deliverables D4.4, D4.9, D4.10, D4.11
WP: WP4 / Task: Task 4.2
Responsible: MTG-UPF (& QMUL)

Standards and metadata
Annotations will be stored using standard formats such as JSON and YAML, and Semantic Web formats such as RDF/XML and N3, and following the Audio Commons Ontology definition.

Data sharing
Public: Access via Audio Commons API

Archiving and preservation (including storage and backup)
ACE Server. Annotation size estimate: 10kBytes per file x 500k files = 5 GBytes
Estimated final size (Bytes): 5 GBytes
Individual Dataset Information

Data set reference and name
DS 4.3.1: Semantic annotations of musical pieces

Data set description
Results of music piece characterisations such as bpm, tonality or structure. The specific selection of audio properties to include in the semantic annotation will depend on the requirements of the Audio Commons Ontology. Supporting data for deliverables D4.4, D4.9, D4.10, D4.11
WP: WP4 / Task: Task 4.3
Responsible: QMUL (& MTG-UPF)

Standards and metadata
Annotations will be stored using standard formats such as JSON and YAML, and Semantic Web formats such as RDF/XML and N3, and following the Audio Commons Ontology definition.

Data sharing
Public: Access via Audio Commons API

Archiving and preservation (including storage and backup)
ACE Server. Annotation size estimate: 300kBytes per file x 500k files = 150 GBytes
Estimated final size (Bytes): 150 GBytes
Individual Dataset Information

Data set reference and name
DS 4.4.1: Evaluation results of annotations of musical samples

Data set description
Results of evaluation of automatic methods for the semantic annotation of music samples. Results may include human evaluations via listening tests, if required. Supporting data for deliverables D4.4, D4.10
WP: WP4 / Task: Task 4.4
Responsible: MTG-UPF (& QMUL)

Standards and metadata
IPython notebooks and/or Tabular (e.g. CSV)

Data sharing
Statistical analysis: Public. Listening tests: Data collected and stored according to ethics policy and approval; anonymized result data publicly available.

Archiving and preservation (including storage and backup)
Project document server. Personally identifiable data password-protected or stored securely on paper.
Estimated final size (Bytes): 100K
Individual Dataset Information

Data set reference and name
DS 4.5.1: Evaluation results of annotations of musical pieces

Data set description
Results of evaluation of automatic methods for the semantic annotation of music pieces. Results may include human evaluations via listening tests, if required. Supporting data for deliverables D4.5, D4.11
WP: WP4 / Task: Task 4.5
Responsible: QMUL (& MTG-UPF)

Standards and metadata
Tabular (e.g. CSV)

Data sharing
Statistical analysis: Public. Listening tests: Data collected and stored according to ethics policy and approval; anonymized result data publicly available.

Archiving and preservation (including storage and backup)
Project document server. Personally identifiable data password-protected or stored securely offline (e.g. paper in locked filing cabinet).
Estimated final size (Bytes): 100K
Individual Dataset Information

Data set reference and name
DS 4.6.1: Evaluation results of musical annotation interface

Data set description
Results of evaluation of interface for manually annotating musical content, in terms of its usability and its expressive power for annotating music samples and music pieces. The evaluation will be carried out with real users and in combination with the evaluation of Task 5.4. Supporting data for deliverable D4.9
WP: WP4 / Task: Task 4.6
Responsible: MTG-UPF

Standards and metadata
Free text and Tabular (e.g. CSV)

Data sharing
Usability data collected and stored according to ethics policy and approval; anonymized result data publicly available.

Archiving and preservation (including storage and backup)
Project document server. Personally identifiable data password-protected or stored securely offline (e.g. paper in locked filing cabinet).
Estimated final size (Bytes): 100K
Individual Dataset Information

Data set reference and name
DS 4.7.1: Outputs of integrated annotation technology: Musical content

Data set description
Annotations of Freesound and Jamendo content. Success in Task 4.7 will result in at least 70% of Freesound (musical content) and Jamendo content annotated with Audio Commons metadata as defined in the Audio Commons Ontology. This will incorporate datasets DS 4.2.1 and DS 4.3.1.
WP: WP4 / Task: Task 4.7
Responsible: MTG-UPF & Jamendo

Standards and metadata
Annotations will be stored using standard formats such as JSON and YAML, and Semantic Web formats such as RDF/XML and N3, and following the Audio Commons Ontology definition.

Data sharing
Available via ACE service API

Archiving and preservation (including storage and backup)
ACE Server
Estimated final size (Bytes): 150 GBytes
Individual Dataset Information

Data set reference and name
DS 5.1.1: Timbral Hierarchy Dataset

Data set description
Data relate to Deliverable D5.1 which: (i) generated a hierarchy of terms describing the timbral attributes of audio; (ii) determined the search frequency for each of these terms on the www.freesound.org audio database.
WP: WP5 / Task: Task 5.1
Responsible: Surrey-IoSR (& MTG-UPF)

Standards and metadata
Data comprises excel and csv files, Python code, figures and documentation.

Data sharing
Public. DOI:10.5281/zenodo.167392

Archiving and preservation (including storage and backup)
Project document server, Zenodo.
Estimated final size (Bytes): 6.5M
Individual Dataset Information

Data set reference and name
DS 5.2.1: Timbral listening tests

Data set description
Audio files, test interfaces, and results of listening experiments on timbre perception, carried out to inform the specification of required enhancements to existing metrics, and of modelling approaches for significant timbral attributes not covered by the prototype system.
WP: WP5 / Task: Task 5.2
Responsible: Surrey-IoSR

Standards and metadata
Various (Datasets include multiple audio files as well as test interfaces, and other ancillary files)

Data sharing
Data collected and stored anonymously according to ethics policy and approval.
To be made publicly available.

Archiving and preservation (including storage and backup)
Initially: Institute of Sound Recording (IoSR).
Project document server.
Estimated final size (Bytes): 1.3GB
Individual Dataset Information

Data set reference and name
DS 5.3.1: Evaluation results of automatic annotation of non-musical content

Data set description
Audio files, test interfaces, and results of evaluation of automatic methods for the semantic annotation of non-musical content, including listening tests where appropriate. Annotations will be evaluated against the timbral descriptor hierarchy defined in Task 5.1. Supporting data for Deliverables D5.3, D5.7
WP: WP5 / Task: Task 5.3
Responsible: Surrey-CVSSP (& Surrey-IoSR)

Standards and metadata
Various (Datasets include multiple audio files as well as test interfaces, and other ancillary files)

Data sharing
Data collected and stored anonymously according to ethics policy and approval.
To be made publicly available.

Archiving and preservation (including storage and backup)
Project document server.
Estimated final size (Bytes): 30MB
Individual Dataset Information

Data set reference and name
DS 5.4.1: Evaluation results of non-musical annotation interface

Data set description
Results of evaluation of interface for manually annotating non-musical content, in terms of its usability and its expressive power for annotating. The evaluation will be carried out with real users and in combination with the evaluation of Task 4.6. Supporting data for deliverable D5.5.
WP: WP5 / Task: Task 5.4
Responsible: MTG-UPF

Standards and metadata
Tabular (e.g. CSV)

Data sharing
Usability data collected and stored according to ethics policy and approval; anonymized result data publicly available.

Archiving and preservation (including storage and backup)
Project document server. Personally identifiable data password-protected or stored securely offline (e.g. paper in locked filing cabinet).
Estimated final size (Bytes): 100K
Individual Dataset Information

Data set reference and name
DS 5.5.1: Outputs of integrated annotation technology: Musical content

Data set description
Annotations of Freesound and Jamendo content. Success in Task 5.5 will result in at least 70% of Freesound (non-musical) content annotated with Audio Commons metadata as defined in the Audio Commons Ontology. This will incorporate datasets DS 4.2.1 and DS 4.3.1.
WP: WP5 / Task: Task 5.5
Responsible: MTG-UPF

Standards and metadata
Annotations will be stored using standard formats such as JSON and YAML, and Semantic Web formats such as RDF/XML and N3, and following the Audio Commons Ontology definition.

Data sharing
Available via ACE service API

Archiving and preservation (including storage and backup)
ACE Server. Annotation size estimate: 100kBytes per file x 200k files = 20 GBytes
Estimated final size (Bytes): 20 GBytes
Individual Dataset Information

Data set reference and name
DS 6.4.1: Evaluation results of ACE for Creativity Support

Data set description
Results of holistic evaluation of the ACE in the context of Creativity Support. This will include the results of novel methods to assess how the ACE system and tools facilitate creative flow, discovery, innovation and other relevant dimensions of creative work. Supporting data for Deliverables 6.8, 6.12.
WP: WP6 / Task: Task 6.4
Responsible: QMUL (with Industrial Partners)

Standards and metadata
Free text and Tabular (e.g. CSV)

Data sharing
Usability data collected and stored according to ethics policy and approval; anonymized result data publicly available.

Archiving and preservation (including storage and backup)
Project document server. Personally identifiable data password-protected or stored securely offline (e.g. paper in locked filing cabinet).
Estimated final size (Bytes): 100K
Individual Dataset Information

Data set reference and name
DS 6.5.1: Evaluation results of ACE in music production

Data set description
Results of evaluation of ACE in music production, measure the utilities of ACE in typical music production workflows. The results will include usability data from beta testers available from Waves and students of Queen Mary's Media and Arts Technology (MAT) programme. Supporting data for Deliverable 6.4.
WP: WP6 / Task: Task 6.5
Responsible: QMUL (with Waves)

Standards and metadata
Free text and Tabular (e.g. CSV)

Data sharing
Usability data collected and stored according to ethics policy and approval; anonymized result data publicly available.

Archiving and preservation (including storage and backup)
Project document server. Personally identifiable data password-protected or stored securely offline (e.g. paper in locked filing cabinet).
Estimated final size (Bytes): 100K
Individual Dataset Information

Data set reference and name
DS 6.6.1: Evaluation results of search and retrieval interfaces for accessing music pieces

Data set description
Results of evaluation of search and retrieval interfaces for accessing Audio Commons music pieces. The data will support assessment of how ACE supports information seeking activities in creative music production using the web-based interfaces created in Task 6.6. Supporting data for Deliverable D6.5.
WP: WP6 / Task: Task 6.6
Responsible: QMUL (with Jamendo)

Standards and metadata
Free text and Tabular (e.g. CSV)

Data sharing
Usability data collected and stored according to ethics policy and approval; anonymized result data publicly available.

Archiving and preservation (including storage and backup)
Project document server. Personally identifiable data password-protected or stored securely offline (e.g. paper in locked filing cabinet).
Estimated final size (Bytes): 100K
Individual Dataset Information

Data set reference and name
DS 6.7.1: Evaluation results of ACE in sound design and AV production

Data set description
Results of evaluation of ACE in sound design and audiovisual production. The results will include usability data from beta testers available from AudioGaming and students from Surrey’s Film and Video Production Engineering BA (Hons). Supporting data for Deliverable D6.6.
WP: WP6 / Task: Task 6.7
Responsible: QMUL (with AudioGaming)

Standards and metadata
Free text and Tabular (e.g. CSV)

Data sharing
Usability data collected and stored according to ethics policy and approval; anonymized result data publicly available.

Archiving and preservation (including storage and backup)
Project document server. Personally identifiable data password-protected or stored securely offline (e.g. paper in locked filing cabinet).
Estimated final size (Bytes): 100K
Individual Dataset Information

Data set reference and name
DS 7.1.1: Website statistics

Data set description
Website visitor data and alignment with associated project events. Success in Task 7.1 will yield 50 daily unique visitors to the AudioCommons web portal, (excluding bots), increased by at least 50% during time periods influenced by AudioCommons events.
WP: WP7 / Task: Task 7.1
Responsible: MTG-UPF

Standards and metadata
Tabular (e.g. CSV)

Data sharing
During project: Private (maintained on Google Analytics).
At end of project: Public (following removal of any personally identifiable information).

Archiving and preservation (including storage and backup)
During project: Maintained on Google Analytics.
At end of project: Downloaded to web server, backed up on project document server.
Storage estimate: 2k / day x 1300 days = 3 MB
Estimated final size (Bytes): 3 MBytes
Individual Dataset Information

Data set reference and name
DS 7.5.1: List of Key Actors in the creative community

Data set description
A list of Key Actors in the creative community will be built and maintained to facilitate dissemination activities in Task 7.5. This includes personally identifiable information such as contact details and interests, and will be maintained according to data protection policies.
WP: WP7 / Task: Task 7.5
Responsible: MTG-UPF

Standards and metadata
Text document

Data sharing
Project partners only.

Archiving and preservation (including storage and backup)
Stored on project document server, in compliance with data protection policies. Estimated final size (Bytes): 100K