# TECH 3364

# AUDIO DEFINITION MODEL

# METADATA SPECIFICATION

Status: Version 2 (final)

Geneva
June 2018

# Audio Definition Model

| EBU Committee | First Issued | Revised | Re-issued |
|---|---|---|---|
| TC | 2014 | | June 2018 |

**Keywords:** BWF, BW64, Audio Definition Model, ADM, Metadata.

## 1.    Development in the EBU

This metadata specification was published by the EBU in February 2014. Its aim was to formalise the description of audio for use in applications designed to flexibly carry advanced or complex audio environments based on channels, objects or scenes, as highlighted in ITU-R Reports BS.2266 and BS.1909.

The central requirement is to allow each individual track, scene or audio object within a file or stream to be correctly rendered, processed or distributed according to the accompanying metadata. To ensure compatibility across all systems, the Audio Definition Model is an **open standard** that makes this possible. ADM data can, in particular, be carried within the <chna> chunk of the BWF (EBU Tech 3285) and in the BW64 file format specified in Recommendation ITU-R BS.2088.

## 2.    Development in the ITU

The EBU submitted Tech 3364 to Working Party 6B of the ITU in November 2014. It largely formed the basis for the subsequent work that has resulted in Recommendation ITU-R BS.2076-1 (Audio Definition Model) being published in June 2017.

Work is continuing within the ITU in enriching and expanding the ADM, both for static file use and for streaming applications. ITU-R BS.2076 will be updated from time to time and associated recommendations and application notes are certain to follow.

The ADM will form the backbone of most NGA (next generation audio) systems and it is applicable throughout the entire audio chain, from acquisition to production, archival, distribution and reproduction. Audio renderers, both open source and manufacturer-specific will be able to interact with the ADM to provide all the benefits that NGA systems promise.

To avoid any confusion and duplication of standardisation effort that will arise from there being two separate specifications of the Audio Definition Model, the EBU has decided that **Recommendation ITU-R BS.2076** should exclusively be used.

At time of writing this is available for free download from the ITU at:

https://www.itu.int/dms_pubrec/itu-r/rec/bs/R-REC-BS.2076-1-201706-I!!PDF-E.pdf

Implementation Guidelines for broadcasters on the use of the ADM will be published by the EBU.

The previous version of EBU Tech 3364 is available HERE for information only.