What is an audio recording format?

An audio format is a file format which stores music on your computer. This document provides a brief explanation of some of the main format types.

Audio formats belong to either *Compressed* or *Uncompressed* formats, depending on how they store the data. Where possible when recording, record in 44,100Khz and 16 bit (minimum) for studio grade recording.

Compressed Audio Formats

… compress the digital audio quality to produce a smaller file which takes up less space on your storage drive.

There are two types of compressed audio formats:

Lossless Compressed Audio Format: no loss of data during compression process.

Lossy Compressed Audio Formats: Will reduce audio quality by eliminating certain information and frequencies to reduce file size.

Uncompressed Audio Formats

…are bulky files and take up a lot of space on your storage drive.

The advantage of this format is that the digital audio is unchanged, so the quality remains intact no matter how many times you process it.

Commonly used audio formats include the following:

AAC The Advanced Audio Coding (AAC) format stores lossy compressed audio. It is an alternative to mp3 as it offers better quality than mp3 at lower size files.

AIFF The Audio Interchange File Format (AIFF) is an uncompressed audio format. Commonly used for professional audio application.

ALAC The Apple Lossless Audio Codec (ALAC) format used on iTunes and iOS has no loss in quality when compressing data.

FLAC Free Lossless Audio Codec (FLAC) is an audio format similar to mp3, but lossless, meaning that there is no loss in quality when compressed.

M4A MPEG 4 Audio (M4A) is an audio-compressed file. File quality is better than MPEG format. Programs that open M4A files include iTunes, QuickTime, Windows Media Player.

MP3 The MPEG Audio Layer 3 (MP3) format uses a lossy compressed format. It reduces the file size by omitting data from the file. It is useful when storing large quantities of music without taking up too much storage space and has adequate quality.

MPEG Moving Picture Experts Group (MPEG) is an audio file format used on cross-platform software and is a suitable format for video editing. It is possible to transfer this file into audio editing software and edit the audio only.

WAV The Wavform or WAV audio format stores uncompressed audio data. There is no loss of audio quality using this format. This format can be easily edited and processed.

WMA The Windows Media Audio (WMA) format is a lossy compressed audio format used with Windows Media Audio. It retains the original audio quality with no removal of data when decompressed and played back.