Audio Coding System Using Spectral Hole Filling

Abstract

Audio coding processes like quantization can cause spectral components of an encoded audio signal to be set to zero, creating spectral holes in the signal. These spectral holes can degrade the perceived quality of audio signals that are reproduced by audio coding systems. An improved decoder avoids or reduces the degradation by filling the spectral holes with synthesized spectral components. An improved encoder may also be used to realize further improvements in the decoder.

Fig. 9