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- (54) **Title:** APPARATUS AND METHOD FOR ENHANCED SPATIAL AUDIO OBJECT CODING

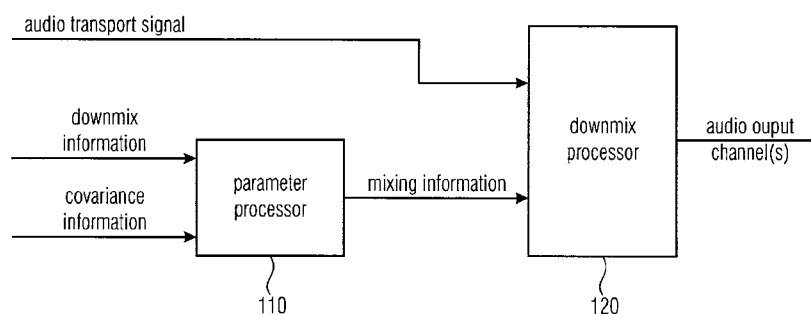


FIGURE 1

(57) **Abstract:** An apparatus for generating one or more audio output channels is provided. The apparatus comprises a parameter processor (110) for calculating mixing information and a downmix processor (120) for generating the one or more audio output channels. The downmix processor (120) is configured to receive an audio transport signal comprising one or more audio transport channels. One or more audio channel signals are mixed within the audio transport signal, and one or more audio object signals are mixed within the audio transport signal, and wherein the number of the one or more audio transport channels is smaller than the number of the one or more audio channel signals plus the number of the one or more audio object signals. The parameter processor (110) is configured to receive downmix information indicating information on how the one or more audio channel signals and the one or more audio object signals are mixed within the one or more audio transport channels, and wherein the parameter processor (110) is configured to receive covariance information. Moreover, the parameter processor (110) is configured to calculate the mixing information depending on the downmix information and depending on the covariance information. The downmix processor (120) is configured to generate the one or more audio output channels from the audio transport signal depending on the mixing information. The covariance information indicates a level difference information for at least one of the one or more audio channel signals and further indicates a level difference information for at least one of the one or more audio object signals. However, the covariance information does not indicate correlation information for any pair of one of the one or more audio channel signals and one of the one or more audio object signals.

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