

Title (en)  
Sub-band processing complexity reduction

Title (de)  
Subband zur Verarbeitung der Komplexitätsverringern

Title (fr)  
Réduction de la complexité de traitement de sous-bande

Publication  
**EP 2355094 A1 20110810 (EN)**

Application  
**EP 11151856 A 20110124**

Priority  
US 69653310 A 20100129

Abstract (en)  
A sub-band processing system that reduces computational complexity and memory requirements includes a processor and a local or distributed memory. Logic stored in the memory partitions a frequency spectrum of bins into a smaller number of sub-bands. The logic enables a lossy compression by designating a magnitude and a designated or derived phase of each bin in the frequency spectrum as representative. The logic renders a lossless compression by decompressing the lossy compressed data and providing lost data based on original spectral relationships contained within the frequency spectrum.

IPC 8 full level  
**G10L 19/02** (2013.01); **G10L 19/00** (2013.01); **G10L 25/18** (2013.01); **G10L 21/0208** (2013.01)

CPC (source: EP)  
**G10L 19/0204** (2013.01); **G10L 19/0212** (2013.01); **G10L 25/18** (2013.01); **G10L 2021/02082** (2013.01)

Citation (applicant)  
US 69653310 A 20100129

Citation (search report)  
• [A] EP 0527374 A2 19930217 - SEL ALCATEL AG [DE], et al  
• [A] GB 2362549 A 20011121 - SAMSUNG ELECTRONICS CO LTD [KR]  
• [A] EP 1852848 A1 20071107 - THOMSON BRANDT GMBH [DE]

Designated contracting state (EPC)  
AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

Designated extension state (EPC)  
BA ME

DOCDB simple family (publication)  
**EP 2355094 A1 20110810**; **EP 2355094 B1 20170412**; CA 2729707 A1 20110729; CA 2729707 C 20140401; EP 2755205 A1 20140716; EP 2755205 B1 20191211

DOCDB simple family (application)  
**EP 11151856 A 20110124**; CA 2729707 A 20110127; EP 14157074 A 20110124