

Title (en)
ACOUSTIC DEVICE FOR WARNING SOUND AND ACOUSTIC SYSTEM

Title (de)
AKUSTISCHE VORRICHTUNG FÜR WARNTON UND AKUSTISCHES SYSTEM

Title (fr)
DISPOSITIF ACOUSTIQUE POUR ACOUSTIQUE ET D'AVERTISSEMENT SONORE

Publication
EP 3415243 A1 20181219 (EN)

Application
EP 18172887 A 20180517

Priority
JP 2017101053 A 20170522

Abstract (en)
An acoustic device for warning sound and an acoustic system are provided which are configured to increase, also when a warning sound at a relatively low frequency is output, a sound pressure level of the warning sound. An acoustic device for warning sound includes a switching circuit and a resonance circuit. A relationship among a frequency f_n of an Nth harmonic, a fundamental frequency f_0 of a drive voltage V_2 , and an oscillation frequency f_1 is $f_n - 1/2f_0 \leq f_1 \leq f_n + 1/2f_0$, where the Nth harmonic is one harmonic of a plurality of harmonics of the drive voltage V_2 , a sound pressure level of an output sound from the piezoelectric buzzer at the Nth harmonic being higher than a sound pressure level of the output sound from the piezoelectric buzzer at the fundamental frequency f_0 .

IPC 8 full level
B06B 1/02 (2006.01); **G08B 3/10** (2006.01); **G10K 9/122** (2006.01)

CPC (source: EP)
B06B 1/0215 (2013.01); **B06B 1/0276** (2013.01); **G08B 3/10** (2013.01); **G10K 9/122** (2013.01)

Citation (applicant)
JP 2009157447 A 20090716 - HOCHIKI CO

Citation (search report)
• [A] EP 1507603 A1 20050223 - GENT LTD [GB]
• [A] US 4023162 A 19770510 - MURAKAMI FUMIKAZU

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 3415243 A1 20181219; **EP 3415243 B1 20210721**; JP 2018194793 A 20181206; JP 6775201 B2 20201028

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