
STM32F4 audio processing components

Data brief

Features

The STM32F4 audio processing components provide the following capabilities:

- Sampling Rate Converter:
 - SRC236 supporting ratios 2, 3, 6, 1/2, 1/3, 1/6, 3/2 and 2/3
 - SRC441 for specific 44.1->48 kHz conversion (10 ms framing)
- OmniSurround Stereo Widener:
 - Audio virtualization for a 1.0/2.0 input stream to a widened 2.0 output stream
- OmniSurround Multichannel Virtualizer:
 - Audio virtualization for 5.1/7.1 input stream to a virtualized 2.0 output stream
- Graphical Equalizer:
 - 10-band graphical equalizer for 48 kHz input signal
- Generic Biquad filters
- Bass Manager (including compressor & limiter)
- Smart Volume Control (including compressor)

Description

The audio processing components for STM32F4 consists in a comprehensive set of high-quality efficient software libraries ready to be embedded into many kinds of audio appliances. All modules are delivered with internal 32-bits processing and support either 16 or 32 bits I/O buffers.

Ordering information

STM32-AUDIO100A is available for free download from www.st.com.

Revision history

Table 1. Document revision history

Date	Revision	Changes
23-Jan-2015	1	Initial release.

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