STEVAL-CCA028V1
$10 \mathrm{~W}+10 \mathrm{~W}$ class-D audio amplifier demonstration board based on the TDA7491P

Data brief

## Features

- $10 \mathrm{~W}+10 \mathrm{~W}$ continuous output power at THD $=10 \%, R_{L}=6 \Omega, V_{C C}=11 \mathrm{~V}$
■ $9.5 \mathrm{~W}+9.5 \mathrm{~W}$ continuous output power at THD $=10 \%, R_{L}=8 \Omega, V_{C C}=12 \mathrm{~V}$
■ Wide-range single-supply operation (5-18 V)
- High efficiency ( $\eta=90 \%$ )
- Four selectable, fixed gain settings ( $20 \mathrm{~dB}, 26 \mathrm{~dB}, 30 \mathrm{~dB}$ and 32 dB )
- Differential inputs to minimize common-mode noise
■ Filterless operation
- Standby and mute features


■ Short-circuit and thermal overload protections
■ Externally synchronizable

- RoHS compliant


## Description

The STEVAL-CCA028V1 demonstration board is designed for the TDA7491P high-power dual BTL class-D audio amplifier.

Thanks to its high efficiency, the device assembled in the PSSO36 (slug-down) package is capable of dissipating heat without any heatsink.

Jumpers on the board allow configuring the amplifier in order to verify all the features as single-ended or differential inputs, fixed gain settings.

Microswitches are also provided to enable the standby and mute functions.

## 1 Schematic

Figure 1. Circuit schematic


## 2 Revision history

Table 1. Document revision history

| Date | Revision |  | Changes |
| :---: | :---: | :--- | :--- |
| 05-Oct-2011 | 1 | Initial release. |  |

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