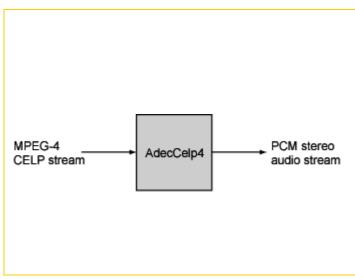
AdecCelp4

MPEG4 WB CELP decoder

Introduction

The AdecCelp4 component decodes bitstreams encoded in 'MPEG4-CELP' format. The decoder is optimized to handle bitstreams on the 32-bit TriMedia processors.



Key features

- DVP compliant
- Fully compliant with the MPEG-4 CELP audio standards ISO 14496-3
- Optimized for the TriMedia processors

-Semiconductors

General Information

Description

The AdecCelp4 component is designed for use in systems that decode MPEG-4 CELP format audio streams . MPEG-4 CELP streams are described by ISO/IEC JTC 1/SC 29/WG 11 N2503-Sub3 and ISO/IEC 14496-3, International Standard , at bit rates ranging from 3.85kb/s to 24kb/s for mono. The decoder matches the MPEG-4 High Quality Audio profile base layer.

The component accepts as input MPEG-4 CELP audio elementary streams. It outputs stereo PCM audio samples where left channel and right channel are the same. The library is optimized for the TriMedia processors.

Applications

- MPEG-4 Player
- Internet/Multimedia system

Documentation

Detailed documentation of the tmAdecCel4 component is available (Specifications, Architecture Implementation, Test Reports).



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| - | www.semiconductors.philips.com |

Technical Information

Memory Usage

| Static |
|--------|
|--------|

| Static Memory | 237.7 KBytes |
|----------------|--------------|
| Dynamic Memory | 64.3 KBytes |

Note that additional memory is required for buffering of input and output data. The amount is highly application dependent.

Processor Load (MIPS)

The processor load was measured on a pnx1500 running at 300 MHz with 166MHz DDR-RAM.

| Minimum CPU load | 3.5 |
|------------------|--------|
| Maximum CPU load | 25.819 |

Other Information

| Supported Processors | TM1500 |
|-----------------------------|--|
| Version number | 1.8 |
| Build with Compiler Version | tmcc of V7.0.1 of SDE V4.3_PR1(0149_Windows |

Example Programs

This library is shipped with an example program that demonstrates the use of the component.

The main use is in the exolMpeg4 application. See exolMpeg4 Application Readme for details.

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