

# SOCA ::

Portable Audio Player Reference Design



## TI DIGITAL AUDIO PLAYERS Mobile Imagination

### Unlimited Portable Possibilities

Today's portable audio player market continues to show signs of high growth. IDC predicts that by the year 2009 this market will have topped 155 million units. In order to capture your share of this expanding market you need to get to market fast with a differentiated solution. Texas Instruments' second generation of portable audio, turnkey reference designs will help you do just that.

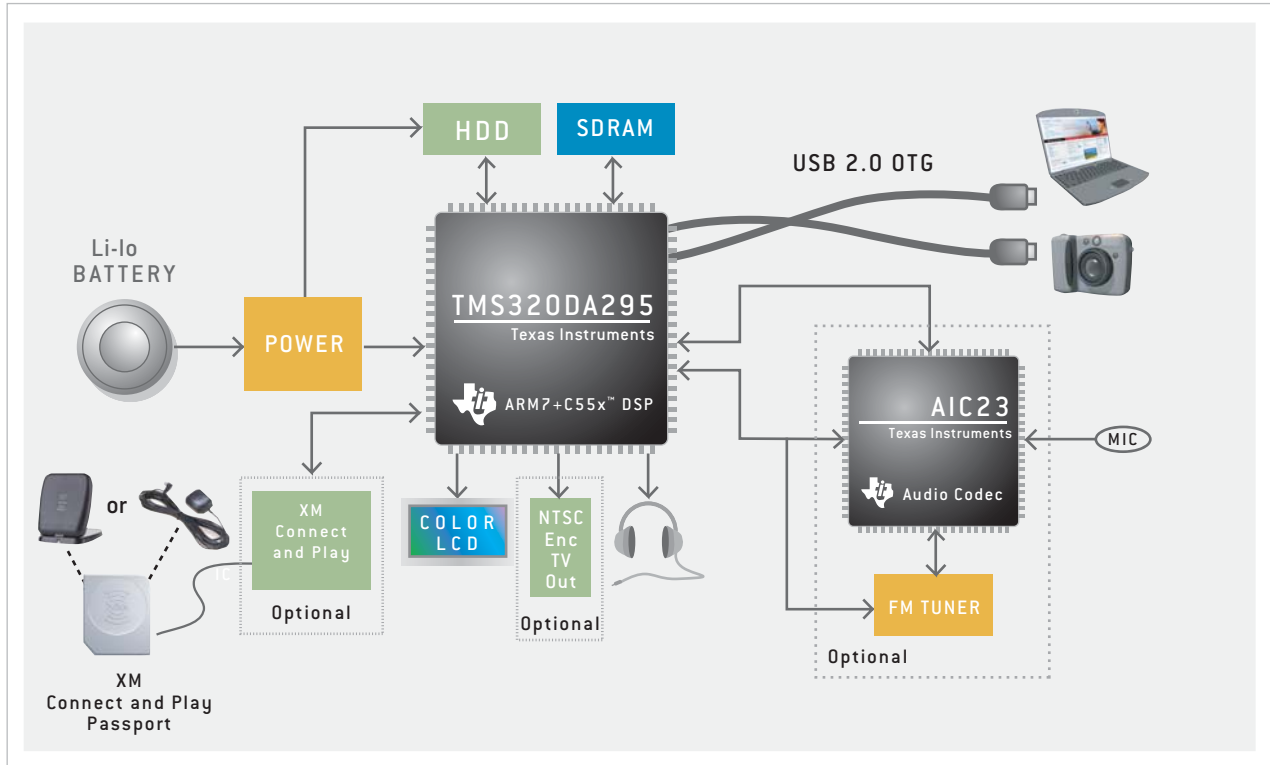
Based on TI's latest portable Digital Audio (DA) processor, TMS320DA295, the SOCA reference design targets getting you to market in three months with optimal battery life and features. Utilizing the ARM® + DSP processors within the dual-core DA295, the SOCA reference design maximizes processor efficiency by partitioning tasks to the appropriate core for maximum performance and battery life. A highly integrated system on a chip (SoC) minimizes BOM cost by integrating peripherals such as stereo DAC, headphone amplifier, USB 2.0 High Speed OTG, dedicated hard disk drive and NAND controllers just to name a few, while the reference design offers maximum flexibility with integrated video encoder and audio codec. Ultra-low standby currents for increased battery life in an "instant on" state and sharp 160x128 resolution color display allow for enhanced consumer experience for your product.



### FEATURES AND BENEFITS

- :: 30+ hours battery life
- :: Video Out
- :: MP3, AAC, WMA Decode
- :: Protected WMA Decode
- :: 1MP/sec JPEG Decode 160 X 128 Color TFT Display
- :: 5GB 1" HDD
- :: Support for XM Connect-and-Play™ Passport
- :: Programmable Stereo Crossfader (1H'06)
- :: Time Scale Modification (1H'06)
- :: Upgradeable support for MPEG, MJPEG and Audible (1H'06)

DIGITAL AUDIO PLAYER



:: While great battery life and cool features such as MPEG4 and MJPEG will get you a long way, they can only get you so far. In order to sustain a product in the market, you need to be able to provide future upgrade capabilities to your customers. TI's programmable portable audio reference design gives you the headroom you need to expand on current features and stay ahead of the market.

For additional information, contact your local TI sales representative or visit [www.ti.com/soca](http://www.ti.com/soca).



## IMPORTANT NOTICE

Texas Instruments Incorporated and its subsidiaries (TI) reserve the right to make corrections, modifications, enhancements, improvements, and other changes to its products and services at any time and to discontinue any product or service without notice. Customers should obtain the latest relevant information before placing orders and should verify that such information is current and complete. All products are sold subject to TI's terms and conditions of sale supplied at the time of order acknowledgment.

TI warrants performance of its hardware products to the specifications applicable at the time of sale in accordance with TI's standard warranty. Testing and other quality control techniques are used to the extent TI deems necessary to support this warranty. Except where mandated by government requirements, testing of all parameters of each product is not necessarily performed.

TI assumes no liability for applications assistance or customer product design. Customers are responsible for their products and applications using TI components. To minimize the risks associated with customer products and applications, customers should provide adequate design and operating safeguards.

TI does not warrant or represent that any license, either express or implied, is granted under any TI patent right, copyright, mask work right, or other TI intellectual property right relating to any combination, machine, or process in which TI products or services are used. Information published by TI regarding third-party products or services does not constitute a license from TI to use such products or services or a warranty or endorsement thereof. Use of such information may require a license from a third party under the patents or other intellectual property of the third party, or a license from TI under the patents or other intellectual property of TI.

Reproduction of information in TI data books or data sheets is permissible only if reproduction is without alteration and is accompanied by all associated warranties, conditions, limitations, and notices. Reproduction of this information with alteration is an unfair and deceptive business practice. TI is not responsible or liable for such altered documentation.

Resale of TI products or services with statements different from or beyond the parameters stated by TI for that product or service voids all express and any implied warranties for the associated TI product or service and is an unfair and deceptive business practice. TI is not responsible or liable for any such statements.

Following are URLs where you can obtain information on other Texas Instruments products and application solutions:

<b>Products</b>		<b>Applications</b>	
Amplifiers	<a href="http://amplifier.ti.com">amplifier.ti.com</a>	Audio	<a href="http://www.ti.com/audio">www.ti.com/audio</a>
Data Converters	<a href="http://dataconverter.ti.com">dataconverter.ti.com</a>	Automotive	<a href="http://www.ti.com/automotive">www.ti.com/automotive</a>
DSP	<a href="http://dsp.ti.com">dsp.ti.com</a>	Broadband	<a href="http://www.ti.com/broadband">www.ti.com/broadband</a>
Interface	<a href="http://interface.ti.com">interface.ti.com</a>	Digital Control	<a href="http://www.ti.com/digitalcontrol">www.ti.com/digitalcontrol</a>
Logic	<a href="http://logic.ti.com">logic.ti.com</a>	Military	<a href="http://www.ti.com/military">www.ti.com/military</a>
Power Mgmt	<a href="http://power.ti.com">power.ti.com</a>	Optical Networking	<a href="http://www.ti.com/opticalnetwork">www.ti.com/opticalnetwork</a>
Microcontrollers	<a href="http://microcontroller.ti.com">microcontroller.ti.com</a>	Security	<a href="http://www.ti.com/security">www.ti.com/security</a>
		Telephony	<a href="http://www.ti.com/telephony">www.ti.com/telephony</a>
		Video & Imaging	<a href="http://www.ti.com/video">www.ti.com/video</a>
		Wireless	<a href="http://www.ti.com/wireless">www.ti.com/wireless</a>

Mailing Address: Texas Instruments  
Post Office Box 655303 Dallas, Texas 75265

Copyright © 2006, Texas Instruments Incorporated