

## MELP Vocoder Mixed-Excitation Linear Predictive

Adaptive Digital Technologies, Inc.

### PRODUCT DESCRIPTION

Adaptive Digital's **MELP** (Mixed-Excitation Linear Predictive) vocoder is a real-time implementation of the Federal Standard 2400 bps speech coder, suitable for use by OEM customers for VoIP, telecom, military and government, and other low bit-rate compressed speech applications.

**MELP** is robust in difficult background noise environments such as those frequently encountered in commercial and military communication systems.

### FEATURES

- Functions are C-callable.
- Multi-channel capable



Strategic member  
of the TI Third  
Party Network

### AVAILABILITY

ADT MELP is currently available on the TMS320™ DSP Family  
C55x™ DSP Generation and C6000™ DSP Platform

### SPECIFICATIONS

Coding Rate: 2.4 kbps

Sampling Rate: 8 kHz

#### C55x –

All Memory usage is given in units of byte.

Function	MIPS Peak loading	Program Memory	Data Memory	Scratch	Per-Channel Data Memory
Encode	24.3	21372	19456	3080	2480
Decode	15.1			3080	896



Last update: 05/05/2005

## C6x

All Memory usage is given in units of byte.

Function	MIPS Peak loading	Program Memory	Data Memory	Scratch	Per-Channel Data Memory
Encode	21.1	53312	19280	3064	2480
Decode	14.7	57632	19280	3064	904
Encode & Decode	35.8	61248	19280	3064	3384

□ Last update: 03/17/2006

## FUNCTION

InitializeMelpEncoderChannel (. . .)	Initializes the MELP encoder
InitializeMelpDecoderChannel (. . .)	Initializes the MELP decoder
EncodeMelp (. . .)	Executes the MELP encoder
DecodeMelp (. . .)	Executes the MELP decoder

## CONTACT INFORMATION

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