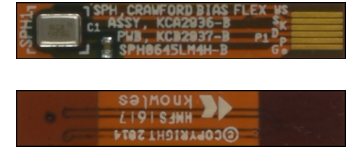


## KAS-700-0137 Mics On Flex, 2 Pack, SPH0645LM4H-B, CRAWFORD, Bottom Port I2S



# Knowles SPH0645LM4H-B SiSonic™ I2S digital microphone mounted on flexible bias boards

## ASSEMBLY OVERVIEW

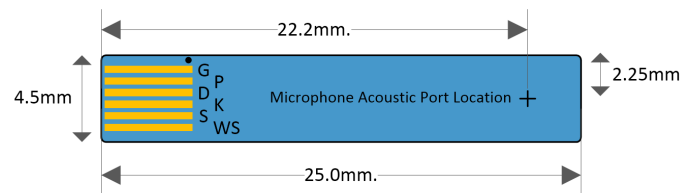
- ▶ Bottom Port I2S microphone mounted to flexible bias board.
- ▶ For use with Knowles “Muskie” Microphone Evaluation Kit. Part# KAS-33100-0004
- ▶ 65dB Signal-to-Noise Ratio (SNR) in a small footprint.
- ▶ The I2S interface simplifies the integration in the system and allows direct interconnect to digital processors, application processors and microcontrollers.

KEY PARAMETERS	SPECIFICATIONS
Signal-to-noise ratio (SNR)	65 dB (A)
Acoustic Overload Point (10% AOP)	120 dB SPL
Low Frequency Roll Off (LFRO)	45 Hz
Bandwidth (±3dB)	15 kHz
Current consumption	600 uA
Supply voltage	1.62 to 3.6V
Interface	I2S Digital
Clock Rates Supported (Normal Mode)	1.024 to 4.096 MHz
Port location	Bottom Port
Package dimensions	3.50 x 2.65 x 0.98 mm

## KAS-700-0037 MIC ON FLEX BOM

- ▶ SPH0645LM4H-B, Bottom port digital microphone
- ▶ BYPASS CAPACITOR, 0.1uF, 0.1 F ±10% 16V, X5R, 0402
- ▶ KCB2937 FLEX CIRCUIT PCB

## FLEX CIRCUIT DIMENSIONS



## FLEX CIRCUIT PINOUTS

The table below shows the pinout for the flex connector. The same connector can be used for all microphone flexes, regardless of port orientation or electrical interface.

Flex Pin#	Flex Marking	Signal
1	G	Ground
2	P	Power
3	D	Data
4	K	Bit Clock
5	S	Select
6	WS	Word Strobe

## ADDITIONAL INFORMATION

For inquiries, please visit the Knowles website at <https://www.knowles.com/subdepartment/evaluation-kits/dpt-microphones/subdpt-sisonic-surface-mount-mems> Or contact your nearest Knowles representative.

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