

# HCI Module -standard- LBMAx9BAEx-TEMP

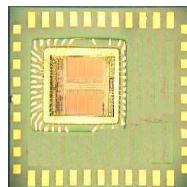
## 1.Small Complete HCI Module

- Ceramic Multilayer Technology (LTCC)
- Chipset : CSR BC2-External
- Size : 9.8 (typ) x 9.6 (typ) x 1.8 (max) (mm)
- Power class : class2
- BQB Qualified : 2002/04/15

## 2.Characteristics

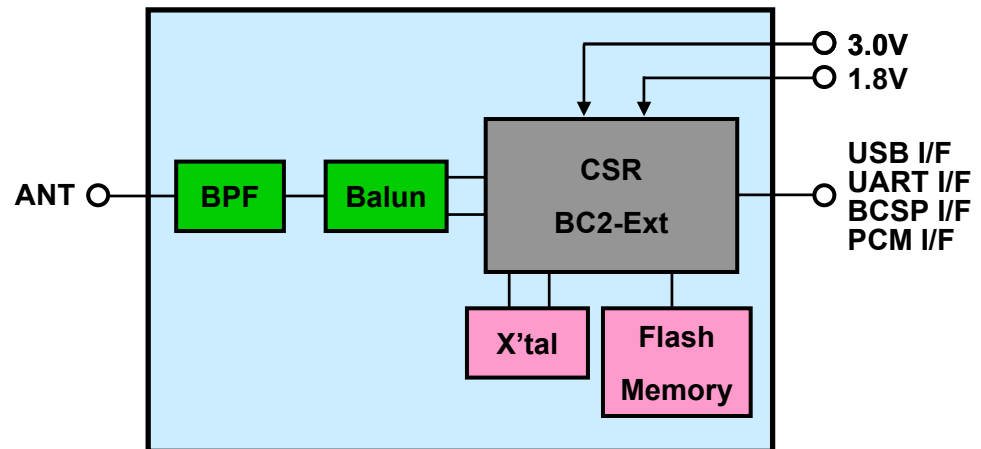
- Operating Temperature : -30 to +85 deg.C
- Supply Voltage : 1.7 - 1.9V , 2.7 - 3.6 V
- Output Power : 0dBm typ.
- Sensitivity : -82dBm typ. (BER=0.1%)
- Current : ACL(DH5) ∙∙ 60mA avg.  
Deep Sleep ∙∙ 30uA
- Interface : USB , UART(H4) , BCSP , PCM
- Flash Memory : 4Mbit
- Firmware Version : 14.7 and 16.4

### appearance



## 3.Temporary Part Number

Part Number	Interface	Power Control
LBMA29BAE1-TEMP	USB	No
LBMA49BAE1-TEMP		Yes
LBMA29BAE2-TEMP	UART(H4)	No
LBMA49BAE2-TEMP		Yes
LBMA29BAE3-TEMP	BCSP	No
LBMA49BAE3-TEMP		Yes



# HCI Module -standard- LBMA49CAFx-TEMP

## 1. Ultra Small Complete HCI Module

- Ceramic Multilayer Technology (LTCC)
- Chipset : CSR BC2-External
- Size : 9.3 (typ) x 7.9 (typ) x 1.8 (max) (mm)
- Power class : class2
- BQB Qualified : 2003/03/12

### appearance

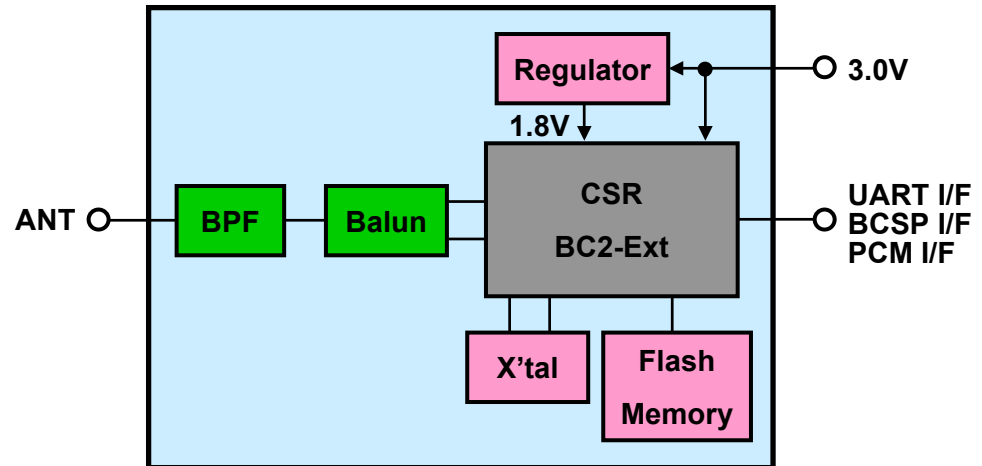


## 2. Characteristics

- Operating Temperature : -30 to +85 deg.C
- Supply Voltage : 2.7 - 3.6 V
- Output Power : 0dBm typ.
- Sensitivity : -80dBm typ. (BER=0.1%)
- Current : ACL(DH5) ∙ ∙ ∙ 60mA avg.  
Deep Sleep ∙ ∙ ∙ 75uA
- Interface : UART(H4) , BCSP , PCM
- Flash Memory : 4Mbit
- Firmware Version : 16.4
- Lead Free Module

## 3. Temporary Part Number

Part Number	Interface
LBMA49CAF2-TEMP	UART(H4)
LBMA49CAF3-TEMP	BCSP



# HCI Module -standard- LBMA49BAMx-TEMP

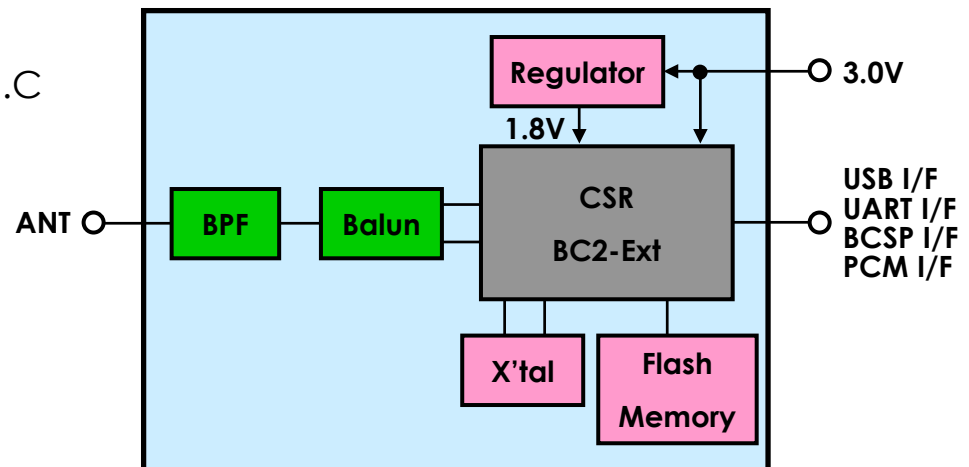
## 1.Small Complete HCI Module

- Ceramic Multilayer Technology (LTCC)
- Chipset : CSR BC2-External
- Size : 9.8 (typ) x 9.6 (typ) x 1.8 (max) (mm)
- Power class : class2

## 2.Characteristics

- Operating Temperature : -30 to +85 deg.C
- Supply Voltage : 2.7 - 3.6 V
- Output Power : 0dBm typ.
- Sensitivity : -82dBm typ. (BER=0.1%)
- Current : ACL(DH5) ... 60mA avg.  
Deep Sleep ... 75uA
- Interface : USB , UART(H4) , BCSP , PCM
- Flash Memory : 8Mbit
- Firmware Version : 18.x

(BT Spec.1.2 compliant)



## 3.Temporary Part Number

Part Number	Interface
LBMA49BAM1-TEMP	USB
LBMA49BAM2-TEMP	UART(H4)
LBMA49BAM3-TEMP	BCSP

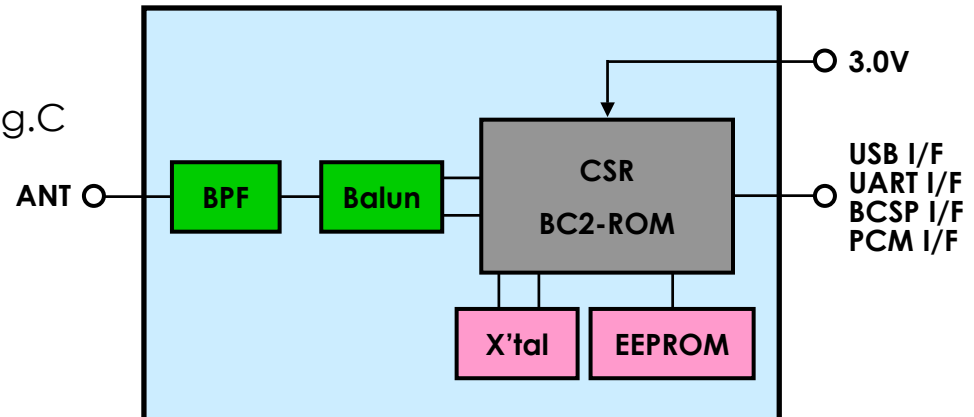
# HCI Module -standard- LBMA486AKx-TEMP

## 1. Ultra Small Complete HCI Module

- Ceramic Multilayer Technology (LTCC)
- Chipset : CSR BC2-ROM
- Size : 8.2 (typ) x 6.3 (typ) x 1.5 (max) (mm)
- Power class : class2
- BQB Qualified : 2003/09/30

## 2. Characteristics

- Operating Temperature : -30 to +85 deg.C
- Supply Voltage : 2.7 - 3.6 V
- Output Power : 0dBm typ.
- Sensitivity : -82dBm typ. (BER=0.1%)
- Current : ACL(DH5) ··· 50mA avg.  
Deep Sleep ··· 75uA
- Interface : USB , UART(H4) , BCSP , PCM
- Firmware Version : 17.4 or newer
- Lead Free Module



## 3. Temporary Part Number

Part Number	Interface
LBMA486AK1-TEMP	USB
LBMA486AK2-TEMP	UART(H4)
LBMA486AK3-TEMP	BCSP

# HCI Module -Recommend for Headset- LBCA49CAS8-TEMP

## 1. Ultra Small Complete HCI Module

- Ceramic Multilayer Technology (LTCC)
- Chipset : CSR BC2-Headset Extra
- Size : 9.3 (typ) x 7.9 (typ) x 1.8 (max) (mm)
- Power class : class2
- BQB Qualified : 2003/12/07

## 2.Characteristics

- Operating Temperature : -30 to +85 deg.C
- Supply Voltage : 2.7 - 3.6V
- Output Power : 0dBm typ.
- Sensitivity : -82dBm typ. (BER=0.1%)
- Interface : USB , UART(H4) , BCSP , Audio
- Lead Free Module

## 3.Temporary Part Number

Part Number	Interface	Firmware
LBCA49CAS8-TEMP	No Host	Headset profile Hands Free profile

