



Capabilities

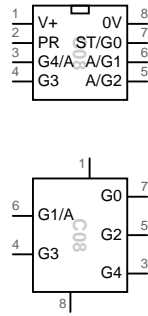
The following table outlines the capabilities of this GENIE device:

Type	CORE
Verssion	1
Signals	
Pins	8
Analogue inputs	3
ADC resolution	8 bits
Digital inputs	1-4
Digital outputs	1-4
Features	
Parallel processing	Yes
Plug and play	Yes
Debug live	Yes
Device control	Yes
Sensor calibration	Yes
RTTTL music	Yes
16 channel MIDI music	No
Sound effects	No
PWM outputs	1
Servo motor control	0
Infra-red control	Yes
1-Wire® and I2C	No
Ultrasonic sensing	No
Events and interrupts	Yes
1-second clock	Yes
Programming	
Program memory	256 bytes
Variables	10 (A-J)
Data (array) memory	0
EEPROM locations	16
Program start limit	2
Subroutine limit	No limit
Call stack limit	16
Electrical	
PICmicro® device	12F683
Power supply	2.1-5.5V
Pin current limit	25mA
Total current limit	90mA

Component

Note: This is a older (v1) GENIE microcontroller, which has been replaced the the more powerful v2 GENIE 08 device.

The GENIE C08 microcontroller has 8 legs (known as pins) and these are used as follows (a simplified view is also shown):



Pin	Description
1	Power supply voltage (2.1-5.5V only)
2	Programming input (PR)
3	Analogue input A4 or digital in/out G4
4	Digital input G3
5	Analogue input A2 or digital in/out G2
6	Analogue input A1 or digital in/out G1
7	Digital output G0 and Status output (ST)
8	Ground (zero volt) supply voltage

The required circuit for a GENIE C08 is shown below. It includes a download socket and two resistors.

