ADC

ESP32 Open IoT and IIoT Gateways (P01 & P02)

Link to repositories:

- C
- MicroPython

Description

This example shows how to use the ADC (analog-digital converter) located on the board. In the beginning of the program there is an ADC calibration performed. Thanks to that a raw reading can be converted to a corresponding voltage level.

Console output

```
I (9474) adc: Unit: ADC_UNIT_1, Channel: 0, Raw Reading: 1343, Calibrated Voltage: 1252 mV
I (9484) adc: Unit: ADC_UNIT_1, Channel: 0, Raw Reading: 1340, Calibrated Voltage: 1249 mV
I (9494) adc: Unit: ADC_UNIT_1, Channel: 0, Raw Reading: 1337, Calibrated Voltage: 1247 mV
I (9504) adc: Unit: ADC_UNIT_1, Channel: 0, Raw Reading: 1339, Calibrated Voltage: 1248 mV
I (9504) adc: Unit: ADC_UNIT_1, Channel: 0, Raw Reading: 1344, Calibrated Voltage: 1252 mV
I (9514) adc: Unit: ADC_UNIT_1, Channel: 0, Raw Reading: 1338, Calibrated Voltage: 1247 mV
I (9524) adc: Unit: ADC_UNIT_1, Channel: 0, Raw Reading: 1337, Calibrated Voltage: 1247 mV
I (9544) TASK: ret is 0, ret_num is 256 bytes
I (9544) adc: Unit: ADC_UNIT_1, Channel: 0, Raw Reading: 1337, Calibrated Voltage: 1247 mV
I (9544) adc: Unit: ADC_UNIT_1, Channel: 0, Raw Reading: 1338, Calibrated Voltage: 1247 mV
I (9554) adc: Unit: ADC_UNIT_1, Channel: 0, Raw Reading: 1337, Calibrated Voltage: 1247 mV
I (9564) adc: Unit: ADC_UNIT_1, Channel: 0, Raw Reading: 1337, Calibrated Voltage: 1247 mV
I (9574) adc: Unit: ADC_UNIT_1, Channel: 0, Raw Reading: 1337, Calibrated Voltage: 1247 mV
I (9584) adc: Unit: ADC_UNIT_1, Channel: 0, Raw Reading: 1333, Calibrated Voltage: 1243 mV
```

Created 2024-06-20 13:15:09 UTC
Updated 2024-06-24 12:58:40 UTC