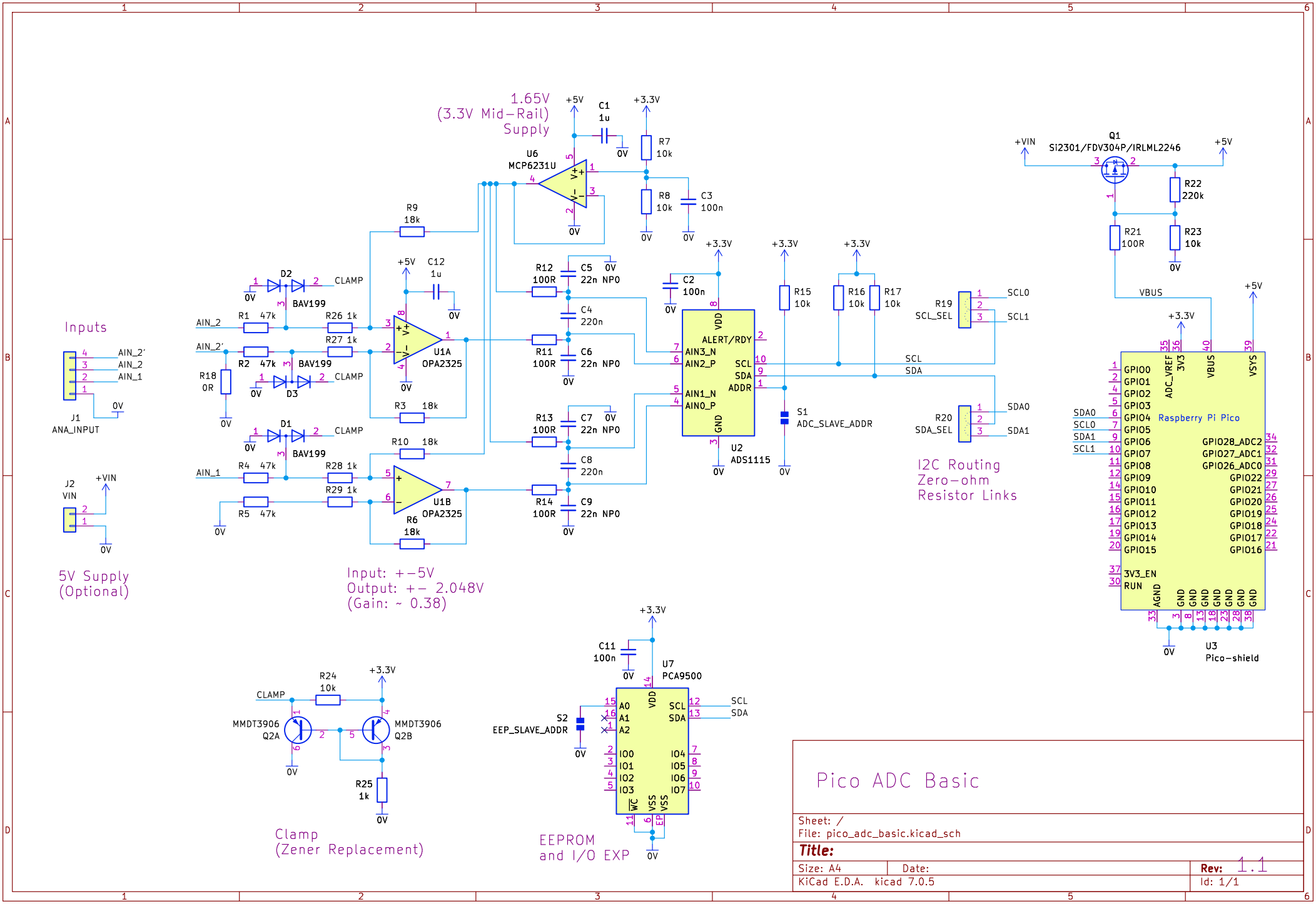
1.65V
(3.3V Mid-Rail)
Supply
U6
MCP6231U
C1
1u
R7
10k
R8
10k
C3
100n
R9
18k
C12
1u
D2
D1
D3
BAV199
CLAMP
AIN_2
AIN_2'
AIN_1
R1 47k
R2 47k
R4 47k
R5 47k
R26 1k
R27 1k
R28 1k
R29 1k
R18
0R
R3 18k
R10 18k
R6
18k
U1A
OPA2325
U1B
OPA2325
R12
100R
R11
100R
R13
100R
R14
100R
C5 22n NP0
C4
220n
C6 22n NP0
C7 22n NP0
C8
220n
C9 22n NP0
C2
100n
U2
ADS1115
ALERT/RDY
AIN3_N
AIN2_P
AIN1_N
AIN0_P
VDD
SCL
SDA
ADDR
GND
R15
10k
R16
10k
R17
10k
S1
ADC_SLAVE_ADDR
R19
SCL_SEL
R20
SDA_SEL
SCL0
SCL1
SDA0
SDA1
I2C Routing
Zero-ohm
Resistor Links
Inputs
J1
ANA_INPUT
J2
VIN
+VIN
5V Supply
(Optional)
Input: +-5V
Output: +- 2.048V
(Gain: ~ 0.38)
Q1
Si2301/FDV304P/IRLML2246
R22
220k
R21
100R
R23
10k
VBUS
U3
Pico-shield
Raspberry Pi Pico
GPIO0
GPIO1
GPIO2
GPIO3
GPIO4
GPIO5
GPIO6
GPIO7
GPIO8
GPIO9
GPIO10
GPIO11
GPIO12
GPIO13
GPIO14
GPIO15
3V3_EN
RUN
ADC_VREF
3V3
VSYS
GPIO28_ADC2
GPIO27_ADC1
GPIO26_ADC0
GPIO22
GPIO21
GPIO20
GPIO19
GPIO18
GPIO17
GPIO16
AGND
R24
10k
MMDT3906
Q2A
Q2B
R25
1k
Clamp
(Zener Replacement)
C11
100n
U7
PCA9500
S2
EEP_SLAVE_ADDR
A0
A1
A2
IO0
IO1
IO2
IO3
IO4
IO5
IO6
IO7
WC
VSS
EP
EEPROM
and I/O EXP
Pico ADC Basic
Sheet: /
File: pico_adc_basic.kicad_sch
Title:
Size: A4
Date:
Rev: 1.1
KiCad E.D.A. kicad 7.0.5
Id: 1/1