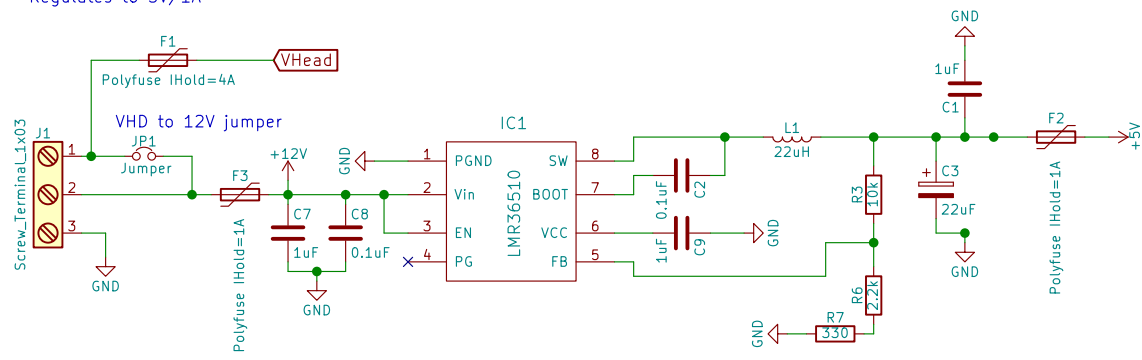
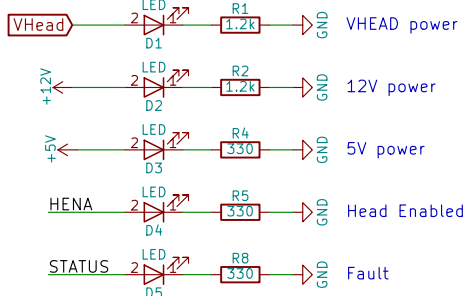


Power input

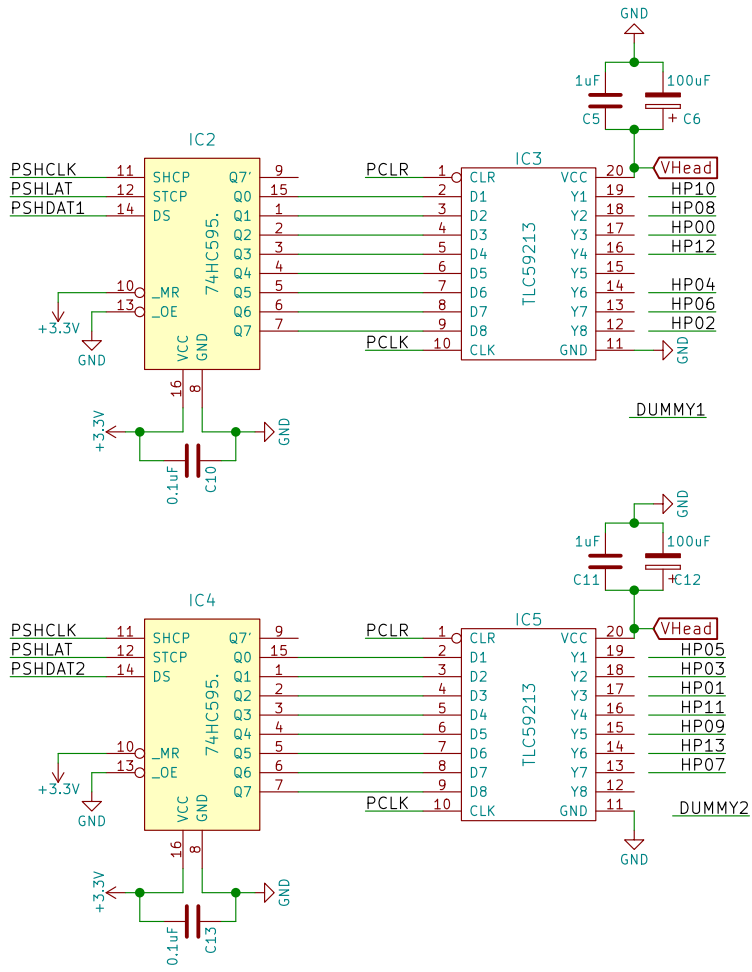
Input for VHD, 12V (connected by default)
Regulates to 5V/1A



LEDS



Primitive controller

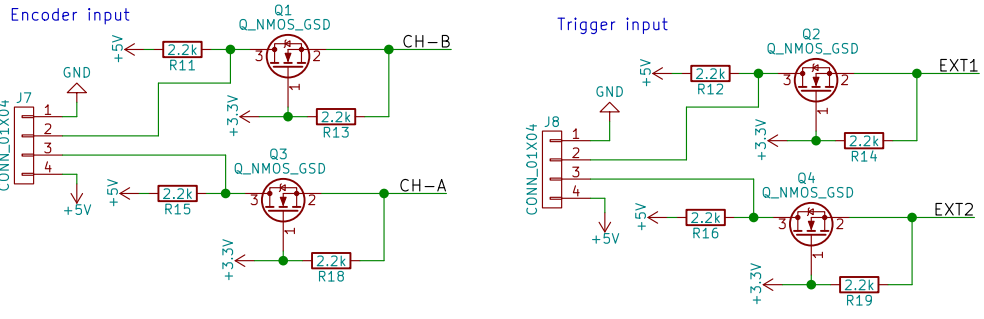
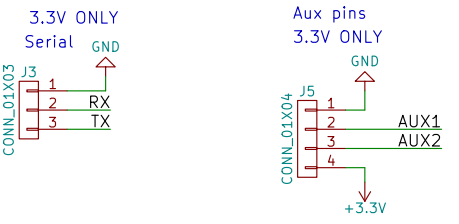


HP45 connector

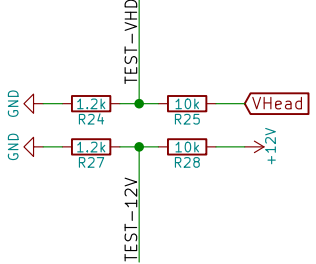
HP45_connector Con1											
HP08	51	G9	A14	G2	HA13	HP08	49	P59	P58	50	HP07
HA11	47	A12	G8	48	HGND	HA11	47	A12	G8	48	HGND
HA09	45	A10	P510	46	HP09	HA09	45	A10	P510	46	HP09
HGND	43	G11	G12	44	HGND	HGND	43	G11	G12	44	HGND
HP10	41	P511	G12	42	HP11	HP10	41	P511	G12	42	HP11
HA07	39	A8	P512	40	HA15	HA07	39	A8	P512	40	HA15
HA05	37	A6	A16	38	HA15	HA05	37	A6	A16	38	HA15
HGND	35	G13	A18	36	HA17	HGND	35	G13	A18	36	HA17
HP12	33	P513	G14	34	HP13	HP12	33	P513	G14	34	HP13
HA03	31	A4	P514	32	HA19	HA03	31	A4	P514	32	HA19
HA01	29	A2	A20	30	HA19	HA01	29	A2	A20	30	HA19
HTSR	27	TSR	R10X	28	H10X	HTSR	27	TSR	R10X	28	H10X
HA00	25	A1	A22	26	HA21	HA00	25	A1	A22	26	HA21
HA02	23	A3	A21	24	HA20	HA02	23	A3	A21	24	HA20
HP00	21	P51	A19	22	HA18	HP00	21	P51	A19	22	HA18
HGND	19	G1	P52	20	HP01	HGND	19	G1	P52	20	HP01
HA04	17	A5	G2	18	HGND	HA04	17	A5	G2	18	HGND
HA06	15	A7	A17	16	HA16	HA06	15	A7	A17	16	HA16
HP02	13	G3	A15	14	HA14	HP02	13	G3	A15	14	HA14
HGND	11	G5	P54	12	HP03	HGND	11	G5	P54	12	HP03
HP04	9	G5	G4	10	HGND	HP04	9	G5	G4	10	HGND
HP05	7	P55	A13	8	HA12	HP05	7	P55	A13	8	HA12
HGND	5	G7	A11	6	HA10	HGND	5	G7	A11	6	HA10
HP06	3	P57	A11	4	HP05	HP06	3	P57	A11	4	HP05
HA08	1	A9	G6	2	HGND	HA08	1	A9	G6	2	HGND

original documentation started at 1, not 0 :(

Peripherals

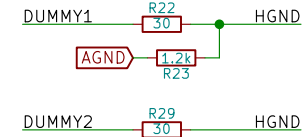


Voltage check circuit

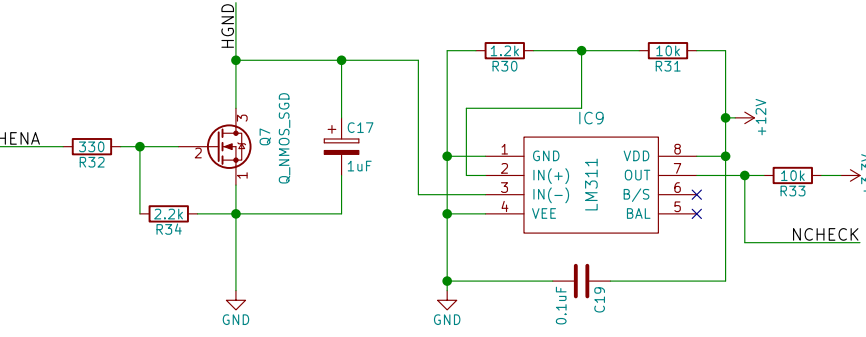


Dummy Nozzle

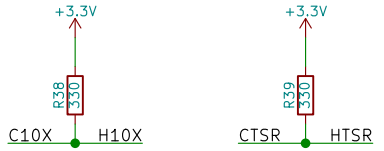
Address pulldown in HP45 is 24k
4017 has CMOS protection network
with 1-5k resistor and diodes
This totals to roughly 1.2k to AGND



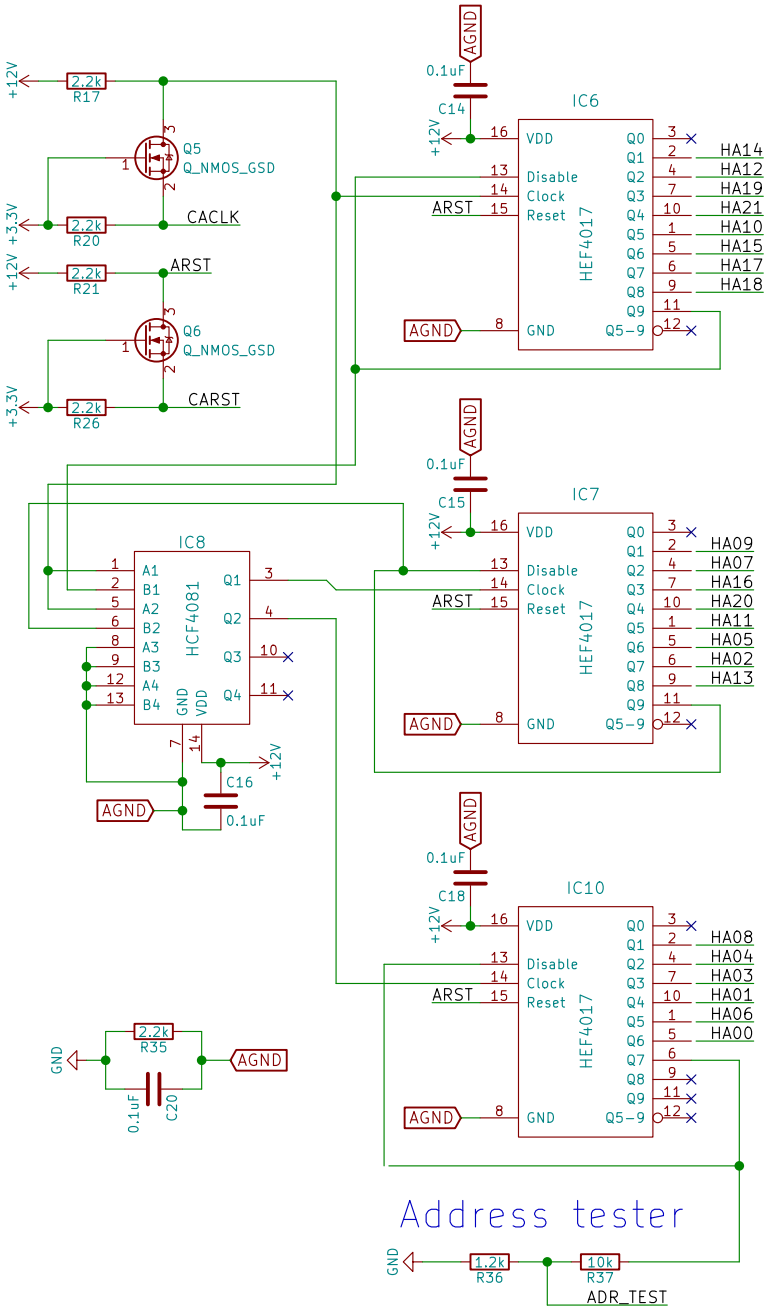
Nozzle check circuit



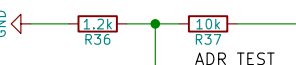
Sense resistors circuit



Address controller



Address tester



Todo:
Fuse options:
(MINISMDC110F/16-2 + 2920L500/15MR of ASMD300F/24-2)
Shift registers
Test 12V and VHD
Leds for several functions
Test address
Test primitive
Test mosfet
Dummy nozzle test
Breakout RS232
Breakout I2C
Breakout SPI
Breakout Encoder
Breakout trigger pins
Breakout I/O
Breakout power