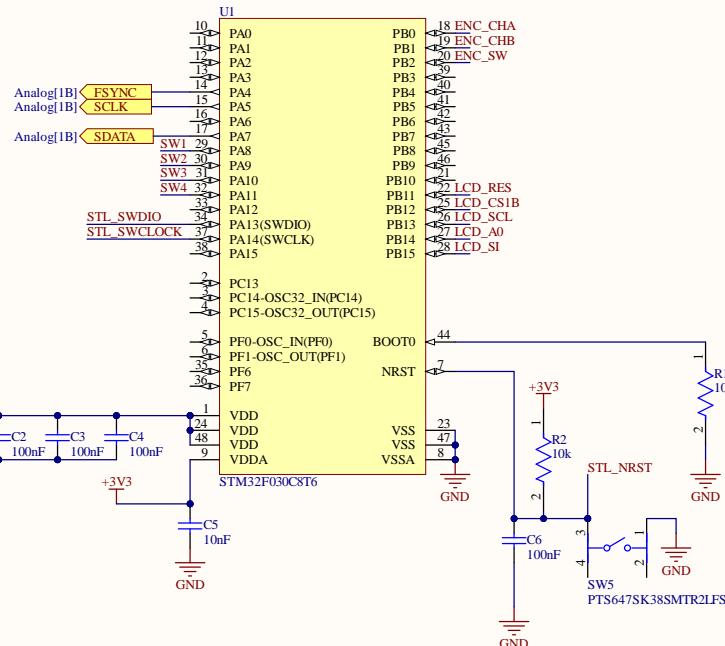
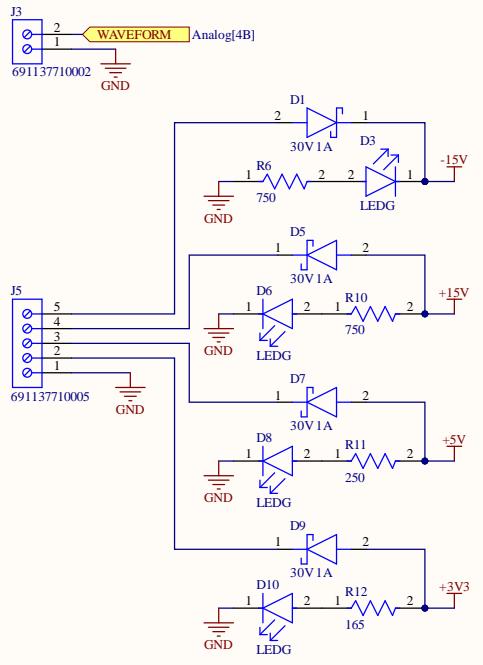


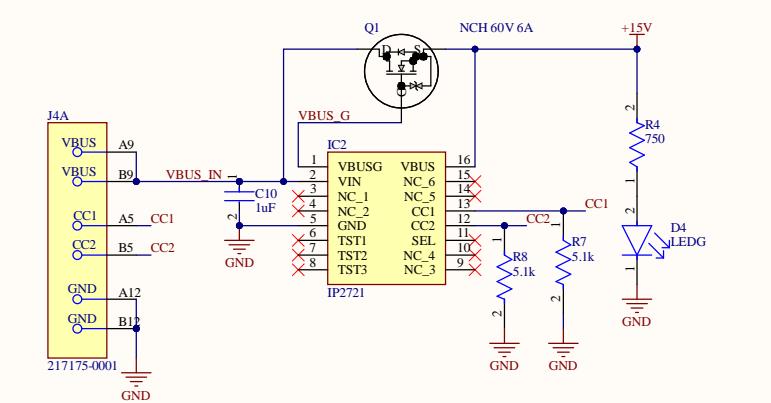
## MCU



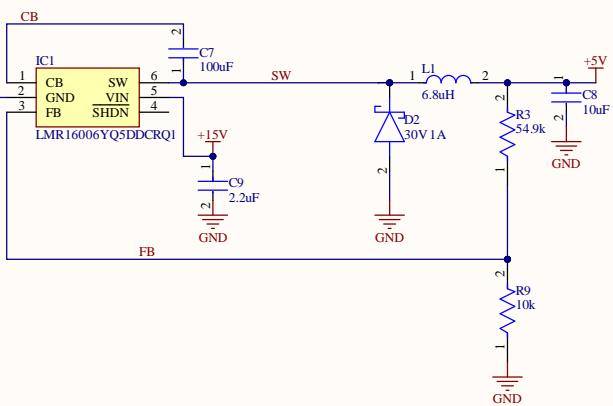
### Output Terminals



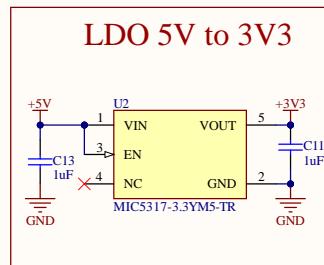
### USBC PD



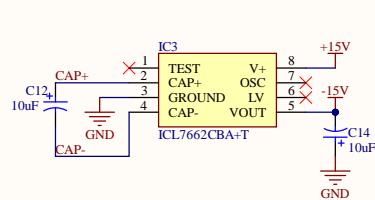
### Buck Converter 15V to 5V



### LDO 5V to 3V3



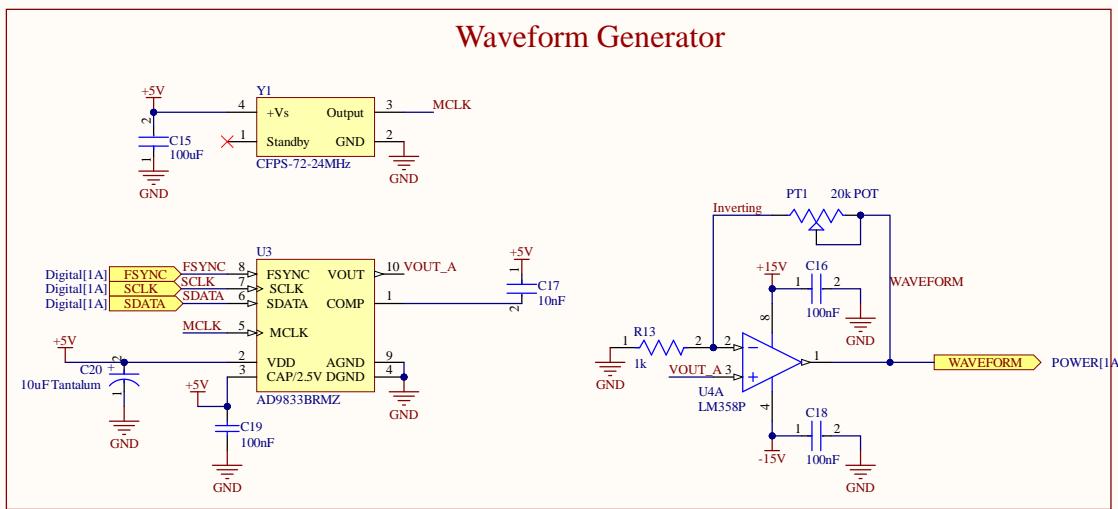
### Charge Pump 15V to -15V



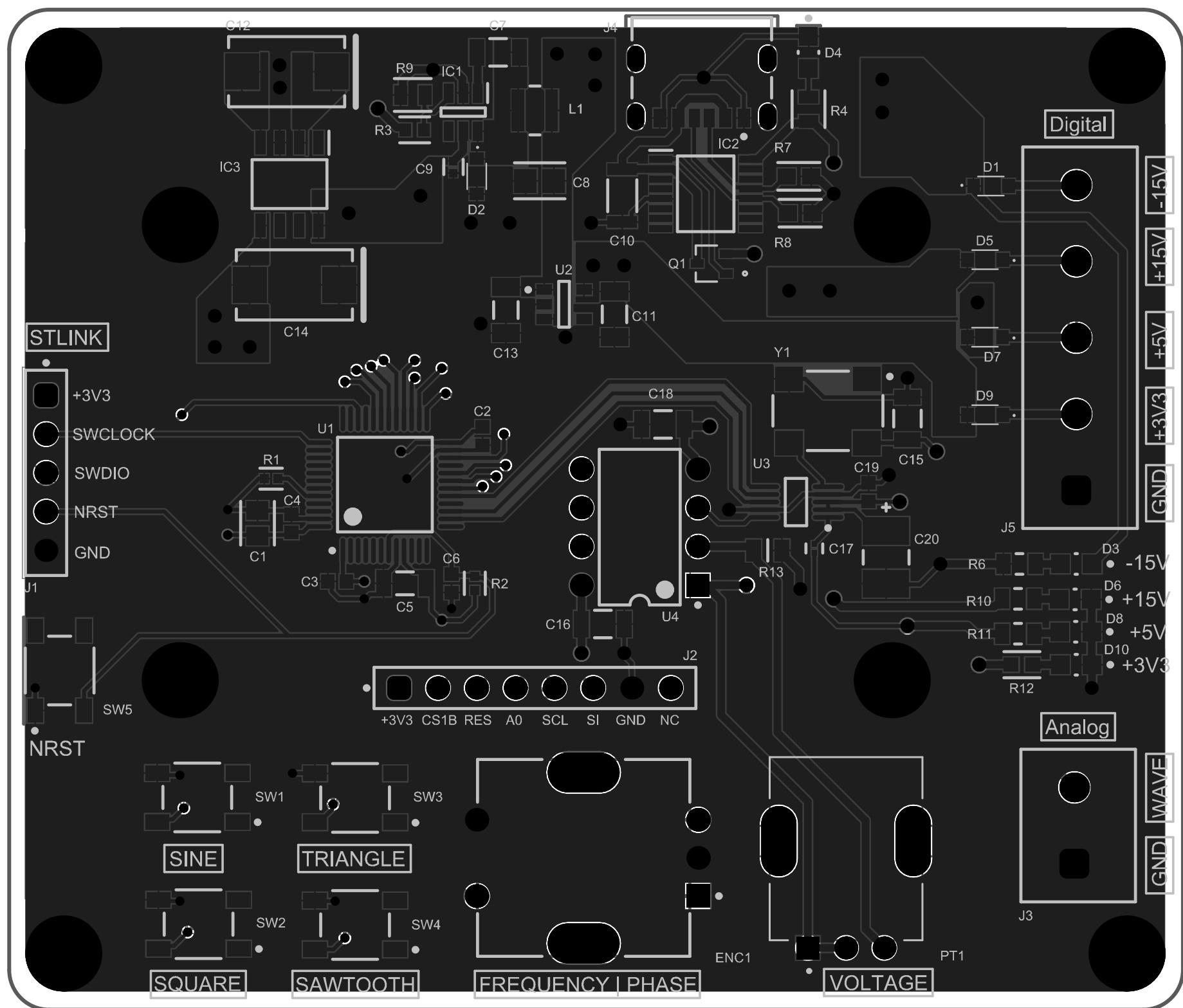
Title

Size	Number	Revision
B		
Date: 12/23/2025	Sheet of	
File: C:\Users\...\POWER.SchDoc		Drawn By:

### Waveform Generator



Title		
Size	Number	Revision
B		
Date: 12/23/2025	Sheet of	
File: C:\Users\...\Analog.SchDoc		Drawn By:



Line #	Name	Description	Designator	Revision ID	Revision State	Revision Status	Quantity	Manufacturer 1	Manufacturer Part Number 1	Manufacturer Lifecycle 1	Supplier 1	Supplier Part Number 1	Supplier Unit Price 1	Supplier Subtotal 1
4.7uF	Chip Multilayer Ceramic Capacitors for General Purpose, 0805, 4.7uF, X5R, 15%, 20%, 25V	C1			Unknown server		1	Bradford Electronics	RJRU02C2371FS					
100nF	Ceramic 100nF 100V 10% C19	C2, C3, C4, C6, C19			Unknown server		5	KEMET	C0603X104K8ACTU	Volume Production				
10nF	CAP10nF-10±45% 1206 (3216 Metric) Thickness 1.45mm SMD	C5			Unknown server		1	KEMET	C1206C103BGAC					
100uF, 100uF	C1206100uF 100uF 0.030±25 V X7R	C7, C15, C16, C18			Unknown server		4	KEMET	C1206C104KGACTU	Volume Production				
10uF	Q21 Series 0805 10uF/25V ±10% Tolerance X5R Multilayer Ceramic Chip Capacitor	C8			Unknown server		1	Samsung Electro-Mechanics	Q21A106KAYNNNE	Volume Production				
2.2uF	C0402-2.200uF C0603-0.0225uF	C9			Unknown server		1	KEMET	C0402C222G3GAC	Volume Production				
1uF	Cap 0805 1uF 100V 25V ±10% SMD 1206 +125°C Automotive TR	C10			Unknown server		1	TDK	CGASL20TR1E105M160AD	Volume Production				
1uF	CAP1uF-10±45% 1206 (3216 Metric) Thickness 1.3mm SMD	C11, C13			Unknown server		2	KYOCERA AVX	1206ZC105JATAA	Volume Production				
10uF	Tantalum Capacitor, 10uF, +/- 10%, 50V, -55 to 125 degC, 2-Pin SMD (7343-43), RoHS, Tape and Reel	C12, C14			Unknown server		2	Vishay	293D106G050E2TE3	Volume Production				
10nF	C0301 10.000uF X5R 30ppm/°C 10.00% 10V	C17			Unknown server		1	KEMET	C0301C103KGACTU	Volume Production				
10uF/Tantalum	CAP-TANT10uF 100V 25V ±10% SMD	C20			Unknown server		1	Vishay	293D106G050E2TE3	Volume Production				
30V/1A	Shottky Diode D1, D2, D5, D7, D9		Not managed				5	Ishiba	QUS10300H3FB	Volume Production				
LED	LED GREEN/CLEAR D3, D4, D6, D8, SMD	D10			Unknown server		5	Lite-On	LTSF-C170GKT	Volume Production				
PEC12R-4225F-S0024	ROTARY ENCODER MECHANICAL 24PPR	ENC1			Unknown server		1	Bourns	PEC12R-4225F-S0024	Volume Production				
LMR160061050D0HQ1	Integrated Circuit	I1			Not managed		1	Texas Instruments	LMR160061050D0HQ1	Volume Production				
IP2721	Integrated Circuit	I2			Not managed		1							
CLT662CB4-T	Integrated Circuit	C3			Not managed		1	Analog Devices	CLT662CB4-T	Volume Production				
B1305T1821		J1			Unknown server		1	Wurth Elektronik	B1305T1821					
B1305T1821		J2			Unknown server		1	Wurth Elektronik	B1305T1821					
69113771002		J3			Unknown server		1	Wurth Elektronik	69113771002					
217175-0001	CONN RCP1382.0 C6+16P SMD RA	J4			Unknown server		1	Molex	217175-0001	Volume Production				
69113771005		J5			Unknown server		1	Wurth Elektronik	69113771005					
6.8uH	Wire Wound Ferrite Inductor for Power Lines For Automotive 8.8uH ±20% ±1680 ±450mA 1212	L1			Unknown server		1	Murata	LQH3NPH168MEL	New Product				
PT01-D130K2-B203		PT1			Unknown server		1	Game Sky	PT01-D130K2-B203	Volume Production				
NCH160/6A	N+H MOSFET, 60 V, 6.0 A, 0.036 I <sub>DS</sub> @10V, SDT-322(RUF)	Q1			Not managed		1	Toshiba	SSM3G41TLLB					
10k	RES thin film, 10kΩ, 0.1%, 0.063W, 50ppm/°C, 0402	R1, R2			Unknown server		2	Venkel	TFCDR0402-16W-C-1002BT	Volume Production				
54.9k	RES thin film, 54.9kΩ, 0.25%, 0.11W, 50ppm/°C, 0603	R3			Unknown server		1	Venkel	TFCDR0503-16W-C-5492CT-1K	Volume Production				
750, 10k	Thin Film Chip Resistors Automotive Grade 10kΩ,0.1% 50ppm/°C, 0402	R4, R9			Unknown server		2	Yageo Group	AT0605BRD710KL	Volume Production				
750, 250	8.8x0.25x0.125W 0005 Thick Film Chip Resistor AEC-Q200 compliant, 0605 250 Ohms 0.25W	R6, R10, R11			Unknown server		3	Stackpole Electronics	RWQFR055TBK60	Volume Production				
5.1k	RES thin film, 5.1kΩ, 0.25%, 0.1W, 25ppm/°C, 0603	R7, R8			Unknown server		2	Venkel	TFCDR0503-10WE-5101CT-1K	Volume Production				
165	RES thin film, 6.02Ω, 0.25%, 0.1W, 25ppm/°C, 0603	R12			Unknown server		1	Venkel	TFCDR0503-10WE-6200CT	Volume Production				
1k	RES THIN FILM 1.0Ω, 0.1W, 25ppm/°C	R13			Unknown server		1	Vishay	MU08050F1001BP100	Volume Production				
PTIS475K38SMTR2LF	TAZT4.5X4.5_3.8 MM1, SM2, SM3, SM4, SM5				Unknown server		5	C&K Components	PTIS475K38SMTR2LF	Volume Production				
STM32F030C8T6	ARM Cortex-M0-32bit MCUs 64KB Flash, 32KB RAM, 32x16 I/Os, 5Pin LQFP, -40 to 85 degC, Tape and Reel	U1			Unknown server		1	STMicroelectronics	STM32F030C8T6TR	Volume Production				
MCS317-3.3YM6-TR	IC REGULATORY 3.3V 150mA SOT23-2	U2			Unknown server		1	Microchip	MCS317-3.3YM6-TR	Volume Production				
AD9833BRMZ	Low Power, 12.65 mW, 2.3 V to 5.5 V, Programmable Waveform Generator, 10-Bit, Serial, 14MHz, Tube, Pb-Free	U3			Unknown server		1	Analog Devices	AD9833BRMZ	Volume Production				
LM358P	Dual Operational Amplifier, 310.32 V, 0.05-70 degC, 8-Pin PDIP (P), RoHS, Tape and Reel	U4			Unknown server		1	Texas Instruments	LM358P	Volume Production				
CFPS-72-24MHz	831019082-WE-SPI2 Crystal Oscillator	Y1			Unknown server		1	Wurth Elektronik	831019082					