



Bearbeiter: S. Hofmann
 Tel: 040 /
 Fax: 040 / 76906856
 Email: shop@shotech.de

Bill of Materials

Datum:	8. Mai 2021
Zeit:	01:14:03
Variant:	None
Bezeichnung:	MIDI28 EV - Board
Revision:	0.1

Quantity	Designator	Footprint	Bemerkung	Value	MFT	Order-Code	Second-source	shotech
1	BU1	DC10B	DC-Buchse 30V / 0,5A (15W) 2,1mm	DC005		DC005-Gelb		000923
1	C1	CAPAE680X550N	KONDENSATOR, ALU, 35V, 47uF, 20%, 0,06R, AC-ripp 900mA	47uF/35V	Panasonic	EEH2C1V470P	3SHVP47M, SUNCON	
4	C2, C3, C7, C8	CAPMP6032X28N-CASE-C	SMD Tantalkond 10uF 16V 10% CASE-C	10uF/16V	AVX	TAJ1C106K016RNJ		
5	C4, C5, C9, C12, C13	CAPMP3529X2IN-CASE-B	SMD Tantalkond 4,7uF 20V 10% CASE-B	4,7uF/20V	AVX	TABJ475K020RNJ		
9	C6, C14, C25, C28, C30	C0805_N	SMD-Vs-Kond 100nF 50V X7R 0805	100nF	Samsung	CL21B104KBCNNNC	KEMET - C0805C104K5RAC7800	
1	C10	CAPMP7343X430N	CAPACITOR TANT, 100UF, 16V 20%	100pF	VISHAY SPRAGUE	593D107X0016E2TE3		
1	C11	C0603_N	SMD-Vs-Kond 10nF 16V 10% X7R 0603	10nF	YAGEO (PHYCOMP)	CC0603KRX7R8BB103		
2	C15, C17	C0805_N	KONDENSATOR,0805,X7R,25V,1UF	1uF/25V	AVX	08053C105K4Z2A		
1	C16	C0603_N	KC 1.0nF 0603 10% 50V X7R	1nF	Samsung Electro-Mechanics	CL10B102KBNNNNC		000800
1	C18	C0805_N	080547nF/50V/10%/X7R	47nF	YAGEO	CC0805KRX7R9BB473		001923
4	C19, C21, C24, C29	CAP_Radial_5MM	100nF/50V/±10%/X7R/RM 5.08	100nF/50V	Vishay / BC Components	K104K15X7RF53H5	C322C104K5R5TA - shotech	001347
1	C20	CAP_Radial_5MM_7k2_2k5	Folienkondensator, 100nF, 63V, RM5, 10%	100nF	KEMET	R82DC3100AA50K		001682
2	C22, C23	CAP_Radial_5MM	Keramik-Vielschichtkondensator MLCC - bedrahtet 22pF 50volts COG	22pF	TDK	FG28C0G1H220JNT06		
2	C26, C27	C0603_N	5% Radial KONDENSATOR, 0603, NP0, 50V, 22PF, 1%, 30ppm	22pF	MULTICOMP	MCCA000985		
1	C31	C0805_N		100pF	Samsung			
1	D1	DO-214AB (SMC)	DIODE SCHOTTKY,3A, 60V, SMD,DO-214AB (SMC)	SS36	Taiwan Semiconductor	SS36 V6G		000395
1	D2, D3	LEDM3528X185N	LEUCHTDIODE SMT KLAR SUPERHELL HE ROT	LS1676G1	OSRAM	LS1676-Q1R2-1-1-Z		
1	D4	LEDM3528X185N	SMD-LED Refl grün 37mcd 120° PLCC	EL67-21SYGC/S53	EVERLIGHT	EL67-21SYGC/S53		
1	D5	LEDM3528X185N	SMD-LED Refl gelb 56mcd 120° PLCC	EL67-21UYC/S53	EVERLIGHT	EL67-21UYC/S53		
1	D6	DO-35	Dioden (Allzweck, Leistung, Schaltung) Vr/75V Iq/150mA T/R	1N4148	On Semiconductors	1N4148TR		001594
1	FB1	F0805_H_1.1_N	MPZ2012 330R 2.5A 25% Rdc=0,05R, 0805	MPZ2012S331AT	TDK	MPZ2012S331AT		
2	FB2, FB4	F0805_H_1.1_N	FERRIT, SMD 600OHM, 0805, 2A	742792040	WURTH ELEKTRONIK	742792040	PBY201209T-601Y-N - YAGEO	
1	FB3	0805_NC	FERRIT, SMD 220OHM, 0805, 2A, Rdc=0,045R	BLM21PG221SN1D	Murata	BLM21PG221SN1D		000331
2	FB5, FB6	F0805_-W	Ferrit-Bad 0805 1000 OHM 1A 100MHz 0,3R	742792096	Wurth Elektronik	742792096	000184	
1	J1	CON-A-USB5B	USB-Buchse B print 90°	USB-B	Assmann WSW	A-USB5B		001618
2	J2, J3	SDF-50J	DIN, 5Pjack, rt, throughhole, w/shielding	SDF-50J	CUI	SDF-50J		
3	L1, L2, L3	IND_NFE31	IND-Filter, NFE31P 2200pF +/-50% 25V 6A	NFE31PT222ZIE9	Murata	NFE31PT222ZIE9L		
1	MOD1	PDIP28	32 Polyphony Sound Generator, PCM,ADPCM	MIDI28-Modul	shotech	MIDI28-Modul		001485
1	OP1	P008	Optok-Darf >2.5kV 7V 60mA DIP8	6N138	Vishay	6N138		
13	PP1, PP2, PP3, PP4, PP5, PP6, PP7, PP8, PP9, PP10, PP11, PP12, PP13	VERO_Testpoint_Blue	Prüfpunkt					
2	Q1, Q2	SOT95P245X130-3N	Bipolarer Transistor, pre-biased/digital, BRT, Einfach NPN, 50 V, 100 mA, 4,7 kohm, 4,7 kohm	MMUN2232LT1G	On-Semiconductor	MMUN2232LT1G		001835
1	Q3	HC494H_SMX	Quarze +/-20ppm 7,3728MHz FUNDAMENTAL	7,3728MHz	ABRACON	ABL7-3.728MHZ-B2		
1	Q4	SOT95P230X110-3N	N-Channel 25V, 680 mA, Rdson 60mR @ 2,7V, 450mA @ 4,5V	FDV303N	On-Semiconductor	FDV303N		000289
3	R1, R2, R27	R0805_N	WIDERST,0805,1K,1%,SCHWEFEL-RESIST	1k	MULTICOMP	MCSR08X1001FTL		
2	R3, R4	R0805_N	RESISTOR, 220R, 0,125W, 1%, 0805, SMD	220R	frei			
1	R5	R0603_N	WIDERSTAND, 0603, 2,74k, 1%	2,74k	Yageo	RC0603FR-072K74L		000943
2	R6, R7	RES10-7.8X2.8 - 1k	Metallisch, 0207 1/4W 1%	1k	frei	RMGK001		001235
8	R8, R10, R11, R18, R19, R20, R21, R22	R0805_N	SMD-Dickschicht 0805 1/8W 1% 10K	10k	VISHAY DRALORIC	CRCV080510K0FKEA		
1	R9	C0603_N	WIDERSTAND, 0603, 0R	0R	VISHAY DRALORIC			
2	R12, R16	RES10-7.8X2.8 - 10k	WIDERSTAND, 207, axial, 1%	10k	frei	RMGK010		001233
1	R13	RES10-7.8X2.8	WIDERSTAND, 207, axial, 1%	68k	frei	RMGE068		
1	R14	RES10-7.8X2.8 - 1k	Metallisch, 0207 1/4W 1%	130k	frei			
2	R15, R17	R0805	SMD-Dickschicht 0805 1/8W 1% 10K	10k	VISHAY DRALORIC	CRCV080510K0FKEA		
1	R23	RES10-7.8X2.8 - 220R	WIDERSTAND, 207, axial, 1%	220R	frei	RMGE220		001239
1	R24	RES10-7.8X2.8	WIDERSTAND, 207, axial, 1%	280R				001677
1	R25, R26	RES10-7.8X2.8	WIDERSTAND, 207, 1%	100R				001678
1	R28	R0805_N	WIDERST,0805,47k,1%,SCHWEFEL-RESIST	47k	MULTICOMP	MCSR08X4702FTL		
3	R29, R30, R31	RES6.5-3.4X1.9	WIDERSTAND, 204, axial, 1%	2k2	frei			001696
2	SW1, SW2	TMG-325	SMD-Taster 1NO 12V 50mA 4,3mm 130gf	Tact Switch	China	Product ID: 1813303037		
1	U1	SOT89-150P410X160-3N	500mA TinyPower™ LDO 3.3V	HT7833	Holtek	HT7833-SOT89	XC6214P332PR Famell - 1698269	000341
1	U2	SOT230P700X180-4N	2A, LDO 3.3V, High PSRR : 70dB at 1kHz, SOT23 300mA, HIGH SPEED, EXTREMELY LOW NOISE CMOS LDO REGULATOR	AIC1221-33GY3TR	AIC	AIC1221-33GY3TR	MIC5209-3.6YS	001312
1	U3	SOT95P280X150-3N	1500mW Audio Power Amp with Shutdown	AP2125N-3.3	Diodes	AP2125N-3.3TRG1		000930
1	U4	SOIC127P600X175_HS-9N	USB-RS232-Bridge TTL , SC16	HT82V73A	Holtek	HT82V73A/BSOP	H182V739 ohne EP - 001771	
1	U5	SOIC127P600X175-18N	2P3	CH340G	WCH	CH340G		000849
1	U6	2P3	ATimesg328P	A1Timeg328P	Atmel		ATMEGA 48PA-PU	001319
1	U7	SOIC127P790X216-8N	Serial Flash 64Mbit	W25O64FVSSIG	Winbond	W25O64FVSSIG		
1	U8	SOT95P280X145-5N	SINGLE BUS Invertet BUFFER GATE SOT23-5	SN74LVC1G240	Texas Instruments	SN74LVC1G240DBVR		
1	U9	SOT95P280X145-5N	SINGLE BUS BUFFER GATE SOT23-5	74LVC1G125	Texas Instruments	SN74LVC1G125DBVR		
1	W1	JP2	Jumper 3pin	Jumper 3pin	frei			001564
1	W2	JP2	Jumper 3pin	Jumper 3pin	frei			001564
1	W3	JP2	Jumper 3pin	Jumper 3pin	frei			001564
1	W4	JP2	Jumper 3pin	Jumper 3pin	frei			001564
2	X1, X2	AK500/2	AR-Klemmen 250V 2pol grau	ARK500/2	PTR-Messtechnik	ARK500/2, AK500/2DS-5,0 V/GRAU		001576
1	X3	ML6						
1	Y1	OSCC320X250X70N	Quarz -SMD 12,000MHz 3.2x2.5mm, 20pF, 30R, 10ppm	12,000MHz	China	627870671 - X32FG20QSA12000		