



# Fox Delta

Amateur Radio Projects & Kits

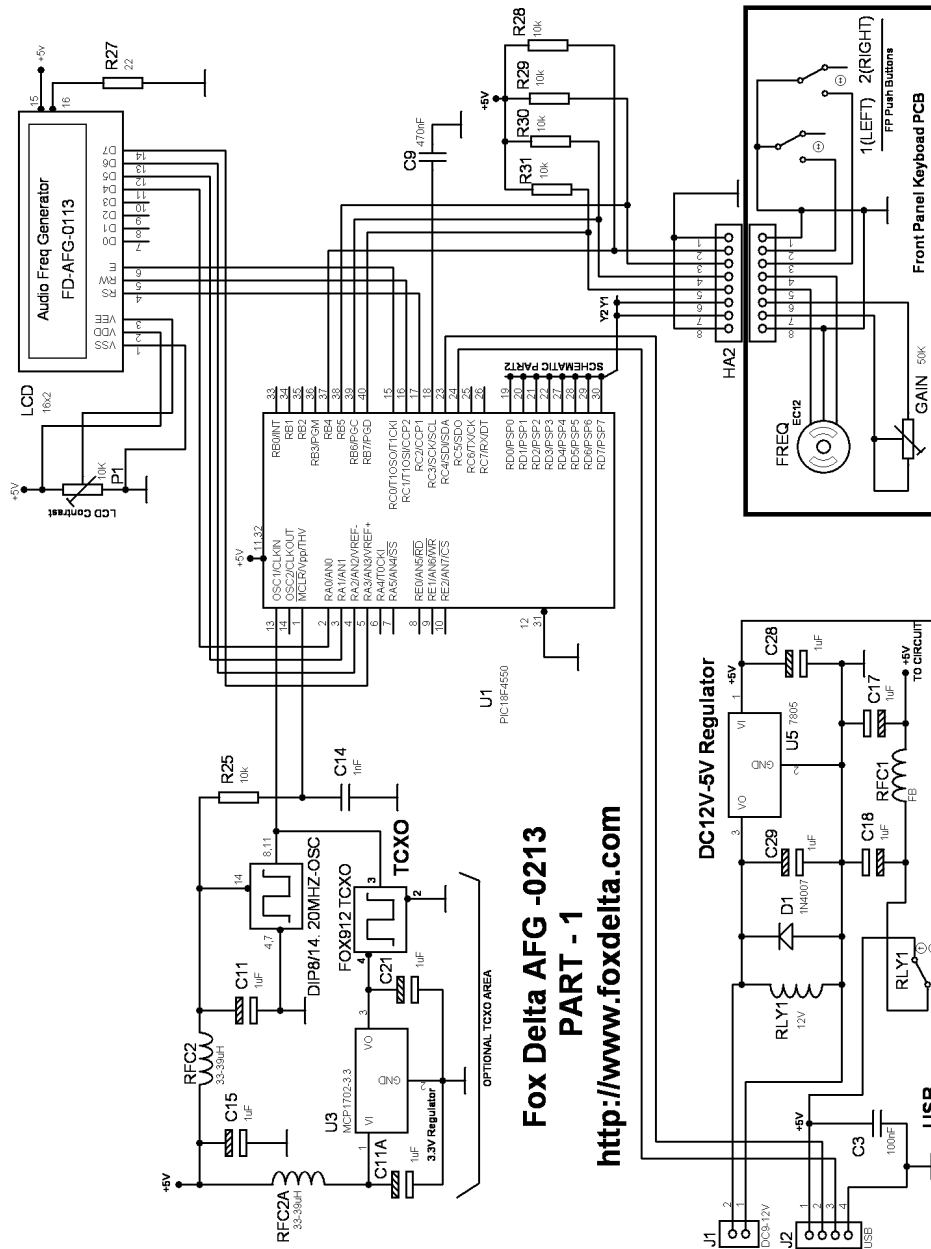
FD- AFG-0213

## AFG-0213 Schematic and Parts List: PIC18F4550 Audio Frequency Generator

**Project & Design by:**

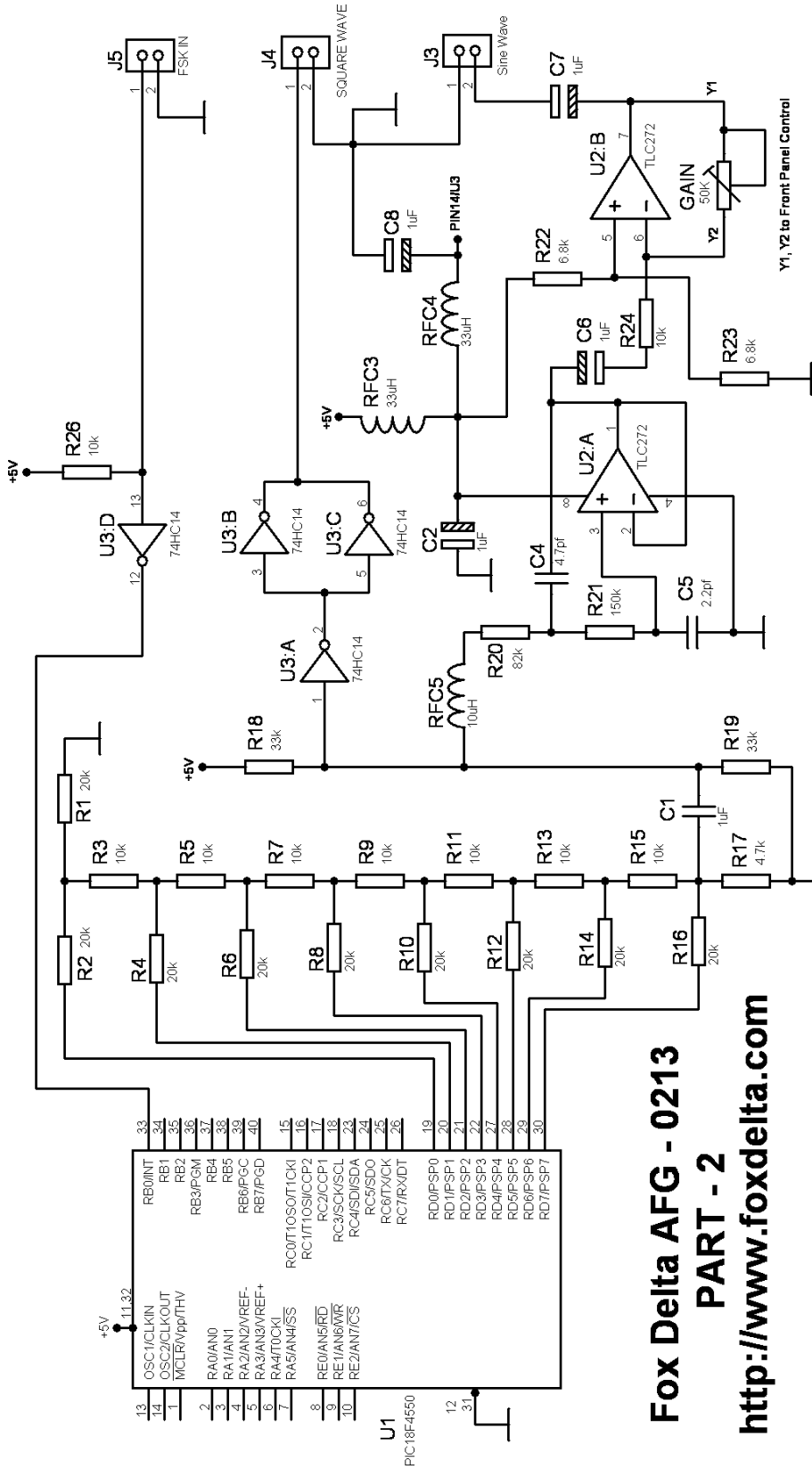
Tony / I2TZK, Frank / K7SFN, Mirco / IK2MKM, Dinesh / VU2FD

### AFG 0213 Schematic Part 1:



**Project & Design by: Antonio Alfinito / I2TZK, Dinesh Gajjar / VU2FD, Frank Dziurda / K7SFN**

AFG 0213 Schematic Part 2:



**Fox Delta AFG - 0213**  
**PART - 2**  
<http://www.foxdelta.com>

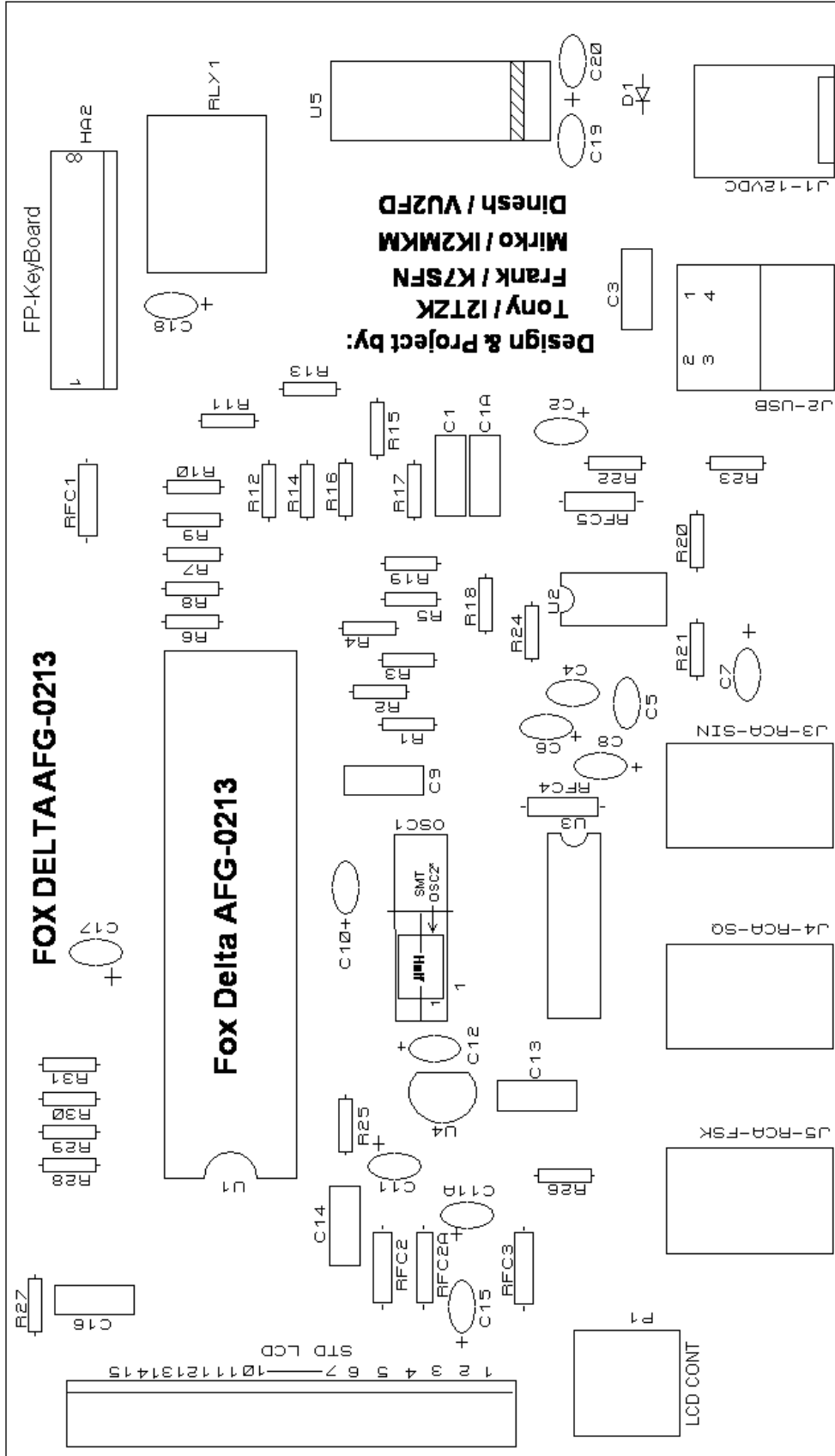
Project & Design by: Tony / I2TZK, Dinesh / VU2FD, Frank / K7SFN, Mirco / IK2MKM

## AFG-0213 KIT PARTS LIST

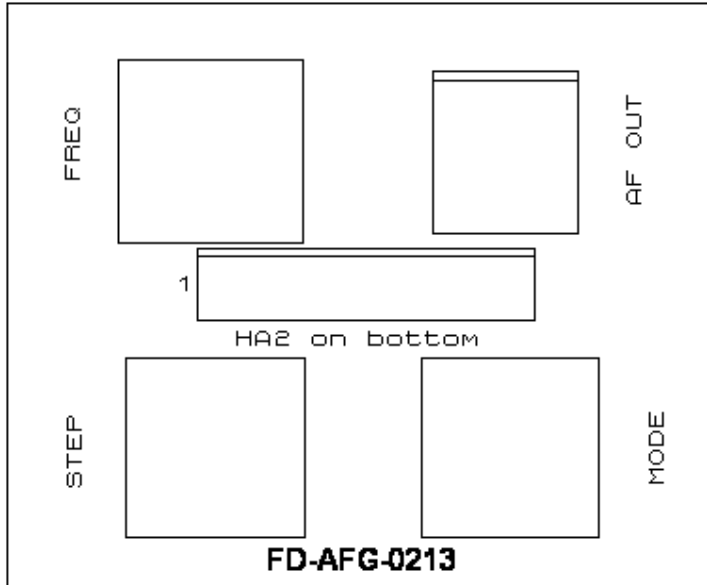
Qty	Part ID	Part Details
1	U1	PIC18F4550 DIP40
1	U2	TLC277 DIP8
1	U3	74HC14 DIP14
1	40DIP	IC Socket
1	14DIP	IC Socket
1	8DIP	IC Socket
1	U5	7805
1	J1	DC 12V Connector R/A
1	J2	USB Connector R/A
3	J3, 4, 5	Audio Out RCA Connectors
1	D1	1N4148
1	RLY1	OEN 42 – 12V Coil
1	P1	10K Preset
2+1	SIL16+Ribbon	LCD Connectors and Ribbon
2+1	SIL8+Ribbon	Keyboard Connectors and Ribbon
4	RFC1, 2, 3, 4	Ferrite Bead (RFC2A Option)
1	RFC5	10uH RFC
1	OSC	20MHZ Oscillator
1	HW Set	HW: Nuts / Bolts for LCD/KB
2	Push Buttons	12mm
1	Encoder	EC12 Encoder
1	AF Gain Control	10K P090
1	Case	Free Metal Case
1	AFG-0213 PCB	Main PCB
1	Keyboard PCB	Keyboard PCB
1	LCD	2X16 with Backlight
<b>All Resistors ¼ W 5%</b>		
7	R22, 25, 26, 28, 29, 30, 31,	10K
1	R27	22 Ohms
2	R19, 18	33K
1	R20	82K
1	R21	150K
2	R24, 23	6.8K
<b>Resistors ¼ W 1%</b>		
9	R1, 2, 4, 6, 8, 10, 12, 14, 16	20K 1%
7	R3, 5, 7, 9, 11, 13, 15,	10K 1%
1	R17	4.7K 1%
<b>Capacitors</b>		
2	C6, 7	10uF Tantalum
1	C5	2.2pf Ceramic
1	C4	4.7of Ceramic
3	C1, 1A, 9	0.47uF Poly
4	C16, 14, 13, 3	0.1uF Poly
9	C18, 2, 8, 10, 17, 11, 15, 19, 20	1uF Tantalum

X = Not part of this kit: U4, RFC2A, C11A,C12,

Audio Frequency Generator Main Board Silk: AFG-0213



## AFG 0213 Keyboard PCB Silk:



### Keyboard Parts:

1. Freq = EC12 Encoder
2. AF OUT = 10K POT
3. Step/Mode = 12mm Push buttons

HA2 = SIL8 Connector (Install SIL Connector on solder side)

73s/Dinesh Gajjar

22<sup>nd</sup> January 2013: This Doc Revised on 15<sup>th</sup> January 2016

For more details, please visit Project Page: <http://www.foxdelta.com>