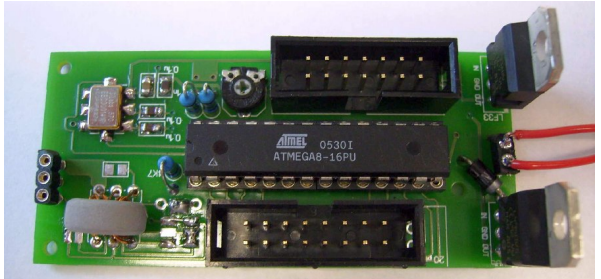


PA0KLT 3.5 Mhz – 1417 Mhz RF Synthesizer Kit

The "standalone" PAOKLT VFO Synthesizer kit uses the Silicon Labs Si570 XO Low noise Synthesizer chip controlled by a Atmel Mega 88 Controller with connections to an external 16 or 20 character x 2 lines LCD Display and a 96 step rotary encoder for tuning.



Frequency coverage is from 3.5 MHz up to 1417 MHz, depending on the type/grade of Si570 device fitted. The minimum tuning step is selectable from 1 Hz, 10Hz, 100 Hz, 1kHz upwards.

The Si571 chip is supported by the firmware allowing for FM Modulation.

The design offers a Smooth Tuning like in a high quality Analogue VFO – There is no interference when the frequency of the Si570 is tuned within +/- 3500 ppm from last Coarse Frequency command executed. Tuning speed is 96 steps for each turn of the tuning control knob. Kit suitable for constructors with some previous kit assembly experience. Some components like capacitors (0805mm) and Si570 are Surface Mount Devices

Up to **32 frequencies** may be stored in **Memory** in two banks (Memory A and Memory B)

- Power Supply voltage: 8-12V or from single +5V supply with modification
- Current consumption 125mA (20mA drawn by LCB backlight)
- Provision of RF output transformer options on PCB
- Support industry standard LCD display 2 x 16 to 2x20 characters
- LCD module supplied has built-in backlight - size 73mm x 36mm
- PCB size: 70mm x 34mm - Tin plated screen box available.
- Firmware written in Assembler and supports following features:
- Programmable IF Offset, minimum and maximum frequency and SI570 I2C address
- Si571 Chip with FM Modulation supported in firmware - but requires hardware mod



Orders accepted via Paypal to: | sdrkits@gmail.com

Jan Verduyn GOBBL – www.SDR-Kits.net – email: sdrkits@gmail.com
14 Ragleth Grove, Trowbridge, Wilts, BA14-7LE, England