Simple "PIC-KEY"

Credit Line: http://rx9cbi.narod.ru/PICKey.htm

This simple "PIC- KEY" provides sending Morse Code in two modes. First, that was written in the memory (four memory cluster), second, with hand jambic manipulator.

Specification:

Supply Voltage: +7... 17-Volts.
Consumption current: 5... 7 mA.
Keying speed could be adjusted up to 400 WPM.
Capacity of each memory cluster up to 60 letters (depends on the length of the letters and formatting the text).
Time of storage information in the memory- - more than 10 years (as specification on the Parts mentioned).
Rewriting resource: more than 100000 times (as specification on the Parts mentioned).
Ratio "dot- gap- dash" is 3 or 5 dots. Gap more then 5 dots is wrote 5-dots.
Used jambic mode A. (The mode is mostly used in Russia).

Mike Kislinsky, RX9CBI

Figure 1 shows the schematic of Simple "PIC-KEY"

Functions of the Parts.

DA1: 5V- stabilizer;
DD1: Microcontroller;
DD2: Reprogrammable READ-ONLY Memory, capacity 2048 bits:
DA2: Clock generator for adjusting keying speed.
R14, C11: Set Clock frequency for the DD1 (near 400-500-kHz, in the schematic WDT set in "OFF").
VD1, VD2: Show mode of the key.

Operation

Tapping buttons S1… S4 turn on the reproduction of the Data from Cluster.

Tapping of any buttons (at this case begin reproduction from the taped button) or pressing the key do ending of reproduction
Holding buttons S1… S4 more the 1 second permits the write to the Cluster.
Tapping any buttons does the end of the writing.

First variant of the key was not intended for high speed, however, LZ2ZK (WITH MY LITTLE HELP) made increasing of the speed up to 400-WPM (that is nice for meteoric QSO).

73! Mike, RX9CBI

RX9CBI
Mike Kislinsky. Ekaterinburg, Russia.
Very Old Projects Shack.
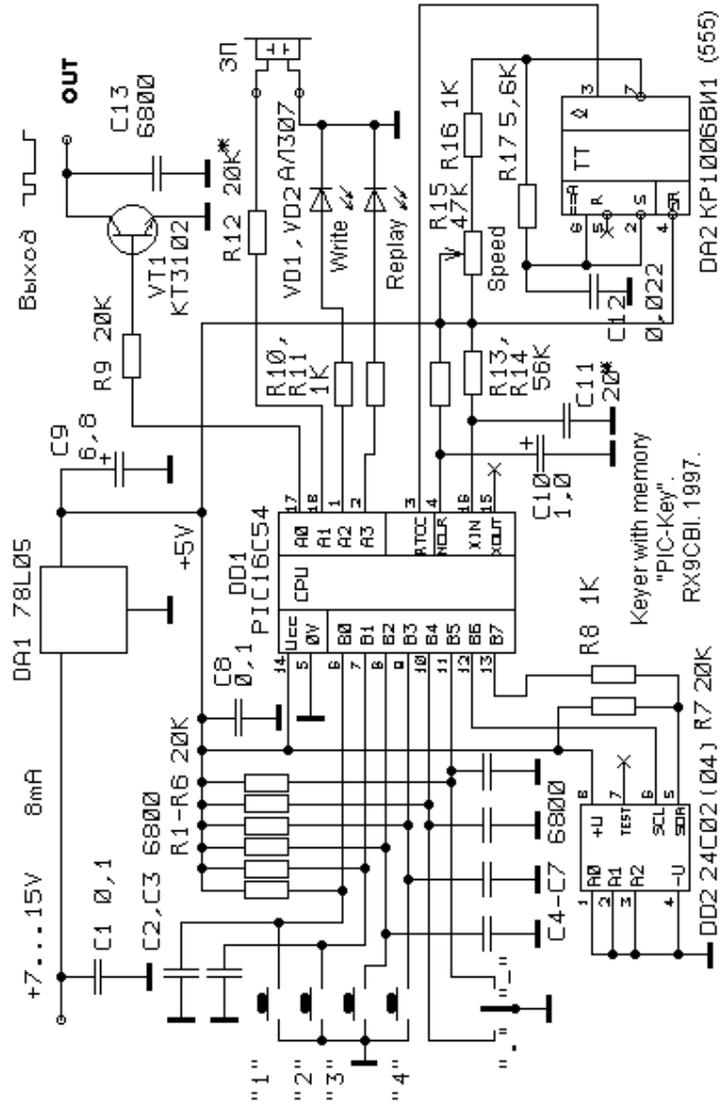
http://rx9cbi.narod.ru

Figure 1 Schematic of Simple "PIC-KEY"

Home Made Manipulator
Credit Line:
http://foto.cqham.ru/showphoto.php?photo=112