COMING ATTRACTIONS

SERIAL DATA/PLL FREQUENCY SYNTHESIZERS

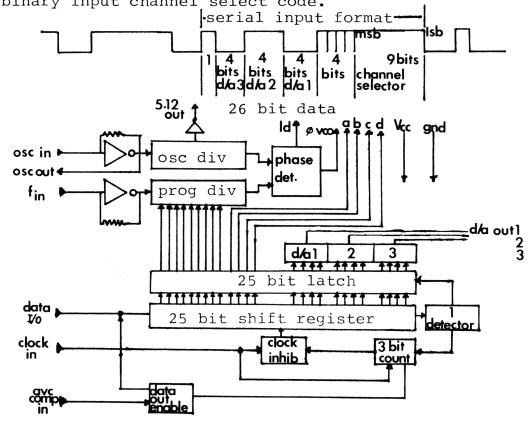
These are already in use in programmable scanners and will probably be seen in CB transceivers in the not too distant future. Probably on the drawing boards right now, as the manufacturers are hassled by you know who about you know what. Anyway, the serial data designs could prove to be very interesting indeed. It is something new, but don't worry - we will guide you through them just as we have through conventional PLL's. Now to the technical stuff.

An example of a currently available serial data chip is the MM55122 manufactured by National Semiconductor. It is CMOS, operates from a single power supply, and features an on-chip oscillator, a 2^{10} divider chain, phase detectors and binary input programmable divide. So far, not much difference. However, channel selection is accomplished by a 9-bit serial code included in a 26-bit data string inputed to the data I/O pin. The 26-bit data consists of the following.

Logical 1 sync bit

Three 4-bit data to generate analog outputs for such things as squelch, AVC, Volume, etc.

4 control bits that are latched and externally available at pins A-D. 9-bit binary input channel select code.



More on these devices as they appear on the market!