## **Circuit Description**

(With reference to Circuit Diagram and Block Diagram)

The circuit of module 49019TX is basically divided in four parts:

- 1. Oscillator (carrier frequency)
- 2. Modulation of signal
- 3. RF amplifier
- 4. Output circuit with antenna

The Oscillator unit produces an carrier frequency of 49,86 MHz by using a quartz crystal, which is coupled via a transistor.

The modulation is gained by an IC, being operated by the user trough the switches.

Carrier and modulated signal are superposed at the base of a transistor, which amplifies the modulated carrier.

The output circuit, being realised by capacitors and inductances matches the RF amplifier to the antenna providing RF-power being transferred to the antenna.