The LuViva RFID circuit is a multi-protocol RFID read/write circuit for use with industry standard 13.56 MHz RFID tags. The RFID circuit is energized intermittently as required by the instrument to read tags as part of the measurement sequence. The transmitter is used to interrogate a tag applied to the LuViva Cervical Guide to determine its authenticity and use status prior to conducting a scan of the target tissue. The external antenna is a small loop antenna resonant at 13.56 MHz. the voltage transfer between the reader and tag is accomplished via inductive coupling between the reader antenna coil and the tag antenna coil. The reader generates an RF field around its antenna. The RF field give the tag power, a clock and a way to transfer data to the reader. The reader's RF field is modulated to send a command to a tag. The tag modulates the reader's RF field and the reader can detect this. The modulation depth operates at three modulation depths 10%, 100% and 14%.