

Synthesised Crystal Controlled

FM Tuner / Modulator

- VSM91T



- The VSM91T is a combined FM radio tuner and double sideband TV modulator in one compact unit. When the unit is fed with an FM aerial signal, with the RF output being fed into a CATV network prior to the headend amplifiers the selected radio channel can be heard through the loudspeaker of a TV on the network.
- The vision carrier may be left with no video modulation or a video source may be inserted, using, for example, the VTG97 Video Text Generator, which can provide an information service for hotels, hospitals, etc.
- The unit is particularly suited to hotel installations; Using a VSM91T per channel enables all required radio programmes to be received on the bedroom TV set without the need for a separate radio tuner or expensive wired systems.
- The VSM91T uses surface mount components in the design and manufacturing to provide a modulator that may be switched to any UHF TV channel (from 21 to 68).
- High frequency accuracy and stability is achieved by using a crystal referenced, frequency synthesiser, which operates under the control of a microprocessor.
- The unit is only 1.75" high (45mm) and is designed for rack mounting., where it takes up 1U of rack space. The unit may also be wall mounted using the two fixing holes provided or left free-standing.

• Specification

- Tuner range: Full FM band, 88 to 108 MHz, set on rear panel.
- RF output: > 34 dBmV rms of peak carrier into 75 Ω .
- Input connector: 75 Ω BNC 'F' type, input signal > 100 mV.
- Video input level: 0.5 to 2 V composite video. (Optional)
- Sound to vision spacing: 4.5, 5.5 or 6 MHz available.
- Shaping: Double sideband output, sound carrier level set down 15 dB.
- Vision stability: Better than ± 30 kHz between -10 & +40 $^{\circ}$ C.
- Controls: Video level: Sets video modulation depth.
Sound level: Sets sound deviation of tuner.
- Power: 200-240 V, 50-60 Hz at 6 VA, IEC connector.
- Mounting: 19" standard rack mounting or wall mounting.
- Dimensions: 483 mm \times 160 mm \times 45 mm (1U).
- Weight: 1.5 kg.