



TM-800 A2/NICAM STEREO TV MODULATOR

OPERATING INSTRUCTIONS

TM-800 is a stereo/multistandard mono modulator, which can be used on the adjacent channels (VSB modulation) from S2 to E69.

TM-800 series consist of optionally one, two or three VSB modulators, common control board and power supply.



INSTALLATION

The modulator is designed for standard 19" rack mounting. Sufficient air current must pass around the unit. Do not cover the air passage holes.

Video signal is connected to **VIDEO IN** connector and audio signals in **AUDIO IN** connectors. **RF OUT 1 ... RF OUT 3** are connected to the network via a tap or RF combiner.

PROGRAMMING

Note! There can be interference in the picture during programming. The interference disappears after programming is ready.

To open the locking code press first **SELECT** and then **UP** and **DOWN** at the same time. Firstly release **UP** and **DOWN** and then **SELECT**. The display lights up (**CH 1**).

If it is a dual or triple modulator system, select a modulator unit (**CH 1 ... CH 3**) with the **UP** or **DOWN** push button and press then **SELECT**.

If it a single modulator, press **SELECT** (within 10 seconds) to adjust the parameters.

Reading on the display is the output frequency.

The frequency can be changed by push buttons **UP** and **DOWN**. The parameters are stored with the **SELECT** push button.

Move to the next adjustable parameter by pressing **SELECT** push button. Next function must be selected during 15 seconds, otherwise the display, except LOCK led, is cleared and the modulator is locked.

Select the required value by **UP** and **DOWN** push buttons.

All features can be adjusted as above. All programmable functions are shown in the Table 1.

| ADJUSTABLE FEATURE | DISPLAY | EXPLAIN |
|-----------------------|--|--|
| Output frequency | 112.25...855.25 | Output frequency of TM-200 |
| Output level | L 0...-20 | Attenuator 0...20 dB |
| Audio mode | StErE mono | A2 or NICAM stereo mono |
| Transmission standard | nor b nor i nor L nor d nor n | B/G-standard I-standard *) L-standard *) D/K-standard *) M/N-standard *) |
| Test signal | t on...oFF | Test signal on/off. |

Table 1.

*) Deviation and I-, L-, D/K-, M/N-standards are available only in **mono** mode.

TECHNICAL SPECIFICATION

RF

| | | |
|------------------------|----------|---|
| Modulation | | AM VSB |
| Number of modulators | TM-818 | 1 |
| | TM-828 | 2 |
| | TM-838 | 3 |
| Output frequency range | | 112,25...855,25 MHz S2 ... E69 |
| Transmission standard | | B/G (A2 and Nicam audio), I, L, D/K, M/N (mono) |
| Output level | TM-818 | 105 dB μ V, adjustable -20dB/75ohm |
| | TM-828 | 105 dB μ V, adjustable -20dB/75ohm |
| | TM-838 | 105 dB μ V, adjustable -20dB/75ohm |
| Spurious products | | \leq 60dbc |
| C/N | in-band | 59 dB with 115 dBuV output level |
| | out-band | 69 dB with 115 dBuV output level |
| S/N | | 55 dB |
| Output impedance | | 75 ohm |

Video

| | |
|---------------------|---------------------|
| Nominal input level | 1,0 V _{pp} |
| Input impedance | 75 ohm |

Audio

| | |
|---------------------|----------------------|
| Nominal input level | 0,5 V _{rms} |
| Input impedance | 4,7 kohm |

General

| | |
|-----------------------|----------------------|
| Power | 100-240VAC, 50-60 Hz |
| Operating temperature | -10...+50 °C |
| Dimensions | 19", 1RU |
| Weight | TM-818 2,5 kg |
| | TM-828 2,7 kg |
| | TM-838 2,9 kg |