# ok2bwn RADIO SPORTS EQUIPMENT

#### AUTOMATIC HI-TECH HF/VHF ARDF TRANSMITTER

# CONTEST 2012

The CONTEST2012 is PLL synthesized, fully programmable HF / VHF ARDF transmitter designed for any level of ARDF competition or training (advanced version of the CONTEST2007). The possibility of frequency, transmitted code, keying speed and timing schedule adjustments opens the new area in the ARDF competitions and allows using more transmitters on different frequencies. All parameters are widely adjustable via user-friendly menu on the detachable control panel while the transmitter itself is constructed as a high resistant, waterproof unit.



After all parameters are set, the operation is very easy: just install the antenna, plug in the connector and transmitter automatically recognizes the proper band and starts operation. Just one button click and internal automatic antenna tuner will provide optimum matching of the HF antenna.

The transmitter has no "turned off" state. If no accessories (antenna, control panel, charger etc.) is connected, the transmitter drains almost no energy (only preserving settings and time), but it is always ready for operation.

High capacity, lightweight LI-lon accumulator provides enough capacity even for longer competitions.

## **FEATURES:**

- PLL synthesizer provides 16 channels in 3,5 MHz band and 16 channels in 144 MHz band
- Output power adjustable in 2 levels 3 W or 1 W
- 9 various timing schedules
- Various transmitted codes
- Keying speed adjustable in 4 steps
- Automatic band recognition
- Internal accumulator protection against deep discharge
- Built-in automatic charger
- Built.in automatic antenna tuner
- Accumulator voltage telemetrically indicated at the end of every relation
- In-system programming port firmware upgradeable
- Rugged, waterproof aluminum house

#### **SPECIFICATIONS**

**GENERAL** 

Power supply: built-in Li-Ion accumulator 7,4V/5Ah

Charger: built-in automatic, supplied from any 12V (10...16V) DC source

Operating temperature range: -10 ...+ 60°C Storage temperature range: -20 ...+ 60°C

Covering: IP65

Dimensions: 80 (W) x 45(H) x 220 (D) mm (projections not included)

Weight: 700 g

Operation period at fully charged accumulator: REL CONT

POWER HI 40 hrs 8 hrs

POWER LO 90 hrs 18 hrs

**TRANSMITTER 3.5 MHz** 

Carrier frequency: 16 channels (3,51 ... 3,66 MHz)

Mode: CW

Output RF power @ 50 ohm: HIGH: 3 W, LOW: 1 W Spurious emissions: less than -70 dB built-in automatic

Antenna tunger range: 30...600 ohm unbalanced

Antenna: 8 m vertical wire+ 8 m counterpoise

**TRANSMITTER 144 MHz** 

Carrier frequency: 16 channels (144,2 ... 145,5 MHz)
Mode: A2A, AM 75%, keyed carrier
Output RF power @ 50 ohm: HIGH: 3 W PEP, LOW:1 W PEP

Spurious emissions: less than -70 dB

Antenna: omnidirectional turnstile

**LOGIC UNIT** 

Transmitted codes: MOE, MOI, MOS, MOH, MO5, MO, A ... Z

Keying speed: 35,50,70 or 100 PARIS

Timing schedules: 60 /240 (s, transmit/ space), 30/120, 30/270, 12/48, 15/45, 30/30,

15/15, 60/60, 60/120

Delayed start: any time up to 24 hours in the future

Real-time stability: +-2ppm (approx. 1s/week), kept by RTC even while turned off

Language versions: ENG, CZE

### **SUPPLIED ACCESSORIES**

3,5 MHz wire antenna+counterpoise

144 MHz turnstile antenna

Detachable control panel

Instruction manual

#### **OPTIONS**

- Synchro cable
- PGMContest USB PC interface
- 12V/6A source for 1-6 transmitters
- Cable lock
- Foxoring antenna
- Various antennas

