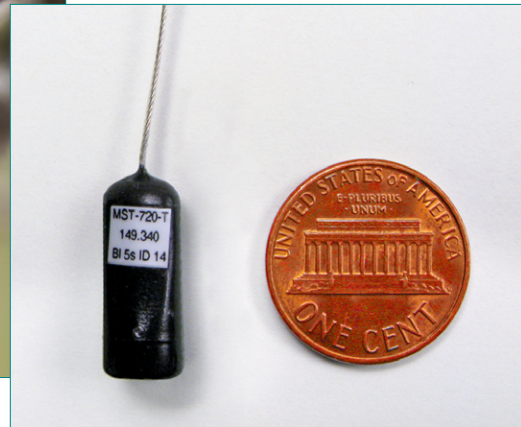


# MSTB Series

## Miniature Sensor Radio Transmitter for Birds and Bats



- ID, Motion & Temperature Tags < 2 grams
- On/off Programmable in any pattern



Up to one hundred sensor transmitters can be assigned to the same frequency with each tagged animal maintaining a unique identity. Having multiple individuals on a single frequency enables continuous monitoring of all tagged animals.

The Miniature Sensor Radio Transmitters are digitally coded and compatible with Lotek model SRX400A, SRX600 and SRX-DL coded radio receivers.

The MST-series offers advanced on/off programming to extend operational life and vary signal rates over time to match research requirements. Two examples below.

### Breeding & Wintering Ground Study:

1.3g ID only tag. Transmitter emits signal once every 5 seconds for 3 weeks, turns off for 19 weeks, turns on again every 20 seconds for 4 weeks. Calculated life of 181 days. Such a pattern would allow for intensive tracking initially on the breeding grounds, then presence / absence information on the wintering grounds.

### Torpor With Motion Sensor, Weeknights Only Study:

2.8g ID, temperature & motion tag. Transmitter emits ID, temperature & motion status signal from 9PM to 5AM Monday night through Friday night. Signal is every 4 seconds when on. Calculated life of 234 days. Such a pattern would provide torpor, temperature and motion/mortality information over a seven month study. Tag battery life is utilized only during the time of interest.



- Receivers
- Dataloggers
- Radio transmitters

- Acoustic transmitters
- Archival tags
- GPS systems

- Hydrophones
- Wireless hydrophones
- Physiological transmitters

- Depth transmitters
- Accessories
- Consulting

## MSTB Series

Based upon field-proven reliable technology deployed at hundreds of application sites over the last decade, the MST-Series of radio transmitters demonstrates Lotek's ability and commitment to provide telemetry systems that gather data at finer scales of observation

and provide deeper insight into bird and bat behavior. Lotek coded sensor transmitters permit multiple uniquely identifiable tags on a single frequency thereby minimizing total scan time and the potential for missed detection.

### Specifications

MODEL No.	TYPE	Size (mm)	Weight	Calculated Life (days)	
		diam x length	air (g)	2 sec	5 sec
MST-720	ID only	7 x 18	1.3	22	50
MST-820	ID only	8 x 20	2.1	44	100
MST-930	ID only	9.5 x 26	4.0	117	266
MST-720-T	Temperature	7 x 20	1.4	21	49
MST-820-T	Temperature	8 x 22	2.2	43	97
MST-930-T	Temperature	9.5 x 28	4.0	114	260
MST-720-M	Motion	7 x 28	1.8	21	46
MST-820-M	Motion	8 x 28	2.8	42	92
MST-930-M	Motion	9.5 x 32	4.5	113	245
MST-720-MT	Motion & Temperature	7 x 28	1.8	21	45
MST-820-MT	Motion & Temperature	8 x 28	2.8	42	91
MST-930-MT	Motion & Temperature	9.5 x 32	4.5	111	242

### Options:

Standard programming (delay start, 3 levels of ON/OFF cycles)

Advanced programming (different signal rates during different periods)

### Notes:

\*Calculated Life is typical / average. Warranty Life is 80% of Calculated Life.

Temperature range: -6° - +34° Celsius

Temperature accuracy  $\pm 0.8^\circ\text{C}$ ; resolution:  $\pm 0.8^\circ\text{C}$

Motion Status available as ID+100 (1 sensor) or 0 / 1 (2 sensors)

Motion Delay (hours) & motion latch or reset available

Actual specifications for size and weight may vary by  $\pm 3\%$  of values indicated

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