DTBird® & DTBat®, world wide reference for bird & bat protection at wind farms

⊙ DTBird® On Shore   ⬤ DTBird® Off Shore   △ DTBat®

108 DTBird® & DTBat® units installed in 25 existing / projected, onshore & offshore wind farms in 11 countries:

- Austria
- France
- Germany
- Greece
- Italy
- Norway
- Poland
- Spain
- Sweden
- Switzerland
- USA

Bats
Smart and Transparent Wind Power
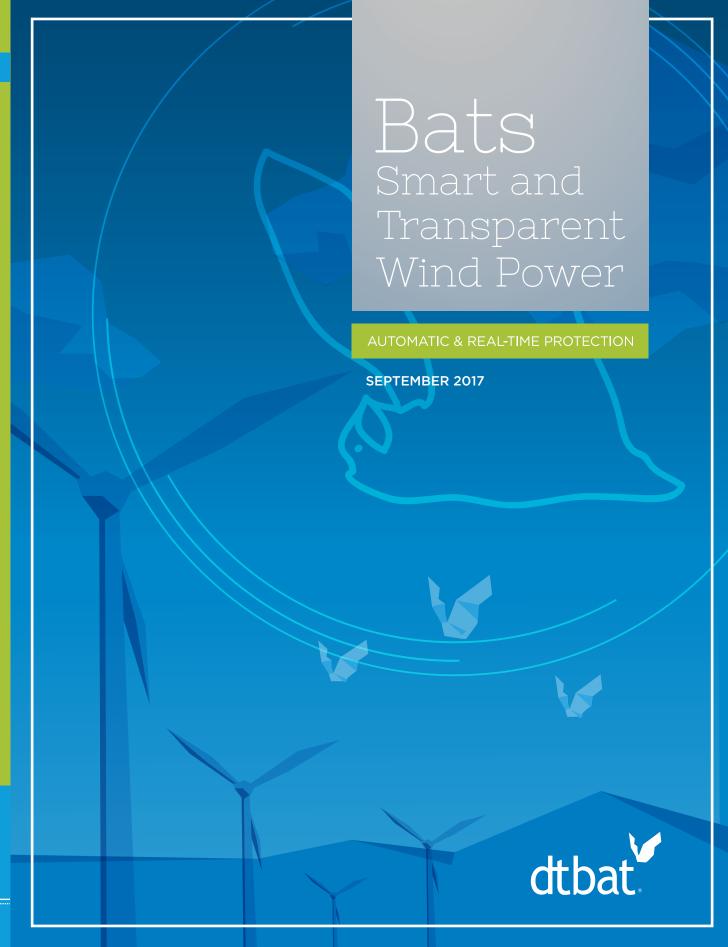
AUTOMATIC & REAL-TIME PROTECTION

dtbat

www.dtbat.com
info@dtbat.com

dtbat

Bat Protection Automatic & Real-Time

DTBat® is a self-working System that detects bat passes in real-time, and takes automatic actions linked to bat detection. For the Wind Industry, DTBat® System automatically surveys the airspace around Wind Turbines (WTG) detecting bat passes in real-time; and optionally, reduces the collision risk triggering WTG Stops linked to bat activity thresholds and/or environmental variables measured in real-time.

DTBat® has 2 modules available: Detection and Stop Control.

Bat Detection

Automatic and real-time detection of bats with ultrasound recognition.

Features

- **Detection sensors**: Bat detectors installed at height (1 - 3 units).
- **Environmental sensors:** Temperature, Rain and Humidity (optional) and Wind Speed (from the WTG).
- **Surveillance area**: Rotor Swept Area.
- **Service period**: Continuous monitoring in bat activity periods.
- **Precision** of real-time detection > 0.97 (97% of detections are actual bats).

Recorded Data

- Sonograms of every bat pass.
- Bat pass time.
- Environmental data and WTG operational parameters.
- Species/Group identification.

Stop Control

Automatic WTG Shutdown linked to real-time bat detection.

Features

- **Interface with WTG**: DTBat® hardware and software compatible with all WTG manufacturers.
- **Automatic Stop trigger**: linked to real-time bat activity thresholds and/or environmental variables.
- **Stop trigger:** < 2 s after bat pass detection.
- **Rotor Stop init time**: Depending on WTG manufacturer, 2 - 18 s after DTBat® stop trigger.
- **Complete rotor Stop**: Depending on WTG manufacturer, 15 - 35 s after WTG stop init.
- **Stop length** according to bat activity detected. Typical stop program covers > 90% of bat activity. Adjustable to Client/Environmental Authority requirements.
- **Automatic restart** of the WTG.
- Automatic **notification** of every Stop: Trigger (first notification), end time and duration (second notification).

Recorded Data

- Stop time data: Init time, end time and duration.
- Sonograms of all bat passes detected.

Data Analysis Platform

DTBat® online Data Analysis Platform provides:

- Access to bat calls, environmental data, WTG operational parameters, and Shutdown actions.
- Data summarization in charts and graphics.
- Automatic Service Reports.