

## Wireless communication systems for Ice Hockey referees



Danny Kurmann, Professional Referee  
IIHF Head - Head NLA

### VOKKERO™, THE BEST OF TECHNOLOGY

- ▶ As the authorities on fair play and rule observance, Ice Hockey referees can leave nothing to chance. To reduce the risk of errors as much as possible, it is **essential that they react in a quick and concerted manner**.
- ▶ It is in this context that ADEUNIS RF developed **Vokkero™**, a wireless communication system that permits **referees and line judges to stay in continuous contact**, with **excellent sound quality** even in the most noisy environments.
- ▶ **Danny Kurmann, an IIHF professional referee**, states: "I was very pleasantly surprised by **Vokkero's™ audio quality**. Communication with my partners was **perfect** [...] and **the micro-earphones were comfortable**. I found it very useful to be able to **communicate with my team during the match** especially when it came to penalty decisions. This is a **really useful system for us**, and using it is a real plus factor for us during matches".
- ▶ The Vokkero™ system is overwhelmingly supported by the major team sports federations (CAF, AFC, CONCACAF, EHF, IHF, ...). It has been used during prestigious events such as the rugby World Cup in 2007, the World Handball Championships in 2009, and the football World Cup in 2010...

### ADVANTAGES OF THE VOKKERO™ SYSTEM

- ▶ **Continuous contact** between referees and line judges.
- ▶ **From 2 to 6 users**: adaptable to different refereeing configurations.
- ▶ **Hands-free system**: instant communication with nothing to press.
- ▶ **Patented noise filter**: voice recognition and elimination of all extraneous noises (shouting and other crowd noise, sirens, etc...).
- ▶ **Secure communication**: digital encryption permitting totally private exchanges.
- ▶ **Multi-channel**: several systems can be used on the same site.
- ▶ **Compact, lightweight, and robust** (IP54 standard).
- ▶ **"Speaker mode" function**: option of making public announcements & commenting on decisions affecting the game.



VOKKERO®, a 100% ADEUNIS RF brand

**ICE HOCKEY**  
OFFICIATING

**SOCCER**

**FIELD HOCKEY**

**FOOTBALL**

**WATER POLO**

**LACROSSE**

**BASKETBALL**

**POLO**

**A SOLUTION FOR EVERY SPORT**

**www.vokkero.com**

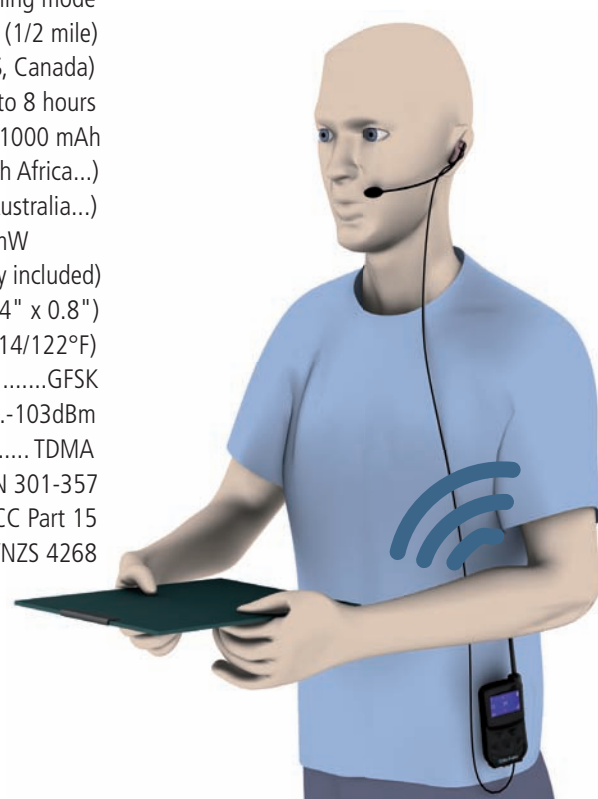
# VOKKERO™

## Wireless communication systems for top level sports referees



### TECHNICAL DETAILS

Number of users .....	2 to 6 in full duplex mode + an unlimited number in listening mode
Range .....	Up to 800m (1/2 mile)
Channels .....	3 (in Europe) - FHSS (US, Canada)
Battery life .....	Up to 8 hours
Battery .....	Rechargeable Li-Polymer 3.7V 1000 mAh
Frequencies .....	863-870MHz (Europe, South Africa...)
.....	902-928 MHz (USA, Canada, Australia...)
Power .....	10/200mW
Weight .....	150g - 5.3 oz (battery included)
Dimensions .....	120 x 60 x 25mm (4.7" x 2.4" x 0.8")
T° range .....	-10/+50°C (14/122°F)
Modulation .....	GFSK
Sensitivity .....	-103dBm
Technology.....	TDMA
Norms .....	Europe: EN 300-220 / EN 301-357
.....	USA: FCC Part 15
.....	AS/NZS 4268



### PRODUCTS & ACCESSORIES

#### Wireless communication system

**VOKKER** Audio transceiver

#### Headsets

- KEN 010** Generic micro-earphones
- KEN 020** Generic micro-earphone with on/off switch
- MAE 010** Professional micro-earphone audio pro single ear
- PHO 010** Professional micro-earphone "custom"

#### Charger, battery & push-to-talk button

- BCH 030** 3 battery charger
- BAT 010** Battery
- PTT 010** Push-to-Talk button

#### Equipment

- SOC 010** Carry bag
- ABD 010** Armband
- BEL 010** Belt
- HAR 010** Harness

