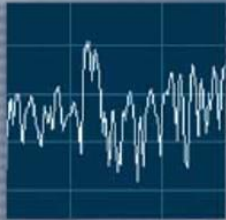


ITU Radiocommunication Sector (ITU-R) Studies on Electromagnetic field measurements to assess human exposure

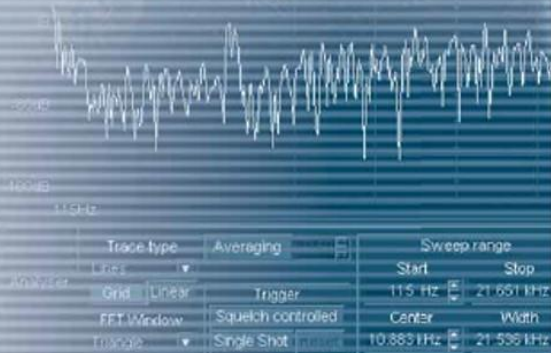
**Philippe Aubineau
Counsellor, ITU-R Study Groups,
Radiocommunication Bureau, ITU**





Handbook

SPECTRUM MONITORING



ITU's worldwide recognized reference on Spectrum Monitoring and related issues

- Chapter 5.6 on **Non-ionizing radiation measurements**
 - Explains **NIR limits & exposure quotient**
 - **Instruments** for NIR measurements
 - Broadband isotropic probes and meters
 - Tri-axis antennas and field strength meters
 - Transportable station
 - standard field strength measurement equipment
 - **Measurement procedures** for different radio services (incl. mobile, broadcasting, etc.)
 - **Reporting methods**

Source: ITU-R Handbook on Spectrum Monitoring
www.itu.int/pub/R-HDB-23



On-going ITU-R Studies on EMF measurements to assess human exposure

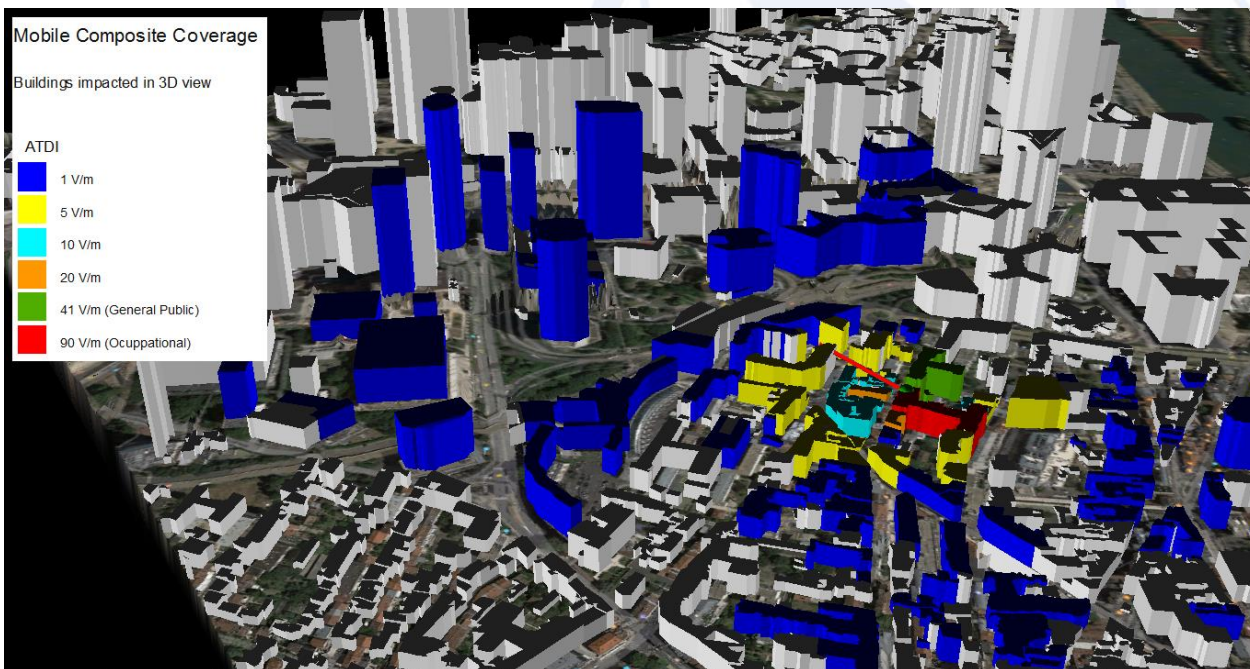
- Work initiated by the ITU Experts Group on Spectrum Monitoring (i.e. ITU-R WP 1C) in response to Question ITU-R 239/1 (2016):
 1. What are the **measurements techniques** to assess the human exposure from wireless installations of all types?
 2. How can **measurement results** be presented?
- Studies should be completed by 2018!

Source: Question ITU-R 239-1 - www.itu.int/pub/R-QUE-SG01.239



Example of preliminary draft new ITU-R information on measurements referring to all radiocommunications wireless stations, except portable wireless devices

Three dimensions cellular exposure-contours, showing buildings impacted



Isotropic antennas for the frequency range 9 kHz to 6 GHz



Correspondence activities

- ITU-R WP 1C **Correspondence Group** to develop the draft new **Report ITU-R SM.[EMF-MON]** on electromagnetic field measurements to assess human exposure

SharePoint Site



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- Next **ITU-R WP 1C** meeting on [5- 12 June 2018]
(see at: <http://www.itu.int/en/events/Pages/Calendar-Events.aspx?sector=ITU-R>)

Thank you!

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