



International Journal of Distributed Sensor Networks

Special Issue on
Underwater Wireless Sensor Networks 2015

CALL FOR PAPERS

More than 70% of the earth surface is covered with water. New technologies have brought us new ways to explore this vast unexplored aquatic environment. These technologies provided us with a number of applications for scientific, environmental, commercial, and military purposes including pollution monitoring, disasters prevention in terms of tsunami warnings, assisted navigation, offshore exploration, oil/gas spills monitoring, and tactical surveillance.

However, due to unique characteristics such as large propagation delay, low communication bandwidth, node mobility, high error rate, and harsh underwater environment, existing solutions of terrestrial sensor networks cannot be applied directly to underwater sensor networks. Therefore, these unique features of underwater communications have recently motivated a growing interest and a considerable amount of research activities in studying architectures and networking protocols for underwater networks. As a result, new solutions considering the unique features of underwater environment are greatly demanded.

This special issue would like to solicit original contributions regarding recent developments and ideas in underwater sensor networks.

Potential topics include, but are not limited to:

- ▶ Optical, acoustic, and electromagnetic communications for underwater sensor networks
- ▶ MAC, routing, and transport protocols for underwater communications
- ▶ Network coverage and node placement
- ▶ Energy efficiency and power control
- ▶ Target tracking using underwater sensor networks
- ▶ Modeling and simulation in underwater sensor networks
- ▶ Synchronization and localization for underwater communications
- ▶ Underwater sensor network architecture
- ▶ Cooperative communications in underwater sensor networks

Authors can submit their manuscripts via the Manuscript Tracking System at <http://mts.hindawi.com/submit/journals/ijdsn/unwsn15/>.

Lead Guest Editor

Dongkyun Kim, Kyungpook National University, Daegu, Republic of Korea
dongkyun@knu.ac.kr

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jucano@disca.upv.es

Wei Wang, San Diego State University, San Diego, USA
wei.wang@ieee.org

Floriano De Rango, University of Calabria, Arcavacata, Italy
derango@deis.unical.it

Kun Hua, Lawrence Technological University, Southfield, USA
khua@ltu.edu

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