River Publishers

Computer Systems for Healthcare and Medicine

Editors:

Piotr Bilski, Warsaw University of Technology, Poland

Francesca Guerriero, University of Calabria, Italy

The development of modern civilization leads to us having to solve new problems which did not exist before. The contemporary world faces a great challenge of aging societies, where the increasing number of citizens requires constant medical attention. To ensure safety and wellbeing of elderly people, patients in hospitals and disabled persons, advanced technologies can be implemented. These include both sophisticated data acquisition systems and data processing algorithms, aiming at the constant and discreet monitoring of persons whilst raising alarm if immediate attention is required.

Computer Systems for Healthcare and Medicine presents a novel look at the introduced problems, including proposed solutions in the form of automated data acquisition and processing systems, which were tested in various environments. Characteristic features include a wide range of sensors used to monitor the situation of the person, and accurate decision making algorithms, often based on the computational intelligence domain.

Technical topics discussed in the book include application for the healthcare of the following:

- Infrared sensors
- MEMS
- Ultra wideband radars
- Deep learning
- Decision trees
- Artificial neural networks
- Gabor filters
- Decision support systems



River Publishers Series in Computing and Information Science and Technology

ISBN: 9788793519312
e-ISBN: 9788793519305
Available From: March 2017
Price: € 75.00 $ 96.99

KEYWORDS:
Infrared sensors, radars, machine learning, artificial neural networks, decision trees, wireless monitoring, ultra wideband radar, deep learning, Gabor filters

www.riverpublishers.com
marketing@riverpublishers.com