

## Prof. Dr. Ljiljana D. Milić

Ljiljana D. Milić was born in Čačak, Serbia, in 1939. She received the Dipl.-Eng., M. Sc. and D.Sc. degrees from the University of Belgrade in 1962, 1973 and 1978, respectively, all in electrical engineering. She spent the academic year 1974-1975 at Swiss Federal School of Technology, Lausanne, Switzerland, where she worked as a research assistant.

Since 1962 she has been with Mihajlo Pupin Institute, Belgrade. Dr. Milić was leader of numerous R&D projects and gave practical solutions that went into production. For several years she served as assistant director and from 1987-1990 as director of Telecommunication department of Mihajlo Pupin Institute. She was appointed Associate Professor (1991) and Professor (2003) in Digital Signal Processing at the School of Electrical Engineering, University of Belgrade. She spent summers in 2002, 2003 and 2005 as a visiting professor at the Tampere International Center for Signal Processing (TICSP), Tampere University of Technology, Finland.

She worked on computer applications to filter design and on the sensitivity and tolerances of electrical filters. Since 1979 she has dealt with digital signal processing, primarily in the domain of digital filters. She also treated the problems of real-time spectrum analysis and analog and digital filter banks. She contributed to the development of new classes of efficient low-power consumption digital filters, and to the development of variable digital filters. She developed several efficient implementations for sampling-rate conversion systems, and also developed several solutions for the complex filtering functions using the frequency response masking technique. She proposed some new implementations for three-structure multi channel filter banks.

Dr. Milić is the author of more than 140 scientific papers mainly in the field of digital signal processing. She is the author of two books in Serbian: "Recursive Digital Filters" (1982) and "Introduction to Digital Signal Processing" (1999), and the author of the new forthcoming book *Multirate Filtering for Digital Signal Processing: MATLAB Applications*, to appear January 2009, Information Science Reference, Hershey, PA, USA. She is also the author of the book chapters and the editor for several scientific publications. Dr. Milić is a Senior Member of IEEE and a corresponding member of Academy of Engineering Sciences of Serbia.

Her current research interest is in digital filters, multirate signal processing, and DSP in communications. For more details visit <http://kondor.etf.rs/~milic/>

## Prof. dr Ljiljana D. Milić

Ljiljana D. Milić rođena je 1939. u Čačku. Diplomirala je na Elektrotehničkom fakultetu u Beogradu 1962, Na istom fakultetu je magistrirala 1973. i doktorirala 1978. Školsku 1974-1975 godinu provela je kao asistent - naučni saradnik na Federalnoj Politehničkoj Školi u Lozani, Švajcarska.

Odmah po diplomiranju zaposlila se u Institutu «Mihajlo Pupin» gde je stekla sva naučna zvanja. Za naučnog savetnika izabrana je 1992. godine. Realizovala je veći broj tehničkih rešenja iz oblasti telekomunikacija koja su ušla u proizvodnju. Bila je direktor Radne jedinice "Telekomunikacije" u periodu 1987-1990.

Početakom 1991. u zvanju vanrednog profesora uključila se u nastavu na Elektrotehničkom fakultetu u Beogradu za oblast obrada signala. U zvanje redovni profesor izabrana je 2003. godine. Saraduje kao gostujući profesor sa Internacionalnim centrom za obradu signala pri Tehničkom univerzitetu u Tampereu, Finska. Član je IEEE od 1987., a od 1998. je *Senior Member IEEE*. Za dopisnog člana Akademije inženjerskih nauka Srbije izabrana je 2004. godine.

Najvažniji naučnoistraživački rezultati su: algoritmi za automatsko projektovanje analognih i digitalnih filtara pomoću računara, analiza radio signala u realnom vremenu primenom banki filtara, poboljšanje osetljivosti i tolerancija kod analognih i digitalnih filtara, razvoj novih klasa brzih digitalnih filtara sa malom potrošnjom, razvoj varijabilnih digitalnih filtara. Dala je više rešenja za implementaciju sistema za konverziju frekvencije odabiranja, zatim rešenja za sisteme realizovane na principu frekvencijskog maskiranja, kao i predloge rešenja za implementaciju efikasnih višekanalnih banki digitalnih filtara.

Autor je preko 140 naučnih radova objavljenih u zemlji i inostranstvu. Objavila je nekoliko knjiga i poglavlja u monografijama. Najvažniji rezultati su citirani u domaćoj i stranoj literaturi. Dobila je nagradu ETRAN-a, Privredne komore Beograda, Radiotelevizije Beograd i nagradu «Dr Branko Raković». Saraduje kao recenzent za vodeće domaće i međunarodne časopise i konferencije. Organizovala je nekoliko specijalnih sekcija iz oblasti obrade signala na stručnim konferencijama u zemlji i inostranstvu. Autor je knjige *Multirate Filtering for Digital Signal Processing: MATLAB Applications*, koja izlazi u januaru 2009. u izdanju Information Science Reference, Hershey, PA, USA.

Bavi se istraživanjima u oblasti digitalnih filtara, sistema sa višestrukim odabiranjem i primenom digitalne obrade signala u telekomunikacijama.

Detaljne informacije nalaze se na <http://kondor.etf.rs/~milic/>