

Curriculum Vitae Sergei P. Skobelev / October 2016

1. Personal details

Name: Sergei P. Skobelev
Born: 1953, Kaluga Region, USSR
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2. Higher Education

<u>Date: From-To</u>	<u>Institute</u>	<u>Degree</u>	<u>Area of specialization</u>
	Inst. of Radio Eng. and Electron. Moscow	Sc. D. (31.10.2014)	Antennas, Microwave Devices, and their Technologies
1981-1984	Moscow Inst. of Physics and Technology	Ph.D. (25.12.1984) Supervisor: Prof. G. G. Bubnov	Antennas and Microwave Devices
1971-1977	Moscow Inst. of Physics and Technology	Engineer-Physicist (M.Sc. equiv.), Supervisor: Dr. Yu. N. Seryakov	Radio-Electronic Devices

3. Appointments

<u>Date: From-To</u>	<u>Institute</u>	<u>Title</u>	<u>Research area</u>
1998-Present	Public Stock Company (PSC) "Radiofizika", Antenna Dept.	Leading Research Associate	Antenna Theory and Technology
1991-1998	Research Inst. of Radio Physics, Antenna Dept.	Senior Research Associate	Antenna Theory and Technology
1987-1991	Research Inst. of Radio Physics, Antenna Dept.	Research Associate	Antenna Theory and Technology
1985-1987	Research Inst. of Radio Physics, Antenna Dept.	Leading Engineer	Antenna Theory and Technology
1977-1981	Design Bureau of Radiotechnical Devices	Engineer	Antenna Measurement

4. **Additional Functions**

Teacher of a two-semester course of Applied Electromagnetics at the Moscow Institute of Physics and Technology from 1996 till the present time (Associate Professor in 2015-2016)

5. **Services in other academic institutions**

1. Visiting researcher at Chalmers University of Technology, Gothenburg, Sweden, from 2002 to 2004.
2. Visiting Research Fellow at Northumbria University in Newcastle upon Tyne, UK, during 2006/2007/

6. **Other Activities**

1. Chairman of the Moscow Antennas & Propagation Chapter in the IEEE Russian Section
2. Co-Chairman of the Joint Moscow Scientific Seminar on Electromagnetics and Antennas

7. **Research Grants N/a**

8. **Teaching at the Moscow Institute of Physics and Technology**

Master's degree students:

- | | |
|----------------|--------------------------------------|
| a) 1988 - 1990 | Leonid Mukhamedov (excellent grade) |
| b) 1991 - 1993 | Andrey Vyazigin (excellent grade) |
| c) 1996 - 1998 | Konstantin Nikitin (excellent grade) |
| d) 2006 - 2008 | Anna Yaparova (excellent grade) |

Bachelor's degree students:

- | | |
|---------|-------------------------------------|
| e) 2016 | Nataliya Fedotova (excellent grade) |
| f) 2016 | Ivan Makeev (excellent grade) |

Publications

Total number of publications is 192 including 86 publications in Russian (1 book, 63 journal articles, 7 Soviet Union Author's Certificates for inventions, and 15 conference papers) and 106 International publications (1 book, 33 journal articles, and 73 conference papers)

H factor 11 (scholar).

List of International Publications

Books

S. P. Skobelev, Phased array antennas with optimized element patterns, Norwood, USA: Artech House, 2011.

Articles in International Journals

1. Skobelev S. P. and Mukhamedov L. L., "Analysis of waveguide antenna arrays with protruding dielectric elements." *IEEE Transactions on Antennas and Propagation*, Vol. 41, No. 5, May 1993, PP. 574-581.
2. Skobelev S. P. and Vyazigin A. S. Forming flat-topped element patterns in antenna arrays of two-mode waveguides. "Electronics Letters", 22nd July 1993, Vol. 29, No. 15, PP. 1326-1327.
3. S. P. Skobelev and P.-S. Kildal, Blindness Removal in Arrays of Rectangular Waveguides Using Dielectrically Loaded Hard Walls. "IEEE Transactions on Antennas and Propagation", Vol. 46, No. 4, Apr. 1998, PP. 546-550
4. S. P. Skobelev, Methods of Constructing Optimum Phased-Array Antennas for Limited Field of View. "IEEE Antennas and Propagation Magazine", Vol. 40, No. 2, April 1998, PP. 39-50.
5. S. P. Skobelev and P.-S. Kildal, "Performance of an Array of Circular Waveguides with Strip-Loaded Dielectric Hard Walls," *IEEE Transactions on Antennas and Propagation*, Vol.48, No. 7, July 2000, PP. 1106-1114.
6. S. P. Skobelev, B.-J. Ku, A. V. Shishlov, and D.-S. Ahn, "Optimum geometry and performance of a dual-mode horn modification." *IEEE Antennas and Propagation Magazine*, Vol. 43, No. 1, Feb. 2001, PP. 90-93.
7. S. P. Skobelev, "Shaping of flat-topped element patterns in an array of slow-wave strip structures excited by parallel-plate waveguides," *IEEE Transactions on Antennas and Propagation*, vol. 49, no. 12, Dec. 2001, pp. 1763-1768.
8. S. Y. Eom, H. K. Park, S. I. Jeon, J. I. Choi, S. P. Skobelev, S. A. Ganin, A. G. Shubov

- and A. V. Shishlov, "Multi-disk radiating structure with flat-topped element pattern for planar array antenna," *Electronics Letters*, vol. 38, no. 2, 17th January 2002, pp. 60-61.
9. S. P. Skobelev and P.-S. Kildal, "Influence of hard corrugated PBG wall design on performance of conical horn antenna," *Microwave and Optical Technology Letters*, vol. 32, no. 4, Feb. 20, 2002, pp. 265-268.
 10. S. P. Skobelev, "Performance of Yagi-Uda elements in planar array antennas for limited-scan applications," *Microwave and Optical Technology Letters*, vol. 34, no. 2, July 20, 2002, pp. 141-145.
 11. S. P. Skobelev and P.-S. Kildal, "Some features of hard strip-loaded conical horn antennas," *IEE Proceedings – Microwaves, Antennas & Propagation*, vol. 150, no. 3, June 2003, pp. 171-176.
 12. S. P. Skobelev, S.-Y. Eom, and H.-K. Park, "Shaping of flat-topped element patterns in a planar array of circular waveguides using a multilayered disk structure – Part I: Theory and numerical modeling," *IEEE Transactions on Antennas and Propagation*, vol. 51, no. 5, May 2003, pp. 1040-1047.
 13. S.-Y. Eom, H.-K. Park, S.-I. Jeon, J.-I. Choi, S. P. Skobelev, S. A. Ganin, A. G. Shubov, and A. V. Shishlov, "Shaping of flat-topped element patterns in a planar array of circular waveguides using a multilayered disk structure – Part II: Experimental study and comparison," *IEEE Transactions on Antennas and Propagation*, vol. 51, no. 5, May 2003, pp. 1048-1053.
 14. S. P. Skobelev and P.-S. Kildal, "Analysis of conical quasi-TEM horn with a hard corrugated section," *IEEE Transactions on Antennas and Propagation*, vol. 51, no. 10, pt. I, Oct. 2003, pp. 2723-2731.
 15. S. P. Skobelev and P.-S. Kildal, "Analysis of a hard strip-loaded conical horn by the method of generalized scattering matrices," *IEEE Transactions on Antennas and Propagation*, vol. 51, no. 10, pt. II, Oct. 2003, pp. 2918-2925.
 16. S. P. Skobelev and P.-S. Kildal, "Some properties of an open-ended circular waveguide with one- and two-sided ideal hard walls," *Microwave and Optical Technology Letters*, vol. 43, no. 2, Oct. 20, 2004, pp. 160-164.
 17. S. P. Skobelev and P.-S. Kildal, "Mode-matching modeling of a hard conical quasi-TEM horn realized by an EBG structure with strips and vias," *IEEE Transactions on Antennas and Propagation*, vol. 53, no. 1, pt. I, Jan. 2005, pp. 139-143.
 18. O. Sotoudeh, P.-S. Kildal, P. Ingvarson, and S. P. Skobelev, "Single- and dual-band multimode hard horn antennas with partly corrugated walls," *IEEE Transactions on Antennas and Propagation*, vol. 54, no. 2, pt. I, Feb. 2006, pp. 330-339.
 19. S. P. Skobelev and P.-S. Kildal, "Modal solutions in dual-depth longitudinally corrugated hard waveguide," *IET Microwaves, Antennas & Propagation*, vol. 1, Issue 4, Aug. 2007, pp. 827-831.
 20. S. P. Skobelev, "Comments on 'Comparative Analysis of Acceleration Techniques for 2-D and 3-D Green's Functions in Periodic Structures Along One and Two Directions'," *IEEE Transactions on Antennas and Propagation*, vol. 55, no. 12, Dec.

2007, p. 3746.

21. S. P. Skobelev, "Determination of dimensions and shape of a planar aperture for forming of orthogonal beams," *IEEE Transactions on Antennas and Propagation*, vol. 56, no. 8, pt. 2, Aug. 2008, pp. 2755-2757.
22. M. P. Leach, D. Smith, and S. P. Skobelev, "A modified holographic technique for planar near-field antenna measurements," *IEEE Transactions on Antennas and Propagation*, vol. 56, no. 10, Oct. 2008, pp. 3342-3345.
23. S. P. Skobelev, "On one more property of the ideal array element pattern," *IEEE Transactions on Antennas and Propagation*, vol. 57, no. 3, March 2009, pp. 631-637.
24. M. M. Ivanishin and S. P. Skobelev, "A modification of the Kummer's method for efficient computation of the Green's function for doubly periodic structures," *IEEE Transactions on Antennas and Propagation*, 2009, vol. 57, no. 9, pp. 2794-2798.
25. S. P. Skobelev and P.-S. Kildal, "A new type of the quasi-TEM eigenmodes in a rectangular waveguides with one corrugated hard wall," *Progress in Electromagnetics Research, PIER*, 2010, 102, pp. 143-157.
26. S. P. Skobelev, "Comments on 'Decoupling efficiency of a wideband Vivaldi focal plane array feeding a reflector antenna'," *IEEE Transactions on Antennas and Propagation*, vol. 58, no. 3, March 2010, p. 1016.
27. S. P. Skobelev, "A Modification of the Kummer's Method for Efficient Computation of the 2-D and 3-D Green's Functions for 1-D Periodic Structures," *IEEE Transactions on Antennas and Propagation*, vol. 60, no. 1, Jan. 2012, pp. 412-416.
28. S. P. Skobelev, "Comments on 'Superdirective-Type Near Fields in the Method of Auxiliary Sources'," *IEEE Transactions on Antennas and Propagation*, vol. 61, no. 4, Part II, April 2013, p. 2360.
29. S. P. Skobelev, "Comments on 'Overlapped Subarrays: Review and Update'," *IEEE Antennas and Propagation Magazine*, vol. 54, no. 4, August 2013, p. 249.
30. S. P. Skobelev and O. N. Smolnikova, "Analysis of Doubly Periodic Inhomogeneous Dielectric Structures by a Hybrid Projective Method," *IEEE Transactions on Antennas and Propagation*, vol. 61, no. 10, Oct. 2013, pp. 5078-5087.
31. S. P. Skobelev, "On the Forming of Orthogonal Beams by Planar Array Antennas," *IEEE Transactions on Antennas and Propagation*, vol. 62, no. 4, Part 1, April 2014, pp. 1762-1768.
32. S. P. Skobelev, "Comments on 'Fundamentals of Thin-Wire Integral Equations With the Finite-Gap Generator'," *IEEE Transactions on Antennas and Propagation*, vol. 62, no. 4, Part 2, April 2014, p. 2327.
33. S. P. Skobelev, "Some Features of the Overlapped Subarrays Built up of Beam-Forming Matrices for Shaping Flat-Topped Radiation Patterns," *IEEE Transactions on Antennas and Propagation*, vol. 63, no. 12, Dec. 2015, pp. 5529-5535.

Papers in Proceedings of International Conferences

1. Скобелев С. П. "Конструктивный синтез антенных решеток с секторными парциальными диаграммами направленности". *Труды X школы-семинара по дифракции и распространению волн*. Москва, 7-15 февраля 1993 г., М.: НИИРФ, 1993, СС.369-395.
2. Mukhamedov L. L. and Skobelev S. P. "A method of analysis of waveguide antenna arrays with protruding smooth dielectric elements", *IEEE AP-S Int. Symp., The University of Michigan*, Ann Arbor, Michigan, June 28 - July 2, 1993, Vol.3, pp. 1270-1273.
3. Mukhamedov L. L. and Skobelev S. P. Analysis of waveguide antenna arrays with protruding smooth dielectric elements. *IEEE AP-S Int. Symp. 1994, The University of Washington*, Seattle, Washington, June 19-24, 1994, Vol.2, PP.776-779.
4. Skobelev S. P. and Vyazigin A. S. A linear antenna array of two-mode slot-coupled waveguides with flat-topped element patterns. *IEEE AP-S Int. Symp. 1994, The University of Washington*, Seattle, Washington, June 19-24, 1994, Vol.2, PP. 1268-1271.
5. Skobelev S. P. and Vyazigin A. S. Shaping flat-topped element patterns in a linear antenna array of dual-mode slot-coupled waveguides. *XXVII Scientific Conf. on Antenna Theory and Technology*, Moscow, Russia, 23-25 August, 1994, pp. 103-105.
6. Skobelev S. P. and Vyazigin A. S. Shaping flat-topped element patterns in a linear antenna array of dual-mode slot-coupled waveguides. *Journées Internationales De Nice Sur Les Antennes*, Nice, France, 8-10 November, 1994, pp. 674-677.
7. Leijon R. M., Kildal P.-S., and Skobelev S. P. Analysis and optimization of a homogeneous dielectric lens antenna with an array of feeds. *1995 URSI Int. Symp. on Electromagnetic Theory*, St.Petersburg, Russia, May 23-26, 1995, pp.379-381.
8. S. P. Skobelev, "Methods and Results of Design Synthesis of Antenna Arrays with Flat-Topped Sector Partial Patterns". *IEEE International Symposium on Phased Array Systems and Technology*, Boston, Massachusetts, October 15-18, 1996, pp. 438-443.
9. S. P. Skobelev, "An Optical Network of Shaping Flat-Topped Sector Element Pattern in Arrays of Dual-Reflector Antennas," *Journées Internationales De Nice Sur Les Antennes*, Nice, France, 12-14 November, 1996, pp. 462-465.
10. Skobelev S. P., Mukhamedov L. L., and Kildal P.-S. "Effect of Dielectrically Loaded Hard Walls on Performance of Waveguide Antenna Arrays." *Journées Internationales De Nice Sur Les Antennes*, Nice, France, 8-10 November, 1996, pp. 634-637.
11. S. P. Skobelev, A. A. Tolkachev, V. V. Denisenko, A. V. Shishlov, and A. G. Shubov, "Some Methods and Results in Development of Low-Cost Antenna Array Technology." *Antenn 97 – Nordiskt antennsymposium i Goteborg*, Gothenburg, Sweden, 27-29 May, 1997, pp. 25-34.

12. S. P. Skobelev and A. G. Shubov, "Combined Methods for Suppression of Grating Lobes in Limited-Field-of-View Phased Array Antennas", *Proc. of 1998 URSI International Symp. on Electromagnetic Theory*, Thessaloniki, Greece, 25-28 May 1998, Vol. 1, PP. 121-123.
13. K. V. Nikitin and S. P. Skobelev, "An Algorithm of the Method of Volume Integral Equations for Analysis of Waveguide Arrays with Protruding Dielectric Elements", *Proc. of 1998 International. Conf. on Mathematical Methods in Electromagnetic Theory*, Kharkov, Ukraine, 2-5 June, 1998, Vol. 2, PP. 632-634.
14. S. P. Skobelev, V. V. Denisenko, G. V. Dybtsyn, A. E. Kazaryan, and A. G. Shubov, "Optimized Phased Array Antenna Element Based on Multidisk Slowing Structure for Limited-Field-of-View Applications," *Proc. of The XXVIII Moscow Internat. Conf. on Antenna Theory and Techn.*, 22-24 Sept. 1998, Moscow, Russia, PP. 266-269.
15. S. P. Skobelev, P.-S. Kildal, "Performance of an Array of Circular Waveguides with Hard Walls on the Basis of Strip-Loaded Dielectric Coating," *Proc. of The Int. Conf. on Electromagnetics in Advanced Applications (ICEAA '99)*, Sep. 13-17, 1999, Torino, Italy, PP. 519-522.
16. S. Skobelev, "Some Features of Shaping The Flat-Topped Patterns by Disc and Strip Slow-Wave Antenna Elements in Arrays for Limited Field of View," *Millenium Conference on Antennas & Propagation*, Davos, Switzerland, 9-14 April, 2000,. Abstracts, Vol. 1, P. 332 (The complete 4-page paper is contained in file p0561.pdf on the CD-ROM).
17. S. P. Skobelev and A. V. Shishlov, "On The Use of Yagi-Uda Elements in Array Antennas for Limited Scan Applications," *Proc. of 2000 IEEE Int. Conf. On Phased Array Systems & Technology*, Dana Point, California, May 21-25, 2000, PP. 299-302.
18. S. P. Skobelev and P.-S. Kildal, "Analysis of a circular hard strip-loaded horn by using the method of generalized scattering matrices." *Proc. of Nordic Antenna Symposium (Antenn 00)*, Lund, Sweden, 12-14 September 2000, PP. 45-50.
19. S. P. Skobelev and P.-S. Kildal, "Analysis of a hard corrugated conical horn by using the method of generalised scattering matrices." *Proc. of the 11th International Conference on Antennas and Propagation (ICAP2001)*, Manchester, UK, 17-20 April 2001, Vol. 2, PP. 696-700.
20. S. P. Skobelev and P.-S. Kildal, "Design of a hard corrugated conical horn element with high aperture efficiency and low crosspolarization." *Proc. of the 9th COST Meeting and Workshop on Smart Antennas*, Gothenburg, Sweden, 2-5 May 2001, PP. 19-22.
21. S. P. Skobelev and P.-S. Kildal, "Design of a dual-polarized horn antenna with very high aperture efficiency by using PBG hard surface walls." *Proc. of the 24th ESTEC Antenna Workshop on Innovative Periodic Antennas: Photonic Bandgap, Fractal and Frequency Selective Structures*. Noordwijk, The Netherlands, 30 May – 1 June 2001, PP. 97-102

22. S. P. Skobelev, "Overview of recent work on numerical analysis of hard circular waveguides and hard conical horn antennas." *Digest of 2002 USNC/URSI National Radio Science Meeting*, San-Antonio, Texas, June 16-21, 2002, P. 269.
23. S. P. Skobelev, "Improvement of the element pattern in circular-waveguide arrays using multilayered disk structures." *Digest of 2002 Int. Symp. on Antennas & Propagation*, San-Antonio, Texas, June 16-21, 2002, Vol. 3, PP. 546-549.
24. S. P. Skobelev, "Performance of a parabolic cylindrical antenna with an array shaping flat-topped element patterns." *Proc. of the 2002 12th International Crimean Conf. "Microwave & Telecommunication Technology" (CriMiCo'2002)*, Sevastopol, the Ukraine, Sep. 9-13, 2002, pp. 305-306.
 С. П. Скобелев, "Характеристики параболической цилиндрической антенны с решеткой, формирующей секторные парциальные диаграммы направленности", *Материалы 12-й международной крымской конференции "СВЧ-техника и телекоммуникационные технологии" (КрыМиКо'2002)*, Севастополь, Украина, 9-13 сентября 2002 г., сс. 305-306.
25. S. P. Skobelev and P.-S. Kildal, "The hard quasi-TEM horn as an application of EBG surfaces and how to analyze it using the mode-matching techniques," *Proc. of Nordic Antenna Symposium (Antenn 03)*, Kalmar, Sweden, 13-15 May 2003, pp. 75-80.
26. S. P. Skobelev, "On the ideal element pattern in planar phased array antennas." *Digest of 2003 Int. Symp. on Antennas & Propagation*, Columbus, Ohio, June 22-27, 2003, Vol. 2, PP. 444-447.
27. S. P. Skobelev, "Mode-matching analysis of an EBG quasi-TEM conical horn realized by strips and vias." *Digest of 2003 USNC/URSI National Radio Science Meeting*, Columbus, Ohio, June 22-27, 2003, p. 355.
28. S. P. Skobelev, "On improvement of the radiation performance of the open-ended circular waveguide." *Proc. of the IVth Int. Conf. on Antenna Theory and Techniques*, Sevastopol, Ukraine, September 9-12, 2003, vol. 2, pp. 477-480.
29. S. P. Skobelev, "Algorithm of the method of auxiliary sources for analysis of arrays of circular waveguides with protruding dielectric rods". *IEEE International Symposium on Phased Array Systems and Technology 2003*, Boston, Massachusetts, October 14-17, 2003, pp. 333-338.
30. S. P. Skobelev and P.-S. Kildal, "An advanced mode-matching code for analyzing different types of hard horn antennas," *26th ESA Antenna Technology Workshop on Satellite Antenna Modeling and Design Tools*, ESTEC, Noordwijk, The Netherlands, 12-14 November 2003, pp. 205-212.
31. S. P. Skobelev, "Analysis of waveguide arrays with protruding-dielectric elements by using the method of volume integral equations," *Proc. of 2004 URSI International Symposium on Electromagnetic Theory*, Pisa, Italy, 23-27 May 2004, vol. II, pp. 679-681.
32. S. P. Skobelev and P.-S. Kildal, "Anomaly when studying electromagnetic radiation from the open end of ideally hard circular waveguide," *Proc. of 2004 URSI*

International Symposium on Electromagnetic Theory, Pisa, Italy, 23-27 May 2004, vol. II, pp. 1179-1181.

33. S. P. Skobelev and P.-S. Kildal, "Anomalous behavior of the TEM mode when radiating from an open-ended circular waveguide with ideal hard wall," *Digest of 2004 USNC/URSI National Radio Science Meeting*, Monterey, California, June 20-26, 2004.
34. M. Ng Mou Kehn, P.-S. Kildal, and S. P. Skobelev, "Miniaturized dielectric-loaded rectangular waveguides for use in multi-frequency arrays," *Digest of 2004 IEEE APS Symposium*, Monterey, California, June 20-26, 2004, Vol. 1, PP. 803-806.
35. S. P. Skobelev and P.-S. Kildal, "An advanced code based on the mode-matching method and Winer-Hopf-Weinstein method for analysis of hard horn antennas," *Proceedings of EMB 04 – Computational Electromagnetics*, Chalmers University of Technology, Gothenburg, Sweden, 18-19 October 2004, pp. 146-153.
36. S. P. Skobelev, "On one approach to creation of dual-band hard horn," *Proc. of the Vth Int. Conf. on Antenna Theory and Techniques*, Kyiv, Ukraine, May 24-27, 2005, pp. 198-201.
37. С. П. Скобелев, П.-С. Килдал, "На пути к созданию двухчастотного продольно гофрированного жесткого рупора", *Труды международной научной конференции "Излучение и рассеяние ЭМВ" (ИРЭМВ-2005)*, Таганрог, Россия, 20-25 июня 2005 г., сс. 183-185.
39. S. P. Skobelev and P.-S. Kildal, "Modal solutions in dual-depth longitudinally corrugated waveguides for design of dual-band 20/30 GHz hard horns." *IEEE AP-S Symposium*, Albuquerque, NM, 9-14 July 2006, pp. 1211-1214.
40. S. P. Skobelev, "An algorithm based on the hybrid Galerkin method for analysis of arrays of circular waveguides with protruding dielectric rods". *Proceedings of The European Conference on Antennas and Propagation: EuCAP 2006*, Nice, France, 6-10 November 2006.
41. O. Sotoudeh, P.-S. Kildal, P. Ingvarson, and S. P. Skobelev, "Multimode hard horn antennas with partly corrugated walls for 20/30 GHz dual-reflector antennas with multiple beams – Full 3D simulations and measurements". *Proceedings of The European Conference on Antennas and Propagation: EuCAP 2006*, Nice, France, 6-10 November 2006.
42. M. P. Leach, M. Elsdon, D. Smith, and S. P. Skobelev, "Initial results on X-polar far field radiation patterns prediction using indirect holographic measurement," *2007 IEEE AP-S Int. Symp.*, Honolulu, Hawaii, USA, June 10-15, 2007, pp. 585-588.
43. M. Elsdon, M. Leach, S. Skobelev, and D. Smith, "Microwave holographic imaging of breast cancer," *Proc. of IEEE Int. Symp. on Microwave, Antenna, Propagation and EMC Technologies for Wireless Communications (MAPE'07)*, August 14-17, 2007, Hangzhou, China, pp. 966-969.
44. M. Leach, S. Skobelev, M. Elsdon, and D. Smith, "A modified holographic technique for antenna measurements and object imaging," *Proc. of 2007 Int. Symp.*

on Antennas and Propagation (ISAP'07), August 20-24, 2007, Niigata, Japan, pp. 77-80.

45. M. P. Leach, S. P. Skobelev, M. Elsdon, and D. Smith, "A modified indirect holographic technique for antenna measurements," *Proc. of The Int. Conf. on Electromagnetics in Advanced Applications (ICEAA '07)*, Sep. 17-21, 2007, Torino, Italy, pp. 776-779.
46. S. P. Skobelev and A. A. Yaparova, "Modeling of horn array antennas with protruding dielectric elements", *Proc. of the 6th Int. Conf. on Antenna Theory and Techniques (ICATT'07)*, Sevastopol, Ukraine, September 17-21, 2007, pp. 409-411.
47. M. Leach, D. Smith, S. Skobelev, and M. Elsdon, "An improved holographic technique for medium-gain antenna near field measurements," *Proceedings of The European Conference on Antennas and Propagation: EuCAP 2007*, Edinburgh, UK, 11-16 November 2007.
48. S. P. Skobelev, "On the ideal gain of a radiating element in a planar array." *Proc. of the 12th Int. Conf. on Mathematical Methods in Electromagnetic Theory (MMET'08)*, Odessa, Ukraine, June 29 – July 2, 2008, pp. 305-307.
49. S. P. Skobelev, "On the radiation efficiency of a dense array antenna shaping a sector radiation pattern." *Proc. of the 12th Int. Conf. on Mathematical Methods in Electromagnetic Theory (MMET'08)*, Odessa, Ukraine, June 29 – July 2, 2008, pp. 320-322.
50. M. M. Ivanishin, S. P. Skobelev, "On the efficient computation of the Green's function for doubly periodic structures by using the Kummer's method of higher orders." *Proc. of the 12th Int. Conf. on Mathematical Methods in Electromagnetic Theory (MMET'08)*, Odessa, Ukraine, June 29 – July 2, 2008, pp. 544-546.
51. S. P. Skobelev and P.-S. Kildal, "Analysis of global eigenmodes in an oversized rectangular waveguide with a hard surface on one broad wall for planar slot array antenna applications," *Proceedings of The 3rd European Conference on Antennas and Propagation: EuCAP 2009*, Berlin, Germany, 23-27 March 2009, pp. 41-44.
52. S. P. Skobelev, "Analysis of an array of waveguides with semitransparent walls for shaping flat-topped element patterns," *Proceedings of The 4th European Conference on Antennas and Propagation: EuCAP'2010*, Barcelona, Spain, 12-16 April 2010.
53. S. P. Skobelev, "Some features of the null field method and method of auxiliary sources." *Proc. of the 13th Int. Conf. on Mathematical Methods in Electromagnetic Theory (MMET'10)*, Kyiv, Ukraine, September 6-8, 2010.
54. S. P. Skobelev, "Shaping of the flat-topped element patterns in arrays of stepped horns with dielectric protrusions excited by TEM modes," *2010 IEEE International Symposium on Phased Array Systems and Technology*, Waltham-Boston, MA, USA, 12-15 October 2010, pp. 731-736.
55. С. П. Скобелев, "Модификация метода Куммера для эффективного вычисления трехмерной функции Грина для одномерно-периодических структур", *Труды международной научной конференции "Излучение и рассеяние ЭМВ" (ИРЭМВ-2011)*, Таганрог-Дивноморское, Россия, 27 июня – 2

июля 2011 г., сс. 147-150.

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