

# Gennadiy V Sotnikov

## List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/3198661/publications.pdf>

Version: 2024-02-01

80  
papers

261  
citations

1040056

9  
h-index

1058476

14  
g-index

80  
all docs

80  
docs citations

80  
times ranked

93  
citing authors

#	ARTICLE	IF	CITATIONS
1	Theory of wakefields excited by an off-axis drive bunch in a plasma-dielectric waveguide. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2022, 1034, 166766.	1.6	4
2	Excitation of wakefields by relativistic electron bunches in the dielectric waveguide filled with radially inhomogeneous plasma. EPJ Web of Conferences, 2017, 149, 02011.	0.3	3
3	A self-focusing, high transformer ratio, collinear plasma dielectric wakefield accelerator driven by a ramped bunch train. AIP Conference Proceedings, 2017, , .	0.4	0
4	A fast "kicker" using a two-channel rectangular dielectric wakefield accelerator structure. AIP Conference Proceedings, 2017, , .	0.4	0
5	Dielectric wakefield structure-based, nondestructive proton beam transverse position and profile monitor. AIP Conference Proceedings, 2017, , .	0.4	0
6	Space-charge limited current of relativistic charged-particle beam in coaxial drift tube of finite length. , 2017, , .		1
7	Relativistic charged-particle beam limiting current in bounded coaxial drift tube. , 2017, , .		1
8	Influence of emittance on transverse dynamics of accelerated bunches in the plasma-dielectric wakefield accelerator. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2016, 829, 121-124.	1.6	3
9	Generation of wakefields in a dielectric structure filled with plasma. Technical Physics, 2016, 61, 511-516.	0.7	3
10	Radiation of a wakefield excited by an electron bunch train in a section of dielectric waveguide. AIP Conference Proceedings, 2016, , .	0.4	0
11	Investigations of the concept of a multibunch dielectric wakefield accelerator. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2016, 829, 199-205.	1.6	4
12	High transformer ratio of multi-channel dielectric wakefield structures. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2016, 829, 213-220.	1.6	0
13	Multibunch Regime of Wakefield Excitation in a Plasma-Dielectric Structure. Ukrainian Journal of Physics, 2016, 61, 690-701.	0.2	1
14	Wakefield excitation in dielectric waveguides by a sequence of relativistic electron bunches. , 2014, , .		0
15	Wakefield excitation in dielectric waveguides by a sequence of relativistic electron bunches. , 2014, , .		0
16	Analytical and numerical studies of underdense and overdense regimes in plasma-dielectric wakefield accelerators. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2014, 740, 124-129.	1.6	15
17	Transverse dynamics of accelerated bunches in a plasma-dielectric wakefields. , 2014, , .		0
18	Configurations for short period rf undulators. Physical Review Special Topics: Accelerators and Beams, 2013, 16, .	1.8	13

#	ARTICLE	IF	CITATIONS
19	Limiting current of axisymmetric relativistic charged-particle beam propagating in strong axial magnetic field in coaxial drift tube. <i>Physics of Plasmas</i> , 2012, 19, .	1.9	10
20	Comparison of experimental tests and theory for a rectangular two-channel dielectric wakefield accelerator structure. <i>Physical Review Special Topics: Accelerators and Beams</i> , 2012, 15, .	1.8	13
21	Auto-oscillatory system based on dielectric resonator with whispering-gallery modes. <i>Technical Physics Letters</i> , 2012, 38, 85-88.	0.7	16
22	Nonlinear theory of wakefield excitation in a rectangular multizone dielectric resonator. <i>Physical Review Special Topics: Accelerators and Beams</i> , 2011, 14, .	1.8	1
23	Improved ramped bunch train to increase the transformer ratio of a two-channel multimode dielectric wakefield accelerator. <i>Physical Review Special Topics: Accelerators and Beams</i> , 2011, 14, .	1.8	12
24	Accelerated Bunch Stability in a Coaxial Dielectric Wakefield Structure When its Symmetry is Broken. <i>AIP Conference Proceedings</i> , 2010, , .	0.4	5
25	Two Channel Dielectric-Lined Rectangular High Transformer Ratio Accelerator Structure Experiment. , 2010, , .		0
26	A THz Coaxial Two-Channel Dielectric Wakefield Structure for High Gradient Acceleration. , 2010, , .		3
27	Two-Channel Rectangular Dielectric Wake Field Accelerator Structure Experiment. , 2009, , .		7
28	Analysis of a Symmetric Terahertz Dielectric-Lined Rectangular Structure for High Gradient Acceleration. , 2009, , .		5
29	Coaxial two-channel high-gradient dielectric wakefield accelerator. <i>Physical Review Special Topics: Accelerators and Beams</i> , 2009, 12, .	1.8	23
30	Excitation of wake fields by lengthy electron bunches in a dielectric resonator. <i>Journal of Communications Technology and Electronics</i> , 2009, 54, 1194-1200.	0.5	1
31	Synchronization of wakefield modes in the dielectric resonator. <i>Technical Physics</i> , 2008, 53, 1344-1349.	0.7	9
32	Limiting saturation levels of wake fields excited by lengthy electron bunches in the dielectric resonator. , 2008, , .		0
33	Amplification of the Multifrequency Signal in the Coaxial Slow-Wave Structure. <i>Telecommunications and Radio Engineering (English Translation of Elektrosvyaz and Radiotekhnika)</i> , 2008, 67, 177-189.	0.4	0
34	Optimization of Wake Field Excitation in Cylindrical Resonator using the PIC Code Simulation. , 2007, , .		0
35	Excitation of Broadband Signals in Coaxial TWT. , 2007, , .		0
36	Formation of a periodic magnetic field by a sequence of rings with different magnetic and electric properties. <i>Journal of Communications Technology and Electronics</i> , 2007, 52, 835-841.	0.5	0

#	ARTICLE	IF	CITATIONS
37	Wakefield Excitation by a Sequence of Electron Bunches in a Rectangular Waveguide Lined with Dielectric Slabs. AIP Conference Proceedings, 2006, , .	0.4	2
38	Amplitudes and Spectra of Wake Fields in a Planar Dielectric Resonator with Finite Q-Factor. AIP Conference Proceedings, 2006, , .	0.4	1
39	3D Analysis of Wake Field Excitation in a Dielectric Loaded Rectangular Resonator. AIP Conference Proceedings, 2006, , .	0.4	5
40	Amplitude-Frequency Characteristics of Multifrequency Signal Amplification in Coaxial Slow-Wave Transmission Line. , 2006, , .		0
41	The Nonlinear Mode Pic-Modelling of the Wake Field Excitation in the Cylindrical Resonator. , 2006, , .		0
42	High-power coaxial microwave ubitron: Simulation by the particle-in-cell method. Technical Physics, 2005, 50, 747-753.	0.7	2
43	Nonlinear dynamics of multifrequency excitation mode in coaxial slow-wave transmission line. , 2005, , .		0
44	Effect of the ponderomotive force on the development of beam-plasma instability. Plasma Physics Reports, 2003, 29, 307-327.	0.9	4
45	Charged particles accelerated by wake fields in a dielectric resonator with exciting electron bunch channel. Technical Physics Letters, 2003, 29, 589-591.	0.7	9
46	Effect of the microwave ponderomotive force on the development of the beam instability at different plasma and beam parameters. Plasma Physics Reports, 2003, 29, 688-694.	0.9	1
47	Virtual anode as a source of low-frequency oscillations of a high-current electron beam. Technical Physics Letters, 2003, 29, 967-970.	0.7	1
48	Virtual anode as a source of low-frequency oscillations of high-current electron beams. , 2003, , .		0
49	Theory of high power coaxial ubitron. , 2003, , .		0
50	Starting currents in coaxial gyro-BWO. , 2003, , .		0
51	Generation of intense slow waves of a space charge by IREB in periodic magnetic fields. , 2003, , .		0
52	Structure of electromagnetic field excited by an electron bunch in a semi-infinite dielectric-filled waveguide. Physical Review E, 2002, 65, 066501.	2.1	25
53	Broadband emission from a relativistic electron bunch in a semi-infinite waveguide. Technical Physics, 2002, 47, 227-234.	0.7	4
54	Space charge limiting current of an electron beam transported in a coaxial drift chamber. Technical Physics, 2002, 47, 535-538.	0.7	16

#	ARTICLE	IF	CITATIONS
55	Microwave amplification in a coaxial slow-wave plasma transmission line. Plasma Physics Reports, 2001, 27, 480-489.	0.9	4
56	Excitation of a wake field by a relativistic electron bunch in a semi-infinite dielectric waveguide. Journal of Experimental and Theoretical Physics, 2001, 93, 33-42.	0.9	6
57	Removal of asphalt-paraffin deposits in oil pipelines by a moving source of high-frequency electromagnetic radiation. Technical Physics, 2001, 46, 1069-1075.	0.7	3
58	Wakefield excitation by a relativistic electron bunch in a magnetized plasma. Plasma Physics Reports, 2000, 26, 889-892.	0.9	9
59	The destruction of asphaltic-paraffin plugs in oil lines by means of a moving source of HF-radiation. , 2000, , .		0
60	The effect of the powerful nonstationary RF-radiation on paraffin plugs in the equipment of oil bores. , 2000, , .		0
61	Multi-mode wake-field excitation by sequence of relativistic electron bunches in dielectric waveguide. , 2000, , .		0
62	Electrodynamics of coupled cavities chain, blown by e-beam. , 1999, , .		0
63	UHF method of elimination of the paraffin plug in oil well. , 1999, , .		1
64	Interaction of a modulated electron beam with a plasma. Radiophysics and Quantum Electronics, 1989, 32, 993-999.	0.5	0
65	Excitation of broadband oscillations by electron beam in coaxial disk loaded transmission line. , 0, , .		1
66	Plasma nonlinearity influence on HF oscillation excitation by the electron beam in hybrid plasma waveguides. , 0, , .		0
67	Dielectric wake-field generator. , 0, , .		8
68	Acceleration wake-field enhancement of excited by long relativistic electron bunch owing to self-modulation. , 0, , .		0
69	The spectrum broadening of excited oscillations in coaxial slowing structure when filling by plasma. , 0, , .		0
70	Electrodynamics of the plasma-filled inverted chain of coupled cavities. , 0, , .		0
71	Coaxial slowing down structure for hybrid UHF amplifier of range 1-3 GHz. , 0, , .		1
72	Generation of UHF oscillations in slowing down lines with magnetic insulation. , 0, , .		5

#	ARTICLE	IF	CITATIONS
73	The exciting of the wake field in the dielectric waveguide. , 0, , .		0
74	Dielectric wake-field generator. , 0, , .		0
75	Beam-plasma amplifier on basis of coaxial transmission line. , 0, , .		0
76	Above plasma frequency radiation at intense beam-plasma interaction. , 0, , .		0
77	Short pulse generation in dielectric by a sequence of electron bunches. , 0, , .		0
78	Development of the numerical code for researching a virtual cathode in a group ion accelerator. , 0, , .		0
79	Influence of a finite length of a dielectric waveguide on the acceleration of electrons by wake fields of a train of bunches. , 0, , .		0
80	Resonant Excitation of Selected Modes by a Train of Electron Bunches in a Rectangular Dielectric Wakefield Accelerator. , 0, , .		0