Tomasz R Sosnowski

List of Publications by Year
in descending order

78	1,303	279487	414034
papers	citations	23 h-index	32 g-index

88	88	88	1261
all docs	docs citations	times ranked	citing authors

#	Article	IF	Citations
1	Formation of particles for dry powder inhalers. Advanced Powder Technology, 2014, 25, 43-55.	2.0	90
2	Predicted Deposition of E-Cigarette Aerosol in the Human Lungs. Journal of Aerosol Medicine and Pulmonary Drug Delivery, 2016, 29, 299-309.	0.7	64
3	Short- and mid-term adsorption behaviour of Quillaja Bark Saponin and its mixtures with lysozyme. Food Hydrocolloids, 2011, 25, 687-693.	5.6	61
4	Particle Size Dynamics: Toward a Better Understanding of Electronic Cigarette Aerosol Interactions With the Respiratory System. Frontiers in Physiology, 2018, 9, 853.	1.3	57
5	Particles on the lung surface - physicochemical and hydrodynamic effects. Current Opinion in Colloid and Interface Science, 2018, 36, 1-9.	3.4	40
6	Dynamics of Oropharyngeal Aerosol Transport and Deposition With the Realistic Flow Pattern. Inhalation Toxicology, 2006, 18, 773-780.	0.8	39
7	Effect of clay nanoparticles on model lung surfactant: a potential marker of hazard from nanoaerosol inhalation. Environmental Science and Pollution Research, 2016, 23, 4660-4669.	2.7	39
8	Conception, preparation and properties of functional carrier particles for pulmonary drug delivery. International Journal of Pharmaceutics, 2012, 433, 51-59.	2.6	38
9	Physicochemical studies of direct interactions between lung surfactant and components of electronic cigarettes liquid mixtures. Inhalation Toxicology, 2018, 30, 159-168.	0.8	38
10	A particle technology approach toward designing dry-powder inhaler formulations for personalized medicine in respiratory diseases. Advanced Powder Technology, 2020, 31, 219-226.	2.0	37
11	Influence of Insoluble Aerosol Deposits on the Surface Activity of the Pulmonary Surfactant: A Possible Mechanism of Alveolar Clearance Retardation?. Aerosol Science and Technology, 2000, 32, 52-60.	1.5	35
12	Inhalation devices: from basic science to practical use, innovative vs generic products. Expert Opinion on Drug Delivery, 2016, 13, 1559-1571.	2.4	34
13	Inhaled aerosols: Their role in COVID-19 transmission, including biophysical interactions in the lungs. Current Opinion in Colloid and Interface Science, 2021, 54, 101451.	3.4	33
14	Alteration of biophysical activity of pulmonary surfactant by aluminosilicate nanoparticles. Inhalation Toxicology, 2013, 25, 77-83.	0.8	31
15	New experimental model of pulmonary surfactant for biophysical studies. Colloids and Surfaces A: Physicochemical and Engineering Aspects, 2017, 519, 27-33.	2.3	31
16	Effects of Process Variables on the Properties of Spray-Dried Mannitol and Mannitol/Disodium Cromoglycate Powders Suitable for Drug Delivery by Inhalation. Industrial & Engineering Chemistry Research, 2011, 50, 13922-13931.	1.8	30
17	Mechanims of Aerosol Particle Deposition in the Oro-Pharynx Under Non-Steady Airflow. Annals of Occupational Hygiene, 2006, 51, 19-25.	1.9	29
18	Turbulent flow energy for aerosolization of powder particles. Journal of Aerosol Science, 2008, 39, 113-126.	1.8	27

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19	Impact of physicochemical properties of nasal spray products on drug deposition and transport in the pediatric nasal cavity model. International Journal of Pharmaceutics, 2020, 574, 118911.	2.6	27
20	Deactivation of the Pulmonary Surfactant Dynamics by Toxic Aerosols and Gases. Journal of Aerosol Medicine and Pulmonary Drug Delivery, 2001, 14, 455-466.	1.2	25
21	Deposition of Fractal-Like Aerosol Aggregates in a Model of Human Nasal Cavity. Inhalation Toxicology, 2006, 18, 725-731.	0.8	25
22	Alteration of Surface Properties of Dipalmitoyl Phosphatidylcholine by Benzo[<I>a</I>]pyrene: A Model of Pulmonary Effects of Diesel Exhaust Inhalation. Journal of Biomedical Nanotechnology, 2012, 8, 818-825.	0.5	25
23	Experimental and Theoretical Investigations of Transport Properties of DPPC Monolayer. Journal of Aerosol Medicine and Pulmonary Drug Delivery, 1996, 9, 357-367.	1.2	24
24	The effect of shear and extensional viscosities on atomization of Newtonian and non-Newtonian fluids in ultrasonic inhaler. International Journal of Pharmaceutics, 2015, 485, 41-49.	2.6	24
25	Aerosolized Albuterol Sulfate Delivery under Neonatal Ventilatory Conditions: In Vitro Evaluation of a Novel Ventilator Circuit Patient Interface Connector. Journal of Aerosol Medicine and Pulmonary Drug Delivery, 2014, 27, 58-65.	0.7	20
26	Interactions of Benzo[<italic>a</italic>]pyrene and Diesel Exhaust Particulate Matter with the Lung Surfactant System. Annals of Occupational Hygiene, 2011, 55, 329-38.	1.9	19
27	Is the cell retention by MF membrane absolutely safe?a hypothetical model for cell deformation in a membrane pore. Journal of Membrane Science, 2005, 250, 135-140.	4.1	18
28	Dynamic tensiometry studies on interactions of novel therapeutic inhalable powders with model pulmonary surfactant at the airâ€“water interface. Colloids and Surfaces A: Physicochemical and Engineering Aspects, 2015, 480, 149-158.	2.3	18
29	Preparation and Characterization of Biocompatible Polymer Particles as Potential Nanocarriers for Inhalation Therapy. International Journal of Polymer Science, 2015, 2015, 1-8.	1.2	17
30	Powder Particles and Technologies for Medicine Delivery to the Respiratory System: Challenges and Opportunities. KONA Powder and Particle Journal, 2018, 35, 122-138.	0.9	17
31	In silico evaluation of particle transport and deposition in the airways of individual patients with chronic obstructive pulmonary disease. European Journal of Pharmaceutics and Biopharmaceutics, 2022, 174, 10-19.	2.0	17
32	Self-organization of colloidal particles during drying of a droplet: Modeling and experimental study. Advanced Powder Technology, 2018, 29, 3542-3551.	2.0	16
33	Nanosized and Nanostructured Particles in Pulmonary Drug Delivery. Journal of Nanoscience and Nanotechnology, 2015, 15, 3476-3487.	0.9	15
34	Selected Engineering and Physicochemical Aspects of Systemic Drug Delivery by Inhalation. Current Pharmaceutical Design, 2016, 22, 2453-2462.	0.9	15
35	Modification of inhalable powders by pulmonary surfactant components adsorbed on droplets during spray-drying process. Colloids and Surfaces A: Physicochemical and Engineering Aspects, 2010, 365, 56-61.	2.3	14
36	Experimental Evaluation of the Importance of the Pulmonary Surfactant for Oxygen Transfer Rate in Human Lungs. International Journal of Occupational Safety and Ergonomics, 1998, 4, 391-409.	1.1	13

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37	Interfacial rheology for the assessment of potential health effects of inhaled carbon nanomaterials at variable breathing conditions. Scientific Reports, 2020, 10, 14044.	1.6	13
38	A CANINE MODEL FOR PRODUCTION OF SEVERE UNILATERAL PANACINAR EMPHYSEMA. Experimental Lung Research, 2004, 30, 319-332.	0.5	12
39	Assessment of the Pulmonary Toxicity of Inhaled Gases and Particles With Physicochemical Methods. International Journal of Occupational Safety and Ergonomics, 1999, 5, 431-447.	1.1	11
40	Fluidization and break-up of powder particle aggregates during constant and pulsating flow in converging nozzles. Colloids and Surfaces A: Physicochemical and Engineering Aspects, 2014, 441, 905-911.	2.3	11
41	The Influence of Functional Carrier Particles (FCPs) on the Molecular Transport Rate Through the Reconstructed Bronchial Mucus: In Vitro Studies. Transport in Porous Media, 2015, 106, 439-454.	1.2	11
42	Bioactive Betulin and PEG Based Polyanhydrides for Use in Drug Delivery Systems. International Journal of Molecular Sciences, 2021, 22, 1090.	1.8	11
43	Interaction of Deposited Aerosol Particles with the Alveolar Liquid Layer. , 2003, , 205-216.		9
44	The thermostated medical jet nebulizer: Aerosol characteristics. International Journal of Pharmaceutics, 2019, 567, 118475.	2.6	9
45	Impact of Inhalers Used in the Treatment of Respiratory Diseases on Global Warming. Advances in Respiratory Medicine, 2021, 89, 427-438.	0.5	9
46	Removal of soot particles from Diesel exhaust. Journal of Aerosol Science, 1996, 27, S705-S706.	1.8	8
47	Technical challenges in obtaining an optimized powder/DPI combination for inhalation delivery of a bi-component generic drug. Journal of Drug Delivery Science and Technology, 2018, 44, 406-414.	1.4	8
48	Interactions of Carbon Nanotubes and Carbon Nanohorns with a Model Membrane Layer and Lung Surfactant In Vitro. Journal of Nanomaterials, 2019, 2019, 1-10.	1.5	8
49	Dynamic analysis of the process of an aerosol particle deposition onto an extracellular lining layer in the human lung. Journal of Aerosol Science, 2000, 31, 500-501.	1.8	7
50	Importance of airway geometry and respiratory parameters variability for particle deposition in the human respiratory tract. Journal of Thoracic Disease, 2011, 3, 153-5.	0.6	6
51	Adsorption and Co-Adsorption of Polyaldehyde Dextran Nanoparticles and Nonionic Surfactant at an Airâ€“Water Interface: Potential Implications for Pulmonary Drug Delivery. Chemical and Process Engineering - Inzynieria Chemiczna I Procesowa, 2017, 38, 67-77.	0.7	5
52	The Optimal Diameter of the Droplets of a High-Viscosity Liquid Containing Solid State Catalyst Particles. Energies, 2022, 15, 3937.	1.6	5
53	Depozycja donosowych preparatÃ³w glikokortykosteroidÃ³w â€“ badania wstÄ™pne. Otolaryngologia Polska, 2015, 69, 36-40.	0.2	4
54	Evolution of droplet size distribution in selected nebulizers. Physicochemical Problems of Mineral Processing, 0, , 32-40.	0.2	4

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55	Theoretical consideration on immediate interactions between inhaled particles and the pulmonary surfactant. Journal of Aerosol Science, 2000, 31, 498-499.	1.8	3
56	Aerosol Generation and Identification for Model Studies of Particleâ€“Lung Interactions. International Journal of Occupational Safety and Ergonomics, 2010, 16, 41-48.	1.1	3
57	Bronchial Mucus as a Complex Fluid: Molecular Interactions and Influence of Nanostructured Particles on Rheological and Transport Properties. Chemical and Process Engineering - Inzynieria Chemiczna I Procesowa, 2017, 38, 217-229.	0.7	3
58	Transport of aerosol deposits at the active surface of liquid layer. Journal of Aerosol Science, 1995, 26, S541-S542.	1.8	2
59	Resuspension of Powders and Deposition of Aerosol Particles in the Upper Human Airways. , 2003, , 123-137.		2
60	Pulse Nebulization in Pneumatic Devices. International Journal of Occupational Safety and Ergonomics, 1999, 5, 31-42.	1.1	1
61	Mass transfer through the gas-liquid interface at the presence of adsorbed active phospholipid monolayer. Studies in Surface Science and Catalysis, 2001, 133, 283-288.	1.5	1
62	Chemical Engineering in Biomedical Problemsâ€"Selected Applications. Lecture Notes on Multidisciplinary Industrial Engineering, 2018, , 307-318.	0.4	1
63	Impact of selected construction elements of capsule-based dry powder inhalers on the manner of drug delivery to the lungs. Pediatria I Medycyna Rodzinna, 2016, 12, 466-470.	2.3	1
64	Inhalation and Deposition of Nanoparticles: Fundamentals, Phenomenology and Practical Aspects. , 2010, , 113-144.		1
65	Application of a Fibrous Electrostatic Filterfor Treatment of Diesel Exhaust. International Journal of Occupational Safety and Ergonomics, 2000, 6, 321-333.	1.1	0
66	COMPARISON OF THE PRESSURE DROP AND AEROSOL DEPOSITION EFFICIENCY IN A NASO-ORO-PHARYNGEAL CAST AND THE USP INDUCTION PORT. Journal of Aerosol Science, 2004, 35, S1131-S1132.	1.8	0
67	Relation between Neonatal Endotracheal (ET) Tube Size and Aerosol Penetration- Computational Fluid Dynamic Study (CFD). Pediatric Research, 2011, 70, 531-531.	1.1	0
68	Surface properties of pulmonary surfactant in the presence of metal oxide nanoparticles. Toxicology Letters, 2016, 258, S271.	0.4	0
69	Zasady stosowania komÃ³r inhalacyjnych u dzieci. Pediatria Polska, 2017, 92, 288-293.	0.1	0
70	Editor's Notes. In Honour of Professor Leon GradoÅ„ on the Occasion of His 70th Birthday. Chemical and Process Engineering - Inzynieria Chemiczna I Procesowa, 2017, 38, 3-4.	0.7	0
71	Czy preparaty propionianu flutykazonu z salmeterolem z pMDI sÄ… takie same? Doniesienie wstÄ™pne. Alergoprofil, 2021, 17, 39-44.	0.1	0
72	PoÅ‚Ä…czenia glikokortykosteroidu z dÅ‚ugo dziaÅ‚ajÄ…cym Î²2-mimetykiem w inhalatorze ciÅ›nieniowym dozujÄ…cym â€“ jakie, komu, kiedy?. Alergoprofil, 2021, 17, 19-26.	0.1	0

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73	Metoda badania wpÅ‚ywu nanoczÄ…stek na wÅ‚aÅ›ciwoÅ›ci powierzchniowe monowarstwy gÅ‚Ã³wnego skÅ‚adnika surfaktantu pÅ‚ucnego (DPPC) w ukÅ‚adzie wagi Langmuira-Wilhelmyâ€™ego. Podstawy I Metody Oceny Åšrodowiska Pracy, 2013, 29, 143-153.	0.0	0
74	Particles and lungs - where chemical engineering meets medicine. , 2019, , .		0
75	Inhalation as a Means of Systemic Drug Delivery. Healthy Ageing and Longevity, 2020, , 327-344.	0.2	0
76	Experimental Analysis of the Deposition of Aerosol Droplets in the Upper Airways of Human. , 2020, , 423-429.		0
77	WYBRANE ZAGADNIENIA FIZYKOCHEMII KOLOIDÃ“W W PROCESACH INHALACYJNEGO DOSTARCZANIA LEKÃ“W DO PÅUC. WiadomoÅ›ci Chemiczne, 2021, 75, 1375-1393.	0.0	0
78	Jak ograniczyÄ‡ Å›lad wÄ™glowy inhalatorÃ³w ciÅ›nieniowych dozujÄ…cych ?. Alergoprofil, 2022, 18, 14-20.	0.1	0