

Sander Bekeschus

List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/6594086/publications.pdf>

Version: 2024-02-01

194
papers

6,967
citations

53660

45
h-index

82410

72
g-index

215
all docs

215
docs citations

215
times ranked

2900
citing authors

| # | ARTICLE | IF | CITATIONS |
|----|--|-----|-----------|
| 1 | The plasma jet kINPen â€“ A powerful tool for wound healing. <i>Clinical Plasma Medicine</i> , 2016, 4, 19-28. | 3.2 | 303 |
| 2 | Clinical experience with cold plasma in the treatment of locally advanced head and neck cancer. <i>Clinical Plasma Medicine</i> , 2018, 9, 6-13. | 3.2 | 236 |
| 3 | Plasma Medicine: Applications of Cold Atmospheric Pressure Plasma in Dermatology. <i>Oxidative Medicine and Cellular Longevity</i> , 2019, 2019, 1-10. | 1.9 | 227 |
| 4 | Hydrogen peroxide: A central player in physical plasma-induced oxidative stress in human blood cells. <i>Free Radical Research</i> , 2014, 48, 542-549. | 1.5 | 201 |
| 5 | Plasma Medicine: A Field of Applied Redox Biology. <i>In Vivo</i> , 2019, 33, 1011-1026. | 0.6 | 189 |
| 6 | A cold plasma jet accelerates wound healing in a murine model of full-thickness skin wounds. <i>Experimental Dermatology</i> , 2017, 26, 156-162. | 1.4 | 181 |
| 7 | ROS from Physical Plasmas: Redox Chemistry for Biomedical Therapy. <i>Oxidative Medicine and Cellular Longevity</i> , 2019, 2019, 1-29. | 1.9 | 168 |
| 8 | Molecular Mechanisms of the Efficacy of Cold Atmospheric Pressure Plasma (CAP) in Cancer Treatment. <i>Cancers</i> , 2020, 12, 269. | 1.7 | 131 |
| 9 | Risk assessment of a cold argon plasma jet in respect to its mutagenicity. <i>Mutation Research - Genetic Toxicology and Environmental Mutagenesis</i> , 2016, 798-799, 48-54. | 0.9 | 126 |
| 10 | White paper on plasma for medicine and hygiene: Future in plasma health sciences. <i>Plasma Processes and Polymers</i> , 2019, 16, 1800033. | 1.6 | 123 |
| 11 | Non-thermal plasma-treated solution demonstrates antitumor activity against pancreatic cancer cells in vitro and in vivo. <i>Scientific Reports</i> , 2017, 7, 8319. | 1.6 | 114 |
| 12 | Physical plasma-treated saline promotes an immunogenic phenotype in CT26 colon cancer cells in vitro and in vivo. <i>Scientific Reports</i> , 2019, 9, 634. | 1.6 | 107 |
| 13 | Oxygen atoms are critical in rendering THP-1 leukaemia cells susceptible to cold physical plasma-induced apoptosis. <i>Scientific Reports</i> , 2017, 7, 2791. | 1.6 | 106 |
| 14 | Investigating the Mutagenicity of a Cold Argon-Plasma Jet in an HET-MN Model. <i>PLoS ONE</i> , 2016, 11, e0160667. | 1.1 | 91 |
| 15 | Impact of non-thermal plasma treatment on MAPK signaling pathways of human immune cell lines. <i>Immunobiology</i> , 2013, 218, 1248-1255. | 0.8 | 90 |
| 16 | Combination of chemotherapy and physical plasma elicits melanoma cell death via upregulation of SLC22A16. <i>Cell Death and Disease</i> , 2018, 9, 1179. | 2.7 | 88 |
| 17 | Chemistry and biochemistry of cold physical plasma derived reactive species in liquids. <i>Biological Chemistry</i> , 2018, 400, 19-38. | 1.2 | 87 |
| 18 | One Year Follow-Up Risk Assessment in SKH-1 Mice and Wounds Treated with an Argon Plasma Jet. <i>International Journal of Molecular Sciences</i> , 2017, 18, 868. | 1.8 | 86 |

| # | ARTICLE | IF | CITATIONS |
|----|---|-----|-----------|
| 19 | Medical Gas Plasma Jet Technology Targets Murine Melanoma in an Immunogenic Fashion. <i>Advanced Science</i> , 2020, 7, 1903438. | 5.6 | 84 |
| 20 | Non-thermal plasma treatment is associated with changes in transcriptome of human epithelial skin cells. <i>Free Radical Research</i> , 2013, 47, 577-592. | 1.5 | 81 |
| 21 | Nrf2 signaling and inflammation are key events in physical plasma-spurred wound healing. <i>Theranostics</i> , 2019, 9, 1066-1084. | 4.6 | 81 |
| 22 | Human Mononuclear Cell Survival and Proliferation is Modulated by Cold Atmospheric Plasma Jet. <i>Plasma Processes and Polymers</i> , 2013, 10, 706-713. | 1.6 | 76 |
| 23 | Plasma-Treated Solutions (PTS) in Cancer Therapy. <i>Cancers</i> , 2021, 13, 1737. | 1.7 | 70 |
| 24 | Chemical fingerprints of cold physical plasmas – an experimental and computational study using cysteine as tracer compound. <i>Scientific Reports</i> , 2018, 8, 7736. | 1.6 | 67 |
| 25 | Medical gas plasma-stimulated wound healing: Evidence and mechanisms. <i>Redox Biology</i> , 2021, 46, 102116. | 3.9 | 65 |
| 26 | Low-Temperature Plasma for Biology, Hygiene, and Medicine: Perspective and Roadmap. <i>IEEE Transactions on Radiation and Plasma Medical Sciences</i> , 2022, 6, 127-157. | 2.7 | 64 |
| 27 | Non-thermal plasma-induced immunogenic cell death in cancer. <i>Journal Physics D: Applied Physics</i> , 2019, 52, 423001. | 1.3 | 63 |
| 28 | Nitrogen Shielding of an Argon Plasma Jet and Its Effects on Human Immune Cells. <i>IEEE Transactions on Plasma Science</i> , 2015, 43, 776-781. | 0.6 | 61 |
| 29 | Cell migration and adhesion of a human melanoma cell line is decreased by cold plasma treatment. <i>Clinical Plasma Medicine</i> , 2015, 3, 24-31. | 3.2 | 60 |
| 30 | Redox Stimulation of Human THP-1 Monocytes in Response to Cold Physical Plasma. <i>Oxidative Medicine and Cellular Longevity</i> , 2016, 2016, 1-11. | 1.9 | 57 |
| 31 | Viability of Human Blood Leukocytes Compared with Their Respective Cell Lines after Plasma Treatment. <i>Plasma Medicine</i> , 2013, 3, 71-80. | 0.2 | 55 |
| 32 | Toxicity and Immunogenicity in Murine Melanoma following Exposure to Physical Plasma-Derived Oxidants. <i>Oxidative Medicine and Cellular Longevity</i> , 2017, 2017, 1-12. | 1.9 | 55 |
| 33 | High throughput image cytometry micronucleus assay to investigate the presence or absence of mutagenic effects of cold physical plasma. <i>Environmental and Molecular Mutagenesis</i> , 2018, 59, 268-277. | 0.9 | 55 |
| 34 | Maintaining health by balancing microbial exposure and prevention of infection: the hygiene hypothesis versus the hypothesis of early immune challenge. <i>Journal of Hospital Infection</i> , 2013, 83, S29-S34. | 1.4 | 54 |
| 35 | Periodic Exposure of Keratinocytes to Cold Physical Plasma: An <i>In Vitro</i> Model for Redox-Related Diseases of the Skin. <i>Oxidative Medicine and Cellular Longevity</i> , 2016, 2016, 1-17. | 1.9 | 54 |
| 36 | Redox Regulation of Inflammatory Processes Is Enzymatically Controlled. <i>Oxidative Medicine and Cellular Longevity</i> , 2017, 2017, 1-23. | 1.9 | 54 |

| # | ARTICLE | IF | CITATIONS |
|----|---|-----|-----------|
| 37 | Nonthermal Plasma Increases Expression of Wound Healing Related Genes in a Keratinocyte Cell Line. <i>Plasma Medicine</i> , 2013, 3, 125-136. | 0.2 | 53 |
| 38 | Basic Research in Plasma Medicine - A Throughput Approach from Liquids to Cells. <i>Journal of Visualized Experiments</i> , 2017, , . | 0.2 | 53 |
| 39 | Neutrophil extracellular trap formation is elicited in response to cold physical plasma. <i>Journal of Leukocyte Biology</i> , 2016, 100, 791-799. | 1.5 | 52 |
| 40 | Cold Atmospheric Pressure Plasma in Wound Healing and Cancer Treatment. <i>Applied Sciences (Switzerland)</i> , 2020, 10, 6898. | 1.3 | 52 |
| 41 | Physical Plasma Elicits Immunogenic Cancer Cell Death and Mitochondrial Singlet Oxygen. <i>IEEE Transactions on Radiation and Plasma Medical Sciences</i> , 2018, 2, 138-146. | 2.7 | 51 |
| 42 | Cold Physical Plasma Treatment Alters Redox Balance in Human Immune Cells. <i>Plasma Medicine</i> , 2013, 3, 267-278. | 0.2 | 50 |
| 43 | Treating cancer with cold physical plasma: On the way to evidence-based medicine. <i>Contributions To Plasma Physics</i> , 2018, 58, 415-419. | 0.5 | 49 |
| 44 | Cold Atmospheric Plasma Is a Potent Tool to Improve Chemotherapy in Melanoma In Vitro and In Vivo. <i>Biomolecules</i> , 2020, 10, 1011. | 1.8 | 49 |
| 45 | Differential Viability of Eight Human Blood Mononuclear Cell Subpopulations After Plasma Treatment. <i>Plasma Medicine</i> , 2013, 3, 1-13. | 0.2 | 48 |
| 46 | xCT (SLC7A11) expression confers intrinsic resistance to physical plasma treatment in tumor cells. <i>Redox Biology</i> , 2020, 30, 101423. | 3.9 | 47 |
| 47 | Consequences of nano and microplastic exposure in rodent models: the known and unknown. <i>Particle and Fibre Toxicology</i> , 2022, 19, 28. | 2.8 | 47 |
| 48 | A Comparison of Floating-Electrode DBD and kINPen Jet: Plasma Parameters to Achieve Similar Growth Reduction in Colon Cancer Cells Under Standardized Conditions. <i>Plasma Chemistry and Plasma Processing</i> , 2018, 38, 1-12. | 1.1 | 46 |
| 49 | Cold Atmospheric Plasma (CAP) and CAP-Stimulated Cell Culture Media Suppress Ovarian Cancer Cell Growth – A Putative Treatment Option in Ovarian Cancer Therapy. <i>Anticancer Research</i> , 2017, 37, 6739-6744. | 0.5 | 46 |
| 50 | Cold Physical Plasmas in the Field of Hygiene – Relevance, Significance, and Future Applications. <i>Plasma Processes and Polymers</i> , 2015, 12, 1410-1422. | 1.6 | 45 |
| 51 | Redox-regulation of activator protein 1 family members in blood cancer cell lines exposed to cold physical plasma-treated medium. <i>Plasma Processes and Polymers</i> , 2016, 13, 1179-1188. | 1.6 | 45 |
| 52 | Cold Atmospheric Plasma in the Treatment of Osteosarcoma. <i>International Journal of Molecular Sciences</i> , 2017, 18, 2004. | 1.8 | 44 |
| 53 | Redox for Repair: Cold Physical Plasmas and Nrf2 Signaling Promoting Wound Healing. <i>Antioxidants</i> , 2018, 7, 146. | 2.2 | 44 |
| 54 | Elevated H2AX Phosphorylation Observed with kINPen Plasma Treatment Is Not Caused by ROS-Mediated DNA Damage but Is the Consequence of Apoptosis. <i>Oxidative Medicine and Cellular Longevity</i> , 2019, 2019, 1-15. | 1.9 | 44 |

| # | ARTICLE | IF | CITATIONS |
|----|---|-----|-----------|
| 55 | Cold Physical Plasma Modulates p53 and Mitogen-Activated Protein Kinase Signaling in Keratinocytes. <i>Oxidative Medicine and Cellular Longevity</i> , 2019, 2019, 1-16. | 1.9 | 44 |
| 56 | Potentiating anti-tumor immunity with physical plasma. <i>Clinical Plasma Medicine</i> , 2018, 12, 17-22. | 3.2 | 42 |
| 57 | Gas Plasma Technology Augments Ovalbumin Immunogenicity and T Cell Activation Conferring Tumor Protection in Mice. <i>Advanced Science</i> , 2021, 8, 2003395. | 5.6 | 41 |
| 58 | Role of Ambient Gas Composition on Cold Physical Plasma-Elicited Cell Signaling in Keratinocytes. <i>Biophysical Journal</i> , 2017, 112, 2397-2407. | 0.2 | 40 |
| 59 | Risk Assessment of kINPen Plasma Treatment of Four Human Pancreatic Cancer Cell Lines with Respect to Metastasis. <i>Cancers</i> , 2019, 11, 1237. | 1.7 | 40 |
| 60 | Targeting malignant melanoma with physical plasmas. <i>Clinical Plasma Medicine</i> , 2018, 10, 1-8. | 3.2 | 39 |
| 61 | Cold Physical Plasma Selectively Elicits Apoptosis in Murine Pancreatic Cancer Cells <i>In Vitro</i> and <i>In Ovo</i> . <i>Anticancer Research</i> , 2018, 38, 5655-5663. | 0.5 | 39 |
| 62 | Cytochrome C oxidase Inhibition and Cold Plasma-derived Oxidants Synergize in Melanoma Cell Death Induction. <i>Scientific Reports</i> , 2018, 8, 12734. | 1.6 | 38 |
| 63 | Physical plasma-triggered ROS induces tumor cell death upon cleavage of HSP90 chaperone. <i>Scientific Reports</i> , 2019, 9, 4112. | 1.6 | 37 |
| 64 | A myeloid and lymphoid infiltrate in murine pancreatic tumors exposed to plasma-treated medium. <i>Clinical Plasma Medicine</i> , 2018, 11, 10-17. | 3.2 | 35 |
| 65 | Physical plasma and leukocytes – immune or reactive?. <i>Biological Chemistry</i> , 2018, 400, 63-75. | 1.2 | 35 |
| 66 | Gas plasma irradiation of breast cancers promotes immunogenicity, tumor reduction, and an abscopal effect in vivo. <i>Oncolmmunology</i> , 2021, 10, 1859731. | 2.1 | 34 |
| 67 | Conductivity augments ROS and RNS delivery and tumor toxicity of an argon plasma jet. <i>Free Radical Biology and Medicine</i> , 2022, 180, 210-219. | 1.3 | 34 |
| 68 | Cold physical plasma selects for specific T helper cell subsets with distinct cells surface markers in a caspase-dependent and NF- κ B-independent manner. <i>Plasma Processes and Polymers</i> , 2016, 13, 1144-1150. | 1.6 | 33 |
| 69 | Platelets are key in cold physical plasma-facilitated blood coagulation in mice. <i>Clinical Plasma Medicine</i> , 2017, 7-8, 58-65. | 3.2 | 33 |
| 70 | RAW 264.7 Macrophage Polarization by Pancreatic Cancer Cells – A Model for Studying Tumour-promoting Macrophages. <i>Anticancer Research</i> , 2019, 39, 2871-2882. | 0.5 | 33 |
| 71 | Tumor cell metabolism correlates with resistance to gas plasma treatment: The evaluation of three dogmas. <i>Free Radical Biology and Medicine</i> , 2021, 167, 12-28. | 1.3 | 33 |
| 72 | Gas Plasma-Conditioned Ringer's Lactate Enhances the Cytotoxic Activity of Cisplatin and Gemcitabine in Pancreatic Cancer <i>In Vitro</i> and <i>In Ovo</i> . <i>Cancers</i> , 2020, 12, 123. | 1.7 | 32 |

| # | ARTICLE | IF | CITATIONS |
|----|--|-----|-----------|
| 73 | Combination of Gas Plasma and Radiotherapy Has Immunostimulatory Potential and Additive Toxicity in Murine Melanoma Cells in Vitro. <i>International Journal of Molecular Sciences</i> , 2020, 21, 1379. | 1.8 | 31 |
| 74 | On a heavy path â€“ determining cold plasma-derived short-lived species chemistry using isotopic labelling. <i>RSC Advances</i> , 2020, 10, 11598-11607. | 1.7 | 31 |
| 75 | Activation of Murine Immune Cells upon Co-culture with Plasma-treated B16F10 Melanoma Cells. <i>Applied Sciences (Switzerland)</i> , 2019, 9, 660. | 1.3 | 30 |
| 76 | Gas plasma-spurred wound healing is accompanied by regulation of focal adhesion, matrix remodeling, and tissue oxygenation. <i>Redox Biology</i> , 2021, 38, 101809. | 3.9 | 30 |
| 77 | Hmox1 Upregulation Is a Mutual Marker in Human Tumor Cells Exposed to Physical Plasma-Derived Oxidants. <i>Antioxidants</i> , 2018, 7, 151. | 2.2 | 29 |
| 78 | Cold Argon Plasma as Adjuvant Tumour Therapy on Progressive Head and Neck Cancer: A Preclinical Study. <i>Applied Sciences (Switzerland)</i> , 2019, 9, 2061. | 1.3 | 29 |
| 79 | The molecular and physiological consequences of cold plasma treatment in murine skin and its barrier function. <i>Free Radical Biology and Medicine</i> , 2020, 161, 32-49. | 1.3 | 29 |
| 80 | Nonenzymatic post-translational modifications in peptides by cold plasma-derived reactive oxygen and nitrogen species. <i>Biointerphases</i> , 2020, 15, 061008. | 0.6 | 29 |
| 81 | Gas Plasma Technologyâ€™ An Asset to Healthcare During Viral Pandemics Such as the COVID-19 Crisis?. <i>IEEE Transactions on Radiation and Plasma Medical Sciences</i> , 2020, 4, 391-399. | 2.7 | 28 |
| 82 | Combination Treatment with Cold Physical Plasma and Pulsed Electric Fields Augments ROS Production and Cytotoxicity in Lymphoma. <i>Cancers</i> , 2020, 12, 845. | 1.7 | 28 |
| 83 | The feed gas composition determines the degree of physical plasma-induced platelet activation for blood coagulation. <i>Plasma Sources Science and Technology</i> , 2018, 27, 034001. | 1.3 | 27 |
| 84 | Nonthermal Plasma Jet Treatment Negatively Affects the Viability and Structure of <i>Candida albicans</i> SC5314 Biofilms. <i>Applied and Environmental Microbiology</i> , 2018, 84, . | 1.4 | 27 |
| 85 | In Vitro Anticancer Efficacy of Six Different Clinically Approved Types of Liquids Exposed to Physical Plasma. <i>IEEE Transactions on Radiation and Plasma Medical Sciences</i> , 2019, 3, 588-596. | 2.7 | 26 |
| 86 | Reactive species driven oxidative modifications of peptidesâ€™Tracing physical plasma liquid chemistry. <i>Journal of Applied Physics</i> , 2021, 129, . | 1.1 | 26 |
| 87 | Cold Physical Plasma-Treated Buffered Saline Solution as Effective Agent Against Pancreatic Cancer Cells. <i>Anti-Cancer Agents in Medicinal Chemistry</i> , 2018, 18, 824-831. | 0.9 | 26 |
| 88 | Plasma Treatment Limits Cutaneous Squamous Cell Carcinoma Development In Vitro and In Vivo. <i>Cancers</i> , 2020, 12, 1993. | 1.7 | 25 |
| 89 | Inhibition of murine melanoma tumor growth in vitro and in vivo using an argon-based plasma jet. <i>Clinical Plasma Medicine</i> , 2020, 19-20, 100102. | 3.2 | 24 |
| 90 | Cold Atmospheric Plasma Treatment of Chondrosarcoma Cells Affects Proliferation and Cell Membrane Permeability. <i>International Journal of Molecular Sciences</i> , 2020, 21, 2291. | 1.8 | 24 |

| # | ARTICLE | IF | CITATIONS |
|-----|---|-----|-----------|
| 91 | Synergistic Inhibition of Tumor Cell Proliferation by Cold Plasma and Gemcitabine. <i>Plasma Processes and Polymers</i> , 2015, 12, 1377-1382. | 1.6 | 23 |
| 92 | Distinct cytokine and chemokine patterns in chronic diabetic ulcers and acute wounds. <i>Experimental Dermatology</i> , 2017, 26, 145-147. | 1.4 | 23 |
| 93 | Gas plasma-oxidized liquids for cancer treatment: pre-clinical relevance, immuno-oncology, and clinical obstacles. <i>IEEE Transactions on Radiation and Plasma Medical Sciences</i> , 2020, , 1-1. | 2.7 | 23 |
| 94 | Physical Plasma-Treated Skin Cancer Cells Amplify Tumor Cytotoxicity of Human Natural Killer (NK) Cells. <i>Cancers</i> , 2020, 12, 3575. | 1.7 | 23 |
| 95 | Differences of the Immune Phenotype of Breast Cancer Cells after Ex Vivo Hyperthermia by Warm-Water or Microwave Radiation in a Closed-Loop System Alone or in Combination with Radiotherapy. <i>Cancers</i> , 2020, 12, 1082. | 1.7 | 23 |
| 96 | Ex Vivo Exposure of Human Melanoma Tissue to Cold Physical Plasma Elicits Apoptosis and Modulates Inflammation. <i>Applied Sciences (Switzerland)</i> , 2020, 10, 1971. | 1.3 | 23 |
| 97 | Hyperspectral Imaging of Wounds Reveals Augmented Tissue Oxygenation Following Cold Physical Plasma Treatment <i>in Vivo</i> . <i>IEEE Transactions on Radiation and Plasma Medical Sciences</i> , 2021, 5, 412-419. | 2.7 | 23 |
| 98 | Tumor cytotoxicity and immunogenicity of a novel V-jet neon plasma source compared to the kINPen. <i>Scientific Reports</i> , 2021, 11, 136. | 1.6 | 23 |
| 99 | Cold Physical Plasma in Cancer Therapy: Mechanisms, Signaling, and Immunity. <i>Oxidative Medicine and Cellular Longevity</i> , 2021, 2021, 1-19. | 1.9 | 23 |
| 100 | Efficacy of Different Carrier Gases for Barrier Discharge Plasma Generation Compared to Chlorhexidine on the Survival of <i>Pseudomonas aeruginosa</i> Embedded in Biofilm in vitro. <i>Skin Pharmacology and Physiology</i> , 2014, 27, 148-157. | 1.1 | 22 |
| 101 | Plasma-Derived Reactive Species Shape a Differentiation Profile in Human Monocytes. <i>Applied Sciences (Switzerland)</i> , 2019, 9, 2530. | 1.3 | 22 |
| 102 | Redox regulation of leukocyte-derived microparticle release and protein content in response to cold physical plasma-derived oxidants. <i>Clinical Plasma Medicine</i> , 2017, 7-8, 24-35. | 3.2 | 21 |
| 103 | Repeated exposure of the oral mucosa over 12 months with cold plasma is not carcinogenic in mice. <i>Scientific Reports</i> , 2021, 11, 20672. | 1.6 | 21 |
| 104 | Singlet Oxygen-Induced Phospholipase A ₂ Inhibition: A Major Role for Interfacial Tryptophan Dioxidation. <i>Chemistry - A European Journal</i> , 2021, 27, 14702-14710. | 1.7 | 20 |
| 105 | Plasma Treatment Limits Human Melanoma Spheroid Growth and Metastasis Independent of the Ambient Gas Composition. <i>Cancers</i> , 2020, 12, 2570. | 1.7 | 19 |
| 106 | Plasma medical oncology: Immunological interpretation of head and neck squamous cell carcinoma. <i>Plasma Processes and Polymers</i> , 2020, 17, 1900258. | 1.6 | 19 |
| 107 | Antimicrobial effects of microwave-induced plasma torch (MiniMIP) treatment on <i>Candida albicans</i> biofilms. <i>Microbial Biotechnology</i> , 2019, 12, 1034-1048. | 2.0 | 18 |
| 108 | Combination of cold plasma and pulsed electric fields – A rationale for cancer patients in palliative care. <i>Clinical Plasma Medicine</i> , 2019, 16, 100096. | 3.2 | 18 |

| # | ARTICLE | IF | CITATIONS |
|-----|---|-----|-----------|
| 109 | Medical gas plasma promotes blood coagulation via platelet activation. <i>Biomaterials</i> , 2021, 278, 120433. | 5.7 | 18 |
| 110 | Development of an electrochemical sensor for in-situ monitoring of reactive species produced by cold physical plasma. <i>Sensors and Actuators B: Chemical</i> , 2021, 326, 129007. | 4.0 | 18 |
| 111 | Pilot-study on the influence of carrier gas and plasma application (open resp. delimited) modifications on physical plasma and its antimicrobial effect against <i>Pseudomonas aeruginosa</i> and <i>Staphylococcus aureus</i> . <i>GMS Krankenhaushygiene Interdisziplinär</i> , 2012, 7, Doc02. | 0.3 | 18 |
| 112 | Plasma Treatment of Ovarian Cancer Cells Mitigates Their Immuno-Modulatory Products Active on THP-1 Monocytes. <i>Plasma</i> , 2018, 1, 201-217. | 0.7 | 17 |
| 113 | A Neutrophil Proteomic Signature in Surgical Trauma Wounds. <i>International Journal of Molecular Sciences</i> , 2018, 19, 761. | 1.8 | 17 |
| 114 | Can the effect of cold physical plasma-derived oxidants be transported via thiol group oxidation?. <i>Clinical Plasma Medicine</i> , 2019, 14, 100086. | 3.2 | 17 |
| 115 | Effects of cold physical plasma on oral lichen planus: An in vitro study (<i>Effects of CAP on OLP</i>). <i>Oral Diseases</i> , 2021, 27, 1728-1737. | 1.5 | 17 |
| 116 | An Innovative Therapeutic Option for the Treatment of Skeletal Sarcomas: Elimination of Osteo- and Ewing's Sarcoma Cells Using Physical Gas Plasma. <i>International Journal of Molecular Sciences</i> , 2020, 21, 4460. | 1.8 | 17 |
| 117 | Gas Plasma-Treated Prostate Cancer Cells Augment Myeloid Cell Activity and Cytotoxicity. <i>Antioxidants</i> , 2020, 9, 323. | 2.2 | 17 |
| 118 | Proteomic Tools to Characterize Non-Thermal Plasma Effects in Eukaryotic Cells. <i>Plasma Medicine</i> , 2013, 3, 81-95. | 0.2 | 16 |
| 119 | Gas Plasma-Augmented Wound Healing in Animal Models and Veterinary Medicine. <i>Molecules</i> , 2021, 26, 5682. | 1.7 | 16 |
| 120 | The N-Terminal CCHC Zinc Finger Motif Mediates Homodimerization of Transcription Factor BCL11B. <i>Molecular and Cellular Biology</i> , 2018, 38, . | 1.1 | 15 |
| 121 | Characterization of Antimicrobial Effects of Plasma-Treated Water (PTW) Produced by Microwave-Induced Plasma (MidiPLex) on <i>Pseudomonas fluorescens</i> Biofilms. <i>Applied Sciences (Switzerland)</i> , 2020, 10, 3118. | 1.3 | 15 |
| 122 | Small Molecules in the Treatment of Squamous Cell Carcinomas: Focus on Indirubins. <i>Cancers</i> , 2021, 13, 1770. | 1.7 | 15 |
| 123 | Plasma-treated medium tunes the inflammatory profile in murine bone marrow-derived macrophages. <i>Clinical Plasma Medicine</i> , 2018, 11, 1-9. | 3.2 | 14 |
| 124 | Identification of Two Kinase Inhibitors with Synergistic Toxicity with Low-Dose Hydrogen Peroxide in Colorectal Cancer Cells In vitro. <i>Cancers</i> , 2020, 12, 122. | 1.7 | 14 |
| 125 | Risk Evaluation of EMT and Inflammation in Metastatic Pancreatic Cancer Cells Following Plasma Treatment. <i>Frontiers in Physics</i> , 2020, 8, . | 1.0 | 14 |
| 126 | Plasma Medicine Technologies. <i>Applied Sciences (Switzerland)</i> , 2021, 11, 4584. | 1.3 | 14 |

| # | ARTICLE | IF | CITATIONS |
|-----|---|-----|-----------|
| 127 | Cold atmospheric pressure plasma treatment combined with starvation increases autophagy and apoptosis in melanoma <i>in vitro</i> and <i>in vivo</i> . <i>Experimental Dermatology</i> , 2022, 31, 1016-1028. | 1.4 | 14 |
| 128 | H2A.X Phosphorylation in Oxidative Stress and Risk Assessment in Plasma Medicine. <i>Oxidative Medicine and Cellular Longevity</i> , 2021, 2021, 1-18. | 1.9 | 14 |
| 129 | Review of Innovative Physical Therapy Methods: Introduction to the Principles of Cold Physical Plasma. <i>In Vivo</i> , 2020, 34, 3103-3107. | 0.6 | 13 |
| 130 | Argon Plasma Exposure Augments Costimulatory Ligands and Cytokine Release in Human Monocyte-Derived Dendritic Cells. <i>International Journal of Molecular Sciences</i> , 2021, 22, 3790. | 1.8 | 13 |
| 131 | Inhibition of Angiogenesis by Treatment with Cold Atmospheric Plasma as a Promising Therapeutic Approach in Oncology. <i>International Journal of Molecular Sciences</i> , 2020, 21, 7098. | 1.8 | 12 |
| 132 | Large volume spark discharge and plasma jet-technology for generating plasma-oxidized saline targeting colon cancer <i>in vitro</i> and <i>in vivo</i> . <i>Journal of Applied Physics</i> , 2021, 129, . | 1.1 | 12 |
| 133 | ROS Cocktails as an Adjuvant for Personalized Antitumor Vaccination?. <i>Vaccines</i> , 2021, 9, 527. | 2.1 | 12 |
| 134 | Oxidatively Modified Proteins: Cause and Control of Diseases. <i>Applied Sciences (Switzerland)</i> , 2020, 10, 6419. | 1.3 | 12 |
| 135 | Combining Nanotechnology and Gas Plasma as an Emerging Platform for Cancer Therapy: Mechanism and Therapeutic Implication. <i>Oxidative Medicine and Cellular Longevity</i> , 2021, 2021, 1-20. | 1.9 | 12 |
| 136 | New Approach against Chondrosoma Cells – Cold Plasma Treatment Inhibits Cell Motility and Metabolism, and Leads to Apoptosis. <i>Biomedicines</i> , 2022, 10, 688. | 1.4 | 12 |
| 137 | Medical Gas Plasma Treatment in Head and Neck Cancer – Challenges and Opportunities. <i>Applied Sciences (Switzerland)</i> , 2020, 10, 1944. | 1.3 | 11 |
| 138 | The amino acid metabolism is essential for evading physical plasma-induced tumour cell death. <i>British Journal of Cancer</i> , 2021, 124, 1854-1863. | 2.9 | 11 |
| 139 | Environmental Control of an Argon Plasma Effluent and Its Role in THP-1 Monocyte Function. <i>IEEE Transactions on Plasma Science</i> , 2017, 45, 3336-3341. | 0.6 | 10 |
| 140 | Non-thermal plasma modulates cellular markers associated with immunogenicity in a model of latent HIV-1 infection. <i>PLoS ONE</i> , 2021, 16, e0247125. | 1.1 | 10 |
| 141 | Plasma-Treated Water Affects <i>Listeria monocytogenes</i> Vitality and Biofilm Structure. <i>Frontiers in Microbiology</i> , 2021, 12, 652481. | 1.5 | 10 |
| 142 | Plasma-Treated <i>Flammulina velutipes</i> -Derived Extract Showed Anticancer Potential in Human Breast Cancer Cells. <i>Applied Sciences (Switzerland)</i> , 2020, 10, 8395. | 1.3 | 9 |
| 143 | Zebrafish larvae as a toxicity model in plasma medicine. <i>Plasma Processes and Polymers</i> , 2021, 18, 2000188. | 1.6 | 9 |
| 144 | Combined Toxicity of Gas Plasma Treatment and Nanoparticles Exposure in Melanoma Cells <i>In Vitro</i> . <i>Nanomaterials</i> , 2021, 11, 806. | 1.9 | 9 |

| # | ARTICLE | IF | CITATIONS |
|-----|--|-----|-----------|
| 145 | Patient-Derived Human Basal and Cutaneous Squamous Cell Carcinoma Tissues Display Apoptosis and Immunomodulation following Gas Plasma Exposure with a Certified Argon Jet. <i>International Journal of Molecular Sciences</i> , 2021, 22, 11446. | 1.8 | 9 |
| 146 | Cell cycle-related genes associate with sensitivity to hydrogen peroxide-induced toxicity. <i>Redox Biology</i> , 2022, 50, 102234. | 3.9 | 9 |
| 147 | Oxidants and Redox Signaling: Perspectives in Cancer Therapy, Inflammation, and Plasma Medicine. <i>Oxidative Medicine and Cellular Longevity</i> , 2017, 2017, 1-2. | 1.9 | 8 |
| 148 | Determination of Immediate vs. Kinetic Growth Retardation in Physically Plasma-treated Cells by Experimental and Modelling Data. <i>Anticancer Research</i> , 2020, 40, 3743-3749. | 0.5 | 8 |
| 149 | Hypochlorous acid selectively promotes toxicity and the expression of danger signals in human abdominal cancer cells. <i>Oncology Reports</i> , 2021, 45, . | 1.2 | 8 |
| 150 | Antitumor Effects in Gas Plasma-Treated Patient-Derived Microtissues—An Adjuvant Therapy for Ulcerating Breast Cancer?. <i>Applied Sciences (Switzerland)</i> , 2021, 11, 4527. | 1.3 | 8 |
| 151 | Multimodal Imaging Techniques to Evaluate the Anticancer Effect of Cold Atmospheric Pressure Plasma. <i>Cancers</i> , 2021, 13, 2483. | 1.7 | 8 |
| 152 | In Vitro Examinations of Cell Death Induction and the Immune Phenotype of Cancer Cells Following Radiative-Based Hyperthermia with 915 MHz in Combination with Radiotherapy. <i>Cells</i> , 2021, 10, 1436. | 1.8 | 8 |
| 153 | Combining Biocompatible and Biodegradable Scaffolds and Cold Atmospheric Plasma for Chronic Wound Regeneration. <i>International Journal of Molecular Sciences</i> , 2021, 22, 9199. | 1.8 | 8 |
| 154 | The Plasma-Induced Leukemia Cell Death is Dictated by the ROS Chemistry and the HO-1/CXCL8 Axis. <i>IEEE Transactions on Radiation and Plasma Medical Sciences</i> , 2021, 5, 398-411. | 2.7 | 7 |
| 155 | Gas Plasma Exposure of Glioblastoma Is Cytotoxic and Immunomodulatory in Patient-Derived GBM Tissue. <i>Cancers</i> , 2022, 14, 813. | 1.7 | 7 |
| 156 | Biocompatible Gas Plasma Treatment Affects Secretion Profiles but Not Osteogenic Differentiation in Patient-Derived Mesenchymal Stromal Cells. <i>International Journal of Molecular Sciences</i> , 2022, 23, 2038. | 1.8 | 7 |
| 157 | Introduction to Plasma Medicine. , 2018, , 3-21. | | 6 |
| 158 | Safety Aspects of Non-Thermal Plasmas. , 2018, , 83-109. | | 6 |
| 159 | The Plasma Treatment Unit: An Attempt to Standardize Cold Plasma Treatment for Defined Biological Effects. <i>Plasma Medicine</i> , 2018, 8, 195-201. | 0.2 | 6 |
| 160 | Physical Plasma Treatment of Eight Human Cancer Cell Lines Demarcates Upregulation of CD112 as a Common Immunomodulatory Response Element. <i>IEEE Transactions on Radiation and Plasma Medical Sciences</i> , 2020, 4, 343-349. | 2.7 | 6 |
| 161 | Tailored Power of an RF Plasma Jet With Admixture of Nitrogen or Oxygen and Its Effects on Human Immune Cells. <i>IEEE Transactions on Plasma Science</i> , 2021, 49, 3336-3343. | 0.6 | 6 |
| 162 | Murine Macrophages Modulate Their Inflammatory Profile in Response to Gas Plasma-Inactivated Pancreatic Cancer Cells. <i>Cancers</i> , 2021, 13, 2525. | 1.7 | 6 |

| # | ARTICLE | IF | CITATIONS |
|-----|---|-----|-----------|
| 163 | The Application of a Low-temperature Physical Plasma Device Operating Under Atmospheric Pressure Leads to the Production of Toxic NO ₂ . <i>Anticancer Research</i> , 2020, 40, 2591-2599. | 0.5 | 5 |
| 164 | ROS Pleiotropy in Melanoma and Local Therapy with Physical Modalities. <i>Oxidative Medicine and Cellular Longevity</i> , 2021, 2021, 1-21. | 1.9 | 5 |
| 165 | Lack of Adverse Effects of Cold Physical Plasma-Treated Blood from Leukemia Patients: A Proof-of-Concept Study. <i>Applied Sciences (Switzerland)</i> , 2022, 12, 128. | 1.3 | 5 |
| 166 | The Anticancer Efficacy of Plasma-Oxidized Saline (POS) in the Ehrlich Ascites Carcinoma Model In Vitro and In Vivo. <i>Biomedicines</i> , 2021, 9, 932. | 1.4 | 4 |
| 167 | Periodic Exposure of Plasma-Activated Medium Alters Fibroblast Cellular Homeostasis. <i>International Journal of Molecular Sciences</i> , 2022, 23, 3120. | 1.8 | 4 |
| 168 | Plasma Application for Hygienic Purposes in Medicine, Industry, and Biotechnology: Update 2017. , 2018, , 253-281. | | 3 |
| 169 | How Does Cold Plasma Work in Medicine?. , 2022, , 63-86. | | 3 |
| 170 | Acquired cancer tyrosine kinase inhibitor resistance: ROS as critical determinants. <i>Signal Transduction and Targeted Therapy</i> , 2021, 6, 437. | 7.1 | 3 |
| 171 | Medical Gas Plasmaâ€”A Potent ROS-Generating Technology for Managing Intraoperative Bleeding Complications. <i>Applied Sciences (Switzerland)</i> , 2022, 12, 3800. | 1.3 | 3 |
| 172 | Plasma medicine: The great prospects when physics meets medicine. <i>Europhysics News</i> , 2022, 53, 20-23. | 0.1 | 3 |
| 173 | Pro-oxidant tumor therapy in murine melanoma and pancreatic cancer. <i>Free Radical Biology and Medicine</i> , 2017, 108, S76. | 1.3 | 2 |
| 174 | BK virusâ€”induced nephritis and cystitis after matched unrelated donor stem cell transplantation: A case report. <i>Clinical Case Reports (discontinued)</i> , 2020, 8, 2838-2841. | 0.2 | 2 |
| 175 | Expression of canonical transient receptor potential channels in U-2 OS and MNNG-HOS osteosarcoma cell lines. <i>Oncology Letters</i> , 2021, 21, 307. | 0.8 | 2 |
| 176 | Immunology in Plasma Cancer Treatment. <i>Springer Series on Atomic, Optical, and Plasma Physics</i> , 2020, , 209-222. | 0.1 | 2 |
| 177 | Plasma-Activated Solution in Cancer Treatment. <i>Springer Series on Atomic, Optical, and Plasma Physics</i> , 2020, , 143-168. | 0.1 | 2 |
| 178 | Immunostimulation in experimental gas plasma therapy for breast cancer. <i>Trends in Biotechnology</i> , 2022, 40, 1021-1024. | 4.9 | 2 |
| 179 | Aktueller und perspektivischer Einsatz kalter Plasmen aus hygienischer Indikation. , 2016, , 137-155. | | 1 |
| 180 | Letters. <i>Journal of Wound Care</i> , 2018, 27, 892-893. | 0.5 | 1 |

| # | ARTICLE | IF | CITATIONS |
|-----|---|-----|-----------|
| 181 | Emission of Ultraviolet Radiation from 220 to 280 NM by a Cold Physical Plasma Generating Device. Health Physics, 2020, 119, 153-159. | 0.3 | 1 |
| 182 | A case of giant retroperitoneal lymphangioma and IgG4-positive fibrosis: Causality or coincidence?. SAGE Open Medical Case Reports, 2021, 9, 2050313X2110169. | 0.2 | 1 |
| 183 | Wissenschaftliche Grundlagen, Stand und Perspektiven der Plasmamedizin. , 2016, , 17-32. | | 1 |
| 184 | Immunotherapy and Immunosurveillance of Oral Cancers: Perspectives of Plasma Medicine and Mistletoe. , 2020, , 355-362. | | 1 |
| 185 | Cold Plasma Treatment for Chronic Wounds. , 2022, , 141-160. | | 1 |
| 186 | How Safe is Plasma Treatment in Clinical Applications?., 2022, , 99-126. | | 1 |
| 187 | Biological Risk Assessment of Three Dental Composite Materials following Gas Plasma Exposure. Molecules, 2022, 27, 4519. | 1.7 | 1 |
| 188 | Perspectives in Immunology of Wound Healing. , 2018, , 401-408. | | 0 |
| 189 | Cancer Immunology. , 2018, , 409-419. | | 0 |
| 190 | Perspectives in General Surgery. , 2018, , 347-354. | | 0 |
| 191 | The progression of metastatic melanoma augments a pro-oxidative milieu locally but not systemically. Pathology Research and Practice, 2020, 216, 153218. | 1.0 | 0 |
| 192 | Biochemistry of Plasma in Cancer Therapy. Springer Series on Atomic, Optical, and Plasma Physics, 2020, , 91-142. | 0.1 | 0 |
| 193 | Mechanisms of Physical Plasma-Induced Blood Coagulation: What Happens at the Treatment-Interface?. , 2021, , . | | 0 |
| 194 | Is Biomolecule Oxidation by Plasma-Derived Reactive Species Restricted to the Gas-Liquid Interphase?., 2022, , . | | 0 |