Blaine A Pfeifer

List of Publications by Year in descending order

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99 papers 4,831 citations

30 h-index 98798 67 g-index

100 all docs

 $\frac{100}{\text{docs citations}}$

100 times ranked

5754 citing authors

| # | Article | IF | CITATIONS |
|----|---|-----|-----------|
| 1 | Consolidated plasmid Design for Stabilized Heterologous Production of the complex natural product Siderophore Yersiniabactin. Biotechnology Progress, 2021, 37, e3103. | 2.6 | 3 |
| 2 | Antibacterial <i>p</i> -Terphenyl with a Rare 2,2′-Bithiazole Substructure and Related Compounds Isolated from the Marine-Derived Actinomycete <i>Nocardiopsis</i> sp. HDN154086. Journal of Natural Products, 2021, 84, 1226-1231. | 3.0 | 10 |
| 3 | Complex natural product production methods and options. Synthetic and Systems Biotechnology, 2021, 6, 1-11. | 3.7 | 10 |
| 4 | Intranasal Vaccine Delivery Technology for Respiratory Tract Disease Application with a Special Emphasis on Pneumococcal Disease. Vaccines, 2021, 9, 589. | 4.4 | 6 |
| 5 | Siderophore natural products as pharmaceutical agents. Current Opinion in Biotechnology, 2021, 69, 242-251. | 6.6 | 23 |
| 6 | An efficient marker recycling system for sequential gene deletion in a deep sea-derived fungus Acremonium sp. HDN16-126. Synthetic and Systems Biotechnology, 2021, 6, 127-133. | 3.7 | 4 |
| 7 | Salicylate Glucoside as a Nontoxic Plant Protectant Alternative to Salicylic Acid. ACS Agricultural Science and Technology, 2021, 1, 515-521. | 2.3 | 1 |
| 8 | Vaccine Delivery and Immune Response Basics. Methods in Molecular Biology, 2021, 2183, 1-8. | 0.9 | 11 |
| 9 | Liposomal Dual Delivery of Both Polysaccharide and Protein Antigens. Methods in Molecular Biology, 2021, 2183, 477-487. | 0.9 | 4 |
| 10 | A Hybrid Biological–Biomaterial Vector for Antigen Delivery. Methods in Molecular Biology, 2021, 2183, 461-475. | 0.9 | 1 |
| 11 | Liposomal Encapsulation of Polysaccharides (LEPS) as an Effective Vaccine Strategy to Protect Aged Hosts Against S. pneumoniae Infection. Frontiers in Aging, 2021, 2, . | 2.6 | 6 |
| 12 | Heterologous Biosynthesis of Type II Polyketide Products Using E. coli. ACS Chemical Biology, 2020, 15, 1177-1183. | 3.4 | 31 |
| 13 | Grafting Activated Graphene Oxide Nanosheets onto Ultrafiltration Membranes Using Polydopamine to Enhance Antifouling Properties. ACS Applied Materials & Samp; Interfaces, 2020, 12, 48179-48187. | 8.0 | 24 |
| 14 | Heterologous biosynthesis as a platform for producing new generation natural products. Current Opinion in Biotechnology, 2020, 66, 123-130. | 6.6 | 19 |
| 15 | Extended Polysaccharide Analysis within the Liposomal Encapsulation of Polysaccharides System. Materials, 2020, 13, 3320. | 2.9 | 2 |
| 16 | Monacycliones G–K and <i>ent</i> -Gephyromycin A, Angucycline Derivatives from the Marine-Derived <i>Streptomyces</i> sp. HDN15129. Journal of Natural Products, 2020, 83, 2749-2755. | 3.0 | 18 |
| 17 | Flux Balance Analysis for Media Optimization and Genetic Targets to Improve Heterologous Siderophore Production. IScience, 2020, 23, 101016. | 4.1 | 11 |
| 18 | PEGylated Amine-Functionalized Poly(Îμ-caprolactone) for the Delivery of Plasmid DNA. Materials, 2020, 13, 898. | 2.9 | 8 |

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|----|---|------|-----------|
| 19 | Engineering Escherichia coli for Bacterial Natural Product Production. , 2020, , 136-148. | | 0 |
| 20 | Design Variation of a Dual-Antigen Liposomal Vaccine Carrier System. Materials, 2019, 12, 2809. | 2.9 | 3 |
| 21 | Antigen delivery format variation and formulation stability through use of a hybrid vector. Vaccine: X, 2019, 1, 100012. | 2.1 | 2 |
| 22 | Loading and releasing ciprofloxacin in photoactivatable liposomes. Biochemical Engineering Journal, 2019, 141, 43-48. | 3.6 | 17 |
| 23 | A Transition to Targeted or â€~Smart' Vaccines: How Understanding Commensal Colonization Can Lead to Selective Vaccination. Pharmaceutical Medicine, 2018, 32, 95-102. | 1.9 | 0 |
| 24 | Continuous removal of copper, magnesium, and nickel from industrial wastewater utilizing the natural product yersiniabactin immobilized within a packed-bed column. Chemical Engineering Journal, 2018, 343, 173-179. | 12.7 | 23 |
| 25 | Reconstitution of Kinamycin Biosynthesis within the Heterologous Host <i>Streptomyces albus</i> J1074. Journal of Natural Products, 2018, 81, 72-77. | 3.0 | 35 |
| 26 | Heterologous erythromycin production across strain and plasmid construction. Biotechnology Progress, 2018, 34, 271-276. | 2.6 | 26 |
| 27 | Engineering Heterologous Production of Salicylate Glucoside and Glycosylated Variants. Frontiers in Microbiology, 2018, 9, 2241. | 3.5 | 7 |
| 28 | Engineering a Next-Generation Glycoconjugate-LikeStreptococcus pneumoniaeVaccine. ACS Infectious Diseases, 2018, 4, 1553-1563. | 3.8 | 18 |
| 29 | Phenotypic Variation during Biofilm Formation: Implications for Anti-Biofilm Therapeutic Design. Materials, 2018, 11, 1086. | 2.9 | 49 |
| 30 | Constraintâ€based metabolic targets for the improved production of heterologous compounds across molecular classification. AICHE Journal, 2018, 64, 4208-4217. | 3.6 | 1 |
| 31 | Broadened glycosylation patterning of heterologously produced erythromycin. Biotechnology and Bioengineering, 2018, 115, 2771-2777. | 3.3 | 8 |
| 32 | Bimodal Targeting Using Sulfonated, Mannosylated <scp>PEI</scp> for Combined Gene Delivery and Photodynamic Therapy. Photochemistry and Photobiology, 2017, 93, 600-608. | 2.5 | 7 |
| 33 | Comprehensive vaccine design for commensal disease progression. Science Advances, 2017, 3, e1701797. | 10.3 | 28 |
| 34 | Yersiniabactin metal binding characterization and removal of nickel from industrial wastewater. Biotechnology Progress, 2017, 33, 1548-1554. | 2.6 | 10 |
| 35 | Increased production of yersiniabactin and an anthranilate analog through media optimization. Biotechnology Progress, 2017, 33, 1193-1200. | 2.6 | 6 |
| 36 | Pressing diseases that represent promising targets for gene therapy. Discovery Medicine, 2017, 24, 313-322. | 0.5 | 4 |

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|----|--|-------------|-----------|
| 37 | Editorial overview: Pharmaceutical biotechnology: New approaches for dynamic disease targets. Current Opinion in Biotechnology, 2016, 42, vi-vii. | 6.6 | O |
| 38 | Recent progress in therapeutic natural product biosynthesis using Escherichia coli. Current Opinion in Biotechnology, 2016, 42, 7-12. | 6.6 | 23 |
| 39 | A copper removal process for water based upon biosynthesis of yersiniabactin, a metal-binding natural product. Chemical Engineering Journal, 2016, 306, 772-776. | 12.7 | 11 |
| 40 | Improved heterologous production of the nonribosomal peptideâ€polyketide siderophore yersiniabactin through metabolic engineering and induction optimization. Biotechnology Progress, 2016, 32, 1412-1417. | 2.6 | 17 |
| 41 | E. coli metabolic engineering for gram scale production of a plant-based anti-inflammatory agent. Metabolic Engineering, 2016, 38, 382-388. | 7.0 | 34 |
| 42 | Mass spectrometry-based metabolomics of value-added biochemicals from Ettlia oleoabundans. Algal Research, 2016, 19, 146-154. | 4.6 | 9 |
| 43 | In situ pneumococcal vaccine production and delivery through a hybrid biological-biomaterial vector. Science Advances, 2016, 2, e1600264. | 10.3 | 18 |
| 44 | Molecular variation of the nonribosomal peptideâ€polyketide siderophore yersiniabactin through biosynthetic and metabolic engineering. Biotechnology and Bioengineering, 2016, 113, 1067-1074. | 3.3 | 8 |
| 45 | Directed vaccination against pneumococcal disease. Proceedings of the National Academy of Sciences of the United States of America, 2016, 113, 6898-6903. | 7.1 | 39 |
| 46 | The Continuing Development of E. coli as a Heterologous Host for Complex Natural Product Biosynthesis. Methods in Molecular Biology, 2016, 1401, 121-134. | 0.9 | 13 |
| 47 | Enhancing vaccine effectiveness with delivery technology. Current Opinion in Biotechnology, 2016, 42, 24-29. | 6.6 | 8 |
| 48 | Overcoming Gene-Delivery Hurdles: Physiological Considerations for Nonviral Vectors. Trends in Biotechnology, 2016, 34, 91-105. | 9.3 | 132 |
| 49 | Production of the polyketide 6-deoxyerythronolide B in the heterologous host Bacillus subtilis. Applied Microbiology and Biotechnology, 2016, 100, 1209-1220. | 3. 6 | 27 |
| 50 | Tailoring pathway modularity in the biosynthesis of erythromycin analogs heterologously engineered in $\langle i \rangle$ E. coli $\langle i \rangle$. Science Advances, 2015, 1, e1500077. | 10.3 | 32 |
| 51 | PEGylated Cationic Polylactides for Hybrid Biosynthetic Gene Delivery. Molecular Pharmaceutics, 2015, 12, 846-856. | 4.6 | 27 |
| 52 | Total Biosynthesis and Diverse Applications of the Nonribosomal Peptide-Polyketide Siderophore Yersiniabactin. Applied and Environmental Microbiology, 2015, 81, 5290-5298. | 3.1 | 28 |
| 53 | Influence of molecular weight upon mannosylated bio-synthetic hybrids for targeted antigen presenting cell gene delivery. Biomaterials, 2015, 58, 103-111. | 11.4 | 11 |
| 54 | Improved <i>Escherichia coli</i> Bactofection and Cytotoxicity by Heterologous Expression of Bacteriophage î¦X174 Lysis Gene E. Molecular Pharmaceutics, 2015, 12, 1691-1700. | 4.6 | 10 |

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|----|--|------|-----------|
| 55 | Structure–Function Assessment of Mannosylated Poly(β-amino esters) upon Targeted Antigen Presenting Cell Gene Delivery. Biomacromolecules, 2015, 16, 1534-1541. | 5.4 | 24 |
| 56 | Mannosylated poly(beta-amino esters) for targeted antigen presenting cell immune modulation. Biomaterials, 2015, 37, 333-344. | 11.4 | 43 |
| 57 | Contemporary approaches for nonviral gene therapy. Discovery Medicine, 2015, 19, 447-54. | 0.5 | 11 |
| 58 | Hybrid biosynthetic gene therapy vector development and dual engineering capacity. Proceedings of the National Academy of Sciences of the United States of America, 2014, 111, 12360-12365. | 7.1 | 25 |
| 59 | Heterologous production of plant-derived isoprenoid products in microbes and the application of metabolic engineering and synthetic biology. Current Opinion in Plant Biology, 2014, 19, 8-13. | 7.1 | 38 |
| 60 | Porphyrin–phospholipid liposomes permeabilized by near-infrared light. Nature Communications, 2014, 5, 3546. | 12.8 | 282 |
| 61 | Deoxysugar pathway interchange for erythromycin analogues heterologously produced through Escherichia coli. Metabolic Engineering, 2013, 20, 92-100. | 7.0 | 21 |
| 62 | Overcoming Nonviral Gene Delivery Barriers: Perspective and Future. Molecular Pharmaceutics, 2013, 10, 4082-4098. | 4.6 | 327 |
| 63 | Poly(ethylene glycol)-block-cationic polylactide nanocomplexes ofÂdiffering charge density for gene delivery. Biomaterials, 2013, 34, 9688-9699. | 11.4 | 69 |
| 64 | Synthesis of Cationic Polylactides with Tunable Charge Densities as Nanocarriers for Effective Gene Delivery. Molecular Pharmaceutics, 2013, 10, 1138-1145. | 4.6 | 56 |
| 65 | Improved heterologous erythromycin A production through expression plasmid reâ€design. Biotechnology Progress, 2013, 29, 862-869. | 2.6 | 20 |
| 66 | Metabolic and pathway engineering to influence native and altered erythromycin production through E. coli. Metabolic Engineering, 2013, 19, 42-49. | 7.0 | 29 |
| 67 | Engineering E. coli for triglyceride accumulation through native and heterologous metabolic reactions. Applied Microbiology and Biotechnology, 2013, 97, 2753-2759. | 3.6 | 17 |
| 68 | Polymyxin B Treatment Improves Bactofection Efficacy and Reduces Cytotoxicity. Molecular Pharmaceutics, 2013, 10, 4301-4308. | 4.6 | 11 |
| 69 | Toward Biosynthetic Design and Implementation of Escherichia coli-Derived Paclitaxel and Other Heterologous Polyisoprene Compounds. Applied and Environmental Microbiology, 2012, 78, 2497-2504. | 3.1 | 30 |
| 70 | Downstream reactions and engineering in the microbially reconstituted pathway for Taxol. Applied Microbiology and Biotechnology, 2012, 94, 841-849. | 3.6 | 44 |
| 71 | Improved <i>E. coli</i> erythromycin a production through the application of metabolic and bioprocess engineering. Biotechnology Progress, 2012, 28, 292-296. | 2.6 | 20 |
| 72 | Analysis of heterologous taxadiene production in K- and B-derived Escherichia coli. Applied Microbiology and Biotechnology, 2012, 93, 1651-1661. | 3.6 | 56 |

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|----|---|------|-----------|
| 73 | Computational identification of gene over-expression targets for metabolic engineering of taxadiene production. Applied Microbiology and Biotechnology, 2012, 93, 2063-2073. | 3.6 | 56 |
| 74 | Methods and options for the heterologous production of complex natural products. Natural Product Reports, 2011, 28, 125-151. | 10.3 | 138 |
| 75 | Simultaneous production and partitioning of heterologous polyketide and isoprenoid natural products in an Escherichia coli two-phase bioprocess. Journal of Industrial Microbiology and Biotechnology, 2011, 38, 1809-1820. | 3.0 | 13 |
| 76 | Multiâ€factorial engineering of heterologous polyketide production in <i>Escherichia coli</i> reveals complex pathway interactions. Biotechnology and Bioengineering, 2011, 108, 1360-1371. | 3.3 | 26 |
| 77 | Investigating the role of native propionylâ€CoA and methylmalonylâ€CoA metabolism on heterologous polyketide production in <i>Escherichia coli</i>). Biotechnology and Bioengineering, 2010, 105, 567-573. | 3.3 | 56 |
| 78 | Computational analysis of phenotypic space in heterologous polyketide biosynthesis—Applications to Escherichia coli, Bacillus subtilis, and Saccharomyces cerevisiae. Journal of Theoretical Biology, 2010, 262, 197-207. | 1.7 | 16 |
| 79 | Metabolic flux analysis and pharmaceutical production. Metabolic Engineering, 2010, 12, 81-95. | 7.0 | 101 |
| 80 | Complete Biosynthesis of Erythromycin A and Designed Analogs Using E. coli as a Heterologous Host. Chemistry and Biology, 2010, 17, 1232-1240. | 6.0 | 123 |
| 81 | Isoprenoid Pathway Optimization for Taxol Precursor Overproduction in <i>Escherichia coli</i> Science, 2010, 330, 70-74. | 12.6 | 1,426 |
| 82 | Dihydrochalcomycin Production and Glycosyltransferase from Streptomyces SP. KCTC 0041BP. Electronic Journal of the International Federation of Clinical Chemistry and Laboratory Medicine, 2010, 20, 171-5. | 0.7 | 0 |
| 83 | Efficient experimental design and microâ€scale medium enhancement of 6â€deoxyerythronolide B production through <i>Escherichia coli</i>). Biotechnology Progress, 2009, 25, 1364-1371. | 2.6 | 12 |
| 84 | A Comparison Between Polymeric Microsphere and Bacterial Vectors for Macrophage P388D1 Gene Delivery. Pharmaceutical Research, 2008, 25, 1202-1208. | 3.5 | 18 |
| 85 | Polyketide analysis using mass spectrometry, evaporative light scattering, and charged aerosol detector systems. Analytical and Bioanalytical Chemistry, 2008, 390, 1189-1193. | 3.7 | 23 |
| 86 | A high-throughput comparison of recombinant gene expression parameters for E. coli-mediated gene transfer to P388D1 macrophage cells. Journal of Biotechnology, 2008, 137, 59-64. | 3.8 | 11 |
| 87 | 6-Deoxyerythronolide B production through chromosomal localization of the deoxyerythronolide B synthase genes in E. coli. Metabolic Engineering, 2008, 10, 33-38. | 7.0 | 34 |
| 88 | Bacterial Hosts for Natural Product Production. Molecular Pharmaceutics, 2008, 5, 212-225. | 4.6 | 85 |
| 89 | Natural Products and Production Systems: Opening Comments. Molecular Pharmaceutics, 2008, 5, 165-166. | 4.6 | 2 |
| 90 | Engineering Bacterial Vectors for Delivery of Genes and Proteins to Antigen-Presenting Cells. Molecular Pharmaceutics, 2007, 4, 4-17. | 4.6 | 13 |

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|----|---|------|-----------|
| 91 | Improving heterologous polyketide production in Escherichia coli by overexpression of an S-adenosylmethionine synthetase gene. Applied Microbiology and Biotechnology, 2007, 77, 367-373. | 3.6 | 34 |
| 92 | Poly(ester-anhydride):poly(\hat{l}^2 -amino ester) micro- and nanospheres: DNA encapsulation and cellular transfection. International Journal of Pharmaceutics, 2005, 304, 210-219. | 5.2 | 36 |
| 93 | Formulation and surface modification of poly(ester-anhydride) micro- and nanospheres. Biomaterials, 2005, 26, 117-124. | 11.4 | 63 |
| 94 | Precursor-Directed polyketide biosynthesis in Escherichia coli. Bioorganic and Medicinal Chemistry Letters, 2003, 13, 3701-3704. | 2.2 | 25 |
| 95 | Biosynthesis of Yersiniabactin, a Complex Polyketide-Nonribosomal Peptide, Using Escherichia coli as a Heterologous Host. Applied and Environmental Microbiology, 2003, 69, 6698-6702. | 3.1 | 111 |
| 96 | A specific role of the Saccharopolyspora erythraea thioesterase II gene in the function of modular polyketide synthases. Microbiology (United Kingdom), 2003, 149, 2213-2225. | 1.8 | 42 |
| 97 | Process and Metabolic Strategies for Improved Production of Escherichia coli -Derived 6-Deoxyerythronolide B. Applied and Environmental Microbiology, 2002, 68, 3287-3292. | 3.1 | 87 |
| 98 | Enhancing the Atom Economy of Polyketide Biosynthetic Processes through Metabolic Engineering. Biotechnology Progress, 2001, 17, 612-617. | 2.6 | 48 |
| 99 | Biosynthesis of Polyketides in Heterologous Hosts. Microbiology and Molecular Biology Reviews, 2001, 65, 106-118. | 6.6 | 225 |