# Barry P Rosen

List of Publications by Year
in descending order



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|---|---|---|---|
| 186 papers | 14,563 citations | 15880 67 h-index | 25230 113 g-index |
| 191 all docs | 191 docs citations | 191 times ranked | 10140 citing authors |

| # | Article | IF | Citations |
|---|---|---|---|
| 1 | Arsenic in medicine: past, present and future. BioMetals, 2023, 36, 283-301. | 1.8 | 39 |
| 2 | Oxidation of organoarsenicals and antimonite by a novel flavin monooxygenase widely present in soil bacteria. Environmental Microbiology, 2022, 24, 752-761. | 1.8 | 26 |
| 3 | Organoarsenical tolerance in <i>Sphingobacterium wenxiniae</i>, a bacterium isolated from activated sludge. Environmental Microbiology, 2022, 24, 762-771. | 1.8 | 10 |
| 4 | The enigma of environmental organoarsenicals: Insights and implications. Critical Reviews in Environmental Science and Technology, 2022, 52, 3835-3862. | 6.6 | 20 |
| 5 | Functional characterization of the methylarseniteâ€inducible arsRM operon from Noviherbaspirillum denitrificans â€‰ HC18. Environmental Microbiology, 2022, , . | 1.8 | 6 |
| 6 | <scp>ArsZ</scp> from <i>Ensifer adhaerens</i>â€‰<scp>ST2</scp> is a novel methylarsenite oxidase. Environmental Microbiology, 2022, 24, 3013-3021. | 1.8 | 6 |
| 7 | An <scp>ArsRC</scp> fusion protein enhances arsenate sensing and detoxification. Environmental Microbiology, 2022, 24, 1977-1987. | 1.8 | 3 |
| 8 | The ArsI C-As lyase: Elucidating the catalytic mechanism of degradation of organoarsenicals. Journal of Inorganic Biochemistry, 2022, 232, 111836. | 1.5 | 5 |
| 9 | Comamonas testosteroni antA encodes an antimonite-translocating P-type ATPase. Science of the Total Environment, 2021, 754, 142393. | 3.9 | 13 |
| 10 | NemA Catalyzes Trivalent Organoarsenical Oxidation and Is Regulated by the Trivalent Organoarsenical-Selective Transcriptional Repressor NemR. Environmental Science & Technology, 2021, 55, 6485-6494. | 4.6 | 10 |
| 11 | Functional and structural characterization of AntR, an Sb(III) responsive transcriptional repressor. Molecular Microbiology, 2021, 116, 427-437. | 1.2 | 5 |
| 12 | Regulation of arsenic methylation: identification of the transcriptional region of the human AS3MT gene. Cell Biology and Toxicology, 2021, , 1. | 2.4 | 4 |
| 13 | Aquaglyceroporin AqpS from Sinorhizobium meliloti conducts both trivalent and pentavalent methylarsenicals. Chemosphere, 2021, 270, 129379. | 4.2 | 9 |
| 14 | Antimicrobial Activity of Metals and Metalloids. Annual Review of Microbiology, 2021, 75, 175-197. | 2.9 | 32 |
| 15 | Anaerobic As(III) Oxidation Coupled with Nitrate Reduction and Attenuation of Dissolved Arsenic by <i>Noviherbaspirillum</i> Species. ACS Earth and Space Chemistry, 2021, 5, 2115-2123. | 1.2 | 13 |
| 16 | Identification of the Biosynthetic Gene Cluster for the Organoarsenical Antibiotic Arsinothricin. Microbiology Spectrum, 2021, 9, e0050221. | 1.2 | 14 |
| 17 | Insights into S-adenosyl-l-methionine (SAM)-dependent methyltransferase related diseases and genetic polymorphisms. Mutation Research - Reviews in Mutation Research, 2021, 788, 108396. | 2.4 | 13 |
| 18 | <scp>ArsV</scp> and <scp>ArsW</scp> provide synergistic resistance to the antibiotic methylarsenite. Environmental Microbiology, 2021, 23, 7550-7562. | 1.8 | 11 |

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|---|---|---|---|
| 19 | Identification of a MarR Subfamily That Regulates Arsenic Resistance Genes. Applied and Environmental Microbiology, 2021, 87, e0158821. | 1.4 | 7 |
| 20 | Chemical synthesis of the organoarsenical antibiotic arsinothricin. RSC Advances, 2021, 11, 35600-35606. | 1.7 | 0 |
| 21 | Organoarsenical compounds: Occurrence, toxicology and biotransformation. Critical Reviews in Environmental Science and Technology, 2020, 50, 217-243. | 6.6 | 39 |
| 22 | The Pseudomonas putida NfnB nitroreductase confers resistance to roxarsone. Science of the Total Environment, 2020, 748, 141339. | 3.9 | 10 |
| 23 | Semisynthesis of the Organoarsenical Antibiotic Arsinothricin. Journal of Natural Products, 2020, 83, 2809-2813. | 1.5 | 10 |
| 24 | Comparative Cytotoxicity of Inorganic Arsenite and Methylarsenite in Human Brain Cells. ACS Chemical Neuroscience, 2020, 11, 743-751. | 1.7 | 16 |
| 25 | The Great Oxidation Event expanded the genetic repertoire of arsenic metabolism and cycling. Proceedings of the National Academy of Sciences of the United States of America, 2020, 117, 10414-10421. | 3.3 | 96 |
| 26 | The Arsenic Methylation Cycle: How Microbial Communities Adapted Methylarsenicals for Use as Weapons in the Continuing War for Dominance. Frontiers in Environmental Science, 2020, 8, . | 1.5 | 65 |
| 27 | Organoarsenicals inhibit bacterial peptidoglycan biosynthesis by targeting the essential enzyme MurA. Chemosphere, 2020, 254, 126911. | 4.2 | 7 |
| 28 | Reduction of Organoarsenical Herbicides and Antimicrobial Growth Promoters by the Legume Symbiont <i>Sinorhizobium meliloti</i>. Environmental Science & Technology, 2019, 53, 13648-13656. | 4.6 | 17 |
| 29 | Genomewide Analysis of Mode of Action of the <i>S</i> -Adenosylmethionine Analogue Sinefungin in Leishmania infantum. MSystems, 2019, 4, . | 1.7 | 13 |
| 30 | Structures of two ArsR As(III)-responsive transcriptional repressors: Implications for the mechanism of derepression. Journal of Structural Biology, 2019, 207, 209-217. | 1.3 | 26 |
| 31 | Role of ArsEFG in Roxarsone and Nitarsone Detoxification and Resistance. Environmental Science & Technology, 2019, 53, 6182-6191. | 4.6 | 27 |
| 32 | Arsinothricin, an arsenic-containing non-proteinogenic amino acid analog of glutamate, is a broad-spectrum antibiotic. Communications Biology, 2019, 2, 131. | 2.0 | 32 |
| 33 | Pathways of arsenic uptake and efflux. Environment International, 2019, 126, 585-597. | 4.8 | 207 |
| 34 | Identification of Steps in the Pathway of Arsenosugar Biosynthesis. Environmental Science & Technology, 2019, 53, 634-641. | 4.6 | 25 |
| 35 | The antibiotic action of methylarsenite is an emergent property of microbial communities. Molecular Microbiology, 2019, 111, 487-494. | 1.2 | 59 |
| 36 | Reorientation of the Methyl Group in MAs(III) is the Rate-Limiting Step in the ArsM As(III) <i>S</i>-Adenosylmethionine Methyltransferase Reaction. ACS Omega, 2018, 3, 3104-3112. | 1.6 | 14 |

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|---|---|---|---|
| 37 | Arsenic methylation by a novel ArsM As(III) <i>S</i>â€adenosylmethionine methyltransferase that requires only two conserved cysteine residues. Molecular Microbiology, 2018, 107, 265-276. | 1.2 | 42 |
| 38 | Thiolation in arsenic metabolism: a chemical perspective. Metallomics, 2018, 10, 1368-1382. | 1.0 | 30 |
| 39 | Variants in genes encoding small GTPases and association with epithelial ovarian cancer susceptibility. PLoS ONE, 2018, 13, e0197561. | 1.1 | 9 |
| 40 | Arsenic-hypertolerant and arsenic-reducing bacteria isolated from wells in TucumÃ¡n, Argentina. Canadian Journal of Microbiology, 2018, 64, 876-886. | 0.8 | 15 |
| 41 | Directed Evolution of Saccharomyces cerevisiae for Increased Selenium Accumulation. Microorganisms, 2018, 6, 81. | 1.6 | 9 |
| 42 | The Structure of an As(III) <i>S</i>-Adenosylmethionine Methyltransferase with 3-Coordinately Bound As(III) Depicts the First Step in Catalysis. Biochemistry, 2018, 57, 4083-4092. | 1.2 | 28 |
| 43 | Conserved cysteine residues determine substrate specificity in a novel <scp>A</scp>s(<scp>III</scp>) <scp>S</scp>â€adenosylmethionine methyltransferase from <scp><i>A</i></scp><i>spergillus fumigatus</i>. Molecular Microbiology, 2017, 104, 250-259. | 1.2 | 20 |
| 44 | Bacterial resistance to arsenic protects against protist killing. BioMetals, 2017, 30, 307-311. | 1.8 | 13 |
| 45 | Nonsynonymous Polymorphisms in the Human AS3MT Arsenic Methylation Gene: Implications for Arsenic Toxicity. Chemical Research in Toxicology, 2017, 30, 1481-1491. | 1.7 | 26 |
| 46 | Linking Genes to Microbial Biogeochemical Cycling: Lessons from Arsenic. Environmental Science & Technology, 2017, 51, 7326-7339. | 4.6 | 223 |
| 47 | Structural studies of the ArsD arsenic metallochaperone using molecular dynamics. Journal of Computational Methods in Sciences and Engineering, 2017, 17, 227-233. | 0.1 | 0 |
| 48 | Arsenic methylation by a genetically engineered Rhizobium-legume symbiont. Plant and Soil, 2017, 416, 259-269. | 1.8 | 48 |
| 49 | Biochemical Characterization of ArsI: A Novel Câ€"As Lyase for Degradation of Environmental Organoarsenicals. Environmental Science & Technology, 2017, 51, 11115-11125. | 4.6 | 19 |
| 50 | A novel MAs(III)â€selective ArsR transcriptional repressor. Molecular Microbiology, 2017, 106, 469-478. | 1.2 | 45 |
| 51 | Recurrent horizontal transfer of arsenite methyltransferase genes facilitated adaptation of life to arsenic. Scientific Reports, 2017, 7, 7741. | 1.6 | 60 |
| 52 | Synergistic interaction of glyceraldehydesâ€3â€phosphate dehydrogenase and ArsJ, a novel organoarsenical efflux permease, confers arsenate resistance. Molecular Microbiology, 2016, 100, 945-953. | 1.2 | 90 |
| 53 | Organoarsenical Biotransformations by <i>Shewanella putrefaciens</i>. Environmental Science & Technology, 2016, 50, 7956-7963. | 4.6 | 50 |
| 54 | Expression of arsenic resistance genes in the obligate anaerobe Bacteroides vulgatus ATCC 8482, a gut microbiome bacterium. Anaerobe, 2016, 39, 117-123. | 1.0 | 26 |

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|---|---|---|---|
| 55 | Arsenic Methylation in <i>Arabidopsis thaliana</i> Expressing an Algal Arsenite Methyltransferase Gene Increases Arsenic Phytotoxicity. Journal of Agricultural and Food Chemistry, 2016, 64, 2674-2681. | 2.4 | 39 |
| 56 | Structure of the ArsI Câ€“As Lyase: Insights into the Mechanism of Degradation of Organoarsenical Herbicides and Growth Promoters. Journal of Molecular Biology, 2016, 428, 2462-2473. | 2.0 | 17 |
| 57 | The organoarsenical biocycle and the primordial antibiotic methylarsenite. Metallomics, 2016, 8, 1047-1055. | 1.0 | 56 |
| 58 | Inositol transporters AtINT2 and AtINT4 regulate arsenic accumulation in Arabidopsis seeds. Nature Plants, 2016, 2, 15202. | 4.7 | 88 |
| 59 | Efficient Arsenic Methylation and Volatilization Mediated by a Novel Bacterium from an Arsenic-Contaminated Paddy Soil. Environmental Science & Technology, 2016, 50, 6389-6396. | 4.6 | 86 |
| 60 | New mechanisms of bacterial arsenic resistance. Biomedical Journal, 2016, 39, 5-13. | 1.4 | 142 |
| 61 | Arsenic Directly Binds to and Activates the Yeast AP-1-Like Transcription Factor Yap8. Molecular and Cellular Biology, 2016, 36, 913-922. | 1.1 | 42 |
| 62 | Characterization of the extremely arsenic-resistant Brevibacterium linens strain AE038-8 isolated from contaminated groundwater in TucumÃ¡n, Argentina. International Biodeterioration and Biodegradation, 2016, 107, 147-153. | 1.9 | 25 |
| 63 | The optimal time for surgery in women with serous ovarian cancer. Canadian Journal of Surgery, 2016, 59, 223-232. | 0.5 | 16 |
| 64 | <scp>ArsP</scp>: a methylarsenite efflux permease. Molecular Microbiology, 2015, 98, 625-635. | 1.2 | 87 |
| 65 | Common Genetic Variation In Cellular Transport Genes and Epithelial Ovarian Cancer (EOC) Risk. PLoS ONE, 2015, 10, e0128106. | 1.1 | 44 |
| 66 | Draft Genome Sequence of Burkholderia sp. MR1, a Methylarsenate-Reducing Bacterial Isolate from Florida Golf Course Soil. Genome Announcements, 2015, 3, . | 0.8 | 2 |
| 67 | Identification of six new susceptibility loci for invasive epithelial ovarian cancer. Nature Genetics, 2015, 47, 164-171. | 9.4 | 221 |
| 68 | Network-Based Integration of GWAS and Gene Expression Identifies a <i>HOX</i>-Centric Network Associated with Serous Ovarian Cancer Risk. Cancer Epidemiology Biomarkers and Prevention, 2015, 24, 1574-1584. | 1.1 | 28 |
| 69 | A disulfide-bond cascade mechanism for arsenic(III)<i>S</i>-adenosylmethionine methyltransferase. Acta Crystallographica Section D: Biological Crystallography, 2015, 71, 505-515. | 2.5 | 39 |
| 70 | Genetically Engineering Bacillus subtilis with a Heat-Resistant Arsenite Methyltransferase for Bioremediation of Arsenic-Contaminated Organic Waste. Applied and Environmental Microbiology, 2015, 81, 6718-6724. | 1.4 | 68 |
| 71 | High-throughput screening-compatible assays of As(III) S-adenosylmethionine methyltransferase activity. Analytical Biochemistry, 2015, 480, 67-73. | 1.1 | 11 |
| 72 | <scp>ArsH</scp> is an organoarsenical oxidase that confers resistance to trivalent forms of the herbicide monosodium methylarsenate and the poultry growth promoter roxarsone. Molecular Microbiology, 2015, 96, 1042-1052. | 1.2 | 143 |

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|---|---|---|---|
| 73 | Arsenic Methylation and Volatilization by Arsenite <i>S</i> -Adenosylmethionine Methyltransferase in Pseudomonas alcaligenes NBRC14159. Applied and Environmental Microbiology, 2015, 81, 2852-2860. | 1.4 | 84 |
| 74 | Cis-eQTL analysis and functional validation of candidate susceptibility genes for high-grade serous ovarian cancer. Nature Communications, 2015, 6, 8234. | 5.8 | 63 |
| 75 | Common variants at the<i>CHEK2</i>gene locus and risk of epithelial ovarian cancer. Carcinogenesis, 2015, 36, 1341-1353. | 1.3 | 24 |
| 76 | Draft Genome Sequence of Brevibacterium linens AE038-8, an Extremely Arsenic-Resistant Bacterium. Genome Announcements, 2015, 3, . | 0.8 | 7 |
| 77 | As(III) S-Adenosylmethionine Methyltransferases and Other Arsenic Binding Proteins. Geomicrobiology Journal, 2015, 32, 570-576. | 1.0 | 41 |
| 78 | Identification of Small Molecule Inhibitors of Human As(III) <i>S</i>-Adenosylmethionine Methyltransferase (AS3MT). Chemical Research in Toxicology, 2015, 28, 2419-2425. | 1.7 | 14 |
| 79 | Common Genetic Variation in Circadian Rhythm Genes and Risk of Epithelial Ovarian Cancer (EOC). Journal of Genetics and Genome Research, 2015, 2, . | 0.3 | 25 |
| 80 | A Câ‹…As lyase for degradation of environmental organoarsenical herbicides and animal husbandry growth promoters. Proceedings of the National Academy of Sciences of the United States of America, 2014, 111, 7701-7706. | 3.3 | 116 |
| 81 | Mutations in the ArsA ATPase that restore interaction with the ArsD metallochaperone. BioMetals, 2014, 27, 1263-1275. | 1.8 | 5 |
| 82 | Biosensors for Inorganic and Organic Arsenicals. Biosensors, 2014, 4, 494-512. | 2.3 | 52 |
| 83 | Crystallization and preliminary X-ray crystallographic studies of the ArsI Câ€“As lyase from<i>Thermomonospora curvata</i>. Acta Crystallographica Section F, Structural Biology Communications, 2014, 70, 761-764. | 0.4 | 11 |
| 84 | Crystallization and preliminary X-ray crystallographic studies of CrArsM, an arsenic(III)<i>S</i>-adenosylmethionine methyltransferase from<i>Chlamydomonas reinhardtii</i>. Acta Crystallographica Section F, Structural Biology Communications, 2014, 70, 1385-1388. | 0.4 | 4 |
| 85 | Aquaglyceroporins: Generalized metalloid channels. Biochimica Et Biophysica Acta - General Subjects, 2014, 1840, 1583-1591. | 1.1 | 166 |
| 86 | Biosensor for Organoarsenical Herbicides and Growth Promoters. Environmental Science & Technology, 2014, 48, 1141-1147. | 4.6 | 51 |
| 87 | Earth Abides Arsenic Biotransformations. Annual Review of Earth and Planetary Sciences, 2014, 42, 443-467. | 4.6 | 423 |
| 88 | Pathway of Human AS3MT Arsenic Methylation. Chemical Research in Toxicology, 2014, 27, 1979-1989. | 1.7 | 108 |
| 89 | Structure ofEscherichia coliGrx2 in complex with glutathione: a dual-function hybrid of glutaredoxin and glutathioneS-transferase. Acta Crystallographica Section D: Biological Crystallography, 2014, 70, 1907-1913. | 2.5 | 2 |
| 90 | Engineering the Soil Bacterium Pseudomonas putida for Arsenic Methylation. Applied and Environmental Microbiology, 2013, 79, 4493-4495. | 1.4 | 85 |

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|---|---|---|---|
| 91 | Arsenic Methyltransferases. , 2013, , 138-143. | | 20 |
| 92 | Efflux Permease CgAcr3-1 of Corynebacterium glutamicum Is an Arsenite-specific Antiporter. Journal of Biological Chemistry, 2012, 287, 723-735. | 1.6 | 35 |
| 93 | A Novel Biosensor Selective for Organoarsenicals. Applied and Environmental Microbiology, 2012, 78, 7145-7147. | 1.4 | 22 |
| 94 | Identification of Catalytic Residues in the As(III) <i>S</i>-Adenosylmethionine Methyltransferase. Biochemistry, 2012, 51, 944-951. | 1.2 | 84 |
| 95 | Arsenic biomethylation by photosynthetic organisms. Trends in Plant Science, 2012, 17, 155-162. | 4.3 | 206 |
| 96 | Pathways of Arsenic Uptake and Efflux. Current Topics in Membranes, 2012, 69, 325-358. | 0.5 | 196 |
| 97 | Structure of an As(III) <i>S</i>-Adenosylmethionine Methyltransferase: Insights into the Mechanism of Arsenic Biotransformation. Biochemistry, 2012, 51, 5476-5485. | 1.2 | 109 |
| 98 | Demethylation of methylarsonic acid by a microbial community. Environmental Microbiology, 2011, 13, 1205-1215. | 1.8 | 112 |
| 99 | Genetic mapping of the interface between the ArsD metallochaperone and the ArsA ATPase. Molecular Microbiology, 2011, 79, 872-881. | 1.2 | 27 |
| 100 | Arsenic biotransformation and volatilization in transgenic rice. New Phytologist, 2011, 191, 49-56. | 3.5 | 116 |
| 101 | The ArsD As(III) metallochaperone. BioMetals, 2011, 24, 391-399. | 1.8 | 32 |
| 102 | Resonance assignments and secondary structure prediction of the As(III) metallochaperone ArsD in solution. Biomolecular NMR Assignments, 2011, 5, 109-112. | 0.4 | 4 |
| 103 | Life and death with arsenic. BioEssays, 2011, 33, 350-357. | 1.2 | 70 |
| 104 | Biotransformation and Volatilization of Arsenic by Three Photosynthetic Cyanobacteria. Plant Physiology, 2011, 156, 1631-1638. | 2.3 | 171 |
| 105 | Pentavalent methylated arsenicals are substrates of human AQP9. BioMetals, 2010, 23, 119-127. | 1.8 | 34 |
| 106 | Biochemical characterization of a novel ArsA ATPase complex from <i>Alkaliphilus metalliredigens</i> QYMF. FEBS Letters, 2010, 584, 3089-3094. | 1.3 | 15 |
| 107 | Crystallization and preliminary X-ray crystallographic analysis of the ArsM arsenic(III)<i>S</i>-adenosylmethionine methyltransferase. Acta Crystallographica Section F: Structural Biology Communications, 2010, 66, 1050-1052. | 0.7 | 16 |
| 108 | Jen1p: A High Affinity Selenite Transporter in Yeast. Molecular Biology of the Cell, 2010, 21, 3934-3941. | 0.9 | 69 |

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|---|---|---|---|
| 109 | Arsenic Binding and Transfer by the ArsD As(III) Metallochaperone. Biochemistry, 2010, 49, 3658-3666. | 1.2 | 51 |
| 110 | Adventitious Arsenate Reductase Activity of the Catalytic Domain of the Human Cdc25B and Cdc25C Phosphatases. Biochemistry, 2010, 49, 802-809. | 1.2 | 36 |
| 111 | The 1.4 Ã… Crystal Structure of the ArsD Arsenic Metallochaperone Provides Insights into Its Interaction with the ArsA ATPase. Biochemistry, 2010, 49, 5206-5212. | 1.2 | 20 |
| 112 | Trivalent arsenicals and glucose use different translocation pathways in mammalian GLUT1. Metallomics, 2010, 2, 211-219. | 1.0 | 40 |
| 113 | Arsenic Transport in Prokaryotes and Eukaryotic Microbes. Advances in Experimental Medicine and Biology, 2010, 679, 47-55. | 0.8 | 44 |
| 114 | Biotransformation of arsenic by a Yellowstone thermoacidophilic eukaryotic alga. Proceedings of the National Academy of Sciences of the United States of America, 2009, 106, 5213-5217. | 3.3 | 267 |
| 115 | Reduced arsenic clearance and increased toxicity in aquaglyceroporin-9-null mice. Proceedings of the National Academy of Sciences of the United States of America, 2009, 106, 15956-15960. | 3.3 | 86 |
| 116 | Properties of Arsenite Efflux Permeases (Acr3) from Alkaliphilus metalliredigens and Corynebacterium glutamicum. Journal of Biological Chemistry, 2009, 284, 19887-19895. | 1.6 | 95 |
| 117 | Perspectives for genetic engineering for the phytoremediation of arsenic-contaminated environments: from imagination to reality?. Current Opinion in Biotechnology, 2009, 20, 220-224. | 3.3 | 96 |
| 118 | Arsenic transport by zebrafish aquaglyceroporins. BMC Molecular Biology, 2009, 10, 104. | 3.0 | 84 |
| 119 | Transport pathways for arsenic and selenium: A minireview. Environment International, 2009, 35, 512-515. | 4.8 | 219 |
| 120 | Characterization of the metalloactivation domain of an arsenite/antimonite resistance pump. Molecular Microbiology, 2008, 67, 392-402. | 1.2 | 15 |
| 121 | Aquaglyceroporins: ancient channels for metalloids. Journal of Biology, 2008, 7, 33. | 2.7 | 79 |
| 122 | An Arsenate-activated Glutaredoxin from the Arsenic Hyperaccumulator Fern Pteris vittata L. Regulates Intracellular Arsenite. Journal of Biological Chemistry, 2008, 283, 6095-6101. | 1.6 | 80 |
| 123 | Evolution of Metal(loid) Binding Sites in Transcriptional Regulators. Journal of Biological Chemistry, 2008, 283, 25706-25714. | 1.6 | 66 |
| 124 | Convergent Evolution of a New Arsenic Binding Site in the ArsR/SmtB Family of Metalloregulators. Journal of Biological Chemistry, 2007, 282, 34346-34355. | 1.6 | 77 |
| 125 | ArsD Residues Cys12, Cys13, and Cys18 Form an As(III)-binding Site Required for Arsenic Metallochaperone Activity. Journal of Biological Chemistry, 2007, 282, 16783-16791. | 1.6 | 40 |
| 126 | Crystal structure of the flavoprotein ArsH from <i>Sinorhizobium meliloti</i>. FEBS Letters, 2007, 581, 3996-4000. | 1.3 | 55 |

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|---|---|---|---|
| 127 | Arsenic Metabolism in Prokaryotic and Eukaryotic Microbes. , 2007, , 371-406. | | 119 |
| 128 | A CDC25 homologue from rice functions as an arsenate reductase. New Phytologist, 2007, 174, 311-321. | 3.5 | 167 |
| 129 | ArsD: an As(III) metallochaperone for the ArsAB As(III)-translocating ATPase. Journal of Bioenergetics and Biomembranes, 2007, 39, 453-458. | 1.0 | 69 |
| 130 | Mammalian glucose permease GLUT1 facilitates transport of arsenic trioxide and methylarsonous acid. Biochemical and Biophysical Research Communications, 2006, 351, 424-430. | 1.0 | 117 |
| 131 | Cys-113 and Cys-422 Form a High Affinity Metalloid Binding Site in the ArsA ATPase. Journal of Biological Chemistry, 2006, 281, 9925-9934. | 1.6 | 31 |
| 132 | Methylarsonous Acid Transport by Aquaglyceroporins. Environmental Health Perspectives, 2006, 114, 527-531. | 2.8 | 66 |
| 133 | Arsenic detoxification and evolution of trimethylarsine gas by a microbial arseniteS-adenosylmethionine methyltransferase. Proceedings of the National Academy of Sciences of the United States of America, 2006, 103, 2075-2080. | 3.3 | 587 |
| 134 | An arsenic metallochaperone for an arsenic detoxification pump. Proceedings of the National Academy of Sciences of the United States of America, 2006, 103, 15617-15622. | 3.3 | 175 |
| 135 | Modulation in aquaglyceroporinAQP1gene transcript levels in drug-resistantLeishmania. Molecular Microbiology, 2005, 57, 1690-1699. | 1.2 | 137 |
| 136 | Novel Pathway for Arsenic Detoxification in the Legume Symbiont Sinorhizobium meliloti. Journal of Bacteriology, 2005, 187, 6991-6997. | 1.0 | 147 |
| 137 | Crystal Structure of the Staphylococcus aureus pI258 CadC Cd(II)/Pb(II)/Zn(II)-Responsive Repressor. Journal of Bacteriology, 2005, 187, 4214-4221. | 1.0 | 91 |
| 138 | Arsenic Trioxide Uptake by Hexose Permeases in Saccharomyces cerevisiae. Journal of Biological Chemistry, 2004, 279, 17312-17318. | 1.6 | 122 |
| 139 | As(III) and Sb(III) Uptake by GlpF and Efflux by ArsB in Escherichia coli. Journal of Biological Chemistry, 2004, 279, 18334-18341. | 1.6 | 248 |
| 140 | Leishmania major LmACR2 Is a Pentavalent Antimony Reductase That Confers Sensitivity to the Drug Pentostam. Journal of Biological Chemistry, 2004, 279, 37445-37451. | 1.6 | 134 |
| 141 | Experimental and Theoretical Characterization of Arsenite in Water:Â Insights into the Coordination Environment of Asâˆ'O. Inorganic Chemistry, 2004, 43, 2954-2959. | 1.9 | 146 |
| 142 | Drug Uptake and Modulation of Drug Resistance in Leishmania by an Aquaglyceroporin. Journal of Biological Chemistry, 2004, 279, 31010-31017. | 1.6 | 232 |
| 143 | Arsenic trioxide uptake by human and rat aquaglyceroporins. Biochemical and Biophysical Research Communications, 2004, 316, 1178-1185. | 1.0 | 135 |
| 144 | Drug uptake and pharmacological modulation of drug sensitivity in leukemia by AQP9. Biochemical and Biophysical Research Communications, 2004, 322, 836-841. | 1.0 | 80 |

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|---|---|---|---|
| 145 | Increased cadmium tolerance and accumulation by plants expressing bacterial arsenate reductase. New Phytologist, 2003, 159, 431-441. | 3.5 | 54 |
| 146 | Arsenite transport by mammalian aquaglyceroporins AQP7 and AQP9. Proceedings of the National Academy of Sciences of the United States of America, 2002, 99, 6053-6058. | 3.3 | 455 |
| 147 | Biochemistry of arsenic detoxification. FEBS Letters, 2002, 529, 86-92. | 1.3 | 663 |
| 148 | Arsenate reductases in prokaryotes and eukaryotes.. Environmental Health Perspectives, 2002, 110, 745-748. | 2.8 | 269 |
| 149 | Transport and detoxification systems for transition metals, heavy metals and metalloids in eukaryotic and prokaryotic microbes. Comparative Biochemistry and Physiology Part A, Molecular & Integrative Physiology, 2002, 133, 689-693. | 0.8 | 182 |
| 150 | Microbial arsenic: from geocycles to genes and enzymes. FEMS Microbiology Reviews, 2002, 26, 311-325. | 3.9 | 578 |
| 151 | Spectroscopic Properties of the Metalloregulatory Cd(II) and Pb(II) Sites ofS. aureuspI258 CadCâ€. Biochemistry, 2001, 40, 4426-4436. | 1.2 | 91 |
| 152 | Role of vicinal cysteine pairs in metalloid sensing by the ArsD As(III)-responsive repressor. Molecular Microbiology, 2001, 41, 687-696. | 1.2 | 19 |
| 153 | The Leishmania ATP-binding Cassette Protein PGPA Is an Intracellular Metal-Thiol Transporter ATPase. Journal of Biological Chemistry, 2001, 276, 26301-26307. | 1.6 | 205 |
| 154 | NreB from Achromobacter xylosoxidans 31A Is a Nickel-Induced Transporter Conferring Nickel Resistance. Journal of Bacteriology, 2001, 183, 2803-2807. | 1.0 | 93 |
| 155 | Conformational Changes in Four Regions of the Escherichia coli ArsA ATPase Link ATP Hydrolysis to Ion Translocation. Journal of Biological Chemistry, 2001, 276, 30414-30422. | 1.6 | 38 |
| 156 | The linker peptide of the ArsA ATPase. Molecular Microbiology, 2000, 35, 361-367. | 1.2 | 31 |
| 157 | Role of conserved histidine residues in metalloactivation of the ArsA ATPase. , 2000, 13, 281-288. | | 14 |
| 158 | Purification and Characterization of Acr2p, theSaccharomyces cerevisiae Arsenate Reductase. Journal of Biological Chemistry, 2000, 275, 21149-21157. | 1.6 | 202 |
| 159 | Elevated levels of polyamines and trypanothione resulting from overexpression of the ornithine decarboxylase gene in arsenite-resistant Leishmania. Molecular Microbiology, 1999, 34, 726-735. | 1.2 | 123 |
| 160 | Metalloregulation of Soft Metal Resistance Pumps. , 1999, , 5-19. | | 20 |
| 161 | The role of efflux in bacterial resistance to soft metals and metalloids. Essays in Biochemistry, 1999, 34, 1-15. | 2.1 | 34 |
| 162 | Saccharomyces cerevisiae ACR2gene encodes an arsenate reductase. FEMS Microbiology Letters, 1998, 168, 127-136. | 0.7 | 118 |

| # | Article | IF | Citations |
|---|---|---|---|
| 163 | [7] Arsenical pumps in prokaryotes and eukaryotes. Methods in Enzymology, 1998, 292, 82-97. | 0.4 | 11 |
| 164 | Ligand Interactions of the ArsC Arsenate Reductase. Journal of Biological Chemistry, 1997, 272, 21084-21089. | 1.6 | 45 |
| 165 | Tryptophan Fluorescence Reports Nucleotide-induced Conformational Changes in a Domain of the ArsA ATPase. Journal of Biological Chemistry, 1997, 272, 19731-19737. | 1.6 | 67 |
| 166 | Alternate Energy Coupling of ArsB, the Membrane Subunit of the Ars Anion-translocating ATPase. Journal of Biological Chemistry, 1997, 272, 326-331. | 1.6 | 61 |
| 167 | Metalloregulatory Properties of the ArsD Repressor. Journal of Biological Chemistry, 1997, 272, 14257-14262. | 1.6 | 78 |
| 168 | Dimerization Is Essential for DNA Binding and Repression by the ArsR Metalloregulatory Protein of Escherichia coli. Journal of Biological Chemistry, 1997, 272, 15734-15738. | 1.6 | 44 |
| 169 | Bacterial resistance to heavy metals and metalloids. Journal of Biological Inorganic Chemistry, 1996, 1, 273-277. | 1.1 | 73 |
| 170 | The Chromosomal arsR Gene of Escherichia coli Encodes a trans-acting Metalloregulatory Protein. Journal of Biological Chemistry, 1996, 271, 2427-2432. | 1.6 | 113 |
| 171 | Interaction of ATP Binding Sites in the ArsA ATPase, the Catalytic Subunit of the Ars Pump. Journal of Biological Chemistry, 1996, 271, 25247-25252. | 1.6 | 30 |
| 172 | The Role of Arsenic-Thiol Interactions in Metalloregulation of the ars Operon. Journal of Biological Chemistry, 1996, 271, 9291-9297. | 1.6 | 153 |
| 173 | Spatial Proximity of Cys113, Cys172, and Cys422 in the Metalloactivation Domain of the ArsA ATPase. Journal of Biological Chemistry, 1996, 271, 24465-24470. | 1.6 | 70 |
| 174 | Role of Cysteinyl Residues in Metalloactivation of the Oxyanion-translocating ArsA ATPase. Journal of Biological Chemistry, 1995, 270, 11245-11250. | 1.6 | 59 |
| 175 | Interaction of substrate and effector binding sites in the ArsA ATPase. Biochemistry, 1995, 34, 13622-13626. | 1.2 | 28 |
| 176 | Identification of an Essential Cysteinyl Residue in the ArsC Arsenate Reductase of Plasmid R773. Biochemistry, 1995, 34, 13472-13476. | 1.2 | 43 |
| 177 | Arsenate reduction mediated by the plasmid-encoded ArsC protein is coupled to glutathione. Molecular Microbiology, 1994, 12, 301-306. | 1.2 | 136 |
| 178 | Properties of the Arsenate Reductase of Plasmid R773. Biochemistry, 1994, 33, 7288-7293. | 1.2 | 188 |
| 179 | The arsD gene encodes a second trans-acting regulatory protein of the plasmid-encoded arsenical resistance operon. Molecular Microbiology, 1993, 8, 615-623. | 1.2 | 118 |
| 180 | Orphan enzyme or patriarch of a new tribe: the arsenic resistance ATPase of bacterial plasmids. Molecular Microbiology, 1993, 8, 637-642. | 1.2 | 73 |

| # | Article | IF | Citations |
|---|---|---|---|
| 181 | Transport systems encoded by bacterial plasmids. Journal of Bioenergetics and Biomembranes, 1990, 22, 493-507. | 1.0 | 41 |
| 182 | Identification of the metalloregulatory element of the plasmid-encoded arsenical resistance operon. Nucleic Acids Research, 1990, 18, 619-624. | 6.5 | 137 |
| 183 | [23] Preparation of everted membrane vesicles from Escherichia coli for the measurement of calcium transport. Methods in Enzymology, 1979, 56, 233-241. | 0.4 | 57 |
| 184 | Orientation of the protonmotive force in membrane vesicles of escherichia coli. Journal of Supramolecular Structure, 1977, 7, 15-27. | 2.3 | 16 |
| 185 | Microbial arsenic: from geocycles to genes and enzymes. , 0, . | | 10 |
| 186 | Saccharomyces cerevisiae ACR2 gene encodes an arsenate reductase. , 0, . | | 4 |