Yasuhisa Asano

List of Publications by Year in descending order

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270 papers 6,575 citations

43 h-index 61 g-index

292 all docs

292 docs citations

times ranked

292

3334 citing authors

| # | Article | IF | CITATIONS |
|----|---|------|-----------|
| 1 | A new enzyme "Nitrile hydratase" which degrades acetonitrile in combination with amidase Agricultural and Biological Chemistry, 1980, 44, 2251-2252. | 0.3 | 139 |
| 2 | Aliphatic nitrile hydratase from Arthrobacter sp. J-1 purification and characterization Agricultural and Biological Chemistry, 1982, 46, 1165-1174. | 0.3 | 132 |
| 3 | A new enzymatic method of acrylamide production Agricultural and Biological Chemistry, 1982, 46, 1183-1189. | 0.3 | 132 |
| 4 | Novel Heme-Containing Lyase, Phenylacetaldoxime Dehydratase from ⟨i⟩Bacillus⟨/i⟩ sp. Strain OxB-1:  Purification, Characterization, and Molecular Cloning of the Gene⟨sup⟩,⟨/sup⟩. Biochemistry, 2000, 39, 800-809. | 2.5 | 114 |
| 5 | Purification and Characterization of Benzonitrilases from <i>Arthrobacter</i> sp. Strain J-1. Applied and Environmental Microbiology, 1986, 51, 302-306. | 3.1 | 112 |
| 6 | Overview of screening for new microbial catalysts and their uses in organic synthesis—selection and optimization of biocatalysts. Journal of Biotechnology, 2002, 94, 65-72. | 3.8 | 108 |
| 7 | Hydroxynitrile Lyases: Insights into Biochemistry, Discovery, and Engineering. ACS Catalysis, 2011, 1, 1121-1149. | 11.2 | 105 |
| 8 | Enantioselective synthesis of (S)-amino acids by phenylalanine dehydrogenase from Bacillus sphaericus: use of natural and recombinant enzymes. Journal of Organic Chemistry, 1990, 55, 5567-5571. | 3.2 | 91 |
| 9 | Purification and characterization of amidase which participates in nitrile degradation Agricultural and Biological Chemistry, 1982, 46, 1175-1181. | 0.3 | 88 |
| 10 | Distribution of Aldoxime Dehydratase in Microorganisms. Applied and Environmental Microbiology, 2000, 66, 2290-2296. | 3.1 | 83 |
| 11 | A New Enzymatic Method of Acrylamide Production. Agricultural and Biological Chemistry, 1982, 46, 1183-1189. | 0.3 | 80 |
| 12 | Dynamic Kinetic Resolution of Amino Acid Amide Catalyzed byd-Aminopeptidase and α-Amino-ε-caprolactam Racemase. Journal of the American Chemical Society, 2005, 127, 7696-7697. | 13.7 | 75 |
| 13 | Gene cloning, nucleotide sequencing, and purification and characterization of the D-stereospecific amino-acid amidase from Ochrobactrum anthropi SV3. FEBS Journal, 2000, 267, 2028-2035. | 0.2 | 73 |
| 14 | A new (R)-hydroxynitrile lyase from Prunus mume: asymmetric synthesis of cyanohydrins. Tetrahedron, 2005, 61, 10908-10916. | 1.9 | 73 |
| 15 | Phenylalanine dehydrogenase of Bacillus badius. Purification, characterization and gene cloning. FEBS Journal, 1987, 168, 153-159. | 0.2 | 72 |
| 16 | Structural similarity of D-aminopeptidase to carboxypeptidase DD and .betalactamases. Biochemistry, 1992, 31, 2316-2328. | 2.5 | 72 |
| 17 | Z-phenylacetaldoxime degradation by a novel aldoxime dehydratase fromBacillussp. strain OxB-1. FEMS Microbiology Letters, 1998, 158, 185-190. | 1.8 | 71 |
| 18 | Screening for New Hydroxynitrilases from Plants. Bioscience, Biotechnology and Biochemistry, 2005, 69, 2349-2357. | 1.3 | 71 |

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|----|---|------|-----------|
| 19 | Tailoring <scp>D</scp> â€Amino Acid Oxidase from the Pig Kidney to <i>R</i> â€Stereoselective Amine Oxidase and its Use in the Deracemization of αâ€Methylbenzylamine. Angewandte Chemie - International Edition, 2014, 53, 4428-4431. | 13.8 | 70 |
| 20 | A Gene Cluster Responsible for Alkylaldoxime Metabolism Coexisting with Nitrile Hydratase and Amidase inRhodococcus globerulusA-4â€,‡. Biochemistry, 2003, 42, 12056-12066. | 2.5 | 67 |
| 21 | A New Enzyme "Nitrile Hydratase―which Degrades Acetonitrile in Combination with Amidase. Agricultural and Biological Chemistry, 1980, 44, 2251-2252. | 0.3 | 63 |
| 22 | A new enzymatic method of nitrile synthesis by Rhodococcus sp. strain YH3-3. Journal of Molecular Catalysis B: Enzymatic, 1999, 6, 249-256. | 1.8 | 63 |
| 23 | Phosphorylation of Nucleosides by the Mutated Acid Phosphatase from <i>Morganella morganii</i> Applied and Environmental Microbiology, 2000, 66, 2811-2816. | 3.1 | 63 |
| 24 | Identification and characterization of CYP79D16 and CYP71AN24 catalyzing the first and second steps in I-phenylalanine-derived cyanogenic glycoside biosynthesis in the Japanese apricot, Prunus mume Sieb. et Zucc Plant Molecular Biology, 2014, 86, 215-223. | 3.9 | 63 |
| 25 | A new D-stereospecific amino acid amidase from Ochrobactrum anthropi. Biochemical and Biophysical Research Communications, 1989, 162, 470-474. | 2.1 | 62 |
| 26 | Enzymes acting on peptides containing d-amino acid. Journal of Bioscience and Bioengineering, 2000, 89, 295-306. | 2.2 | 60 |
| 27 | Cyanideâ€Free and Broadly Applicable Enantioselective Synthetic Platform for Chiral Nitriles through a Biocatalytic Approach. Angewandte Chemie - International Edition, 2017, 56, 12361-12366. | 13.8 | 60 |
| 28 | Strategies to increase the potential use of oleaginous microalgae as biodiesel feedstocks: Nutrient starvations and cost-effective harvesting process. Renewable Energy, 2018, 122, 507-516. | 8.9 | 60 |
| 29 | Aliphatic Nitrile Hydratase fromArthrobactersp. J-1 Purification and Characterization. Agricultural and Biological Chemistry, 1982, 46, 1165-1174. | 0.3 | 58 |
| 30 | Microbial Production of Theobromine from Caffeine. Bioscience, Biotechnology and Biochemistry, 1993, 57, 1286-1289. | 1.3 | 58 |
| 31 | An Alkaline D-Stereospecific Endopeptidase with \hat{l}^2 -Lactamase Activity from Bacillus cereus. Journal of Biological Chemistry, 1996, 271, 30256-30262. | 3.4 | 57 |
| 32 | Aldoxime dehydratase co-existing with nitrile hydratase and amidase in the iron-type nitrile hydratase-producer Rhodococcus sp. N-771. Journal of Bioscience and Bioengineering, 2004, 97, 250-259. | 2.2 | 55 |
| 33 | New Enzymatic Method of Chiral Amino Acid Synthesis by Dynamic Kinetic Resolution of Amino Acid Amides: Use of Stereoselective Amino Acid Amidases in the Presence of α-Amino-Îμ-Caprolactam Racemase. Applied and Environmental Microbiology, 2007, 73, 5370-5373. | 3.1 | 55 |
| 34 | X-ray Crystal Structure of Michaelis Complex of Aldoxime Dehydratase. Journal of Biological Chemistry, 2009, 284, 32089-32096. | 3.4 | 55 |
| 35 | High Yield Synthesis of Nitriles by a New Enzyme, Phenylacetaldoxime Dehydratase, from Bacillus sp. Strain OxB-1. Bioscience, Biotechnology and Biochemistry, 2001, 65, 2666-2672. | 1.3 | 54 |
| 36 | Synthesis of (R)-β-nitro alcohols catalyzed by R-selective hydroxynitrile lyase from Arabidopsis thaliana in the aqueous–organic biphasic system. Journal of Biotechnology, 2011, 153, 153-159. | 3.8 | 54 |

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|----|--|------|-----------|
| 37 | Discovery and molecular and biocatalytic properties of hydroxynitrile lyase from an invasive millipede, <i>Chamberlinius hualienensis /i>. Proceedings of the National Academy of Sciences of the United States of America, 2015, 112, 10605-10610.</i> | 7.1 | 53 |
| 38 | Approaching Bulk Chemical Nitriles from Alkenes: A Hydrogen Cyanide-Free Approach through a Combination of Hydroformylation and Biocatalysis. ACS Catalysis, 2019, 9, 5198-5203. | 11.2 | 51 |
| 39 | Nitrile hydratase involved in aldoxime metabolism from Rhodococcus sp. strain YH3-3. Purification and characterization. FEBS Journal, 1999, 263, 662-670. | 0.2 | 49 |
| 40 | Strategies for discovery and improvement of enzyme function: state of the art and opportunities. Microbial Biotechnology, 2012, 5, 18-33. | 4.2 | 49 |
| 41 | A novel R-stereoselective amidase from Pseudomonas sp. MCl3434 acting on piperazine-2-tert-butylcarboxamide. FEBS Journal, 2004, 271, 1580-1590. | 0.2 | 47 |
| 42 | A new enzymatic method of selective phosphorylation of nucleosides. Journal of Molecular Catalysis B: Enzymatic, 1999, 6, 271-277. | 1.8 | 46 |
| 43 | Biocatalytic Synthesis of Nitriles through Dehydration of Aldoximes: The Substrate Scope of Aldoxime Dehydratases. ChemBioChem, 2018, 19, 768-779. | 2.6 | 43 |
| 44 | Hydroxynitrile lyase from Passiflora edulis: Purification, characteristics and application in asymmetric synthesis of (R)-mandelonitrile. Enzyme and Microbial Technology, 2010, 46, 456-465. | 3.2 | 40 |
| 45 | Enzymatic Synthesis of Chiral Phenylalanine Derivatives by a Dynamic Kinetic Resolution of Corresponding Amide and Nitrile Substrates with a Multiâ€Enzyme System. Advanced Synthesis and Catalysis, 2012, 354, 3327-3332. | 4.3 | 40 |
| 46 | First stereoselective synthesis of D-amino acid N-alkyl amide catalyzed by D-aminopeptidase. Tetrahedron, 1989, 45, 5743-5754. | 1.9 | 38 |
| 47 | Covalent immobilization of phenylalanine dehydrogenase on cellulose membrane for biosensor construction. Sensors and Actuators B: Chemical, 2008, 129, 195-199. | 7.8 | 38 |
| 48 | S-selective hydroxynitrile lyase from a plant Baliospermum montanum: Molecular characterization of recombinant enzyme. Journal of Biotechnology, 2011, 153, 100-110. | 3.8 | 38 |
| 49 | A novel selective nucleoside phosphorylating enzyme from Morganella morganii. Journal of Bioscience and Bioengineering, 1999, 87, 732-738. | 2.2 | 37 |
| 50 | Regulation of Aldoxime Dehydratase Activity by Redox-dependent Change in the Coordination Structure of the Aldoxime-Heme Complex. Journal of Biological Chemistry, 2005, 280, 5486-5490. | 3.4 | 37 |
| 51 | New thermostable d-methionine amidase from Brevibacillus borstelensis BCS-1 and its application for d-phenylalanine production. Enzyme and Microbial Technology, 2003, 32, 131-139. | 3.2 | 36 |
| 52 | Dynamic Kinetic Resolution of αâ€Aminonitriles to Form Chiral αâ€Amino Acids. Advanced Synthesis and Catalysis, 2011, 353, 2328-2332. | 4.3 | 36 |
| 53 | Cyanideâ€free Enantioselective Synthesis of Nitriles: Synthetic Proof of a Biocatalytic Concept and Mechanistic Insights. ChemCatChem, 2014, 6, 3105-3109. | 3.7 | 36 |
| 54 | Enzymes Involved in Theobromine Production from Caffeine byPseudomonas putidaNo. 352. Bioscience, Biotechnology and Biochemistry, 1994, 58, 2303-2304. | 1.3 | 35 |

| # | Article | IF | Citations |
|----|---|-----|-----------|
| 55 | Lipase-mediated desymmetrization of glycerol with aromatic and aliphatic anhydrides. Tetrahedron: Asymmetry, 2004, 15, 3551-3559. | 1.8 | 35 |
| 56 | Molecular and enzymatic analysis of the "aldoxime–nitrile pathway―in the glutaronitrile degrader Pseudomonas sp. K-9. Applied Microbiology and Biotechnology, 2006, 70, 92-101. | 3.6 | 35 |
| 57 | Two Distinct Quinoprotein Amine Oxidases are Induced by n-Butylamine in the Mycelia of Aspergillus niger AKU 3302. Purification, Characterization, cDNA Cloning and Sequencing. FEBS Journal, 1996, 237, 255-265. | 0.2 | 33 |
| 58 | Efficient preparation of (R)-?-monobenzoyl glycerol by lipase catalyzed asymmetric esterification: Optimization and operation in packed bed reactor. Biotechnology and Bioengineering, 2001, 73, 493-499. | 3.3 | 33 |
| 59 | Single Amino Acid Substitution in Bacillus sphaericus Phenylalanine Dehydrogenase Dramatically Increases Its Discrimination between Phenylalanine and Tyrosine Substrates. Biochemistry, 2002, 41, 11390-11397. | 2.5 | 33 |
| 60 | Stereoselective synthesis of opine-type secondary amine carâ ylic acids by a new enzyme opine dehydrogenase use of recombinant enzymes. Journal of Molecular Catalysis B: Enzymatic, 1996, 1, 151-160. | 1.8 | 32 |
| 61 | X-Ray crystallographic evidence for the presence of the cysteine tryptophylquinone cofactor in l-lysine ε-oxidase from Marinomonas mediterranea. Journal of Biochemistry, 2013, 154, 233-236. | 1.7 | 32 |
| 62 | Alteration in relative activities of phenylalanine dehydrogenase towards different substrates by site-directed mutagenesis. FEBS Letters, 1995, 370, 93-96. | 2.8 | 31 |
| 63 | Quantitation of L-Amino Acids by Substrate Recycling between an Aminotransferase and a Dehydrogenase: Application to the Determination of L-Phenylalanine in Human Blood. Analytical Biochemistry, 1996, 234, 19-22. | 2.4 | 31 |
| 64 | Application of an enzyme chip to the microquantification of l-phenylalanine. Analytical Biochemistry, 2006, 359, 72-78. | 2.4 | 31 |
| 65 | Purification and Characterization of A Novel (<i>R</i>)-Hydroxynitrile Lyase from <i>Eriobotrya japonica</i> (Loquat). Bioscience, Biotechnology and Biochemistry, 2008, 72, 1513-1522. | 1.3 | 31 |
| 66 | Functional expression of a plant hydroxynitrile lyase in Escherichia coli by directed evolution: creation and characterization of highly in vivo soluble mutants. Protein Engineering, Design and Selection, 2011, 24, 607-616. | 2.1 | 31 |
| 67 | Kemp Elimination Catalyzed by Naturally Occurring Aldoxime Dehydratases. ChemBioChem, 2017, 18, 451-454. | 2.6 | 31 |
| 68 | Enhancement of the thermostability and catalytic activity of d-stereospecific amino-acid amidase from Ochrobactrum anthropi SV3 by directed evolution. Journal of Molecular Catalysis B: Enzymatic, 2003, 21, 283-290. | 1.8 | 30 |
| 69 | The Novel Structure of a Pyridoxal 5′-Phosphate-Dependent Fold-Type I Racemase, α-Amino-Îμ-caprolactam Racemase from Achromobacter obae,. Biochemistry, 2009, 48, 941-950. | 2.5 | 30 |
| 70 | Cytochrome P450 CYP71AT96 catalyses the final step of herbivore-induced phenylacetonitrile biosynthesis in the giant knotweed, Fallopia sachalinensis. Plant Molecular Biology, 2016, 91, 229-239. | 3.9 | 30 |
| 71 | Purification and Characterization of Aldoxime Dehydratase of the Head Blight Fungus, Fusarium graminearum. Bioscience, Biotechnology and Biochemistry, 2005, 69, 2254-2257. | 1.3 | 29 |
| 72 | Crystal Structure and Functional Characterization of a D-Stereospecific Amino Acid Amidase from Ochrobactrum anthropi SV3, a New Member of the Penicillin-recognizing Proteins. Journal of Molecular Biology, 2007, 368, 79-91. | 4.2 | 29 |

| # | Article | IF | Citations |
|----|---|-----|-----------|
| 73 | Synthesis of D-Alanine Oligopeptides Catalyzed by D-Aminopeptidase in Non-Aqueous Media. Biocatalysis, 1990, 3, 207-215. | 0.9 | 28 |
| 74 | Activation and cytotoxicity of 2-α-aminoacyl prodrugs of methotrexate. Biochemical Pharmacology, 1995, 49, 567-574. | 4.4 | 28 |
| 75 | Enhancement of nucleoside phosphorylation activity in an acid phosphatase. Protein Engineering, Design and Selection, 2002, 15, 539-543. | 2.1 | 28 |
| 76 | High-level expression of a novel FMN-dependent heme-containing lyase, phenylacetaldoxime dehydratase of Bacillus sp. strain OxB-1, in heterologous hosts. Protein Expression and Purification, 2003, 28, 131-139. | 1.3 | 28 |
| 77 | Discovery of amino acid amides as new substrates for α-amino-É>-caprolactam racemase from Achromobacter obae. Journal of Molecular Catalysis B: Enzymatic, 2005, 36, 22-29. | 1.8 | 28 |
| 78 | Alteration of substrate specificity of aspartase by directed evolution. New Biotechnology, 2005, 22, 95-101. | 2.7 | 28 |
| 79 | Synthesis of optically active α-monobenzoyl glycerol by asymmetric transesterification of glycerol. Journal of Molecular Catalysis B: Enzymatic, 2000, 9, 193-200. | 1.8 | 27 |
| 80 | PmHNL catalyzed synthesis of (R)-cyanohydrins derived from aliphatic aldehydes. Tetrahedron: Asymmetry, 2006, 17, 735-741. | 1.8 | 27 |
| 81 | New enzymatic methods for the synthesis of primary \hat{l} ±-aminonitriles and unnatural \hat{l} ±-amino acids by oxidative cyanation of primary amines with $\langle scp \rangle d \langle scp \rangle$ -amino acid oxidase from porcine kidney. Green Chemistry, 2017, 19, 418-424. | 9.0 | 27 |
| 82 | High yield synthesis of L-amino acids by phenylalanine dehydrogenase from Sporosarcina ureae Agricultural and Biological Chemistry, 1987, 51, 2035-2036. | 0.3 | 26 |
| 83 | Characterization of a New (<i>R</i>)-Hydroxynitrile Lyase from the Japanese Apricot <i>Prunus mume</i> and cDNA Cloning and Secretory Expression of One of the Isozymes in <i>Pichia pastoris</i> Bioscience, Biotechnology and Biochemistry, 2011, 75, 214-220. | 1.3 | 26 |
| 84 | Biosynthetic Pathway for the Cyanide-Free Production of Phenylacetonitrile in Escherichia coli by Utilizing Plant Cytochrome P450 79A2 and Bacterial Aldoxime Dehydratase. Applied and Environmental Microbiology, 2014, 80, 6828-6836. | 3.1 | 26 |
| 85 | A novel cytochrome P450, <scp>CYP</scp> 3201B1, is involved in (<i>R</i>)â€mandelonitrile biosynthesis in a cyanogenic millipede. FEBS Open Bio, 2017, 7, 335-347. | 2.3 | 26 |
| 86 | Photoautotrophic cultivation of oleaginous microalgae and co-pelletization with filamentous fungi for cost-effective harvesting process and improved lipid yield. Aquaculture International, 2018, 26, 1493-1509. | 2.2 | 26 |
| 87 | Structure and Function of Amino Acid Ammonia-lyases. Biocatalysis and Biotransformation, 2004, 22, 133-140. | 2.0 | 25 |
| 88 | A DmpA-homologous protein from Pseudomonas sp. is a dipeptidase specific for \hat{I}^2 -alanyl dipeptides. FEBS Journal, 2005, 272, 3075-3084. | 4.7 | 25 |
| 89 | l-Stereoselective amino acid amidase with broad substrate specificity from Brevundimonas diminuta: characterization of a new member of the leucine aminopeptidase family. Applied Microbiology and Biotechnology, 2006, 70, 412-421. | 3.6 | 25 |
| 90 | Supramolecular-mediated immobilization of l-phenylalanine dehydrogenase on cyclodextrin-coated Au electrodes for biosensor applications. Biotechnology Letters, 2007, 29, 447-452. | 2.2 | 25 |

| # | Article | IF | Citations |
|-----|--|------|-----------|
| 91 | Selective tryptophan determination using tryptophan oxidases involved in bis-indole antibiotic biosynthesis. Analytical Biochemistry, 2013, 438, 124-132. | 2.4 | 25 |
| 92 | Catechol 2,3-Dioxygenase-catalyzed Synthesis of Picolinic Acids from Catechols. Bioscience, Biotechnology and Biochemistry, 1994, 58, 2054-2056. | 1.3 | 24 |
| 93 | S -Stereoselective piperazine-2-tert-butylcarboxamide hydrolase from Pseudomonas azotoformans IAM 1603 is a novel l-amino acid amidase. FEBS Journal, 2004, 271, 1465-1475. | 0.2 | 24 |
| 94 | Purification and characterization of xylitol dehydrogenase with l-arabitol dehydrogenase activity from the newly isolated pentose-fermenting yeast Meyerozyma caribbica 5XY2. Journal of Bioscience and Bioengineering, 2017, 123, 20-27. | 2,2 | 24 |
| 95 | Crystallization of phenylalanine dehydrogenase from Sporosarcina ureae Agricultural and Biological Chemistry, 1985, 49, 3631-3632. | 0.3 | 23 |
| 96 | Acid phosphatase/phosphotransferases from enteric bacteria. Journal of Bioscience and Bioengineering, 2001, 92, 50-54. | 2.2 | 23 |
| 97 | Structural-Based Engineering for Transferases to Improve the Industrial Production of 5′-Nucleotides. Bulletin of the Chemical Society of Japan, 2007, 80, 276-286. | 3.2 | 23 |
| 98 | Purification and characterization of an l-amino acid oxidase from Pseudomonas sp. AlU 813. Journal of Bioscience and Bioengineering, 2012, 114, 257-261. | 2.2 | 23 |
| 99 | Rational identification of aggregation hotspots based on secondary structure and amino acid hydrophobicity. Scientific Reports, 2017, 7, 9558. | 3.3 | 22 |
| 100 | Identification and development of amino acid oxidases. Current Opinion in Chemical Biology, 2019, 49, 76-83. | 6.1 | 22 |
| 101 | Acid Phosphatase/Phosphotransferases from Enteric Bacteria Journal of Bioscience and Bioengineering, 2001, 92, 50-54. | 2.2 | 22 |
| 102 | Enzymatic cycling assay for phenylpyruvate. Analytical Biochemistry, 1989, 183, 210-214. | 2.4 | 21 |
| 103 | Polymerase chain reaction for identification of aldoxime dehydratase in aldoxime- or nitrile-degrading microorganisms. FEMS Microbiology Letters, 2005, 246, 243-249. | 1.8 | 21 |
| 104 | Supramolecular-mediated thermostabilization of phenylalanine dehydrogenase modified with \hat{l}^2 -cyclodextrin derivatives. Biochemical Engineering Journal, 2006, 30, 26-32. | 3.6 | 21 |
| 105 | Purification and partial characterization of N-hydroxy-l-phenylalanine decarboxylase/oxidase from Bacillus sp. strain OxB-1, an enzyme involved in aldoxime biosynthesis in the "aldoxime–nitrile pathway― Biochimica Et Biophysica Acta - Proteins and Proteomics, 2007, 1774, 856-865. | 2.3 | 21 |
| 106 | <scp>D</scp> â€Amino Acid Specific Proteases and Native Allâ€ <scp>L</scp> â€Proteins: A Convenient Combination for Semisynthesis. Angewandte Chemie - International Edition, 2008, 47, 5456-5460. | 13.8 | 21 |
| 107 | Determination of plasma and serum l-lysine using l-lysine Îμ-oxidase from Marinomonas mediterranea NBRC 103028T. Analytical Biochemistry, 2010, 406, 19-23. | 2.4 | 21 |
| 108 | Highly selective I-threonine 3-dehydrogenase from Cupriavidus necator and its use in determination of I-threonine. Analytical Biochemistry, 2011, 410, 44-56. | 2.4 | 21 |

| # | Article | IF | CITATIONS |
|-----|---|-------------------|-----------|
| 109 | Nucleotide Sequencing of Phenylalanine Dehydrogenase Gene from <i>Bacillus badius </i> li>IAM 11059. Bioscience, Biotechnology and Biochemistry, 1995, 59, 1994-1995. | 1.3 | 20 |
| 110 | Improving the Pyrophosphate-inosine Phosphotransferase Activity of Escherichia blattae Acid Phosphatase by Sequential Site-directed Mutagenesis. Bioscience, Biotechnology and Biochemistry, 2004, 68, 1046-1050. | 1.3 | 20 |
| 111 | Parameters influencing asymmetric synthesis of (R)-mandelonitrile by a novel (R)-hydroxynitrile lyase from Eriobotrya japonica. Journal of Molecular Catalysis B: Enzymatic, 2009, 56, 208-214. | 1.8 | 20 |
| 112 | Rapid enzymatic assays for l-citrulline and l-arginine based on the platform of pyrophosphate detection. Enzyme and Microbial Technology, 2014, 57, 36-41. | 3.2 | 20 |
| 113 | Protein evolution analysis of S-hydroxynitrile lyase by complete sequence design utilizing the INTMSAlign software. Scientific Reports, 2015, 5, 8193. | 3.3 | 20 |
| 114 | Origin of Stereoselectivity and Substrate/Ligand Recognition in an FAD-Dependent <i>R</i> -Selective Amine Oxidase. Journal of Physical Chemistry B, 2016, 120, 10736-10743. | 2.6 | 20 |
| 115 | Recent progress on discovery and research of aldoxime dehydratases. Green Synthesis and Catalysis, 2021, 2, 179-186. | 6.8 | 20 |
| 116 | A novel method for preparation of optically active \hat{l}_{\pm} -monobenzoyl glycerol via lipase-catalyzed asymmetric transesterification of glycerol. Bioorganic and Medicinal Chemistry Letters, 1999, 9, 3207-3210. | 2.2 | 19 |
| 117 | A new aryl acylamidase from Rhodococcus sp. strain Oct1 acting on ï‰-lactams: Its characterization and gene expression in Escherichia coli. Enzyme and Microbial Technology, 2010, 46, 237-245. | 3.2 | 19 |
| 118 | Plasmidâ€based, <i>D</i> â€aminopeptidaseâ€catalysed synthesis of (<i>R</i>)â€amino acids. Recueil Des Trava Chimiques Des Pays-Bas, 1991, 110, 206-208. | ux _{o.o} | 19 |
| 119 | A Simple Enzymatic Method for Production of a Wide Variety of <scp>D</scp> -Amino Acids Using <scp>L</scp> -Amino Acid Oxidase from <i>Rhodococcus</i> sp. AIU Z-35-1. Enzyme Research, 2010, 2010, 1-6. | 1.8 | 19 |
| 120 | Structural and functional analysis of hydroxynitrile lyase from Baliospermum montanum with crystal structure, molecular dynamics and enzyme kinetics. Biochimica Et Biophysica Acta - Proteins and Proteomics, 2014, 1844, 2059-2067. | 2.3 | 19 |
| 121 | l-Arginine oxidase from Pseudomonas sp. TPU 7192: Characterization, gene cloning, heterologous expression, and application to l-arginine determination. Enzyme and Microbial Technology, 2016, 82, 151-157. | 3.2 | 19 |
| 122 | Following the Evolutionary Track of a Highly Specific <scp>I</scp> -Arginine Oxidase by Reconstruction and Biochemical Analysis of Ancestral and Native Enzymes. Applied and Environmental Microbiology, 2019, 85, . | 3.1 | 19 |
| 123 | Synthetic Processes toward Nitriles without the Use of Cyanide: A Biocatalytic Concept Based on Dehydration of Aldoximes in Water. Chemistry - A European Journal, 2021, 27, 5313-5321. | 3.3 | 19 |
| 124 | Microbial degradation of nitrile compounds. Part IV. Fungal degradation of triacrylonitrile Agricultural and Biological Chemistry, 1981, 45, 57-62. | 0.3 | 18 |
| 125 | Bacillus phenylalanine dehydrogenase produced in Escherichia coli. Its purification and application to L-phenylalanine synthesis Agricultural and Biological Chemistry, 1987, 51, 2621-2623. | 0.3 | 18 |
| 126 | Purification, characterization, gene cloning and nucleotide sequencing of D-stereospecific amino acid amidase from soil bacterium: Delftia acidovorans. Journal of Industrial Microbiology and Biotechnology, 2005, 32, 567-576. | 3.0 | 18 |

| # | Article | IF | CITATIONS |
|-----|--|--------------|-----------|
| 127 | Enzymatic chemoselective synthesis of secondary-amide surfactant from N-methylethanol amine. Journal of Bioscience and Bioengineering, 2005, 100, 662-666. | 2.2 | 18 |
| 128 | Determination of l-methionine using methionine-specific dehydrogenase for diagnosis of homocystinuria due to cystathionine \hat{l}^2 -synthase deficiency. Analytical Biochemistry, 2012, 428, 143-149. | 2.4 | 18 |
| 129 | Binding of NAD+ and l-Threonine Induces Stepwise Structural and Flexibility Changes in Cupriavidus necator l-Threonine Dehydrogenase. Journal of Biological Chemistry, 2014, 289, 10445-10454. | 3.4 | 18 |
| 130 | Mutational and crystallographic analysis of <scp>l</scp> â€emino acid oxidase/monooxygenase from <i>Pseudomonas</i> sp. AlU 813: Interconversion between oxidase and monooxygenase activities. FEBS Open Bio, 2014, 4, 220-228. | 2.3 | 18 |
| 131 | Efficient Production of Lumichrome by Microbacterium sp. Strain TPU 3598. Applied and Environmental Microbiology, 2015, 81, 7360-7367. | 3.1 | 18 |
| 132 | Chemical Polymorphism in Defense Secretions during Ontogenetic Development of the Millipede Niponia nodulosa. Journal of Chemical Ecology, 2015, 41, 15-21. | 1.8 | 18 |
| 133 | A sacrificial millipede altruistically protects its swarm using a drone blood enzyme, mandelonitrile oxidase. Scientific Reports, 2016, 6, 26998. | 3 . 3 | 18 |
| 134 | Cyanidâ€freie und breit anwendbare enantioselektive Syntheseplattform für chirale Nitrile durch einen biokatalytischen Zugang. Angewandte Chemie, 2017, 129, 12533-12538. | 2.0 | 18 |
| 135 | Benchmark Analysis of Native and Artificial NAD ⁺ -Dependent Enzymes Generated by a Sequence-Based Design Method with or without Phylogenetic Data. Biochemistry, 2018, 57, 3722-3732. | 2.5 | 18 |
| 136 | Discovery of aD-Stereospecific Aminopeptidase and Its Use as a Catalyst in Organic Synthesis. Angewandte Chemie International Edition in English, 1989, 28, 450-451. | 4.4 | 17 |
| 137 | Occurrence of 3-Methylaspartate Ammonia-lyase in Facultative Anaerobes and Their Application to Synthesis of 3-Substituted (S)-Aspartic Acids. Bioscience, Biotechnology and Biochemistry, 1994, 58, 223-224. | 1.3 | 17 |
| 138 | Synthesis of d-phenylalanine oligopeptides catalyzed by alkaline d-peptidase from Bacillus cereus DF4-B. Journal of Molecular Catalysis B: Enzymatic, 1999, 6, 379-386. | 1.8 | 17 |
| 139 | A novel d-stereoselective amino acid amidase from Brevibacterium iodinum: Gene cloning, expression and characterization. Enzyme and Microbial Technology, 2008, 43, 276-283. | 3.2 | 17 |
| 140 | Rapid and selective enzymatic assay for l-methionine based on a pyrophosphate detection system. Analytical Biochemistry, 2014, 447, 33-38. | 2.4 | 17 |
| 141 | Characterization of a pyridoxal-5′-phosphate-dependent l-lysine decarboxylase/oxidase from Burkholderia sp. AlU 395. Journal of Bioscience and Bioengineering, 2014, 118, 496-501. | 2.2 | 17 |
| 142 | Cyanide-Free Enantioselective Catalytic Strategies for the Synthesis of Chiral Nitriles. Journal of Organic Chemistry, 2020, 85, 6243-6251. | 3. 2 | 17 |
| 143 | Purification and Properties of Crystalline 3-Methylaspartase from Two Facultative Anaerobes, <i>Citrobacter</i> sp. Strain YG-0504 and <i>Morganella morganii</i> Strain YG-0601. Bioscience, Biotechnology and Biochemistry, 1995, 59, 93-99. | 1.3 | 16 |
| 144 | Spectroscopic and substrate binding properties of heme-containing aldoxime dehydratases, OxdB and OxdRE. Journal of Inorganic Biochemistry, 2006, 100, 1069-1074. | 3 . 5 | 16 |

| # | Article | IF | CITATIONS |
|-----|--|-----|-----------|
| 145 | The Screening, Characterization, and Use of i‰-Laurolactam Hydrolase: A New Enzymatic Synthesis of 12-Aminolauric Acid. Bioscience, Biotechnology and Biochemistry, 2008, 72, 2141-2150. | 1.3 | 16 |
| 146 | Introduction - Principles and Historical Landmarks of Enzyme Catalysis in Organic Synthesis. , 2012, , $1\text{-}42$. | | 16 |
| 147 | Expansion of the Substrate Specificity of Porcine Kidney Dâ€Amino Acid Oxidase for <i>S</i> â€Stereoselective Oxidation of 4â€Clâ€Benzhydrylamine. ChemCatChem, 2018, 10, 3500-3505. | 3.7 | 16 |
| 148 | Protein Sequence Selection Method That Enables Full Consensus Design of Artificial <scp>I</scp> -Threonine 3-Dehydrogenases with Unique Enzymatic Properties. Biochemistry, 2020, 59, 3823-3833. | 2.5 | 16 |
| 149 | Isolation of Poly(3-Hydroxybutyrate) (PHB)-degrading Microorganisms and Characterization of PHB-depolymerase from Arthrobacter sp. strain W6. Bioscience, Biotechnology and Biochemistry, 2001, 65, 1191-1194. | 1.3 | 15 |
| 150 | Kinetic analysis of phenylalanine dehydrogenase mutants designed for aliphatic amino acid dehydrogenase activity with guidance from homology-based modelling. FEBS Journal, 2003, 270, 4628-4634. | 0.2 | 15 |
| 151 | Aldoxime Dehydratase: Probing the Heme Environment Involved in the Synthesis of the Carbon–Nitrogen Triple Bond. Journal of Physical Chemistry B, 2011, 115, 13012-13018. | 2.6 | 15 |
| 152 | Structural and computational analysis of peptide recognition mechanism of class-C type penicillin binding protein, alkaline D-peptidase from Bacillus cereus DF4-B. Scientific Reports, 2015, 5, 13836. | 3.3 | 15 |
| 153 | Biocatalytic asymmetric ring-opening of dihydroisoxazoles: a cyanide-free route to complementary enantiomers of \hat{l}^2 -hydroxy nitriles from olefins. Green Chemistry, 2020, 22, 4930-4936. | 9.0 | 15 |
| 154 | Maleate cis-trans isomerase from Arthrobacter sp. TPU 5446. Journal of Bioscience and Bioengineering, 1995, 80, 610-612. | 0.9 | 14 |
| 155 | Increased Conformational and Thermal Stability Properties for Phenylalanine Dehydrogenase by Chemical Glycosidation with End-group Activated Dextran. Biotechnology Letters, 2005, 27, 1311-1317. | 2.2 | 14 |
| 156 | (2-Nitroethyl)benzene: a major flower scent from the Japanese loquat <i>Eriobotrya japonica </i> [Rosales: Rosaceae]. Bioscience, Biotechnology and Biochemistry, 2014, 78, 1320-1323. | 1.3 | 14 |
| 157 | Hydroxynitrile lyases from cyanogenic millipedes: molecular cloning, heterologous expression, and whole-cell biocatalysis for the production of (R)-mandelonitrile. Scientific Reports, 2018, 8, 3051. | 3.3 | 14 |
| 158 | Enzymatic synthesis of l-?-chloroalanine using amino acid dehydrogenase. Applied Microbiology and Biotechnology, 1993, 39, 301. | 3.6 | 13 |
| 159 | Mutants of d-aminopeptidase with increased thermal stability. Journal of Bioscience and Bioengineering, 1995, 79, 614-616. | 0.9 | 13 |
| 160 | Comparative expression of wild-type and highly soluble mutant His103Leu of hydroxynitrile lyase from Manihot esculenta in prokaryotic and eukaryotic expression systems. Protein Expression and Purification, 2011, 77, 92-97. | 1.3 | 13 |
| 161 | Cyanide-free synthesis of an aromatic nitrile from a biorenewable-based aldoxime: Development and application of a recombinant aldoxime dehydratase as a biocatalyst. Biocatalysis and Biotransformation, 2019, 37, 414-420. | 2.0 | 13 |
| 162 | Amino acid racemase with broad substrate specificity, its properties and use in phenylalanine racemization. Applied Microbiology and Biotechnology, 1988, 29, 523-527. | 3.6 | 12 |

| # | Article | IF | Citations |
|-----|---|-----|-----------|
| 163 | Crystalline 3-methylaspartase from a facultative anaerobe, Escherichia colistrain YG1002. FEMS Microbiology Letters, 1994, 118, 255-258. | 1.8 | 12 |
| 164 | Two amine oxidases from Aspergillus niger AKU 3302 contain topa quinone as the cofactor: unusual cofactor link to the glutamyl residue occurs only at one of the enzymes. BBA - Proteins and Proteomics, 1996, 1295, 59-72. | 2.1 | 12 |
| 165 | High Yield Synthesis of 12-Aminolauric Acid by "Enzymatic Transcrystallization―of ω-Laurolactam Using ω-Laurolactam Hydrolase fromAcidovoraxsp. T31. Bioscience, Biotechnology and Biochemistry, 2009, 73, 980-986. | 1.3 | 12 |
| 166 | Identification and characterization of d-xylose reductase involved in pentose catabolism of the zygomycetous fungus Rhizomucor pusillus. Journal of Bioscience and Bioengineering, 2015, 119, 57-64. | 2.2 | 12 |
| 167 | Effect of Glycosylation on the Biocatalytic Properties of Hydroxynitrile Lyase from the Passion Fruit, <i>Passiflora edulis</i> : A Comparison of Natural and Recombinant Enzymes. ChemBioChem, 2017, 18, 257-265. | 2.6 | 12 |
| 168 | The crystal structure and catalytic mechanism of hydroxynitrile lyase from passion fruit, <i>Passiflora edulis</i> . FEBS Journal, 2018, 285, 313-324. | 4.7 | 12 |
| 169 | Protein engineering for improving the thermostability of tryptophan oxidase and insights from structural analysis. Journal of Biochemistry, 2018, 164, 359-367. | 1.7 | 12 |
| 170 | Purification, characterization, and gene cloning of a novel aminoacylase from <i>Burkholderia</i> sp. strain LP5_18B that efficiently catalyzes the synthesis of <i>N</i> -lauroyl- <scp> </scp> -amino acids. Bioscience, Biotechnology and Biochemistry, 2019, 83, 1964-1973. | 1.3 | 12 |
| 171 | Aldoxime Dehydratase Mutants as Improved Biocatalysts for a Sustainable Synthesis of Biorenewables-Based 2-Furonitrile. Catalysts, 2020, 10, 362. | 3.5 | 12 |
| 172 | Genes for an alkaline d-stereospecific endopeptidase and its homolog are located in tandem onBacillus cereusgenome. FEMS Microbiology Letters, 2003, 228, 1-9. | 1.8 | 11 |
| 173 | Characterization of two amine oxidases from Aspergillus carbonarius AIU 205. Journal of Bioscience and Bioengineering, 2015, 119, 629-635. | 2.2 | 11 |
| 174 | Product Release Mechanism Associated with Structural Changes in Monomeric l-Threonine 3-Dehydrogenase. Biochemistry, 2017, 56, 5758-5770. | 2.5 | 11 |
| 175 | Ligand complex structures of I â€amino acid oxidase/monooxygenase from Pseudomonas sp. AlU 813 and its conformational change. FEBS Open Bio, 2018, 8, 314-324. | 2.3 | 11 |
| 176 | Mechanistic insights into the dual activities of the single active site of l-lysine oxidase/monooxygenase from Pseudomonas sp. AlU 813. Journal of Biological Chemistry, 2020, 295, 11246-11261. | 3.4 | 11 |
| 177 | Degradation of Dinitriles byFusarium merismoidesTG-1. Agricultural and Biological Chemistry, 1980, 44, 2497-2498. | 0.3 | 10 |
| 178 | TransFatty Acid Intake and Serum Cholesterol Levels in Young Japanese Women. Bioscience, Biotechnology and Biochemistry, 2012, 76, 1627-1632. | 1.3 | 10 |
| 179 | A simple assay of taurine concentrations in food and biological samples using taurine dioxygenase. Analytical Biochemistry, 2012, 427, 121-123. | 2.4 | 10 |
| 180 | Identification and characterization of <scp>d </scp> -xylulokinase from the <scp>d </scp> -xylose-fermenting fungus, <i>Mucor circinelloides </i> . FEMS Microbiology Letters, 2014, 360, 51-61. | 1.8 | 10 |

| # | Article | IF | CITATIONS |
|-----|--|--------------|-----------|
| 181 | Characterization and application of aminoamide-oxidizing enzyme from Aspergillus carbonarius AlU 205. Journal of Bioscience and Bioengineering, 2014, 117, 263-268. | 2.2 | 10 |
| 182 | Mutagenesis of an Asn156 Residue in a Surface Region of <i>S</i> â€Selective Hydroxynitrile Lyase from <i>Baliospermum montanum</i> Enhances Catalytic Efficiency and Enantioselectivity. ChemBioChem, 2015, 16, 1891-1895. | 2.6 | 10 |
| 183 | Screening and development of enzymes for determination and transformation of amino acids. Bioscience, Biotechnology and Biochemistry, 2019, 83, 1402-1416. | 1.3 | 10 |
| 184 | Rationalizing the Unprecedented Stereochemistry of an Enzymatic Nitrile Synthesis through a Combined Computational and Experimental Approach. Angewandte Chemie - International Edition, 2021, 60, 19162-19168. | 13.8 | 10 |
| 185 | Degradation of dinitriles by Fusarium merismoides TG-1 Agricultural and Biological Chemistry, 1980, 44, 2497-2498. | 0.3 | 9 |
| 186 | Isolierung einer Dâ€stereospezifischen Aminopeptidase und ihre Anwendung als Katalysator in der Organischen Synthese. Angewandte Chemie, 1989, 101, 511-512. | 2.0 | 9 |
| 187 | Systematic Regulation of the Enzymatic Activity of Phenylacetaldoxime Dehydratase by Exogenous Ligands. ChemBioChem, 2006, 7, 2004-2009. | 2.6 | 9 |
| 188 | Glycosidation of phenylalanine dehydrogenase with O-carboxymethyl-poly- \hat{l}^2 -cyclodextrin. Enzyme and Microbial Technology, 2007, 40, 471-475. | 3.2 | 9 |
| 189 | Structures of <scp>D < /scp>-amino-acid amidase complexed with <scp>L < /scp>-phenylalanine and with <scp>L < /scp>-phenylalanine amide: insight into the <scp>D < /scp>-stereospecificity of <scp>D < /scp>-amino-acid amidase from <i>Ochrobactrum anthropi < /i>SV3. Acta Crystallographica Section D: Biological Crystallography, 2008, 64, 331-334.</i></scp></scp></scp></scp></scp> | 2.5 | 9 |
| 190 | Synthesis of optically active medium-sized \hat{l}_{\pm} -aminolactams via ring-closing metathesis. Tetrahedron, 2012, 68, 6651-6655. | 1.9 | 9 |
| 191 | A New <i>S</i> Hydroxynitrile Lyase from <i>Baliospermum montanum</i> Paragraphics Structure, Molecular Dynamics Simulation, and Improvement by Protein Engineering. Industrial Biotechnology, 2016, 12, 91-97. | 0.8 | 9 |
| 192 | Hydrogen peroxide as a new defensive compound in "benzoyl cyanide―producing polydesmid millipedes. Die Naturwissenschaften, 2017, 104, 19. | 1.6 | 9 |
| 193 | Discovery and Structural Analysis to Improve the Enantioselectivity of Hydroxynitrile Lyase from <i>Parafontaria laminata</i> Millipedes for (<i>R</i>)-2-Chloromandelonitrile Synthesis. ACS Omega, 2020, 5, 27896-27908. | 3.5 | 9 |
| 194 | A promiscuous fatty acid ωâ€hydroxylase CYP94A90 is likely to be involved in biosynthesis of a floral nitro compound in loquat (<i>Eriobotrya japonica</i>). New Phytologist, 2021, 231, 1157-1170. | 7.3 | 9 |
| 195 | Crystal structural analysis of aldoxime dehydratase from Bacillus sp. OxB-1: Importance of surface residues in optimization for crystallization. Journal of Inorganic Biochemistry, 2022, 230, 111770. | 3 . 5 | 9 |
| 196 | Purification and Characterization of Maleate Hydratase from <i>Arthrobacter</i> sp. strain MCl2612. Bioscience, Biotechnology and Biochemistry, 1993, 57, 1545-1548. | 1.3 | 8 |
| 197 | Regioselective Glucosylation of Pyridoxine by Microorganisms. Bioscience, Biotechnology and Biochemistry, 2003, 67, 499-507. | 1.3 | 8 |
| 198 | Asymmetric Synthesis of L- \hat{l} ±-Methylcysteine with the Amidase from Xanthobacter flavus NR303. Advanced Synthesis and Catalysis, 2005, 347, 1132-1138. | 4.3 | 8 |

| # | Article | IF | Citations |
|-----|--|-----|-----------|
| 199 | Isolation of indigenous antagonistic microorganism to inhibit Rigidoporus microporus and other plant pathogens and analysis of the bioactive compounds. Biological Control, 2018, 124, 53-60. | 3.0 | 8 |
| 200 | Effects of codon optimization and glycosylation on the high-level production of hydroxynitrile lyase from <i>Chamberlinius hualienensis</i> in <i>Pichia pastoris</i> Journal of Industrial Microbiology and Biotechnology, 2019, 46, 887-898. | 3.0 | 8 |
| 201 | <i>R</i> â€hydroxynitrile lyase from the cyanogenic millipede, <i>Chamberlinius hualienensis</i> â€"A new entry to the carrier protein family Lipocalines. FEBS Journal, 2021, 288, 1679-1695. | 4.7 | 8 |
| 202 | Studies on the Synthesis of Amides and Amino Acids by Novel Microbial Enzymes Nippon Nogeikagaku Kaishi, 1991, 65, 1617-1626. | 0.0 | 7 |
| 203 | Discrimination of Aliphatic Substrates by a Single Amino Acid Substitution in <i>Bacillus badius</i> and <i>Bacillus sphaericus</i> Phenylalanine Dehydrogenases. Bioscience, Biotechnology and Biochemistry, 2009, 73, 729-732. | 1.3 | 7 |
| 204 | In Silico Identification for Î \pm -Amino-Î μ -Caprolactam Racemases by Using Information on the Structure and Function Relationship. Applied Biochemistry and Biotechnology, 2015, 176, 1303-1314. | 2.9 | 7 |
| 205 | New enzymatic methods for selective assay of l-lysine using an l-lysine specific decarboxylase/oxidase from Burkholderia sp. AlU 395. Journal of Bioscience and Bioengineering, 2015, 119, 369-374. | 2.2 | 7 |
| 206 | Prunasin production using engineered <i>Escherichia coli</i> expressing <i>UGT85A47</i> from Japanese apricot and UDP-glucose biosynthetic enzyme genes. Bioscience, Biotechnology and Biochemistry, 2018, 82, 2021-2029. | 1.3 | 7 |
| 207 | Characterization of a novel hydroxynitrile lyase from <i>Nandina domestica</i> Thunb. Bioscience, Biotechnology and Biochemistry, 2018, 82, 1760-1769. | 1.3 | 7 |
| 208 | Isolation of microorganisms which utilize acidic d-amino acid oligomers. Journal of Molecular Catalysis B: Enzymatic, 2001, 12, 53-59. | 1.8 | 6 |
| 209 | Complete Genome Sequence of an Aldoxime Degrader, Bacillus sp. OxB-1. Genome Announcements, 2015, 3, . | 0.8 | 6 |
| 210 | Enhancement of stability of l-tryptophan dehydrogenase from Nostoc punctiforme ATCC29133 and its application to l-tryptophan assay. Journal of Biotechnology, 2015, 196-197, 27-32. | 3.8 | 6 |
| 211 | Generation of (2-Nitroethyl)benzene and related benzenoids from L-Phenylalanine; flower scents of the Japanese Loquat <i>Eriobotrya japonica</i> [Rosales: Rosaceae]. Bioscience, Biotechnology and Biochemistry, 2018, 82, 1855-1866. | 1.3 | 6 |
| 212 | Production of (S)-(+)-citramalic acid from itaconic acid by resting cells of Alcaligenes denitrificans strain MCI2775. Applied Microbiology and Biotechnology, 1993, 40, 466. | 3.6 | 5 |
| 213 | Useof Borate To Control the 5′-Position-Selective MicrobialGlucosylation ofPyridoxine. Applied and Environmental Microbiology, 2003, 69, 7058-7062. | 3.1 | 5 |
| 214 | Molecular analysis of NAD+-dependent xylitol dehydrogenase from the zygomycetous fungus Rhizomucor pusillus and reversal of the coenzyme preference. Bioscience, Biotechnology and Biochemistry, 2014, 78, 1943-1953. | 1.3 | 5 |
| 215 | Heterologous production of $\langle scp \rangle \langle scp \rangle$ -lysine $\hat{l}\mu$ -oxidase by directed evolution using a fusion reporter method. Bioscience, Biotechnology and Biochemistry, 2015, 79, 1473-1480. | 1.3 | 5 |
| 216 | Draft Genome Sequence of an Aldoxime Degrader, <i>Rhodococcus</i> sp. Strain YH3-3. Genome Announcements, 2016, 4, . | 0.8 | 5 |

| # | Article | IF | Citations |
|-----|--|-----|-----------|
| 217 | Purification and Characterization of an Enone Reductase from <i>Sporidiobolus salmonicolor </i> TPU 2001 Reacting with Large Monocyclic Enones. ChemCatChem, 2017, 9, 3697-3704. | 3.7 | 5 |
| 218 | Creation of thermostable l-tryptophan dehydrogenase by protein engineering and its application for l-tryptophan quantification. Analytical Biochemistry, 2019, 579, 57-63. | 2.4 | 5 |
| 219 | Porcine kidney d-amino acid oxidase-derived R-amine oxidases with new substrate specificities. The Enzymes, 2020, 47, 117-136. | 1.7 | 5 |
| 220 | Computational study on the polymerization reaction of <scp>d </scp> -aminopeptidase for the synthesis of <scp>d </scp> -peptides. RSC Advances, 2020, 10, 17582-17592. | 3.6 | 5 |
| 221 | Protein engineering of the aldoxime dehydratase from Bacillus sp. OxB-1 based on a rational sequence alignment approach. Scientific Reports, 2021, 11, 14316. | 3.3 | 5 |
| 222 | A Cyanideâ€free Biocatalytic Process for Synthesis of Complementary Enantiomers of 4â€Chloroâ€3â€hydroxybutanenitrile From Allyl Chloride. ChemCatChem, 2021, 13, 4237-4242. | 3.7 | 5 |
| 223 | Z-phenylacetaldoxime degradation by a novel aldoxime dehydratase from Bacillus sp. strain OxB-1. FEMS Microbiology Letters, 1998, 158, 185-190. | 1.8 | 5 |
| 224 | Purification and characterization of a 22-kDa protein in chloroplasts from green spores of the fern Osmunda japonica. Physiologia Plantarum, 1995, 95, 465-471. | 5.2 | 4 |
| 225 | A Japanese screening approach: Selection of an opine dehydrogenase and alkaline D-Peptidase. Studies in Organic Chemistry, 1998, 53, 19-28. | 0.2 | 4 |
| 226 | Deduced catalytic mechanism of <scp>D < /scp>-amino acid amidase from <i>Ochrobactrum anthropi < /i>SV3. Journal of Synchrotron Radiation, 2008, 15, 250-253.</i></scp> | 2.4 | 4 |
| 227 | Efficient preparation of both enantiomers of 3,3,3-trifluoro-2-hydroxy-2-methylpropanoic acid catalyzed by Shinella sp. R-6 and Arthrobacter sp. S-2. Journal of Molecular Catalysis B: Enzymatic, 2014, 102, 115-119. | 1.8 | 4 |
| 228 | A novel S-enantioselective amidase acting on 3,3,3-trifluoro-2-hydroxy-2-methylpropanamide from Arthrobacter sp. S-2. Bioscience, Biotechnology and Biochemistry, 2015, 79, 1587-1596. | 1.3 | 4 |
| 229 | Development of a rapid and simple glycine analysis method using a stable glycine oxidase mutant. Analytical Biochemistry, 2019, 587, 113447. | 2.4 | 4 |
| 230 | Fungal Degradation of Triacrylonitrile. Agricultural and Biological Chemistry, 1981, 45, 57-62. | 0.3 | 3 |
| 231 | Improvement in 5′-Position-selective Glucosylation of Pyridoxine byVerticillium dahliaeTPU 4900. Bioscience, Biotechnology and Biochemistry, 2003, 67, 508-516. | 1.3 | 3 |
| 232 | Comparative review of the recent enzymatic methods used for selective assay of l-lysine. Analytical Biochemistry, 2019, 584, 113335. | 2.4 | 3 |
| 233 | Development of New Microbial Enzymes and Their Application to Organic Synthesis Yuki Gosei Kagaku Kyokaishi/Journal of Synthetic Organic Chemistry, 1999, 57, 1064-1072. | 0.1 | 3 |
| 234 | Structural characterization of Linum usitatissimum hydroxynitrile lyase: A new cyanohydrin decomposition mechanism involving a cyano-zinc complex. Journal of Biological Chemistry, 2022, 298, 101650. | 3.4 | 3 |

| # | Article | IF | CITATIONS |
|-----|--|--------------------|--------------|
| 235 | Crystallization of Arthrobacter sp. strain 1C N-(1-D-carboxyethyl)-L-norvaline dehydrogenase and its complex with NAD+. Acta Crystallographica Section D: Biological Crystallography, 1998, 54, 124-126. | 2.5 | 2 |
| 236 | Preparation of d- \hat{l} ±-aminolactams by l-enantioselective degradation of \hat{l} ±-aminolactam mediated by Mesorhizobium sp. L88. Biocatalysis and Agricultural Biotechnology, 2014, 3, 42-47. | 3.1 | 2 |
| 237 | Tools for Enzyme Discovery. , 0, , 441-452. | | 2 |
| 238 | Engineering an ATP-dependent d-Ala:d-Ala ligase for synthesizing amino acid amides from amino acids. Journal of Industrial Microbiology and Biotechnology, 2017, 44, 667-675. | 3.0 | 2 |
| 239 | Characterization of an α-amino-É>-caprolactam racemase with broad substrate specificity from Citreicella sp. SE45. Journal of Industrial Microbiology and Biotechnology, 2017, 44, 677-685. | 3.0 | 2 |
| 240 | Identification of saturated and unsaturated 1-methoxyalkanes from the Thai millipede Orthomorpha communis as potential "Raincoat Compounds†Scientific Reports, 2018, 8, 11730. | 3. 3 | 2 |
| 241 | Stabilization of Hydroxynitrile Lyases from Two Variants of Passion Fruit, <i>Passiflora edulis</i> Sims and <i>Passiflora edulis</i> Forma <i>flavicarpa</i> , by Câ€Terminal Truncation. ChemBioChem, 2020, 21, 181-189. | 2.6 | 2 |
| 242 | Identification of l-histidine oxidase activity in Achromobacter sp. TPU 5009 for l-histidine determination. Journal of Bioscience and Bioengineering, 2021, 131, 469-474. | 2.2 | 2 |
| 243 | Partial Consensus Design and Enhancement of Protein Function by Secondary-Structure-Guided Consensus Mutations. Biochemistry, 2021, 60, 2309-2319. | 2.5 | 2 |
| 244 | Enzymes Acting on d-Amino Acid Containing Peptides. Methods in Molecular Biology, 2012, 794, 397-406. | 0.9 | 2 |
| 245 | Thermostability enhancement of l-glutamate oxidase from Streptomyces sp. NT1 by full consensus protein design. Journal of Bioscience and Bioengineering, 2022, 133, 309-315. | 2.2 | 2 |
| 246 | Construction of the UDP-Glucose Biosynthetic Enzyme Gene Coexpression Plasmid for Prunasin Production in Escherichia coli. Methods in Molecular Biology, 2022, 2469, 19-28. | 0.9 | 2 |
| 247 | Novel Enzymatic Method for Imine Synthesis via the Oxidation of Primary Amines Using D-Amino Acid Oxidase from Porcine Kidney. Catalysts, 2022, 12, 511. | 3. 5 | 2 |
| 248 | Enzymes in aldoxime-nitrile pathway: versatile tools in biocatalysis., 2007,, 129-139. | | 1 |
| 249 | Screening, purification, and identification of the enzyme producing N-(l-α-l-aspartyl)-l-phenylalanine methyl ester from l-isoasparagine and l-phenylalanine methyl ester. Journal of Bioscience and Bioengineering, 2009, 108, 190-193. | 2.2 | 1 |
| 250 | Characterization and gene cloning of l-xylulose reductase involved in l-arabinose catabolism from the pentose-fermenting fungus Rhizomucor pusillus. Bioscience, Biotechnology and Biochemistry, 2017, 81, 1612-1618. | 1.3 | 1 |
| 251 | 1-Phenyl-2-pentanone and methyl salicylate: new defense allomone components and their content shift during ontogenetic development of the millipede Nedyopus tambanus mangaesinus (Polydesmida:) Tj ETQq1 1 | 0.7 8.4 314 | rgBT /Overlo |
| 252 | Genome Sequence of Microbacterium sp. Strain TPU 3598, a Lumichrome Producer. Genome Announcements, 2017, 5, . | 0.8 | 1 |

| # | Article | IF | Citations |
|-----|---|-----------------|-----------------|
| 253 | Translation-dependent bioassay for amino acid quantification using auxotrophic microbes as biocatalysts of protein synthesis. Applied Microbiology and Biotechnology, 2017, 101, 2523-2531. | 3.6 | 1 |
| 254 | Enzymes in the Aldoxime–Nitrile Pathway. , 2017, , 173-187. | | 1 |
| 255 | Biosynthesis of (2-nitroethyl)benzene and (<l>Z</l>)- and (<l>E</l>)-(2-nitroethenyl)benzenes from (<l>Z</l>)- and (<l>E</l>)-phenylacetaldoximes and phenylacetonitrile; defense allomone of <l>Eutrichodesmus elegans</l> and <l>Eutrichodesmus armatus</l> (Polydesmida:) Tj ETQq1 | 1.4 1 0.7843 | 1 14 rgBT /0 |
| 256 | A new enzyme D-aminopeptidase. Structure, function, and application to organic synthesis Yuki Gosei Kagaku Kyokaishi/Journal of Synthetic Organic Chemistry, 1991, 49, 314-326. | 0.1 | 1 |
| 257 | Occurrence of a Novel Lyase Catalyzing \hat{l}^2 -Elimination Reaction toward threo-3-Chloro-L-aspartate in Pseudomonas putida TPU 7151. Bioscience, Biotechnology and Biochemistry, 2001, 65, 435-437. | 1.3 | O |
| 258 | Lipase-Mediated Desymmetrization of Glycerol with Aromatic and Aliphatic Anhydrides ChemInform, 2005, 36, no. | 0.0 | 0 |
| 259 | A New (R)-Hydroxynitrile Lyase from Prunus mume: Asymmetric Synthesis of Cyanohydrins ChemInform, 2006, 37, no. | 0.0 | O |
| 260 | Effects of the Treatments with the Peptides Extracted from Human Hairs on the Physical Properties of Bleached Human Hairs. Journal of Fiber Science and Technology, 2012, 68, 14-17. | 0.0 | 0 |
| 261 | d-Stereospecific Aminopeptidase., 2013,, 3463-3467. | | O |
| 262 | Isolation and characterization of racemase from Ensifer sp. 23-3 that acts on \hat{l}_{\pm} -aminolactams and \hat{l}_{\pm} -amino acid amides. Journal of Industrial Microbiology and Biotechnology, 2017, 44, 1503-1510. | 3.0 | 0 |
| 263 | Characterization of two carbonyl reductases from Ogataea polymorpha NBRC 0799. Applied Microbiology and Biotechnology, 2018, 102, 1307-1316. | 3.6 | O |
| 264 | Editorial for the special issue on enzyme assay of amino acids. Analytical Biochemistry, 2019, 587, 113464. | 2.4 | 0 |
| 265 | Rationalizing the Unprecedented Stereochemistry of an Enzymatic Nitrile Synthesis through a Combined Computational and Experimental Approach. Angewandte Chemie, 2021, 133, 19311-19317. | 2.0 | O |
| 266 | Combination of Enzymatic Oxidation of Amino Acid and Native Chemical Ligation with Hydroxylamine for Amide Formation toward a One-pot Process. Chemistry Letters, 2021, 50, 1632-1634. | 1.3 | O |
| 267 | Organic Synthesis Catalyzed by Plant Enzyme Hydroxynitrile Lyase. Yuki Gosei Kagaku Kyokaishi/Journal of Synthetic Organic Chemistry, 2012, 70, 102-112. | 0.1 | O |
| 268 | Alkaline d-Peptidase., 2013,, 3467-3469. | | O |
| 269 | How to design artificial protein surpassing native enzyme function ~ Design and multidisciplinary analysis of artificial Lâ€threonine 3â€dehydrogenase ~. FASEB Journal, 2018, 32, 798.4. | 0.5 | O |
| 270 | Discovery of novel monomeric Lâ€threonine 3â€dehydrogenase and elucidation of product release mechanism. FASEB Journal, 2018, 32, 796.14. | 0.5 | O |