

Hyung Joon Cha

List of Publications by Year in Descending Order

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The third column is the impact factor (IF) of the journal, and the fourth column is the number of citations of the article.

236
papers

6,013
citations

42
h-index

64
g-index

244
ext. papers

6,804
ext. citations

6.9
avg, IF

6.02
L-index

#	Paper	IF	Citations
236	Sutureless neuroorrhaphy system using a macrophage-polarizing in situ visible light-crosslinkable adhesive protein hydrogel for functional nerve regeneration. <i>Chemical Engineering Journal</i> , 2022 , 445, 136641	14.7	1
235	Sutureless full-thickness skin grafting using a dual drug-in-bioadhesive coacervate. <i>Chemical Engineering Journal</i> , 2022 , 446, 137272	14.7	1
234	Tunicate-Inspired Photoactivatable Proteinic Nanobombs for Tumor-Adhesive Multimodal Therapy. <i>Advanced Healthcare Materials</i> , 2021 , 10, e2101212	10.1	0
233	Glycan chip based on structure-switchable DNA linker for on-chip biosynthesis of cancer-associated complex glycans. <i>Nature Communications</i> , 2021 , 12, 1395	17.4	1
232	Preclinical evaluation of a regenerative immiscible biogluue for vesico-vaginal fistula. <i>Acta Biomaterialia</i> , 2021 , 125, 183-196	10.8	2
231	Hydrogel Microfibers: Embolization of Vascular Malformations via In Situ Photocrosslinking of Mechanically Reinforced Alginate Microfibers using an Optical-Fiber-Integrated Microfluidic Device (Adv. Mater. 14/2021). <i>Advanced Materials</i> , 2021 , 33, 2170111	24	0
230	Two Faces of Amine-Catechol Pair Synergy in Underwater Cation-Interactions. <i>Chemistry of Materials</i> , 2021 , 33, 3196-3206	9.6	7
229	Adhesive protein-based angiogenesis-mimicking spatiotemporal sequential release of angiogenic factors for functional regenerative medicine. <i>Biomaterials</i> , 2021 , 272, 120774	15.6	7
228	Sutureless Transplantation of Amniotic Membrane Using a Visible Light-Curable Protein Bioadhesive for Ocular Surface Reconstruction. <i>Advanced Healthcare Materials</i> , 2021 , 10, e2100100	10.1	4
227	A sensitive paper-based lateral flow immunoassay platform using engineered cellulose-binding protein linker fused with antibody-binding domains. <i>Sensors and Actuators B: Chemical</i> , 2021 , 329, 129099	8.5	7
226	Embolization of Vascular Malformations via In Situ Photocrosslinking of Mechanically Reinforced Alginate Microfibers using an Optical-Fiber-Integrated Microfluidic Device. <i>Advanced Materials</i> , 2021 , 33, e2006759	24	10
225	Bone Graft Biomineral Complex Coderived from Marine Biocalcification and Biosilicification.. <i>ACS Applied Bio Materials</i> , 2021 , 4, 6046-6055	4.1	0
224	Diverse silk and silk-like proteins derived from terrestrial and marine organisms and their applications. <i>Acta Biomaterialia</i> , 2021 , 136, 56-71	10.8	2
223	Oriented in situ immobilization of a functional tyrosinase on microcrystalline cellulose effectively incorporates DOPA residues in bioengineered mussel adhesive protein. <i>Biotechnology Journal</i> , 2021 , 16, e2100216	5.6	0
222	Double-layered adhesive microneedle bandage based on biofunctionalized mussel protein for cardiac tissue regeneration. <i>Biomaterials</i> , 2021 , 278, 121171	15.6	6
221	Stability-Controllable Self-Immobilization of Carbonic Anhydrase Fused with a Silica-Binding Tag onto Diatom Biosilica for Enzymatic CO Capture and Utilization. <i>ACS Applied Materials & Interfaces</i> , 2020 , 12, 27055-27063	9.5	8
220	Reusability Comparison of Melt-Blown vs Nanofiber Face Mask Filters for Use in the Coronavirus Pandemic. <i>ACS Applied Nano Materials</i> , 2020 , 3, 7231-7241	5.6	103

219	Enhanced production of Dopa-incorporated mussel adhesive protein using engineered translational machineries. <i>Biotechnology and Bioengineering</i> , 2020 , 117, 1961-1969	4.9	3
218	Stem cell-loaded adhesive immiscible liquid for regeneration of myocardial infarction. <i>Journal of Controlled Release</i> , 2020 , 321, 602-615	11.7	14
217	Fast and Facile Biodegradation of Polystyrene by the Gut Microbial Flora of Larvae. <i>Applied and Environmental Microbiology</i> , 2020 , 86,	4.8	26
216	Immobilization of genetically engineered whole-cell biocatalysts with periplasmic carbonic anhydrase in polyurethane foam for enzymatic CO ₂ capture and utilization. <i>Journal of CO₂ Utilization</i> , 2020 , 39, 101172	7.6	8
215	Engineering the genetic components of a whole-cell catalyst for improved enzymatic CO capture and utilization. <i>Biotechnology and Bioengineering</i> , 2020 , 117, 39-48	4.9	13
214	Sticky bone-specific artificial extracellular matrix for stem cell-mediated rapid craniofacial bone therapy. <i>Applied Materials Today</i> , 2020 , 18, 100531	6.6	3
213	The position of lysine controls the catechol-mediated surface adhesion and cohesion in underwater mussel adhesion. <i>Journal of Colloid and Interface Science</i> , 2020 , 563, 168-176	9.3	24
212	Body temperature-activated protein-based injectable adhesive hydrogel incorporated with decellularized adipose extracellular matrix for tissue-specific regenerative stem cell therapy. <i>Acta Biomaterialia</i> , 2020 , 114, 244-255	10.8	16
211	Electrohydrodynamic Sprayable Amphiphilic Polysaccharide-Clasped Nanoscale Self-Assembly for Imaging. <i>ACS Applied Materials & Interfaces</i> , 2020 , 12, 38899-38905	9.5	3
210	Harnessing the bioresponsive adhesion of immuno-bioglue for enhanced local immune checkpoint blockade therapy. <i>Biomaterials</i> , 2020 , 263, 120380	15.6	5
209	Multifunctional nanocomposite clusters enabled by amphiphilic/bioactive natural polysaccharides. <i>Chemical Engineering Journal</i> , 2020 , 379, 122406	14.7	6
208	Bio-inspired swellable hydrogel-forming double-layered adhesive microneedle protein patch for regenerative internal/external surgical closure. <i>Biomaterials</i> , 2019 , 222, 119439	15.6	52
207	Mussel-inspired enzyme immobilization and dual real-time compensation algorithms for durable and accurate continuous glucose monitoring. <i>Biosensors and Bioelectronics</i> , 2019 , 143, 111622	11.8	14
206	Polysaccharide-Hydrophobic Nanoparticle Hybrid Nanoclusters for Enhanced Performance in Magnetic Resonance/Photoacoustic Imaging. <i>Biomacromolecules</i> , 2019 , 20, 4150-4157	6.9	2
205	Novel In Silico Analyses of Repetitive Spider Silk Sequences to Understand the Evolution and Mechanical Properties of Fibrous Protein Materials. <i>Biotechnology Journal</i> , 2019 , 14, e1900138	5.6	3
204	Improved magnetic relaxivity via hierarchical surface structure of dysprosium-engineered superparamagnetic iron oxide nanoparticles in ultra-high magnetic field. <i>Journal of Industrial and Engineering Chemistry</i> , 2019 , 77, 408-415	6.3	5
203	Marine-derived natural polymer-based bioprinting ink for biocompatible, durable, and controllable 3D constructs. <i>Biofabrication</i> , 2019 , 11, 035001	10.5	19
202	Multi-dimensional bioinspired tactics using an engineered mussel protein glue-based nanofiber conduit for accelerated functional nerve regeneration. <i>Acta Biomaterialia</i> , 2019 , 90, 87-99	10.8	20

201	Newly Identified HNP-F from Human Neutrophil Peptide-1 Promotes Hemostasis. <i>Biotechnology Journal</i> , 2019 , 14, e1800606	5.6	2
200	Combinational Biomimicking of Lotus Leaf, Mussel, and Sandcastle Worm for Robust Superhydrophobic Surfaces with Biomedical Multifunctionality: Antithrombotic, Antibiofouling, and Tissue Closure Capabilities. <i>ACS Applied Materials & Interfaces</i> , 2019 , 11, 9777-9785	9.5	34
199	Coexpression of CMP-sialic acid transporter reduces N-glycolylneuraminic acid levels of recombinant glycoproteins in Chinese hamster ovary cells. <i>Biotechnology and Bioengineering</i> , 2019 , 116, 2815-2822	4.9	3
198	Recent advances in the development of nature-derived photocrosslinkable biomaterials for 3D printing in tissue engineering. <i>Biomaterials Research</i> , 2019 , 23, 18	16.8	17
197	Prolonged cell persistence with enhanced multipotency and rapid angiogenesis of hypoxia pre-conditioned stem cells encapsulated in marine-inspired adhesive and immiscible liquid micro-droplets. <i>Acta Biomaterialia</i> , 2019 , 86, 257-268	10.8	13
196	On-chip biosynthesis of GM1 pentasaccharide-related complex glycans. <i>Chemical Communications</i> , 2018 , 55, 71-74	5.8	4
195	Biomimetic Surface Engineering of Biomaterials by Using Recombinant Mussel Adhesive Proteins. <i>Advanced Materials Interfaces</i> , 2018 , 5, 1800068	4.6	21
194	Mussel-Mimetic Biomaterials for Tissue Engineering Applications 2018 , 655-677		
193	Antibacterial efficacy of poly(vinyl alcohol) composite nanofibers embedded with silver-anchored silica nanoparticles. <i>Journal of Biomedical Materials Research - Part B Applied Biomaterials</i> , 2018 , 106, 1121-1128	3.5	27
192	Sprayable Adhesive Nanotherapeutics: Mussel-Protein-Based Nanoparticles for Highly Efficient Locoregional Cancer Therapy. <i>ACS Nano</i> , 2018 , 12, 8909-8919	16.7	26
191	Sucrose-calcium Complexation for the Durable Biomass Pellet. <i>Biotechnology and Bioprocess Engineering</i> , 2018 , 23, 341-348	3.1	3
190	Bioinspired Load-Bearing Hydrogel Based on Engineered Sea Anemone Skin-Derived Collagen-Like Protein. <i>Biotechnology Journal</i> , 2018 , 13, e1800086	5.6	5
189	Electrospun antibacterial polyacrylonitrile nanofiber membranes functionalized with silver nanoparticles by a facile wetting method. <i>European Polymer Journal</i> , 2018 , 108, 69-75	5.2	40
188	Halotolerant carbonic anhydrase with unusual N-terminal extension from marine <i>Hydrogenovibrio marinus</i> as novel biocatalyst for carbon sequestration under high-salt environments. <i>Journal of CO2 Utilization</i> , 2018 , 26, 415-424	7.6	19
187	Self-assembled adhesive biomaterials formed by a genetically designed fusion protein. <i>Chemical Communications</i> , 2018 , 54, 12642-12645	5.8	9
186	Coacervation of Interfacial Adhesive Proteins for Initial Mussel Adhesion to a Wet Surface. <i>Small</i> , 2018 , 14, e1803377	11	30
185	3D cellulose nanofiber scaffold with homogeneous cell population and long-term proliferation. <i>Cellulose</i> , 2018 , 25, 7299-7314	5.5	12
184	CaCO ₃ thin-film formation mediated by a synthetic protein-lysozyme coacervate. <i>RSC Advances</i> , 2017 , 7, 15302-15308	3.7	0

183	Natural healing-inspired collagen-targeting surgical protein glue for accelerated scarless skin regeneration. <i>Biomaterials</i> , 2017 , 134, 154-165	15.6	47
182	Diatom-Inspired Silica Nanostructure Coatings with Controllable Microroughness Using an Engineered Mussel Protein Glue to Accelerate Bone Growth on Titanium-Based Implants. <i>Advanced Materials</i> , 2017 , 29, 1704906	24	50
181	Complex coacervates based on recombinant mussel adhesive proteins: their characterization and applications. <i>Soft Matter</i> , 2017 , 13, 7704-7716	3.6	38
180	Upconversion Nanoparticles/Hyaluronate-Rose Bengal Conjugate Complex for Noninvasive Photochemical Tissue Bonding. <i>ACS Nano</i> , 2017 , 11, 9979-9988	16.7	61
179	Optimization of DNA microarray biosensors enables rapid and sensitive detection. <i>Biotechnology and Bioprocess Engineering</i> , 2017 , 22, 469-473	3.1	11
178	Control of nacre biomineralization by Pif80 in pearl oyster. <i>Science Advances</i> , 2017 , 3, e1700765	14.3	53
177	A tyrosinase, mTyr-CNK, that is functionally available as a monophenol monooxygenase. <i>Scientific Reports</i> , 2017 , 7, 17267	4.9	10
176	Carbon Nanodots: Dual-Color-Emitting Carbon Nanodots for Multicolor Bioimaging and Optogenetic Control of Ion Channels (Adv. Sci. 11/2017). <i>Advanced Science</i> , 2017 , 4,	13.6	78
175	A bioinspired dual-crosslinked tough silk protein hydrogel as a protective biocatalytic matrix for carbon sequestration. <i>NPG Asia Materials</i> , 2017 , 9, e391-e391	10.3	35
174	Interconnected ruthenium dioxide nanoparticles anchored on graphite oxide: Highly efficient candidate for solvent-free oxidative synthesis of imines. <i>Journal of Industrial and Engineering Chemistry</i> , 2017 , 46, 279-288	6.3	20
173	Accelerated skin wound healing using electrospun nanofibrous mats blended with mussel adhesive protein and polycaprolactone. <i>Journal of Biomedical Materials Research - Part A</i> , 2017 , 105, 218-225	5.4	41
172	Survival of Verwey transition in gadolinium-doped ultrasmall magnetite nanoparticles. <i>Nanoscale</i> , 2017 , 9, 13976-13982	7.7	6
171	Dual-Color-Emitting Carbon Nanodots for Multicolor Bioimaging and Optogenetic Control of Ion Channels. <i>Advanced Science</i> , 2017 , 4, 1700325	13.6	24
170	Switch of Surface Adhesion to Cohesion by Dopa-Fe ³⁺ Complexation, in Response to Microenvironment at the Mussel Plaque/Substrate Interface. <i>Chemistry of Materials</i> , 2016 , 28, 7982-7989. ⁶	9.6	57
169	Versatile signal peptide of Flavobacterium-originated organophosphorus hydrolase for efficient periplasmic translocation of heterologous proteins in Escherichia coli. <i>Biotechnology Progress</i> , 2016 , 32, 848-54	2.8	3
168	Recombinant production of a shell matrix protein in Escherichia coli and its application to the biomimetic synthesis of spherulitic calcite crystals. <i>Biotechnology Letters</i> , 2016 , 38, 809-16	3	6
167	Recent developments and applications of bioinspired silicification. <i>Korean Journal of Chemical Engineering</i> , 2016 , 33, 1125-1133	2.8	15
166	Hybrid microarray based on double biomolecular markers of DNA and carbohydrate for simultaneous genotypic and phenotypic detection of cholera toxin-producing Vibrio cholerae. <i>Biosensors and Bioelectronics</i> , 2016 , 79, 398-405	11.8	6

165	Evaluating Baculovirus Infection Using Green Fluorescent Protein and Variants. <i>Methods in Molecular Biology</i> , 2016 , 1350, 447-59	1.4	
164	Removal of Cadmium Ions Using Robina pseudoacacie Bark. <i>Applied Chemistry for Engineering</i> , 2016 , 27, 330-334		
163	Engineering de novo disulfide bond in bacterial type carbonic anhydrase for thermostable carbon sequestration. <i>Scientific Reports</i> , 2016 , 6, 29322	4.9	34
162	Sandcastle Worm-Inspired Blood-Resistant Bone Graft Binder Using a Sticky Mussel Protein for Augmented In Vivo Bone Regeneration. <i>Advanced Healthcare Materials</i> , 2016 , 5, 3191-3202	10.1	26
161	Mussel adhesive protein as an environmentally-friendly harmless wood furniture adhesive. <i>International Journal of Adhesion and Adhesives</i> , 2016 , 70, 260-264	3.4	17
160	Multiplex 16S rRNA-derived geno-biochip for detection of 16 bacterial pathogens from contaminated foods. <i>Biotechnology Journal</i> , 2016 , 11, 1405-1414	5.6	2
159	Role of Pif97 in Nacre Biomineralization: In Vitro Characterization of Recombinant Pif97 as a Framework Protein for the Association of Organic/Inorganic Layers in Nacre. <i>Crystal Growth and Design</i> , 2015 , 15, 3666-3673	3.5	31
158	Rapidly light-activated surgical protein glue inspired by mussel adhesion and insect structural crosslinking. <i>Biomaterials</i> , 2015 , 67, 11-9	15.6	115
157	Mussel-Inspired Protein Nanoparticles Containing Iron(III)-DOPA Complexes for pH-Responsive Drug Delivery. <i>Angewandte Chemie - International Edition</i> , 2015 , 54, 7318-22	16.4	52
156	Mussel adhesion-employed water-immiscible fluid bioadhesive for urinary fistula sealing. <i>Biomaterials</i> , 2015 , 72, 104-11	15.6	61
155	Bioengineered mussel glue incorporated with a cell recognition motif as an osteostimulating bone adhesive for titanium implants. <i>Journal of Materials Chemistry B</i> , 2015 , 3, 8102-8114	7.3	22
154	Engineered mussel biogel as a functional osteoinductive binder for grafting of bone substitute particles to accelerate in vivo bone regeneration. <i>Journal of Materials Chemistry B</i> , 2015 , 3, 546-555	7.3	13
153	Mussel-inspired adhesive protein-based electrospun nanofibers reinforced by Fe(III)-DOPA complexation. <i>Journal of Materials Chemistry B</i> , 2015 , 3, 112-118	7.3	46
152	Innenmarkt: Mussel-Inspired Protein Nanoparticles Containing Iron(III)-DOPA Complexes for pH-Responsive Drug Delivery (Angew. Chem. 25/2015). <i>Angewandte Chemie</i> , 2015 , 127, 7559-7559	3.6	
151	Activation of formate hydrogen-lyase via expression of uptake [NiFe]-hydrogenase in Escherichia coli BL21(DE3). <i>Microbial Cell Factories</i> , 2015 , 14, 151	6.4	10
150	Biomimetic repeat protein derived from Xenopus tropicalis for fibrous scaffold fabrication. <i>Biopolymers</i> , 2015 , 103, 659-64	2.2	
149	Mussel-Inspired Protein Nanoparticles Containing Iron(III)-DOPA Complexes for pH-Responsive Drug Delivery. <i>Angewandte Chemie</i> , 2015 , 127, 7426-7430	3.6	14
148	Optical detection of paraoxon using single-walled carbon nanotube films with attached organophosphorus hydrolase-expressed Escherichia coli. <i>Sensors</i> , 2015 , 15, 12513-25	3.8	12

147	A rapid, efficient, and facile solution for dental hypersensitivity: The tannin-iron complex. <i>Scientific Reports</i> , 2015 , 5, 10884	4.9	33
146	Recombinant mussel coating protein fused with cell adhesion recognition motif enhanced cell proliferation. <i>Biotechnology and Bioprocess Engineering</i> , 2015 , 20, 211-217	3.1	3
145	Mechanically Durable and Biologically Favorable Protein Hydrogel Based on Elastic Silklike Protein Derived from Sea Anemone. <i>Biomacromolecules</i> , 2015 , 16, 3819-26	6.9	10
144	Functional characterization of Vibrio cholerae O1 WbeW enzyme responsible for initial reaction in O antigen biosynthesis. <i>Biotechnology and Bioprocess Engineering</i> , 2015 , 20, 980-987	3.1	1
143	A nano-scale probing system with a gold nano-dot array for measurement of a single biomolecular interaction force. <i>RSC Advances</i> , 2015 , 5, 105727-105730	3.7	1
142	In vivo endothelization of tubular vascular grafts through in situ recruitment of endothelial and endothelial progenitor cells by RGD-fused mussel adhesive proteins. <i>Biofabrication</i> , 2015 , 7, 015007	10.5	32
141	Engineering N-Glycosylation Pathway in Insect Cells: Suppression of N-Acetylglucosaminidase and Expression of β 1,4-Galactosyltransferase. <i>Methods in Molecular Biology</i> , 2015 , 1321, 179-91	1.4	3
140	Interfacial tension of complex coacervated mussel adhesive protein according to the Hofmeister series. <i>Langmuir</i> , 2014 , 30, 1108-15	4	38
139	Site-specific immobilization of microbes using carbon nanotubes and dielectrophoretic force for microfluidic applications. <i>RSC Advances</i> , 2014 , 4, 1347-1351	3.7	5
138	Bacterial extremophilic carbonic anhydrases from deep-sea hydrothermal vents as potential biocatalysts for CO ₂ sequestration. <i>Journal of Molecular Catalysis B: Enzymatic</i> , 2014 , 109, 31-39		28
137	Surface-independent antibacterial coating using silver nanoparticle-generating engineered mussel glue. <i>ACS Applied Materials & Interfaces</i> , 2014 , 6, 20242-53	9.5	77
136	Multifunctional adhesive silk fibroin with blending of RGD-bioconjugated mussel adhesive protein. <i>Biomacromolecules</i> , 2014 , 15, 1390-8	6.9	28
135	Draft genome sequence of Hydrogenovibrio marinus MH-110, a model organism for aerobic H ₂ metabolism. <i>Journal of Biotechnology</i> , 2014 , 185, 37-8	3.7	8
134	Highly purified mussel adhesive protein to secure biosafety for in vivo applications. <i>Microbial Cell Factories</i> , 2014 , 13, 52	6.4	33
133	Mussel-mimetic protein-based adhesive hydrogel. <i>Biomacromolecules</i> , 2014 , 15, 1579-85	6.9	211
132	Oxygen-dependent enhancement of hydrogen production by engineering bacterial hemoglobin in Escherichia coli. <i>International Journal of Hydrogen Energy</i> , 2014 , 39, 10426-10433	6.7	1
131	In Vivo Residue-Specific Dopa-Incorporated Engineered Mussel Bioglue with Enhanced Adhesion and Water Resistance. <i>Angewandte Chemie</i> , 2014 , 126, 13578-13582	3.6	22
130	In vivo residue-specific dopa-incorporated engineered mussel bioglue with enhanced adhesion and water resistance. <i>Angewandte Chemie - International Edition</i> , 2014 , 53, 13360-4	16.4	66

129	Bioinspired Silica Nanocomposite with Autoencapsulated Carbonic Anhydrase as a Robust Biocatalyst for CO ₂ Sequestration. <i>ACS Catalysis</i> , 2014 , 4, 4332-4340	13.1	69
128	Aquatic proteins with repetitive motifs provide insights to bioengineering of novel biomaterials. <i>Biotechnology Journal</i> , 2014 , 9, 1493-502	5.6	13
127	Specific discrimination of three pathogenic <i>Salmonella enterica</i> subsp. <i>enterica</i> serotypes by carB-based oligonucleotide microarray. <i>Applied and Environmental Microbiology</i> , 2014 , 80, 366-73	4.8	9
126	Engineered whole-cell biocatalyst-based detoxification and detection of neurotoxic organophosphate compounds. <i>Biotechnology Advances</i> , 2014 , 32, 652-62	17.8	19
125	Biological removal of phosphate at low concentrations using recombinant <i>Escherichia coli</i> expressing phosphate-binding protein in periplasmic space. <i>Applied Biochemistry and Biotechnology</i> , 2013 , 171, 1170-7	3.2	7
124	Structural evaluation of GM1-related carbohydrate-cholera toxin interactions through surface plasmon resonance kinetic analysis. <i>Analyst, The</i> , 2013 , 138, 6924-9	5	15
123	Engineered <i>Escherichia coli</i> with periplasmic carbonic anhydrase as a biocatalyst for CO ₂ sequestration. <i>Applied and Environmental Microbiology</i> , 2013 , 79, 6697-705	4.8	58
122	Mussel adhesive protein-based whole cell array biosensor for detection of organophosphorus compounds. <i>Biosensors and Bioelectronics</i> , 2013 , 41, 199-204	11.8	39
121	Expression and N-glycan analysis of human 90K glycoprotein in <i>Drosophila</i> S2 cells. <i>Enzyme and Microbial Technology</i> , 2013 , 53, 170-3	3.8	5
120	Enhanced endothelialization for developing artificial vascular networks with a natural vessel mimicking the luminal surface in scaffolds. <i>Acta Biomaterialia</i> , 2013 , 9, 4716-25	10.8	35
119	A facile and sensitive method for detecting pathogenic bacteria using personal glucose meters. <i>Sensors and Actuators B: Chemical</i> , 2013 , 188, 1250-1254	8.5	35
118	Recent progress in hydrogenase and its biotechnological application for viable hydrogen technology. <i>Korean Journal of Chemical Engineering</i> , 2013 , 30, 1-10	2.8	21
117	Production of a novel silk-like protein from sea anemone and fabrication of wet-spun and electrospun marine-derived silk fibers. <i>NPG Asia Materials</i> , 2013 , 5, e50-e50	10.3	19
116	A comparative study on antibody immobilization strategies onto solid surface. <i>Korean Journal of Chemical Engineering</i> , 2013 , 30, 1934-1938	2.8	28
115	A comparative study on the bulk adhesive strength of the recombinant mussel adhesive protein fp-3. <i>Biofouling</i> , 2013 , 29, 483-90	3.3	32
114	Improved production of biohydrogen in light-powered <i>Escherichia coli</i> by co-expression of proteorhodopsin and heterologous hydrogenase. <i>Microbial Cell Factories</i> , 2012 , 11, 2	6.4	24
113	Reinforced multifunctionalized nanofibrous scaffolds using mussel adhesive proteins. <i>Angewandte Chemie - International Edition</i> , 2012 , 51, 675-8	16.4	32
112	Back Cover: Reinforced Multifunctionalized Nanofibrous Scaffolds Using Mussel Adhesive Proteins (Angew. Chem. Int. Ed. 3/2012). <i>Angewandte Chemie - International Edition</i> , 2012 , 51, 824-824	16.4	

111	A facile and sensitive detection of pathogenic bacteria using magnetic nanoparticles and optical nanocrystal probes. <i>Analyst, The</i> , 2012 , 137, 3609-12	5	80
110	Characterization of the GM1 pentasaccharide-Vibrio cholera toxin interaction using a carbohydrate-based electrochemical system. <i>Analyst, The</i> , 2012 , 137, 2860-5	5	5
109	Facile surface functionalization with glycosaminoglycans by direct coating with mussel adhesive protein. <i>Tissue Engineering - Part C: Methods</i> , 2012 , 18, 71-9	2.9	16
108	Specific multiplex analysis of pathogens using a direct 16S rRNA hybridization in microarray system. <i>Analytical Chemistry</i> , 2012 , 84, 4873-9	7.8	17
107	Functional interaction analysis of GM1-related carbohydrates and Vibrio cholerae toxins using carbohydrate microarray. <i>Analytical Chemistry</i> , 2012 , 84, 6884-90	7.8	23
106	Enhancement of bone regeneration through facile surface functionalization of solid freeform fabrication-based three-dimensional scaffolds using mussel adhesive proteins. <i>Acta Biomaterialia</i> , 2012 , 8, 2578-86	10.8	71
105	In vivo modification of tyrosine residues in recombinant mussel adhesive protein by tyrosinase co-expression in Escherichia coli. <i>Microbial Cell Factories</i> , 2012 , 11, 139	6.4	42
104	Reinforced Multifunctionalized Nanofibrous Scaffolds Using Mussel Adhesive Proteins. <i>Angewandte Chemie</i> , 2012 , 124, 699-702	3.6	4
103	R&Ktitelbild: Reinforced Multifunctionalized Nanofibrous Scaffolds Using Mussel Adhesive Proteins (Angew. Chem. 3/2012). <i>Angewandte Chemie</i> , 2012 , 124, 848-848	3.6	
102	Coexpression of molecular chaperone enhances activity and export of organophosphorus hydrolase in Escherichia coli. <i>Biotechnology Progress</i> , 2012 , 28, 925-30	2.8	14
101	Biomineralization-based conversion of carbon dioxide to calcium carbonate using recombinant carbonic anhydrase. <i>Chemosphere</i> , 2012 , 87, 1091-6	8.4	87
100	A facile and sensitive immunoassay for the detection of alpha-fetoprotein using gold-coated magnetic nanoparticle clusters and dynamic light scattering. <i>Chemical Communications</i> , 2011 , 47, 11047-50	5.8	36
99	Production of biohydrogen by heterologous expression of oxygen-tolerant Hydrogenovibrio marinus [NiFe]-hydrogenase in Escherichia coli. <i>Journal of Biotechnology</i> , 2011 , 155, 312-9	3.7	24
98	Expression of redesigned mussel silk-like protein in Escherichia coli. <i>Korean Journal of Chemical Engineering</i> , 2011 , 28, 1744-1748	2.8	6
97	A Mussel Adhesive Protein Fused with the BC Domain of Protein A is a Functional Linker Material that Efficiently Immobilizes Antibodies onto Diverse Surfaces. <i>Advanced Functional Materials</i> , 2011 , 21, 4101-4108	15.6	15
96	Functional Surfaces: A Mussel Adhesive Protein Fused with the BC Domain of Protein A is a Functional Linker Material that Efficiently Immobilizes Antibodies onto Diverse Surfaces (Adv. Funct. Mater. 21/2011). <i>Advanced Functional Materials</i> , 2011 , 21, 4100-4100	15.6	
95	Amperometric Detection of Parathion and Methyl Parathion with a Microhole-ITIES. <i>Electroanalysis</i> , 2011 , 23, 2049-2056	3	21
94	In vivo post-translational modifications of recombinant mussel adhesive protein in insect cells. <i>Biotechnology Progress</i> , 2011 , 27, 1390-6	2.8	22

93	Recombinant mussel adhesive protein fp-5 (MAP fp-5) as a bulk bioadhesive and surface coating material. <i>Biofouling</i> , 2011 , 27, 729-37	3.3	45
92	Interactive configuration through force analysis of GM1 pentasaccharide-Vibrio cholera toxin interaction. <i>Analytical Chemistry</i> , 2011 , 83, 6011-7	7.8	9
91	Bioconjugation of L-3,4-dihydroxyphenylalanine containing protein with a polysaccharide. <i>Bioconjugate Chemistry</i> , 2011 , 22, 551-5	6.3	46
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