

Publications

- **Hyeon JE**, Shin SK, Han SO. (2016) Design of Nanoscale Enzyme Complexes Based on Various Scaffolding Materials for Biomass Conversion and Immobilization. *Biotechnology Journal*. [Epub ahead of print] (IF 3.490)
- Kim SJ, Shin SK, **Hyeon JE**, Han SO. (2016) Mutation of a Conserved Tryptophan Residue in the CBM3c of a GH9 Endoglucanase Inhibits Activity. *International Journal of Biological Macromolecules*. 92:159-166 (IF 2.858)
- Kim SJ, Joo JE, Jeon SD, **Hyeon JE**, Kim SW, Um YS, Han SO. (2016) Enhanced Thermostability of Mesophilic Endoglucanase Z with a High Catalytic Activity at Active Temperatures. *International Journal of Biological Macromolecules*. 86:269-276 (IF 2.858)
- Shin SK, **Hyeon JE (Co-First Author)**, Kim SW, Park CH, Han SO. (2015) Enhanced Hydrolysis of Lignocellulosic Biomass: Bi-functional Enzyme Complexes Expressed in *Pichia pastoris* Improve Bioethanol Production from *Miscanthus sinensis*. *Biotechnology Journal*. 10:1912-1919 (IF 3.490)
- **Hyeon JE**, Kim SW, Park CH, Han SO. (2015) Efficient Biological Conversion of Carbon Monoxide (CO) to Carbon Dioxide (CO₂) and for Utilization in Bioplastic Production by *Ralstonia eutropha* through the Display of an Enzyme Complex on the Cell Surface. *Chemical Communications*. 51:10202-10205 (IF 6.834, TOP 12.75%)
- Ramzi AB, **Hyeon JE**, Kim SW, Park CH, Han SO. (2015) 5-Aminolevulinic Acid Production in Engineered *Corynebacterium glutamicum* via C5 Biosynthesis Pathway. *Enzyme and Microbial Technology*. 81:1-7 (IF 2.322)
- Ramzi AB, **Hyeon JE**, Han SO. (2015) Improved Catalytic Activities of a Dye-decolorizing Peroxidase (DyP) by Overexpression of ALA and Heme Biosynthesis Genes in *Escherichia coli*. *Pro.Biochem.*. 50:1272-1276 (IF 2.516)
- Kang DH, **Hyeon JE (Co-First Author)**, You SK, Kim SW, Han SO. (2014) Efficient Enzymatic degradation Process for Hydrolysis Activity of the Carrageenan from Red Algae in Marine Biomass. *Journal of Biotechnology*. 192:108-113 (IF 2.871)
- Kim SJ, **Hyeon JE**, Jeon SD, Choi GW, Han SO. (2014) Bi-functional Cellulases Complexes Displayed on the Cell Surface of *Corynebacterium glutamicum* Increase Hydrolysis of Lignocelluloses at Elevated Temperature. *Enzyme and Microbial Technology*. 66:67-73 (IF 2.322)
- **Hyeon JE**, Kang DH, Han SO. (2014) Signal Amplification by a Self-assembled Biosensor System Designed on the Principle of Dockerin-cohesin Interactions in a Cellulosome complex. *Analyst*. 139:4790-4793 (IF 4.107 / 9.46%)
- **Hyeon JE**, You SK, Kang DH, Ryu SH, Kim MG, Lee SS, Han SO. (2014) Enzymatic Degradation of Lignocellulosic Biomass by Continuous Process Using Laccase and Cellulases with the Aid of Scaffoldin for Ethanol Production. *Process Biochemistry*. 49:1266-1273 (IF 2.516)
- **Hyeon JE**, Jeon SD, Han SO. (2013) Cellulosome-based, *Clostridium*-derived Multi-Functional Enzyme Complexes for Advanced Biotechnology Tool Development. *Biotechnology Advances*. 31:936-944 (IF 9.015 / TOP 3.68%)
- **Hyeon JE**, Kang DH, Kim YI, You SK, Han SO. (2012) A GntR Type Transcriptional Regulator PckR Negatively Regulates the Expression of Phosphoenolpyruvate Carboxykinase in *Corynebacterium glutamicum*. *Journal of Bacteriology*. 194:2181-2188 (IF 2.808)
- **Hyeon JE**, Kang DH, Kim YI, Jeon SD, You SK, Kim KY, Kim SW, Han SO. (2012) Production of Functional Agarolytic Nano-complex for the Synergistic Hydrolysis of Marine Biomass and Its Potential Application in Carbohydrate Binding Module-utilizing One-step Purification. *Process Biochemistry*. 47:877-881 (IF 2.516)
- **Hyeon JE**, Jeon WJ, Whang SY, Han SO. (2011) Production of Minicellulosomes for the Enhanced Hydrolysis of Cellulosic Substrates by Recombinant *Corynebacterium glutamicum*. *Enzy. Microb. Tech.* 48:371-377 (IF 2.322)
- **Hyeon JE**, Yu KO, Suh DJ, Suh YW, Lee SE, Lee J, Han SO. (2010) Production of Minicellulosomes from *Clostridium cellulovorans* for the Fermentation of Cellulosic Ethanol Using Engineered Recombinant *Saccharomyces cerevisiae*. *FEMS Microbiology Letter*. 310:39-47 (IF 2.121)
- Cho HY, Lee SG, **Hyeon JE**, Han SO. (2010) Identification and Characterization of a Transcriptional Regulator, SucR, that Influences *sucCD* Transcription in *Corynebacterium glutamicum*. *Biochemical and Biophysical Research Communications*. 401:300-305 (IF 2.297)
- Jeon E, **Hyeon JE**, Suh DJ, Suh YW, Kim SW, Song KH, Han SO. (2009) Production of Cellulosic Ethanol in *Saccharomyces cerevisiae* Heterologous Expressing *Clostridium thermocellum* Endoglucanase and *Saccharomycopsis fibuligera* β -glucosidase Genes. *Molecules and Cells*. 28:369-373 (IF 2.090)
- Jeon E, **Hyeon JE**, Lee SE, Park BS, Kim SW, Lee J, Han SO. (2009) Cellulosic Alcoholic Fermentation Using Recombinant *Saccharomyces cerevisiae* Engineered for the Production of *Clostridium cellulovorans* Endoglucanase and *Saccharomycopsis fibuligera* β -glucosidase. *FEMS Microbiology Letter*. 301:130-136 (IF 2.121)