

A peptide-based collagen-like gel as a novel biomaterial

Takaki Koide

Faculty of Science and Engineering, Waseda University

We have developed a peptide-based collagen-like gel utilizing the self-assembling property of collagen-like peptides, i.e. (Pro-Hyp-Gly)_n. In order to functionalize the hydrogel, we incorporated Gly-Phe-Hyp-Gly-Glu-Arg sequence, which is recognized by integrin, to the peptide building blocks. When human fibroblasts are cultured on the material, integrin-dependent cell attachment and spreading are observed.