Francisco Javier Arias

List of Publications by Year
in descending order

91 papers	3,193 citations	168829 31 h-index	190340 53 g-index
92 all docs	92 docs citations	92 times ranked	2756 citing authors

#	Article	IF	Citations
1	Elastin-like Polymers as Nanovaccines: Protein Engineering of Self-Assembled, Epitope-Exposing Nanoparticles. Methods in Molecular Biology, 2022, 2465, 41-72.	0.4	1
2	Production of elastin-like recombinamer-based nanoparticles for docetaxel encapsulation and use as smart drug-delivery systems using a supercritical anti-solvent process. Journal of Industrial and Engineering Chemistry, 2021, 93, 361-374.	2.9	17
3	Advanced nanomedicine and cancer: Challenges and opportunities in clinical translation. International Journal of Pharmaceutics, 2021, 599, 120438.	2.6	56
4	Soft Hydrogel Inspired by Elastomeric Proteins. ACS Biomaterials Science and Engineering, 2021, 7, 5028-5038.	2.6	5
5	Metronomic Anti-Cancer Therapy: A Multimodal Therapy Governed by the Tumor Microenvironment. Cancers, 2021, 13, 5414.	1.7	8
6	Smart Nanoparticles as Advanced Anti-Akt Kinase Delivery Systems for Pancreatic Cancer Therapy. ACS Applied Materials & Interfaces, 2021, 13, 55790-55805.	4.0	8
7	Genetically Engineered Elastin-based Biomaterials for Biomedical Applications. Current Medicinal Chemistry, 2020, 26, 7117-7146.	1.2	24
8	A double safety lock tumor-specific device for suicide gene therapy in breast cancer. Cancer Letters, 2020, 470, 43-53.	3.2	10
9	Aptamer-Functionalized Natural Protein-Based Polymers as Innovative Biomaterials. Pharmaceutics, 2020, 12, 1115.	2.0	7
10	Functional characterization of an enzymatically degradable multi-bioactive elastin-like recombinamer. International Journal of Biological Macromolecules, 2020, 164, 1640-1648.	3.6	9
11	Elastin-like recombinamer-based devices releasing Kv1.3 blockers for the prevention of intimal hyperplasia: An in vitro and in vivo study. Acta Biomaterialia, 2020, 115, 264-274.	4.1	6
12	Influence of the Thermodynamic and Kinetic Control of Selfâ€Assembly on the Microstructure Evolution of Silkâ€Elastinâ€Like Recombinamer Hydrogels. Small, 2020, 16, e2001244.	5.2	23
13	A DNA Vaccine Delivery Platform Based on Elastin-Like Recombinamer Nanosystems for Rift Valley Fever Virus. Molecular Pharmaceutics, 2020, 17, 1608-1620.	2.3	13
14	Self-Assembling ELR-Based Nanoparticles as Smart Drug-Delivery Systems Modulating Cellular Growth via Akt. Biomacromolecules, 2019, 20, 1996-2007.	2.6	19
15	A novel lipase-catalyzed method for preparing ELR-based bioconjugates. International Journal of Biological Macromolecules, 2019, 121, 752-759.	3.6	5
16	Biocompatibility of two model elastinâ€like recombinamerâ€based hydrogels formed through physical or chemical crossâ€linking for various applications in tissue engineering and regenerative medicine. Journal of Tissue Engineering and Regenerative Medicine, 2018, 12, e1450-e1460.	1.3	32
17	Elastin-Like Recombinamers As Smart Drug Delivery Systems. Current Drug Targets, 2018, 19, 360-379.	1.0	14
18	FÃ¶rster Resonance Energy Transfer-Paired Hydrogel Forming Silk-Elastin-Like Recombinamers by Recombinant Conjugation of Fluorescent Proteins. Bioconjugate Chemistry, 2017, 28, 828-835.	1.8	9

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19	Self-Assembling Elastin-Like Hydrogels for Timolol Delivery: Development of an Ophthalmic Formulation Against Glaucoma. Molecular Pharmaceutics, 2017, 14, 4498-4508.	2.3	26
20	Regeneration of hyaline cartilage promoted by xenogeneic mesenchymal stromal cells embedded within elastin-like recombinamer-based bioactive hydrogels. Journal of Materials Science: Materials in Medicine, 2017, 28, 115.	1.7	27
21	Anti-Human Endoglin (hCD105) Immunotoxinâ€"Containing Recombinant Single Chain Ribosome-Inactivating Protein Musarmin 1. Toxins, 2016, 8, 184.	1.5	8
22	Biocompatible ELR-Based Polyplexes Coated with MUC1 Specific Aptamers and Targeted for Breast Cancer Gene Therapy. Molecular Pharmaceutics, 2016, 13, 795-808.	2.3	31
23	Elastin-like polypeptides in drug delivery. Advanced Drug Delivery Reviews, 2016, 97, 85-100.	6.6	122
24	Development of a mechanism and an accurate and simple mathematical model for the description of drug release: Application to a relevant example of acetazolamide-controlled release from a bio-inspired elastin-based hydrogel. Materials Science and Engineering C, 2016, 61, 286-292.	3.8	27
25	Advanced Systems for Controlled Drug Delivery from Chemically Modified Elastin-like Recombinamers. Current Organic Chemistry, 2016, 21, 21-33.	0.9	2
26	Elastin-like recombinamers with acquired functionalities for gene-delivery applications. Journal of Biomedical Materials Research - Part A, 2015, 103, 3166-3178.	2.1	19
27	Nanotechnological Approaches to Therapeutic Delivery Using Elastin-Like Recombinamers. Bioconjugate Chemistry, 2015, 26, 1252-1265.	1.8	21
28	Amphiphilic Elastin-Like Block Co-Recombinamers Containing Leucine Zippers: Cooperative Interplay between Both Domains Results in Injectable and Stable Hydrogels. Biomacromolecules, 2015, 16, 3389-3398.	2.6	33
29	Self-Organized ECM-Mimetic Model Based on an Amphiphilic Multiblock Silk-Elastin-Like Corecombinamer with a Concomitant Dual Physical Gelation Process. Biomacromolecules, 2014, 15, 3781-3793.	2.6	77
30	Cellular uptake of multilayered capsules produced with natural and genetically engineered biomimetic macromolecules. Acta Biomaterialia, 2014, 10, 2653-2662.	4.1	29
31	Recent Contributions of Elastin-Like Recombinamers to Biomedicine and Nanotechnology. Current Topics in Medicinal Chemistry, 2014, 14, 819-836.	1.0	24
32	High level expression and facile purification of recombinant silk-elastin-like polymers in auto induction shake flask cultures. AMB Express, 2013, 3, 11.	1.4	33
33	Immunomodulatory Nanoparticles from Elastin-Like Recombinamers: Single-Molecules for Tuberculosis Vaccine Development. Molecular Pharmaceutics, 2013, 10, 586-597.	2.3	48
34	Nanostructured and thermoresponsive recombinant biopolymer-based microcapsules for the delivery of active molecules. Nanomedicine: Nanotechnology, Biology, and Medicine, 2013, 9, 895-902.	1.7	37
35	Layer-by-Layer Film Growth Using Polysaccharides and Recombinant Polypeptides: A Combinatorial Approach. Journal of Physical Chemistry B, 2013, 117, 6839-6848.	1.2	31
36	Efficient Cell and Cell-Sheet Harvesting Based on Smart Surfaces Coated with a Multifunctional and Self-Organizing Elastin-Like Recombinamer. Biomacromolecules, 2013, 14, 1893-1903.	2.6	28

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37	Multifunctional Compartmentalized Capsules with a Hierarchical Organization from the Nano to the Macro Scales. Biomacromolecules, 2013, 14, 2403-2410.	2.6	55
38	A comparative study of cell behavior on different energetic and bioactive polymeric surfaces made from elastin-like recombinamers. Soft Matter, 2012, 8, 3239.	1.2	33
39	Synthesis of Genetically Engineered Protein Polymers (Recombinamers) as an Example of Advanced Self-Assembled Smart Materials. Methods in Molecular Biology, 2012, 811, 17-38.	0.4	59
40	Emerging applications of multifunctional elastin-like recombinamers. Nanomedicine, 2011, 6, 111-122.	1.7	63
41	Biomimetic Calcium Phosphate Mineralization with Multifunctional Elastin-Like Recombinamers. Biomacromolecules, 2011, 12, 1480-1486.	2.6	59
42	Tunable Morphology and Structural Properties of Recombinant Silk-Elastinlike Biopolymers by Electrospinning. Biophysical Journal, 2011, 100, 369a.	0.2	1
43	Elastinâ€like recombinamers: Biosynthetic strategies and biotechnological applications. Biotechnology Journal, 2011, 6, 1174-1186.	1.8	77
44	Layerâ€byâ€Layer Assembly of Chitosan and Recombinant Biopolymers into Biomimetic Coatings with Multiple Stimuliâ€Responsive Properties. Small, 2011, 7, 2640-2649.	5.2	97
45	Fabrication of CdSeâ€Nanofibers with Potential for Biomedical Applications. Advanced Functional Materials, 2010, 20, 1011-1018.	7.8	30
46	Development of Biomimetic Chitosanâ€Based Hydrogels Using an Elastinâ€Like Polymer. Advanced Engineering Materials, 2010, 12, B37.	1.6	26
47	Gold Tailored Photosensitive Elastinâ€like Polymer: Synthesis of Temperature, pH and UVâ€vis Sensitive Probes. Macromolecular Rapid Communications, 2010, 31, 568-573.	2.0	19
48	Recombinamers: Combining Molecular Complexity with Diverse Bioactivities for Advanced Biomedical and Biotechnological Applications. Advances in Biochemical Engineering/Biotechnology, 2010, 125, 145-179.	0.6	9
49	Trace Analysis of Bromate in Potato Snacks Using High-Performance Liquid Chromatographyâˆ’Tandem Mass Spectrometry. Journal of Agricultural and Food Chemistry, 2010, 58, 8134-8138.	2.4	13
50	Rapid micropatterning by temperature-triggered reversible gelation of a recombinant smart elastin-like tetrablock-copolymer. Soft Matter, 2010, 6, 1121.	1.2	47
51	Exploiting the Sequence of Naturally Occurring Elastin: Construction, Production and Characterization of a Recombinant Thermoplastic Protein-Based Polymer. Journal of Nano Research, 2009, 6, 133-145.	0.8	19
52	Stimuliâ€Responsive Thin Coatings Using Elastinâ€Like Polymers for Biomedical Applications. Advanced Functional Materials, 2009, 19, 3210-3218.	7.8	83
53	â€œRecombinamersâ€•as advanced materials for the post-oil age. Polymer, 2009, 50, 5159-5169.	1.8	114
54	Synthesis and Characterization of Macroporous Thermosensitive Hydrogels from Recombinant Elastin-Like Polymers. Biomacromolecules, 2009, 10, 3015-3022.	2.6	84

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55	Influence of the Amino-Acid Sequence on the Inverse Temperature Transition of Elastin-Like Polymers. Biophysical Journal, 2009, 97, 312-320.	0.2	99
56	Genetically Engineered Elastin-Like Polymer as a Substratum to Culture Cells from the Ocular Surface. Current Eye Research, 2009, 34, 48-56.	0.7	54
57	Biofunctional design of elastin-like polymers for advanced applications in nanobiotechnology. Journal of Biomaterials Science, Polymer Edition, 2007, 18, 269-286.	1.9	78
58	NMR study of the cooperative behavior of thermotropic model polypeptides. Polymer International, 2007, 56, 186-194.	1.6	2
59	Nanobiotechnological approach to engineered biomaterial design: the example of elastin-like polymers. Nanomedicine, 2006, 1, 267-280.	1.7	29
60	Tailored recombinant elastin-like polymers for advanced biomedical and nano(bio)technological applications. Biotechnology Letters, 2006, 28, 687-695.	1.1	57
61	Genetic Engineering of Protein-Based Polymers: The Example of Elastinlike Polymers. Advances in Polymer Science, 2005, , 119-167.	0.4	42
62	Description, Distribution, Activity and Phylogenetic Relationship of Ribosome-Inactivating Proteins in Plants, Fungi and Bacteria. Mini-Reviews in Medicinal Chemistry, 2004, 4, 461-476.	1.1	182
63	Design and bioproduction of a recombinant multi(bio)functional elastin-like protein polymer containing cell adhesion sequences for tissue engineering purposes. Journal of Materials Science: Materials in Medicine, 2004, 15, 479-484.	1.7	186
64	Influence of the Molecular Weight on the Inverse Temperature Transition of a Model Genetically Engineered Elastin-like pH-Responsive Polymer. Macromolecules, 2004, 37, 3396-3400.	2.2	97
65	Bacterial expression of biologically active recombinant musarmin 1 from bulbs of Muscari armeniacum L. and Miller. Journal of Biotechnology, 2004, 112, 313-322.	1.9	5
66	Musarmins: three single-chain ribosome-inactivating protein isoforms from bulbs of Muscari armeniacum L. and Miller. International Journal of Biochemistry and Cell Biology, 2003, 35, 61-78.	1.2	13
67	cDNA molecular cloning and seasonal acumulation of an ebulin l-related dimeric lectin of dwarf elder (Sambucus ebulus L.) leaves. International Journal of Biochemistry and Cell Biology, 2003, 35, 1061-1065.	1.2	18
68	Isolation and Characterization of a new Dgalactose- Binding Lectin from Sambucus Racemosa L.. Protein and Peptide Letters, 2003, 10, 287-293.	0.4	4
69	A single-chain antibody fragment is functionally expressed in the cytoplasm of both Escherichia coli and transgenic plants. FEBS Journal, 1999, 262, 617-624.	0.2	45
70	Functional expression in bacteria and plants of an scFv antibody fragment against tospoviruses. Immunotechnology: an International Journal of Immunological Engineering, 1999, 4, 189-201.	2.4	57
71	Ebulitins: A new family of type 1 ribosome-inactivating proteins (rRNAN-glycosidases) from leaves ofSambucus ebulusL. that coexist with the type 2 ribosome-inactivating protein ebulin 1. FEBS Letters, 1995, 360, 299-302.	1.3	33
72	Cusativin, a new cytidine-specific ribonuclease accumulated in seeds of Cucumis sativus L.. Planta, 1994, 194, 328-338.	1.6	33

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73	Isolation and characterization of two new N-glycosidase type-1 ribosome-inactivating proteins, unrelated in amino-acid sequence, from Petrocoptis species. Planta, 1994, 194, 487-491.	1.6	14
74	Enzymic activity of melonin, a translational inhibitor present in dry seeds of Cucumis melo L.. Plant Science, 1994, 103, 127-134.	1.7	9
75	Isolation and partial characterization of nigrin b, a non-toxic novel type 2 ribosome-inactivating protein from the bark ofSambucus nigra L.. Plant Molecular Biology, 1993, 22, 1181-1186.	2.0	78
76	Distribution and properties of major ribosome-inactivating proteins (28 S rRNA N-glycosidases) of the plant Saponaria officinalis L. (Caryophyllaceae). Biochimica Et Biophysica Acta Gene Regulatory Mechanisms, 1993, 1216, 31-42.	2.4	102
77	Molecular mechanism of inhibition of mammalian protein synthesis by some four-chain agglutinins. FEBS Letters, 1993, 329, 59-62.	1.3	35
78	Molecular action of the type 1 ribosome-inactivating protein saporin 5 onVicia sativaribosomes. FEBS Letters, 1993, 325, 291-294.	1.3	22
79	Development of a cell-free translation system from Cucumis melo: preparation, optimization and evaluation of sensitivity to some translational inhibitors. Plant Science, 1993, 90, 127-134.	1.7	5
80	Vicia sativaL. â€˜Run-offâ€™ and Purified Ribosomes: Polyphenylalanine Synthesis and Molecular Action of Ribosome-inactivating Proteins. Journal of Experimental Botany, 1993, 44, 1297-1304.	2.4	7
81	Effects of ribosome-inactivating proteins on Escherichia coli and Agrobacterium tumefaciens translation systems. Journal of Bacteriology, 1993, 175, 6721-6724.	1.0	32
82	A Cucumis sativus cell-free translation system: preparation, optimization and sensitivity to some antibiotics and ribosome-inactivating proteins. Physiologia Plantarum, 1993, 88, 549-556.	2.6	3
83	Preparation and Optimization of a Cell-free Translation System fromVicia sativaGerm Lacking Ribosome-inactivating Protein Activity. Journal of Experimental Botany, 1992, 43, 729-737.	2.4	17
84	Partial characterization of the translational inhibitor present in seeds of Cucumis melo L. Biochemical Society Transactions, 1992, 20, 313S-313S.	1.6	4
85	Isolation and partial characterization of a new ribosome-inactivating protein from Petrocoptis glaucifolia (Lag.) Boiss. Planta, 1992, 186, 532-40.	1.6	30
86	Fusidic acid-dependent wheat germ ribosomal complexes require unphosphorylated elongation factor 2. Phytochemistry, 1992, 31, 55-57.	1.4	1
87	Protein phosphorylation in a cell-free translation system from Vicia sativa. Phytochemistry, 1991, 30, 3185-3187.	1.4	4
88	Effect of continued exposition to ethanol on activity of the ammonium and fructose transport systems inSaccharomyces cerevisiaevar.ellipsoideus. Biotechnology and Bioengineering, 1991, 37, 389-391.	1.7	7
89	Changes in sensitivity of in vitro rat brain protein synthesis to the acute action of ethanol and isopropanol as a consequence of the long-term ingestion of isopropanol. Archives of Toxicology, 1991, 65, 500-504.	1.9	4
90	Effect of l-azetidine 2-carboxilic acid on the activity of the general amino-acid permease from Saccharomyces cerevisiae var. ellipsoideus. Archives of Microbiology, 1991, 155, 320-4.	1.0	4

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91	Changes in the activity of the general amino acid permease fromSaccharomyces cerevisiae var.ellipsoideus during fermentation. Biotechnology and Bioengineering, 1990, 36, 808-810.	1.7	4