

Robert Samuel Langer Jr

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.

355 papers	92,022 citations	125 h-index	303 g-index
377 ext. papers	104,617 ext. citations	18.2 avg, IF	8.6 L-index

#	Paper	IF	Citations
355	Oral mRNA delivery using capsule-mediated gastrointestinal tissue injections. <i>Matter</i> , 2022 ,	12.7	4
354	Bioplastics for a circular economy.. <i>Nature Reviews Materials</i> , 2022 , 1-21	73.3	49
353	Dynamic omnidirectional adhesive microneedle system for oral macromolecular drug delivery.. <i>Science Advances</i> , 2022 , 8, eabk1792	14.3	5
352	Role of drug delivery technologies in the success of COVID-19 vaccines: a perspective.. <i>Drug Delivery and Translational Research</i> , 2022 , 1	6.2	0
351	Engineered nanoparticles enable deep proteomics studies at scale by leveraging tunable nano-bio interactions.. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2022 , 119, e2106053119	11.5	2
350	Implantable system for chronotherapy. <i>Science Advances</i> , 2021 , 7, eabj4624	14.3	1
349	Nanotechnology approaches for global infectious diseases. <i>Nature Nanotechnology</i> , 2021 , 16, 369-384	28.7	58
348	Computationally guided high-throughput design of self-assembling drug nanoparticles. <i>Nature Nanotechnology</i> , 2021 , 16, 725-733	28.7	21
347	Engineered drug delivery devices to address Global Health challenges. <i>Journal of Controlled Release</i> , 2021 , 331, 503-514	11.7	14
346	The surface topography of silicone breast implants mediates the foreign body response in mice, rabbits and humans. <i>Nature Biomedical Engineering</i> , 2021 , 5, 1115-1130	19	32
345	Reply to Stohner: On the significance of BMI-age dependence of exhaled aerosol. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2021 , 118,	11.5	
344	Microgel encapsulated nanoparticles for glucose-responsive insulin delivery. <i>Biomaterials</i> , 2021 , 267, 120458	15.6	10
343	Analysis of the Human Plasma Proteome Using Multi-Nanoparticle Protein Corona for Detection of Alzheimer's Disease. <i>Advanced Healthcare Materials</i> , 2021 , 10, e2000948	10.1	3
342	Engineering precision nanoparticles for drug delivery. <i>Nature Reviews Drug Discovery</i> , 2021 , 20, 101-124	64.1	822
341	A microneedle platform for buccal macromolecule delivery. <i>Science Advances</i> , 2021 , 7,	14.3	21
340	Exhaled aerosol increases with COVID-19 infection, age, and obesity. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2021 , 118,	11.5	70
339	Improved Speech Intelligibility in Subjects With Stable Sensorineural Hearing Loss Following Intratympanic Dosing of FX-322 in a Phase 1b Study. <i>Otology and Neurotology</i> , 2021 , 42, e849-e857	2.6	6

338	Facts and Figures on Materials Science and Nanotechnology Progress and Investment. <i>ACS Nano</i> , 2021 , 15, 15940-15952	16.7	17
337	Stimuli-responsive transdermal microneedle patches. <i>Materials Today</i> , 2021 , 47, 206-222	21.8	33
336	Wireless on-demand drug delivery. <i>Nature Electronics</i> , 2021 , 4, 464-477	28.4	14
335	Oral delivery of systemic monoclonal antibodies, peptides and small molecules using gastric auto-injectors. <i>Nature Biotechnology</i> , 2021 ,	44.5	10
334	Lipid nanoparticles for mRNA delivery. <i>Nature Reviews Materials</i> , 2021 , 1-17	73.3	228
333	Additive manufacturing in drug delivery: Innovative drug product design and opportunities for industrial application. <i>Advanced Drug Delivery Reviews</i> , 2021 , 178, 113990	18.5	4
332	A technology evaluation of CVT-301 (Inbrija): an inhalable therapy for treatment of Parkinson's disease. <i>Expert Opinion on Drug Delivery</i> , 2021 , 18, 1559-1569	8	1
331	Nucleic acid delivery for therapeutic applications. <i>Advanced Drug Delivery Reviews</i> , 2021 , 178, 113834	18.5	16
330	A therapeutic convection-enhanced macroencapsulation device for enhancing cell viability and insulin secretion. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2021 , 118,	11.5	7
329	Engineered insulin-polycation complexes for glucose-responsive delivery with high insulin loading. <i>Journal of Controlled Release</i> , 2021 , 338, 71-79	11.7	1
328	BBB pathophysiology-independent delivery of siRNA in traumatic brain injury. <i>Science Advances</i> , 2021 , 7,	14.3	20
327	Development of a long-acting direct-acting antiviral system for hepatitis C virus treatment in swine. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2020 , 117, 11987-11994	11.5	5
326	A rapidly deployable individualized system for augmenting ventilator capacity. <i>Science Translational Medicine</i> , 2020 , 12,	17.5	14
325	Polymer Nanocomposite Microactuators for On-Demand Chemical Release via High-Frequency Magnetic Field Excitation. <i>Nano Letters</i> , 2020 , 20, 4816-4822	11.5	8
324	Parallel evolution of polymer chemistry and immunology: Integrating mechanistic biology with materials design. <i>Advanced Drug Delivery Reviews</i> , 2020 , 156, 65-79	18.5	6
323	Machine Learning Uncovers Food- and Excipient-Drug Interactions. <i>Cell Reports</i> , 2020 , 30, 3710-3716.e4	10.6	17
322	A retrievable implant for the long-term encapsulation and survival of therapeutic xenogeneic cells. <i>Nature Biomedical Engineering</i> , 2020 , 4, 814-826	19	37
321	Magnetic Retrieval of Encapsulated Beta Cell Transplants from Diabetic Mice Using Dual-Function MRI Visible and Retrievable Microcapsules. <i>Advanced Materials</i> , 2020 , 32, e1904502	24	11

320	Simultaneous recording and marking of brain microstructures. <i>Journal of Neural Engineering</i> , 2020 , 17, 044001	5	0
319	Light-degradable hydrogels as dynamic triggers for gastrointestinal applications. <i>Science Advances</i> , 2020 , 6, eaay0065	14.3	36
318	A Nanoprimer To Improve the Systemic Delivery of siRNA and mRNA. <i>Nano Letters</i> , 2020 , 20, 4264-4269	11.5	20
317	Robotically handled whole-tissue culture system for the screening of oral drug formulations. <i>Nature Biomedical Engineering</i> , 2020 , 4, 544-559	19	21
316	Clinical Opportunities for Continuous Biosensing and Closed-Loop Therapies. <i>Trends in Chemistry</i> , 2020 , 2, 319-340	14.8	25
315	Glucose-responsive insulin patch for the regulation of blood glucose in mice and minipigs. <i>Nature Biomedical Engineering</i> , 2020 , 4, 499-506	19	166
314	Chiral Supraparticles for Controllable Nanomedicine. <i>Advanced Materials</i> , 2020 , 32, e1903878	24	59
313	From Molecule to Patient: A Biotech Perspective. <i>Clinical Pharmacology and Therapeutics</i> , 2020 , 107, 65-67	6.1	2
312	Glucose-Responsive Nanoparticles for Rapid and Extended Self-Regulated Insulin Delivery. <i>ACS Nano</i> , 2020 , 14, 488-497	16.7	63
311	Platform for micro-invasive membrane-free biochemical sampling of brain interstitial fluid. <i>Science Advances</i> , 2020 , 6,	14.3	5
310	Dopamine and beta-band oscillations differentially link to striatal value and motor control. <i>Science Advances</i> , 2020 , 6,	14.3	6
309	Nasal Calcium-Rich Salts for Cleaning Airborne Particles from the Airways of Essential Workers, Students, and a Family in Quarantine. <i>Molecular Frontiers Journal</i> , 2020 , 04, 36-45	0.9	6
308	A materials-science perspective on tackling COVID-19. <i>Nature Reviews Materials</i> , 2020 , 1-14	73.3	123
307	Nanoparticle-encapsulated siRNAs for gene silencing in the haematopoietic stem-cell niche. <i>Nature Biomedical Engineering</i> , 2020 , 4, 1076-1089	19	29
306	Delivery of Tissue-Targeted Scalpels: Opportunities and Challenges for CRISPR/Cas-Based Genome Editing. <i>ACS Nano</i> , 2020 , 14, 9243-9262	16.7	27
305	Rapid, deep and precise profiling of the plasma proteome with multi-nanoparticle protein corona. <i>Nature Communications</i> , 2020 , 11, 3662	17.4	58
304	Modeling, design, and machine learning-based framework for optimal injectability of microparticle-based drug formulations. <i>Science Advances</i> , 2020 , 6, eabb6594	14.3	19
303	Computationally Guided Intracerebral Drug Delivery via Chronically Implanted Microdevices. <i>Cell Reports</i> , 2020 , 31, 107734	10.6	2

302	Trends in Therapeutic Conjugates: Bench to Clinic. <i>Bioconjugate Chemistry</i> , 2020 , 31, 462-473	6.3	13
301	Advances in oligonucleotide drug delivery. <i>Nature Reviews Drug Discovery</i> , 2020 , 19, 673-694	64.1	407
300	Engineered PLGA microparticles for long-term, pulsatile release of STING agonist for cancer immunotherapy. <i>Science Translational Medicine</i> , 2020 , 12,	17.5	47
299	Chemical Tuning of Fibers Drawn from Extensible Hyaluronic Acid Networks. <i>Journal of the American Chemical Society</i> , 2020 , 142, 19715-19721	16.4	7
298	Ingestible transiently anchoring electronics for microstimulation and conductive signaling. <i>Science Advances</i> , 2020 , 6, eaaz0127	14.3	16
297	Biohybrid Design Gets Personal: New Materials for Patient-Specific Therapy. <i>Advanced Materials</i> , 2020 , 32, e1901969	24	15
296	Outlooks on Three-Dimensional Printing for Ocular Biomaterials Research. <i>Journal of Ocular Pharmacology and Therapeutics</i> , 2020 , 36, 7-17	2.6	11
295	Actuation of untethered pneumatic artificial muscles and soft robots using magnetically induced liquid-to-gas phase transitions. <i>Science Robotics</i> , 2020 , 5,	18.6	43
294	Inverse Pneumatic Artificial Muscles for Application in Low-Cost Ventilators. <i>Advanced Intelligent Systems</i> , 2020 , 3, 2000200	6	5
293	A New Approach for Microfabrication of Printed Circuit Boards with Ultrafine Traces. <i>ACS Applied Materials & Interfaces</i> , 2019 , 11, 35376-35381	9.5	3
292	Can Fish and Cell Phones Teach Us about Our Health?. <i>ACS Sensors</i> , 2019 , 4, 2566-2570	9.2	1
291	A luminal unfolding microneedle injector for oral delivery of macromolecules. <i>Nature Medicine</i> , 2019 , 25, 1512-1518	50.5	88
290	Blocking CXCR4 alleviates desmoplasia, increases T-lymphocyte infiltration, and improves immunotherapy in metastatic breast cancer. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2019 , 116, 4558-4566	11.5	156
289	Long-term implant fibrosis prevention in rodents and non-human primates using crystallized drug formulations. <i>Nature Materials</i> , 2019 , 18, 892-904	27	56
288	Steerable Microinvasive Probes for Localized Drug Delivery to Deep Tissue. <i>Small</i> , 2019 , 15, e1901459	11	7
287	Controlling the movement of molecules. <i>Quarterly Reviews of Biophysics</i> , 2019 , 52,	7	4
286	Reprogramming the microenvironment with tumor-selective angiotensin blockers enhances cancer immunotherapy. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2019 , 116, 10674-10680	11.5	89
285	Temperature-responsive biometamaterials for gastrointestinal applications. <i>Science Translational Medicine</i> , 2019 , 11,	17.5	28

284	Ultra-rapid drug delivery in the oral cavity using ultrasound. <i>Journal of Controlled Release</i> , 2019 , 304, 1-6	11.7	7
283	A gastric resident drug delivery system for prolonged gram-level dosing of tuberculosis treatment. <i>Science Translational Medicine</i> , 2019 , 11,	17.5	20
282	Polymers for extended-release administration. <i>Biomedical Microdevices</i> , 2019 , 21, 45	3.7	10
281	An ingestible self-orienting system for oral delivery of macromolecules. <i>Science</i> , 2019 , 363, 611-615	33.3	164
280	Simultaneous spatiotemporal tracking and oxygen sensing of transient implants in vivo using hot-spot MRI and machine learning. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2019 , 116, 4861-4870	11.5	17
279	Nanofibrillar Patches of Commensal Skin Bacteria. <i>Biomacromolecules</i> , 2019 , 20, 102-108	6.9	7
278	Injectable Polymer-Nanoparticle Hydrogels for Local Immune Cell Recruitment. <i>Biomacromolecules</i> , 2019 , 20, 4430-4436	6.9	33
277	A heat-stable microparticle platform for oral micronutrient delivery. <i>Science Translational Medicine</i> , 2019 , 11,	17.5	15
276	Biocompatible near-infrared quantum dots delivered to the skin by microneedle patches record vaccination. <i>Science Translational Medicine</i> , 2019 , 11,	17.5	54
275	Delivery of mRNA vaccines with heterocyclic lipids increases anti-tumor efficacy by STING-mediated immune cell activation. <i>Nature Biotechnology</i> , 2019 , 37, 1174-1185	44.5	200
274	A once-a-month oral contraceptive. <i>Science Translational Medicine</i> , 2019 , 11,	17.5	16
273	Ingestible electronics for diagnostics and therapy. <i>Nature Reviews Materials</i> , 2019 , 4, 83-98	73.3	85
272	Inhaled Nanoformulated mRNA Polyplexes for Protein Production in Lung Epithelium. <i>Advanced Materials</i> , 2019 , 31, e1805116	24	118
271	Delivery technologies for cancer immunotherapy. <i>Nature Reviews Drug Discovery</i> , 2019 , 18, 175-196	64.1	823
270	3D-Printed Gastric Resident Electronics. <i>Advanced Materials Technologies</i> , 2019 , 4, 1800490	6.8	43
269	Drug delivery across length scales. <i>Journal of Drug Targeting</i> , 2019 , 27, 229-243	5.4	14
268	Biocompatible Semiconductor Quantum Dots as Cancer Imaging Agents. <i>Advanced Materials</i> , 2018 , 30, e1706356	24	154
267	Convergence for Translation: Drug-Delivery Research in Multidisciplinary Teams. <i>Angewandte Chemie - International Edition</i> , 2018 , 57, 4156-4163	16.4	5

266	Translation durch Konvergenz: Drug-Delivery-Forschung in multidisziplinären Teams. <i>Angewandte Chemie</i> , 2018 , 130, 4226-4234	3.6	0
265	Controlling the Growth of Staphylococcus epidermidis by Layer-By-Layer Encapsulation. <i>ACS Applied Materials & Interfaces</i> , 2018 , 10, 16250-16259	9.5	20
264	Nanoparticles for Immune Cytokine TRAIL-Based Cancer Therapy. <i>ACS Nano</i> , 2018 , 12, 912-931	16.7	81
263	Partial DNA-guided Cas9 enables genome editing with reduced off-target activity. <i>Nature Chemical Biology</i> , 2018 , 14, 311-316	11.7	140
262	Miniaturized neural system for chronic, local intracerebral drug delivery. <i>Science Translational Medicine</i> , 2018 , 10,	17.5	46
261	Development of an oral once-weekly drug delivery system for HIV antiretroviral therapy. <i>Nature Communications</i> , 2018 , 9, 2	17.4	120
260	Design and Synthesis of Waterborne Polyurethanes. <i>Advanced Materials</i> , 2018 , 30, e1706237	24	73
259	Surface tension-assisted additive manufacturing. <i>Nature Communications</i> , 2018 , 9, 1184	17.4	41
258	Immunogenicity of pulsatile-release PLGA microspheres for single-injection vaccination. <i>Vaccine</i> , 2018 , 36, 3161-3168	4.1	25
257	Towards a defined ECM and small molecule based monolayer culture system for the expansion of mouse and human intestinal stem cells. <i>Biomaterials</i> , 2018 , 154, 60-73	15.6	24
256	Reduction of measurement noise in a continuous glucose monitor by coating the sensor with a zwitterionic polymer. <i>Nature Biomedical Engineering</i> , 2018 , 2, 894-906	19	94
255	Genotype-targeted local therapy of glioma. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2018 , 115, E8388-E8394	11.5	29
254	Intracellular Delivery by Membrane Disruption: Mechanisms, Strategies, and Concepts. <i>Chemical Reviews</i> , 2018 , 118, 7409-7531	68.1	280
253	Harnessing single-cell genomics to improve the physiological fidelity of organoid-derived cell types. <i>BMC Biology</i> , 2018 , 16, 62	7.3	22
252	Evaporative Cooling Hydrogel Packaging for Storing Biologics Outside of the Cold Chain. <i>Advanced Healthcare Materials</i> , 2018 , 7, e1800220	10.1	7
251	Alginate encapsulation as long-term immune protection of allogeneic pancreatic islet cells transplanted into the omental bursa of macaques. <i>Nature Biomedical Engineering</i> , 2018 , 2, 810-821	19	145
250	Scalable Gastric Resident Systems for Veterinary Application. <i>Scientific Reports</i> , 2018 , 8, 11816	4.9	3
249	Advances in Biomaterials for Drug Delivery. <i>Advanced Materials</i> , 2018 , 30, e1705328	24	352

248	Molecular Rotors for Universal Quantitation of Nanoscale Hydrophobic Interfaces in Microplate Format. <i>Nano Letters</i> , 2018 , 18, 618-628	11.5	3
247	Prediction of Broad-Spectrum Pathogen Attachment to Coating Materials for Biomedical Devices. <i>ACS Applied Materials & Interfaces</i> , 2018 , 10, 139-149	9.5	30
246	The development of bioresorbable composite polymeric implants with high mechanical strength. <i>Nature Materials</i> , 2018 , 17, 96-103	27	76
245	Nanomaterial Interactions with Human Neutrophils. <i>ACS Biomaterials Science and Engineering</i> , 2018 , 4, 4255-4265	5.5	25
244	Smart Biomaterials: Recent Advances and Future Directions. <i>ACS Biomaterials Science and Engineering</i> , 2018 , 4, 3809-3817	5.5	99
243	Biofilm-Inspired Encapsulation of Probiotics for the Treatment of Complex Infections. <i>Advanced Materials</i> , 2018 , 30, e1803925	24	53
242	¶Aminoacrylate Synthetic Hydrogels: Easily Accessible and Operationally Simple Biomaterials Networks. <i>Angewandte Chemie - International Edition</i> , 2018 , 57, 16026-16029	16.4	15
241	Cellular-scale probes enable stable chronic subsecond monitoring of dopamine neurochemicals in a rodent model. <i>Communications Biology</i> , 2018 , 1, 144	6.7	29
240	¶Aminoacrylate Synthetic Hydrogels: Easily Accessible and Operationally Simple Biomaterials Networks. <i>Angewandte Chemie</i> , 2018 , 130, 16258-16261	3.6	3
239	Restoration of tumour-growth suppression in vivo via systemic nanoparticle-mediated delivery of PTEN mRNA. <i>Nature Biomedical Engineering</i> , 2018 , 2, 850-864	19	127
238	Stabilized single-injection inactivated polio vaccine elicits a strong neutralizing immune response. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2018 , 115, E5269-E5278	11.5	27
237	An ingestible bacterial-electronic system to monitor gastrointestinal health. <i>Science</i> , 2018 , 360, 915-918	33.3	232
236	Ionizable Amino-Polyesters Synthesized via Ring Opening Polymerization of Tertiary Amino-Alcohols for Tissue Selective mRNA Delivery. <i>Advanced Materials</i> , 2018 , 30, e1801151	24	50
235	Endothelial siRNA delivery in nonhuman primates using ionizable low-molecular weight polymeric nanoparticles. <i>Science Advances</i> , 2018 , 4, eaar8409	14.3	51
234	Focal, remote-controlled, chronic chemical modulation of brain microstructures. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2018 , 115, 7254-7259	11.5	9
233	Ultrasound-Mediated Delivery of RNA to Colonic Mucosa of Live Mice. <i>Gastroenterology</i> , 2017 , 152, 1151-1160	11.5	35
232	Subcellular probes for neurochemical recording from multiple brain sites. <i>Lab on A Chip</i> , 2017 , 17, 1104-1115	11.5	36
231	High-throughput Nuclear Delivery and Rapid Expression of DNA via Mechanical and Electrical Cell-Membrane Disruption. <i>Nature Biomedical Engineering</i> , 2017 , 1,	19	105

230	Barcoded nanoparticles for high throughput in vivo discovery of targeted therapeutics. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2017 , 114, 2060-2065	11.5	101
229	Prolonged energy harvesting for ingestible devices. <i>Nature Biomedical Engineering</i> , 2017 , 1,	19	98
228	Cancer Nanotechnology 2017 , 1-7		
227	Wireless Power Transfer to Millimeter-Sized Gastrointestinal Electronics Validated in a Swine Model. <i>Scientific Reports</i> , 2017 , 7, 46745	4.9	32
226	Characterization of Mechanically Matched Hydrogel Coatings to Improve the Biocompatibility of Neural Implants. <i>Scientific Reports</i> , 2017 , 7, 1952	4.9	88
225	Investigating the Cellular Specificity in Tumors of a Surface-Converting Nanoparticle by Multimodal Imaging. <i>Bioconjugate Chemistry</i> , 2017 , 28, 1413-1421	6.3	6
224	Polymeric mechanical amplifiers of immune cytokine-mediated apoptosis. <i>Nature Communications</i> , 2017 , 8, 14179	17.4	21
223	Colony stimulating factor-1 receptor is a central component of the foreign body response to biomaterial implants in rodents and non-human primates. <i>Nature Materials</i> , 2017 , 16, 671-680	27	150
222	Living Biomaterials. <i>Accounts of Chemical Research</i> , 2017 , 50, 508-513	24.3	40
221	Mechanistic understanding of in vivo protein corona formation on polymeric nanoparticles and impact on pharmacokinetics. <i>Nature Communications</i> , 2017 , 8, 777	17.4	362
220	Engineering and physical sciences in oncology: challenges and opportunities. <i>Nature Reviews Cancer</i> , 2017 , 17, 659-675	31.3	153
219	Fabrication of fillable microparticles and other complex 3D microstructures. <i>Science</i> , 2017 , 357, 1138-1143	33.3	105
218	Glucose-responsive insulin by molecular and physical design. <i>Nature Chemistry</i> , 2017 , 9, 937-943	17.6	72
217	Synthesis and Biological Evaluation of Ionizable Lipid Materials for the In Vivo Delivery of Messenger RNA to B Lymphocytes. <i>Advanced Materials</i> , 2017 , 29, 1606944	24	105
216	Evolution of macromolecular complexity in drug delivery systems. <i>Nature Reviews Chemistry</i> , 2017 , 1,	34.6	174
215	Applications of ethylene vinyl acetate copolymers (EVA) in drug delivery systems. <i>Journal of Controlled Release</i> , 2017 , 262, 284-295	11.7	95
214	Oral delivery of biologics using drug-device combinations. <i>Current Opinion in Pharmacology</i> , 2017 , 36, 8-13	5.1	24
213	Triggerable tough hydrogels for gastric resident dosage forms. <i>Nature Communications</i> , 2017 , 8, 124	17.4	74

212	Long-term dopamine neurochemical monitoring in primates. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2017 , 114, 13260-13265	11.5	51
211	Multiplexed RNAi therapy against brain tumor-initiating cells via lipopolymeric nanoparticle infusion delays glioblastoma progression. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2017 , 114, E6147-E6156	11.5	75
210	Bioresponsive materials. <i>Nature Reviews Materials</i> , 2017 , 2,	73.3	828
209	Lipid Nanoparticle Assisted mRNA Delivery for Potent Cancer Immunotherapy. <i>Nano Letters</i> , 2017 , 17, 1326-1335	11.5	302
208	Cytosolic delivery of siRNA by ultra-high affinity dsRNA binding proteins. <i>Nucleic Acids Research</i> , 2017 , 45, 7602-7614	20.1	5
207	Structure-guided chemical modification of guide RNA enables potent non-viral in vivo genome editing. <i>Nature Biotechnology</i> , 2017 , 35, 1179-1187	44.5	255
206	Ly6Clo monocytes drive immunosuppression and confer resistance to anti-VEGFR2 cancer therapy. <i>Journal of Clinical Investigation</i> , 2017 , 127, 3039-3051	15.9	87
205	Poly(glycoamidoamine) brush nanomaterials for systemic siRNA delivery in vivo. <i>Biomaterials Science</i> , 2016 , 5, 38-40	7.4	15
204	A decade of progress in tissue engineering. <i>Nature Protocols</i> , 2016 , 11, 1775-81	18.8	387
203	Oral, ultra-long-lasting drug delivery: Application toward malaria elimination goals. <i>Science Translational Medicine</i> , 2016 , 8, 365ra157	17.5	125
202	Past, Present, and Future Drug Delivery Systems for Antiretrovirals. <i>Journal of Pharmaceutical Sciences</i> , 2016 , 105, 3471-3482	3.9	19
201	RNAi targeting multiple cell adhesion molecules reduces immune cell recruitment and vascular inflammation after myocardial infarction. <i>Science Translational Medicine</i> , 2016 , 8, 342ra80	17.5	123
200	A Janus Mucoadhesive and Omniphobic Device for Gastrointestinal Retention. <i>Advanced Healthcare Materials</i> , 2016 , 5, 1141-6	10.1	20
199	First In Vivo Testing of Compounds Targeting Group 3 Medulloblastomas Using an Implantable Microdevice as a New Paradigm for Drug Development. <i>Journal of Biomedical Nanotechnology</i> , 2016 , 12, 1297-302	4	23
198	Bioinspired Alkenyl Amino Alcohol Ionizable Lipid Materials for Highly Potent In Vivo mRNA Delivery. <i>Advanced Materials</i> , 2016 , 28, 2939-43	24	125
197	Combinatorial hydrogel library enables identification of materials that mitigate the foreign body response in primates. <i>Nature Biotechnology</i> , 2016 , 34, 345-52	44.5	302
196	Long-term glycemic control using polymer-encapsulated human stem cell-derived beta cells in immune-competent mice. <i>Nature Medicine</i> , 2016 , 22, 306-11	50.5	430
195	Supramolecular biomaterials. <i>Nature Materials</i> , 2016 , 15, 13-26	27	971

194	Injectable Self-Healing Glucose-Responsive Hydrogels with pH-Regulated Mechanical Properties. <i>Advanced Materials</i> , 2016 , 28, 86-91	24	340
193	Live-cell protein labelling with nanometre precision by cell squeezing. <i>Nature Communications</i> , 2016 , 7, 10372	17.4	77
192	Therapeutic genome editing by combined viral and non-viral delivery of CRISPR system components in vivo. <i>Nature Biotechnology</i> , 2016 , 34, 328-33	44.5	610
191	Emerging Frontiers in Drug Delivery. <i>Journal of the American Chemical Society</i> , 2016 , 138, 704-17	16.4	625
190	Dendrimer-RNA nanoparticles generate protective immunity against lethal Ebola, H1N1 influenza, and <i>Toxoplasma gondii</i> challenges with a single dose. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2016 , 113, E4133-42	11.5	233
189	Thermostabilization of inactivated polio vaccine in PLGA-based microspheres for pulsatile release. <i>Journal of Controlled Release</i> , 2016 , 233, 101-13	11.7	37
188	mRNA vaccine delivery using lipid nanoparticles. <i>Therapeutic Delivery</i> , 2016 , 7, 319-34	3.8	241
187	Layer-by-Layer Encapsulation of Probiotics for Delivery to the Microbiome. <i>Advanced Materials</i> , 2016 , 28, 9486-9490	24	128
186	A Size-Selective Intracellular Delivery Platform. <i>Small</i> , 2016 , 12, 5873-5881	11	18
185	In vitro and ex vivo strategies for intracellular delivery. <i>Nature</i> , 2016 , 538, 183-192	50.4	489
184	Sustained antigen availability during germinal center initiation enhances antibody responses to vaccination. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2016 , 113, E6639-E6648	11.5	164
183	Polymeric synthetic nanoparticles for the induction of antigen-specific immunological tolerance. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2015 , 112, E156-65	11.5	295
182	Exploiting Electrostatic Interactions in Polymer Nanoparticle Hydrogels. <i>ACS Macro Letters</i> , 2015 , 4, 848-852	6.6	68
181	Single-injection vaccines: Progress, challenges, and opportunities. <i>Journal of Controlled Release</i> , 2015 , 219, 596-609	11.7	52
180	A pH-responsive supramolecular polymer gel as an enteric elastomer for use in gastric devices. <i>Nature Materials</i> , 2015 , 14, 1065-71	27	218
179	Nanoparticles with photoinduced precipitation for the extraction of pollutants from water and soil. <i>Nature Communications</i> , 2015 , 6, 7765	17.4	79
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