

# Sung Heum Park

## List of Publications by Year in Descending Order

**Source:** <https://exaly.com/author-pdf/335716/sung-heum-park-publications-by-year.pdf>

**Version:** 2024-04-24

This document has been generated based on the publications and citations recorded by exaly.com. For the latest version of this publication list, visit the link given above.

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

182  
papers

7,649  
citations

30  
h-index

84  
g-index

193  
ext. papers

8,457  
ext. citations

5.8  
avg, IF

5.79  
L-index

#	Paper	IF	Citations
182	Design and photovoltaic properties of conjugated polymers based on quinoxaline and diketopyrrolopyrrole for OSCs. <i>Synthetic Metals</i> , <b>2022</b> , 285, 117016	3.6	1
181	Up-conversion luminescence performance of Tm <sup>3+</sup> /Yb <sup>3+</sup> co-doped strontium cerate phosphors. <i>Optik</i> , <b>2022</b> , 262, 169264	2.5	
180	Ce <sup>3+</sup> /Tb <sup>3+</sup> -coactivated NaMgBO <sub>3</sub> phosphors toward versatile applications in white LED, FED, and optical anti-counterfeiting. <i>Journal of the American Ceramic Society</i> , <b>2021</b> , 104, 5086-5098	3.8	2
179	Ligand-engineered bandgap stability in mixed-halide perovskite LEDs. <i>Nature</i> , <b>2021</b> , 591, 72-77	50.4	172
178	Design and theoretical study of superlative quantum efficiency and thermal stability phosphor: The system of Sr <sub>9</sub> Eu(PO <sub>4</sub> ) <sub>7</sub> . <i>Journal of Alloys and Compounds</i> , <b>2021</b> , 862, 158285	5.7	1
177	Self-reduction process of Eu <sup>3+</sup> to Eu <sup>2+</sup> in Eu-doped SrLaMgTaO <sub>6</sub> double perovskite thin films and its photoluminescence properties. <i>Optical Materials</i> , <b>2021</b> , 116, 111092	3.3	2
176	In-situ intramolecular synthesis of tubular carbon nitride S-scheme homojunctions with exceptional in-plane exciton splitting and mechanism insight. <i>Chemical Engineering Journal</i> , <b>2021</b> , 414, 128802	14.7	18
175	Water-Repellent Perovskites Induced by a Blend of Organic Halide Salts for Efficient and Stable Solar Cells. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2021</b> , 13, 33172-33181	9.5	1
174	Curvature effects of electron-donating polymers on the device performance of non-fullerene organic solar cells. <i>Journal of Power Sources</i> , <b>2021</b> , 482, 229045	8.9	6
173	Boosting the efficiency of quasi-2D perovskites light-emitting diodes by using encapsulation growth method. <i>Nano Energy</i> , <b>2021</b> , 80, 105511	17.1	30
172	Carrier losses in non-geminate charge-transferred states of nonfullerene acceptor-based organic solar cells. <i>Spectrochimica Acta - Part A: Molecular and Biomolecular Spectroscopy</i> , <b>2021</b> , 250, 119227	4.4	3
171	Improved exciton dissociation efficiency by a carbon-quantum-dot doped workfunction modifying layer in polymer solar cells. <i>Current Applied Physics</i> , <b>2021</b> , 21, 140-146	2.6	3
170	Enhanced Charge Separation in Ternary Bulk-Heterojunction Organic Solar Cells by Fullerenes. <i>Journal of Physical Chemistry Letters</i> , <b>2021</b> , 12, 6418-6424	6.4	4
169	Influence of thiophene and furan Bridge on the properties of poly(benzodithiophene-alt-bis(Bridge)pyrrolopyrrole-1,3-dione) for organic solar cell applications. <i>Polymer</i> , <b>2021</b> , 229, 123991	3.9	5
168	Enhancement in charge extraction and moisture stability of perovskite solar cell via infiltration of charge transport material in grain boundaries. <i>Journal of Power Sources</i> , <b>2021</b> , 506, 230212	8.9	0
167	Bilateral Interface Engineering for Efficient and Stable Perovskite Solar Cells Using Phenylethylammonium Iodide. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2020</b> , 12, 24827-24836	9.5	17
166	Luminescence properties and energy transfer of Mn <sup>4+</sup> -doped double perovskite La <sub>2</sub> ZnTiO <sub>6</sub> phosphor. <i>Optical Materials</i> , <b>2020</b> , 106, 109980	3.3	10

165	Achieving non-contact optical thermometer via inherently Eu <sup>2+</sup> /Eu <sup>3+</sup> -activated SrAl <sub>2</sub> Si <sub>2</sub> O <sub>8</sub> phosphors prepared in air. <i>Journal of Alloys and Compounds</i> , <b>2020</b> , 843, 155858	5.7	20
164	Enhanced performance of ternary polymer solar cells via property modulation of co-absorbing wide band-gap polymers. <i>Journal of Power Sources</i> , <b>2020</b> , 471, 228457	8.9	3
163	Eu <sup>3+</sup> -activated Ca <sub>3</sub> Mo <sub>0.2</sub> W <sub>0.8</sub> O <sub>6</sub> red-emitting phosphors: A near-ultraviolet and blue light excitable platform for solid-state lighting and thermometer. <i>Journal of Luminescence</i> , <b>2020</b> , 223, 117212 <sup>3.8</sup>	3.8	12
162	2D Perovskite Seeding Layer for Efficient Air-Processable and Stable Planar Perovskite Solar Cells. <i>Advanced Functional Materials</i> , <b>2020</b> , 30, 2003081	15.6	25
161	Solution processable small molecules as efficient electron transport layers in organic optoelectronic devices. <i>Journal of Materials Chemistry A</i> , <b>2020</b> , 8, 13501-13508	13	8
160	Solution-processable ambipolar organic field-effect transistors with bilayer transport channels. <i>Polymer Journal</i> , <b>2020</b> , 52, 581-588	2.7	7
159	Lead Acetate Assisted Interface Engineering for Highly Efficient and Stable Perovskite Solar Cells. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2020</b> , 12, 7186-7197	9.5	11
158	NUV light induced visible emission in Er <sup>3+</sup> -activated NaSrLa(MoO <sub>4</sub> )O <sub>3</sub> phosphors for green LEDs and thermometer. <i>Journal of the American Ceramic Society</i> , <b>2020</b> , 103, 1174-1186	3.8	7
157	Near-ultraviolet light induced red emission in Sm <sup>3+</sup> -activated NaSrLa(MoO <sub>4</sub> )O <sub>3</sub> phosphors for solid-state illumination. <i>Journal of Alloys and Compounds</i> , <b>2020</b> , 817, 152705	5.7	40
156	Molecular aggregation method for perovskite/fullerene bulk heterostructure solar cells. <i>Journal of Materials Chemistry A</i> , <b>2020</b> , 8, 1326-1334	13	12
155	Water-stable polymer hole transport layer in organic and perovskite light-emitting diodes. <i>Journal of Power Sources</i> , <b>2020</b> , 478, 228810	8.9	0
154	Rational design of efficient near-infrared photon conversion channel via dual-upconversion process for superior photocatalyst. <i>Carbon</i> , <b>2020</b> , 169, 111-117	10.4	2
153	Design and synthesis of small molecules with difluoroquinoxaline units for OSCs. <i>Molecular Crystals and Liquid Crystals</i> , <b>2020</b> , 705, 79-86	0.5	
152	Synthesis and photovoltaic properties of organic molecules based on difluoroquinoxaline derivatives for OPVs. <i>Molecular Crystals and Liquid Crystals</i> , <b>2020</b> , 705, 57-64	0.5	1
151	Dual-functional of non-contact thermometry and field emission displays via efficient Bi <sup>3+</sup> -Eu <sup>3+</sup> energy transfer in emitting-color tunable GdNbO <sub>4</sub> phosphors. <i>Chemical Engineering Journal</i> , <b>2020</b> , 382, 122861	14.7	94
150	Controllable Eu valence based on linear structural evolution in single-phased Sr <sub>3</sub> -La <sub>1+</sub> (PO <sub>4</sub> ) <sub>3</sub> -(SiO <sub>4</sub> ) phosphors to realize tunable/white light emissions. <i>Journal of Alloys and Compounds</i> , <b>2020</b> , 817, 152743	5.7	3
149	Enhanced photovoltaic performance of benzodithiophene-alt-bis(thiophen-2-yl)quinoxaline polymers via Bridge engineering for non-fullerene organic solar cells. <i>Polymer</i> , <b>2020</b> , 194, 122408	3.9	3
148	Theoretical design and characterization of high efficient Sr <sub>9</sub> Ln(PO <sub>4</sub> ) <sub>7</sub> : Eu <sup>2+</sup> phosphors. <i>Materials Research Bulletin</i> , <b>2020</b> , 127, 110856	5.1	5

147	Wide band-gap organic molecules containing benzodithiophene and difluoroquinoxaline derivatives for solar cell applications. <i>Molecular Crystals and Liquid Crystals</i> , <b>2019</b> , 685, 29-39	0.5	1
146	Eu <sup>3+</sup> doped (Li, Na, K) LaMgWO <sub>6</sub> red emission phosphors: An example to rational design with theoretical and experimental investigation. <i>Journal of Alloys and Compounds</i> , <b>2019</b> , 785, 651-659	5.7	26
145	Study on Na <sub>3</sub> Lu <sub>1-x</sub> Eu <sub>x</sub> (PO <sub>4</sub> ) <sub>2</sub> phosphor: High efficient Na <sub>3</sub> Eu(PO <sub>4</sub> ) <sub>2</sub> red emitting phosphor with excellent thermal stability. <i>Journal of Alloys and Compounds</i> , <b>2019</b> , 805, 346-354	5.7	14
144	Infrared excited Er/Yb codoped NaLaMgWO phosphors with intense green up-conversion luminescence and excellent temperature sensing performance. <i>Dalton Transactions</i> , <b>2019</b> , 48, 11382-11390	4.3	25
143	Efficient Polymeric Donor for Both Visible and Near-Infrared-Absorbing Organic Solar Cells. <i>ACS Applied Energy Materials</i> , <b>2019</b> , 2, 4284-4291	6.1	5
142	Visible to Near-Infrared-Absorbing Polymers Containing Bithiazole and 2,3-Didodecyl-6,7-Difluoroquinoxaline Derivatives for Polymer Solar Cells. <i>Bulletin of the Korean Chemical Society</i> , <b>2019</b> , 40, 686-690	1.2	1
141	Dual-functional light-emitting perovskite solar cells enabled by soft-covered annealing process. <i>Nano Energy</i> , <b>2019</b> , 61, 251-258	17.1	11
140	Application of thermally coupled energy levels in Er <sup>3+</sup> doped CdMoO <sub>4</sub> phosphors: Enhanced solid-state lighting and non-contact thermometry. <i>Materials Research Bulletin</i> , <b>2019</b> , 117, 63-71	5.1	13
139	Efficiency enhancements in non-fullerene acceptor-based organic solar cells by post-additive soaking. <i>Journal of Materials Chemistry A</i> , <b>2019</b> , 7, 8805-8810	13	11
138	Improved Adhesion of Metal Electrode Layer on Si <sub>3</sub> N <sub>4</sub> Substrate through an All-Wet Process. <i>ECS Journal of Solid State Science and Technology</i> , <b>2019</b> , 8, P159-P164	2	2
137	Simultaneous bifunctional application of solid-state lighting and ratiometric optical thermometer based on double perovskite LiLaMgWO:Er thermochromic phosphors.. <i>RSC Advances</i> , <b>2019</b> , 9, 7189-7195	3.7	20
136	Enhanced Magnetic Properties of FeCo Alloys by Two-Step Electroless Plating. <i>Journal of the Electrochemical Society</i> , <b>2019</b> , 166, D131-D136	3.9	3
135	Open Atmosphere-Processed Stable Perovskite Solar Cells Using Molecular Engineered, Dopant-Free, Highly Hydrophobic Polymeric Hole-Transporting Materials: Influence of Thiophene and Alkyl Chain on Power Conversion Efficiency. <i>Journal of Physical Chemistry C</i> , <b>2019</b> , 123, 8560-8568	3.8	13
134	Syntheses and Properties of Random Copolymers Using Thienyl-Thieno-Indole and Bithiophene-Dicarboximide with Different Ratios. <i>Macromolecular Research</i> , <b>2019</b> , 27, 470-475	1.9	3
133	Hierarchical multi-level block copolymer patterns by multiple self-assembly. <i>Nanoscale</i> , <b>2019</b> , 11, 8433-8441	4.1	12
132	Side-chain influences on the properties of benzodithiophene-alt-di(thiophen-2-yl)quinoxaline polymers for fullerene-free organic solar cells. <i>Polymer</i> , <b>2019</b> , 172, 305-311	3.9	9
131	Full-color tuning in europium doped phosphosilicate phosphors via adjusting crystal field modulation or excitation wavelength. <i>Journal of Alloys and Compounds</i> , <b>2019</b> , 770, 411-418	5.7	8
130	Full-color tuning by controlling the substitution of cations in europium doped Sr <sub>8-x</sub> La <sub>2+x</sub> (PO <sub>4</sub> ) <sub>6-x</sub> (SiO <sub>4</sub> ) <sub>x</sub> O <sub>2</sub> phosphors. <i>Dyes and Pigments</i> , <b>2019</b> , 160, 145-150	4.6	8

129	Cation substitution induced excellent quantum efficiency and thermal stability in (Ca <sub>1-x</sub> Sr <sub>x</sub> ) <sub>9</sub> La(PO <sub>4</sub> ) <sub>7</sub> :Eu <sup>2+</sup> phosphors. <i>New Journal of Chemistry</i> , <b>2019</b> , 43, 12325-12330	3.6	4
128	One-Pot Exfoliation of Graphitic C N Quantum Dots for Blue QLEDs by Methylamine Intercalation. <i>Small</i> , <b>2019</b> , 15, e1902735	11	11
127	Er-Activated NaLaMgWO double perovskite phosphors and their bifunctional application in solid-state lighting and non-contact optical thermometry. <i>Dalton Transactions</i> , <b>2019</b> , 48, 4405-4412	4.3	49
126	Fluorescence spectroscopy-based study of balanced transport of charge carriers in hot-air-annealed perovskites. <i>Spectrochimica Acta - Part A: Molecular and Biomolecular Spectroscopy</i> , <b>2019</b> , 207, 68-72	4.4	1
125	Synthesis and properties of mono- and di-fluoro-substituted 2,3-didodecylquinoxaline-based polymers for polymer solar cells. <i>Journal of Polymer Science Part A</i> , <b>2019</b> , 57, 545-552	2.5	2
124	Improved Moisture Stability of Perovskite Solar Cells with a Surface-Treated PCBM Layer. <i>Solar Rrl</i> , <b>2019</b> , 3, 1800289	7.1	14
123	Effects of inserting keto-functionalized side-chains instead of imide-functionalized side-chain on the pyrrole backbone of 2,5-bis(2-thienyl)pyrrole-based polymers for organic solar cells. <i>Journal of Photochemistry and Photobiology A: Chemistry</i> , <b>2019</b> , 371, 387-394	4.7	2
122	Effects of replacing benzodithiophene with a benzothiadiazole derivative on an efficient wide band-gap benzodithiophene-alt-pyrrolo[3,4-c]pyrrole-1,3(2H,5H)-dione copolymer. <i>Journal of Photochemistry and Photobiology A: Chemistry</i> , <b>2019</b> , 368, 162-167	4.7	5
121	Controlled crystal facet of MAPbI perovskite for highly efficient and stable solar cell via nucleation modulation. <i>Nanoscale</i> , <b>2018</b> , 11, 170-177	7.7	28
120	Synchronized-pressing fabrication of cost-efficient crystalline perovskite solar cells via intermediate engineering. <i>Nanoscale</i> , <b>2018</b> , 10, 9628-9633	7.7	7
119	Photovoltaic polymers based on difluoroquinoxaline units with deep HOMO levels. <i>Journal of Polymer Science Part A</i> , <b>2018</b> , 56, 1489-1497	2.5	8
118	Break the Interacting Bridge between Eu Ions in the 3D Network Structure of CdMoO: Eu Bright Red Emission Phosphor. <i>Scientific Reports</i> , <b>2018</b> , 8, 5936	4.9	19
117	Blue shift behavior of Eu <sup>2+</sup> emission in eulytite-type Sr <sub>3</sub> La(PO <sub>4</sub> ) <sub>3</sub> phosphor based on the release of adjacent Eu <sup>3+</sup> -induced stress. <i>Journal of Alloys and Compounds</i> , <b>2018</b> , 742, 159-164	5.7	21
116	Synthesis and photovoltaic properties of copolymers with a fluoro quinoxaline unit. <i>Journal of Polymer Science Part A</i> , <b>2018</b> , 56, 821-830	2.5	14
115	Photoluminescence properties of SrLaMgTaO <sub>6</sub> double-perovskite thin film. <i>Journal of Alloys and Compounds</i> , <b>2018</b> , 755, 67-72	5.7	2
114	Regioregular dithienosilole- and dithienogermole-based small molecules with symmetric distal/distal orientation of F atoms. <i>Dyes and Pigments</i> , <b>2018</b> , 155, 7-13	4.6	4
113	Highly crystalline new benzodithiophene-Benzothiadiazole copolymer for efficient ternary polymer solar cells with an energy conversion efficiency of over 10%. <i>Journal of Materials Chemistry C</i> , <b>2018</b> , 6, 4281-4289	7.1	21
112	Crystal structure, electronic structure and photoluminescence properties of KLaMgWO <sub>6</sub> :Eu <sup>3+</sup> phosphors. <i>Journal of Luminescence</i> , <b>2018</b> , 197, 270-276	3.8	25

111	Two new tercopolymers incorporating electron-rich benzodithiophene and electron-accepting pyrrolo[3,4-c]pyrrole-1,3-dione and difluorobenzothiadiazole derivatives for polymer solar cells. <i>Polymer Bulletin</i> , <b>2018</b> , 75, 239-253	2.4	3
110	Colloidal GdVO <sub>4</sub> :Eu <sup>3+</sup> @SiO <sub>2</sub> nanocrystals for highly selective and sensitive detection of Cu <sup>2+</sup> ions. <i>Applied Surface Science</i> , <b>2018</b> , 433, 381-387	6.7	13
109	Ca <sub>9</sub> Na <sub>1/3</sub> M <sub>2</sub> (1-x)/ <sub>3</sub> (PO <sub>4</sub> ) <sub>7</sub> :2x/3Eu <sup>3+</sup> (M = Gd, Y): A promising red-emitting phosphor without concentration quenching for optical display applications. <i>Journal of Luminescence</i> , <b>2018</b> , 194, 346-352	3.8	10
108	The tetravalent manganese activated SrLaMgTaO <sub>6</sub> phosphor for w-LED applications. <i>Materials Research Bulletin</i> , <b>2018</b> , 97, 115-120	5.1	31
107	Wide range yellow emission Sr <sub>8</sub> MgLa(PO <sub>4</sub> ) <sub>7</sub> :Eu <sup>2+</sup> , Mn <sup>2+</sup> , Tb <sup>3+</sup> phosphors for near ultraviolet white LEDs. <i>Materials Research Bulletin</i> , <b>2018</b> , 107, 280-285	5.1	14
106	Synthesis of Alkyl-Substituted Quinoxaline-Based Copolymers Along with Photophysical Property Modulation for Polymer Solar Cells. <i>Macromolecular Chemistry and Physics</i> , <b>2018</b> , 219, 1800117	2.6	
105	Bulk Heterojunction-Assisted Grain Growth for Controllable and Highly Crystalline Perovskite Films. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2018</b> , 10, 31366-31373	9.5	11
104	Gate-enhanced photocurrent of (6,5) single-walled carbon nanotube based field effect transistor. <i>Carbon</i> , <b>2018</b> , 139, 709-715	10.4	3
103	Pyrrole N-alkyl side chain effects on the properties of pyrrolo[3,4-c]pyrrole-1,3-dione-based polymers for polymer solar cells. <i>New Journal of Chemistry</i> , <b>2018</b> , 42, 12045-12053	3.6	4
102	The Effect of Charge Compensation on the Luminescence Behavior of Eu <sup>3+</sup> -Doped Perovskite CaZrO <sub>3</sub> Red Phosphor. <i>Nanoscience and Nanotechnology Letters</i> , <b>2018</b> , 10, 703-708	0.8	1
101	Kerf-Less Exfoliated Thin Silicon Wafer Prepared by Nickel Electrodeposition for Solar Cells. <i>Frontiers in Chemistry</i> , <b>2018</b> , 6, 600	5	5
100	Overcoming Fill Factor Reduction in Ternary Polymer Solar Cells by Matching the Highest Occupied Molecular Orbital Energy Levels of Donor Polymers. <i>Advanced Energy Materials</i> , <b>2018</b> , 8, 1702251	21.8	41
99	Thiophene and thieno[3,2-b]thiophene bridged pyrrolo[3,4-c]pyrrole-1,3-dione-based wide band-gap polymers for fullerene and non-fullerene organic solar cells. <i>Organic Electronics</i> , <b>2018</b> , 63, 78-85	3.5	7
98	Molybdenum substitution induced luminescence enhancement in Gd <sub>2</sub> W <sub>1</sub> -MoO <sub>6</sub> :Eu <sup>3+</sup> phosphors for near ultraviolet based solid-state lighting. <i>Journal of Luminescence</i> , <b>2018</b> , 202, 97-106	3.8	24
97	The role of Yb <sup>3+</sup> concentrations on Er <sup>3+</sup> doped SrLaMgTaO <sub>6</sub> double perovskite phosphors. <i>RSC Advances</i> , <b>2017</b> , 7, 1464-1470	3.7	37
96	Enhanced photovoltaic performances of bis(pyrrolo[3,4-c]pyrrole-1,3-dione)-based wide band gap polymer via the incorporation of an appropriate spacer unit between pyrrolo[3,4-c]pyrrole-1,3-dione units. <i>Organic Electronics</i> , <b>2017</b> , 42, 34-41	3.5	7
95	Improvement of photoluminescence properties of Eu <sup>3+</sup> doped SrNb <sub>2</sub> O <sub>6</sub> phosphor by charge compensation. <i>Optical Materials</i> , <b>2017</b> , 66, 220-229	3.3	38
94	The design and synthesis of new double perovskite (Na,Li)YMg(W,Mo)O <sub>6</sub> :Eu <sup>3+</sup> red phosphors for white light-emitting diodes. <i>Journal of Alloys and Compounds</i> , <b>2017</b> , 716, 56-64	5.7	64

93	Enhanced efficiency and stability of polymer solar cells using solution-processed nickel oxide as hole transport material. <i>Current Applied Physics</i> , <b>2017</b> , 17, 1232-1237	2.6	5
92	Tunable single-phased white-emitting Sr <sub>3</sub> Y(PO <sub>4</sub> ) <sub>3</sub> :Dy <sup>3+</sup> phosphors for near-ultraviolet white light-emitting diodes. <i>Ceramics International</i> , <b>2017</b> , 43, 8497-8501	5.1	30
91	Effective hot-air annealing for improving the performance of perovskite solar cells. <i>Solar Energy</i> , <b>2017</b> , 146, 359-367	6.8	16
90	Single-Crystal-like Perovskite for High-Performance Solar Cells Using the Effective Merged Annealing Method. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2017</b> , 9, 12382-12390	9.5	29
89	Synthesis and properties of thiophene- and quinoxaline-based random copolymers for organic photovoltaics. <i>Polymer Bulletin</i> , <b>2017</b> , 74, 2755-2766	2.4	1
88	Influence of alkaline ions on the luminescent properties of Mn <sup>4+</sup> -doped MGe <sub>4</sub> O <sub>9</sub> (M = Li <sub>2</sub> , LiNa and K <sub>2</sub> ) red-emitting phosphors. <i>Journal of Luminescence</i> , <b>2017</b> , 192, 1072-1083	3.8	22
87	Structural, vibrational and band gap tunability of lead-free (1-x)NaBiTO <sub>3</sub> xBiMnO <sub>3</sub> ceramics. <i>Journal of Materials Science: Materials in Electronics</i> , <b>2017</b> , 28, 18508-18514	2.1	
86	Understanding and Tailoring Grain Growth of Lead-Halide Perovskite for Solar Cell Application. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2017</b> , 9, 33925-33933	9.5	31
85	Effect of La <sup>3+</sup> ion doping on the performance of Eu <sup>2+</sup> ions in novel Sr <sub>3</sub> CeNa(PO <sub>4</sub> ) <sub>2</sub> SiO <sub>4</sub> phosphors. <i>Journal of Alloys and Compounds</i> , <b>2017</b> , 724, 763-773	5.7	12
84	Efficient pyrrolo[3,4-c]pyrrole-1,3-dione-based wide band gap polymer for high-efficiency binary and ternary solar cells. <i>Polymer</i> , <b>2017</b> , 125, 182-189	3.9	11
83	Dual-Mode Manipulating Multicenter Photoluminescence in a Single-Phased BaLuSiO:Bi, Eu Phosphor to Realize White Light/Tunable Emissions. <i>Scientific Reports</i> , <b>2017</b> , 7, 15884	4.9	11
82	Tunable up-conversion luminescence from Er <sup>3+</sup> /Tm <sup>3+</sup> /Yb <sup>3+</sup> tri-doped Sr <sub>2</sub> CeO <sub>4</sub> phosphors. <i>Journal of Luminescence</i> , <b>2017</b> , 182, 240-245	3.8	10
81	Pyrrolo[3,4-c]pyrrole-1,3-dione Based Wide Band Gap Polymers for Polymer Solar Cells. <i>Journal of Nanoscience and Nanotechnology</i> , <b>2017</b> , 17, 5556-5561	1.3	2
80	Synthesis and Characterization of Novel D-A Conjugated Polymers Based on Fluorinated Quinoxaline and Thiophene Series for Polymer Solar Cells. <i>Journal of Nanoscience and Nanotechnology</i> , <b>2017</b> , 17, 5802-5805	1.3	1
79	Luminescence and Energy Transfer Process in YNbO <sub>4</sub> :Bi <sup>3+</sup> , Sm <sup>3+</sup> Phosphors. <i>Science of Advanced Materials</i> , <b>2017</b> , 9, 349-352	2.3	8
78	Luminescence and energy transfer in a color tunable CaY <sub>4</sub> (SiO <sub>4</sub> ) <sub>3</sub> O:Ce <sup>3+</sup> , Mn <sup>2+</sup> , Tb <sup>3+</sup> phosphor for application in white LEDs. <i>RSC Advances</i> , <b>2016</b> , 6, 79317-79324	3.7	13
77	Effects of the incorporation of bithiophene instead of thiophene between the pyrrolo[3,4-c]pyrrole-1,3-dione units of a bis(pyrrolo[3,4-c]pyrrole-1,3-dione)-based polymer for polymer solar cells. <i>New Journal of Chemistry</i> , <b>2016</b> , 40, 10153-10160	3.6	6
76	Successful incorporation of optical spacer and additive solvent for enhancing the photocurrent of polymer solar cell. <i>Solar Energy Materials and Solar Cells</i> , <b>2016</b> , 153, 131-137	6.4	5

75	Effects of the incorporation of an additional pyrrolo[3,4-c]pyrrole-1,3-dione unit on the repeating unit of highly efficient large band gap polymers containing benzodithiophene and pyrrolo[3,4-c]pyrrole-1,3-dione derivatives. <i>Organic Electronics</i> , <b>2016</b> , 30, 253-264	3.5	12
74	Synthesis and photoluminescence of Bi <sup>3+</sup> ,Eu <sup>3+</sup> doped CdWO <sub>4</sub> phosphors: application of energy level rules of Bi <sup>3+</sup> ions. <i>New Journal of Chemistry</i> , <b>2016</b> , 40, 3552-3560	3.6	18
73	Conjugated polymers containing pyrimidine with electron withdrawing substituents for organic photovoltaics with high open-circuit voltage. <i>Polymer</i> , <b>2016</b> , 83, 50-58	3.9	8
72	6-(2-Thienyl)-4H-thieno[3,2-b]indole based conjugated polymers with low bandgaps for organic solar cells. <i>Synthetic Metals</i> , <b>2016</b> , 213, 25-33	3.6	11
71	Synthesis and Photovoltaic Properties of Copolymers with Fluorinated Quinoxaline and Fluorene Moiety. <i>Applied Chemistry for Engineering</i> , <b>2016</b> , 27, 467-471		
70	Imide-linked alkyl chain influence on the properties of pyrrole-based imide-functionalized polymers containing pyrrolo[3,4-c]pyrrole-1,3(2H,5H)-dione and benzodithiophene units for polymer solar cells. <i>Synthetic Metals</i> , <b>2016</b> , 220, 34-40	3.6	3
69	Syntheses of pyrimidine-based polymers containing electron-withdrawing substituent with high open circuit voltage and applications for polymer solar cells. <i>Journal of Polymer Science Part A</i> , <b>2016</b> , 54, 771-784	2.5	6
68	Elaboration, Structure and Luminescence of Sphere-Like CaF <sub>2</sub> :RE Sub-Microparticles by Ionic Liquids Based Hydrothermal Process. <i>Journal of Nanoscience and Nanotechnology</i> , <b>2016</b> , 16, 1146-50	1.3	4
67	Property modulation of ternary copolymer via the diverse arrangements of two different repeating units for polymer solar cells and thin film transistors. <i>Polymer</i> , <b>2016</b> , 95, 18-25	3.9	6
66	Benzodithiophene based ternary copolymer containing covalently bonded pyrrolo[3,4-c]pyrrole-1,3-dione and benzothiadiazole for efficient polymer solar cells utilizing high energy sunlight. <i>Organic Electronics</i> , <b>2016</b> , 38, 283-291	3.5	7
65	Palladium-Assisted Reaction of 2,2-Dialkylbenzimidazole and Its Implication on Organic Solar Cell Performances. <i>Journal of Physical Chemistry C</i> , <b>2015</b> , 119, 14063-14075	3.8	10
64	Crystal structure and two types of Eu <sup>3+</sup> -centered emission in Eu <sup>3+</sup> doped Ca <sub>2</sub> V <sub>2</sub> O <sub>7</sub> . <i>Journal of Luminescence</i> , <b>2015</b> , 161, 318-322	3.8	8
63	A red-emitting perovskite-type SrLa (1 $\bar{1}$ ) MgTaO <sub>6</sub> : x Eu <sup>3+</sup> for white LED application. <i>Journal of Luminescence</i> , <b>2015</b> , 167, 381-385	3.8	39
62	Synthesis and photoluminescence of novel 3D flower-like CaMoO <sub>4</sub> architectures hierarchically self-assembled with tetragonal bipyramid nanocrystals. <i>Optical Materials</i> , <b>2015</b> , 43, 10-17	3.3	12
61	Property modulation of dithienosilole-based polymers via the incorporation of structural isomers of imide- and lactam-functionalized pyrrolo[3,4-c]pyrrole units for polymer solar cells. <i>Polymer</i> , <b>2015</b> , 65, 243-252	3.9	13
60	Opto-electrical, charge transport and photovoltaic property modulation of 2,5-di(2-thienyl)pyrrole-based polymers via the incorporation of alkyl, aryl and cyano groups on the pyrrole unit. <i>Polymer Bulletin</i> , <b>2015</b> , 72, 1899-1919	2.4	2
59	Benzodithiophene-Based Broad Absorbing Random Copolymers Incorporating Weak and Strong Electron Accepting Imide and Lactam Functionalized Pyrrolo[3,4-c]pyrrole Derivatives for Polymer Solar Cells. <i>Macromolecular Chemistry and Physics</i> , <b>2015</b> , 216, 996-1007	2.6	12
58	Modulation of the properties of pyrrolo[3,4-c]pyrrole-1,4-dione based polymers containing 2,5-di(2-thienyl)pyrrole derivatives with different substitutions on the pyrrole unit. <i>New Journal of Chemistry</i> , <b>2015</b> , 39, 4658-4669	3.6	8



57	Photoluminescence properties, crystal structure and electronic structure of a Sr <sub>2</sub> CaWO <sub>6</sub> :Sm <sup>3+</sup> red phosphor. <i>RSC Advances</i> , <b>2015</b> , 5, 89290-89298	3.7	29
56	Photocurrent enhancement of an efficient large band gap polymer incorporating benzodithiophene and weak electron accepting pyrrolo[3,4-b]pyrrole-1,3-dione derivatives via the insertion of a strong electron accepting thieno[3,4-b]thiophene unit. <i>Polymer</i> , <b>2015</b> , 80, 95-103	3.9	8
55	Tuning the physical properties of pyrrolo[3,4-c]pyrrole-1,3-dione-based highly efficient large band gap polymers via the chemical modification on the polymer backbone for polymer solar cells. <i>RSC Advances</i> , <b>2015</b> , 5, 99217-99227	3.7	11
54	Tandem solar cells made from amorphous silicon and polymer bulk heterojunction sub-cells. <i>Advanced Materials</i> , <b>2015</b> , 27, 298-302	2.4	17
53	Key chemical parameters related to the width of the charge transfer band and the emission intensity of 5D <sub>0</sub> -7F <sub>2</sub> in Eu <sup>3+</sup> doped Ln <sub>2</sub> O <sub>3</sub> . <i>Journal of Alloys and Compounds</i> , <b>2015</b> , 620, 324-328	5.7	10
52	Enhanced efficiency of bilayer polymer solar cells by the solvent treatment method. <i>Synthetic Metals</i> , <b>2015</b> , 199, 408-412	3.6	14
51	Dual-Mode Luminescence with Broad Near UV and Blue Excitation Band from Sr <sub>2</sub> CaMoO <sub>6</sub> :Sm <sup>3+</sup> Phosphor for White LEDs. <i>Journal of Physical Chemistry C</i> , <b>2015</b> , 119, 15517-15525	3.8	95
50	Synthesis and Properties of Copolymer with Carbazole and F-Quinoxaline Units for OPVs. <i>Molecular Crystals and Liquid Crystals</i> , <b>2015</b> , 620, 100-106	0.5	3
49	Switchable polarity in polymer solar cells using conjugated polyelectrolyte. <i>Synthetic Metals</i> , <b>2014</b> , 188, 1-5	3.6	2
48	Highly efficient imide functionalized pyrrolo[3,4-c]pyrrole-1,3-dione-based random copolymer containing thieno[3,4-c]pyrrole-4,6-dione and benzodithiophene for simple structured polymer solar cells. <i>Journal of Materials Chemistry A</i> , <b>2014</b> , 2, 20126-20132	1.3	38
47	Simultaneous realization of two approaches to white light in single-component phosphors. <i>Optics Express</i> , <b>2014</b> , 22, 25500-5	3.3	5
46	Pyrrolo[3,4-c]pyrrole-1,3-dione-based large band gap polymers containing benzodithiophene derivatives for highly efficient simple structured polymer solar cells. <i>Journal of Polymer Science Part A</i> , <b>2014</b> , 52, n/a-n/a	2.5	4
45	Synthesis and Photovoltaic Properties of Copolymer Containing Fused Donor and Difluoroquinoxaline Moieties. <i>Bulletin of the Korean Chemical Society</i> , <b>2014</b> , 35, 2963-2968	1.2	3
44	Synthesis and Photovoltaic Properties of Quinoxaline-Based Semiconducting Polymers with Fluoro Atoms. <i>Bulletin of the Korean Chemical Society</i> , <b>2014</b> , 35, 2245-2250	1.2	5
43	Correlation Between Lateral Photovoltaic Effect and Conductivity in p-type Silicon Substrates. <i>Bulletin of the Korean Chemical Society</i> , <b>2013</b> , 34, 1845-1847	1.2	1
42	Synthesis and characterization of dimethyl-benzimidazole based low bandgap copolymers for OPVs. <i>Synthetic Metals</i> , <b>2012</b> , 162, 988-994	3.6	7
41	Synthesis and characterization of polycyclopentaphenanthrene with carbazole or oxidiazole pendant units. <i>Polymer Journal</i> , <b>2012</b> , 44, 347-352	2.7	3
40	Synthesis and characterization of phenanthrothiadiazole-based conjugated polymer for photovoltaic device. <i>Synthetic Metals</i> , <b>2012</b> , 162, 1936-1943	3.6	3

39	Light-soaking issue in polymer solar cells: Photoinduced energy level alignment at the sol-gel processed metal oxide and indium tin oxide interface. <i>Journal of Applied Physics</i> , <b>2012</b> , 111, 114511	2.5	106
38	Regioselective 1,2,3-bisazfulleroid: doubly N-bridged bisimino-PCBM for polymer solar cells. <i>Journal of Materials Chemistry</i> , <b>2012</b> , 22, 22958		9
37	Anthradithiophene-thiophene copolymers with broad UV-vis absorption for organic solar cells and field-effect transistors. <i>Journal of Polymer Science Part A</i> , <b>2012</b> , 50, 4119-4126	2.5	10
36	Highly transparent polymer light-emitting diode using modified aluminum-doped zinc oxide top electrode. <i>Applied Physics Letters</i> , <b>2012</b> , 100, 133306	3.4	8
35	Synthesis and characterization of 2H-benzimidazole- and terthiophene-based polymer for organic photovoltaics. <i>Synthetic Metals</i> , <b>2011</b> , 161, 307-312	3.6	6
34	Increasing of stability depended on the position of alkoxy group in PPV. <i>Synthetic Metals</i> , <b>2011</b> , 161, 1186-1193	3.6	5
33	Syntheses and characterization of new low-band gap polymers containing 4H-cyclopenta[def]phenanthrene unit and 4,7-di(thien-2-yl)-2H-benzimidazole-2-spirocyclohexane for photovoltaic device. <i>Synthetic Metals</i> , <b>2011</b> , 161, 1336-1342	3.6	6
32	Color stability of conjugated polymer with difluoro groups in vinylene units. <i>Macromolecular Research</i> , <b>2011</b> , 19, 753-756	1.9	1
31	Syntheses and characterization of carbazole based new low-band gap copolymers containing highly soluble benzimidazole derivatives for solar cell application. <i>Journal of Polymer Science Part A</i> , <b>2011</b> , 49, 369-380	2.5	20
30	Novel Film-Casting Method for High-Performance Flexible Polymer Electrodes. <i>Advanced Functional Materials</i> , <b>2011</b> , 21, 487-493	15.6	80
29	Synthesis and characterization of low-bandgap copolymers based on dihexyl-2H-benzimidazole and terthiophene. <i>Synthetic Metals</i> , <b>2010</b> , 160, 2618-2622	3.6	8
28	A low-bandgap alternating copolymer containing the dimethylbenzimidazole moiety. <i>Journal of Materials Chemistry</i> , <b>2010</b> , 20, 6517		63
27	Semiconducting polymer photodetectors with electron and hole blocking layers: high detectivity in the near-infrared. <i>Sensors</i> , <b>2010</b> , 10, 6488-96	3.8	82
26	A thermally stable semiconducting polymer. <i>Advanced Materials</i> , <b>2010</b> , 22, 1253-7	24	149
25	Low-bandgap poly(4H-cyclopenta[def]phenanthrene) derivatives with 4,7-dithienyl-2,1,3-benzothiadiazole unit for photovoltaic cells. <i>Polymer</i> , <b>2010</b> , 51, 390-396	3.9	34
24	Conjugated copolymers based on dihexyl-benzimidazole moiety for organic photovoltaics. <i>Polymer</i> , <b>2010</b> , 51, 5385-5391	3.9	24
23	Efficiency enhancement in polymer optoelectronic devices by introducing titanium sub-oxide layer. <i>Current Applied Physics</i> , <b>2010</b> , 10, S528-S531	2.6	9
22	Synthesis and characterization of low-bandgap copolymers based on dihexyl-2h-benzimidazole and cyclopentadithiophene. <i>Journal of Polymer Science Part A</i> , <b>2010</b> , 48, 4567-4573	2.5	23

21	Bulk heterojunction solar cells with internal quantum efficiency approaching 100%. <i>Nature Photonics</i> , <b>2009</b> , 3, 297-302	33.9	3689
20	Flexible light-emitting three-terminal device with color-controlled emission. <i>Organic Electronics</i> , <b>2009</b> , 10, 426-431	3.5	7
19	Novel conjugated polymers employing the binding of polyfluorene derivatives and C60. <i>Synthetic Metals</i> , <b>2009</b> , 159, 1529-1537	3.6	9
18	Titanium suboxide as an optical spacer in polymer solar cells. <i>Applied Physics Letters</i> , <b>2009</b> , 95, 013302	3.4	121
17	Isomeric iminofullerenes as acceptors in bulk heterojunction organic solar cells. <i>Journal of Materials Chemistry</i> , <b>2009</b> , 19, 5624		41
16	Syntheses and Characterization of Alkoxyphenyl-Substituted PCPP with Stabilized Blue Emission and Its Derivatives with Ketone Unit in the Main Chain. <i>Macromolecules</i> , <b>2008</b> , 41, 8324-8331	5.5	11
15	Synthesis and properties of various PPV derivatives with phenyl substituents. <i>Polymer</i> , <b>2008</b> , 49, 4559-4568	3.9	11
14	A novel conjugated polymer based on cyclopenta[def]phenanthrene backbone with spiro group. <i>Polymer</i> , <b>2008</b> , 49, 5643-5649	3.9	12
13	Novel Electroluminescent PPV Copolymers Containing Si-phenyl and Difluorovinylene Units. <i>Polymer Journal</i> , <b>2008</b> , 40, 965-970	2.7	1
12	Stabilized Polymers with Novel Indenoindene Backbone against Photodegradation for LEDs and Solar Cells. <i>Macromolecules</i> , <b>2008</b> , 41, 7296-7305	5.5	67
11	Increased Efficiencies of the Copolymers with Fluoro Groups in Vinylene Units. <i>Macromolecules</i> , <b>2007</b> , 40, 6799-6806	5.5	18
10	Synthesis and electroluminescent properties of copolymers based on PPV with fluoro groups in vinylene units. <i>Polymer</i> , <b>2007</b> , 48, 1541-1549	3.9	19
9	Metallic transport in polyaniline. <i>Nature</i> , <b>2006</b> , 441, 65-8	50.4	735
8	Electroluminescence in polymer-fullerene photovoltaic cells. <i>Applied Physics Letters</i> , <b>2005</b> , 86, 183502	3.4	63
7	Stabilized Blue Emission from Organic Light-Emitting Diodes Using Poly(2,6-(4,4-bis(2-ethylhexyl)-4H-cyclopenta[def]phenanthrene)). <i>Macromolecules</i> , <b>2005</b> , 38, 6285-6289	5.5	65
6	Syntheses and properties of electroluminescent polyfluorene-based conjugated polymers, containing oxadiazole and carbazole units as pendants, for LEDs. <i>Polymer</i> , <b>2005</b> , 46, 12158-12165	3.9	55
5	Novel Electroluminescent Polymers with Fluoro Groups in Vinylene Units. <i>Macromolecules</i> , <b>2004</b> , 37, 6711-6715	5.5	59
4	Design, Synthesis, and Electroluminescent Property of CNBPoly(dihexylfluorenevinylene) for LEDs. <i>Macromolecules</i> , <b>2003</b> , 36, 6970-6975	5.5	62

3	Substituent position-induced color tunability in polymer light-emitting diodes. <i>Applied Physics Letters</i> , <b>2002</b> , 81, 1732-1734	3.4	3
2	Color-Tunable Electroluminescent Polymers by Substituents on the Poly(p-phenylenevinylene) Derivatives for Light-Emitting Diodes. <i>Chemistry of Materials</i> , <b>2002</b> , 14, 5090-5097	9.6	36
1	Small molecules based difluoroquinoxaline for organic solar cells. <i>Molecular Crystals and Liquid Crystals</i> , 1-7	0.5	