# Bongtae Han

#### List of Publications by Citations

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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.

3,038 176 27 50 h-index g-index citations papers 216 3,652 2.1 5.41 L-index ext. citations avg, IF ext. papers

#	Paper	IF	Citations
176	Advanced iterative algorithm for phase extraction of randomly phase-shifted interferograms. <i>Optics Letters</i> , <b>2004</b> , 29, 1671-3	3	362
175	High Sensitivity Moir□ <i>Mechanical Engineering Series</i> , <b>1994</b> ,	0.3	325
174	Physics-of-Failure, Condition Monitoring, and Prognostics of Insulated Gate Bipolar Transistor Modules: A Review. <i>IEEE Transactions on Power Electronics</i> , <b>2015</b> , 30, 2413-2426	7.2	242
173	Thermal Deformation Analysis of Various Electronic Packaging Products by Moire[] and Microscopic Moire[] Interferometry. <i>Journal of Electronic Packaging, Transactions of the ASME</i> , <b>1995</b> , 117, 185-191	2	90
172	Characterization of hygroscopic swelling behavior of mold compounds and plastic packages. <i>IEEE Transactions on Components and Packaging Technologies</i> , <b>2004</b> , 27, 499-506		84
171	Moirlinterferometry for engineering mechanics: Current practices and future developments. Journal of Strain Analysis for Engineering Design, 2001, 36, 101-117	1.3	67
170	Autocorrelation-based time synchronous averaging for condition monitoring of planetary gearboxes in wind turbines. <i>Mechanical Systems and Signal Processing</i> , <b>2016</b> , 70-71, 161-175	7.8	62
169	Recent Advancements of Moire and Microscopic Moire Interferometry for Thermal Deformation Analyses of Microelectronics Devices. <i>Experimental Mechanics</i> , <b>1998</b> , 38, 278-288	2.6	60
168	Study of Residual Stress Distribution by a Combined Method of Moire Interferometry and Incremental Hole Drilling, Part I: Theory. <i>Journal of Applied Mechanics, Transactions ASME</i> , <b>1998</b> , 65, 837	-843	55
167	Higher sensitivity moire interferometry for micromechanics studies. <i>Optical Engineering</i> , <b>1992</b> , 31, 1517	1.1	51
166	Immersion interferometer for microscopic moirlinterferometry. Experimental Mechanics, 1992, 32, 38-4	12.6	50
165	Recent advancements of moirland microscopic moirlinterferometry for thermal deformation analyses of microelectronics devices. <i>Experimental Mechanics</i> , <b>1998</b> , 38, 278-288	2.6	47
164	Advanced iterative algorithm for randomly phase-shifted interferograms with intra- and inter-frame intensity variations. <i>Optics and Lasers in Engineering</i> , <b>2007</b> , 45, 274-280	4.6	47
163	On Moisture Diffusion Modeling Using Thermal-Moisture Analogy. <i>Journal of Electronic Packaging, Transactions of the ASME</i> , <b>2007</b> , 129, 421-426	2	46
162	THERMAL STRESSES IN MICROELECTRONICS SUBASSEMBLIES: QUANTITATIVE CHARACTERIZATION USING PHOTOMECHANICS METHODS. <i>Journal of Thermal Stresses</i> , <b>2003</b> , 26, 583-6	6 <del>13</del>	43
161	Verification of Numerical Models Used in Microelectronics Packaging Design by Interferometric Displacement Measurement Methods. <i>Journal of Electronic Packaging, Transactions of the ASME</i> , <b>1996</b> , 118, 157-163	2	40
160	Direct Submount Cooling of High-Power LEDs. <i>IEEE Transactions on Components and Packaging Technologies</i> , <b>2010</b> , 33, 698-712		39

# (2010-2002)

159	OBSERVING REAL-TIME THERMAL DEFORMATIONS IN ELECTRONIC PACKAGING. <i>Experimental Techniques</i> , <b>2002</b> , 26, 25-29	1.4	39	
158	Advanced Thermal-Moisture Analogy Scheme for Anisothermal Moisture Diffusion Problem. <i>Journal of Electronic Packaging, Transactions of the ASME</i> , <b>2008</b> , 130,	2	38	
157	Recent Applications of Moir Interferometry. Experimental Mechanics, 2010, 50, 1129-1147	2.6	37	
156	Study of Residual Stress Distribution by a Combined Method of Moire Interferometry and Incremental Hole Drilling, Part II: Implementation. <i>Journal of Applied Mechanics, Transactions ASME</i> , <b>1998</b> , 65, 844-850	2.7	37	
155	Determination of an effective coefficient of thermal expansion of electronic packaging components: a whole-field approach. <i>IEEE Transactions on Components and Packaging Technologies</i> , <b>1996</b> , 19, 240-247		37	
154	Thermal Stresses in a Bimaterial Joint: An Experimental Analysis. <i>Journal of Applied Mechanics, Transactions ASME</i> , <b>1994</b> , 61, 192-198	2.7	30	
153	Development of real time/variable sensitivity warpage measurement technique and its application to plastic ball grid array package. <i>IEEE Transactions on Electronics Packaging Manufacturing</i> , <b>1999</b> , 22, 63-70		29	
152	Interferometric methods with enhanced sensitivity by optical/digital fringe multiplication. <i>Applied Optics</i> , <b>1993</b> , 32, 4713-8	1.7	28	
151	A localized hybrid method of stress analysis: A combination of moirlinterferometry and FEM. <i>Experimental Mechanics</i> , <b>1990</b> , 30, 195-200	2.6	28	
150	Hierarchical Life Prediction Model for Actively Cooled LED-Based Luminaire. <i>IEEE Transactions on Components and Packaging Technologies</i> , <b>2010</b> , 33, 728-737		27	
149	Deformation Mechanism of Two-Phase Solder Column Interconnections Under Highly Accelerated Thermal Cycling Condition: An Experimental Study. <i>Journal of Electronic Packaging, Transactions of the ASME</i> , <b>1997</b> , 119, 189-196	2	26	
148	On the design parameters of flip-chip PBGA package assembly for optimum solder ball reliability. <i>IEEE Transactions on Components and Packaging Technologies</i> , <b>2001</b> , 24, 300-307		24	
147	Simultaneous Measurement of Effective Chemical Shrinkage and Modulus Evolutions During Polymerization. <i>Experimental Mechanics</i> , <b>2011</b> , 51, 1155-1169	2.6	22	
146	MEASUREMENT OF THE HYGROSCOPIC SWELLING COEFFICIENT IN MOLD COMPOUNDS USING MOIR[INTERFEROMETRY. <i>Experimental Techniques</i> , <b>2003</b> , 27, 40-44	1.4	22	
145	Micro-Mechanical Deformation Analysis of Surface Laminar Circuit in Organic Flip-Chip Package: An Experimental Study. <i>Journal of Electronic Packaging, Transactions of the ASME</i> , <b>2000</b> , 122, 294-300	2	22	
144	Warpage Measurement on Dielectric Rough Surfaces of Microelectronics Devices by Far Infrared Fizeau Interferometry1. <i>Journal of Electronic Packaging, Transactions of the ASME</i> , <b>2000</b> , 122, 227-232	2	22	
143	Analytical/Experimental Hybrid Approach Based on Spectral Power Distribution for Quantitative Degradation Analysis of Phosphor Converted LED. <i>IEEE Transactions on Device and Materials Reliability</i> , <b>2014</b> , 14, 365-374	1.6	21	
142	. IEEE Transactions on Components and Packaging Technologies, <b>2010</b> , 33, 809-818		21	

141	Temperature Dependent Deformation Analysis of Ceramic Ball Grid Array Package Assembly Under Accelerated Thermal Cycling Condition. <i>Journal of Electronic Packaging, Transactions of the ASME</i> , <b>2004</b> , 126, 41-47	2	21
140	Thick Composites in Compression: An Experimental Study of Micromechanical Behavior and Smeared Engineering Properties. <i>Journal of Composite Materials</i> , <b>1992</b> , 26, 1930-1944	2.7	21
139	Moir [Methods for Engineering and Science [Moir [Interferometry and Shadow Moir [2000, 151-196		21
138	Optimum design domain of LED-based solid state lighting considering cost, energy consumption and reliability. <i>Microelectronics Reliability</i> , <b>2013</b> , 53, 435-442	1.2	20
137	On Ultra-Fine Leak Detection of Hermetic Wafer Level Packages. <i>IEEE Transactions on Advanced Packaging</i> , <b>2008</b> , 31, 14-21		20
136	Error analysis of the phase-shifting technique when applied to shadow moir [Applied Optics, 2006, 45, 1124-33	1.7	20
135	Inverse method to determine elastic constants using a circular disk and moir[Interferometry. Experimental Mechanics, 2005, 45, 27-34	2.6	20
134	Algorithm to Determine the Knee Point on Capacity Fade Curves of Lithium-Ion Cells. <i>Energies</i> , <b>2019</b> , 12, 2910	3.1	19
133	Measurement of the Hygroscopic Swelling Coefficient of Thin Film Polymers Used in Semiconductor Packaging. <i>IEEE Transactions on Components and Packaging Technologies</i> , <b>2010</b> , 33, 340-	-346	18
132	Nonlinear Stress Modeling Scheme to Analyze Semiconductor Packages Subjected to Combined Thermal and Hygroscopic Loading. <i>Journal of Electronic Packaging, Transactions of the ASME</i> , <b>2008</b> , 130,	2	18
131	Integrated Measurement Technique for Curing Process-Dependent Mechanical Properties of Polymeric Materials Using Fiber Bragg Grating. <i>Experimental Mechanics</i> , <b>2008</b> , 48, 107-117	2.6	18
130	Inverse Method to Determine Elastic Constants Using a Circular Disk and Moire Interferometry. <i>Experimental Mechanics</i> , <b>2005</b> , 45, 27-34	2.6	18
129	Spectral power distribution deconvolution scheme for phosphor-converted white light-emitting diode using multiple Gaussian functions. <i>Applied Optics</i> , <b>2013</b> , 52, 1016-24	1.7	17
128	Effect of junction temperature on heat dissipation of high power light emitting diodes. <i>Journal of Applied Physics</i> , <b>2016</b> , 119, 125104	2.5	16
127	Life prediction of LED-based recess downlight cooled by synthetic jet. <i>Microelectronics Reliability</i> , <b>2012</b> , 52, 937-948	1.2	15
126	A strain range based model for life assessment of Pb-free SAC solder interconnects		15
125	Characterization of flexural and thermo-mechanical behavior of plastic ball grid package assembly using moir Interferometry. <i>Microelectronics Reliability</i> , <b>2005</b> , 45, 637-646	1.2	14
124	Far-infrared fizeau interferometry. <i>Applied Optics</i> , <b>2001</b> , 40, 4981-7	1.7	14

### (2001-2014)

123	Board level reliability analysis of chip resistor assemblies under thermal cycling: A comparison study between SnPb and SnAgCu. <i>Journal of Mechanical Science and Technology</i> , <b>2014</b> , 28, 879-886	1.6	13
122	MoirInterferometry. <i>Mechanical Engineering Series</i> , <b>1994</b> , 135-226	0.3	13
121	Coupled Thermal and Thermo-Mechanical Design Assessment of High Power Light Emitting Diode. <i>IEEE Transactions on Components and Packaging Technologies</i> , <b>2010</b> , 33, 688-697		12
120	MoirInterferometry. Springer Handbooks, <b>2008</b> , 627-654	1.3	12
119	Measurement of effective chemical shrinkage and equilibrium modulus of silicone elastomer used in potted electronic system. <i>Journal of Materials Science</i> , <b>2014</b> , 49, 8301-8310	4.3	11
118	Numerical study on the mixing performance of a ring-type electroosmotic micromixer with different obstacle configurations. <i>Journal of Nanoscience and Nanotechnology</i> , <b>2012</b> , 12, 4523-30	1.3	11
117	High Sensitivity Shadow Moir Using Nonzero-Order Talbot Distance. <i>Experimental Mechanics</i> , <b>2006</b> , 46, 543-554	2.6	11
116	Contrast of shadow moire[] at high-order Talbot distances. <i>Optical Engineering</i> , <b>2005</b> , 44, 028002	1.1	11
115	Method for predicting junction temperature distribution in a high-power laser diode bar. <i>Applied Optics</i> , <b>2016</b> , 55, 7487-96	0.2	11
114	Moisture Ingress, Behavior, and Prediction Inside Semiconductor Packaging: A Review. <i>Journal of Electronic Packaging, Transactions of the ASME</i> , <b>2017</b> , 139,	2	10
113	Generalized Hybrid Modeling to Determine Chemical Shrinkage and Modulus Evolutions at Arbitrary Temperatures. <i>Experimental Mechanics</i> , <b>2013</b> , 53, 1783-1790	2.6	10
112	A compact, robust and versatile moirlinterferometer. <i>Optics and Lasers in Engineering</i> , <b>1995</b> , 23, 29-40	4.6	10
111	Numerical/Experimental Hybrid Approach to Predict Warpage of Thin Advanced Substrates 2018,		9
110	Dual-Configuration Fiber Bragg Grating Sensor Technique to Measure Coefficients of Thermal Expansion and Hygroscopic Swelling. <i>Experimental Mechanics</i> , <b>2014</b> , 54, 593-603	2.6	9
109	Measurements of true leak rates of MEMS packages. Sensors, 2012, 12, 3082-104	3.8	9
108	Hermeticity Evaluation of Polymer-Sealed MEMS Packages by Gas Diffusion Analysis. <i>Journal of Microelectromechanical Systems</i> , <b>2009</b> , 18, 577-587	2.5	9
107	Ideal laminate theory for water transport analysis of metal-coated polymer films. <i>Applied Physics Letters</i> , <b>2008</b> , 93, 133307	3.4	9
106	MEASUREMENT OF THERMAL EXPANSION COEFFICIENT OF FLEXIBLE SUBSTRATE BY MOIR INTERFEROMETRY. <i>Experimental Techniques</i> , <b>2001</b> , 25, 22-25	1.4	9

105	Towards prognostics and health monitoring: The potential of fault detection by piezoresistive silicon stress sensor <b>2016</b> ,		9
104	Advanced Mechanical/Optical Configuration of Real-Time MoirInterferometry for Thermal Deformation Analysis of Fan-Out Wafer Level Package. <i>IEEE Transactions on Components, Packaging and Manufacturing Technology</i> , <b>2018</b> , 8, 764-772	1.7	8
103	In-situ investigation of EMC relaxation behavior using piezoresistive stress sensor. <i>Microelectronics Reliability</i> , <b>2016</b> , 62, 58-62	1.2	8
102	Adhesion and Puncture Strength of Polyurethane Coating Used to Mitigate Tin Whisker Growth. Journal of Electronic Packaging, Transactions of the ASME, <b>2014</b> , 136,	2	8
101	Thermo-optical modeling of polymer fiber Bragg grating illuminated by light emitting diode. <i>International Journal of Heat and Mass Transfer</i> , <b>2007</b> , 50, 5241-5248	4.9	8
100	Micromechanical deformation analysis of beta alloy titanium in elastic and elastic/plastic tension. <i>Experimental Mechanics</i> , <b>1996</b> , 36, 120-126	2.6	8
99	Geometric moirlimethods with enhanced sensitivity by optical/digital fringe multiplication. <i>Experimental Mechanics</i> , <b>1993</b> , 33, 195-200	2.6	8
98	Measurement of Elastic Properties of Epoxy Molding Compound by Single Cylindrical Configuration with Embedded Fiber Bragg Grating Sensor. <i>Experimental Mechanics</i> , <b>2017</b> , 57, 313-324	2.6	7
97	Prognostic approaches for the wirebond failure prediction in power semiconductors: A case study using DPAK package <b>2015</b> ,		7
96	Development of a High-Lumen Solid State Down Light Application. <i>IEEE Transactions on Components and Packaging Technologies</i> , <b>2010</b> , 33, 668-679		7
95	Analytical solutions of gas transport problems in inorganic/organic hybrid structures for gas barrier applications. <i>Journal of Applied Physics</i> , <b>2009</b> , 105, 093532	2.5	7
94	THE TILTED-PLATE METHOD FOR INTRODUCING CARRIER FRINGES OF EXTENSION IN MOIR INTERFEROMETRY. <i>Experimental Techniques</i> , <b>2008</b> , 13, 25-29	1.4	7
93	On the applicability of MIL-Spec-based helium fine leak test to packages with sub-micro liter cavity volumes. <i>Microelectronics Reliability</i> , <b>2008</b> , 48, 1815-1821	1.2	7
92	Measurement of anisotropic coefficients of thermal expansion of SAC305 solder using surface strains of single grain with arbitrary orientation. <i>Acta Materialia</i> , <b>2018</b> , 156, 196-204	8.4	7
91	Assembly yield prediction of plastically encapsulated packages with a large number of manufacturing variables by advanced approximate integration method. <i>Microelectronics Reliability</i> , <b>2017</b> , 78, 319-330	1.2	6
90	. IEEE Sensors Journal, <b>2019</b> , 19, 9139-9148	4	6
89	\$In Situ\$ Failure Detection of Electronic Control Units Using Piezoresistive Stress Sensor. <i>IEEE Transactions on Components, Packaging and Manufacturing Technology</i> , <b>2018</b> , 8, 750-763	1.7	6
88	Phase-shifting in achromatic moirlinterferometry system. <i>Optics Express</i> , <b>2007</b> , 15, 9970-6	3.3	6

# (2018-2007)

87	Thermo-optical modeling of an intrinsically heated polymer fiber Bragg grating. <i>Applied Optics</i> , <b>2007</b> , 46, 4357-70	1.7	6
86	Real-time observation of thermally induced warpage of flip-chip package using far-infrared Fizeau interferometry. <i>Experimental Mechanics</i> , <b>2004</b> , 44, 628-633	2.6	6
85	In-situ investigation of EMC relaxation behavior using piezoresistive stress sensor 2015,		5
84	Probabilistic Lifetime Prediction of Electronic Packages Using Advanced Uncertainty Propagation Analysis and Model Calibration. <i>IEEE Transactions on Components, Packaging and Manufacturing Technology</i> , <b>2016</b> , 6, 238-248	1.7	5
83	Towards prognostics and health monitoring: The potential of fault detection by piezoresistive silicon stress sensor. <i>Microelectronics Reliability</i> , <b>2017</b> , 74, 165-172	1.2	5
82	Deconvolution of spectral power distribution of high-power laser diode arrays. <i>Applied Optics</i> , <b>2017</b> , 56, 5590-5598	1.7	5
81	Analytical and molecular simulation study of water condensation behavior in mesopores with closed ends. <i>Journal of Chemical Physics</i> , <b>2010</b> , 132, 104702	3.9	5
80	Real-time warpage measurement of electronic components with variable sensitivity		5
79	Measurement of Hygroscopic Swelling in Mold Compounds and Its Effect on PEM Reliability <b>2003</b> , 497		5
78	Degradation Estimation and Prediction of Electronic Packages using Data Driven Approach. <i>IEEE Transactions on Industrial Electronics</i> , <b>2021</b> , 1-1	8.9	5
77	Volumetric effective cure shrinkage measurement of dual curable adhesives by fiber Bragg grating sensor. <i>Journal of Materials Science</i> , <b>2020</b> , 55, 9655-9664	4.3	4
76	Hybrid Approach to Conduct Failure Prognostics of Automotive Electronic Control Unit Using Stress Sensor as In Situ Load Counter. <i>IEEE Transactions on Components, Packaging and Manufacturing Technology</i> , <b>2019</b> , 9, 28-38	1.7	4
75	. IEEE Transactions on Components, Packaging and Manufacturing Technology, <b>2015</b> , 5, 1635-1643	1.7	4
74	In situ measurement of gas diffusion properties of polymeric seals used in MEMS packages by optical gas leak testing. <i>Journal of Micro/ Nanolithography, MEMS, and MOEMS</i> , <b>2009</b> , 8, 043025	0.7	4
73	Sensitivity enhancement of far-infrared Fizeau interferometry by digital image processing. <i>Optical Engineering</i> , <b>2001</b> , 40, 1970	1.1	4
72	Condition Monitoring Algorithm for Piezoresistive Silicon-Based Stress Sensor Data Obtained from Electronic Control Units <b>2017</b> ,		3
71	Prediction of Statistical Distribution of Vibration-Induced Solder Fatigue Failure Considering Intrinsic Variations of Mechanical Properties of Anisotropic Sn-Rich Solder Alloys <b>2018</b> ,		3
70	Characterization of Linear Viscoelastic Behavior of Epoxy Molding Compound Subjected to Uniaxial Compression and Hydrostatic Pressure. <i>IEEE Transactions on Components, Packaging and Manufacturing Technology</i> , <b>2018</b> , 8, 1363-1372	1.7	3

69	Degradation analysis of secondary lens system and its effect on performance of LED-based luminaire. <i>Microelectronics Reliability</i> , <b>2014</b> , 54, 131-137	1.2	3
68	Quantitative Characterization of True Leak Rate of Micro to Nanoliter Packages Using Helium Mass Spectrometer. <i>IEEE Transactions on Advanced Packaging</i> , <b>2009</b> , 32, 440-447		3
67	Nano-Pattern Recognition and Correlation Technique for Sub-Nanometer In-Plane Displacement Measurement. <i>Experimental Mechanics</i> , <b>2010</b> , 50, 1169-1181	2.6	3
66	Geometric Moir□ <i>Springer Handbooks</i> , <b>2008</b> , 601-626	1.3	3
65	Fiber Bragg Grating Sensor to Characterize Curing Process-dependent Mechanical Properties of Polymeric Materials <b>2007</b> ,		3
64	Non-linear finite element analysis for electronic packages subjected to combined hygroscopic and thermo-mechanical stresses		3
63	Stacking Yield Prediction of Package-on-Package Assembly Using Advanced Uncertainty Propagation Analysis: Part I Stochastic Model Development. <i>Journal of Electronic Packaging, Transactions of the ASME</i> , <b>2020</b> , 142,	2	3
62	Stacking Yield Prediction of Package-on-Package Assembly Using Uncertainty Propagation Analysis <b>P</b> art II: Implementation of Stochastic Model. <i>Journal of Electronic Packaging, Transactions of the ASME</i> , <b>2020</b> , 142,	2	3
61	Moir[Interferometry <b>2000</b> , 375-389		3
60	Test Scheme and Degradation Model of Accumulated Electrostatic Discharge (ESD) Damage for Insulated Gate Bipolar Transistor (IGBT) Prognostics. <i>IEEE Transactions on Device and Materials Reliability</i> , <b>2019</b> , 19, 233-241	1.6	3
59	Study of Thermal Aging Behavior of Epoxy Molding Compound for Applications in Harsh Environments <b>2019</b> ,		3
58	Characterization of Stresses and Strains in Microelectronics and Photonics Devices Using Photomechanics Methods <b>2007</b> , A475-A522		3
57	Degradation Prediction of Electronic Packages using Machine Learning 2019,		2
56	In-situ service load monitoring of automotive electronic systems using silicon-based piezoresistive stress sensor. <i>Microelectronics Reliability</i> , <b>2020</b> , 110, 113650	1.2	2
55	Thermal Characterization of Die-Attach Material Interface of High-Power Light-Emitting Diodes. <i>Solid State Lighting Technology and Application Series</i> , <b>2018</b> , 159-178	0.7	2
54	Modified single cantilever adhesion test for EMC/PSR interface in thin semiconductor packages. <i>Microelectronics Reliability</i> , <b>2016</b> , 63, 134-141	1.2	2
53	Hygrothermal Behavior of Advanced Polymers Above Water Boiling Temperatures. <i>Journal of Electronic Packaging, Transactions of the ASME</i> , <b>2014</b> , 136,	2	2
52	Hybrid Approach to Conduct Failure Prognostics of Automotive Electronic Control Unit 2017,		2

51	Prognostics and health monitoring of electronic system: A review 2017,		2
50	Non-linear Viscoelastic Modeling of Epoxy Based Molding Compound for Large Deformations Encountered in Power Modules <b>2017</b> ,		2
49	Modeling of Moisture Diffusion and Moisture-Induced Stresses in Semiconductor and MEMS Packages <b>2010</b> , 181-219		2
48	Forward-stepwise regression analysis for fine leak batch testing of wafer-level hermetic MEMS packages. <i>Microelectronics Reliability</i> , <b>2010</b> , 50, 507-513	1.2	2
47	Thermofluid characteristics of two-phase flow in micro-gap channels. <i>Intersociety Conference on Thermal and Thermomechanical Phenomena in Electronic Systems</i> , <b>2008</b> ,		2
46	Thermofluid Characteristics of Two-Phase Microgap Coolers <b>2007</b> ,		2
45			2
44	Micromechanical thermal deformation analysis of unidirectional boron/aluminum metal-matrix composite. <i>Optics and Lasers in Engineering</i> , <b>1996</b> , 24, 455-466	4.6	2
43	ISOCHROMATIC FRINGE SHARPENING AND MULTIPLICATION. Experimental Techniques, 1994, 18, 11-13	1.4	2
42	High temperature aging of epoxy-based molding compound and its effect on mechanical behavior of molded electronic package. <i>Polymer Degradation and Stability</i> , <b>2021</b> , 188, 109572	4.7	2
41	Towards virtual twin for electronic packages in automotive applications. <i>Microelectronics Reliability</i> , <b>2021</b> , 122, 114134	1.2	2
40	Measurement of effective cure shrinkage of epoxy-based molding compound by fiber Bragg grating sensor using two-stage curing process. <i>Journal of Applied Polymer Science</i> ,51620	2.9	2
39	Microscopic Moir Interferometry: Very High Sensitivity. <i>Mechanical Engineering Series</i> , <b>1994</b> , 227-255	0.3	2
38	Thermal deformation analysis of automotive electronic control units subjected to passive and active thermal conditions <b>2015</b> ,		1
37	Moisture Transport Through Housing Materials Enclosing Critical Automotive Electronics. <i>IEEE Transactions on Components, Packaging and Manufacturing Technology</i> , <b>2020</b> , 10, 541-550	1.7	1
36	Stacking Yield Prediction of Package-on-Package Considering the Statistical Distributions of Top/Bottom Package Warpages and Solder Ball Heights <b>2018</b> ,		1
35	Effects of Underfill on Thermo-Mechanical Behavior of Fan-out Wafer Level Package Used in PoP: An Experimental Study by Advancements of Real-Time Moir[Interferometry <b>2018</b> ,		1
34	Advanced Co-Planarity Measurement Tools for the Warpage Investigation of Non-Conventional Packages Caused by Reflow and Assembly Process <b>2007</b> ,		1

7 33 Whole-field Displacement Measurement Techniques for Thermal Deformation Analyses of 32 Electronic Packages. Materials Research Society Symposia Proceedings, 1998, 515, 167 MECHANICAL FRINGE SHIFTING IN MOIRE INTERFEROMETRY. Experimental Techniques, 1999, 23, 16-19 1.4 31 Bottom leaded plastic (BLP) package: a new design with enhanced solder joint reliability 30 Prediction of Statistical Distribution of Solder Joint Fatique Lifetime Using Hybrid Probabilistic 0.3 29 1 Approach. Conference Proceedings of the Society for Experimental Mechanics, 2015, 165-169 Thermal Stresses Near the Interface of a Bimaterial Joint. Mechanical Engineering Series, 1994, 293-312 0.3 28 Blister Testing for Adhesion Strength Measurement of Polymer Films Subjected to Environmental 27 1 Conditions. Journal of Electronic Packaging, Transactions of the ASME, 2016, 138, Thermal and optical performance of cryogenically cooled laser diode bars mounted on pin-finned 26 1.9 microcoolers. Applied Physics B: Lasers and Optics, 2021, 127, 1 25 EMC Oxidation Under High-Temperature Aging 2022, 53-80 24 Effect of critical properties of epoxy molding compound on warpage prediction: A critical review. 23 1.2 O Microelectronics Reliability, 2022, 130, 114480 Thermal Performance of Cryogenic Micro-Pin Fin Coolers with Two-Phase Liquid Nitrogen Flows. 2.6 22 Applied Sciences (Switzerland), 2021, 11, 11071 Measurements of Inelastic Strain Evolution of Single Solder Grain Subject to Nominal Shear 2.6 21 Loading. Experimental Mechanics, 2019, 59, 1075-1086 Advanced Statistical Model Calibration to Determine Manufacturing-Induced Variations of Effective Elastic Properties of SAC Solder Joints in Leadless Chip Resistor Assemblies. IEEE Transactions on 20 1.7 Components, Packaging and Manufacturing Technology, 2019, 9, 797-804 Hierarchical Reliability Assessment Models for Novel LED-Based Recessed Down Lighting Systems 19 2013, 455-495 Modified coupled-mode model for thermally chirped polymer Bragg gratings. Applied Optics, 2010, 18 0.2 49.2079-84 Thermal-structural modeling of polymer Bragg grating waveguides illuminated by a light emitting 17 1.7 diode. Applied Optics, 2012, 51, 726-34 An Advanced Real-Time Moire Interferometry System With Conductive Heating/Cooling and Its 16 Application on a Creep Behavior of Solder 2007, 479

#### LIST OF PUBLICATIONS

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