

Preliminary Program Overview, rev1.4 *(Subject to updates and changes)*

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| | DAY 1: December 2, 2025 |
| 07:30am - 08:45am | Registration |
| Venue | West Ballroom |
| 08:45am - 09:00am | Opening Ceremony & Welcome Speech |
| 09:00am - 09:45am | Keynote 1: Dr Akshay Singh, VP, Micron Technology |
| 09:45am - 10:30am | Keynote 2: Audrey Charles, SVP, Lam Research |
| 10:30am - 11:00am | 30min Coffee Break @ West Ballroom Foyer |
| 11:00am - 12:30pm | Panel Session 1: <i>TBC</i> |
| 12:30pm - 12:50pm | Advanced Packaging Solutions Presentation: by Lam Research (Diamond Sponsor) |
| Venue | West Ballroom Foyer |
| 12:50pm - 1:50pm | Lunch @ West Ballroom Foyer |
| Venue | West Ballroom |
| 1:50pm - 2:35pm | Keynote 3: Dr Radha Nagarajan, SVP and CTO, Marvell |
| 2:35pm - 3:20pm | Keynote 4: Pax Wang, TD Director, UMC |
| 3:20pm - 3:50pm | 30min Coffee Break @ West Ballroom Foyer |
| 3:50pm - 4:05pm | Products Presentation: by Applied Materials (Platinum Sponsor) |
| 4:05pm - 4:20pm | Products Presentation: by KLA Tenco (Platinum Sponsor) |
| 4:20pm - 5:50pm | Panel Session 2: Metrology and Test Readiness for Heterogeneous Integration |
| 5:50pm - 6:15pm | Welcome Reception @ outside West Ballroom |

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| | DAY 2: December 3, 2025 | | | | | |
| Venue | Aquarius 1 | Aquarius 2 | Aquarius 3 | Aquarius 4 | Gemini 1 | Gemini 2 |
| 08:30am - 10:00am | PDC1 | PDC2 | PDC3 | PDC4 | PDC5 | PDC6 |
| | Advanced Packaging for Chiplets, Heterogenous Integration and CPO Dr John Lau (Unimicron) | Photonic Components and Packaging Technologies for Data Center, Communications, Sensing and Displays Dr Torsten Wipiejewski (Huawei) | Advanced Packaging for MEMS and Sensors Dr Horst Theuss (Infineon) | Current and Future Challenges and Solutions in AI & HPC System and Thermal Management Dr Gamal Refai-Ahmed (AMD) | Overview of Characterization Techniques for 3D HI Circuit Packaging Prof Ali Shakouri (Purdue University) | Design-on Simulation Technology for Reliability Prediction of AP Prof K.N. Chiang (National Tsing Hua University) |
| 10:00am - 10:30am | 30min Coffee Break outside Exhibition Hall (Leo 1-4) | | | | | |
| 10:30am - 12:00pm | PDC1 (con't) | PDC2 (con't) | PDC3 (con't) | PDC4 (con't) | PDC5 (con't) | PDC6 (con't) |
| 12:00pm - 1:15pm | EPS Luncheon @ Vigro1-4 | | | | | |
| 1:15pm - 2:25pm | Technology Innovation Showcase - Session 1 (70 min) Quiz & Prizes Included | | | | | |
| Venue | Aquarius 1 | Aquarius 2 | Aquarius 3 | Aquarius 4 | Gemini 1 | Gemini 2 |
| 2:25pm - 3:10pm | Materials and Processing 1 | TSV/Wafer Level Packaging 1 | Mechanical Simulation & Characterization 1 | Interconnection Technologies 1 | Thermal Management and Characterization 1 | Emerging Technologies |
| | P372 (111)-oriented nanotwinned/nanograined bilayer Cu for post-Q-time low temperature Cu-Cu bonding | P168 Thermally Reliable Through Glass Via Filling with Ni-Fe Alloy for Advanced 3D Packaging | P172 Thin Fan-Out Package Characterization and Evaluation | P266 Surface Treatment for Wafer Bonding using Atmospheric Vapor Plasma Technology | P165 Novel TIM1 paste for Enhanced Thermal Management | P326 3D Surface Ion Trap Process Development for Quantum Applications |
| | P167 Enhancing Wafer Bonding Strength via Surface and Dielectric Modification Using Plasma Activation Process | P319 RDL-first FOWLP Development for III-V Semiconductor Chips in RF Applications | P255 Board level solder reliability and package stress for TSICV UBM/bump IC package design | P185 Study of Extremely Low Temperature Organic Hybrid Bonding with Grain Engineered Cu | P142 PIV-Based Study of Heat Dissipation and Clogging phenomenon of TiO ₂ Nanofluid in Microchannels | P161 2.5D Cryogenic Packaging for Advanced Quantum Processors |
| | P382 Water Vapor Permeation in Low-Temperature Processable Polyimide Materials for Reliable Polymer Hybrid Bonding | P302 Mitigating Connected PAD Corrosion in Hybrid Bonding | P156 Experimental and numerical analysis of a fan-out BGA Chip package reliabilities under drop test loads | P355 Bond line thickness stability of Cu sintering for automotive power module packaging | | P208 Wafer-level Processes for the Manufacturing of Encapsulated Flexible Polymer-Based Implants |
| 3:10pm - 4:40pm | Interactive Presentation (Poster), Exhibition and Coffee Break outside Exhibition Hall (Leo 1-4) | | | | | |
| Venue | Aquarius 1 | Aquarius 2 | Aquarius 3 | Aquarius 4 | Gemini 1 | Gemini 2 |
| 4:40pm -5:40pm | Materials and Processing 2 | Advanced Packaging 1 | Mechanical Simulation & Characterization 2 | Interconnection Technologies 2 | Thermal Management and Characterization 2 | Assembly and Manufacturing Technology 1 |
| | P343 Chip Stacking: Impact of Chip Spacing in C2W hybrid bonding on Temporary Bonding and Debonding | P303 Using WGAN-Based Data Augmentation Machine Learning Algorithm for Estimating the Equivalent Material Properties | P241 Electric-Thermal Coupled Transient Simulation for a Schottky Diode with Temperature Dependent Resistivity of Epitaxial Layer | P188 A Novel Interface Characterization Technique for Hybrid Bonding Process Optimization | P251 DIMM Thermal Performance Enhancement with Heat Spreader and Advanced Cooling Solutions | P201 High-Density Interconnect RDL-FPC Hybrid Substrate for Compact SiP Packaging |
| | P246 Addressing CMP Process Challenges on Temporarily Bonded Wafers for Chip-to-Wafer Hybrid Bonding Applications | P354 Innovation and Efficiency in 3D Packaging Enabled by Optimized Integration Processes | P332 Prediction of Void-induced Crack Propagation within Underfill using the Meshless Material Point Method | P174 Gas-Free & Nano TiO2-Coated Ag Bonding Wire for Replacing Au Wire | P223 CFD and Surrogate Model-Driven Optimization of Two-Phase Immersion Cooling Configurations | P365 Novel UV-USP Laser Grooving and Plasma Dicing Separation Schemes for Next Generation Advanced Packaging |
| | P356 Analysis of SiO ₂ surface chemistry by quasi-in situ XPS during N ₂ plasma activation for SiO ₂ /SiO ₂ bonding | P275 Seamless Heterointegration of Components: Advancements in Fanout Technology and Thermal Solutions in SiP | P271 Enhancing Predictive Accuracy of Warpage and Reliability for Advanced Packages by Modelling Accurate Poisson's Ratio in Finite Element Analysis | P280 High-AR, Fine-Pitch Through-Mold Interconnect Fabrication for Heterogeneous Integration of HPC | P153 Thermal Design and Power Dissipation of Advanced Package with Heterogenous Integration | P173 Is Flash Lamp Annealing a Relevant Wafer Debonding Technique? |
| | P362 Applicability of Both-Sided Flash Lamp Annealing (FLA) Method on Heat Treatment Cu Plating Thin Film and Low Dielectric Resin Films | P102 A Packaging Structure for an Antenna-in-Package Module | P294 Optimization of Warpage and Mechanical Properties for Stacked SiP Package | P144 Interfacial Reactions of BiIn and SnBi Solders React with Cu Substrate | | P301 Cost efficient Infrared Laser debonding technology enabled by Si carrier reuse |
| 05:40pm - 06:45pm | EPTC Sponsors & Exhibitors Networking Cocktail Session – Co-Hosted with Lam Research (Diamond Sponsor) | | | | | |

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| | DAY 3: December 4, 2025 (AM) | | | | | |
| Venue | Aquarius 1 | Aquarius 2 | Aquarius 3 | Aquarius 4 | Gemini 1 | Gemini 2 |
| 8:45am -9:45am | TSV/Wafer Level Packaging 2 | Smart Manufacturing and Equipment Technology 1 | Mechanical Simulation & Characterization 3 | Quality, Reliability & Failure Analysis 1 | Advanced Packaging 2 | Assembly and Manufacturing Technology 2 |
| | P106 Adaptive Patterning®: Unlocking Scalable Density in Embedded Bridge Die Interposer | P242 Connectivity-Guided Feasibility Masking for Efficient Chiplet Placement in 2.5D Packaging via Reinforcement Learning | P177 Study on the Warpage Simulation and its Validation of Lidded FCBGA with Indium alloy TIM | P140 Studies and Elimination of F-induced Corrosion on Al Bondpads and Wafer Fabrication Process Improvement | P312 Characterization of PVD Seed Layer Contact Resistance in 2.0 to 20.0 µm Vias | P273 Selective Post-Soldering Volume Adjustment for Improved Co-Planarity of C4 Bump Interfaces |
| | P285 A Simplified 1-Tier TSV MIM Trench Capacitor Process Integration | P263 Real-Time 3D Reconstruction for Wire Bonding Using Multi-View Projection and EM Polynomial Modelling | P233 A Shock Vibration Calculation Method Considering Viscoplastic Behavior of Packaging Systems | P228 Annealing effect for Backside Metallization of SiC device | P150 112 Gbps SERDES Channel Design with 2.5D Sub-Micron BEOL Interconnect | P178 Aerosol Jet Printing of a Copper Nanoparticle Ink by Controlling the Wetness of Aerosols |
| | P218 Spectroscopic Critical Dimension (SCD) Metrology for Copper Dishing Control in Hybrid Bonding | P186 Defect Localization in Material Surfaces Using retinal CSRF kernel and Statistical Peak Profiling | P113 Delamination Effect Investigations Near RDL and UBM in WLCSP Packages | P306 Direct Bonding of Aluminum and Polypropylene in High-Reliability Structural Interfaces | P151 Advanced Bevel Deposition for Enhanced Yield and Cost Efficiency in Wafer-Level Bonding | P162 Heat Release Tape Characterization for Panel Level Packaging |
| | P111 Process-induced parasitic surface conduction (PSC) in SOI substrates for 3D-integrated RF front-end applications | P187 nhancing Wire Bonding Quality Prediction with a Physics-Informed Ensemble Learning Framework | P368 Feasibility Study of Stacked Sub-THz Band AiP Modules Based on Warpage and Stress Analysis | P219 Nanoindentation tests and constitutive study of sintered nano-silver | P307 Physics-Informed Graph Convolutional Neural Network for Scalable, and Accurate Thermal Analysis of 2.5D Chiplet-based Systems | P175 Reliability Evaluations of Pb-free Solder Joint Formed Using Sn-Ag-Cu solder ball and Sn-Bi-Ag solder paste |
| 9:45am -10:30am | 45min Coffee Break outside Exhibition Hall (Leo 1-4) | | | | | |
| 10:30am -11:00am | Invited Talk 1: Dr. Dielacher Bernd (EVG) The Critical Role of Wafer Bonding in Next-Generation Interconnect Scaling | Invited Talk 2: Prof. Harald Kuhn (Fraunhofer ENAS) Innovation and Steps in Hetero-Integration | Invited Talk 3: Yasuhiro Morikawa (ULVAC Inc) Polymer Fine Pattern Formation based upon Plasma Etching Technology for High Density RDL Interposer | Invited Talk 4: Inohara Masahiro (KIOXIA) Accelerating the Evolution of NAND Flash Memory with Bonding Technologies | Invited Talk 5: Dr Mushuan Chan (SPIL) High Layer RDL Process Technology for Heterogenous Integration Package | Invited Talk 6: Dr Sajay BG (IME) Heterogeneously Integrated Wafer-Level Processed CPO Engines for Next Gen AI/ML Data Centers |
| Venue | Vigro 1-4 | | | | | |
| 11:00am - 12:10pm | Technology Innovation Showcase Session 2 (70 min) Quiz & Prizes Included | | | | | |
| Venue | Vigro 1-4 | | | | | |
| 12:10pm -1:15pm | EPTC Luncheon | | | | | |

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| | DAY 3: December 4, 2025 (PM) | | | | | |
| 12:00pm -1:15pm | EPTC Luncheon | | | | | |
| Venue | Aquarius 1 | Aquarius 2 | Aquarius 3 | Aquarius 4 | Gemini 1 | Gemini 2 |
| 1:15pm -2:00pm | Materials and Processing 3 | Thermal Management and Characterization 3 | Mechanical Simulation & Characterization 4 | Interconnection Technologies 3 | Advanced Packaging 3 | Electrical Simulations & Characterization |
| | P164 Metallurgical properties of Sn-3.0Ag-0.5Cu solder joints with Alumina layer deposition | P191 Magnetohydrodynamic Liquid Cooling Embedded in PCBs for High-power Electronics | P252 Evaluating Dummy Die Sizes and Compound Adjustments to reduce Wafer Warpage in FOEB-T Packaging. | P202 Comparative wear-out study and characterization methods for Pure and Alloyed Copper wires | P320 Ka-Band Ultra-Short Die-to-Antenna Interconnect Enabled by Embedded Glass Fan-Out Packaging | P289 Development of PDK Library for Accurate Modeling of 2.5D Interconnect Structures in Heterogeneous Integration |
| | P211 Wettability, Mechanical Properties and IMC of SiC nanoparticle-reinforced Sn-58Bi solders on Cu substrates under multiple reflow cycles | P247 Thermal Performance of MEMS Cross-flow Heat Exchangers Subjected to External Heat Transfer | P352 Statistical Evaluation of Bond Strength Variation in Hybrid Bonding Interfaces | P261 Microstructure Evaluation of Engineered Cu for Low-Temperature Cu-Cu Hybrid Bonding | P227 development of a Wideband Energy Harvesting Circuit Utilizing Terrestrial Digital Broadcast Signals | P169 Characteristics in the quasi-millimeter wave band of planar transmission lines formed on flexible substrates |
| | P304 Impact of Solder Powder Size on Cleaning Efficiency in Chip Resistor Assemblies for Future Advanced Packaging | P270 Numerical Investigation of Embedded Micro-Pin Fin Two-Phase Liquid Cooling for Dual-Chip Stacks in HPC & AI Applications | P220 Nanoindentation Test and Crystal Plasticity Finite Element Model of SAC305 Solder Joint Considering Crystal Orientation | P317 Toward lifetime prediction under variable load conditions in power electronics | P146 Optimization of Shielded Capacitive Power Transfer (S-CPT) Systems Using Slotted Electrodes | |
| 2:00pm - 3:30pm | Interactive Presentation (Poster), Exhibition and Coffee Break outside Exhibition Hall (Leo 1-4) | | | | | |
| Venue | Aquarius 1 | Aquarius 2 | Aquarius 3 | Aquarius 4 | Gemini 1 | Gemini 2 |
| 3:30pm -4:15pm | Interconnection Technologies 4 | Mechanical Simulation & Characterization 5 | Advanced Packaging 4 | Assembly and Manufacturing Technology 3 | Thermal Management and Characterization 4 | Materials and Processing 4 |
| | P299 Fluxless Die to Die Bonding of 10µm Ultra-fine Pitch Microbump | P369 Characterization and Modelling of Inelastic Behavior of Epoxy Molding Compounds | P367 Low Temperature Post Bond Anneal for Hybrid Bonding enabled by Interfacial (IF) Metal Capping – An Assessment of Reliability | P196 Growth Behaviour of Intermetallic Compounds in Cu-Sn3.5Ag Solder Joints with Different furnace cooling rate | P371 Direct-Bonded Manifold-Jet-Impingement Cooling for High-Performance AI Chips | P379 Enhancing Yield Performance in Chip-to-Wafer Hybrid Bonding in Advanced Packaging |
| | P314 Novel Ultrasonic Flip Chip Bonding Approach utilizing electroplated Aluminium pillars for Advanced Packaging | P349 Real-time Effective Mechanical Property Characterization of Redistribution Layer (RDL) for Chiplet Integration | P374 WireBond Challenges of Copper Clip for Multi-Die Controller MOSFET Package | P158 Hybrid Evaluation of Pure Argon Plasma Treatment for Enhanced Wire Bonding and Manufacturing Efficiency in Microelectronics | P334 High-Temperature Pressure Mapping of TIM Interfaces for Improved Thermal Simulation Accuracy | P234 Study on Backside Metallization for the S-SWIFT(TM) Package |
| | P157 Investigation of Cu bonding wire lifetime under accelerated temperature environments | P305 StressScore for benchmarking AI generated stress image of advanced packaging | P265 Characterization on Fan-Out Heterogeneous Integration Packaging for Premium Smartphone | P131 Impact Of Modified Layers Due to Stealth Dicing Process on The Die Strength | P222 Operando Thermal Analysis of CPU and PCB using a Pixel-level Emissivity Correction Method | P189 Study of Coverage Decay Mechanism of Liquid Metal Filler TIM for Advanced Package Application |
| Venue | Vigro 1-4 | | | | | |
| 4:15pm - 5:25pm | Technology Innovation Showcase Session 3 (70 min) Quiz & Prizes Included | | | | | |
| 5:25pm - 6:10pm | Interconnection Technologies 5 | TSV/Wafer Level Packaging 3 | Materials and Processing 5 | Assembly and Manufacturing Technology 4 | Quality, Reliability & Failure Analysis 3 | Thermal Management and Characterization 5 |
| | P298 Morphology-Controlled Sintering of High-Performance Copper Interconnects for Cost Effective Power Electronics | P105 Analysis of Cu and dielectric layer interfacial delamination in chip redistribution layer | P116 Study on Microstructural Evolution Mechanisms of Amorphous SiO2 in Through Glass Via Wafer during Thinning | P315 Automated In-Line Metrology of Advanced Package Interconnections using a High-Speed 3D X-ray System | P115 Defect Z-depth Determination in 2.5D IC Using Magnetic Field Imaging | P163 Thermal Performance Enhancement of Stacked Packages using Silicon-Based Heat Spreading Die |
| | P179 A Molecular Dynamics Study of Grain Size Effects on Cu-Cu Interfacial Void Reduction in Direct Bonding Interconnect | P126 Mitigation of Cu Nodule Formation in High Open Area Products for Electroplated Cu RDL Applications | P272 Optimizing SSD Performance with One-Part Thermal Gap Fillers: A Sustainable Approach | P224 Mass Transfer solution for Micro-LEDs based displays | P200 In-Situ Package Level Relative Humidity Measurement using Wet-Bulb and Dry-Bulb Temperatures | P381 Solid-State On-Chip Thermal Management Using Micro-Thermoelectric Devices |
| | P243 In-situ AFM Analysis of Thermal Expansion of Cu Pads with Varied Grain Characteristics | P256 Surface Activation and Bonding Mechanisms of SiCN and TEOS Dielectrics for Low-Temperature Hybrid Bonding | P316 Cost-Effective Wafer Level Micro Bumping Solution for Advanced Packaging | | P358 AI-empowered 3D X-ray analysis of solder joint cracking after board level vibration testing | P322 Thermal Sensitivity Analysis of SoIC Face-to-Back Stacking Using Foundation Models for Physics |
| 06:15pm - 08:30pm | EPTC Banquet Dinner | | | | | |

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| | DAY 4: December 5, 2025 (AM) | | | | | |
| Venue | Vigro 1-4 | | | | | Gemini 2 |
| 8:45am – 10:00am | Technology Innovation Showcase Session 4 (75 min) Quiz & Prizes Included | | | | | R10 EPS Chapter Officers's Meeting |
| 10:00am - 11:00am | 60min Coffee Break outside Exhibition Hall (Leo 1-4) | | | | | |
| Venue | Aquarius 1 | Aquarius 2 | Aquarius 3 | Aquarius 4 | Gemini 1 | Gemini 2 |
| 11:00am -11:30am | Invited Talk 7: Dr Kathy Yen (TSMC) From Cloub AI to Edge AI: Driving Innovation with Advanced Packaging | Invited Talk 8: Dr Takenori Fujiwara (Toray Industries) Polymer Bonding Technology for Semiconductor Advanced Packaging | Invited Talk 9: David Gani (STMicro) Challenges and Advantages in Panel Level Packaging | Invited Talk 10: Dr Tan Yik Yee (YOLE) AI is Accelerating the Advanced Packaging | Invited Talk 11: Jonathan Abdilla (BESI) Hybrid Bonding and Fluxless TCB: Defining the Sub 10um Interconnect Roadmap for 3D HI | Invited Talk 12: Dr Zhao Yi (Zhuhai Silicon Chip Technology) Advanced Packaging EDA's New Paradigm: Collaborative Innovation Revolution for Design-Simulation-Verification in the 2.5D/3D Era |
| | Advanced Packaging 6 | Smart Manufacturing and Equipment Technology 3 | Mechanical Simulation & Characterization 6 | Interconnection Technologies 6 | Quality, Reliability & Failure Analysis 4 | Materials and Processing 6 |
| 11:30am -11::45pm | P350 n77/n79 Antenna-plexer with BAW and Glass-IPD Technology for 5G Applications | P193 AI-driven Pixel-Level Defect Localization using Magnetic Current Images | P321 Degradation Mechanism of Frequency Stability in MEMS Resonant Accelerometers | P143 UV-Assisted Fluxless Thermal-Compression Bonding Under Ambient Conditions | P132 Anomalyspy: A Generative Defect Localization in Semiconductor Packages, with X-ray Microscopy | P240 Copper Pillar Bump FCBGA Underfill Process Characterization for Automotive Application |
| 11:45am -12::00pm | P308 Power and Performance Comparison between FPGA-Optics Integrated 3D SiP and equivalent board level test hardware | P236 Research on Intelligent Prediction of 3D-IC Packaging Injection Molding Based on Machine Learning | P370 Dev of a Reproducible, Stable, and Scalable Eval Routine for Lifetime Assessment of Power and Microelectronic Devices | P244 Characterization of Fine Line Width/Spacing RF Interconnects for Co-Packaged Optics with High I/O Density | P180 Cu/SiCN wafer-to-wafer hybrid bonding interface reliability down to 400 nm pitch | P212 Enhanced Reliability of Large BGA Assemblies for AI Server and HPC Application |
| 12:00pm- 12:15pm | P361 Process Developments of Chip-to-Wafer assembly with HPC and Photonics Chiplets on large RDL-first interposer | P359 Cross-Domain Adaptation of Automated 3D X-ray Defect Detection from HBM to Optical Transceivers | P329 Advancing Electronic Package Reliability Analysis by Predicting Solder Joint Strain Patterns Using Neural Networks | P138 Design of Wire Bonding Schemes for Reliability of CQFP Packages under Vibration Test | P375 Investigations on the Mutual Effects of Electromigration and Thermal Fatigue failures of TSV Interconnects | P281 Development of an Epoxy Lid Adhesive to Improve Thermal Reliability in Semiconductor Packages |
| Venue | Vigro 1-4 | | | | | |
| 12:15pm -1:30pm | Conference Lunch | | | | | |

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| | DAY 4: December 5, 2025 (PM) | | | | | |
| 12:15pm -1:30pm | Conference Lunch | | | | | |
| Venue | Aquarius 1 | Aquarius 2 | Aquarius 3 | Aquarius 4 | Gemini 1 | Gemini 2 |
| | Advanced Packaging 7 | Materials and Processing 7 | TBC | Smart Manufacturing and Equipment Technology 3 | Advanced Optoelectronics and Displays | Mechanical Simulation & Characterization 7 |
| 1:30pm - 1:45pm | P260 Demonstration of Integrated Passive Devices in Glass substrate using TGV process | P129 Pressure Sintering Mechanism of Ag Nanoparticles Based on The Master Sintering Curve and Visualization of Sinterability | P323 Backside Metal Interconnect for High Performance RF Interposer | P348 nferring Wire Length and Depth from Magnetic Field Images via Deep-Spatial Physics Informed Model | P267 Assembly of optical micro-ring resonator-based ultrasound sensor for photoacoustic imaging | P139 Key Insights into Design for Reliability of 3D NAND Packages in Solid-State Drive |
| 1:45pm - 2:00pm | P154 Residue Free TaN Etch Method for MIM Capacitor in Advanced Packaging | P221 High-Performance Graphene Coatings for Superior Thermal and Mechanical Properties in Electronic Packaging Enclosures | | P213 Device-to-Package Electrothermal Performance Prediction of Power MOSFETs via Coupled Iterative Dual-Artificial Neural Networks | P104 High Coupling Efficiency Adhesive for Photonic Packaging | P373 A novel wafer warpage numerical model considering further shrinkage of epoxy molding compound |
| 2:00pm - 2:15pm | Invited Talk 13 Fu Chao (WinTechNano) Labless Enable Effective FA of Electronics Packages through Scientific Approach | Invited Talk 14 Hidenori Abe (Resonac) Advanced Packaging Materials Innovation through Co-Creative Activities and Trends in Advanced Packaging Processes | Invited Talk 15: Dr Min Woo Rhee (Samsung) Understanding of Hybrid Bonding Mechanism by Utilizing Molecular Dynamics Approach | P209 Thermal- and Wirelength-Aware Chiplet Placement in 2.5D Systems Through Multi-Agent Reinforcement Learning | P253 2.5D PIC Photonic Interposer Engine for Next Generation Photonic Link CPO of High-Performance Computing and Data Communications | P127 Development of Warpage Predictive Models using Physics-Driven Simulation |
| 2:15pm - 2:30pm | | | | P264 Generative AI-Powered Defect Detection for 3D X-ray Microscopy Scans of High Bandwith Memory Bumps | P206 An Integrated Computational Materials Engineering approach for Anisotropic Conductive Films | P239 Thermal and mechanical properties optimization of TGV interposer for 2.5D integrated transceiver |
| 2:30pm – 3:00pm | 30min Coffee Break outside Exhibition Hall (Leo 1-4) | | | | | |
| Venue | Aquarius 1, 2 and 3 (combined rooms) | | | Aquarius 4 | Gemini 1 | Gemini 2 |
| 3:00pm - 3:30pm | Heterogeneous Integration Roadmap (HIR) workshop Theme: Interconnects - Design and Manufacturing of Complex HI Structures Opening: Kitty Pearsall Design for Manufacturability of > 1 kW: Gamal Refai Ahmed (AMD) Design – Photonics: Amr S Helmy (University of Toronto) Manufacturability – HBI: Loke Yuan Wong (Applied Materials) Manufacturability – Nelson Fan (ASMPT) Manufacturability – CPO (IME, A*STAR) Round Table Discussion “Why HBI/CPO HVM Adaption is in Slower Pace Despite all the Buzz?” Moderator: Wong Shaw Fong (Intel) | | | Advanced Packaging 8 | Quality, Reliability & Failure Analysis 2 | Materials and Processing 8 |
| | | | | P170 Development of Embedded Bridge Die interposer Using Fan-Out Packaging for Heterogeneous Integration of NPUs and HBMs | P141 Short-Circuit Behavior and Failure Mechanism Analysis of Double-Trench SiC MOSFETs | P363 Comparative Evaluation of FCVA and High-Current Arc Deposited ta-C Films for Hermetic Encapsulation |
| | | | | P287 HI of High-Performance Compute, Memory and Photonic Engine Chiplets on Large Molded Interposer package | P276 A Modified Test Vehicle Incorporating DNP-Induced Strain Gradients for Single-Specimen Fatigue Life Assessment of Solder Joints | P118 Enhancing Electrochemical Migration Resistance of Sintered Silver by Ceria Additives for Die Attachment Applications |
| | | | | P378 MDQFN™: Panel-Level QFN for Scalable, Cost-Effective Semiconductor Packaging | P147 Correlation Between Thermal Cycling Ramp Rates and its Respective Solder Joint Reliability | P117 Study on Solder Core Ball Using Sn-Bi Plating for Low-Temperature Bonding |
| 3:45pm - 4:00pm | | | | P199 Ultra-low-TTV Glass Carrier and Temporary Bonding Method to Enable Wafer Ultra-thinning | TBC | P384 Development and Monitoring of Gold Electroplating Process on 300mm Wafer Level |
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| 5:10pm - 5:30pm | Closing Ceremony and Lucky Draw @ Aquarius 1, 2 and 3 (combined rooms) | | | | | |