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# INTERNATIONAL MICROWAVE SYMPOSIUM DIGEST



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# 1996 IEEE MTT-S INTERNATIONAL MICROWAVE SYMPOSIUM — SCHEDULE OF EVENTS

<b>SUNDAY, JUNE 16</b>		<b>WORKSHOP REGISTRATION</b>		<b>7:00 TO 9:00 AM</b>		<b>LOWER LOBBY MOSCONE CONVENTION CENTER (MCC)</b>			
		<b>IMS REGISTRATION</b>		<b>5:00 TO 9:00 PM</b>		<b>MCC LOBBY</b>			
		<b>MMWMC RECEPTION</b>		<b>7:00 PM TO 10:00 PM</b>		<b>HILTON HOTEL, IMPERIAL</b>			
8:00 AM—5:00 PM	WSFA	Digital Cellular Telephones	MCC Rm. 123/120	WSFB	Application of Wavelets to Electromagnetics	MCC, Rm. 124			
1:00 PM—5:00 PM	WSHC	Microwave Photonic Systems	MCC, Rm. 125						
<b>MONDAY, JUNE 17</b>		<b>REGISTRATION</b>		<b>7:00 AM TO 5:00 PM</b>		<b>MCC</b>			
		WMFA	Nonlinear CAD	MCC, Rm. 130	WMFE	Accurate On-wafer Measurements	MCC, Rm. 122		
		WMFB	EM Wave Interaction	MCC, Rm. 120	WMFF	Nonlinear RF and MW Characterization	MCC, Rm. 132		
		WMFC	Device Field Interaction	MCC, Rm. 121	WMFG	Multilayer MW Circuits	MCC, Rm. 133		
		WMFD	Digital Wireless Communications	MCC, Rm. 131					
		WMHH	MW/mm-wave Modules	MCC, Rm. 123	WMHJ	Ferrite CAD and Applications	MCC, Rm. 125		
		WMHI	Propagation in Urban Areas	MCC, Rm. 124					
		PMOA	Low Voltage Low Power Consumption RFICs				MCC, Rm. 102		
		WMHK	Wireless Power Transmission	MCC, Rm. 123	WMHM	Technology for Base Stations	MCC, Rm. 125		
		WMHL	Active Aperture/TR Modules	MCC, Rm. 124					
		<b>MMWMC SYMPOSIUM</b>		<b>8:30 AM TO 5:00 PM</b>		<b>MCC, Rm. 103, 134/135</b>			
		<b>Microwave Journal/MTT-S</b>		<b>6:00 PM TO 8:30 PM</b>		<b>HYDE STREET PIER</b>			
<b>TUESDAY, JUNE 18</b>		<b>REGISTRATION</b>		<b>7:00 AM TO 5:00 PM</b>		<b>MCC</b>			
		<b>MMWMC SYMPOSIUM</b>		<b>8:00 AM TO 5:50 PM</b>		<b>MCC</b>			
		<b>EXHIBITION AND MICROWAVE APPLICATION &amp; PRODUCT SEMINARS</b>		<b>9:00 AM TO 5:00 PM</b>		<b>MCC</b>			
		<b>RM 135</b>		<b>RM 132</b>		<b>RM 133</b>			
		<b>RM 134</b>		<b>RM 130</b>					
		8:00 AM—9:50 AM	TU1A: Low Noise mm-wave MMICs	TU1B: Automotive Applications of Microwave and mm-wave	TU1C: High Power Sources and Control Components	TU1D: Hybrid MCM Techniques & Applications	TU1E: Nonreciprocal Ferrite & Semiconductor Devices		
		10:15 AM—12:00 PM	TU2A	Plenary Session	MCC, Rm. 102/103/104				
		12:15 PM—1:35 PM	PTUB	Design Issues for Silicon Based RF/Microwave ICs	MCC, Rm. 120/123				
			PTUC	System Applications of mm-wave ICs—When?	MCC, Rm. 121/124				
		1:40 PM—3:30 PM	TU3A: Large Signal Generation & Amplification	TU3B: New Guiding & Radiative Effects on Planar Circuits	TU3C: Frequency Domain Modeling of Microwave Structures	TU3D: Historical Perspectives on Microwaves in San Francisco Bay Area	TU3E: Packaging & Interconnect Technologies		
			TU4A: System Components	TU4B: Waves Interactions	TU4C: Intelligent Transportation Systems	TU4D: Modern Concepts in Microwave Field Theory	TU4E: mm-wave and sub-mm-wave Receivers		
		4:00 PM—5:50 PM							
7:00 PM—9:00 PM	RTUA	Commercial MW Product Development: Business Issues				Hilton Hotel, Franciscan D			
<b>WEDNESDAY, JUNE 19</b>		<b>REGISTRATION</b>		<b>7:00 AM TO 5:00 PM</b>		<b>MCC</b>			
		<b>EXHIBITION AND MICROWAVE APPLICATION &amp; PRODUCT SEMINARS</b>		<b>9:00 AM TO 5:00 PM</b>		<b>MCC</b>			
		8:00 AM—9:50 AM	WE1A: Low loss Acoustic Filters	WE1B: TLM Modeling of Microwave Structures	WE1C: Filters I	WE1D: Microwave/mm-wave/Optical Applications in PCS	WE1E: mm-wave Systems & Components		
		10:20 AM—12:10 PM	Student Paper Competition					MCC, Rm. 125	
		10:20 AM—12:10 PM	WE2A: Power Amps, Wireless Amps	WE2B: Time Domain Techniques	WE2C: Filters II	WE2D: Personal Communications via Satellites	WE2E: Control and Frequency Translation		
			PWED Effective CAD: A Dilemma of Models					MCC 120/123	
		12:15 PM—1:30 PM	Student Paper Competition					MCC, Rm. 125	
		1:40 PM—3:30 PM	WE3A: Power Amplifier Technology	WE3B: Integral Equation Based Numerical Analysis	WE3C: CAD Methodology	WE3D: Wireless Technology	WE3E: Power Dividers & Couplers		
			Open Forum					MCC, Rm. 102/103	
		2:30 PM—5:00 PM	WE4A: Biological Effects	WE4B: Quasi-optical Amps and Systems	WE4C: Micromachining for MW and mm-wave Applications	WE4D: Commercial & Space MW System Applications	WE4E: Passive Components Technology		
			<b>INDUSTRY-HOSTED COCKTAIL RECEPTION</b>		<b>6:00 PM TO 7:30 PM</b>		<b>HILTON HOTEL, GRAND BALLROOM B</b>		
				<b>MTT-S AWARDS BANQUET</b>		<b>7:45 PM TO 10:15 PM</b>		<b>HILTON HOTEL, GRAND BALLROOM A</b>	
<b>THURSDAY, JUNE 20</b>		<b>REGISTRATION</b>		<b>7:00 AM TO 5:00 PM</b>		<b>MCC</b>			
		<b>EXHIBITION</b>		<b>9:00 AM TO 3:00 PM</b>		<b>MCC</b>			
		8:00 AM—9:50 AM	TH1A: Low Noise Devices & Circuits	TH1B: Quasi-optical Modulators & Oscillators	TH1C: Mario Maury Memorial Session	TH1D: High Speed Lightwave Comm. Systems	TH1E: Linear Device Modeling		
		10:20 AM—12:10 PM	TH2A: Progress in High Speed Digital Applications	TH2B: Nonlinear Modeling & Analysis	TH2C: Scattering Parameter & Dielectric Measurements	TH2D: Microwave Photonic Devices	TH2E: CAD Techniques using Field Theory		
			PTHE Solderless Interconnects for Microwave Modules					MCC, Rm. 120/123	
		1:40 PM—3:30 PM	TH3A: Superconductor Microwave Technology	TH3B: Sources	TH3C: Mapping of Fields & Waves in IC Structures	TH3D: Microwave Photonic Systems	TH3E: Phased Arrays		
			Open Forum					MCC, Rm. 102/103	
		2:30 PM—5:00 PM		TH4B: Chaos in Microwave Systems					
		4:00 PM—5:50 PM							
		<b>FRIDAY, JUNE 21</b>		<b>ARFTG CONFERENCE</b>		<b>8:30 AM TO 5:00 PM</b>		<b>MCC, Rm. 220/226</b>	
				<b>ARFTG EXHIBITION</b>				<b>MCC, Rm. 200/212</b>	
				8:00 AM—5:00 PM	WFFA	Dielectric Resonators	MCC, Rm. 130	WFFF	Everything You Wanted to Know about Noise
WFFC	The Role of Superconductors				MCC, Rm. 125	WFFG	Wireless LAN — What's Next?	MCC, Rm. 133	
WFFD	Technology for Intelligent Vehicles				MCC, Rm. 131	WFFH	Global EM Simulators	MCC, Rm. 122	
WFFE	Photonics for MW Antenna				MCC, Rm. 124	WFFI	Statistical Based Design Techniques	MCC, Rm. 123	
8:00 AM—12:00 PM	WFFB			Mixer Design for MW & mm-wave	MCC, Rm. 120				
	WFFJ			Design Oriented MW Education	MCC, Rm. 121				