

# 2025년 2월 12일(수)-14일(금) | 강원도 하이원리조트

### Future Normal in Semiconductor

### 2025년 2월 13일(목), 09:00-10:45 Room E(에메랄드 II+III), 5층

### D. Thin Film Process Technology 분과

### O05\_[TE1-D] Ferroelectrics

#### 좌장: 최창환 교수(한양대학교), 전우진 교수(경희대학교)

	BEOL-Compatible and Robust Ferroelectricity in 5 nm-thick $Hf_{0.5}Zr_{0.5}O_2$ film						
TE1-D-1	by Adopting TiN and Mo Alloy Electrode						
09:00-09:15	Jaewook Lee, Yong Hyeon Cho, Hyeong Seok Choi, Hyun Woo Jeong, Hyojun Choi, and						
09.00-09.15	Min Hyuk Park						
	Seoul National University						
	N-Terminated TiN Electrodes with (111) Texture for Low-Voltage						
TE1-D-2	Switching (0.8 V) in Ferroelectric $Hf_{0.5}Zr_{0.5}O_2$ Capacitors						
09:15-09:30	Geun Hyeong Park <sup>1</sup> , Yong Hyeon Cho <sup>1</sup> , Dong Hyun Lee <sup>1</sup> , Se Hyun Kim <sup>1</sup> , Ho Jun Kim <sup>2</sup> ,						
09:15-09:30	and Min Hyuk Park <sup>1</sup>						
	<sup>1</sup> Seoul National University, <sup>2</sup> Hanyang University						
	BEOL-Compatible Fabrication of Reliable FeFETs with Sub 10nm $Hf_xZr_{1-x}O_2$						
TE1-D-3 09:30-09:45	Films						
	Geonwook Kim <sup>1</sup> , Hyunho Seok <sup>2</sup> , Sihoon Son <sup>2</sup> , Hyunbin Choi <sup>3</sup> , Jinhyoung Lee <sup>1</sup> , and						
	Taesung Kim <sup>1,2,3</sup>						
	<sup>1</sup> Department of Mechanical Engineering, Sungkyunkwan University, <sup>2</sup> SKKU Advance						
	Institute of Nano Technology, <sup>3</sup> Department of Semiconductor Convergence Engineering,						
	Sungkyunkwan University						
	Enhancing Memory Characteristics of MIFIS-FeFET: Effects of $Si_3N_4$						
	Charge Injection Layer and Its Composition						
TE1-D-4	Hyojin Ahn <sup>1</sup> , Hyunjin Lim <sup>1</sup> , Sangkuk Han <sup>1</sup> , Yehbeen Im <sup>1</sup> , Wonjae Choi <sup>2</sup> , Youngseo Na <sup>2</sup> ,						
09:45-10:00	and Changhwan Choi <sup>1,2</sup>						
	<sup>1</sup> Division of Materials Science and Engineering, Hanyang University, <sup>2</sup> Department of						
	Semiconductor Engineering, Hanyang University						
	Understanding Domain switching Kinetics in Ferroelectric HfO2 : A Pseudo-						
	Voigt and Machine Learning Approach						
TE1-D-5	Yong Hyeon Cho, Geun Hyeong Park, Dong Hyun Lee, Hyun Woo Jung, Young Min Kim,						
10:00-10:15	Ho Won Jang, and Min Hyuk Park						
	Department of Materials Science and Engineering, Inter-university Semiconductor						
	Research Center, Seoul National University						



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초청		<i>,</i> ,	Ŭ	of	Ferroelectric	Tunnel	Junctions	for	
TE1-D-6	Neuromorphic Computing								
10:15-10:45	Taehwan Moon								
	Department of Intelligence Semiconductor Engineering, Ajou University								