

Joint International Conference on The 8th ICMAP & The 9th ISFM

January 17-20, 2021 | Online Conference

[TC4] Plasma Deposition and Etching - II (GWP, Thermal, ALE, MTJ, DFT)	
Date / Time	January 19 (Tue.), 2021 / 16:30-18:50
Place	Channel C
Session Chair(s)	Se Hun Kwon (Pusan Nat'l Univ., Korea)

[TC4-1]

16:30-16:50

Etch Characteristics of SiO₂ Using Lower Global Warming C_xF₈ (x=5,7) Inductively Coupled Plasmas

Da In Sung, Geun Young Yeom, Dong Woo Kim, and Hyun Woo Tak

Sungkyunkwan Univ., Korea

[TC4-2]

16:50-17:10

Influence of Carbon Source Gas Flow Rate on High-rate Deposition of Polycrystalline Diamond Film Using Time-Series Exposure of Modulated/Non-Modulated Induction Thermal Plasmas

Kazufumi Hata, Naoki Kano, Yusuke Nakano, Yasunori Tanaka, and Tatsuo Ishijima

Kanazawa Univ., Japan

[TC4-3]

17:10-17:30

Atomic Layer Etching of SiO₂ and Si₃N₄ with Fluoroether and Fluoroalcohol Compounds

Yongjae Kim, Yebin Lee, Seonghyeon Lee, and Heeyeop Chae

Sungkyunkwan Univ., Korea

[TC4-4]

17:30-17:50

Study on Etch Characteristics of Magnetic Tunnel Junction (MTJ) Materials Using Hydrogen Based Reactive Ion Beam

Yun Jong Jang, Doo San Kim, Ju Eun Kim, Ye Eun Kim, You Jung Gill, and Geun Young Yeom

Sungkyunkwan Univ., Korea

[TC4-5]

17:50-18:10

Density Functional Theory Study on the Gas-phase Cleaning of SiO₂ Using HF and NH₄F

Romel Hidayat¹, Tanzia Chowdhury¹, Hye-Lee Kim¹, Tirta Rona Mayangsari², Seongjae Cho³, Sangjoon Park⁴, Jongwan Jung¹, and Won-Jun Lee¹

¹Sejong Univ., Korea, ²Pertamina Univ., Indonesia, ³Gachon Univ., Korea, ⁴Wonik IPS, Korea

[TC4-6] Keynote

18:10-18:50

Needs of New Plasma Etching Technologies for the Next 10 Years' Chip Fabrication

Jong Chul Park

Samsung Electronics Co., Ltd., Korea