

MDプログラム QE1スケジュール 2018.9.7 MDプログラム講義室

	学生		所属 専攻	指導教員	テーマ名	テーマの領域	テーマ説明
9:00- 9:40	SHUANG Yi 双 逸	M2b	工学 知能デバイス材料 学専攻	小池 淳一	Phase Change Behavior and Contact Property of N Doped Cr ₂ Ge ₂ Te ₆	メモリー材料	In this study, we demonstrated a non-bulk-resistance-dominant phase change memory whose resistance is merely modulated by contact resistance. The phase change materials exploited here is N-doped Cr ₂ Ge ₂ Te ₆ , there is almost no resistivity contrast between amorphous and crystalline phases. However, a typical threshold switching behavior involving a three-order-of-magnitude SET/RESET resistance ratio can be realized.
9:40- 10:20	CHEN Qian 陳 茜	M2b	工学 知能デバイス材料 学専攻	久保 百司	Computational Simulation on Stress Corrosion Cracking Mechanism of Iron/Steel Structural Materials under High Temperature Pressurized Water Environment 高温・高圧水環境下における鉄 鋼構造材料の応力腐食割れメ カニズムに関する計算科学シ ミュレーション	金属物性 計算科学	To improve the reliability of structural materials in power plants, it is important to understand the stress corrosion cracking (SCC) mechanism of steels serve in high temperature pressurized water environment. In this study, reactive molecular dynamics simulations are employed to study the fracture process under high temperature pressurized water environment.
10:30- 11:10	FU Chang 付 暢	M2b	工学 応用化学専攻	三ツ石 方也	Studies on Poly(vinylidene fluoride) Nanoparticles through Soft Interfacial Self-Assembly	機能性高分子	Ferroelectric polymer Poly(vinylidene fluoirde)(PVDF)has been widely used in the fields of sensors, generators, and non-volatile memories. In this study, a facile solution method has been introduced to fabricate PVDF nanoparticles with high fraction of electroactive crystalline phases, and ferroelectric properties have been characterized.