

# J-Physics Mini-Workshop in Osaka

July 16 Tue.– July 17 Wed. in 2019

Sigma Hall (Engineering Science International Bldg.), Osaka University

## July 16 (Tue.)

9 : 30–10 : 00 Registration

10 : 00–10 : 05 Opening Remark

Koichi Izawa (Osaka Univ.)

### 【Session 1】

Chair : Koichi Izawa (Osaka Univ.)

10 : 05–10 : 45 Field-induced phenomena in new heavy-fermion superconductor UTe<sub>2</sub>

Dai Aoki (Tohoku Univ.)

10 : 45–11 : 15 <sup>125</sup>Te-NMR study of spin fluctuations in UTe<sub>2</sub>

Yo Tokunaga (JAEA)

11 : 15–11 : 30 Coffee break

### 【Session 2】

Chair : Satoshi Fujimoto (Osaka Univ.)

11 : 30–12 : 00 <sup>125</sup>Te-NMR study on UTe<sub>2</sub>

Genki Nagamine (Kyoto Univ.)

12 : 00–12 : 30 Electronic state and superconducting node in UTe<sub>2</sub>

Jun Ishizuka (Kyoto Univ.)

12 : 30–12 : 40 Photo

12 : 40–13 : 45 Lunch

### 【Session 3】

Chair : Kenji Ishida (Kyoto Univ.)

13 : 45–14 : 15 NMR study of UGe<sub>2</sub> in the vicinity of ferromagnetic critical point

Hisashi Kotegawa (Kobe Univ.)

14 : 15–14 : 45 NQR study on superconducting UCoGe under pressure

Hisahiro Manago (Kobe Univ.)

14 : 45–15 : 15 Pt-NMR studies on normal and superconducting states in UPt<sub>3</sub>

Hideki Tou (Kobe Univ.)

15 : 15–15 : 30 Coffee break

### 【Session 4】

Chair : Hideki Tou (Kobe Univ.)

15 : 30–16 : 00 Knight-shift measurement in the superconducting state of Sr<sub>2</sub>RuO<sub>4</sub>

Kenji Ishida (Kyoto Univ.)

16 : 00–16 : 30 Unconventional superconductivity mediated by fluctuations of momentum-based multipoles

Shuntaro Sumita (Kyoto Univ.)

16 : 30–17 : 00 Elastoresistance measurements of the nematic superconductor Sr<sub>x</sub>Bi<sub>2</sub>Se<sub>3</sub>

Suguru Hosoi (Osaka Univ.)

17 : 00–17 : 30 Recent topics on Weyl superconductors and topological superconductors

Satoshi Fujimoto (Osaka Univ.)

18 : 30–

Banquet@ “Yofu(Western-style)” dining Tetsu (Ishibashi)

<https://tabelog.com/en/osaka/A2706/A270603/27090318/>

July 17 (Wed.)

**【Session 5】**

9 : 40–10 : 10 Magnetic fluctuations and superconductivity by tuning incipient band in Fe-based superconductor

Chair : Hisashi Kotegawa (Kobe Univ.)

Hidekazu Mukuda (Osaka Univ.)

10 : 10–10 : 30 NMR/NQR study on Fe-based superconductor LaFe<sub>2</sub>As<sub>2</sub> in heavily electron-doped regime

Takayoshi Kouchi (Osaka Univ.)

10 : 30–10 : 45 Coffee break

**【Session 6】**

Chair : Takeshi Mizushima (Osaka Univ.)

10 : 45–11 : 15 Multiorbital effects and ferroelectric superconductivity in SrTiO<sub>3</sub>  
Shota Kanasugi (Kyoto Univ.)

11 : 15–11 : 45 Possibility of chiral *d*-wave state in SrPtAs  
Hikaru Ueki (Hirosaki Univ.)

11 : 45–12 : 15 New type of spin-triplet superconductivity based on cooperation of spin-orbit and electron-phonon interactions  
Kazumasa Miyake (Osaka Univ.)

12 : 15–13 : 30 Lunch

**【Session 7】**

Chair : Akira Sekiyama (Osaka Univ.)

13 : 30–14 : 00 Emergent electronic phenomena in intermediate valence rare-earth fullerides  
Kosmas Prassides (Osaka Prefecture Univ.)

14 : 00–14 : 30 Suppression of magnetic order and formation of heavy fermion state under high pressure in Eu compounds  
Mamoru Yogi (Univ. of Ryukyus)

14 : 30–15 : 00 dHvA effect in valence fluctuation superconductor CeIr<sub>2</sub>  
Hitoshi Sugawara (Kobe Univ.)

15 : 00–15 : 15 Coffee break

**【Session 8】**

Chair : Hitoshi Sugawara (Kobe Univ.)

15 : 15–15 : 45 Formulations of linear dichroism in angle-resolved core-level photoemission applied for some rare-earth compounds  
Akira Sekiyama (Osaka Univ.)

15 : 45–16 : 15 4f orbital symmetry of cubic Pr compounds by linear dichroism in core-level photoemission  
Satoru Hamamoto (Osaka Univ.)

16 : 15–16 : 45 Determination of 4f orbital symmetry and effect of anisotropic hybridization in YbAlB<sub>4</sub> by linear dichroism in core level photoemission  
Kentaro Kuga (Toyota Technological Institute)

16 : 45–16 : 50 Closing Remark  
Hisatomo Harima (Kobe Univ.)

Talk 30min + Question 10 min (Review talk)

Talk 22 min + Question 8 min

Talk 15 min + Question 5 min (Short talk)