# The 20th JUACEP Workshop

for the summer research course students from University of Michigan and UCLA

Date: Tuesday, August 29, 2017

Venue: NIC Conference Room (3<sup>rd</sup> floor, NIC)

14:30
Opening Address by JUACEP Leader

14:35
Presentations by 8 students

(10 min. talk + 5 min. Q&A each)

16:45 Completion Ceremony

17:15
Farewell Banquet (closed)







## Presentation timetable

## 14:35 - 14:50 (1) Chenfan LIAN

Advisor: Prof. Y. Yamada, Mechanical Systems Engineering "Human Presence Sensing of a Mobile Robot by Using 2D Laser Scanner"

## 14:50 - 15:05 (2) Erik KRAMER

Advisor: Prof. Y. Yamada, Mechanical Systems Engineering "The Change of Gait Motion During Curvilinear Obstacle Avoidance while Restricted by a Wearable Robotic Device"

## 15:05 - 15:20 (3) Muzhi ZHU

Advisor: Prof. T. Suzuki, Mechanical Systems Engineering "Path Following via Camera using Randomized Model Predictive Control"

## 15:20 - 15:35 (4) Hao-En CHANG

Advisor: Assoc. Prof. K. Matsuoka, Aerospace Engineering "Dependency of Spark Energy on Deflagration-to-Detonation Transition in a High-Speed Flow"

#### 15:35 - 15:45 Break

#### 15:45-16:00 (5) Yizhen ZHANG

Advisor: Prof. M. Kobashi, Materials Process Engineering "Bonding between Al and CFRTP Using Interpenetrating Layer"

## 16:00 - 16:15 (6) Zhiwei LIU

Advisor: Prof. M. Kobashi, Materials Process Engineering "Stability of Preform Shape during Reactive Synthesis of Al-TiC Composites"

### 16:15 - 16:30 (7) Brian CHAN

Advisor: Prof. F. Arai, Micro-Nano Mechanical Science and Engineering "Blood Flow Control in an Eye Model"

## 16:30 - 16:45 (8) Jia WANG

Advisor: Prof. H. Amano, Electronics

"Piezoelectric-Effect-Assisted Separation of Freestanding GaN Thick Film from SiC Substrate"