

IOS2018 Scientific Program

Day 1 : Tuesday, 6 March 2018

16:30 ~ 18:00 **Registration**

Day 2 : Wednesday, 7 March 2018

08:00 ~ 09:00 **Registration and posting posters**

09:00 ~ 09:30 **Opening ceremony**

Session 1. Current Status of Orchid

Chair Person: *Dr. Ki Sun Kim*

09:30 ~ 10:50 Keynote Speaker 1

- Environmental control of the flowering process of *Phalaenopsis* orchids

by Erik S. Runkle (Michigan State University, USA)

Keynote Speaker 2

- The life of an orchid protocorm

by Edward C.T. Yeung (Calgary University, Canada)

10:50 ~ 11:00

————— *Coffee break* —————

11:00 ~ 11:30 Invited Speaker 1

- Value of orchids in culture and for flower industry of Korea

by Byoung Ryong Jeong (Gyeongsang National University, Korea)

11:30 ~ 11:45 Oral Presentation

- Introduction to orchid breeding and research at NIHHS in Korea

by Pue Hee Park (National Institute of Horticultural & Herbal Science, Korea)

11:45 ~ 13:00

————— *Lunch* —————

Session 2. Biodiversity, Conservation, and Classification

Chair Person: *Dr. Bijaya Pant*

13:00 ~ 13:40 Keynote Speaker 3

- Native orchid species in Korea

by Jong Suk Lee (Korea National Arboretum, Korea)

13:40 ~ 14:10 Invited Speaker 2

-The species diversity of orchid plants as industrial materials

by Pil- Yong Yun (National Institute of Ecology, Korea)

Day 2 : Wednesday, 7 March 2018 (Cont.)

14:10 ~ 15:10 Oral Presentations

1. **Effect of culture media on asymbiotic seed germination of *Epipactis flava* Seidenf., an endangered rheophytic orchid of Thailand**
by Boworn Kunakhonnuruk (Naresuan University, Thailand)
2. **Development of cryopreservation protocols for endangered wild orchids in Korea**
by Haeng-Hoon Kim (Sunchon National University, Korea)
3. **In vitro proliferation of endangered *Cypripedium macranthos* Sw. through asymbiotic seed culture**
by Yoon-Sun Huh (Chungcheongbuk-do Agricultural Research and Extension Services, Korea)
4. **Development of new plant classification system based on life design concept in orchids**
by Chul Gu Been (K-ORCHIDS, Korea)

15:10 ~ 15:30

————— *Coffee Break* —————

Session 3. Cultivation & Physiology 1

Chair Person: *Dr. Y.C. Alex Chang*

15:30 ~ 16:00 Invited Speaker 3

- **Mineral nutrition of *Phalaenopsis*, with focus on nitrogen**
by Y.C. Alex Chang (National Taiwan University, Taiwan)

16:00 ~ 16:45 Oral Presentation

1. **Effect of bulk density of sphagnum moss substrate on volumetric water content and electrical conductivity measured by Frequency Domain Reflectometry**
by Hsi Lin (National Taiwan University, Taiwan)
2. **Improves *Doritaenopsis* queen beer ‘Mantefon’ with light and nutrient control under CO₂ enriched condition**
by Yoon Jin Kim (Seoul Women’s University, Korea)
3. **Influence of sphagnum moss as growing medium in *Phalaenopsis* orchid**
by M.M Kaveriamma (UAHS College of Forestry, India)

Day 2 : Wednesday, 7 March 2018 (Cont.)

Session 4. Cultivation & Physiology 2

Chair Person: *Dr. Erik S. Runkle*

16:45 ~ 17:30 Oral Presentation

- 1. Reduced water use of potted *Spathoglottis plicata* by leaching fraction techniques**
by Chaiartid Inkham (Chiang Mai University, Thailand)
- 2. Reusing drain water to lower the emission of nutrients in the cultivation of *Phalaenopsis***
by J.A.M. Kromwijk (Wageningen University, The Netherlands)
- 3. Application of sensor-based irrigation system for cymbidium production to save water use**
by Seong Kwang An (Seoul National University, Korea)

17:30 ~ 18:30 **Poster Presentations**

18:30 ~ 20:30 ————— *Conference Dinner* —————

Day 3 : Thursday, 8 March 2018

09:00 ~ 18:00 **Technical tour – Excursion to orchids production area in Korea (Whole-day tour)**

Day 4 : Friday, 9 March 2018

Session 5. Micropropagation & Biotechnology

Chair Person: *Dr. Byoung Ryong Jeong*

09:00 ~ 09:40 Keynote speaker 4

- **Advances in clonal propagation and functional metabolites production using bioreactor system in Orchidaceae**
by Kee-Yoeup Paek & So-Young Park (Chungbuk National University, Korea)

09:40 ~ 10:10 Invited speaker 4

- **Various culture technique for mass propagation of medicinal orchids of Nepal**
by Bijaya Pant (Tribhuvan University, Nepal)

10:10 ~ 10:20 ————— *Coffee break* —————

Day 4 : Friday, 9 March 2018 (Cont.)

10:20 ~ 11:05 Oral Presentations

- 1. The transgenic *Dendrobium* ‘Sonia BOM 17’ containing antisense ACO gene demonstrated normal growth with prolong vase life**
by Sermsiri Chanprame (Kasetsart University, Thailand)
- 2. Cold induced changes in the transcriptome reveal a major role of SVP genes in regulating the flowering time of *Cymbidium goeringii***
by Fengxi Yang (Guangdong Academy of Agricultural Sciences, China)
- 3. Effect of medium composition, coconut water and chitosan on *Phalaenopsis* protocorm growth and development**
by Dewi Sukma (Bogor Agricultural University, Indonesia)

11:05 ~ 12:00 Poster Presentations

12:00 ~ 13:00

————— Lunch —————

Session 6. Genetics & Breeding

Chair Person: *Mr. Maurice van Veen*

13:00 ~ 13:30 Invited Speaker 5

- Research and development within Anthura, a Dutch breeding company**
by Maurice van Veen (Anthura, The Netherlands)

13:30 ~ 14:15 Oral Presentations

- 1. Intra and interspecies variation of terrestrial orchid *Spathoglottis* species in Peninsular Malaysia using chloroplast DNA**
by Florence C. Ginibun (University of Malaya, Malaysia)
- 2. Molecular regulation of the two most important ornamental traits of Chinese orchid - floral patterning and leaf-color variations**
by Genfa Zhu (Guangdong Academy of Agricultural Sciences, China)
- 3. Plantlet better growth with cytokinin pre colchicine application on *Phalaenopsis amabilis* blume protocorms**
by Sandra Arifin Aziz (Bogor Agricultural University, Indonesia)

14:15 ~ 14:35

————— Coffee break —————

Day 4 : Friday, 9 March 2018 (Cont.)

Session 7. Pest & Post-harvest physiology

Chair Person: *Dr. Sek Man Wong*

14:35 ~ 15:15 Keynote Speaker 5

- Towards generating virus resistant transgenic orchids – evaluation of CymMV and ORSV resistance in transgenic *Nicotiana benthamiana* expressing artificial viral microRNA and antisense RNA

by Sek Man Wong (National University of Singapore, Singapore)

15:15 ~ 16:30 Oral Presentations

1. Pathological properties and control of viruses infecting orchids in Korea

by Ju-Yeon Yoon (National Institute of Horticultural & Herbal Science, Korea)

2. Effects of 1-methylcyclopropene on biochemical changes of postharvest *Dendrobium* ‘Khao Sanan’

by Kanogwan Seraypheap (Chulalongkorn University, Thailand)

3. Seasonal occurrence of *Japanagromyza tokunagai* (Sasakawa) (Diptera:Agromyzidae) on *Cymbidium kanran* Makino (Orchidaceae) in Jeju Island, South Korea and a preventive measure against the fly infestation

by Il-Kwon Kim (Korea National Arboretum, Korea)

4. Sea shipment simulation of *Vanda* plants

by Wachiraya Imsabai (Kasetsart University, Thailand)

5. Variability in the response to ethylene of three cultivars of cut *Vanda* orchid flowers

by Meir Shimon (ARO The Volcani Center, Israel)

16:30 ~ 17:30 **Business Meeting & Farewell Ceremony**

Day 5 : Saturday, 10 March 2018

09:00 ~ 18:00 **Post Conference Tour (optional)**