

# *Program*

*Talks Key:*

*[I] – indicates an invited talk*

*[P] – indicates a postdoctoral fellow*

*[S] – indicates a postgraduate student*

## Sunday 3rd December 2017

**Welcome Reception & Registration** 6:00pm – 8:30pm Auberge Coral room

## Monday 4th December 2017

**Registration** 8:30am - 9:00am Outside Azure I Foyer

**Welcome and Opening** 9:00am - 9:15am Azure I

9:00 AM **Quentin Parker, Conference co-Chair**

Conference Introduction & Housekeeping

9:05 AM **Prof. Matthew Evans, Dean, Faculty of Science, The University of Hong Kong (TBC)**

Welcome address and official opening of the Conference

**1A. Setting the scene** 9:10am - 10:30am Azure I

Chair: *Noam Soker*

9:15 AM **Bruce Balick [I]**

Opening Review

9:50 AM **Albert Zijlstra**

The PNLF and the evolution of PNe

10:05 AM **Quentin Parker**

A HASH-tag for PN research

10:20 AM **Discussion**

**Morning Break & Poster Viewing** 10:30am - 11:00am Azure Foyer area

**1B. Winds & wind related** 11:00am - 12:30pm Azure I

Chair: *Eva Villaver*

11:00 AM **Sofia Ramstedt [I]**

Wind shaping in binary AGB stars with ALMA

11:30 AM **Zhuo Chen [S]**

Wind-accelerated orbital evolution in binary systems with giant stars

11:45 **Foteini (Claire) Lykou [P]**

Asymmetric mass loss from an AGB star revealed with infrared interferometry

12:00 **Bruce Balick**

Recreating the Mass-Ejection Histories of pre Planetary Nebulae

12:15 PM **Discussion**

**Lunch** 12:30pm - 2:00pm Café bord de Mer

**1C. Winds, Jets & Shaping** 2:00pm - 3:30pm Azure I

Chair: *Carmen Sanchez Contreras*

2:00 PM **Susanne Höfner [I]**

Origins of dynamical structures in AGB star

2:30 PM **Daniel Tafaya**

Do masers probe the large-scale magnetic field in the circumstellar envelope of evolved stars?

2:45 PM **Raghvendra Sahai [I]**

Binary Interactions, High-speed outflows and dusty disk during AGB-to-PN transitions

3:15 PM **Discussion**

**Afternoon Break & Poster Viewing** 3:30pm - 4:00pm Azure Foyer area

**1.D. Magnetic Fields** 4:00pm - 5:30pm Azure I

Chair: *Adam Frank*

4:00 PM **Wouter Vlemmings [I]**

Magnetic Fields

4:30 PM **Laurence Sabin**

Chasing magnetic fields in evolved stars

4.45 PM **Ko-Yun (Monica) Huang [S]**

Observations of the Goldreich-Kylafis effect in AGB stars at millimeter wavelengths using CARMA

5.00 PM **Discussion**

## Tuesday 5th December 2017

<b>2.A</b>	<b>Binaries</b>	9:00am - 10:30am	Azure I
<i>Chair:</i>	<i>Hans Van Winckel</i>		
9:00 AM	<b>Robert Izzard [I]</b>	From binary to post-AGB stars and planetary nebulae	
9:30 AM	<b>Todd Hillwig</b>	Surveying Planetary Nebula Central Stars for Close Binaries	
9.45 AM	<b>Griet Van de Steene</b>	Light and velocity variability of proto-planetary nebulae	
10:00 AM	<b>Nicole Reindl [P]</b>	Revealing the true nature of Hen 2-428	
10:15 AM	<b>Discussion</b>		
<b>Morning Break &amp; Poster Viewing</b>		10:30am - 11:00am	Azure Foyer area
<b>2.B</b>	<b>Common Envelope</b>	11:00am - 12:30pm	Azure I
<i>Chair:</i>	<i>Bruce Balick</i>		
11:00 AM	<b>Natalia Ivanova [I]</b>	Common envelope: the outcomes	
11:30 AM	<b>Thomas Reichardt [S]</b>	Can common envelope simulations reproduce planetary nebula morphology?	
12:00 PM	<b>Sagiv Shiber [S]</b>	The Morphology of the Outflow in The Grazing Envelope Evolution	
12:15 PM	<b>Discussion</b>		
<b>Lunch</b>		12:30pm - 2:00pm	Café bord de Mer
<b>2.C</b>	<b>Common Envelope</b>	2:00pm - 3:30pm	Azure I
<i>Chair:</i>	<i>Martin Guerrero</i>		
2:00 PM	<b>Adam Frank [I]</b>	PNe, Binary Interactions and Common Envelope Evolution	
2:30 PM	<b>Amit Kashi [I]</b>	Simulations and Modeling of Intermediate Luminosity Optical Transients and Supernova Impostors	
3:00 PM	<b>Discussion</b>		
<b>Afternoon Break &amp; Poster Viewing</b>		3:30pm - 4:00pm	Azure Foyer area
<b>2.D</b>	<b>Binary Companions</b>	4:00pm - 5:30pm	Azure I
<i>Chair:</i>	<i>Natalia Ivanova</i>		
4:00 PM	<b>Eva Villaver [I]</b>	Substellar companions and Planetary Nebulae shaping	
4:30 PM	<b>Samira Alharbi [S]</b>	Flickering in AGB stars: probing the nature of accreting companions	
4:45 PM	<b>Efrat Sabach [S]</b>	Accounting for planet-shaped planetary nebulae	
5:00 PM	<b>Discussion</b>		
<b>Beach Party</b>		8:00pm – 11:00pm	Tai Pak Beach

## Wednesday 6th December 2017

### 3.A Abundances/Photoionisation 9:00am - 10:30am Azure I

Chair: *Albert Zijlstra*

9:00 AM **Roger Wesson [I]**

Abundances in Planetary Nebulae

9:30 AM **Daniela Barria [P]**

Photometric analysis and CLOUDY modeling of Multiple Shell Planetary Nebulae

9:45 AM **Denise R. Gonçalves**

When Shape matters: the set of ICF equations derived from non-spherical 3D photoionization models

10:00 AM **Discussion**

### Morning Break & Poster Viewing 10:30am - 11:00am Azure Foyer area

### 3.B X-rays/Radio studies 11:00am - 12:30am Azure I

Chair: *Eric Lagadec*

11:00 AM **Martin Guerrero [I]**

The X-ray Emission from Planetary Nebulae: Where, When and Why

11:30 AM **Jesus Toala**

Simulations of the formation and X-ray emission from Hot Bubbles in PNe

11:45 AM **Marcin Hadjuk [P]**

Radio spectra of planetary nebulae

12:00 PM **Discussion**

### Lunch 12:30pm - 2:00pm Café bord de Mer

### Excursion 2:00pm – 7:00pm Big Buddha & Tai O

*We have organised a free excursion to the Big Buddha and Tai O Fishing Village on Lantau Island. Two Coaches will depart from outside main hotel entrance at 2:00pm*

#### **Preliminary Schedule**

- **Coaches depart the Auberge Hotel at 2:00pm**
- Arrive Big Buddha at ~2:30pm
- Spend 1.5 hours exploring site
- **Leave for Tai O fishing Village at 4:00pm**
- Arrive Tai O at ~4:20pm
- Spend ~1.5 hours visiting this famous “water village on stilts”
- **Leave Tai O fishing village for Auberge at 6:00pm**
- Arrive back at the Auberge at ~6:45pm

## Thursday 7th December 2017

<b>4.A</b>	<b>Molecules in PN</b>	9:00am - 10:30am	Azure I
<i>Chair:</i>	<i>Sun Kwok</i>		
09:00 AM	<b>Jan Cami [I]</b>		
	The formation of fullerenes in Planetary Nebulae		
09:30 AM	<b>SeyedAbdolreza Sadjadi [P]</b>		
	Vibrational Signatures of Complex Interstellar Organic Molecules		
09:45 AM	<b>Lizette Guzman Ramirez [P]</b>		
	Opening PANDORA's box: APEX observations of CO in PNe		
10:00 AM	<b>Poster Sparkler session – I</b>		
	2-min poster presentations		
10:15AM	<b>Discussion</b>		
<b>Morning Break &amp; Poster Viewing</b>		10:30am - 11:00am	Azure Foyer area
<b>4.B</b>	<b>Dust Studies</b>	11:00am - 12:30am	Azure I
<i>Chair:</i>	<i>Sofia Ramstedt</i>		
11:00 AM	<b>Kentaro Asano [P]</b>		
	HerPlaNS: Spatial distributions of dust properties via far-IR broadband map		
11:15 AM	<b>Katrina Exter</b>		
	Planetary Nebulae with Herschel		
11:30 AM	<b>Victor Doroshenko [P]</b>		
	The shell in the shell: PNe-like structure within TeV SNR HESS J1731-347		
11:45 AM	<b>Poster Sparkler session – II</b>		
	2-min poster presentations		
12:00 AM	<b>Discussion</b>		
12:20 AM			
<b>Lunch</b>		12:30pm - 2:00pm	Café bord de Mer
<b>4.C</b>	<b>Multi-wavelength Studies</b>	2:00pm - 3:30pm	Azure I
<i>Chair:</i>	<i>Quentin Parker</i>		
2:00 PM	<b>Andres Felipe Perez-Sanchez [P]</b>		
	Deep into the Water Fountains: A detailed study towards IRAS 15445-5449 and IRAS 18043-211		
2:15 PM	<b>Peter van Hoof</b>		
	Formation of a new bipolar planetary nebula in Sakurai's Object (V4334 Sgr)		
2:30 PM	<b>Toshiya Ueta</b>		
	To Understanding the Spatial Distributions of the Ionic/Atomic/Molecular/Dust Components in PNe		
2:45 PM	<b>Sun Kwok</b>		
	On the Origin of Morphological Structures of Planetary Nebulae		
3:00 PM	<b>Discussion</b>		
<b>Afternoon Break &amp; Poster Viewing</b>		3:30pm - 4:00pm	Azure Foyer area
<b>4.D</b>	<b>Post AGB stars</b>	4:00pm - 5:30pm	Azure I
<i>Chair:</i>	<i>Wolfgang Steffen</i>		
4:00 PM	<b>Eric Lagadec [I]</b>		
	Post-AGB star studies		
4:30 PM	<b>Xuan Fang [P]</b>		
	HST STIS UV Spectroscopy of Hen 3-1475		
4:45 PM	<b>Lisa Löbbling [S]</b>		
	Sliding along the Eddington limit - heavy-weight central stars of planetary nebulae		
5:00 PM	<b>Discussion</b>		
<b>Conference Dinner</b>		7:00pm – 10:00pm	Federal Palace Lantau

*N.B. Coaches depart outside Venue at 6:00 and 6:15 for transport to Sunny Bay MTR from whence a quick MTR to Tung Chung Station and the restaurant which is very close by.*

## Friday 8th December 2017

<b>5.A Post-AGB</b>	9:00am - 10:30am	Azure I
<i>Chair:</i>	<i>Griet Van de Steene</i>	
09:00 AM	<b>Hans Van Winckel [!]</b> Dissection of post-AGB binaries: discs and jets.	
09:30 AM	<b>Wolfgang Steffen [!]</b> A new look at the inside of the Owl nebula	
10:00 AM	<b>Discussion</b>	
<b>Morning Break &amp; Poster Viewing</b>	10:30am - 11:00am	Azure Foyer area
<b>5.B Current/future Instrumentation</b>	11:00am - 13:30pm	Azure I
<i>Chair:</i>	<i>Raghvendra Sahai</i>	
11:00 AM	<b>Carmen Sanchez Contreras [!]</b> ALMA acute view of PPNe: through the magnifying glass... and what we found there	
11:30 AM	<b>Xavier Haubois</b> VLT current and future diagnoses of PNe and their progenitors	
11:45 AM	<b>Nicholas Walton</b> Gaia: mapping the dynamics and morphologies of Asymmetrical Planetary Nebulae: Highlights from Gaia Data Release 1 and prospects from future Gaia data releases.	
12:00 PM	<b>David Frew [!]</b> The Solar Neighbourhood Redux: Revised estimates for the fraction of binary and H-deficient central stars from a volume-limited PN census	
12:30 PM	<b>Final Discussion &amp; Conference Summary</b>	
<b>Lunch</b>	1:00pm - 2:00pm	Café bord de Mer
<b>Conference Finished</b> <b>Take Down remaining posters</b>		