PROGRAMME AT A GLANCE

**Monday 4 July 2016**

- **10:30–15:30** Careers Day (Syndicate Room 4, Ground Floor)
- **16:00–18:00** Registration
- **17:00–19:00** Science with Impact (Auditorium 1, First Floor)
- **19:00–21:00** Pre-Conference Networking (The Restaurant, Third Floor)

**Tuesday 5 July 2016**

- **08:00–09:00** Registration & Opening of Exhibition
- **09:00** Animal President’s Medallist and YSAS Talks (Auditorium 1, First Floor)
- **10:30** Refreshment Break / Exhibition
- **11:00** APC1 / PC2 / A4 / C4 / P2
- **12:55** Lunch / Exhibition
- **13:55** APC1 / PC2 / A4 / C4 / P2
- **15:40** Refreshment Break / Exhibition
- **16:10–17:25** APC1 / PC2 / A4 / C4 / P2
- **18:00** BIDDER Lecture (Auditorium 1, First Floor)
- **19:00–22:30** Welcome Evening and Wine Trail / Meet the Conversation Physiology Editors (Stand Number 12)

**Wednesday 6 July 2016**

- **08:30–09:00** Registration & Exhibition
- **09:00** Cell and SEB+ President’s Medallist Talks (Auditorium 1, First Floor)
- **10:30** Refreshment Break / Exhibition
- **11:00** APC1 / PC1 / A1 / A3
- **12:40** Lunch / Exhibition / Meet the Young Academics (12:30–13:30, Room: Auditorium 1, First Floor)
- **13:40** APC1 / PC1 / A1 / A3
- **15:25** Refreshment Break / Exhibition
- **16:00–17:00** APC1 / PC1 / A1 / A3
- **17:15–19:30** Poster Session 1 (Exhibition Hall, Ground Floor)
- **19:00–22:00** Diversity Dinner (see page 8)

**Thursday 7 July 2016**

- **08:30–09:00** Registration & Exhibition
- **09:00** A8 / A10 / PC1 / P1 / A8
- **10:30** Refreshment Break / Exhibition
- **11:00–11:45** A8 / A10 / PC1 / P1 / A8
- **11:50** Woolhouse Lecture (Auditorium 1, First Floor)
- **12:50** Lunch / Exhibition
- **13:50** A8 / A10 / PC1 / P1 / A8
- **15:15** Refreshment Break / Exhibition
- **15:45–17:00** A8 / A10 / PC1 / P1 / A8
- **17:15–19:30** Poster Session 2 (Exhibition Hall, Ground Floor)

**Friday 8 July 2016**

- **08:30–09:00** Registration & Exhibition
- **09:00** APC1 / A2 / PC1 / P1 / A6
- **10:30** Refreshment Break / Exhibition
- **11:55–12:45** APC1 / A2 / PC1 / P1 / A6
- **12:45** Cell Biology Plenary Lecture (Auditorium 1, First Floor)
- **13:00** Lunch / Exhibition
- **13:50** APC1 / A2 / PC1 / P1 / A6
- **15:15** Refreshment Break / Exhibition
- **16:45–17:00** APC2 / A2 / PC1 / P1 / A6
- **18:30–21:00** Conference Dinner (Brighton Dome)

**Saturday 9 July 2016**

- **09:00–12:00** Symposium (Auditorium 1, First Floor)
- **12:00** Lunch / Exhibition
- **13:00** Symposium (Auditorium 1, First Floor)
- **14:00** Lunch / Exhibition
- **15:30** Symposium (Auditorium 1, First Floor)
- **16:00–17:00** Symposium (Auditorium 1, First Floor)
- **17:15–19:30** Symposium (Auditorium 1, First Floor)
- **19:00–22:30** Symposium (Auditorium 1, First Floor)

**Sunday 10 July 2016**

- **09:00–12:00** Symposium (Auditorium 1, First Floor)
- **12:00** Lunch / Exhibition
- **13:00** Symposium (Auditorium 1, First Floor)
- **14:00** Lunch / Exhibition
- **15:30** Symposium (Auditorium 1, First Floor)
- **16:00–17:00** Symposium (Auditorium 1, First Floor)
- **17:15–19:30** Symposium (Auditorium 1, First Floor)

**Programme at a Glance**

- **08:00–09:00** Registration & Opening of Exhibition
- **09:00** Animal President’s Medallist and YSAS Talks (Auditorium 1, First Floor)
- **10:30** Refreshment Break / Exhibition
- **11:00** APC1 / PC2 / A4 / C4 / P2
- **12:55** Lunch / Exhibition
- **13:55** APC1 / PC2 / A4 / C4 / P2
- **15:40** Refreshment Break / Exhibition
- **16:10–17:25** APC1 / PC2 / A4 / C4 / P2
- **18:00** BIDDER Lecture (Auditorium 1, First Floor)
- **19:00–22:30** Welcome Evening and Wine Trail / Meet the Conversation Physiology Editors (Stand Number 12)
ANNUAL MAIN MEETING BRIGHTON 2016
PROGRAMME MONDAY 4 JULY 30

ROOM
AUDITORIUM 1
FIRST FLOOR

AUDITORIUM 2
FIRST FLOOR

SYNDICATE ROOM 1
SYNDICATE WING

SYNDICATE ROOM 2
SYNDICATE WING

SESSION
ANNUAL MAIN MEETING BRIGHTON 2016 PROGRAMME MONDAY 4 JULY
ROOMS: ANIMAL SECTION – AUDITORIUM 1, FIRST FLOOR; PLANT SECTION – AUDITORIUM 2, FIRST FLOOR

08:00-09:00 ANIMAL AND PLANT PRESIDENTS MEDALLISTS FOLLOWED BY YOUNG SCIENTIST AWARD SESSION
(SEE PAGES 6 & 7 FOR PROGRAMME OF TALKS)
ROOM: ANIMAL SECTION – AUDITORIUM 1, FIRST FLOOR; PLANT SECTION – AUDITORIUM 2, FIRST FLOOR

09:00-10:30 REFRESHMENT BREAK / EXHIBITION

10:30-12:40 SESSION 1 – CONSERVATION PHYSIOLOGY: A CHANGING WORLD – PROBLEMS AND SOLUTIONS SUPPORTED BY CONSERVATION PHYSIOLOGY

12:40-13:00 REFRESHMENT BREAK / EXHIBITION

13:00-14:15 SESSION 2 – THE ROLE OF DIVERGENT VARIATION IN THE BEHAVIOUR OF ANIMAL GROUPS

14:15-14:45 SESSION 3 – SUPER RESOLUTION MICROSCOPY HELPING TO SOLVE BIOLOGICAL QUESTIONS

14:45-15:00 LUNCH / EXHIBITION

15:00-16:15 SESSION 4 – THE ROLE OF INDIVIDUALITY IN THE BEHAVIOUR OF ANIMAL GROUPS

16:15-16:30 SESSION 5 – VASCULAR TISSUE DEVELOPMENT – PLANT VASCULAR TISSUE DEVELOPMENT

16:30-17:45 SESSION 6 – OPTIMISING NEURAL DEVELOPMENT – NEURAL DEVELOPMENT

17:45-18:00 LUNCH / EXHIBITION

18:00-20:00 POSTER SESSION

20:00-22:00 SOCIAL EVENTS

22:00-24:00 LUNCH / EXHIBITION

ANNUAL MAIN MEETING BRIGHTON 2016
PROGRAMME MONDAY 4 JULY 31

ROOM
SYNDICATE ROOM 3
SYNDICATE WING
SYNDICATE ROOM 1
SYNDICATE WING

SESSION
ANNUAL MAIN MEETING BRIGHTON 2016 PROGRAMME MONDAY 4 JULY
ROOM: ANIMAL SECTION – AUDITORIUM 1, FIRST FLOOR; PLANT SECTION – AUDITORIUM 2, FIRST FLOOR

09:00-09:30 SESSION 1 – THE ROLE OF.drawImage(0,0,999,999)
13:55 Prof Andrea Fuller University of the Witwatersrand, South Africa Measuring how a changing physical world will impact the performance of large terrestrial mammals APC1.6

14:00 Dr Deepika Iyer P. University of Cambridge, United Kingdom Investigating conservation of function in GRAS/SCARECROW LIKE transcription factors in root architecture and nodulation PC2.19

14:05 Dr Shweta Sharma University of Delhi, India Comparative analysis of RNA Binding Domain containing proteins in Arabidopsis and rice PC2.20

14:10 Rita Saravia Institute of Plant Biotechnology, University of Zurich, Switzerland Root development: A new perspective on organ polarity C4.4

14:15 Dr Steven Lee University of Cambridge, United Kingdom Population variation in mountain refera social networks: individuals, demography and ecology impact on structure C4.6

14:20 Dr Sue Ann Grange University of Manchester, United Kingdom Linking genotype to the acquisition of herbivore resistance in Arabidopsis C4.7

14:25 Ms Shweta Shilka University of Cape Town, South Africa Voltage-gated Ca2+ channels in shark sensory epithelia A4.8

14:30 Dr Alexei Vavilin University of Exeter, United Kingdom Understanding the evolutionary architecture and nodulation APC1.8

14:35 Dr Sarah Cooper University of Glasgow, United Kingdom Exploration of the potential role of SCARECROW-like transcription factors in tomato flower development C4.9

14:40 Dr Ying Zhang University of Heidelberg, Germany The role of histone deacetylases in plant growth A4.10

14:45 Dr Georgina Clark University of Exeter, United Kingdom The role of histone acetylases in plant growth A4.11

14:50 Dr Ayumi Endo Tohoku University, Japan The role of histone deacetylases in plant growth A4.12

14:55 Dr Alexei Vavilin University of Exeter, United Kingdom Understanding the evolutionary architecture and nodulation APC1.8

15:00 Ms Xiaoyu Li University of California, Berkeley, United States The role of histone deacetylases in plant growth A4.13

15:05 Dr Thomas Gehrt University of Halle, Germany The role of histone deacetylases in plant growth A4.14

15:10 Dr Anna Devine University of Cambridge, United Kingdom The role of histone deacetylases in plant growth A4.15

15:15 Dr Charlotte Robinson University of Cambridge, United Kingdom The role of histone deacetylases in plant growth A4.16

15:20 Dr Anna Devine University of Cambridge, United Kingdom The role of histone deacetylases in plant growth A4.17

15:25 Ms Rosa Bella University of California, Berkeley, United States The role of histone deacetylases in plant growth A4.18

15:30 Dr Christophe Smagys University of Exeter, United Kingdom The role of histone deacetylases in plant growth A4.19

15:35 Dr Anna Devine University of Cambridge, United Kingdom The role of histone deacetylases in plant growth A4.20

15:40 Dr Anna Devine University of Cambridge, United Kingdom The role of histone deacetylases in plant growth A4.21

REFRESHMENT BREAK / EXHIBITION
ANNUAL MAIN MEETING BRIGHTON 2016

PROGRAMME MONDAY 4 JULY 34

SYNDICATE ROOM 1
FIRST FLOOR

AUDITORY 1

A3 – CONSERVATION PHYSIOLOGY: A CHANGING WORLD - PROBLEMS AND SOLUTIONS SUPPORTED BY CONSERVATION PHYSIOLOGY

CHAIR: DR JUDE RUMMER

15.15

Dr David Castantini
University of Antwerp, Belgium
Stepping into the wild: tuning oxidative balance to changing environments

APC1.11

15.25

Mr Hayato Hiranaki
The United Graduate School of Agricultural Science, Iwate University, Japan
Plants change cold perception system depending on the environment

PC2.28

15.40

Miss Holly C Armstrong
University of Cambridge, United Kingdom
Analysis and pre-oxidant gene expression and oxidative damage in the kidney tissue of grey seal (Halichoerus grypus) pups during suckling and the post weaning fast

APC1.12

15.55

Prof Gordan Nilsen
University of Oslo, Norway
Expression of genes involved in brain GABAergic transmission in three-spined stickleback (Gasterosteus aculeatus) exposed to nearfuture CO2

APC1.14

17.25

End of session

End of session

End of session

BIDDER LECTURE: TRIBUTE TO PROF RODER WILEIDGE

PROF CHRIS BUCKLAND (DURHAM UNIVERSITY, UK), PROF GE NEWHAM (KING'S COLLEGE LONDON, UNITED KINGDOM) AND PROF MARY CLEARY (IMPERIAL COLLEGE LONDON, UNITED KINGDOM)

WELCOME EVENING AND WINE TRAIL

18.00 – 18.30

18.30 – 22.30

ANNUAL MAIN MEETING BRIGHTON 2016

PROGRAMME MONDAY 4 JULY 35

SYNDICATE ROOM 3
FIRST FLOOR

AUDITORY 2

A7 – MORPHOEPLASTY: STRUCTURES, COMPLEXES AND BIOSIGNS (SUPPORTED BY THE JOURNAL OF EXPERIMENTAL BOTANY)

CHAIR: DR LEVI YANT

16:00

Prof David N Lee
University of Edinburgh, United Kingdom
The information for the United Graduate School of Agricultural Science, Iwate University, Japan in three-spined stickleback

PC2.27

16:10

Dr Michael Hothorn
University of Geneva, Switzerland
Uncovering the role of hormone signalling

PC2.29

16:25

PC2.28

16:40

Miss Holly C Armstrong
University of Cambridge, United Kingdom
Analysis and pre-oxidant gene expression and oxidative damage in the kidney tissue of grey seal (Halichoerus grypus) pups during suckling and the post weaning fast

APC1.12

16:55

Prof Gordan Nilsen
University of Oslo, Norway
Expression of genes involved in brain GABAergic transmission in three-spined stickleback (Gasterosteus aculeatus) exposed to nearfuture CO2

APC1.14

17.25

End of session

End of session

End of session

BIDDER LECTURE: TRIBUTE TO PROF RODER WILEIDGE

PROF CHRIS BUCKLAND (DURHAM UNIVERSITY, UK), PROF GE NEWHAM (KING'S COLLEGE LONDON, UNITED KINGDOM) AND PROF MARY CLEARY (IMPERIAL COLLEGE LONDON, UNITED KINGDOM)

WELCOME EVENING AND WINE TRAIL

18.00 – 18.30

18.30 – 22.30
ANNUAL MAIN MEETING BRIGHTON 2016

PROGRAMME TUESDAY 5 JULY

ROOM
AUDITORIUM 1
FIRST FLOOR
AUDITORIUM 2
FIRST FLOOR
SYNDICATE ROOM 1
SYNDICATE WING
SYNDICATE ROOM 2
SYNDICATE WING

SESSION
APC - CONSERVATION PHYSIOLOGY: A CHANGING WORLD - PROBLEMS AND SOLUTIONS SUPPORTED BY: CONSERVATION PHYSIOLOGY
APC - GENERAL BIOCHEMISTRY
APC - COMPARATIVE CARDIO-RESPIRATORY PHYSIOLOGY

REGISTRATION / OPENINGS OF EXHIBITION

08:30
CELL & SEB: PRESIDENT'S MEDALLIST TALKS (SEE PAGE 9 FOR PROGRAMME TALKS) ROOM: AUDITORIUM 1, FIRST FLOOR

08:40
REFRESHMENT BREAK / EXHIBITION

CHAIR
CHAIR: PROF CRAIG FRANKLIN
CHAIR: PROF PETER ARTS
CHAIR: DR DEE SULLI

09:00
Dr Kevin Hultine
Desert Botanical Garden, United States
Species introductions in desert riparian ecosystems: the cascading impacts of local adaptation and resource allocation strategies on biotic interactions
APC 10

09:15
Mr Benedict D Chivers
University of Exeter, United Kingdom
From molecules to tissue: evaluating the target selectivity of two new axichinone herbicides
P2-17

09:30
Dr Michael Berenbrink
University of Exeter, United Kingdom
Plumule meristem plasticity: can we nearly there?
P4-1

09:45
Dr Lesley A Alton
Monash University, Australia
Understanding the causes of global amphibian declines: how important is environmental context?
APC 16

09:55
Mr Raf Claes
University of Antwerp, Belgium
The effects of cranio-kinesins on the midline of domestic chick: (Gallus gallus domesticus)
A5.1

10:00
Ms Elizabeth Kienuchi
University of Strathclyde, United Kingdom
Localised frequency- and amplitude-dependent motion in the locust tympanum: An investigation into active processes in an insect ear
A8.1

10:10
Ms Nixia E Sumon
UNC Chapel Hill, United States
Quantifying pulsing patterns in animal models; a first step to coupling collective behaviour and fluid dynamics
A5.4

10:20
Ms Benedita D Chivers
University of Lincoln, United Kingdom
Sing me an old-fashioned song: wing resonances in the locust Drosophila melanogaster (Insecta: Orthoptera: Drosophilidae)
A5.5

10:30
Ms Julia E Summon
UNC Chapel Hill, United States
Quantifying pulsing patterns in animal models: a first step to coupling collective behaviour and fluid dynamics
A5.4

10:40
Ms Mike Fleuren
Wageningen University, Netherlands
Morphology and 3D fast-start escape performance of pregnant and virgin live-bearing fish
A6.1

10:50
Ms Masako Miyaku
Tokai University, Japan
Cortisol in Atlantic cod: is adaption to higher than present temperatures possible?
A5.6

11:00
Mr Mark Bayley
Aarhus University, Denmark
Canio-tisibius breathing fish be adapted to higher than present temperatures?
A5.4

11:10
Ms Angelique Ollier
Institut des Sciences de la Mer de Brest, France
Influence of temperature on oxygen consumption in two krill species from the St. Lawrence
A5.3

11:20
Mr Dr Ifetutu Ayodele
The University of Tokyo, Japan
Measurement of jumping force of a fruit fly using a MEMS force plate
A6.8

11:30
Ms Marie Muecher
Rutgers University, New Jersey
Anaerobic energy production in the gut of the golden mullet in a warming seawater context
A5.6

11:40
Ms Dr Anthony Bishopp
University of Exeter, United Kingdom
From molecules to tissue: Evaluating the target selectivity of two new axichinone herbicides
P2-17

11:50
Miss Jolanta Przyniak
University of Warsaw, United Kingdom
Evaluating the target selectivity of two new axichinone herbicides
P2-17

12:00
Prof Richard Napier
University of Exeter, United Kingdom
A structure-activity profile for the acetylcholine carrier AChX1
P1-38

12:10
Panel Discussion

ANNUAL MAIN MEETING BRIGHTON 2016

PROGRAMME TUESDAY 5 JULY

ROOM
SYNDICATE ROOM 3
SYNDICATE WING
SYNDICATE ROOM 4
SYNDICATE WING
MEETING ROOM 1A
SYNDICATE WING
MEETING ROOM 1B
SYNDICATE WING

SESSION
P2 - HORMONE RECEPTORS: STRUCTURES, COMPLEXES AND BIOSENSORS SPONSORED BY: THE JOURNAL OF EXPERIMENTAL BOTANY
P4 - THE PLANT ENDOPLASMIC RETICULUM: A DYNAMIC MULTI-TASKER ORGANELLE
SEB - SCIENCE COMMUNICATION TOOLKIT
SEB - SCIENCE COMMUNICATION TOOLKIT
P5 - MAKING CONNECTIONS - PLANT VASCULAR TISSUE DEVELOPMENT SPONSORED BY: THE JOURNAL OF EXPERIMENTAL BOTANY

REGISTRATION / OPENINGS OF EXHIBITION

09:00
CELL & SEB: PRESIDENT'S MEDALLIST TALKS (SEE PAGE 9 FOR PROGRAMME TALKS) ROOM: AUDITORIUM 1, FIRST FLOOR

10:00
REFRESHMENT BREAK / EXHIBITION

CHAIR
CHAIR: DR STEFAN KEPKEBEC
CHAIR: DR VERENA KRIECHBAUMER
CHAIR: DR JENNY SIDDON
CHAIR: PROF SIMON TURNER

10:10
Dr Kim Snowden
The New Zealand Institute for Plant Food Research, New Zealand
Strigolactone perception by DAZE and the environmental control of branching
P2-14

10:25
Dr Eliza Jakobtalo
University of Helsinki, Finland
Structure and dynamics of the endoplasmic reticulum in cultured mammalian cells
P4.1

10:40
Dr Mary Williams
American Society of Plant Biologists, United States
Images for impact
SEB 2.2

10:55
Dr Mike Fleuren
University of California Davis, United States
Transcriptional regulation of xylem development
P5.11

11:10
Dr Minna Haki
University of Manchester, United Kingdom
The role of epigallocatechin in xylem vessel differentiation
P5.12

11:25
Dr Anthony Bishop
University of Nottingham, United Kingdom
From molecules to tissue: organisation of root vascular pattern
P5.14

11:40
Dr Peter McCourt
University of Toronto, Canada
Chemical biology of strigolactone perception in the parasitic plant Striga hermonthica
P2.16

11:55
Prof Eva Stöger
University of Warwick, United Kingdom
Tomographic docking suggests the mechanism of auxin receptor TIR1 selectivity
P2.15

12:10
Prof Dr Michael Endo
Nara Institute of Science and Technology, Japan
NTPase - wide screening of CLAVATA3/EHD-related (CLE) peptides
P5.13

12:25
Dr Drifee F Zou
University of Bremen, Germany
Vascular pattern and fluid dynamics of the relict monstrosa wing resonances in the relict monstrosa wing
P4.1

12:40
Dr Drifee F Zou
University of Bremen, Germany
Vascular pattern and fluid dynamics of the relict monstrosa wing resonances in the relict monstrosa wing
P4.1
**ANNUAL MAIN MEETING BRIGHTON 2016
PROGRAMME TUESDAY 5 JULY 38**

**SESSION 10:40 – 15:00**

**ROOM 1: SYNDICATE ROOM 1**

<table>
<thead>
<tr>
<th>Chair</th>
<th>Time</th>
<th>Topic</th>
<th>Speaker(s)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>10:40</td>
<td>REFRESHMENT BREAK / EXHIBITION</td>
<td></td>
</tr>
</tbody>
</table>

**ROOM 2: SYNDICATE ROOM 2**

<table>
<thead>
<tr>
<th>Chair</th>
<th>Time</th>
<th>Topic</th>
<th>Speaker(s)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>10:40</td>
<td>REFRESHMENT BREAK / EXHIBITION</td>
<td></td>
</tr>
</tbody>
</table>

**ROOM 3: SYNDICATE ROOM 3**

<table>
<thead>
<tr>
<th>Chair</th>
<th>Time</th>
<th>Topic</th>
<th>Speaker(s)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>10:40</td>
<td>REFRESHMENT BREAK / EXHIBITION</td>
<td></td>
</tr>
</tbody>
</table>

**ROOM 4: SYNDICATE ROOM 4**

<table>
<thead>
<tr>
<th>Chair</th>
<th>Time</th>
<th>Topic</th>
<th>Speaker(s)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>10:40</td>
<td>REFRESHMENT BREAK / EXHIBITION</td>
<td></td>
</tr>
</tbody>
</table>

**ROOM 5: MEETING ROOM 1A**

<table>
<thead>
<tr>
<th>Chair</th>
<th>Time</th>
<th>Topic</th>
<th>Speaker(s)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>10:40</td>
<td>REFRESHMENT BREAK / EXHIBITION</td>
<td></td>
</tr>
</tbody>
</table>

**ROOM 6: MEETING ROOM 1B**

<table>
<thead>
<tr>
<th>Chair</th>
<th>Time</th>
<th>Topic</th>
<th>Speaker(s)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>10:40</td>
<td>REFRESHMENT BREAK / EXHIBITION</td>
<td></td>
</tr>
</tbody>
</table>
SESSION
APC1 – CONSERVATION PHYSIOLOGY
A CHANGING WORLD – PROBLEMS AND SOLUTIONS
SUPPORTED BY: CONSERVATION PHYSIOLOGY
CHAIR: PROF CRAG FRANKLIN
CHAIR: DR KAREN POLIZZI
CHAIR: PROF JOHAN VAN LEEUWEN
CHAIR: DR GEMI SALI
16:00
Dr Mia Hoogenboom
James Cook University, Australia
The energetic triangle: a physiology-based life-history classification scheme for
reef corals
APC1.30
16:30
Mr Matthew Gazzar
University of Manitoba, Canada
Metabolic and growth effects of
daily acute heat challenge on a
cold water polyp
APC1.31
16:40
Dr Basjiaan Wang
University of Edinburgh, United
Kingdom
Synthetic approaches to exploring
evolution and development
PC1.5
16:45
Dr Robbie S Wilson
University of Queensland, Australia
Motor skill development and
optimal movement speeds in
predator-prey interactions
PC1.6
17:00
Dr David T Booth
University of Queensland, Australia
Why is the hatching success of
green turtle eggs on Raine Island so low?
APC1.45
17:10
End of Session

SYNDICATE ROOM 1 – DYNAMIC ORGANISATION
GROUND FLOOR
MEETING ROOM 1A
SYNDICATE ROOM 2 – SYNTHETIC BIOLOGY:
STRUCTURES, COMPLEXES AND
BIOSNERSORS SPONSORED BY: THE
JOURNAL OF EXPERIMENTAL BOTANY
CHAIR: DR PATRICK SCHIRER
CHAIR: PROF DAVID EwANS
16:00
Prof Barbara Halkier
University of Copenhagen, Denmark
Orchestrating the glucosinolate biosynthetic pathway
P4.10
16:40
Dr Eric C Schirmer
University of Edinburgh, United
Kingdom
An additional layer of genome
regulatory development and
disease through tissue-specific
nuclear envelope gene tethering
C1.4
17:00
Dr Verena Kriechbaum
Oxford Brookes University, United
Kingdom
Aznin biosynthesis and the
endoplasmic reticulum
P4.11
17:10
Dr Stephen D Thorpe
Queen Mary University of London, United
Kingdom
Lamin A/C localisation and
phosphorylation in response to cyclic
tensile strain in dependent-on stem
endoplasmic reticulum state
C1.3
End of Session
End of Session

SYNDICATE ROOM 3 – CONSERVATION PHYSIOLOGY
MEETING ROOM 1B
SYNDICATE ROOM 4 – CARDIO-RESPIRATORY PHYSIOLOGY
SYNDICATE ROOM 5 – VASCULAR TISSUE DEVELOPMENT
MEETING ROOM 1A
END OF DAY

Poster Session 1
Diversity Dinner

Poster Session 1
Diversity Dinner
### ANNUAL MAIN MEETING BRIGHTON 2016
#### PROGRAMME WEDNESDAY 6 JULY

<table>
<thead>
<tr>
<th>ROOM</th>
<th>AUDITORIUM 1</th>
<th>FIRST FLOOR</th>
<th>AUDITORIUM 2</th>
<th>FIRST FLOOR</th>
<th>SYNDICATE ROOM 1</th>
<th>SECOND FLOOR</th>
<th>SYNDICATE ROOM 2</th>
<th>SECOND FLOOR</th>
<th>SYNDICATE ROOM 3</th>
<th>THIRD FLOOR</th>
<th>SYNDICATE ROOM 4</th>
<th>THIRD FLOOR</th>
<th>SYNDICATE ROOM 5</th>
<th>THIRD FLOOR</th>
</tr>
</thead>
<tbody>
<tr>
<td>08:30</td>
<td>REGISTRATION/ EXHIBITION</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>CHAIR</td>
<td>Chair: Dr Michael Berendzen</td>
<td>Chair: Dr Hervé Courtice</td>
<td>Chair: Dr Ben Wimbush</td>
<td>Chair: Miss Angela White</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>SESSION</strong></td>
<td><strong>ANIMAL ANKORAL BIOLOGY</strong></td>
<td><strong>PLANTS – SYNTHETIC BIOLOGY: SYSTEMS DESIGN AND RE-WIRING</strong></td>
<td><strong>CELLS: FROM SOURCE TO SINE: RESOURCE PARTITIONING IN PLANTS</strong></td>
<td><strong>TOOLS FOR SYNTHETIC BIOLOGY 1</strong></td>
<td><strong>SOURCE ACTIVITY</strong></td>
<td><strong>TOOLS FOR SYNTHETIC BIOLOGY 2</strong></td>
<td><strong>SOURCE ACTIVITY</strong></td>
<td><strong>TOOLS FOR SYNTHETIC BIOLOGY 3</strong></td>
<td><strong>SOURCE ACTIVITY</strong></td>
<td><strong>TOOLS FOR SYNTHETIC BIOLOGY 4</strong></td>
<td><strong>SOURCE ACTIVITY</strong></td>
<td><strong>TOOLS FOR SYNTHETIC BIOLOGY 5</strong></td>
<td><strong>SOURCE ACTIVITY</strong></td>
<td><strong>TOOLS FOR SYNTHETIC BIOLOGY 6</strong></td>
</tr>
<tr>
<td>08:50</td>
<td>Dr Tommy Norin University of Glasgow, United Kingdom</td>
<td>Prof Craig B White Monash University, Australia</td>
<td>Dr Christiane Abreu University of Essex, United Kingdom</td>
<td>Prof Christine R Banfield University of Exeter, United Kingdom</td>
<td>Improving leaf carbon assimilation in a transgenic plant P1.1</td>
<td>Prof Claudia Köhler Hebrew University of Jerusalem, Israel</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>08:55</td>
<td>Mrs Natalia Szulda Institute of Environmental Sciences Jagiellonian University, Poland</td>
<td>Dr Bioge Grossi BMC Plant Sci, Spain</td>
<td>Dr Jennifer Cunniff CABE, United Kingdom</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>09:00</td>
<td>Mr Blake A Miller Rensselaer Polytechnic Institute, United States</td>
<td>Rensselaer Polytechnic Institute, United States</td>
<td></td>
<td>Rensselaer Polytechnic Institute, United States</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>09:05</td>
<td>Agnieszka Gadweska Institute of Environmental Sciences Jagiellonian University, Poland</td>
<td>Rensselaer Polytechnic Institute, United States</td>
<td>Rensselaer Polytechnic Institute, United States</td>
<td>Rensselaer Polytechnic Institute, United States</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>09:10</td>
<td>Dr Antoine Stier Institute of Biodiversity Animal Health and Comparative Medicine University of Glasgow, United Kingdom</td>
<td>Rensselaer Polytechnic Institute, United States</td>
<td>Rensselaer Polytechnic Institute, United States</td>
<td>Rensselaer Polytechnic Institute, United States</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>09:15</td>
<td>Beelex - clone your spiracles and put your tracheal system to use against parasite infestations At-5</td>
<td>Rensselaer Polytechnic Institute, United States</td>
<td>Rensselaer Polytechnic Institute, United States</td>
<td>Rensselaer Polytechnic Institute, United States</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>09:20</td>
<td>Miss Hannah Safi Royal Veterinary College, United Kingdom</td>
<td>Dr Catharina Oxlon Department of Biological and Environmental Sciences, University of Gothenburg, Sweden</td>
<td>Prof Collin P Osborne University of Sheffield, United Kingdom</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>09:25</td>
<td>Blood flow and the development of angiogenic novel investigative measurements At-5</td>
<td></td>
<td></td>
<td>Rensselaer Polytechnic Institute, United States</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>09:30</td>
<td>Dr Miroslav Götting University of Turku, Finland</td>
<td>Dr Avner Cnaani Agricultural Research Organization, Israel</td>
<td>Dr Christophor Grafen University of Tübingen, Germany</td>
<td>Dr Daniel Brayson King’s College London, United Kingdom</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>09:35</td>
<td>Regulation of gene expression in fish red blood cells At-6</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>09:40</td>
<td>Prof Debrah Brüggemann University of Bremen, Germany</td>
<td>Prof Charles Lin Novozymes, Denmark</td>
<td>Dr Lukasz Krawczak University of Edinburgh, United Kingdom</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>09:45</td>
<td>Synthetic extracellular matrices for extruded nanofibrous scaffolds At-1.3</td>
<td></td>
<td></td>
<td>Rensselaer Polytechnic Institute, United States</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>09:50</td>
<td>Dr Tony D Williams Simon Fraser University, Canada</td>
<td></td>
<td></td>
<td>Rensselaer Polytechnic Institute, United States</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>09:55</td>
<td>Synergistic and antagonistic effects of two maternally-derived egg components (antibodies and testosterone) on offspring phenotype At-1.0</td>
<td></td>
<td></td>
<td>Rensselaer Polytechnic Institute, United States</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>10:00</td>
<td>REFRESHMENT BREAK / EXHIBITION</td>
<td></td>
<td></td>
<td>Rensselaer Polytechnic Institute, United States</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
ANNUAL MAIN MEETING BRIGHTON 2016

SYNDICATE ROOM 3

11:45 MOVE TO PLENARY HALL FOR WOODHOUSE LECTURE

PROF JANE LANDALE (UNIVERSITY OF OXFORD, UNITED KINGDOM)

CHAIR: DR SHAUN KILLEN

CHAIR: DR PETER HUBBARD

CHAIR: PROF COLIN OSBOURNE

SUBSESSION

SYNTHETIC METABOLISM 2

SIME DEVELOPMENT

11:50 Dr Federico Becerra Max Planck Institute for Evolutionary Anthropology, Germany

Bitumen: Domestication effect on biodiversity performance and aggression in rats

A10.5

Dr Jan Bartusek University of Rostock, Germany

Feedback integration on the fly – a model for phase-control and motor control in Drosophila by cyclic and graded neural inputs

A10.10

Dr Tobias Erb Max Planck Institute for Terrestrial Microbiology, Germany

We do it our (pathway): Bringing inorganic carbon (CO₂) into life with synthetic CO₂ fixation

P1.12

Prof Uwe Sonnewald University of Erlangen-Nürnberg, Germany

Concepts and approaches to improve source-to-sink carbon allocation

P1.12

11:55 Miss Teresa A Van Walsum University of Ruhr, Germany

Marine birds sleeping at sea

A3.11

Miss Catherine J A Williams Aarhus University, Denmark

Local anamorphosis? The systemic effect of subcutaneous light in the American bullfrog (Lithobates catesbeianus)

A10.11

12:00 Miss Lauren E James Aarhus University, Denmark

Feeding behavior as an indicator of pain perception in the burrowing python (Python regius)

A5.12

Miss Martta Viinamäki University of Helsinki, Finland

The effect of ambient light on vulnerability to photodamage in Croatian ayers

A10.12

ANNUAL MAIN MEETING BRIGHTON 2016

SYNDICATE ROOM 4

11:45 MOVE TO PLENARY HALL FOR WOODHOUSE LECTURE

PROF JANE LANDALE (UNIVERSITY OF OXFORD, UNITED KINGDOM)

LUNCH / EXHIBITION

CHAIR: PROF ROB JAMES

CHAIR: DR STEVEN PENFIELD

CHAIR: DR SHAUN KILLEN

CHAIR: DR PETER HUBBARD

CHAIR: PROF EMILY BREEZE

CHAIR: DR MICHAEL BERENBRINK

CHAIR: DR KATJA SCHMIDT

CHAIR: PROF COLIN OSBOURNE

SYNDICATE ROOM 5

11:45 MOVE TO PLENARY HALL FOR WOODHOUSE LECTURE

PROF JANE LANDALE (UNIVERSITY OF OXFORD, UNITED KINGDOM)

LUNCH / EXHIBITION

12:00

12:05

12:10

12:15

12:20

12:25

12:30

12:35

12:40

12:45

12:50

12:55

13:00

13:05

13:10

13:15

13:20
<table>
<thead>
<tr>
<th>Room</th>
<th>Auditorium 1</th>
<th>Auditorium 2</th>
<th>Syndicate Room 1</th>
<th>Syndicate Room 2</th>
</tr>
</thead>
<tbody>
<tr>
<td>Session</td>
<td>Annuity Main Meeting Brighton 2016 Programme Wednesday 6 July</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>14:35</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Dr Linda C Weiss</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>1/15</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>15:00</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Miss Sarah C Paul</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>15:00</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Prof Barry Pinshow</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>15:05</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Dr Peter C Hubbard</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>15:10</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Prof Stephen P Long</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>15:15</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Miss Angela C White</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>15:20</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Ms Verónica Rosas</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>15:25</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Dr Patrick Marson</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>15:30</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Ms Donna Avery-Carrol</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>15:35</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Dr George W Bassel</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**Programme Details**

**Room Auditorium 1**
1. **14:35**
   - Dr Linda C Weiss
   - Imperial College, United Kingdom
   - Mechanisms of predator-induced phenotypic plasticity in the freshwater crustacean *Daphnia*.

**Room Auditorium 2**

**Syndicate Room 1**
1. **15:00**
   - Miss Sarah C Paul
   - Exeter University, United Kingdom
   - Predation risk and parental effects influence toxin content and colonization of ladybird eggs.

**Syndicate Room 2**
1. **15:05**
   - Prof Barry Pinshow
   - Ben-Gurion University of the Negev, Israel
   - Similar hormone architecture in three scorpion species implies similar ecological function.

**Syndicate Room 3**
1. **15:10**
   - Dr Peter C Hubbard
   - Centro de Ciências do Mar, Portugal
   - Offactory sensitivity of the Senegalese sole (*Solea senegalensis*) to conspecific units, and its potential role in chemical communication.

**Syndicate Room 4**
1. **15:15**
   - Prof Stephen P Long
   - University of Illinois, United States
   - Variation in apparent sink-strength within genomes of our major food crops sufficient to allow full realization of increased photosynthesis?

**Meeting Room 1A**
1. **16:00**
   - Ms Verónica Rosas
   - University of Santiago, Chile
   - Dynamics of nuclear architecture during differentiation of plant root cells.

**Meeting Room 1B**
1. **16:05**
   - Dr Patrick Marson
   - The Plant Endoplasmic Reticulum: A Dynamic Multifunctional Organellle

**Meeting Room 1C**
1. **16:10**
   - Ms Donna Avery-Carroll
   - Aberystwyth University, United Kingdom
   - Lab testing & modelling to understand germination and seedling establishment of bioenergy crop Miscanthus.

**Meeting Room 2A**
1. **16:15**
   - Dr George W Bassel
   - University of Birmingham, United Kingdom
   - A cellular basis for decision-making in Arabidopsis seeds.

**Meeting Room 2B**
1. **16:20**
   - Dr Tina L. Steinbock
   - Royal Holloway University London, United Kingdom
   - G protein coupled olfactory communication borne technology to monitor behavioral responses.

**Meeting Room 2C**
1. **16:25**
   - Vesa T. Kuiper
   - Institute of Experimental Botany AS CR, Czech Republic
   - Nuclear organization in interspecific plant hybrids revealed by 3D-FISH.

**Meeting Room 2D**
1. **16:30**
   - Dr George B. Littlejohn
   - University of Exeter, United Kingdom
   - Rice F-ACTIN cytoskeleton disruption and compromised choline transport function caused by infection with the rice blast fungus, *Magnaporthe grisea*.

**Meeting Room 3A**
1. **16:35**
   - Dr Verónica Rosas
   - University of Santiago, Chile
   - Offactory sensitivity of the Senegalese sole (*Solea senegalensis*) to conspecific units, and its potential role in chemical communication.

**Meeting Room 3B**
1. **16:40**
   - Dr Patrick Marson
   - The Plant Endoplasmic Reticulum: A Dynamic Multifunctional Organellle

**Meeting Room 3C**
1. **16:45**
   - Ms Donna Avery-Carroll
   - Aberystwyth University, United Kingdom
   - Lab testing & modelling to understand germination and seedling establishment of bioenergy crop Miscanthus.

**Meeting Room 3D**
1. **16:50**
   - Dr George W Bassel
   - University of Birmingham, United Kingdom
   - A cellular basis for decision-making in Arabidopsis seeds.

**Meeting Room 4A**
1. **17:05**
   - Dr Tina L. Steinbock
   - Royal Holloway University London, United Kingdom
   - G protein coupled olfactory communication borne technology to monitor behavioral responses.

**Meeting Room 4B**
1. **17:10**
   - Vesa T. Kuiper
   - Institute of Experimental Botany AS CR, Czech Republic
   - Nuclear organization in interspecific plant hybrids revealed by 3D-FISH.

**Meeting Room 4C**
1. **17:15**
   - Dr George B. Littlejohn
   - University of Exeter, United Kingdom
   - Rice F-ACTIN cytoskeleton disruption and compromised choline transport function caused by infection with the rice blast fungus, *Magnaporthe grisea*.

**Meeting Room 4D**
1. **17:20**
   - Dr Verónica Rosas
   - University of Santiago, Chile
   - Offactory sensitivity of the Senegalese sole (*Solea senegalensis*) to conspecific units, and its potential role in chemical communication.
15:45 Mr Darryl McHale
University of Glasgow, United Kingdom
Interactions between parental traits, environmental harshness and growth rate in determining rates of tolerance loss in wild juvenile salmon AS 16

16:00 Mr Luca Peruzzo
National DEMeography Centre Southampton, United Kingdom
Daily cycle hypoxia induces the moulting cycle in the shrimp Palaeomonetes varium: class from a transcriptomics approach AS 17

16:15 My Jules B Devecx
The University of Auckland, New Zealand
Hypoxia tolerant species take advantage of intercellular acidosis to maintain mitochondrial function AS 18

16:30 Ms Teerika Harvathová
Institute of Environmental Sciences, Jagiellonian University, Poland
The impact of temperature and salinity on lipped-smelt interactions AS 19

16:45 Dr Jofesin Sandin
Uppsala University, Sweden
Coral reef fishes show negligible physiological and behavioural adjustments to elevated CO2 AS 20

17:00 Dr Oriana Migliazzo
Stazione Zoologica Anton Dohrn, Italy
Adaptive response of a sea urchin Paracentrotus lividus population inhabiting volcanic CO2-vents (Tyrrenian Sea, Italy) AS 21

15:45 My Johannes Overgaard
Aarhus University, Denmark
Differences in renal capacity and the concentration of compatible osmoles are underlying the interspecific variation in Drosophila cold tolerance A10:16

16:00 My Jeroen Bijls
University of Utrecht, Netherlands
The underlying mechanisms that prevent the consommatory active immune in rainbow trout migrating to seawater A10:17

16:15 Dr Red W Wilson
University of Exeter, United Kingdom
The specific patterns of acid-base regulation during the post-fledging alkaline tide in fish A10:18

16:30 My Po-Heuan Sung
Department of Life Science National TsingHua University, Taiwan
Using perfused gills of Octopus vulgaris and Sepia officinalis to study different strategies of ammonia excretion with different lifestyles A10:19

16:45 Georgina A Rivero-Izaguirre
University of Montpellier, France
Facing salinity changes in the intertidal environment: a pterygulin hermit's strategy for preparing for oxidative stress A10:20

17:00 End of session

15:45 Dr Gerta Nikolle
Frankfurt Institute for Advanced Studies, Germany
Improvement of resource use efficiency and productivity in crop plants PC 15

16:00 Dr Bertaud Muller
INRA, France
Is reproductive development failure under water or heat stress due to C shortages? Pt 10

16:15 Prof Michael J. Ems
University of Guelph, Canada
Modulation of starch metabolism in transgenic Arabidopsis thaliana leads to increased plant biomass and reduced production PC 16

16:30 Concluding Remarks

16:45 Prof Dr Mark Field
University of Oxford, United Kingdom
Quantification of the ER network Pt 19

17:00 End of session
**MODELLING, INTEGRATION AND CROSS TALK**

**08:20**

**REGISTRATION/EXHIBITION**

**08:25**

**Dr Lewis Halley**
University of Brighton, United Kingdom

Most animals die before reproducing; considering the role of energetics in juvenile mortality

**A2.1**

**Prof Wilfried Weber**
University of Freiburg, Germany

Optically controlled signalling processes in mammalian cells

**PC1.7**

**08:30**

**Prof Andrew Millar**
University of Edinburgh, United Kingdom

Harnessing Arabidopsis and the Framework Model to understand growth

**P1.2**

**08:35**

**Dr Steven Cooke**
Carleton University, Canada

Experimental biology undergoes an evidence-based approach to conservation

**APC1.33**

**08:40**

**Prof Neil B Metcalfe**
University of Glasgow, United Kingdom

Patterns of energy loss and consequent mortality-risk over winter: the role of individual variation in metabolic and behavioural flexibility

**A2.2**

**08:45**

**Dr Vincent Carreau**
University of Ottawa, Canada

Do energetics drive the link between birdly parasitism and overwinter survival in chickadees?

**A2.3**

**08:50**

**Miss Olivia Hicks**
University of Liverpool, United Kingdom

Linking parasitism and life-history: novel questions with a novel energetic approach

**A2.4**

**08:55**

**Ms Denis Chabot**
Fisheries and Oceans Canada, Canada

Impact of temperature and acidification on byssus tenacity of Northern shrimp, Pandalus borealis

**APC1.33**

**09:00**

**Prof Douglas S Glauert**
Janjina College, United States

Energy constraints on dispersal and range expansion affect geographical patterns of species diversity

**A2.5**

**09:05**

**Prof Florian Mouès**
Université de Bretagne Occidentale, France

Assessing fish health: development of a new methodology that improves the conservation physiology tool box

**APC1.33**

**09:10**

**Ms Alice Colles**
Université de Québec à Rimouski, Canada

Variations in energy storage metabolism discriminate food and brackish/salt water ecotypes in American eel eels

**A2.6**

**09:15**

**REFRESHMENT BREAK / EXHIBITION**

**09:20**

**Dr Matthew Paul**
Rothamsted Research, United Kingdom

Trabakan-6-phosphate is a major regulator of source-sink interactions for sucrose allocation for crop yield potential and yield resilience

**A2.6**

**09:25**

**Me Martin Kupicha**
University of Bonn, Institute of Crop Science and Resource Conservation, Germany

Comparative calculation of assimilate partitioning in winter wheat using the LINTUL_SUCROS and GECROS growth models

**P1.22**

**09:30**

**Dr Tom Weidmann**
University of Cologne, Germany

Comparing feeding and locomotor system design. How does selection walk and chew gum at the same time?

**A2.7**

**09:35**

**Mr Salman Malaikoon**
CSIRO Agriculture, Australia

Comparing feeding and locomotor system design. How does selection walk and chew gum at the same time?

**A2.8**

**09:40**

**Dr Andrew B Taylor**
University of Oxford, United Kingdom

Comparing feeding and locomotor system design. How does selection walk and chew gum at the same time?

**A2.9**

**09:45**

**Ms Michalina Gallois**
Université de Québec à Rimouski, Canada

Variations in energy storage metabolism discriminate food and brackish/salt water ecotypes in American eel eels

**A2.10**

**09:50**

**Prof Astrid Winiger**
University College Cork, Ireland

Metabolic signals regulating resource allocation during senescence

**P1.24**

**09:55**

**Dr Anna Chaboudet**
University of Oxford, United Kingdom

Using multibody dynamic analysis for studying mastication in the mouse

**A2.14**

**10:00**

**Dr Igancio Bazo-Jarabo**
Universidad de Cádiz, Spain

Genome-wide divergence in a landlocked population of the bleak Carassius (Cyprinus carpio) in the Andes

**A2.15**

**10:05**

**Ms Maha Alajlani**
Beth University, United Kingdom

Maternal control of cell development mediated by the flavonoid biosynthesis pathway

**P1.24**

**10:10**

**Session introduction**

**Dr Nicola Konow**
Harvard University, United States

Biochemical adaptation and molecular evolution of fish in response to salinity stress

**A5.1**

**10:15**

**Dr Ian Williamson**
MRC Institute of Genetics and Molecular Medicine, United Kingdom

Eliciting genome organisation across the Shh regulatory domain by conventional and super-resolution imaging and chromosome conformation capture

**C1.17**

**10:20**

**Dr Gywenneth Ingrao**
École Normale Supérieure de Lyon, France

A defence-related inter-compartmental signalling pathway regulates embryonic cuticle integrity in Arabidopsis

**P2.21**

**10:25**

**Ms Isabelle Camu**
John Innes Centre, United Kingdom

Seed production environment effects on seed vigour and mitigation via post-harvest seed treatments

**P5.22**

**10:30**

**Prof Dietmar Kütz**
University of California Davis, United States

Comparing feeding and locomotor system design. How does selection walk and chew gum at the same time?

**A6.1**

**10:35**

**Mr Salman Malakpoor**
University of Cologne, Germany

Comparing feeding and locomotor system design. How does selection walk and chew gum at the same time?

**A6.2**

**10:40**

**Dr Tom Weidmann**
University of Cologne, Germany

Comparing feeding and locomotor system design. How does selection walk and chew gum at the same time?

**A6.3**

**10:45**

**Mr Salman Malaikoon**
CSIRO Agriculture, Australia

Comparing feeding and locomotor system design. How does selection walk and chew gum at the same time?

**A6.4**

**10:50**

**Dr Gwyneth Ingram**
University of Frieburg, Germany

Comparing feeding and locomotor system design. How does selection walk and chew gum at the same time?

**A6.5**

**10:55**

**Dr Tom Weidmann**
University of Cologne, Germany

Comparing feeding and locomotor system design. How does selection walk and chew gum at the same time?

**A6.6**

**11:00**

**Ms Isabelle Camu**
John Innes Centre, United Kingdom

Seed production environment effects on seed vigour and mitigation via post-harvest seed treatments

**P5.22**

**11:05**

**Ms Isabelle Camu**
John Innes Centre, United Kingdom

Seed production environment effects on seed vigour and mitigation via post-harvest seed treatments

**P5.22**

**11:10**

**Ms Isabelle Camu**
John Innes Centre, United Kingdom

Seed production environment effects on seed vigour and mitigation via post-harvest seed treatments

**P5.22**

**11:15**

**Ms Isabelle Camu**
John Innes Centre, United Kingdom

Seed production environment effects on seed vigour and mitigation via post-harvest seed treatments

**P5.22**
<table>
<thead>
<tr>
<th>Time</th>
<th>Session</th>
<th>Location</th>
<th>Speaker(s)</th>
<th>Title</th>
</tr>
</thead>
<tbody>
<tr>
<td>10:00</td>
<td>A1.02 – CONSERVATION PHYSIOLOGY: A CHANGING WORLD – PROBLEMS AND SOLUTIONS SUPPORTED BY CONSERVATION PHYSIOLOGY</td>
<td>AUDITORIUM 1</td>
<td>Dr Michael Stevens</td>
<td>Great Lakes Fishery Commission, United States</td>
</tr>
<tr>
<td>10:10</td>
<td>A2.01 – HOW DOES ENERGY CONTRAIN ECOLOGY? SPONSORED BY: AMERICAN PHYSIOLOGICAL SOCIETY</td>
<td>AUDITORIUM 2</td>
<td>Dr Myra Collins, University of Rekavik, Iceland</td>
<td>University of Glasgow, United Kingdom</td>
</tr>
<tr>
<td>10:20</td>
<td>A2.02 – PS – SYNOTIC BIOLOGY- SYSTEMS DESIGN AND RE-WORKING</td>
<td>SYNDICATE ROOM 1</td>
<td>Prof Roger Lindberg, University of Copenhagen, Denmark</td>
<td>How does mitochondrial functioning constrain energy efficiency? A2.02</td>
</tr>
<tr>
<td>10:30</td>
<td>A2.03 – PS – FROM SOURCE TO ISK: RESOURCE PARTITIONING IN PLANTS</td>
<td>SYNDICATE ROOM 2</td>
<td>Prof Alison Smith</td>
<td>John Innes Centre, United Kingdom</td>
</tr>
<tr>
<td>10:40</td>
<td>A3.01 – SYNDICATE WING</td>
<td>SYNDICATE ROOM 3</td>
<td>Dr Charles M Bishop</td>
<td>Bangor University, United Kingdom</td>
</tr>
<tr>
<td>10:50</td>
<td>A3.02 – USING “MUSCOLO-ROBOTIC” METHODS FROM FISH TO UNDERSTAND FISH BEHAVIOUR IN THE LABORATORY</td>
<td>SYNDICATE ROOM 4</td>
<td>Dr John E Lunn</td>
<td>Max Planck Institute of Molecular Plant Physiology, Germany</td>
</tr>
<tr>
<td>11:00</td>
<td>A3.03 – Chloroplasts: from photosynthesis to photo- and photoreceptors</td>
<td>SYNDICATE ROOM 5</td>
<td>Dr Christopher Strickland, University of North Carolina Chapel Hill, United States</td>
<td>How do mechanisms identified in the laboratory operate in variable world: How do mechanisms identified in the laboratory operate in variable world? A3.03</td>
</tr>
<tr>
<td>11:10</td>
<td>A3.04 – MODELLING THE SPREAD OF PARASITIC WORMS FROM POINT RELEASE</td>
<td>SYNDICATE ROOM 6</td>
<td>Dr Dray Agowon, LIMNOS-OURS, France</td>
<td>An over-cost of being a pelagic larva: A possible energetic conflict between thermoregulation and digestive processes A3.04</td>
</tr>
<tr>
<td>11:20</td>
<td>A3.05 – MOBILITY, STRATEGIES AND SURVIVAL IN THE LABORATORY: A TALE OF TWO NUGS</td>
<td>SYNDICATE ROOM 7</td>
<td>Dr Dray Agowon, LIMNOS-OURS, France</td>
<td>A tale of two nugs A3.05</td>
</tr>
<tr>
<td>11:30</td>
<td>A3.06 – FROM LIMB TO FEEDING SYSTEMS</td>
<td>SYNDICATE ROOM 8</td>
<td>Knox College, United States</td>
<td>Dr Nicholas J Gidmark</td>
</tr>
<tr>
<td>11:40</td>
<td>A3.07 – FEEDING SHOWS THE IMPORTANCE OF BODY PLASTICITY IN TROPHIC NICHES</td>
<td>SYNDICATE ROOM 9</td>
<td>University of California Davis, United States</td>
<td>A powerful perspective on suction feeding shows the importance of body plasticity in trophic niches A3.07</td>
</tr>
<tr>
<td>11:50</td>
<td>A3.08 – WASPS FROM POINT RELEASE</td>
<td>SYNDICATE ROOM 10</td>
<td>North Carolina Chapel Hill, United States</td>
<td>The role of natural enemies in the suppression of invasive species: The role of natural enemies in the suppression of invasive species A3.08</td>
</tr>
<tr>
<td>12:00</td>
<td>A3.09 – STRONG ION REGULATORY ABILITIES ENABLE DEER MICE TO FLOW ACROSS WATERFALLS</td>
<td>SYNDICATE ROOM 11</td>
<td>Harper Adams University, United Kingdom</td>
<td>Strong ion regulatory abilities enable deer mice to flow across waterfalls A3.09</td>
</tr>
<tr>
<td>12:10</td>
<td>A3.10 – APOTHECIAL ADAPTATION TO TROPICAL NICHES IN SALMONID FISHES</td>
<td>SYNDICATE ROOM 12</td>
<td>University of Glasgow, United Kingdom</td>
<td>Dr Kieran Salin</td>
</tr>
<tr>
<td>12:20</td>
<td>A3.11 – PS – SEED BIOLOGY FROM LABORATORY TO FIELD</td>
<td>SYNDICATE ROOM 13</td>
<td>University of York, United Kingdom</td>
<td>Dr Paulie Carboxeno</td>
</tr>
<tr>
<td>12:30</td>
<td>A3.12 – PS – MOTHER-OF-FT-AND-TFL1 IS A KEY REGULATOR OF APOMIXIS</td>
<td>SYNDICATE ROOM 14</td>
<td>University of California Davis, United States</td>
<td>Mr Alexander Stuhrenvoll</td>
</tr>
<tr>
<td>12:40</td>
<td>A3.13 – PS – APC1.37 – STRUCTURALLY COMPLEX DITERPENOIDS</td>
<td>SYNDICATE ROOM 15</td>
<td>University of York, United Kingdom</td>
<td>APC1.37</td>
</tr>
<tr>
<td>12:50</td>
<td>A3.14 – PS – APC1.41 – INFLUENCE OF遠紅光 IN ARABIDOPSIS THALIANA</td>
<td>SYNDICATE ROOM 16</td>
<td>National Institute of Chemistry, China</td>
<td>APC1.41</td>
</tr>
<tr>
<td>13:00</td>
<td>A3.15 – PS – APC1.21 – HEART DEVELOPMENT AND MATURATION AND GERMINATION</td>
<td>SYNDICATE ROOM 17</td>
<td>Max-Planck-Institute for Heart and Lung Research, Germany</td>
<td>APC1.21</td>
</tr>
<tr>
<td>13:10</td>
<td>A3.16 – PS – APC1.18 – LIGHT-DRIVEN PRODUCTION OF STRUCTURALLY COMPLEX DITERPENOIDS</td>
<td>SYNDICATE ROOM 18</td>
<td>University of California Davis, United States</td>
<td>APC1.18</td>
</tr>
<tr>
<td>13:30</td>
<td>A3.18 – PS – APC1.20 – SOLUTIONS TO APC1.20 PROBLEMS</td>
<td>SYNDICATE ROOM 20</td>
<td>Heinrich Heine University, Germany</td>
<td>APC1.20</td>
</tr>
<tr>
<td>13:40</td>
<td>A3.19 – PS – APC1.22 – TOOLS FOR APC1.22 TOOL KIT</td>
<td>SYNDICATE ROOM 21</td>
<td>University of California Davis, United States</td>
<td>APC1.22</td>
</tr>
<tr>
<td>13:50</td>
<td>A3.20 – PS – APC1.23 – TRENTHALOPEA CORTICUS, FRANCE</td>
<td>SYNDICATE ROOM 22</td>
<td>National Institute of Chemistry, China</td>
<td>APC1.23</td>
</tr>
<tr>
<td>14:00</td>
<td>A3.21 – PS – APC1.24 – AN OVER-ESTIMATION OF BELL-PEACEnga-Zipfler</td>
<td>SYNDICATE ROOM 23</td>
<td>University of York, United Kingdom</td>
<td>APC1.24</td>
</tr>
<tr>
<td>14:10</td>
<td>A3.22 – PS – APC1.25 – TRENCHALOPEA CORTICUS, FRANCE</td>
<td>SYNDICATE ROOM 24</td>
<td>National Institute of Chemistry, China</td>
<td>APC1.25</td>
</tr>
<tr>
<td>14:20</td>
<td>A3.23 – PS – APC1.26 – TOOLS FOR APOMIXIS TOOLS KIT</td>
<td>SYNDICATE ROOM 25</td>
<td>University of California Davis, United States</td>
<td>APC1.26</td>
</tr>
<tr>
<td>14:30</td>
<td>A3.24 – PS – APC1.27 – TOOLS FOR APOMIXIS TOOLS KIT</td>
<td>SYNDICATE ROOM 26</td>
<td>National Institute of Chemistry, China</td>
<td>APC1.27</td>
</tr>
<tr>
<td>14:40</td>
<td>A3.25 – PS – APC1.28 – TOOLS FOR APOMIXIS TOOLS KIT</td>
<td>SYNDICATE ROOM 27</td>
<td>University of California Davis, United States</td>
<td>APC1.28</td>
</tr>
<tr>
<td>14:50</td>
<td>A3.26 – PS – APC1.29 – TOOLS FOR APOMIXIS TOOLS KIT</td>
<td>SYNDICATE ROOM 28</td>
<td>National Institute of Chemistry, China</td>
<td>APC1.29</td>
</tr>
<tr>
<td>15:00</td>
<td>A3.27 – PS – APC1.30 – TOOLS FOR APOMIXIS TOOLS KIT</td>
<td>SYNDICATE ROOM 29</td>
<td>University of California Davis, United States</td>
<td>APC1.30</td>
</tr>
<tr>
<td>15:10</td>
<td>A3.28 – PS – APC1.31 – TOOLS FOR APOMIXIS TOOLS KIT</td>
<td>SYNDICATE ROOM 30</td>
<td>National Institute of Chemistry, China</td>
<td>APC1.31</td>
</tr>
<tr>
<td>15:20</td>
<td>A3.29 – PS – APC1.32 – TOOLS FOR APOMIXIS TOOLS KIT</td>
<td>SYNDICATE ROOM 31</td>
<td>University of California Davis, United States</td>
<td>APC1.32</td>
</tr>
<tr>
<td>15:30</td>
<td>A3.30 – PS – APC1.33 – TOOLS FOR APOMIXIS TOOLS KIT</td>
<td>SYNDICATE ROOM 32</td>
<td>National Institute of Chemistry, China</td>
<td>APC1.33</td>
</tr>
<tr>
<td>15:40</td>
<td>A3.31 – PS – APC1.34 – TOOLS FOR APOMIXIS TOOLS KIT</td>
<td>SYNDICATE ROOM 33</td>
<td>University of California Davis, United States</td>
<td>APC1.34</td>
</tr>
<tr>
<td>15:50</td>
<td>A3.32 – PS – APC1.35 – TOOLS FOR APOMIXIS TOOLS KIT</td>
<td>SYNDICATE ROOM 34</td>
<td>National Institute of Chemistry, China</td>
<td>APC1.35</td>
</tr>
<tr>
<td>16:00</td>
<td>A3.33 – PS – APC1.36 – TOOLS FOR APOMIXIS TOOLS KIT</td>
<td>SYNDICATE ROOM 35</td>
<td>University of California Davis, United States</td>
<td>APC1.36</td>
</tr>
<tr>
<td>16:10</td>
<td>A3.34 – PS – APC1.37 – TOOLS FOR APOMIXIS TOOLS KIT</td>
<td>SYNDICATE ROOM 36</td>
<td>National Institute of Chemistry, China</td>
<td>APC1.37</td>
</tr>
<tr>
<td>16:20</td>
<td>A3.35 – PS – APC1.38 – TOOLS FOR APOMIXIS TOOLS KIT</td>
<td>SYNDICATE ROOM 37</td>
<td>University of California Davis, United States</td>
<td>APC1.38</td>
</tr>
<tr>
<td>16:40</td>
<td>A3.37 – PS – APC1.40 – TOOLS FOR APOMIXIS TOOLS KIT</td>
<td>SYNDICATE ROOM 39</td>
<td>University of California Davis, United States</td>
<td>APC1.40</td>
</tr>
<tr>
<td>16:50</td>
<td>A3.38 – PS – APC1.41 – TOOLS FOR APOMIXIS TOOLS KIT</td>
<td>SYNDICATE ROOM 40</td>
<td>National Institute of Chemistry, China</td>
<td>APC1.41</td>
</tr>
</tbody>
</table>

**CELL SECTION LECTURE**

**MEASURES AND PRIZES**

**LUNCH / EXHIBITION**

**SPECIAL SESSION**

**TOOLS FOR SYNTHEZIS II**

**ALLOCATION AND TRANSLATION IN DIFFERENT ENVIRONMENTS**

**SESSION**

**PROGRAMME THURSDAY 7 JULY 62**

**ROOM**

**AUDITORIUM 1**

**AUDITORIUM 2**

**SYNDICATE ROOM 1**

**SYNDICATE ROOM 2**
<table>
<thead>
<tr>
<th>ROOM</th>
<th>AUDITORIUM 1</th>
<th>AUDITORIUM 2</th>
<th>SYNDICATE ROOM 1</th>
<th>SYNDICATE ROOM 2</th>
<th>SYNDICATE ROOM 3</th>
<th>SYNDICATE ROOM 4</th>
<th>MEETING ROOM 1A</th>
<th>MEETING ROOM 1B</th>
</tr>
</thead>
<tbody>
<tr>
<td>SESSION 1</td>
<td>ANNUAL MAIN MEETING BRIGHTON 2016 PROGRAMME THURSDAY 7 JULY</td>
<td>ANNUAL MAIN MEETING BRIGHTON 2016 PROGRAMME THURSDAY 7 JULY</td>
<td>ANNUAL MAIN MEETING BRIGHTON 2016 PROGRAMME THURSDAY 7 JULY</td>
<td>ANNUAL MAIN MEETING BRIGHTON 2016 PROGRAMME THURSDAY 7 JULY</td>
<td>ANNUAL MAIN MEETING BRIGHTON 2016 PROGRAMME THURSDAY 7 JULY</td>
<td>ANNUAL MAIN MEETING BRIGHTON 2016 PROGRAMME THURSDAY 7 JULY</td>
<td>ANNUAL MAIN MEETING BRIGHTON 2016 PROGRAMME THURSDAY 7 JULY</td>
<td>ANNUAL MAIN MEETING BRIGHTON 2016 PROGRAMME THURSDAY 7 JULY</td>
</tr>
<tr>
<td>CHAIR</td>
<td>Prof Craig Franklin, The University of Queensland, Australia</td>
<td>Prof David Belton, The University of Cambridge, United Kingdom</td>
<td>Prof Nickolai Knowles, Harvard University, United States</td>
<td>Prof Ivan Obradovich, The University of Sydney, Australia</td>
<td>Prof Jonathan Styles, The University of Melbourne, Australia</td>
<td>Prof Anthony Herring, Museum National d'Histoire Naturelle, France</td>
<td>Prof Craig E Franklin, Brown University, United States</td>
<td>Prof Julia Butsik IRBIS-INRA Angers, France</td>
</tr>
<tr>
<td>CHAIR</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
</tr>
<tr>
<td>CHAIR</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
</tr>
<tr>
<td>CHAIR</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
</tr>
<tr>
<td>CHAIR</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
</tr>
<tr>
<td>CHAIR</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
</tr>
<tr>
<td>CHAIR</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
<td>DR STEVEN CODE</td>
</tr>
</tbody>
</table>

**Session 1: ANNUAL MAIN MEETING BRIGHTON 2016 PROGRAMME THURSDAY 7 JULY**

**Room Auditorium 1**

1. **Improving fish passage through shrimp culture systems:**
   - Improving the integration of hydrodynamics and swimming performance (APCI 42)

2. **Dr Tony A. A. K. O.:**
   - University of Glasgow, UK
   - Individual variation in metabolic flexibility and its effects on growth in changing environments (A2.16)

3. **Dr Michael S. McCollum:**
   - McMaster University, Canada
   - Plasticity: Ontogeny, environment, and adult stature (A2.15)

**Session 2: ANNUAL MAIN MEETING BRIGHTON 2016 PROGRAMME THURSDAY 7 JULY**

**Room Auditorium 2**

1. **Prof Duncan Mitchell:**
   - University of the Witwatersrand, South Africa
   - The effect of copper exposure on sexual behavior in bank vole (Myodes glareolus) (APCI 44)

2. **Mr Sean A. Williamson:**
   - Monash University, Australia
   - Novel insight into the developmental physiology of turtle eggs provides a new tool for conservation (APCI 46)

3. **Prof Peter M. Williams:**
   - University of California, Santa Barbara, USA
   - Elevating CO₂ and nutrient supply affect growth, resource partitioning and nutritional quality of cassava and turnip (P1.32)

**Session 3: ANNUAL MAIN MEETING BRIGHTON 2016 PROGRAMME THURSDAY 7 JULY**

**Room Syndicate Room 1**

1. **Prof Elsje M. Kaul:**
   - University of Aberdeen, UK
   - Thermoregulatory variation in European and African mole-rats: a case of convergent evolution (A2.17)

2. **Prof Terence M. Williams:**
   - University of California, Santa Cruz, USA
   - Racing from Extinction: The high price of mobility in terrestrial and marine carnivores (A2.18)

3. **Prof Jerome Goldblum:**
   - Stanford University, USA
   - How the energetic costs of endogamy and filiation constrain mosquitofish ecology (A2.19)

**Session 4: ANNUAL MAIN MEETING BRIGHTON 2016 PROGRAMME THURSDAY 7 JULY**

**Room Syndicate Room 2**

1. **Dr Nicholas L. Payne:**
   - University of Bath, UK
   - Great hammerhead sharks: using their side to reduce transport costs (A2.20)

2. **Dr Edward A. Code:**
   - University of Exeter, UK
   - How energy does energy constrain ecology? (A3.24)

3. **Dr Richard M. Compton:**
   - Imperial College London, UK
   - Synthetic biology: resource partitioning in plants (P1.21)

**Session 5: ANNUAL MAIN MEETING BRIGHTON 2016 PROGRAMME THURSDAY 7 JULY**

**Room Syndicate Room 3**

1. **Prof Richard C. LeGendre:**
   - University of Sheffield, UK
   - Cytoskeleton: the fascinating relationships between JCB/putative activity and synaptonemal complexes in the testis (A5.14)

2. **Dr Karen Pulz:**
   - University of Glasgow, UK
   - Invivo biosensors for mammalian bioprocessing (P1.21)

3. **Me Arnould A. Thiry:**
   - Lancaster University, UK
   - New approach identifies hormones as a new physiological trait for spike fertility resilience to drought stress (P1.30)

**Session 6: ANNUAL MAIN MEETING BRIGHTON 2016 PROGRAMME THURSDAY 7 JULY**

**Room Syndicate Room 4**

1. **Prof Thomas J. Roberts:**
   - Harvard University, USA
   - Muscle mechanics teach us about feeding systems (A2.20)

2. **Prof Craig E Franklin:**
   - Brown University, USA
   - What might studies of limb muscle mechanics teach us about feeding systems? (A2.16)

3. **Prof Rod W. Wilson:**
   - University of Exeter, UK
   - New insights into marine teleosts: carbohydrate precipitation challenges, but don’t take the pressure (or cold) (A5.11)

**Session 7: ANNUAL MAIN MEETING BRIGHTON 2016 PROGRAMME THURSDAY 7 JULY**

**Room Faculty Room**

1. **Prof Nickolai Knowles:**
   - Harvard University, USA
   - Linking muscle mechanical versatility with patterns of shape-change and contractile properties in vertebrate feeding systems (A5.10)

2. **Dr Anthony Herring:**
   - Museum National d'Histoire Naturelle, France
   - Can muscle redundancy in the jaw system of lizards be explained by the functional roles of muscles acting as motors or brakes? (A5.9)

3. **Dr Julius Sabhish:**
   - Peter Centre for Evolutionary and Integrative Biology University of Kerala, India
   - Can water immersion-induced gorgon fish (Anasatis testudinaria Bleek) demand shift in the ion transporter function in the brain of air-breathing fish (Anasatis testudinaria Bleek) (A5.9)

**Session 8: ANNUAL MAIN MEETING BRIGHTON 2016 PROGRAMME THURSDAY 7 JULY**

**Room Sympoium Room**

1. **Prof Jonathan Styles:**
   - The University of Melbourne, Australia
   - Emerging roles for nuclear membrane and cytoskeleton interactions: A role for the non-pinnate H+/K+ ATPase? (A5.10)

2. **Prof Dr Hendrik Poorter:**
   - Forschungszentrum Jülich, Germany
   - General patterns in biomass allocation and allometry among higher plants (A5.14)

3. **Prof Dr Hendrik Poorter:**
   - Forschungszentrum Jülich, Germany
   - General patterns in biomass allocation and allometry among higher plants (A5.14)

**Session 9: ANNUAL MAIN MEETING BRIGHTON 2016 PROGRAMME THURSDAY 7 JULY**

**Room Meeting Room 1A**

1. **Prof Ivan Obradovich:**
   - The University of Sydney, Australia
   - Seed longevity and biotic defense: Two sides of the same coin (A5.15)

2. **Prof Brian M. Hopkins:**
   - Ryerson University, Canada
   - Emerging nuclear and chloroplast gene expression patterns in the lungfish (Protopterus aethiopicus): A role for the non-pinnate H+/K+ ATPase? (A5.10)

3. **Prof Ivan Obradovich:**
   - The University of Sydney, Australia
   - Seed longevity and biotic defense: Two sides of the same coin (A5.15)

**Session 10: ANNUAL MAIN MEETING BRIGHTON 2016 PROGRAMME THURSDAY 7 JULY**

**Room Meeting Room 1B**

1. **Prof Dr Hendrik Poorter:**
   - Forschungszentrum Jülich, Germany
   - General patterns in biomass allocation and allometry among higher plants (A5.14)

2. **Prof Frank H. Skene:**
   - University of Antwerp, Belgium
   - Seedling emergence and nutrient recycling and hydraulic conductivity in leaves (P1.29)

3. **Prof Ivan Obradovich:**
   - The University of Sydney, Australia
   - Seed longevity and biotic defense: Two sides of the same coin (A5.15)