



MEPSA
Molecular & Experimental
Pathology Society of Australasia

Australasian Wound
& Tissue Repair Society



Monday 29th October 2018

Registration Open

12:00PM - 6:00PM

Welcome

1:45PM - 1:55PM

Lecture Theatre

Session 1 - New Approaches for Regenerative Medicine

1:55PM - 3:30PM

Lecture Theatre

Chairs: Lyn Wise & Christopher Turner

1:55 PM **Plenary: Phil Stephens**

The multifunctional nature of oral progenitor cells: the ideal cells for tissue repair? *abs# 1*

2:25 PM **Allison Cowin**

Development of a stem cell therapy for the treatment of wounds. *abs# 2*

2:45 PM **Michael Samuel**

Enhancing signalling through the Rho-ROCK pathway accelerates the healing of diabetic wounds *abs# 3*

3:00 PM **Andrew W Stevenson**

Development of mechanism-based Lysyl oxidase inhibitors to reduce skin fibrosis and scarring *abs# 4*

3:15 PM **ILIA BANAKH**

Dermal matrices' physical and biochemical properties influence wound healing in an animal model *abs# 5*

Afternoon Tea

3:30PM - 4:00PM

Session 2 - Cutaneous Melanoma

4:00PM - 5:55PM

Lecture Theatre

Chairs: Mitchell Stark & Joseph Rothnagel

- 4:00 PM **Plenary: Claudia Wellbrock**
Phenotype heterogeneity in melanoma therapy and progression *abs# 6*
- 4:30 PM **Imanol Arozarena**
Impact of nutrient restriction on melanoma progression and response to therapies *abs# 7*
- 4:45 PM **Nikolas K Haass**
RAB27A promotes melanoma cell invasion and metastasis via regulation of pro-invasive exosomes *abs# 8*
- 5:00 PM **Heinz Hammerlindl**
Therapy induced cellular reprogramming leads to metabolic vulnerabilities before the emergence of permanent acquired drug resistance in BRAF mutant melanoma *abs# 9*
- 5:15 PM **Sheena M Daignault**
Enforcing cellular stress promotes apoptotic and immunogenic responses in melanoma *abs# 10*
- 5:30 PM **Loredana LS Spoerri**
MITF regulates dynamic heterogeneity and structural integrity in melanoma *abs# 11*
- 5:45 PM **Dubravka Skalamera**
High-content imaging of melanocyte-keratinocytes-fibroblast interaction reveals novel phenotypes for melanoma-associated oncogenic mutations *abs# 12*

Dinner & Poster Viewing

6:30PM - 10:00PM

AWTRS AGM

6:00PM - 7:00PM

Lecture Theatre

Tuesday 30th October 2018

Session 3 - Wound Repair

9:00AM - 10:35AM

Lecture Theatre

Chairs: Allison Cowin & Anjana Bairagi

- 9:00 AM **Plenary: Kiarash Khosrotehrani**
Genetic, cellular and environmental determinants of wound closure and scarring *abs# 13*
- 9:30 AM **Mark Fear**
Fibroblast phenotype and matrix dynamics in skin, scarring and fibrosis *abs# 14*
- 9:50 AM **Leila Cuttle**
Diagnosing Burn Wound Severity: Biomarkers and Wound Biochemistry *abs# 15*
- 10:05 AM **Stuart J Mills**
An Unexpected Role of Flightless in TLR4 regulation, inflammation and wound healing. *abs# 16*
- 10:20 AM **Ruilong Zhao**
Protein C – a novel biomarker to predict patient outcome in burn injuries *abs# 17*

Morning Tea

10:35AM - 11:00AM

Session 4 - Tissue Engineering

11:00AM - 12:30PM

Lecture Theatre

Chairs: Brooke Farrugia & Aleta Pupovac

- 11:00 AM **Plenary: Magda Ulrich**
Stem cells in tissue engineering of the skin *abs# 18*
- 11:25 AM **Aleta Pupovac**
Toward immune competent 3D skin models *abs# 19*
- 11:45 AM **Jiah Shin Chin**
Development of scaffolds to promote chronic wound healing *abs# 20*
- 12:00 PM **Brooke Farrugia**
The mammalian chondroitinase, hyaluronidase 4, is produced by human mast cells and generates chondroitin sulfate cleavage neo-epitopes *abs# 21*
- 12:15 PM **Xanthe L Strudwick**
Development of functionalised dressings for enhanced wound healing *abs# 22*

Lunch

12:30PM - 1:30PM

EMCR Session 1

1:30PM - 3:30PM

Lecture Theatre

iThinkWell Workshop 'Developing a research track record on a shoestring' sponsored by the Australian Academy of Science Theo Murphy Initiative

Afternoon Tea

3:30PM - 4:00PM

Session 5 - Photobiology and Skin cancer

4:00PM - 5:55PM

Lecture Theatre

Chairs: Vivienne Reeve & Shelley Gorman

- 4:00 PM **Plenary: Chikako Nishigori**
Mechanisms of photocarcinogenesis and sunburn resolution *abs# 23*
- 4:30 PM **James Wells**
Mechanisms of CD8⁺ T-cell-mediated regression in Squamous Cell Carcinoma *abs# 24*
- 4:50 PM **Katie M Dixon**
Targeting melanoma metastasis with vitamin D *abs# 25*
- 5:05 PM **Edwige Roy**
Epidermal clonal expansion upon UV irradiation: implications for carcinogenesis. *abs# 26*
- 5:20 PM **Shelley Gorman**
Harnessing low dose ultraviolet radiation to curb obesity and metabolic dysfunction *abs# 27*
- 5:35 PM **Felix Marsh-Wakefield**
Phototherapy alters circulating B cells in clinically isolated syndrome patients *abs# 28*

Dinner

6:30PM - 10:00PM

EMCR Networking Event

8:00PM - 11:00PM

Wednesday 31st October 2018

Session 6 - Stem Cell Biology

9:00AM - 10:20AM

Lecture Theatre

Chairs: Kiarash Khosrotehrani & Stuart Mills

9:00 AM **Plenary: Kim Jensen**

Tracking stem cell during epidermal morphogenesis and homeostasis *abs# 29*

9:30 AM **Pritinder Kaur**

Decreased tissue regenerative potential of ageing human skin can be attributed to changes in the dermal microenvironment *abs# 30*

9:50 AM **Srikala Raghavan**

Role Of Vinculin In Regulating Bulge Stem Cell Quiescence *abs# 31*

10:05 AM **Zalitha Pieterse**

Investigating the potential of human dermal pericytes as a feeder layer for *ex-vivo* expansion of patient keratinocytes *abs# 32*

Morning Tea

10:20AM - 10:45AM

Session 7 - Frontiers in Cutaneous Biology I

10:45AM - 12:30PM

Lecture Theatre

Chairs: Nikolas Haass & Lisa Tom

10:45 AM **Plenary: Stuart Pitson**

Modulation of sphingolipids to accelerate wound healing *abs# 33*

11:10 AM **Helmut Schaidler**

Epigenetic remodelling leads to MAPKi-resistance in melanoma *abs# 34*

11:30 AM **Mitchell Stark**

Whole-exome sequencing of acquired naevi identifies mechanisms for development and maintenance of benign neoplasms *abs# 35*

11:45 AM **Lisa N Tom**

Loss of BOP1 contributes to melanoma progression by increasing the invasive potential of naevi *abs# 36*

12:00 PM **Robert J Ju**

Uncovering Microtubule-Driven Mechanisms of Melanoma Invasion *abs# 37*

12:15 PM **Oliver Dreesen**

Loss of lamin B1 is a biomarker to quantify cellular senescence in photoaged skin *abs# 38*

Lunch

12:30PM - 1:30PM

MEPSA AGM

12:30PM - 1:30PM

EMCR session 2

1:30PM - 2:30PM

Lecture Theatre

EMCR Masterclass - sponsored by the Australian Academy of Science Theo Murphy Initiative

Poster Session & Afternoon Tea

2:30PM - 4:00PM

Session 8 - Inflammation

4:00PM - 5:55PM

Lecture Theatre

Chairs: Rachael Murray & Xanthe Strudwick

4:00 PM **Plenary: Sabine Eming**

Nutrient sensitive pathways regulating skin function *abs# 39*

4:30 PM **Riccardo Dolcetti**

New strategies to improve the efficacy of personalized cancer immunotherapy *abs# 40*

4:50 PM **Julia Prier**

Identification of a committed precursor to the tissue-resident memory T cell fate *abs# 41*

5:10 PM **Lyn M Wise**

Combination therapy with a reparative growth factor and anti-inflammatory cytokine limits cutaneous scarring. *abs# 42*

5:25 PM **Christopher T Turner**

Granzyme K expressed by classically activated macrophages contributes to inflammation and impaired remodeling in burns *abs# 43*

5:40 PM **Anneliese S Ashurst**

Harnessing peptide-based therapy to control inflammatory skin diseases *abs# 44*

Conference Dinner

6:30PM - 11:55PM

Little Ships Club

Thursday 1st November 2018

Session 9 - Frontiers in Cutaneous Biology II

8:30AM - 10:05AM

Lecture Theatre

Chairs: Stuart Pitson & Oliver Dreesen

8:30 AM **Plenary: David Granville**

Granzyme Serine Proteases in Skin Inflammation and Disease *abs# 45*

9:00 AM **Tarl Prow**

Recent progress in skin microbiopsy *abs# 46*

9:20 AM **Zlatko Kopecki**

Novel Approaches for Treatment of Dermatitis *abs# 47*

9:35 AM **Scott Byrne**

Exposing the skin to Ultraviolet Radiation activates a unique subset of Regulatory B cells *abs# 48*

9:50 AM **Benita Tse**

Novel lipid biomarkers of cutaneous ultraviolet irradiation *abs# 49*

Morning Tea

10:05AM - 10:20AM

Session 10 - Organ regeneration, cancer & ageing

10:20AM - 11:35AM

Lecture Theatre

Chairs: Anneliese Ashhurst & James Wells

10:20 AM **Plenary: Nicholas Saunders**

Targeting the XPO1-Dependent Nuclear Export of E2F7 Reverses Anthracycline resistance in Head and Neck Squamous Cell Carcinomas *abs# 50*

10:45 AM **Yeesim Khew-Goodall**

The Fer-PKC δ -PTPN14 axis in health and disease *abs# 51*

11:05 AM **Tobias Bald**

c-MET⁺ neutrophils limit melanoma immunotherapy *abs# 52*

11:20 AM **Natasha Kolesnikoff**

Mast cell protease 4 protects against cutaneous tumour formation in mice *abs# 53*

Closing Ceremony

11:35AM - 12:30PM

Lecture Theatre