Pulp Biology and Regeneration Group Satellite Meeting:  
Bridging Basic and Translational Research in Pulp Biology –  
Developing Technologies for Regenerating Vital Dental Tissues  
June 23-25, 2019

Congress Location: Oregon Health & Science University, Portland, Oregon, USA 97201

Day 1: Sunday, June 23, 2019 (13:00 – 20:00)

Venue: OHSU School of Dentistry – Rooms 3A003A/B in the RLSB (Robertson Life Sciences Building on South Waterfront; Skourtes Tower), 2730 S. Moody Avenue, Portland, OR, 97201

### Session I: Introduction – Stem Cells

<table>
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<tr>
<th>Time</th>
<th>Session Description</th>
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<tbody>
<tr>
<td>13:00 - 14:00</td>
<td>Registration and Coffee/Snacks</td>
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</table>
| 14:00 - 14:15 | Welcome and Introduction  
**Imad About**, Marseilles, France  
**Luiz Bertassoni**, Portland, USA  
**Jack Ferracane**, Portland, US  
**Christine Sedgley**, Portland, USA |
| 14:15 – 14:45 | IADR President Address - Rena D’Souza, U. Utah, Salt Lake City, USA  
Modeling Wnt-Based Therapies for Pulpal Inflammation and Regeneration |
| 14:45 - 15:15 | **Topic I: Stem Cells** (Moderator – Jack Ferracane, OHSU, Portland, USA)         |
| 15:15 - 15:45 | Title: Dental stem cells in tissue regeneration and immune therapies  
**Presenter: Songtao Shi**, China |
| 15:45 - 16:15 | Title: Translational approaches of dental pulp regeneration  
**Presenter: Jeremy Mao**, Columbia U., New York, USA |
| 16:15 - 16:45 | Title: Strategies for pulp regeneration.  
**Presenter: Pamela Yellick**, Tufts U., Boston, USA |
| 16:45 – 17:25 | Keynote Lecture #1: Skeletal stem cells from adult tissues: an identity crisis  
**Presenter: Brian Johnstone**, OHSU, Portland OR |
| 17:25 – 17:55 | General Discussion: Stem cells added value and limits / Announcements             |
| 18:00 - 20:00 | Welcome Reception – Wine Tasting (includes heavy hors d’oeuvres)  
RLSB atrium |
Day 2: Monday morning, June 24, 2019 (7:30 – 12:30)

Venue: OHSU Knight Cancer Research Building – Auditorium (2720 S.W. Moody Avenue, Portland, OR, 97201; building directly north of dental school building)

Session II: Microbiology/Inflammation

<table>
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<tr>
<td>7:30 - 8:15</td>
<td>Registration and Coffee/Pastries</td>
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<tr>
<td>8:15 - 8:45</td>
<td>Topic II: Microbiology/Inflammation (Moderator – Christine Sedgley, OHSU, Portland, USA)</td>
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| 8:45 - 9:15| Title: Pulp regeneration – It should be complicated  
**Presenter:** George Huang, U. Tennessee, Memphis, USA |
| 8:45 - 9:15| Title: Fibroblasts control pulp inflammation via complement activation  
**Presenter:** Imad About, Aix-Marseille U., Marseille, France |
| 9:15 - 9:45| Title: Natural antimicrobials in the dental pulp  
**Presenter:** Fionnuala Lundy, Queen’s U., Belfast, UK |
| 9:45 - 10:15| Title: Pulp innate immune defense – Translational opportunities  
**Presenter:** Paul Cooper, U. Birmingham, Birmingham, UK |
| 10:15 - 11:15| Coffee Break, Poster Viewing and Vendor Visiting                     |
| 11:15 – 11:55| Keynote Lecture #2 – Contemporary microbial and antimicrobial analysis of regenerative endodontic therapy  
**Presenter:** Ashraf Fouad, UNC, Chapel Hill, USA |
| 11:55 – 12:25| General Discussion: The disinfection host response equilibrium  
**Announcements:** |
| 12:30 – 13:30| Lunch Break – catered box lunches                                    |
|             | Small Group Discussion sessions (with lunch):                     |
|             | 4 groups (each group to be led by 1 early stage investigator)       |
|             | G1: materials pulp cell/tissue interaction (Nikita Ruparel).       |
|             | G2: cell containing or cell-free scaffolds (Waruna Dissanayaka)     |
|             | G3: scaffolds/regeneration signals and future pulp regeneration (Marco Bottino) |
|             | G4: treatment of irreversible pulpitis (Nessrin Taha)              |
Day 2: Monday afternoon, June 24, 2019 (13:30 – 17:00)

Venue: OHSU Knight Cancer Research Building – Auditorium (2720 S.W. Moody Avenue, Portland, OR, 97201; building directly north of dental school building)

Session III: Scaffolds/Tissue Engineering

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| 13:30 - 14:00 | Title: Bioprinting and microengineering of organs-on-a-chip with fine-tuned microenvironments for vasculature and pulp regeneration  
**Presenter:** Luiz Bertassoni, OHSU, Portland, USA |                                                                                     |
| 14:00 - 14:30 | Title: Cell-based or cell-free approaches for pulp tissue engineering  
**Presenter:** Kerstin Galler, U. Regensburg, Regensburg, Germany |                                                                                     |
| 14:30 – 15:30 | Coffee Break, Poster Viewing and Vendor Visiting                      |                                                                                     |
| 15:30 – 16:00 | Title: Taking a technology to the product stage.  
**Presenter:** Gilles Richard, Septodont R&D, France |                                                                                     |
| 16:00 - 16:40 | Keynote Lecture #3 - Regulatory considerations for cell-based tissue engineered and regenerative medicine products.  
**Presenter:** Laura Ricles, FDA, Silver Springs, USA |                                                                                     |
| 16:40 – 17:00 | **General Discussion:** Cell/scaffold material interaction is key for regeneration  
**Announcements** |                                                                                     |
| 18:00 - 21:00 | RECEPTION & GALA DINNER  
Portland Spirit Dinner Cruise, 110 SE Caruthers St, Portland, OR 97214  
(across river from CLSB via Tillicum Crossing bridge) |                                                                                     |
Day 3: Tuesday morning, June 24, 2019 (7:30 – 12:15)

Venue: OHSU Knight Cancer Research Building – Auditorium (2720 S.W. Moody Avenue, Portland, OR, 97201; building directly north of dental school building)

**Session IV: Vasculature/Innervation**

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<td><strong>Topic IV: Vasculature/Innervation</strong> (Moderator – Imad About)</td>
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| 8:30 - 9:00   | Title: Mechanisms underlying decisions of dental pulp stem cell fate.  
                  **Presenter: Jacques Nor, U. Michigan, Ann Arbor, USA** |
| 9:00 - 9:30   | Title: Generation of induced endothelial and neural progenitor cells from dental stem cells for angiogenesis and neurogenesis  
                  **Presenter: Chengfei Zhang, U. Hong Kong, Hong Kong** |
| 9:30 - 10:30  | Coffee Break, Poster Viewing and Vendor Visiting        |
| 10:30 - 11:00 | Title: DPSCs and their potential in reinnervation and angiogenesis by using scaffolds.  
                  **Presenter: Ivo Lambrichts, Hasselt U., Diepenbeek, Belgium** |
| 11:00 – 11:40 | Keynote Lecture #4 – Engineering biomaterials for enhanced tissue regeneration of innervated and vascularized tissues – lessons learned from brain regeneration.  
                  **Presenter: Lina Nih, UCLA, Los Angeles, USA** |
| 11:40 – 12:10 | General Discussion: Vascular and innervation establishment as key components for clinical success |
| 12:10 -12:15  | Announcements                                           |
| 12:15 – 13:15 | Lunch Break – catered box lunches                        |
Day 3: Tuesday afternoon, June 25, 2019 (13:15 – 17:00)

Venue: OHSU Knight Cancer Research Building – Auditorium (2720 S.W. Moody Avenue, Portland, OR, 97201; building directly north of dental school building)

Session V: Clinical, Perspectives and Awards

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| 13:15 – 13:45 | Title: Perspectives in pulp regeneration.  
*Presenter: Gottfried Schmalz, U. Regensburg, Regensburg, Germany* |                                                                        |
| 13:45 – 14:15 | Title: Biological challenges and opportunities in regenerative endodontics  
*Presenter: Anibal Diogenes, UTHSCSA, San Antonio, USA* |                                                                        |
| 14:15 – 14:45 | Title: Cell-based therapies – Clinical applications in regenerative dentistry  
*Presenter: Athina Bakopoulou, U. Thessaloniki, Thessaloniki, Greece* |                                                                        |
| 14:45 – 15:00 | General Discussion regenerate the pulp or restore its function? |                                                                        |
| 15:00 – 15:15 | Coffee Break |                                                                        |
| 15:15 – 15:50 | Keynote Lecture #5: NIDCR Support for Regenerative Medicine Research  
*Presenter: Lillian Shum, NIDCR, Bethesda, USA* |                                                                        |
| 15:50 – 16:20 | Final Reflections: Approaching 45 years of PBRG  
*Presenter: Tony Smith, University of Birmingham, UK* |                                                                        |
| 16:20 – 16:40 | Poster Awards |                                                                        |
| 16:40 – 17:00 | Closing Comments/Acknowledgements |                                                                        |