# PROGRAMME

## Saturday, September 16, 2006

19:00

Dinner

15:00 Welcome and Introduction

| 15:15-17:00 | Session 1   |
|-------------|---|
|             | BLOOD VESSEL MORPHOGENESIS<br>Discussion leader: Jan Kitajewski   |
| 15:15       | <b>Christer Betsholtz</b> , Stockholm<br>Role for Dll4/Notch1 in the selection of single endothelial tip cells during<br>sprouting angiogenesis (page 2)        |
| 15:45       | <b>Ralf Adams</b> , London<br>Regulation of blood vessel morphogenesis through cell-cell and cell-matrix<br>interactions (page 3)                               |
| 16:15       | Holger Gerhardt, London (short communication)<br>Loss of endothelial cell guidance by MMP-dependent cleavage of VEGF-A<br>causes retinal vasculopathy (page 61) |
| 16:30       | <b>Didier Stainier</b> , San Francisco<br>A common progenitor for hemapoietic and endothelial lineages in the<br>zebrafish gastrula (page 4)                    |
| 17:00       | Coffee Break  |
| 17:30-19:00 | Session 2   |
|             | CELL-CELL SIGNALING IN ANGIOGENESIS<br>Discussion leader: Christer Betsholtz  |
| 17:30       | Jan Kitajewski, New York<br>Notch in developmental and tumor angiogenesis (page 5)  |
| 18:00       | Thomas Gridley, Bar Harbor<br>Notch signaling during vascular development in mice (page 6)  |
| 18:30       | Manfred Gessler, Würzburg<br>DII4-Notch-Hey signalling in endothelial progenitor cells (page 7)   |

20:00-? Poster Session I

| 8:30-10:15  | Session 3  |
|-------------|--|
|             | ANGIOGENESIS IN PATHOLOGICAL SITUATION AND ITS MODULATION<br>IN THERAPY<br>Discussion leader: Hellmut Augustin   |
| 8:30        | Napoleone Ferrara, South San Francisco<br>VEGF et al. (page 8)   |
| 9:00        | <b>Donald McDonald</b> , San Francisco<br>Cessation of VEGF inhibition is followed by rapid regrowth of blood vessels in<br>tumors (page 9)  |
| 9:30        | <b>Valentin Djonov</b> , Bern (short communication, long title)<br>Escape mechanisms involving intussusceptive angiogenesis and the massive<br>production of smooth-muscle actin after short-term anti-angiogenic therapy<br>(PTK 787) and treatment with ionizing radiation in mice carrying MMTV/c-neu<br>xenografts (page 48) |
| 9:45        | <b>Lieve Moons</b> , Leuven (short communication)<br>Therapeutic potential of VEGF family members in pro- and anti-angiogenic<br>therapies (page 69)   |
| 10:00       | Andrea Banfi (short communication)<br>Angiogenic potentiation, vascular normalization and hind-limb ischemia<br>improvement by matched-level co-delivery of VEGF164 and PDGF-BB (page 30)  |
| 10:15-10:30 | Group photo  |
| 10:30-11:00 | Coffee break   |
| 11:00-12:30 | Session 4  |
|             | <b>REGULATION AND MODULATION OF ENDOTHELIAL CELL FUNCTION</b><br>Discussion leader: Ralf Adams   |
| 11:00       | <b>Elena Pasquale</b> , La Jolla<br>The EphB4 receptor as a target to inhibit angiogenesis ( <sub>page</sub> 10)   |
| 11:30       | Hellmut Augustin, Freiburg<br>Regulation of vascular homeostasis by angiogenic cytokines (page 11)   |
| 12:00       | Jan Schnitzer, San Diego<br>Proteomic imaging of microenvironment-dependent expression in endothelium<br>and its caveolae for organ- and tumor-specific delivery in vivo (page 12)   |

12:30 Lunch

#### 13:45-15:45 Session 5

#### HYPOXIA SIGNALING

Discussion leader: Georg Breier

13:45Jacques Pouysségur, NiceHypoxia signaling from survival to tumor cell death (page 13)

- 14:15 **Randall S. Johnson**, San Diego Physiology of angiogenic response during hypoxia (page 14)
- 14:45Karl H. Plate, Frankfurt/Main<br/>Role of hypoxia in tumor vasculogenesis and tumor angiogenesis (page 15)
- 15:15 **Lorenz Poellinger**, Stockholm Mechanisms of signal transduction and gene regulation in hypoxic cells (page 16)
- 15:45-16:15 Coffee break

### 16:15-18:45 Session 6

| <ul> <li>16:15 Kari Alitalo, Helsinki<br/>Lymphangiogenesis in development and disease (page 17)</li> <li>16:45 Brant Weinstein, Bethesda<br/>Live imaging of lymphatic development using the zebrafish (page 18)</li> <li>17:15 Peter Carmeliet, Leuven<br/>Genetic analysis of lymph/angiogenesis and the neurovascular link:<br/>therapeutic implications (page 19)</li> <li>17:45 Gerhard Christofori, Basel<br/>Angiogenesis, lymphangiogenesis, and tumor metastasis (page 20)</li> <li>18:15 Michael Detmar, Zürich<br/>Lymphangiogenesis and cancer metastasis - new insights (page 21)</li> <li>19:00-20:00 Dinner</li> </ul> |             | LYMPHATIC DEVELOPMENT, LYMPHANGIOGENESIS AND TUMOR<br>METASTASIS<br>Discussion leader: Jonathan Sleeman |
|--|-------------|---|
| <ul> <li>Live imaging of lymphatic development using the zebrafish (page 18)</li> <li>17:15 Peter Carmeliet, Leuven<br/>Genetic analysis of lymph/angiogenesis and the neurovascular link:<br/>therapeutic implications (page 19)</li> <li>17:45 Gerhard Christofori, Basel<br/>Angiogenesis, lymphangiogenesis, and tumor metastasis (page 20)</li> <li>18:15 Michael Detmar, Zürich<br/>Lymphangiogenesis and cancer metastasis - new insights (page 21)</li> </ul>  | 16:15       |   |
| <ul> <li>Genetic analysis of lymph/angiogenesis and the neurovascular link: therapeutic implications (page 19)</li> <li>17:45 Gerhard Christofori, Basel Angiogenesis, lymphangiogenesis, and tumor metastasis (page 20)</li> <li>18:15 Michael Detmar, Zürich Lymphangiogenesis and cancer metastasis - new insights (page 21)</li> </ul>   | 16:45       |   |
| <ul> <li>Angiogenesis, lymphangiogenesis, and tumor metastasis (page 20)</li> <li>18:15 Michael Detmar, Zürich<br/>Lymphangiogenesis and cancer metastasis - new insights (page 21)</li> </ul>   | 17:15       | Genetic analysis of lymph/angiogenesis and the neurovascular link:                                      |
| Lymphangiogenesis and cancer metastasis - new insights (page 21)   | 17:45       |   |
| 19:00-20:00 Dinner   | 18:15       |   |
|  | 19:00-20:00 | Dinner  |

| 20:00-? | Poster Session II |  |
|---------|-------------------|--|
|---------|-------------------|--|

## Monday, September 18, 2006

| 8:30-10:15  | Session 7  |
|-------------|--|
|             | VEGF SIGNALING AND FUNCTION<br>Discussion leader: Johannes Waltenberger  |
| 8:30        | Lena Claesson-Welsh, Uppsala<br>VEGF co-receptors in regulation of angiogenesis (page 22)  |
| 9:00        | <b>Gera Neufeld</b> , Haifa (short communication)<br>The molecular mechanisms by which neuropilins potentiate VEGF signalling<br>(page 81)   |
| 9:15        | <b>Christiana Ruhrberg</b> , London (short communication)<br>Role of the neuropilin ligands VEGF164 and SEMA3A in neuronal and<br>vascular patterning (page 85)                      |
| 9:30        | <b>Ferdinand Le Noble</b> , Berlin (short communication)<br>A novel role for VEGFR2-Neuropilin-1 signaling in hypoxia-induced<br>cardiomyopathy: rescue with semaphorin A3 (page 83) |
| 9:45        | <b>David Bates</b> , Bristol<br>The distal spliced isoforms of VEGF, VEGF <sub>165</sub> b, in pathology and physiology<br>(page 23)   |
| 10:15       | Coffee break   |
| 10:45-12:15 | Session 8  |
|             | ANGIOGENIC SIGNALING: VEGF AND BEYOND<br>Discussion leader: David Bates  |
| 10:45       | Rudi Busse, Frankfurt<br>CYPport for angiogenesis: an unexpected function of cytochrome P450<br>epoxygenases (page 24)   |
| 11:15       | <b>Erhard Hofer</b> , Vienna (short communication)<br>Genes preferentially induced by VEGF-A/VEGFR2 (page 50)  |
| 11:30       | <b>Véronique Orian-Rousseau</b> , Karlsruhe (short communication)<br>The co-receptor function of CD44v6 for c-Met and for VEGFR-2 in<br>angiogenesis (page 72)                       |
| 11:45       | <b>Klaus Preissner</b> , Giessen (short communication)<br>Extracellular RNA induces endothelial cell permeability via vascular<br>endothelial growth factor (page 41)                |
| 12:00       | <b>Georgia Mavria</b> , London (short communication)<br>Control of sprouting and vessel quiescence by MAP-kinase and Rho GTPase<br>signalling (page 66)                              |
| 12:15       | <b>Marina Schorpp-Kistner</b> , Heidelberg (short communication)<br>Transregulatory and cell-autonomous functions for JunB in angiogenesis<br>(page 60)                              |

| 20:00-? | Poster Session III                  |
|---------|-------------------------------------|
| 18:30   | Dinner                              |
| 13:30   | Angiogenesis goes sailing (Part II) |
| 12:30   | Lunch                               |

Tuesday, September 19, 2006

| 8:30-10:15     | Session 9  |
|----------------|--|
|                | ENDOTHELIAL CELL CONTACTS IN BLOOD VESSEL FORMATION<br>Discussion leader: Dietmar Vestweber  |
| 8:30           | Elisabetta Dejana, Milan<br>Intracellular signalling through adherens junctions in the development of the<br>vascular system (page 25)                                 |
| 9:00           | <b>Andrea Horst</b> , Hamburg (short communication)<br>CEA-related cell adhesion molecule 1 (CEACAM1) modulates vascular<br>remodelling in vitro and in vivo (page 51) |
| 9:15           | <b>Beat Imhof</b> , Geneva<br>Junctional adhesion molecule C in tumor angiogenesis and monocyte<br>transendothelial migration (page 26)                                |
| 9:45           | Johannes Waltenberger, Maastricht<br>Monocytes as biosensors for the assessment of vascular integrity (page 36)  |
| 10:00          | Coffee break   |
| 10:30-12:00    | Session 10   |
|                | CELL-CELL INTERACTIONS DURING ANGIOGENESIS<br>Discussion leader: Holger Gerhardt   |
| 10:30          | <b>Dietmar Vestweber</b> , Münster<br>Endothelial cell contacts in inflammation and angiogenesis (page 27)   |
| 11:00          | <b>Volkhard Lindner</b> , Scarborough (short communication)<br>The novel gene Cthrc1 is essential for blood vessel formation (page 59)                                 |
| 11:15          | Eli Keshet, Jerusalem<br>Recruitment by VEGF of angiogenic accessory cells (page 28)   |
| End of meeting |  |
| 12:00          | Lunch  |

13:30 Departure of buses