

Workshop on “New Vision of the Saturnian System in the Context of a Highly Dissipative Saturn” May 9 to 13, 2022

| Monday, 9 May 2022 | | |
|---------------------------|-------------------------------------------------------------------------|----------------------------|
| Time | Topic | Chair/ Speaker |
| 10:00 | Registration ISSI, Hallerstrasse 6, 1st floor | |
| | | Chair: |
| 11:00 | Introduction to the Workshop | Director, Conveners |
| 12:00 | <i>Lunch</i> | |
| 13:30 | Intro of Subgroup 0 “Rings composition” | Gianrico Filacchione |
| 14:00 | Review talk(s) | |
| 14:00 - 14:20 | Update on Cassini UVIS results: Rings and Ring Moons | Amanda Hendrix |
| 14:20 - 14:40 | Ring Composition Update utilizing INMS and RPWS data | Hunter Waite |
| 14:40 - 15:05 | Update on Cassini-CDA results | Sascha Kempf – in telecon |
| 15:05 - 15:30 | Update on Cassini Radiometry results | Zhimeng Zhang – in telecon |
| 15:30 - 16:00 | <i>Coffee Break</i> | |
| 16:00 | General discussions / chapters content | |
| 16:00 - 16:20 | Saturn’s ring composition chapter presentation and discussion | Kelly Miller – in telecon |
| 16:20 - 16:40 | Ringmoons composition chapter presentation and discussion | Mauro Ciarniello |
| 16:40 - 17:00 | Discussion - AOB | |
| 17:00 | <i>Welcome Reception - Hallerstrasse 6, 1st floor</i> | |



Tuesday, 10 May 2022

| Time | Topic | Chair/ Speaker |
|--------------|----------------------------------------|-----------------------|
| 09:30 | Extra discussions and chapter writing | |
| 10:30 | <i>Coffee Break</i> | |
| 11:00 | Poster session | |
| 11:45 | Meeting picture | |
| 12:00 | <i>Lunch</i> | |
| 13:30 | Intro of Subgroup 1 "Rings Age" | Aurelien Crida |
| 14:00-14:30 | The Age of the Rings | Paul Estrada |
| 14:30-14:45 | The Opening of the Cassini Division | Benoit Noyelles |
| 15:00-15:30 | General discussion / chapters content | |
| 15:30 | <i>Coffee Break</i> | |
| 16:00 | General discussions / chapters content | |
| 17:00 | Extra discussions and chapter writing | |

Wednesday, 11 May 2022

| Time | Topic | Chair / Speaker |
|---------------|--------------------------------------------------------------------------------------------------------------------|----------------------------------------|
| 09:00 | Free time to visit the attractions of Bern... NB: All ISSI facilities are available for small group discussions | |
| | <i>Lunch</i> | |
| 13:30 | Intro of Subgroup 2 "moons formation and long term orbital evolution" | Michel Blanc |
| 13:40 - 14:00 | Comparative study of giant planets regular moons formation (15' + 10' discussion) | Michel Blanc |
| 14:00 - 14:15 | Pebble accretion scenario for the formation of Galilean moons (10' + 5' discussion) | Yuhito Shibaïke |
| 14:15 - 14:35 | Evolution of Uranus's main moons after a planet-tilting giant impact (15' + 5' discussion) | Julien Salmon |
| 14:35 - 15:05 | Formation of Saturn's regular moons (20' + 10' discussion) | Aurelien Crida |
| 15:05 - 15:35 | Tidal interactions and long-term orbital evolution (20' + 10' discussion) | Jim Fuller |
| 15:35 | <i>Coffee Break</i> | |
| 16:00 - 16:40 | Remote contributions | |
| 16:00 - 16:20 | Dynamical interactions between rings small moons (15' + 5' discussion) | Philip Nicholson & Maryame El Moutamid |
| 16:20 - 16:40 | A new model for the formation of Titan and the Saturnian moons | Olivier Mousis (by zoom) |
| 16:40 - 17:00 | Tidal (non-) evolution of Titan (from Bob Jackobson's work) | Philip Nicholson (by zoom) |
| 17:00 - 18:00 | General discussion and exchanges on chapters writing | |
| 19:00 | <i>Workshop Dinner at the Restaurant Altes Tramdepot</i> | |



Thursday, 12 May 2022

| Time | Topic | Chair/ Speaker |
|---------------|--------------------------------------------------------------------------------|-------------------------------|
| 09:30 | Intro of Subgroup 3 “origin of Enceladus tidal dissipation“ | Carly Howett |
| 10:00 | Review talk(s) | |
| 10:00 - 10:30 | Constraining the mass and energy of dissipation systems | Carly Howett & Georgina Miles |
| 10:30 - 11:00 | The origin and evolution of Enceladus' tidal dissipation | Francis Nimmo |
| 11:00 - 11:30 | Dissipation mechanism | Gabriel Tobie |
| 11:30 | <i>Coffee Break</i> | |
| 11:45 | General discussions / chapters content | |
| 13:00 | <i>Lunch</i> | |
| 14:30 | Intro of Subgroup 4 “Possible tidal lock mechanism in Jupiter and exo-planets” | Valery Lainey |
| 14:50 | Review talk(s) | |
| 14:50 - 15:15 | Interior models of Jupiter & a comparison to Saturn / exoplanets | Tristan Guillot |
| 15:15 - 15:40 | Theory of resonance locking | Jim Fuller |
| 15:40 - 16:05 | Tidal dissipation in complex internal structure of giant planets | Stephane Mathis |
| 16:05 -16:30 | Tides from Radio-science data | Giacomo Lari |
| 16:30 | <i>Coffee Break</i> | |
| 17:00 | General discussions / chapters content | |
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Friday, 13 May 2022

| Time | Topic | Chair/ Speaker |
|-------------------------------|--------------------------------------------------------------------|-----------------------|
| 09:30 | Table of content of the book, Chapters content and lead authors... | |
| 11:00 | <i>Coffee Break</i> | |
| 11:30 | Workshop discussion overview | |
| 12:30 | <i>Lunch</i> | |
| 14:00 | Wrap-up | |
| <i>End of Workshop</i> | | |

Last update: 10 May 2022