

COSMO-15, the 19th annual International Conference on Particle Physics and Cosmology

Monday 07 September 2015 - Friday 11 September 2015

**Warsaw, Poland
Programme**

Monday 07 September 2015

Registration - Lobby (08:00-09:00)

Plenary - Main Hall (07 September 09:00-10:25)

- Conveners: Martins, Carlos

| time | title | presenter |
|-------|--|--------------------|
| 09:00 | Welcome and introduction | ROSZKOWSKI, Leszek |
| 09:10 | Opening address | WROCHNA, Grzegorz |
| 09:15 | Recent advances in astrophysics of cosmic rays and gamma-ray astronomy | MOSKALENKO, Igor |
| 09:50 | How to learn to love the BOSS (Baryon Oscillations Spectroscopic Survey) | HO, Shirley |

Coffee (10:25-10:55)

Plenary - Main Hall (07 September 10:55-12:40)

- Conveners: Yokoyama, Jun'ichi

| time | title | presenter |
|-------|--|-----------------------|
| 10:55 | The Mysterious Neutrinos - Clues from Astrophysics and Cosmology | BEACOM, John |
| 11:30 | Leptogenesis and Flavour Models | KING, Stephen |
| 12:05 | Vacuum (meta?)stability and Higgs inflation | SHAPOSHNIKOV, Mikhail |

Lunch (12:40-14:00)

Plenary - Main Hall (07 September 14:00-15:45)

- Conveners: Beacom, John

| time | title | presenter |
|-------|--|-------------------|
| 14:00 | Perspectives of discoveries in intergalactic space | VIEL, Matteo |
| 14:35 | Numerical simulations of large scale structure: overview and outlook | SIJACKI, Debora |
| 15:10 | Overview of WIMP Dark Matter | FREESE, Katherine |

Coffee (15:45-16:15)

Plenary - Main Hall (07 September 16:15-18:00)

- Conveners: King, Stephen

| time | title | presenter |
|-------|---|-----------------------|
| 16:15 | Beyond the thermal WIMP dark matter | CHOI, Ki-Young |
| 16:50 | Direct Searches for WIMP Dark Matter | SCHUMANN, Marc |
| 17:25 | The battlegrounds of gamma-ray detection of dark matter: the Galactic Center and dwarf galaxies | SANCHEZ-CONDÉ, Miguel |

Welcome Reception - (19:00-21:30)

Tuesday 08 September 2015

Plenary - Main Hall (08 September 09:00-10:10)

- Conveners: Roos, Matts

| time | title | presenter |
|-------|--|--------------------|
| 09:00 | Indirect Searches for Particle Dark Matter | BRINGMANN, Torsten |
| 09:35 | Viscous dark matter | TETRADIS, Nikolaos |

Coffee (10:10-10:40)

Plenary - Main Hall (08 September 10:40-12:30)

- Conveners: Linder, Eric

| time | title | presenter |
|-------|---|--------------------|
| 10:40 | Recent CMB results from Planck | CHALLINOR, Anthony |
| 11:15 | Large scale structure of the Universe: the angular power spectrum and bispectrum | DURRER, Ruth |
| 11:50 | General Relativity: its creation, classical tests and new effects in rotating systems | MALEC, Edward |

Poster Session (08 September 12:30-13:30)

| time | title | presenter |
|-------|--|------------------------|
| 12:30 | Aspects of topos theory in cosmology | BIELAS, Krzysztof |
| 12:31 | Constructing N-body Simulations with General Relativistic Dynamics | GOSENCA, Mateja |
| 12:32 | Lambda Units and Lambda Quantum of Action have they any physical sense | KOSTRO, Ludwik |
| 12:33 | The local effect of Dark Energy on the evolution of galaxy clusters: the formation of massive structures in the cluster centre | ARCA SEDDA, Manuel |
| 12:34 | General formalism for bigravity perturbations | CUSIN, Giulia |
| 12:35 | Revisiting $f(R)$ cosmology | JAIME, Luisa |
| 12:36 | Cosmic acceleration with a negative cosmological constant in higher dimensions | OHTA, Nobuyoshi |
| 12:37 | Bigravity from gradient expansion in DGP 2-brane model | YAMASHITA, Yasuho |
| 12:38 | Corrections from the quantum sub-structure of the background metric | ZELL, Sebastian |
| 12:39 | Relativistic systems of Fermions with anisotropy and cutoff energy in their distribution function | DONNARI, Martina |
| 12:40 | Supersymmetric dark matter with low reheating temperature | TROJANOWSKI, Sebastian |
| 12:41 | Sensitivity of CTA to dark matter annihilations in the galactic centre | WILLIAMS, Andrew |
| 12:42 | The end of the beginning: isocurvature modes in primordial black hole dark matter | YOUNG, Sam |
| 12:43 | Nano-explosive detector for dark matter and neutrinos | GORSKI, Maciej |
| 12:44 | Inflation from radion gauge-Higgs potential at Planck scale | ABE, Yugo |
| 12:45 | Evolution of density perturbations in inflationary models with two scalar fields and with different sound speeds | DULNY, Lukasz |

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| 12:47 | Avoiding the Higgs deflation | ENCKELL, Vera-Maria |
| 12:48 | Particle production in the expanding universe | CZERWINSKA, Olga |
| 12:49 | Field range bound and consistency in generalized G-inflation | KUNIMITSU, Taro |
| 12:50 | Scale-invariant top condensate model as the solution to the hierarchy problem and its cosmological implications | LIANG, Jie |
| 12:51 | Hill crossing after hilltop inflation | ORANI, Stefano |
| 12:52 | Universality classes for models of inflation | PIERONI, Mauro |
| 12:53 | A Recipe for a Strong First Order Electroweak Phase Transition | HARMAN, Christopher |
| 12:54 | Gravitational waves from slow-roll inflation in Lorentz-violating Weyl gravity | YAJIMA, Kohji |
| 12:55 | Model-independent constraints on modified gravity from current and future RSD and Supernovae Ia measurements | TADDEI, Laura |
| 12:56 | Scaling in a network of cosmic necklaces | WEIR, David |
| 12:57 | Experimental investigations of the nonlinear dynamics of a complex space-charge configuration inside and around a grid cathode with hole | TEODORESCU-SOARE, Claudia |

Lunch (12:30-14:00)

CMB, LSS and cosmological parameters: CMB + LSS - Main Hall (08 September

14:00-15:40)

- **Conveners: Durrer, Ruth**

| time | title | presenter |
|-------|---|-------------------|
| 14:00 | Cosmological Likelihood Mapping and High Dimensional Parameter Spaces | LINDER, Eric |
| 14:20 | On soft limits of large-scale structure correlation functions | SAGUNSKI, Laura |
| 14:40 | Intensity Mapping and One-Point Statistics | BREYSSE, Patrick |
| 15:00 | Measuring the speed of light with Baryon Acoustic Oscillations | SALZANO, Vincenzo |
| 15:20 | Non-parametric Reconstruction of the Hubble Expansion History | ZHAN, Hu |

Dark Energy: DE - Rm 115+116 (08 September 14:00-15:40)

- **Conveners: Huterer, Dragan**

| time | title | presenter |
|-------|---|---------------------|
| 14:00 | Cosmology of massive gravity | FASIELLO, Matteo |
| 14:20 | UV inspired $f(R)$ | BROY, Benedict |
| 14:40 | Modified gravity inside astrophysical bodies | SAITO, Ryo |
| 15:00 | Numerical forecasts for atom interferometry experiments constraining modified gravity | SCHLOEGEL, Sandrine |
| 15:20 | Equation of state of dark energy in $f(R)$ gravity | TAKAHASHI, Kazufumi |

Dark Matter: DM - Rm 207 (08 September 14:00-15:40)

- **Conveners: Choi, Ki-Young**

| time | title | presenter |
|-------|---|-----------------|
| 14:00 | Detecting Particle Dark Matter Signatures by Cross-Correlating Gamma-Ray Anisotropies with Weak Lensing | CAMERA, Stefano |

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|-------|--|-----------------------|
| 14:20 | Interplay of ID, DD, and LHC searches in the MSSM | SESSOLO, Enrico Maria |
| 14:40 | Explaining the Galactic Center Excess with the MSSM | LOPEZ, Alejandro |
| 15:00 | The relic density of heavy neutralinos | HRYCZUK, Andrzej |
| 15:20 | A search for dark matter annihilation in the newly discovered dwarf galaxy Reticulum 2 | KOUSHIAPPAS, Savvas |

Inflation and phase transitions: Inflation + PT - (08 September 14:00-15:40)

- **Conveners: Enqvist, Kari**

| time | title | presenter |
|-------|---|----------------------------|
| 14:00 | Dynamically Induced Planck Scale and Inflation | RACIOPPI, Antonio |
| 14:20 | Composite Cosmology | CROON, Djuna |
| 14:40 | Tensor and scalar perturbations from dilaton-induced gauge fields | CHOI, Kiwoon |
| 15:00 | Is it Inflation? | KINNEY, Will |
| 15:20 | Inflationary fossils in large scale structures | DIMASTROGIOVANNI, Emanuela |

Coffee (15:40-16:10)

CMB, LSS and cosmological parameters: CMB + LSS - Main Hall (08 September 16:10-18:10)

- **Conveners: Rudak, Bronisław**

| time | title | presenter |
|-------|---|--------------------|
| 16:10 | The SPIDER experiment: Instrument review, flight performance, and preliminary results | GUDMUNDSSON, Jon |
| 16:30 | Oscillations in the CMB bispectrum | MUNCHMEYER, Moritz |
| 16:50 | CMB bispectrum | HIRAMATSU, Takashi |
| 17:10 | Theoretical Predictions of Large Scale Clustering in the Lyman-alpha Forest | CIEPLAK, Agnieszka |
| 17:30 | On Planck Asymmetries, Alignments and Calibration. | NOTARI, Alessio |
| 17:50 | The effect of clustering dark energy on cosmological parameter estimation | HENEKA, Caroline |

Dark Energy: DE - Rm 115+116 (08 September 16:10-18:10)

- **Conveners: Huterer, Dragan**

| time | title | presenter |
|-------|---|---------------------|
| 16:10 | Bimetric gravity is cosmologically viable | KOENNIG, Frank |
| 16:30 | Tensor Modes in Bigravity: Primordial to Present | TERRANA, Alexandra |
| 16:50 | Consistent metric combinations in cosmology of massive bigravity | NERSISYAN, Henrik |
| 17:10 | Mapping dark energy with fundamental couplings | LEITE, Ana Caterina |
| 17:30 | The Effective Field Theory approach to dark energy and modified gravity phenomenology | RAVERI, Marco |
| 17:50 | Perturbations of Cosmological and Black hole Solution in Bi-gravity | YOSHIDA, Daisuke |

Dark Matter: DM - Rm 207 (08 September 16:10-18:10)

- Conveners: Choi, Ki-Young

| time | title | presenter |
|-------|---|---------------------|
| 16:10 | The Warmness of Dark Matter from the Lyman alpha forest | GARZILLI, Antonella |
| 16:30 | Minimal Asymmetric Dark Matter | KRAUSS, Martin |
| 16:50 | XENON Dark Matter Search | GEIS, Christopher |
| 17:10 | Dark-Matter Bound States from Feynman Diagrams | POSTMA, Marieke |
| 17:30 | Nano-explosive detector for Dark Matter and Neutrinos | GORSKI, Maciej |
| 17:50 | Cosmological black holes and accretion: causal structure and models for the dark sector | GUARIENTO, Daniel |

Inflation and phase transitions: Inflation + PT - Rm 111+112 (08 September 16:10-18:10)**- Conveners: Enqvist, Kari**

| time | title | presenter |
|-------|---|--------------------------|
| 16:10 | CP-violating top-Higgs coupling and electroweak phase transition | YUE, Jason Tsz Shing |
| 16:30 | Correlation Functions in Stochastic Inflation | VENNIN, Vincent |
| 16:50 | Shaft Inflation | DIMOPOULOS, Konstantinos |
| 17:10 | The squeezed limit of the bispectrum for multifield inflation | KENTON, Zachary |
| 17:30 | How does canonical quantum gravity affect scalar and tensor perturbations during inflation? | KRÄMER, Manuel |
| 17:50 | Warm intermediate inflation in the Randall–Sundrum II model in light of Planck 2015 and BICEP2 results. | VIDELA, Nelson |

Wednesday 09 September 2015

CMB, LSS and cosmological parameters: CMB + LSS - Main Hall (09 September

09:00-10:40)

- **Conveners: Bulik, Tomasz**

| time | title | presenter |
|-------|--|--------------------|
| 09:00 | The Abundance of Extreme Cosmic Voids | CHONGCHITNAN, Siri |
| 09:20 | Tension between the power spectrum of density perturbations measured on large and small scales | CHARNOCK, Tom |
| 09:40 | Intrinsic galaxy size correlations and their importance for weak lensing | CRITTENDEN, Robert |
| 10:00 | CMB lensing and deflection angles in high precision cosmology | FANIZZA, Giuseppe |
| 10:20 | Is there evidence for anisotropy in CMB data? | SAADEH, Daniela |

Dark Energy: DE - Rm 207 (09 September 09:00-10:40)

- **Conveners: Biesiada, Marek**

| time | title | presenter |
|-------|--|------------------------|
| 09:00 | Numerical Problems in Perturbed Coupled Quintessence | LEITHES, Alexander |
| 09:20 | Cosmology with strong gravitational lensing systems | PIORKOWSKA, Aleksandra |
| 09:40 | Interacting dark energy in light of CMB, lensing, and BAO data | PALMGREN, Elina |
| 10:00 | Dark energy: Testing gravity in Voids and Halos | SPOLYAR, Douglas |
| 10:20 | The Dynamical Evolution Of A Galaxy Cluster: The Local Effect Of Dark Energy | DONNARI, Martina |

Inflation and phase transitions: Inflation - Rm 111+112 (09 September 09:00-10:40)

- **Conveners: Enqvist, Kari**

| time | title | presenter |
|-------|---|----------------------|
| 09:00 | Mixed Inflaton and Spectator Field Models: CMB constraints and μ distortion | TAKAHASHI, Tomo |
| 09:20 | L-R neutrino oscillation during preheating | MATSUDA, Tomohiro |
| 09:40 | Stabilizing the Planck mass shortly after inflation | CHRISTOPHERSON, Adam |
| 10:00 | Single superfield inflation, moduli stabilization, and supersymmetry breaking | TERADA, Takahiro |
| 10:20 | Massive primordial black holes from hybrid inflation as dark matter and the seeds of galaxies | CLESSE, Sebastien |

Inflation and phase transitions: PT - Rm 115+116 (09 September 09:00-10:40)

- **Conveners: Hindmarsh, Mark**

| time | title | presenter |
|-------|---|-----------------------|
| 09:00 | Domain wall formation via axion roulette and axion domain wall baryogenesis | KITAJIMA, Naoya |
| 09:20 | Chasing monopoles | LOPEZ-EIGUREN, Asier |
| 09:40 | Random walks in deSitter | RIGOPOULOS, Gerasimos |
| 10:00 | The observational position of simple non-minimally coupled inflationary scenarios | EDWARDS, David |

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| 10:20 | Astrophysical and Cosmological Probes of Cosmic String Networks | LONG, Andrew |
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Coffee (10:40-11:10)

CMB, LSS and cosmological parameters: CMB - Main Hall (09 September 11:10-12:50)

- Conveners: Bulik, Tomasz

| time | title | presenter |
|-------|---|----------------------|
| 11:10 | New approach to cosmological perturbation theory from an effective action | IVANOV, Mikhail |
| 11:30 | Anisotropic Correlations in Fourier Phases | EGGEMEIER, Alexander |
| 11:50 | Backreaction in Growing Neutrino Quintessence | FUEHRER, Florian |
| 12:10 | The Nature of Voids: theory and simulation | NADATHUR, Seshadri |
| 12:30 | Evading non-linearities: Baryon Acoustic Oscillations at the linear point | ANSELMINI, Stefano |

CMB, LSS and cosmological parameters: LSS - Rm 207 (09 September 11:10-12:50)

- Conveners: Biesiada, Marek

| time | title | presenter |
|-------|---|---------------------|
| 11:10 | General relativistic corrections in N-body simulations -- The N-body gauge | FIDLER, Christian |
| 11:30 | Weak lensing signals induced from second-order vector perturbation | SAGA, Shohei |
| 11:50 | Using dark energy to suppress power at small scales | SAWICKI, Ignacy |
| 12:10 | Constraining higher-order primordial non-Gaussianity from power spectra and bispectra of imaging survey | HASHIMOTO, Ichihiko |
| 12:30 | How to model the effect of small-scale structures on light propagation? | FLEURY, Pierre |

Inflation and phase transitions: Inflation - Rm 111+112 (09 September 11:10-12:50)

- Conveners: Enqvist, Kari

| time | title | presenter |
|-------|---|----------------------------|
| 11:10 | Liberating vector fields from their CMB anisotropy constraint | BUENO SANCHEZ, Juan Carlos |
| 11:30 | Renormalization in Higgs inflation | MOOIJ, Sander |
| 11:50 | Inflation, quantum gravity and the latest Planck data | SALTAS, Ippocratis |
| 12:10 | A universal threat to single-field inflation | RENAUX-PETEL, Sebastien |
| 12:30 | Non-metric inflation | KOIVISTO, Tomi |

Inflation and phase transitions: PT - Rm 115+116 (09 September 11:10-12:50)

- Conveners: Hindmarsh, Mark

| time | title | presenter |
|-------|---|--------------------------|
| 11:10 | Three-Dimensional Quantum Bubble Collisions | BRADEN, Jonathan |
| 11:30 | Fate of the Primordial Higgs Condensate | NURMI, Sami |
| 11:50 | Bounds on the hidden Universe | PATIL, Subodh |
| 12:10 | Gravitational Waves in the Supersymmetric Extensions of the SM | NARDINI, Germano |
| 12:30 | Vector and tensor contributions to the curvature perturbation at second order | GREGORIO CARRILHO, Pedro |

Lunch (12:50-14:00)

Excursion (14:00-17:30)

Banquet (19:30-22:00)

Thursday 10 September 2015

Plenary - Main Hall (10 September 09:00-10:10)

- Conveners: Gregory, Ruth

| time | title | presenter |
|-------|--|-----------------|
| 09:00 | Theoretical approaches to the Dark Energy paradigm | POLARSKI, David |
| 09:35 | Quantum break time for cosmological constant | DVALI, Gia |

Coffee (10:10-10:40)

Plenary - Main Hall (10 September 10:40-12:30)

- Conveners: Quevedo, Fernando

| time | title | presenter |
|-------|--------------------------------------|--------------------|
| 10:40 | Aligned Axionic Inflation | NILLES, Hans-Peter |
| 11:15 | Cosmological Collider Physics | MALDACENA, Juan |
| 11:50 | Area Law and Second Law in Cosmology | BOUSSO, Raphael |

Lunch (12:30-14:00)

CMB, LSS and cosmological parameters: CMB + LSS - Main Hall (10 September 14:00-15:40)

- Conveners: Demiański, Marek

| time | title | presenter |
|-------|--|----------------------|
| 14:00 | Cosmology on the Largest Scales | CAMERA, Stefano |
| 14:20 | How much useful cosmological information can we capture beyond the linear regime of structure formation? | CARRON, Julien |
| 14:40 | Decaying Dark Matter and the Discrepancy in σ_8 | SEKIGUCHI, Toyokazu |
| 15:00 | An introduction to 21cm cosmology using HI intensity mapping | POURTSIDOU, Alkistis |
| 15:20 | Robust forecasts on inflationary science from the foreground-obscured, gravitationally lensed CMB polarisation | FEENEY, Stephen |

Dark Energy: DE - Rm 115+116 (10 September 14:00-15:40)

- Conveners: Gregory, Ruth

| time | title | presenter |
|-------|---|-----------------------|
| 14:00 | Structure formation in fast transition UDM models | PACE, Francesco |
| 14:20 | A magnified glance into the Dark Sector: Probing cosmological models with strong lensing in A1689 | MAGANA, Juan |
| 14:40 | Cosmology in delta Gravity: A Classical Analysis and Phenomenology | GONZALEZ, Pablo |
| 15:00 | Constraints on hybrid metric-Palatini models from background evolution | SMER BARRETO, Vanessa |
| 15:20 | Brans –Dicke supergravity and the Λ naturalness problem | HEWITT, Mike |

Dark Matter: DM - Rm 207 (10 September 14:00-15:40)

- Conveners: Choi, Kiwoon

| time | title | presenter |
|-------|---|----------------------|
| 14:00 | Inflationary Imprints on Dark Matter | TENKANEN, Tommi |
| 14:20 | Cogeneration and Pre-annihilation of Dark Matter by a New Gauge Interaction | BARR, Stephen |
| 14:40 | Diluting the inflationary axion fluctuation by a stronger QCD in the early Universe | IM, Sang Hui |
| 15:00 | Generating Luminous and Dark Matter During Inflation | BARRIE, Neil |
| 15:20 | Dark matter with low reheating temperature | TURZYNSKI, Krzysztof |

Inflation and phase transitions: Inflation + PT - Rm 111+112 (10 September 14:00-15:40)

- Conveners: Rajantie, Arttu

| time | title | presenter |
|-------|--|------------------------|
| 14:00 | Corpuscular Considerations on Cosmological Observables and Eternal Inflation | KUHNEL, Florian |
| 14:20 | Gauge and fermion preheating and the end of axion inflation | SFAKIANAKIS, Evangelos |
| 14:40 | Massive vector multiplet inflation with DBI type action | YAMADA, Yusuke |
| 15:00 | Thermalization after Inflation | MUKAIDA, Kyohei |
| 15:20 | Acoustically generated gravitational waves at a first order phase transition | WEIR, David |

Coffee (15:40-16:10)

CMB, LSS and cosmological parameters: CMB + LSS - Main Hall (10 September 16:10-18:10)

- Conveners: Demiański, Marek

| time | title | presenter |
|-------|--|-------------------|
| 16:10 | Halo/Galaxy Bispectrum with Equilateral-type Primordial Trispectrum | MIZUNO, Shuntaro |
| 16:30 | Dark energy and non-linear power spectrum | GONG, Jinn-Ouk |
| 16:50 | Cross-correlation between the CMB lensing potential measured by Planck and high-redshift Herschel-ATLAS galaxies | BIELEWICZ, Pawel |
| 17:10 | Non-local bias in the halo bispectrum with primordial non-Gaussianity | TELLARINI, Matteo |
| 17:30 | The bispectrum of relativistic galaxy number counts | MAROZZI, Giovanni |
| 17:50 | Primordial black holes as biased tracers | TADA, Yuichiro |

Dark Energy: DE - Rm 115+116 (10 September 16:10-18:10)

- Conveners: Polarski, David

| time | title | presenter |
|-------|--|---------------------|
| 16:10 | Quasi-Static Solutions for Compact Objects in Chameleon Models | MUSCO, Ilia |
| 16:30 | String Gas Cosmology with Varying Speed of Light | NAYERI, Ali |
| 16:50 | Generalised Mimetic Gravity from Disformal Transformation and its Cosmological Consequences | KARMAKAR, Purnendu |
| 17:10 | Random potentials in Cosmology | BATTEFELD, Thorsten |
| 17:30 | Initial conditions for simulations of arbitrary modified gravity, beyond quasi-static approximations | VALKENBURG, Wessel |

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| 17:50 | Covariantised Vector Galileons | HULL, Mathew |
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Dark Matter: DM - Rm 207 (10 September 16:10-18:10)

- Conveners: Choi, Kiwoon

| time | title | presenter |
|-------|--|----------------------|
| 16:10 | Newtonian linear perturbations from the Schroedinger-Poisson equations | CHRISTOPHERSON, Adam |
| 16:30 | IceCube potential for detecting Q-ball dark matter | KASUYA, Shinta |
| 16:50 | Constraining the dark matter by 21cm signals | KADOTA, Kenji |
| 17:10 | Super-weakly interacting Dark Matter | BOYARSKY, Alexey |
| 17:30 | Constraining the lifetime of Dark Matter | TRAM, Thomas |
| 17:50 | A stable Higgs portal with vector dark matter | DUCH, Mateusz |

Inflation and phase transitions: Inflation + PT - Rm 111+112 (10 September 16:10-18:10)

- Conveners: Rajantie, Arttu

| time | title | presenter |
|-------|--|------------------|
| 16:10 | Inflation and dark energy from alpha-attractors | SCALISI, Marco |
| 16:30 | Consistency relations for features in the primordial spectra | PALMA, Gonzalo |
| 16:50 | Spacetime curvature and the Higgs stability before and after inflation | MARKKANEN, Tommi |
| 17:10 | Generation and evolution of cosmological magnetic fields at the electroweak epoch | RUCHAYSKIY, Oleg |
| 17:30 | Heavy neutrinos in cosmology and particle physics | DREWES, Marco |
| 17:50 | Particle production after inflation with non-minimal derivative couplings to gravity | EMA, Yohei |

Panel discussion - Main Hall (19:30-22:00)

Friday 11 September 2015

Plenary - Main Hall (11 September 09:00-10:10)

- Conveners: Nilles, Hans-Peter

| time | title | presenter |
|-------|---------------------------------------|--------------------|
| 09:00 | Dark Energy at the Crossroads | HUTERER, Dragan |
| 09:35 | Creation of the Inflationary Universe | YOKOYAMA, Jun'ichi |

Coffee - (10:10-10:40)

Plenary - Main Hall (11 September 10:40-12:40)

- Conveners: Freese, Katherine

| time | title | presenter |
|-------|--|--------------------|
| 10:40 | Realisations of de Sitter space and inflation in string compactifications | QUEVEDO, Fernando |
| 11:15 | Searches for new physics at the LHC | SOFFI, Livia |
| 11:50 | From precision spectroscopy to fundamental cosmology: current and future tests of the stability of fundamental couplings | MARTINS, Carlos |
| 12:25 | Outlook | ROSZKOWSKI, Leszek |

Lunch (12:40-14:00)

CMB, LSS and cosmological parameters: CMB + LSS - Main Hall (11 September 14:00-15:40)

- Conveners: Czerny, Bożena

| time | title | presenter |
|-------|--|----------------------|
| 14:00 | A convergent perturbation theory for Newtonian cosmological structure formation | RAMPF, Cornelius |
| 14:20 | Measuring CMB Polarization with POLARBEAR and the Simons Array: Towards New Constraints on Neutrino Masses and Inflation | REICHARDT, Christian |
| 14:40 | The structure of the real line and cosmology | KLIMASARA, Pawel |
| 15:00 | Post-Newtonian Cosmological Modelling | SANGHAI, Viraj |
| 15:20 | The decay of primordial magnetic fields and CMB spectral distortions | WAGSTAFF, Jacques |

Inflation and phase transitions: PT - Rm 115+116 (11 September 14:00-15:40)

- Conveners: Dąbrowski, Mariusz

| time | title | presenter |
|-------|--|--------------------------|
| 14:00 | Scale Invariant Top Condensate Model | LIANG, Shelley |
| 14:20 | Primordial magnetic fields from cosmic defects | HORIGUCHI, Kouichirou |
| 14:40 | QCD corrections to Leptogenesis | MENDIZABAL, Sebastian |
| 15:00 | Cosmology With Negative Absolute Temperatures | VIEIRA, Jose Pedro Pinto |
| 15:20 | Helical Magnetic Fields from Creation to Detection | LONG, Andrew |

Inflation and phase transitions: Inflation - Rm 111+112 (11 September 14:00-15:40)**- Conveners: Demiański, Marek**

| time | title | presenter |
|-------|--|-------------------------|
| 14:00 | Gravitational effects on inflaton decay | JINNO, Ryusuke |
| 14:20 | Production of magnetic fields in axion inflation and their post-inflationary evolution | NAMBA, Ryo |
| 14:40 | Generation of sparse and localized curvature perturbation from inflation | SUYAMA, Teruaki |
| 15:00 | Warm quartic inflation in light of Planck 2015 results | PANOTOPOULOS, Grigorios |
| 15:20 | Influence of interactions terms on non-perturbative particle production and preheating | ENOMOTO, Seishi |