Scientific program structure of the 30th ICRC

SH 1: Sun and Corona
SH.1.1 Solar neutrinos
SH.1.2 Energetic photons and electrons
SH.1.3 Solar neutrons
SH.1.4 Energetic charged particles: spectra, composition, charge state
SH.1.5 Particle acceleration on/near the Sun
SH.1.6 Interplanetary transport of solar energetic particles
SH.1.7 Coronal mass ejections
SH.1.8 Ground level events

SH 2: Transient Phenomena in the Heliosphere
SH.2.1 Forbush decreases/Effects of coronal mass ejections
SH.2.2 Corotating regions/shocks
SH.2.3 Propagating interaction regions/shocks
SH.2.4 Merged interaction regions

SH 3: Galactic Cosmic Rays in the Heliosphere
SH.3.1 Acceleration and modulation models
SH.3.2 Long-term variations (11 year and longer cycles)
SH.3.3 Gradients
SH.3.4 Anisotropies
SH.3.5 Spectra, composition and charge-state
SH.3.6 Terrestrial effects: cutoffs, cosmic rays in atmosphere, cosmogenic nucleides

SH 4: Anomalous component in the heliosphere
SH.4.1 Theory and models, origin and acceleration
SH.4.2 Gradients and time variations
SH.4.3 Spectra, composition and charge state
SH.4.4 Implications for structure of the heliosphere

SH 5: Cosmic Rays at the Termination Shock and in the Heliosheath
SH.5.1 Cosmic ray measurements
SH.5.2 Other measurements
SH.5.3 Cosmic ray theory and modeling
SH.5.4 Other theory and modeling

OG: Cosmic Ray Origin and Galactic Phenomena

OG 1: Cosmic Ray Origin
OG.1.1 Direct measurements on primary cosmic rays
OG.1.2 Cosmic ray sources and composition
OG.1.3 Cosmic ray propagation
OG.1.4 Cosmic ray acceleration
OG.1.5 New experiments and instrumentation

OG 2: X-ray, Gamma-ray and Neutrino Astronomy and Astrophysics
OG.2.1 Diffuse X-ray and gamma-ray emission
OG.2.2 Galactic sources (Binaries, pulsars, SN remnants, etc.)
OG.2.3 Extra-galactic sources (AGNs, Quasars, Gal.clusters, etc.)
OG.2.4 Gamma-ray bursts
OG.2.5 High energy neutrino astrophysics
OG.2.6 Gravitational wave sources and experiments
OG.2.7 New experiments and instrumentation

HE  High Energy Phenomena:

HE 1: Extensive Air Showers and UHE Cosmic Rays
HE.1.1.A EAS observations at the knee ~10^{14.5}-10^{16} eV
HE.1.1.B Theory and simulations: the origin of the knee ~10^{14.5}-10^{16} eV
HE.1.2.A EAS observations at E< 10^{17} eV
HE.1.2.B Theory and simulations: at E< 10^{17} eV
HE.1.3.A EAS observations at 10^{17} < E < 10^{19} eV
HE.1.3.B Theory and simulations: the origin of the 2nd knee and the ankle
HE.1.4.A UHECR: EAS observations at E > 10^{19} eV
HE.1.4.B UHECR: Theory and simulations E > 10^{19} eV
HE.1.5 New experiments and instrumentation
HE.1.6 EAS simulations

HE 2: Muons and Neutrinos
HE.2.1 Muon experiments
HE.2.2 Observations of solar and atmospheric neutrinos
HE.2.3 Observations of astrophysical neutrinos
HE.2.4 Theory and simulations
HE.2.5 New experiments and instrumentation

HE 3: Interactions, Particle Physics Aspects, Astroparticle Physics and Cosmology
HE.3.1 Hadronic interactions (accelerator and cosmic ray experiments)
HE.3.3 Dark matter, astroparticle physics and cosmology
HE.3.4 Searches for new particles and phenomena: theory and observations
HE.3.5 New experiments and instrumentation