The 4th workshop "Complex Geometry and Lie Groups"
March 22-26, 2016, Nara-Osaka

Room G201, G-Hall, Nara Woman's University

PROGRAM

Tuesday, 22

09:00-10:00 REGISTRATION ;   10:00-10:15   Opening Address

10:15-11:15   Claude LeBrun (1): *Mass in Kähler Geometry.*

11:30-12:30   Massimiliano Pontecorvo: *Bi-Hermitian metrics on Kato surfaces.*

12:30-14:00   Lunch Break

14:00-15:00   Sönke Rollenske: *Dolbeault cohomology of nilmanifolds with left-invariant complex structure.*

15:15-16:15   Gueo Grantcharov: *Algebraic dimension of complex nilmanifolds.*

16:15-16:45   Coffee Break

16:45-17:30   Casey Kelleher: *Singularity Formation of the Yang-Mills Flow.*

17:45-18:30   Shinichiroh Matsuo: *The twisted Seiberg-Witten equations and the Yamabe invariant.*

Wednessday, 23

09:00-10:00   Jeff Streets: *Generalized Kähler-Ricci flow and nondegenerate generalized Kähler surfaces.*

10:15-11:15   Marco Gualtieri: *Holomorphic Poisson geometry and generalized Kähler structures.*

11:30-12:30   Ryoichi Kobayashi: *Free Fuchsian groups in classical minimal surface theory.*

12:30-14:00   Lunch Break

14:00-15:00   Claude LeBrun (2): *The Einstein-Maxwell Equations and Conformally Kähler Geometry.*

15:15-16:15   Toshiki Mabuchi: *The Donaldson-Tian-Yau Conjecture for general polarizations.*

16:15-16:45   Coffee Break

16:45-17:30   Hassan Jolany: *Logarithmic Weil-Petersson metric on moduli space of log Calabi-Yau varieties.*

17:45-18:30   Daisuke Tarama: *Some double fibrations arising from quadric line complexes.*

Thursday, 24

09:00-09:45   Kenta Hayano: *Topology of holomorphic Lefschetz pencils on the four-torus.*

10:00-10:45   Leonardo Biliotti: *Stability of measures on Kähler manifolds.*

11:00-11:45   Xin Dong: *Boundary asymptotics of the relative Bergman kernel metric for hyperelliptic curves and Jacobians.*

12:00-12:45   Shinnosuke Okawa: *Compact moduli of marked noncommutative del Pezzo surfaces.*

   12:45-14:00   Lunch Break

Excursion in the afternoon and Party in the evening

Friday, 25

09:00-10:00   Katrin Leschke: *Quaternionic Holomorphic Geometry.*

10:15-11:15   Yusuke Sakane: *Einstein metrics on compact homogeneous spaces.*

11:30-12:30   Takao Akahori: *Partially integrable almost CR structures.*

   12:30-14:00   Lunch Break

14:00-15:00   Luigi Vezzoni: *The Calabi-Yau problem in torus bundles and generalized Monge-Ampère equations.*

15:15-16:15   Hisashi Kasuya: *Extensions of Nomizu's Theorem.*

   16:15-16:45   Coffee Break

16:45-17:30   Daniele Angella: *Special Hermitian metrics up to conformal changes on non-Kähler manifolds.*

17:45-18:30   Katsuhito Moriya: *Twistor lifts and factorization for conformal maps of a surface.*

Saturday, 26

09:00-10:00   Roger Bielawski: *Coadjoint orbits, slices, and hyperkähler metrics.*

10:15-11:00   Masanori Adachi: *Curvature restrictions for Levi-flat real hypersurfaces in complex projective planes.*

11:15-12:00   Alessandro Ottazzi: *Sard Theorem for the endpoint map in sub-Riemannian manifolds.*

   12:00-12:15   Closing Address

Excursion: On Thursday 24, we meet in front of the university main gate at 1:45 PM for excursion. We will have English guides. We visit Todai-ji, Kasuga-taisha, Kofuku-ji, Himuro-jinja, Nara-prefectural Office; and after the excursion (around 5:30 PM) we go directly to Hotel Fujita for party. The cost is ¥2,000 including all entrance fees to the temples and shrines.

Social Dining: In the evening of Thursday 24, we will have a social dining at Hotel Fujita, Room "Fuji-no-ma". It starts at 6:30 PM, and the cost is ¥6,000 to be paid at the hotel.

Workshop Organizers: Anna Fino, Ryushi Goto, Keizo Hasegawa, Jun-ichi Matsuzawa &
Department of Mathemaics, Nara Woman's University