

BEREZIN QUANTIZATION ON HARTOGS DOMAINS OVER BOUNDED SYMMETRIC DOMAINS

GUICONG SU

Summary. This talk considers Berezin Quantization on Hartogs domains over Bounded Symmetric Domains. We mainly focus on the generalized Cartan-Hartogs domain

$$\left(\prod_{j=1}^k \Omega_j \right)^{\mathbb{B}^{d_0}} (\mu),$$

and we give a Kahler metric $g(\mu; \nu)$ associated with the Kahler potential

$$-\sum_{j=1}^k \nu_j \ln N_{\Omega_j}(z_j, \bar{z}_j)^{\mu_j} - \ln \left(\prod_{j=1}^k N_{\Omega_j}(z_j, \bar{z}_j)^{\mu_j} - \|w\|^2 \right)$$

on this domain. Then we can compute the explicit expression of the Rawnsley's ε -function $\varepsilon_{(\alpha, g(\mu; \nu))}$ of the domain. So we will be able to study the Berezin quantization on this domain with this special Kahler metric.