

BOUNDEDNESS OF POLARIZED FOLIATED SURFACES**Speaker: Minzhe Zhu****Korea Institute for Advanced Study (KIAS)****Time: Fri., Sep. 4th, 9:30-11:00****Venue: Room 102, SCMS**

Abstract: We establish the minimal model program for klt adjoint foliated surfaces and use it to study the boundedness of polarized adjoint foliated surfaces. We prove that ϵ -lc adjoint foliated surfaces with nef adjoint canonical divisor and a nef and big integral polarization form a bounded family, provided that the volume of their sum is bounded from above. As applications, we establish boundedness and effective birationality for adjoint foliated surfaces of general type, as well as a uniform positive lower bound for their volumes. Finally, for ϵ -lc Calabi--Yau adjoint foliated surfaces, we prove that the volumes of the canonical divisors of rank one foliations on the underlying surfaces belong to a fixed discrete set. This is joint work with Yen-An Chen.