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RESEARCH INTERESTS	differential geometry, complex algebraic geometry, geometric analysis	
EDUCATION	<a href="#">UCLA</a> , PhD., 2012	
ACADEMIC APPOINTMENTS	<b>Professor</b> <a href="#">Yau Mathematical Sciences Center</a> , Tsinghua University, Beijing, China	2019 to now
	<b>Professor</b> <a href="#">Academy of Mathematics and Systems Science</a> , Chinese Academy of Sciences, Beijing, China	2016 to 2019
	<b>Associate Professor</b> <a href="#">Academy of Mathematics and Systems Science</a> , Chinese Academy of Sciences, Beijing, China	2015 to 2016
	<b>Boas Assistant Professor</b> <a href="#">Northwestern University</a> , Evanston, IL, USA	2012 to 2015
GRANTS	Recruit Program for Global Young Experts (青年千人计划), Principal Investigator, 2015–2017.	
HONOUR	“中国科学院特聘研究员” (特聘骨干人才) “2018华人数学家联盟最佳论文奖(ICCM Best Paper Award)” “第八届华人数学家大会特邀报告 (Plenary Speaker) ”	
PREPRINTS	<p>40. _____, Compact Kähler manifolds with quasi-positive second Chern-Ricci curvature. <a href="#">arXiv:2006.13884</a></p> <p>39. Xiaokui Yang (Joint with Jie Liu, Wenhao Ou), Projective manifolds whose tangent bundle contains a strictly nef subsheaf. <a href="#">arXiv:2004.08507</a>.</p>	

38. Xiaokui Yang (Joint with Jun Wang), Curvatures of real connections on Hermitian manifolds.  
[arXiv:1912.12024](#).
37. \_\_\_\_\_, RC-positivity and the generalized energy density I: rigidity.  
[arXiv:1810.03276](#)
36. Xiaokui Yang (Joint with Jun Wang), RC-positivity and scalar-flat metrics on ruled surfaces.  
[arXiv:1809.01105](#)
35. Xiaokui Yang (joint with Chunle Huang, Kefeng Liu, Xueyuan Wan), Logarithmic vanishing theorems on compact Kähler manifolds I.  
[arXiv:1611.07671](#).

#### PUBLICATIONS

34. Xiaokui Yang (joint with Bing-Long Chen), On Euler characteristic and fundamental groups of compact manifolds.  
[arXiv:1711.03309](#)  
To appear in **Math. Ann.**
33. \_\_\_\_\_, RC-positivity, vanishing theorems and rigidity of holomorphic maps.  
**J. Inst. Math. Jussieu** **20** (2021), no. 3, 1023–1038.
32. Xiaokui Yang (Joint with Jie Liu, Wenhao Ou), Strictly nef bundles and characterization of projective manifolds.  
**Complex Manifolds** **8** (2021), no. 1, 148–159.
31. \_\_\_\_\_, RC-positive metrics on rationally connected manifolds.  
**Forum Math. Sigma** **8**(2020), e53
30. Xiaokui Yang (Joint with Jie He, Kefeng Liu), Levi-Civita Ricci flat metrics on compact complex manifolds.  
**J. Geom. Anal.** **30** (2020), 646–666.
29. \_\_\_\_\_, Scalar curvature, Kodaira dimension and  $\hat{A}$ -genus.  
**Math. Z.** **295** (2020), 365–380.
28. Xiaokui Yang (Joint with Jun Wang), RC-positivity and rigidity of harmonic maps into Riemannian manifolds.  
**Science China Math.** **63** (2020), no. 2, 371–380
27. \_\_\_\_\_, A partial converse to the Andreotti-Grauert theorem.  
**Compositio. Math.** **155** (2019), no. 1, 89–99.
26. Xiaokui Yang (joint with Xiaoyu Su), Global generation and very ampleness for adjoint linear series.  
**Comm. Anal. Geom.** **27** (2019), no.7, 1639–1663.
25. \_\_\_\_\_, Scalar curvature on compact complex manifolds.  
**Trans. Amer. Math. Soc.** **371** (2019), no. 3, 2073–2087.

24. Xiaokui Yang (joint with Kefeng Liu, Xueyuan Wan), Logarithmic vanishing theorems for effective  $q$ -ample divisors.  
**Science China Math.** **62** (2019), no. 11, 2331–2334.
23. Xiaokui Yang (joint with Duo Li, Wenhao Ou), On projective varieties with strictly nef tangent bundles.  
**J. Math. Pures Appl.** (9) **128** (2019), 140–151.
22. Xiaokui Yang (joint with Fangyang Zheng), On real bisectional curvature for Hermitian manifolds.  
**Trans. Amer. Math. Soc.** **371**(2019), no. 4, 2703–2718.
21. \_\_\_\_\_, RC-positivity, rational connectedness and Yau’s conjecture.  
**Camb. J. Math.** **6** (2018), 183–212.
20. Xiaokui Yang (joint with Bing-Long Chen), Compact Kähler manifolds homotopic to negatively curved Riemannian manifolds.  
**Math. Ann.** **370** (2018), 1477–1489.
19. Xiaokui Yang (Joint with Valentino Tosatti and Ben Weinkove), The Kähler-Ricci flow, Ricci-flat metrics and collapsing limits.  
**Amer. J. Math.** **140** (2018), no. 3, 653–698.
18. Xiaokui Yang (Joint with Kefeng Liu), Minimal complex surface with Levi-Civita Ricci flat metrics.  
**Acta Math. Sinica.** **34**(2018), 1195–1207. *In Memory of Professor Lu Qi-Keng.*
17. \_\_\_\_\_, Big vector bundles and compact complex manifolds with semi-positive tangent bundles.  
**Math. Ann.** 267 (2017), no.1, 251–282.
16. Xiaokui Yang (Joint with Kefeng Liu, Xiaofeng Sun and Shing-Tung Yau), Curvatures of moduli space of curves and applications.  
**Asian J. Math.** **21** (2017), no.5, 241–254.
15. Xiaokui Yang(Joint with V. Tosatti), An extension of a theorem of Wu-Yau.  
**J. Differential Geom.** **107** (2017), no.3, 573–579.
14. Xiaokui Yang (Joint with Kefeng Liu), Ricci curvatures on Hermitian manifolds.  
**Trans. Amer. Math. Soc.** 369 (2017), 5157–5196.
13. \_\_\_\_\_, The Chern-Ricci flow and holomorphic bisectional curvature.  
**Sci. China Math.** 59 (2016), no.11, 2199–2204.
12. \_\_\_\_\_, Hermitian manifolds with semi-positive holomorphic sectional curvature.  
**Math. Res. Lett.** 23 (2016), no.3, 939–952.
11. Xiaokui Yang (Joint with Kefeng Liu), Effective vanishing theorems for ample and globally generated vector bundles.  
**Comm. Anal. Geom.** 23 (2015), no.4, 797–818.
10. Xiaokui Yang (Joint with Valentino Tosatti, Yu Wang and Ben Weinkove),  $C^{2,\alpha}$  estimates for nonlinear elliptic equations in complex and almost complex geometry.  
**Calc. Var. Partial Differential Equations.** 54 (2015), no.1, 431–453.
9. Xiaokui Yang (Joint with Valentino Tosatti and Ben Weinkove), Collapsing of the Chern-Ricci flow on elliptic surfaces.  
**Math. Ann.** 362 (2015), no.3, 1223–1271.

8. Xiaokui Yang (Joint with Kefeng Liu and Sheng Rao), Quasi-isometry and deformations of Calabi-Yau manifolds.  
**Invent. Math.** **199** (2015), no. 2, 423–453.
7. Xiaokui Yang (Joint with Kefeng Liu), Hermitian harmonic maps and non-degenerate curvatures.  
**Math. Res. Lett.** **21** (2014), no. 4, 831–862.
6. Xiaokui Yang (Joint with Kefeng Liu), Curvatures of direct image sheaves of vector bundles and applications I.  
**J. Differential Geom.** **98** (2014), 117–145.
5. Xiaokui Yang (Joint with Kefeng Liu and Xiaofeng Sun), Positivity and vanishing theorems for ample vector bundles.  
**J. Algebraic Geom.** **22** (2013), 303–331.
4. Xiaokui Yang (Joint with Kefeng Liu), Geometry of Hermitian manifolds.  
**Internat. J. Math.** **23**, (2012). 1250055
3. Xiaokui Yang (Joint with Min Dai), Mappings of bounded distortion between complex manifolds.  
**Pure Appl. Math. Q.** **8** (2012), no. 4 835–850.
2. Xiaokui Yang (Joint with Min Dai), Bochner formulas on Hermitian manifolds and applications.  
**Appl. Math. J. Chinese Univ. Ser. A** **24** (2009), no. 4, 462–472.
1. Xiaokui Yang (Joint with Kefeng Liu), Harmonic maps between compact Hermitian manifolds.  
**Science in China Ser. A.** **51** (2008), no. 12, 2149–2160.