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EDUCATION:

- Ph.D.** Geophysics (Geosciences)
King Abdullah University of Science and Technology (KAUST), Saudi Arabia, 2015
- M.Sc.** Photogrammetry and Remote Sensing
Central South University (CSU), China, 2011
- B.Sc.** Surveying Engineering
Central South University (CSU), China, 2008

PROFESSIONAL EXPERIENCE:

- 2019.7 – now **Professor**, CSU, China
- 2016.8 – 2019.7 **Assistant Professor**, PolyU, Hong Kong
- 2016.2 – 2016.8 **Postdoctoral Researcher**, UC Berkeley, USA
- 2014.6 **Visiting Scientist**, GFZ Potsdam, Germany

PUBLICATIONS:

Peer-Reviewed Journal Articles

1. Xu, W.*, L. Xie, Y. Aoki, E. Rivalta, & S. Jónsson, (2020). Volcano-wide deformation after the 2017 Ertale dike intrusion, Ethiopia, observed with radar interferometry. *J. Geophys. Res.: Solid Earth*, 125, e2020JB019562.
2. Zheng, A., X. Chen, & W. Xu*, (2020). Present-day deformation mechanism of the northeastern Mina deflection revealed by the 2020 Mw 6.5 Monte Cristo Range earthquake. *Geophys. Res. Lett.*, 47, e2020GL090142.
3. Li, X., W. Xu*, S. Jónsson, Y. Klinger, and G. Zhang (2020). Source Model of the 2014 Mw 6.9 Yutian Earthquake at the Southwestern End of the Altyn Tagh Fault in Tibet Estimated from Satellite Images, *Seismol. Res. Lett.* 91, 3161–3170, doi: 10.1785/0220190361.
4. Ali E., W. Xu*, X. Ding, (2020). Improved optical image matching time series inversion approach for monitoring dune migration in North Sinai Sand Sea: Algorithm procedure, application, and validation. *ISPRS J. Photogramm. & Remote Sens.*, 164, 106-124.
5. Zheng A., W. Zhang*, W. Xu, (2020). A hybrid source mechanism of the 2017 Mw 6.5 Jiuzhaigou earthquake revealed by the joint inversion of strong-motion, teleseismic and InSAR data. *Tectonophysics*, 789, 228538.

6. Li Q., B. Zhao, K. Tan*, W. Xu, (2020). Two main rupture stages during the 2018 magnitude 7.5 Sulawesi earthquake. *Geophys. J. Int.*, 221, 1873–1882.
7. Zhao, R., X. Liu & W. Xu*, (2020). Integration of coseismic deformation into WebGIS for near real-time disaster evaluation and emergency response. *Environ Earth Sci.*, 79, 414.
8. Yu J., B. Zhao*, W. Xu, D. Wang, K. Tan, (2020). Oblique fault movement during the 2016 Mw 5.9 Zado earthquake: insights into regional tectonics of the Qiangtang block, Tibetan Plateau. *J. Seismol.*, 221, 1873–1882.
9. Duan M., B. Xu*, Z. Li*, Y. Cao, J. Hu, W. Xu, J. Wei, (2020). Non-differential water vapor estimation from SBAS-InSAR. *J. Atmos. Sol Terr. Phys.*, 204, 105284.
10. Liu X., W. Xu*, (2019), Logarithmic Model Joint Inversion Method for Coseismic and Postseismic Slip: Application to the 2017 Mw 7.3 Sarpol Zahāb Earthquake, Iran. *J. Geophys. Res.: Solid Earth*, 124, 12034-12052.
11. Liu, J., J. Hu, W. Xu, Z. Li, J. Zhu, X. Ding, and L. Zhang, (2019), Complete three-dimensional coseismic deformation field of the 2016 Central Tottori earthquake by integrating left and right-looking InSAR observations with the improved SM-VCE method. *J. Geophys. Res.: Solid Earth*, 124, 12099-12115.
12. Wang S., W. Xu*, C. Xu, Z. Yin, R. Bürgmann, L. Liu and G. Jiang, (2019), Changes in groundwater level possibly encourage shallow earthquakes in central Australia: The 2016 Petermann Ranges earthquake. *Geophys. Res. Lett.*, 46, 3189-3198.
13. Wang S., C. Xu*, W. Xu*, Z. Yin, Y. Wen, J. Guo, (2019), The 2017 Mw 6.6 Poso Earthquake: Implications for Extrusion Tectonics in Central Sulawesi, *Seismol. Res. Lett.*, 90, 649-658.
14. Ulrich, T., A.A. Gabriel*, J.P. Ampuero and W. Xu, (2019), Dynamic viability of the 2016 Mw 7.8 Kaikōura earthquake cascade on weak crustal faults. *Nat. Commu.*, 10:1213.
15. Wang, L. *, X. Zhao, W. Xu, L. Xie, N. Fan, (2019), Co-seismic slip distribution inversion with unequal weighted Laplacian smoothness constraints, *Geophys. J. Int.*, 218, 145-162.
16. Xu W.*, S. Wu, K. Materna, R. Nadeau, M. Floyd, G. Funning, E. Chaussard, C.W. Johnson, J. Murray, X. Ding and R. Bürgmann, (2018), Interseismic ground deformation and fault slip rates in the greater San Francisco bay area from two decades of space geodetic data, *J. Geophys. Res.: Solid Earth*, 123, 8095-8109.
17. Xu W.*, G. Feng, L. Meng, A. Zhang, J. P. Ampuero, R. Bürgmann and L. Fang, (2018), Transpressional rupture cascade of the 2016 Mw 7.8 Kaikoura earthquake, New Zealand, *J. Geophys. Res.: Solid Earth*, 123, 2396-2409.
18. Chen K., W. Xu*, P. M. Mai, H. Gao, L. Zhang, X. Ding, (2018), The 2017 Mw 7.3 Sarpol Zahāb earthquake, Iran: a compact blind shallow-dipping thrust event in the mountain front fault basement, *Tectonophysics*, 747-748, 108-114.
19. Wang L. *, H. Gao, G. Feng, W. Xu, (2018), Source parameters and triggering links of the earthquake sequence in central Italy from 2009 to 2016 analyzed with GPS and InSAR data, *Tectonophysics*, 744, 285-295.
20. Xu W.*, E. Rivalta and X. Li, (2017), Magmatic architecture within a rift segment: Articulate axial magma storage at Erta Ale volcano, Ethiopia, *Earth Planetary Sci. Lett.*, 476, 79-86.
21. Xu W.* (2017), Finite-fault slip model of the 2016 Mw 7.5 Chiloé earthquake, southern Chile, estimated from Sentinel-1 data, *Geophys. Res. Lett.*, 44, 4774-4780.
22. Huang H. *, W. Xu, L. Meng, R. Bürgmann, and J. C. Baezd (2017), Early aftershocks and afterslip surrounding the 2015 Mw 8.4 Illapel rupture, *Earth Planetary Sci. Lett.*, 457, 282-291.
23. Xu W.*, S. Jónsson, J. Ruch, and Y. Aoki (2016), The 2015 Wolf volcano (Galápagos) eruption studied using Sentinel-1 and ALOS-2 data, *Geophys. Res. Lett.*, 43, 9573-9580.

24. Xu W.*, S. Jónsson, F. Corbi and E. Rivalta (2016), Graben formation and dike arrest during the 2009 Harrat Lunayyir dike intrusion: insights from InSAR, stress calculations and analog experiments, *J. Geophys. Res.: Solid Earth*, 121, 2837-2851.
25. Xu W.*, R. Bürgmann and Z. Li (2016), An improved source model for the 1999 Mw 6.3 Chamoli earthquake, India, *Geophys. J. Int.*, 205, 236-242.
26. Ruch J.*, T. Wang, W. Xu and S. Jónsson (2016), Oblique rift opening revealed by episodic magma injection in central Iceland, *Nat. Commu.*, 7, 12352.
27. Xu W., J. Ruch and S. Jónsson* (2015), Birth of two volcanic islands in the southern Red Sea, *Nat. Commu.*, 6, 7104.
28. Xu W.*, R. Dutta and S. Jónsson (2015), Identifying active faults by improving earthquake locations with InSAR data and bayesian estimation: the 2004 Tabuk (Saudi Arabia) earthquake sequence, *Bull. Seismol. Soc. Am.*, 105, 1-12.
29. Xu W.* and S. Jónsson (2014), The 2007–8 volcanic eruption on Jebel at Tair island (Red Sea), observed by satellite radar and optical images, *Bull. Vol.*, 76, 1-14.
30. Xu W., Z. Li*, X. Ding, C. Wang and G. Feng (2012), Application of small baseline subsets D-InSAR technology to estimate the time series land deformation and aquifer storage coefficients of Los Angeles area, *Chin. J. Geophys.*, 55, 452-461.
31. Li Z.*, W. Xu, G. Feng, J. Hu, C. Wang, X. Ding and J. Zhu (2012), Correcting atmospheric effects on InSAR with MERIS water vapor data and elevation-dependent interpolation model, *Geophys. J. Int.*, 189, 898-910.
32. Xu W., Z. Li*, X. Ding and J. Zhu (2011), Interpolating atmospheric water vapor delay by incorporating terrain elevation information, *J. Geod.*, 85, 555-564.
33. Xu W., Z. Li*, X. Ding, G. Feng, J. Hu, J. Long, H. Yin and Y. Yang (2010), Correcting atmospheric effects in ASAR interferogram with MERIS integrated water vapor data, *Chin. J. Geophys.*, 53, 1073-1084.

Book Chapter:

1. Jónsson S.* and W. Xu (2015), Volcanic eruptions in the southern Red Sea during 2007-2013, in N.M.A. Rasul and I.C.F. Stewart (eds.), *The Red Sea, Springer Earth System Sciences*, 175-186, doi:10.1007/978-3-662-45201-1_10, 4.

TEACHING

- 2019 Engineering surveying, Service learning in rural areas, Location based services
- 2018 Spatial data acquisitions, Service learning in rural areas
- 2017 Living on the dynamic earth, Service learning in rural areas
- 2016 Satellite positioning and surveying, Spatial data acquisitions

AWARDS

- 2017 Outstanding Alumni of CSU
- 2014 IPGP Foreign Student Award of the IPGP Doctoral Students Congress
- 2013 Outstanding Scientific Research Achievement Prize for Higher Learning Institutions of Ministry of Education, China, First Prize of Natural Sciences – **National award**

PROFESSIONAL MEMBERSHIPS

- American Geophysical Union Member
- European Geosciences Union Member

PROFESSIONAL SERVICE

- Reviewer for GRL, JGR, IEEE Geosci. Remote Sens. Lett., Sci. Rep., BSSA, Tectonophysics, Canadian J. Remote Sens., Remote Sens., J. Asian Earth Sci.
- Grant reviewer for NSFC, NASA Earth and Space Science Fellowship (NESSF)