CURRICULUMN VITAE (CV)

Name **Dr. Basanta Raj Adhikari**

Institute Department of Civil engineering, Pulchowk Campus, Institute of Engineering, Tribhuvan University, Nepal

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Profile: Dr. Basanta Raj Adhikari has done his PhD in Earth Science from the University of Vienna, Austria. His research interests are climate change, hill-slope movement and human interaction, Himalayan sediment flux generation, Multi-hazard risk assessment community-based disaster risk reduction for different kinds of natural hazards e.g. landslide, flood, earthquake. He has published more than dozen research papers in both national and international journals and received various recognitions for his work in the field of earth science.

Education:

- PhD in geology, University of Vienna, Vienna, Austria, Department of Geodynamics and sedimentology, 2009
- MSc in Geology, Central Department of Geology, Tribhuvan University, Nepal. 2001-2003

Academic experiences:

- **(From June 2023 to date) Director,** Centre for Disaster Studies, Institute of Engineering, Tribhuvan University, Responsible for Training, research, and development in different kinds of disaster in Nepal and aboard.
- **(From June 2015 to June 2018, From January 2021 to May 2021) Deputy Director,** Centre for Disaster Studies, Institute of Engineering, Tribhuvan University, Responsible for Training, research and development in different kinds of disaster in Nepal and aboard.
- **(From November 2011 to date) Assistant Professor of Engineering Geology,** Department of Civil Engineering, Central Campus, Pulchowk Institute of Engineering, Tribhuvan University, Responsible for teaching engineering geology, landslide, supervise students in field as well as in lab to conduct research. Course coordinator of landslide for M.Sc. in Disaster Risk Management. Course coordinator of engineering geology for M.Sc. in Geo-technical Engineering.

Training:

- "Transport Resilience: Geo-Spatial Sciences for Hazard Modelling and Asset Management" organized by the World Bank, May 5-6, 2025
- "Multinational Planning Augmentation Team Tempest Express (MPAT TE-40)" organized by Nepali Army with United States Indo-Pacific Command (US INDOPACOM), March 17-27, 2025, Kathmandu Nepal.
- "International Training Programme in Disaster Risk Management" organized by The Swedish Civil Contingencies Agency, August 2023 to October 2024.
- "Science Diplomacy online course" organized by S4D4C, 1 September, 2020.
- Training on "Training of Instructors on Ecosystem-based Disaster Risk Reduction" UN Environment, UGM, Indonesia, 18-22 March, 2019.
- A week training on "Major Natural Disaster Alleviation of the Belt and Road" Chengdu, Sichuan, China, Institute of Mountain Hazards and Environment CAS, 2-8 September 2017.
- Training on "Geotechnical Earthquake Engineering with Emphasis on Ground Failure Risk and Mitigation" NSET, CalTech, USGS and ESS, Nov 29-Dec 2, 2016.
- Two weeks training on "Summer Institute for Disaster and Risk Research", Beijing Normal University, China, 25July-5 Aug. 2016.
- Worked as a resource person on "Piloting Early Warning System (EWS) for Landslides in Far West of Nepal" Mercy Corps, Nepal, August 13-17, 2014.
- Worked as a resource person on "Climate Change science: Mitigation and Adaptation" International Sustainability School, Handson, Nepal, June 15-26, 2014.
- Training on "Training for Policy Makers on Climate Change Impact Adaptation", Institute of

Engineering and Center for Natural Resources and Development, 30th Oct-1st Nov, 2013

- Training on "Geotechnics Training/Seminar", Institute of engineering, Tribhuvan University and Local Road Bridge Program (LRBP), Government of Nepal, Sept.24-Oct.4, 2013.
- Training on "Geographic Information System (GIS)" Department of Road and Institute of engineering, Tribhuvan University, 5-9 June, 2013.
- Short course on "Soil and Rock Mechanics in Engineering", Faculty of Geo-Information Science and Earth Observation University of Twente, Enschede, The Netherlands, January-March, 2013.
- Training on "Risk Management during Design and Construction", Nepal Tunneling Association/ ITACET foundation, 11-12 December, 2012.
- Post-graduate Course on "Natural Hazards and Disaster Risk Management in Mountains" University of Torino, Faculty of Agriculture, Torino, Italy, July 2011.
- "Alternative Technologies and Renewable Resources For a sustainable Development", 25-28 February, 2009, Leibnitz, Austria.
- "Community-based disaster risk Management" online course/training by Asian Disaster Preparedness Center (ADPC), 2008.

Research Projects:

Project	**Role**	**Responsibility**	**Collaborative Partners**	**Year**
Developing a multi hazard risk assessment model and supporting the design of a multi hazard early warning system approach in Nepal/Koshi Province	Co-PI	Develop the multi hazard risk assessment methodology for the establishment of multi-hazard early warning system. Conduct landslide risk assessment and community interaction. Ensure the quality of the assignment, track the progress, and accomplish on time.	Swiss Agency for Development and Cooperation (SDC), Tribhuvan University	2025-2028
Multi-hazard vulnerability and risk assessment in lower Dudhkoshi watershed, Nepal	Landslide risk assessment expert	Geological and landslide hazard mapping of the project area. Field visit and data collection of the Dudhkoshi watershed. Contributed for the preparation of Multi-hazard map preparation. Ensure the quality of the assignment, track the progress and accomplish on time.	United Nations Development Programme, Nepal, Department of forest and Soil conservation, Tribhuvan University	2021
Impact assessment of Kulekhani 1,2 and 3 HEP on water resource management, watershed management associated with socioeconomic and	Geologist	Geological and landslide hazard mapping of the project area. Prepared the geological map from the field as well as satellite imagery. Contributed for the report preparation.	Water Resources Research and Development Center, Government of Nepal,	2021

livelihood			Tribhuvan University	
Illuminating the speed of sand-quantifying sediment transport using optically stimulated luminescence	Co-Investigator	Carry out the field investigation to understand the sedimentary depositional environment of Pokhara valley and preparation of OSL sample	University of Potsdam, Germany; Wageninge n university, The Netherlands , Tribhuvan University	2019-2020
Filling in the Central Himalayan Seismic Gap: A Structural, Neotectonic, and Paleoseismic Investigation of the Western Nepal Fault System	Co-Investigator	Study fault systems in the western Nepal Himalaya and understand the important with paleo-seismic analysis	National Science Foundation, USA; University of Houston and Tribhuvan University	2019-2021
Multi-hazard Urban Risk Transition Hub	Co-Investigator	Study the natural disaster and its impacts in the urban areas in Nepal	Edinburgh University, Tribhuvan University, Practical Action, NSET	2019-2024
Preparation of Urban Sustainability Index in Nepal	Environment Risk Analyst	Preparation of environmental indicators for Urban Sustainability index. Presentation of data using GIS	National Planning Commissio n, Nepal	2017-2018
Nepal Urban Resilience Project	Environment Risk Analyst	Environmental indicators identification for risk analysis in selected municipalities. Identification of Solid, electronic and industrial waste, hazardous waste, landslide, flood etc.	DFID, ADRA Nepal, NDRC, Tribhuvan University	2017-2018
Perturbation of Earth Surface Systems by Earthquakes	Co-Investigator	Investigation of the interaction between earthquake and hill slope movement in the Nepal Himalaya	Helmholtz Centre Potsdam, GFZ Germany, Tribhuvan University	2015-2018

Dynamic Flood Topographies in the Terai, Nepal; community perception and resilience	Co-Investigator	generation of high resolution of DEM in the Karnali River and long-term dynamic flood modeling for early warning system	Tribhuvan University, University of Edinburgh, England and Practical Action, Nepal	2016-2017
Enhancement of urban disaster resilience through activities of local participatory platform, Nepal	Co-Investigator	Enhance resilience of cities against natural disasters through capacity buildings of stakeholders in Kathmandu, Nepal and Yangon, Myanmar.	Kyoto University, Japan; NSET, Nepal; Centre for Disaster Studies, TU; Lalitpur and Karyabinayak Municipalities	2015-2018
Detail study of earthquake triggered landslides and liquefaction in the different part of Nepal.	Engineering Geologist	Reconnaissance study of earthquake	Geotechnical Extreme Events Reconnaissance, USA	2015
Design and develop low cost and low-tech Community Based Early Warning System (CBEWS) for Flash flood, Eastern Nepal	Team Leader/Disaster Risk Reduction Expert	Identification of flood hazard and develop a physical prototype of low-cost, low-tech flash flood early warning system.	CFGORRP/ UNDP Nepal, Tribhuvan University	2014
Geo-technical study and Mitigating Measures Design of Landslides and Road in Nepal	Engineering Geologist	Carried out field studies, prepared geological, engineering geological and hazard map in GIS. Prepared report focused to geological hazards in and around the project area with potential impact to project structures and prepared landslide hazard map	Department of Road, Nepal; Practical Action, Nepal; Civil Aviation Authority of Nepal; Full Bright Consultancy (p) Ltd, Nepal; Department of Water Induced Disaster and	2010-2011

			Management, Government of Nepal; Care Nepal	

PEER REVIEWED PUBLICATIONS:

Journal Article

2025

1. Bhatta, B., Singh, U., Adhikari, B.R., Karki, S. & Bhatta, A. 2025. Tracing Morphological Transformations and Braiding Dynamics in the Himalayan Rivers of Nepal, Remote Sensing Applications: Society and Environment, Volume 39, https://doi.org/10.1016/j.rsase.2025.101705.
2. Shrestha, B. & **Adhikari, B. R.,** 2025. Innovating incident command system for Nepal: Adopting global practices to local. Journal of APF Command and Staff College, *8*(1), pp. 50-73. https://doi.org/10.3126/japfcsc. v8i1.77600
3. Rai, P., Baral, A., Pokharel, K., Sah, P.K., Bhattarai, K, Magar, P.R., and **Adhikari, B.R.,** 2025. Multi-hazard risk assessment of Waling Municipality, Syangja, Nepal. Geomatics, Natural Hazards and Risk, 16:1, 2485327, DOI: 10.1080/19475705.2025.2485327
4. Pyakurel, A. and **Adhikari, B.R.** 2025. Tunnel safety evaluation in the Nepal Himalaya: a case study of utilising analytic hierarchy process (AHP) for comprehensive risk assessment. Discover Civil Engineering, 2:63. https://doi.org/10.1007/s44290-025-00221-z
5. Gautam, S., **Adhikari, B.R.,** Pudasaini, U. and Lamsal, P. 2025. Application of unmanned aerial vehicle (UAVs) for disaster risk reduction and management in Nepal: In: Talukdar, S., Chatterjee, R., Bera, S., Prashar, A., Shaw, R. (eds.) Communication, Science, Technology and Innovation in Disaster Risk Management, Springer Nature, Switzerland. pp. 151-165.
6. Dahal, B.K., Gautam, P.R., **Adhikari, B.R.,** Gautam, D. and Lamichhane, S. 2025. Dynamics of active landslide along central Himalayan route: A case study of Guthitar landslide, Dhankuta, Nepal, Journal of Nepal Geological Society. V. 67, pp.1-10.

2024

7. Tao, Y., Tian, B., **Adhikari, B.R.,** Zuo, Q., Luo, X and Di, B. 2024. A review of Cutting-edge sensor technologies for improved flood monitoring and damage assessment, Sensors, 24, 7090, https://doi.org/10.3390/s24217090
8. Bhatta, S. and **Adhikari, B.R.,** 2024. Landslide susceptibility mapping using GIS-based statistical models and remote sensing in the Kathmandu valley, Nepal, Journal of Engineering Issues and Solutions, v. 3 (1), pp. 145-161.
9. Bhatta, S. and **Adhikari, B.R.,** 2024. Comprehensive risk evaluation in Rapti Valley, Nepal: A multi-hazard approach, Progress in Disaster Science, https://doi.org/10.1016/j.pdisas.2024.100346
10. Paudel, P.K., Parajuli, S., Sinha, R., Bohara, M., Abedin, M.A., **Adhikari, B.R.,** Gautam, S., Bastola, R., Pal, I., and Huntington, H.P., 2024. Integrating traditional and local knowledge into disaster risk reduction policies: Insights from Nepal, India and Bangladesh, Environmental Science and Policy, https://doi.org/10.1016/j.envsci.2024.103825
11. Knight, A.C.G., Stevenson, E.L., Bridgestock, L., Baronas, J.J., Knapp, W.J., **Adhikari, B.R.,** Andermann. C. and Tipper, E.T., 2024. The impact of adsoprption-desorption reactions on the Chemistry of Himalayan rivers and the quantification of silicate weathering rates, Earth and Planetary Science Letter, https://doi.org/10.1016/j.epsl.2024.118814
12. **Adhikari, B.R.,** Guatam, S., Pangali Sahrma, T.P., and Devkota, S., 2024. Land cover, land use change and its implication to disasters in the Hindu Kush Himalayan Region: In: Mazumder, Ra. And Shaw, R. (eds) Surface Environments and Human Interactions. Springer, Singapore. pp. 7-27.

13. Li, J., **Adhikari, B.R.,** Ding, X. Wu, S., Meng, X., Niu, Z., Pei, X., Zhan, Y. and Di, B., 2024. Frequent dry-wet cycles promote debris flow occurrence: Insights from 40 years of data in subtropical monsoon region of Sichuan, China, Catena, Vol. 238. https://doi.org/10.1016/j.catena.2024.107888.
14. De Boer, A.M., Schwanghart, W., Mey, J., **Adhikari, B.R.** and Reimann, T., 2023. Insight into the dynamics of a long run-out mass movement using single-grain feldspar luminescence in the Pokhara valley, Nepal, Geochronology, (1):53-70
15. Graf, E.L.S., Sinclair, H.D., Attal, M., Gailleton, B., **Adhikari, B.R.** and Baral, B., 2024. Geomorphological and hydrological controls on sediment export in earthquake- affected catchments in the Nepal Himalaya, Earth Surface Dynamics, 12. 135-161, https://doi.org/10.5194/esurf-12-135-2024.

2023

16. Mukherjee, M., Abhinay, K., Rahman, M., Yangdhen, S., Sen, S., **Adhikari, B.R.,** Nianthi, R., Sachdev, S. and Shaw, R., 2023. Extent and evaluation of critical infrastructure, the status of resilience and its future dimensions in South Asia., Progress in Disaster Science, https://doi.org/10.1016/j.pdisas.2023.100275.
17. Thapa, P.S., **Adhikari, B.R.,** Shaw, R., Bhattarai, D. and Yanai, S., 2023. Geomorphological analysis and early warning systems for landslide risk mitigation in Nepalese mid-hills, Natural Hazards, https://doi.org/10.1007/s11069-023-05929-8.
18. Tian, B., Liu, W., Mo, H., Li, W., and **Adhikari, B.R.,** 2023. Detecting the Unseen: Understanding the Mechanisms and working principles of earthquake sensors, Sensors, V. 23 (11), 5335, **https://doi.org/10.3390/s23115335**.
19. Jiang, H., Xu,C., **Adhikari, B.R.,** Liu, X., Tan, X. and Yuan, R., 2023. Editorial: Environmental change driven by climate change, tectonism and landslide. Front. Earth Sci. 10:1076801. doi: 10.3389/feart.2022.1076801
20. Wu, S., Di, B., Ustin, S.L., Wong, M.S., **Adhikari, B.R.,** Zhang, R., and Luo, M., 2023. Dynamic characteristics of vegetation change based on reconstructed heterogenous NDVI in seismic regions. Remote Sensing, *15* (2), 299; https://doi.org/10.3390/rs15020299.

2022

21. **Adhikari, B.R.** and Gautam, S., 2022. A review of policies and institutions for landslide risk management in Nepal. Nepal Public Policy Review, v. 2, pp. 93-112.
22. Sharma, S., Talchabhadel, R., Nepal, S., Ghimire, G.R., Rakhal, B., Panthi, J., **Adhikari, B.R.,** Pradhanang, S.M., Maskey, S and Kumar, S., 2022. Increasing risk of cascading hazards in the central Himalayas, Natural Hazards, https://doi.org/10.1007/s11069-022-05462-0
23. Kunwar, B.M., **Adhikari, B.R.,** Muensit, N., Techato, K., and Gyawali, S., 2022. Role of vegetation for the protection of Phewa Watershed, Kaski, Nepal, Environment and Ecology Research, 10(2): 161-173.
24. **Adhikari, B.R.,** Gautam, S., and Paudel, B, 2022. Landslide, landcover and landuse changes in its impacts in Nepal: In: Sarkar, R., Shaw, R. and Pradhan B. (eds) Impact of Climate Change, Land use and Land Cover, and Socio-economic Dynamics on landslides. Springer, Singapore. pp. 149-164.

2021

25. **Adhikari, B.R.,** 2021. Perturbation of earth surface process by geophysical and meteorological process in the Nepal Himalaya: In: Kolathayar S., Pal I., Chian S.C., Mondal A. (eds.) Civil Engineering for Disaster Risk Reduction. Springer Tracts in Civil Engineering. Springer, Singapore. pp. 181-189.
26. **Adhikari, B.R.,** Menon, V. and Kolathayar, S., 2021. Geohazard Investigation and Management: An Introduction. In: Adhikari, B.R. and Kolathayar, S. (Eds.) Geohazard Mitigation: Select proceedings of VCDRR 2021, Springer, pp. 1-8.
27. **Adhikari, B. R.,** 2021, Lightning fatalities and injuries in Nepal. Weather Climate and Society, v.13 (3), 449-458

2020

28. **Adhikari, B.R.** and Paudayal, K.N. 2020, Palynological evidence for the Neogene environment analysis of the Thakkhola Graben, Nepal, Journal of Nepal Geological Society, v. 60, pp. 117-129.
29. Chen, F., **Adhikari, B.R.** and Tian, B. 2020, Identification of Landslide Susceptible Areas For The Proper Settlement Planning In The Kali Gandaki Road Corridor, Nepal. IEEE International Geoscience and Remote Sensing Symposium, 5238-5241.
30. Sargeant, S., Finlayson, A., Dijkstra, T., Flinn, B., Schofield, H., Miranda Morel, L., Twigg, J., Lovell, E., Stephenson, V., **Adhikari, B.R.,** 2020, The Influence of the physical environment on self-recovery after disasters in Nepal and the Philippines, International Journal of Disaster Risk Reduction, v. 50.
31. Xiong, K., **Adhikari, B.R.,** Stamatopoulos, C.A., Zhan, Y., Wu, S., Dong, Z. and Di, B., 2020, Comparison of Different Machine Learning Methods for Debris Flow Susceptibility Mapping: A case Study in Sichuan Province, China, Remote Sensing, Vol. 12 (2), 295, https://doi.org/10.3390/rs12020295.
32. Gnyawali, K. R., Zhang, Y., Wang, G., Miao, L., Pradhan, A.M.S., **Adhikari, B.R.,** Xiao, L., 2019, Mapping the susceptibility of rainfall and earthquake triggered landslides along China-Nepal Highways, Bulletin of Engineering Geology and the Environment, 79, pp. 587-601.

2019

33. Menges, J., Hovius N., Andermann, C., Dietz, M., Swoboda, C., Cook, K.L., **Adhikari, B.R.,** Vieth-Hillebrand, A., Bonnet, S., Reimann, R., Koustdodendries, A., Sachse, D., 2019. Late Holocene landscape collapse of a Trans-Himalayan dryland: Human impacts and aridification, Geophysical Research Letters, (DOI: 10.1029/2019GL084192)
34. Thapa, P.S. and **Adhikari, B.R.,** 2019. Development of community-based landslide early warning system in the earthquake-affected areas of Nepal, Journal of Mountain Science, 16 (12), pp. 2701-2713.
35. Chen, F., Tian, B., **Adhikari, B.R.,** Gou, X., 2019. Mapping digital drainage network using geoprocessing: A case study of Kali Gandaki River basin, Nepal Himalaya. IEEE, 978-1-5386-9154-0/19, 3479-3482.

2018

36. McAdoo, B.G., Quak, M., Gnyawali, K.R., **Adhikari, B.R.,** Devkota, S., Rajbhandari, P.L., Sudmeier-Rieux, K., 2018, Roads and landslides in Nepal: how development affects environmental risk, Nat. Hazards Earth Syst. Sci. vol. 18, pp. 3203-3210.
37. Stolle, A., Schwanghart, W., Andermann, C., Bernhardt, A., Fort, M., Jansen, J.D., Wittmann, H., Merchel, S., Rugel, G., **Adhikari, B.R.,** Korup, O., 2018, Protracted river response to medieval earthquake, Earth Surface Processes and Landforms, vol. 44, pp. 331-341, https://doi.org/10.1002/esp.4517.
38. Cook, K.L, Andermann, C., Gimber, F., **Adhikari, B.R.** and Hovius, N., 2018, Glacial lake outburst floods as drivers of fluvial erosion in the Himalaya, Science, Vol. 362, pp. 53-57.
39. **Adhikari, B.R.** and Sitoula, N.R., 2018, Community based flash flood early warning systems: a low-cost technology for Nepalese mountains, Bulletin of Department of Geology, Tribhuvan University, Nepal, v. 20, pp. 87-92.

2017

40. Stolle, A., Swchwanghart, W., Andermann, C., Bernhardt, A., Wittmann, H., Merchel, S., Rugel, G., Fort, M., **Adhikari, B.R.** and Korup, O., 2017, Catastrophic valley fills record large Himalayan earthquakes, Pokhara, Nepal, Quaternary Science Reviews, vol. 117, pp. 83-103.

41. **Adhikari, B.R.,** Nidal, N., Yadav, B.K. and Awasthi, S., 2017, Landslide risk assessment of the Patlekhet landslide, Myagdi district, Nepal, Journal of the Institute of Engineering, vol. 13 (1), pp. 78-89.
42. Gnyawali, K.R. and **Adhikari, B.R.,** 2017, Spatial Relations of Earthquake Induced Landslides Triggered by 2015 Gorkha Earthquake Mw=7.8, Landslide research and risk reduction for advancing culture of living with natural hazards, Advancing Culture of Living with landslides, M. Mikos et al. (eds.) Spinger Publication, pp-85-93.
43. Rai, S.M., Upreti, B.N., Shakal, S., Bhattarai, T.N., **AdhiKari, B.R.,** Bajracharya, S.R. and Yoshinda, M., 2017, Climate Change Impact on Glacier Retreat and Local Community in the Langtang Valley, Central Nepal, Journal of Development Innovations, Vol. 1, No. 1, pp. 45-59.
44. Bicker, J.D., Schwanghart, W., **Adhikari, B.R.,** Moriguchi, S., Roeber, V. and Giri, S., 2017, Performance of models for flash flood warning and hazard assessment: the 2015 Kali Gandaki landslide breach in Nepal, Journal of Mountain Research and Development. V.37, No 1, pp. 5-15.

2016

45. Gnyawali, K.R., Maka, S., **Adhikari, B.R.,** Chamlagain D., Duwal, S. and Dhungana A.R., 2016, Spatial Implication of Earthquake Induced Landslides Triggered by the April 25 Gorkha Earthquake Mw 7.8: Preliminary Analysis and Findings, Proceeding of International conference on Earthquake Engineering and Post Disaster Reconstruction Planning, pp. 50-58.

2015

46. Schwanghart, W., Bernhardt, A., Stolle, A., Hoelzmann, P., **Adhikari, B. R.,** Andermann, C., Tofelde, S., Merchel, S., Rugel, G., Fort, M., Korup, O., 2015, Repeated catastrophic valley infill following medieval earthquakes in the Nepal Himalaya. Science, vol. 351, 2015. 10.1126/science.aac9865
47. Gotz, J.; Weidinger, J.T.; Kraxberger, S.; Hennecke, J.B.; **Adhikari, B.R.,** 2015, Geomorphologic and Hydrologic characteristics of Populated Rockslide Deposits (Sagarmatha National Park, Khumbu Himala, Nepal), Journal of Water Resource and Protection, vol. 7, pp. 1038-1048.
48. Moss, R.E.S.; Thompson, E.M.; Kieffer, D.S.; Hashah, M.A.Y.; Acharya, I.; **Adhikari, B.,** Asimaki, D.; Clahan, K.B.; Collins, B.D.; Dahal, S.; Jibson, R.W.; Khadka, D., MacDonal, A.; Madugo, C.L.M.; Mason, H.B.; Pehliyan, M.; Rayamajhi, D. and Uprety, S. 2015, Geotechnical Effects of the 2015 Magnitude 7.8 Gorkha, Nepal Earthquake and Aftershocks, Seismological Research Letters, V. 86, no. 6, pp. 1514-1523

2014

49. Emerman, S.H; Nelson, J.R; Carlson, K.; Anderson, T.R.; Sharma A.; **Adhikari, B.R.,** 2014, The effect of surface lithology on arsenic and other heavy metals in surface water and groundwater in Mustang Valley, Nepal Himalaya, Journal of Nepal Geological Society, vol. 47, pp. 1-21.
50. Khadka, P and **Adhikari, B. R.** 2014, Flood vulnerability and capacity assessment of people of Holiya VDC in Banke district, Nepal, Proceedings of the International Symposium on 'Geohazards: science, engineering and Management' pp. 536-548.

2013

51. **Adhikari, B. R.** and Wagreich, M., 2013, Microfacies analysis and paleoenvironmental significance of palustrine carbonates in the Thakkhola-Mustang Graben (Nepal Himalaya), Journal of Asian Earth Sciences, vol. 77, pp. 117-126.
52. Emerman, S.H., Stuart, K. L., Sapkota, A., Khatri, S., **Adhikari, B. R.** and Williams, J., Garcia, P. K. 2013,Support for the fluvial recharge model for arsenic contamination of groundwater in Pokhara Valley, Nepal Himalaya, Journal of Nepal Geological Society, vol. 46, pp.75-94.

2012

53. **Adhikari, B.R**. and Paudyal, K.N, 2012, Neogene pollen assemblage from the Thakkhola-Mustang Graben, central Nepal Himalaya, Bulletin of Nepal Geological Society, Vol. 29, pp. 53-58.

2011

54. **Adhikari, B. R.** and Wagreich, M., 2011, Provenance evolution of collapse graben fill in the Himalaya-The Miocene to Quarterny Thakkhol-Mustang Graben (Nepal), Sedimentary Geology, vol. 233, pp. 1-14.
55. Rai, S.M., Yoshida, M., Upreti, B.N., Bhattarai, T.N., Ulak, P.D., Gajurel, A. P., Dahal, R. K., Dhakal, S., Koirala,M. P., Sharma, L. N. and **Adhikari, B.R.,** 2011, Field excursion guidebook series on geology, natural hazards and vegetation of the Nepal Himalaya, Bulletin of Nepal Geological Society, Vol. 28, pp. 93-98.
56. **Adhikari, B. R.** and Wagreich, M., 2011,Facies analysis and basin architecture of the Neogene Thakkhola-Mustang Graben, central Nepal, Austrian Journal of Earth Sciences, vol. 104/1, pp. 66-80.

2010

57. **Adhikari, B. R.** and Wagreich, M., 2010, Provenance evolution of collapse graben fill in the Himalaya - the Miocene to Quaternary Thakkhola-Mustang Graben (Nepal), Sedimentary geology, vol. 233, pp. 1-14.

2007

58. **Adhikari, B. R.,** 2007, An overview of Thakkhola-Mustang Graben, Bulletin of Nepal Geological Society, Vol. 23, pp. 53-57.

2006

59. **Adhikari, B. R.** and Tamrakar, N. K., 2006, Bank instability and erosion problems of Bishnumati River, Kathmandu, Nepal, Nepal Geological Society, Journal of Nepal Geological Society, vol. 34, pp.109-116.

Books:

1. Sinclair, H., Brown, B., **Adhikari, B.R.,** Attal, M., Alistair, B., Budimir, M., Creed, M., Dingle, L., Dugar, S., Gautam, D., Gourmelen, N., Mudd, S., Neupane, S., Pedreschi, R., Ruwanpura, K. N., Sharma, J., Sneddon, A., Upreti, M. 2017. Improving Understanding of Flooding and Resilience in the Terai, Nepal. The university of Edinburgh and Practical Action. 16p.
2. Devkota, S. and **Adhikari, B.R.**, 2015, Development of Ecosystem based Sediment Control Techniques and Design of Siltation Dam to Protect Phewa Lake, Government of Nepal/United Nations Development Programmes (UNDP), 64p.
3. **Adhikari, B.R.** and Suwal, M.K., 2013, Hydrogeological Study in BangsingDeurali VDC, Syangja, An Ecosystem-based Adaptation in Mountain Ecosystem in Nepal, IUCN, Nepal, 60p.
4. Yoshida, M., Upreti, B.N., Rai, S.M., Bhattarai, T.N., Ulak, P.D., Gajurel, A. P., Dahal, R. K., Dhakal, S., Koirala, M. P., Sharma, L. N. and **Adhikari, B.R.,** 2011, Guidebook for Himalayan Trekkers (Series No. 2), Eco-trekking in the Everest Region, Eastern Nepal, Department of Geology, Tri-Chandra Multiple campus, Tribhuvan University, 192p.

Book Edition:

1. Sarkar, R., Saha, S., **Adhikari, B.R.,** and Shaw Rajib. (2024). Geomorphic Risk Reduction Using Geosptial Methods and Tools, Springer, https://doi.org/10.1007/978-981-99-7707-9
2. Jian, H., Xu, C., Liu, X., **Adhikari, B.R.,** Tan, X. and Yuan, R.M. (2023): Environmental Change driven by climatic change, tectonism and landslides, Lausanne: Frontiers Media SA., doi: 10.3389/978-2-83251-525-9
3. Kolathayar, S., Ghosh C., **Adhikari, B.R.,** Mondal, A. (2022): Resilient Infrastructure, Select Proceedings of VCDRR 2021, Springer, 467 p.
4. **Adhikari, B.R.** and Kolathayar, S., (2022): Geohazard Mitigation, Select Proceedings of VCDRR 2021, Springer, 460 p.

Book Chapters:

1. **Adhikari, B.R.,** Devkota, S. and Talchabhadel, R., 2021, Climate change and landslide risk reduction. In Shaw, R.(Eds.) Handbook on Climate change and disasters, Edward Elgar, pp. 56-63.
2. Poudel, B. and **Adhikari, B.R.**, 2021, Land use and land cover. In: Ojha, R.B. and Panday, D. (Eds.) The Soils of Nepal, Springer, pp. 41-51.
3. **Adhikari, B.R.** and Ojha, R.B., 2021, Geology and Physiography. In: Ojha, R.B. and Panday, D. (Eds.) The Soils of Nepal, Springer, pp. 29-39.
4. Chaudhary, S., **Adhikari, B.R.,** Chaudhry, P., Dorji, T. and Poudel. R., 2021, Ecosystem-Based Adaptation (EbA) in the Hindukush Himalaya: Status, Progress and Challenges. In: Mukherjee, M. and Shaw R. (Eds.) Ecosystem-Based Disaster and Climate Resilience, Springer, pp. 29-51.
5. **Adhikari, B.R.,** Bingwei, T., 2021, Spatiotemporal distribution of Landslides in Nepal, In: Eslamina, S. and Eslamina, F., (Eds.) Handbook of Disaster Risk Reduction for Resilience, Springer, pp. 453-471.
6. Dhital, M.R. and **Adhikari, B.R.,** 2020, Thrust sheets, tectonic windows and internontane basins in the Nepal Himalaya. In: Biswal, T.K., Ray, S. K. and Grasemann, B. (eds.) Structural geometry of Mobile Belts of the Indian Subcontinent, Society of Earth Scientists Series, Springer, Cham, pp. 233-254.
7. **Adhikari B.R.,** Shrestha S.D., Shakya N.M. (2019) Future Urban Water Crisis in Mountain Regions: Example of Kathmandu Valley, Nepal. In: Ray B., Shaw R. (eds) Urban Drought. Disaster Risk Reduction (Methods, Approaches and Practices). Springer, Singapore, pp. 169-182.
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9. **Adhikari, B.R.,** 2015, Land and Soil, Compendium of Environment Statistics, Central Bureau of Statistics, Government of Nepal, pp. 47-68.

General Articles:

1. **Adhikari, B.R.,** 2021, नेपालको विपद ब्यबस्थापनमा बिज्ञान र प्रविधिको महत्व**,** पूर्व तयारी, दिपिनेट-नेपालको रजत प्रकाशन, pp. 70-71
2. Thapa, G.B. and Adhikari, B.R., 2021, COVID-19 situation in the Tribhuvan University, Nepal, pp. 29-30
3. **Adhikari, B. R.,** 2016, Gorkha Earthquake 2015: Cause and Effect, Techno-civil, vol 5, pp. 20-25.
4. Fort M., **Adhikari B.R.,** Stolle A., Schwanghart W., Korup O. (2015). Catastrophic mountain wall collapses in the Nepal Himalayas: a review, with focus on Pokhara valley. Extended abstracts

of the IAG Conference on « Gradualism versus Catastrophism in Landscape Evolution, Barnaul, Russia. pp. 15-18.

5. **Adhikari, B. R.,** 2013, Rock mass classification system and problems associated with their parameters in underground excavation system, Techno-civil, vol 4, pp. 51-55.
6. **Adhikari, B. R.,** 2013, पोखरा उपत्यकाको भौगोलक उपती र बिकासक्रम**,** स्मारिका**,** Lions Club of Pokhara Chautari, pp. 51-53 (Article in Nepali).
7. **Adhikari, B. R.,** 2012, बेगनास : भौगोलिक र भौगर्भिक परिचय, बेगनास पत्रिका, वर्ष ७, अंक १, pp. 30-32
8. **Adhikari, B. R.,** 2011, पश्चिम नेपाल स्थित थाकखोला –मुस्तांग उपत्यकाका तालीय अवयवहरुको विस्लेषण , हाम्रो सम्पदा, वर्ष ११, अंक ६, pp. 55-60 (Article in Nepali)
9. **Adhikari, B. R.,** 2010, An introduction to Optically Stimulated Luminescence (OSL), GEOWORLD, pp 30-32.
10. **Adhikari, B. R.,** 2000, Topography of the Ocean Floor, GEOWORLD, pp 88-89.

Technical Study Reports:

1. Nepal Urban Resilience Project (NURP): Scoping study, The Department for International Development (DFID), 2018, Nepal.
2. Investigation and treatment of landslides for recovery and reconstruction of earthquake affected areas of Sindhupalchowk and Dolakha district, Nepal, Save the Children International, 2017
3. Geotechnical Field Reconnaissance: Gorkha (Nepal) Earthquake of April 25, 2015 and related shaking sequence, GEER Association Report No. GEER-040. 2015
4. Design and develop low cost and low tech Community Based Early Warning System (CBEWS) for Flash flood, Eastern Nepal, CFGORRP/UNDP/DHM/IoE 2014.
5. Piloting Early Warning System (EWS) for Landslides in Far West of Nepal, Mercy Corps/ IoE, Nepal, 2014

Countries of work experience

Nepal, India, Austria, Myanmar, China, Kenya, Bhutan

Language

Language	*Speaking*	*Reading*	*Writing*
Nepali	Mother-Tongue		
English	Excellent	Excellent	Excellent
Hindi	Good	Good	Good
German	Good	Good	Good
Chinese	Basic	Basic	Basic

Awards and grants

- Travel Grants to attain the 36th International Geological Congress -2020, New-Delhi, India.
- **"Young Affiliates"** The World Academy of Sciences (TWAS) 2017-2021.
- **"Young Scientist"** Integrated Research on Disaster Risk, 2017
- **"Established Scientist Award"** in European Geoscience Union (EGU)-2016.
- NFP for short course on **"Rock and Soil Mechanics in engineering geology"**, University of Twente, The Netherlands, January 7-March 8, 2012.
- **Nepal BiddhyaBhusan Nepal (Ka),** 2010, Ministry of Education, Government of Nepal.

- Travel grant for the SEG/ExxonMobil Student Education Program (SEP) and the EAGE 71st Conference and Exhibition in Amsterdam, June 6-11, 2009.
- Conference grant for European Geosciences Union, General Assembly 2009, Vienna, Austria, 19 - 24 April 2009 by OMV, Austria.
- PhD scholarship, 2006-2009, oead, Austria.

Membership in Professional Associations

- Editor, Journal of Coastal and Riverine Flood Risk.
- Editor, Environmental change driven by Climatic Change, Tectonism and Landslide, Frontiers in Earth Science
- Secretary, Geomorphological Society of Nepal, 2017-2019.
- Editor, Journal of Nepal Geological Society, 2016-2017.
- Regular member of Geotechnical Extreme Events Reconnaissance, USA
- Executive member of Nepal Tunneling Association
- Editor, Journal of Nepal Geological Society, 2012-2014.
- Life member of Nepal Tunneling Association
- Life member of Nepal Geological Society, LM 535
- Member of American Geophysical Union, 2009.
- Member of European Association of Geoscientists & Engineers, 2009
- Member of International Association of Sedimentologists, 2009.
- Member of European Geosciences Union, 2008-2009.