

ヒマラヤの地質は素晴らしい！—学生のヒマラヤ野外実習プログラム7年間の総括と 第8回実習ツアーへの誘い

吉田勝^{a,b}・学生のヒマラヤ野外実習プロジェクト^a

Attractive Himalayan Geology - Summary of the Student Himalayan Exercise Program 7 Years and Invitation to Join the 8th Exercise Tour

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To see geology in the field, to observe occurrence of rocks at outcrops and to touch and collect rocks in the field, as a whole form the field geology, and are fundamentally required to students, educators, and researchers of geology.

We have been conducting geo-exercise tours in the Himalaya (Yoshida, 2014-2016), expecting that students who participated in the tours will become familiar to field geology and some of them will be encouraged to further utilize the field geology in their future work, and further would encourage the geology world to popularize the field geology.

The Himalaya is one of the largest mountain range on the earth. Reflecting the collisional tectonics of Indian and Eurasian plates, the Himalaya exhibits a clear geologic constitutions. Five geotectonic zones ranging in age from the Proterozoic to the Quaternary are arranged parallel to the mountain range, all zones being bounded by large north-dipping faults, which are mostly thrust. A large uplifting rate of 5 mm/y is still continuing today and resulting to form deep valleys and steep mountain slopes where slope collapse, landslide and river flood often take place. The Himalaya is the living museum for people studying geoscience and natural hazards.

The N-S traverse of the Himalaya along the route connecting the Kaligandaki and Tinau valleys in west-central Nepal is the best geo-excursion course that discloses a full view of the Himalayan Orogen (Figs. 1, 2, Yoshida and Ulak, 2017). We have been conducting the Japan-Nepal Student Himalayan Exercise Program (SHET-HP, 2018) every year since 2012, and so far seven field tours under the program were successfully conducted along the above course, and preparation for the 8th tour in next March is under the progress.

The Student Himalayan Exercise Tour (SHET) has been evaluated and acknowledged well by all participants of all the tours in their tour reports. Reports by all participants have been assembled in a pdf book every year (e.g., Yoshida, 2018) and has been disclosed on the home page of SHET as well as the home page of the Gondwana Institute for Geology and Environment. It is clear that the emotion to study earth science, field geology as well as English is drastically enhanced by participating the tour.

A summary of 7 exercise tours since 2012 will be given, and some highlights of field observations in the tours including beautiful Annapurna and Dhaulagiri ranges with amazing huge and clear folding structures of Tethys formations, a group of delighted students, and intermingling of Japanese and Nepalese students will be shown. An invitation to the 8th SHET in March 2019 will be displayed in the presentation, along with distribution of some useful leaflets related with the 8th SHET program at the poster site. Further details of the SHET are possible to download on the SHET-HP below.

References

- DMG, 1982, Geological map of Nepal, 1:1,000,000, Department of Mines and Geology, Government of Nepal,.
- SHET-HP, 2018, Student Himalayan Exercise Project homepage. http://www.geocities.jp/gondwanainst/geotours/Studentfieldex_index.htm
- Yoshida, M. and Ulak, P.D. (Eds), 2017b, Geology and Natural Hazards along Kaligandaki and Highways Kathmandu-Pokhara-Butwal-Mugling. Guidebook for Student Himalayan Exercise Tour. GIGE Miscl. Pub. 35, Field Science Publishers, 144 pages.
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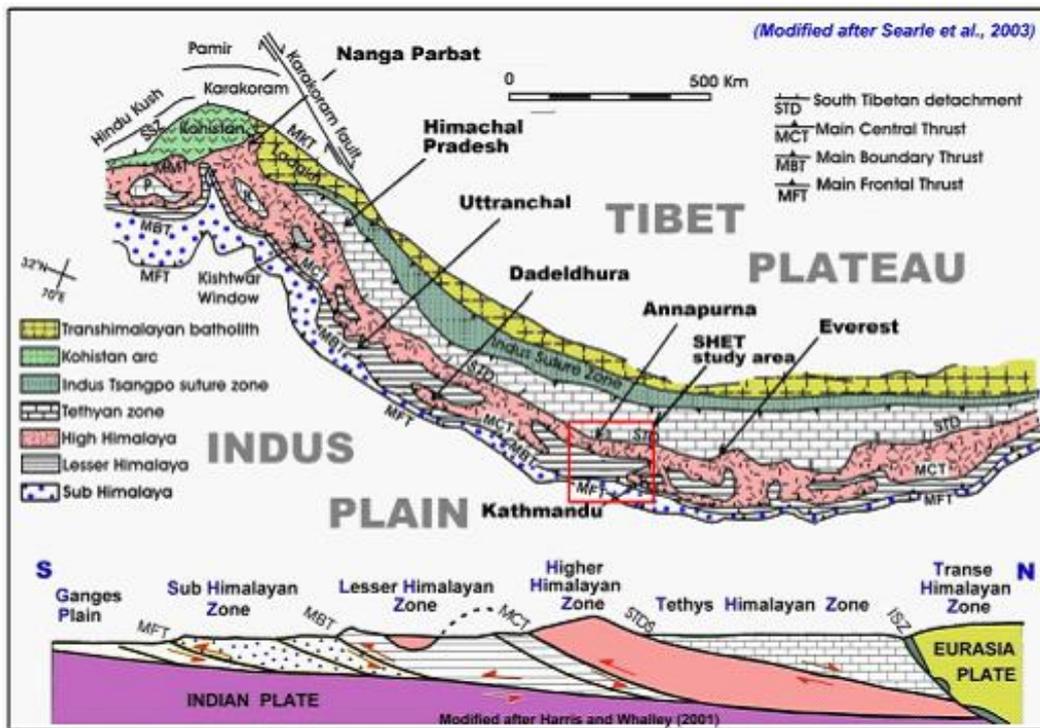


Fig. 1. Geologic outline and cross section of the Himalayan Orogen

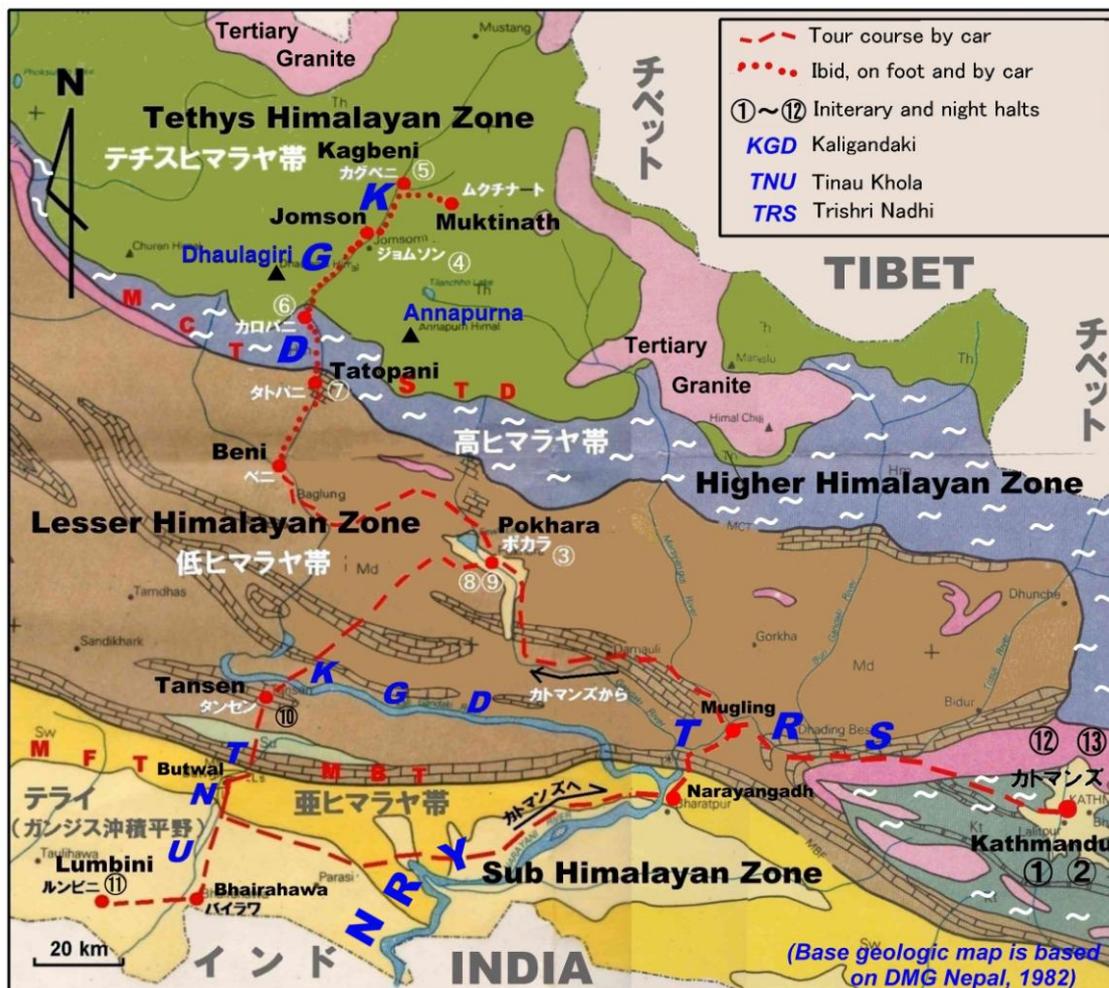


Fig. 2 The SHET course and geologic outline of surrounding areas
 KGD: Kaligandaki River, TNU: Tinau River, TRS: Trishuri River, NRY: Narayani River,
 ①~⑬ : Night halts