

Paper 8B (Practical)

Developmental Biology, Environmental Biology and Biotechnology

Marks: 25
Time: 4 Hours

1. Permanent preparation of whole mount of chick embryo.
2. Study of regeneration in *Hydra/Planaria*.
3. Study of whole mount /sections of different developmental stages of chick embryo from permanent slides.
4. Community analysis.
5. Qualitative analysis of aquatic communities from different water bodies.
6. Estimation of total hardness of water samples.
7. Quantitative estimation of Plankton.
8. Analysis of community similarities and species diversity indices.
9. Field trip and submission of Field Report.

Distribution of Marks

1. Developmental Biology
2. Environmental Biology
3. Spotting
4. *Viva Voce*
5. Laboratory Record
6. Field Report

Total 25 (Internal test – 7 + End semester test - 18)



KIANG NANGBAH GOVERNMENT COLLEGE, JOWAI
DEPARTMENT OF ZOOLOGY
P.O. Jowai::West Jaintia Hills District::Meghalaya - 793150
(E-mail: zoologykngc@gmail.com)

FIELD TRIP REPORT

(2021-2022)

A TRIP TO
MAWLYNGBNA, MAWSYNRAM
EAST KHASI HILLS DISTRICT
MEGHALAYA



DEPARTMENT OF ZOOLOGY
KIANG NANGBAH GOVT, COLLEGE, JOWAI
WEST JAINTIA HILLS DISTRICT



KIANG NANGBAH GOVERNMENT COLLEGE, JOWAI

DEPARTMENT OF ZOOLOGY

P.O. Jowai::West Jaintia Hilt District: Meghalaya – 793150

(Email: Zoologykngc@gmail.com)

Abstract: As per the prescribed curriculum by NEHU for the 6th Semester i.e. Paper 8E, the Department of Zoology has to take Zoology Honours students for a field trip/study tour both within and outside the state. The Education Department, Government of Meghalaya supports the financial expenditure in order to fulfil the criteria allotted in the syllabus. The main objective of this field trip is to bring the concept of what students have learnt in the normal classroom and to reveal the facts of what they have learned or for the purpose of first-hand observation.

Introduction: The Department of Zoology organized a field trip to Mawlyngbna, Mawsynram on 14th January 2022. The aim of the field trip was to visit to the Fossil Site, Split Rocks and Umkhakoi and to observe living wildlife fauna.

Science students required a practical work in order to get acquaintance with the subjects he/she studies. Therefore, study tour is one of the best impacts which we can motivate the students to protect life and environment which is the main focus of our study and research work. In order to preserve the diversity of animals and plants species which is very important for the ecological balance of the nature, one has to explore its natural habitat, and understand the needs of its conservation.

Mawlyngbna is a fossil village in Meghalaya, the age of the fossil will help us to know the age of the species living in that particular place by comparing with the other related fossil species in other places through research work and with the help of scientists. Fossils of animals dating 200 million old have been reported in this village.

Brief Report:

1. A group of 29 students, were accompanied by Madam D. A. Pde (HOD), Dr. (Mrs) L. M. Darnei, Dr. (Mrs) I. Nongtraw, Smt. W. M. Dkhar and Dr. P. Suchiang.
2. The team left at 5.00 AM sharp from the College Campus.
3. We arrived at Mawlyngbna Village at around 11:00 AM.



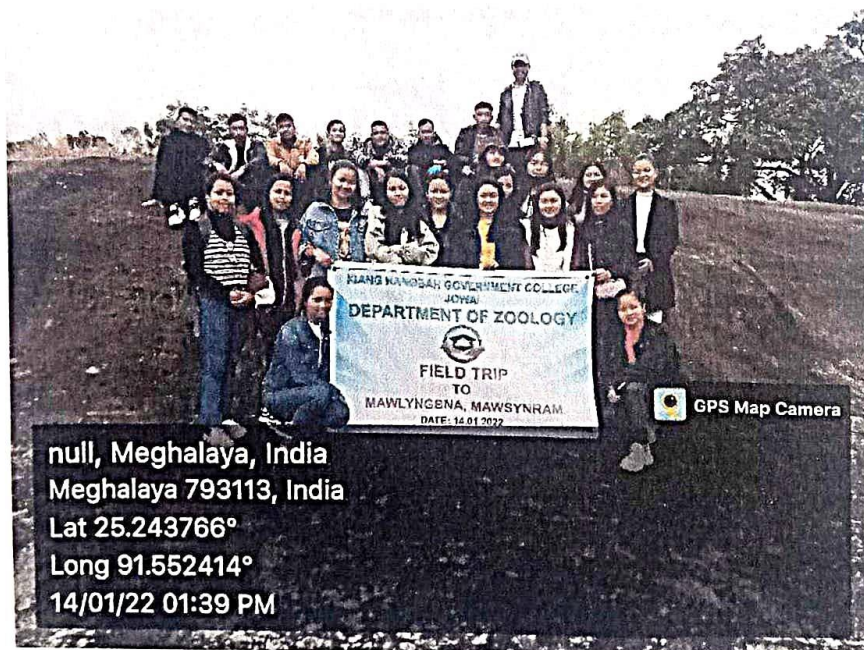
KIANG NANGBAH GOVERNMENT COLLEGE, JOWAI

DEPARTMENT OF ZOOLOGY

P.O. Jowai::West Jaiñtia Hills District::Meghalaya - 793150

(E-mail: zoologykngc@gmail.com)

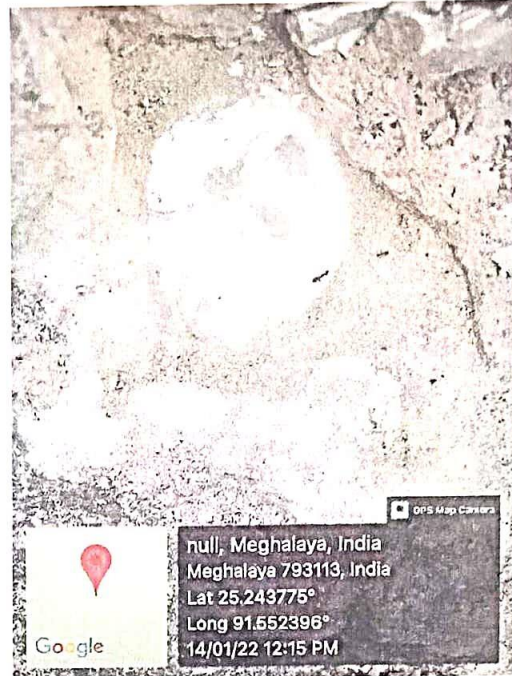
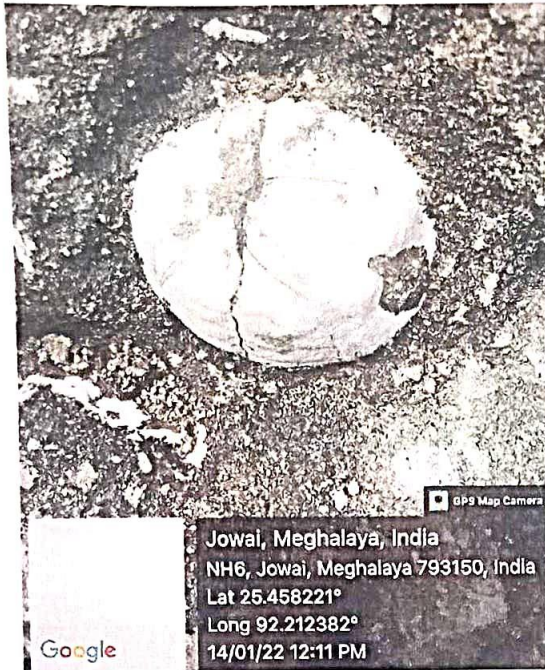
4. On the way to Mawlyngbna, water samples were collected by the students for **plankton study**.
5. Soon after reaching Mawlyngbna we visited the **Fossil Site**. We spent for an hour in the Fossil site. Presence of Fossils in the area is the evidence of the place's underwater history that goes back millions and millions of years. It is believed that the entire area was actually a part of the seabed.
6. After visiting the Fossil Site, the team proceeded towards Split Rock. It is a huge rock split into two from top to bottom, the event attributed to the devastating Magnitude-8 Assam earthquake of 1897. The two flat rocks sat parallel to each other separated by about 2 meters. One can walk through a narrow passage between the two rocks that leads to a very narrow cave. If proper examination and analysis of Split rocks are done, the rock could determine the approximate age of our planet.
7. The team also visited the Umkhakoi Reservoir. The multiple bowl-shaped depression at Umkhakoi fascinated us much more than the Reservoir itself. The depressions are usually filled with water which are connected by the bamboo bridges in the larger ones. Different rock shape surfaces are seen which could really indicate the ecological time and epoch of different species living during that particular era.
8. After visiting Umkhakoi, we journey back home at around 5:00 PM.



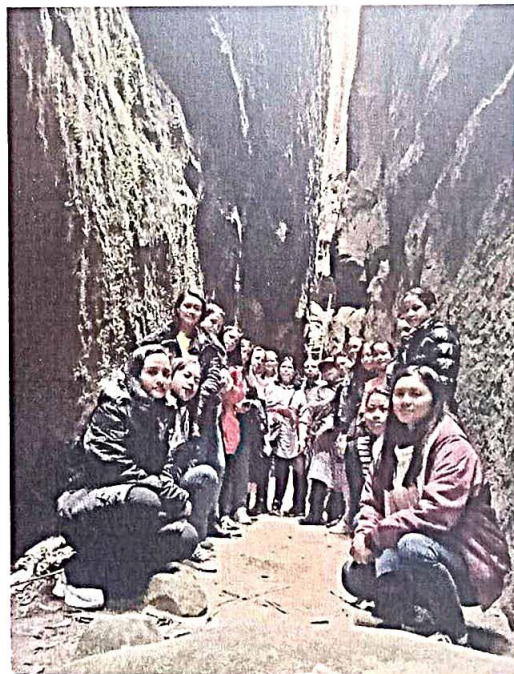
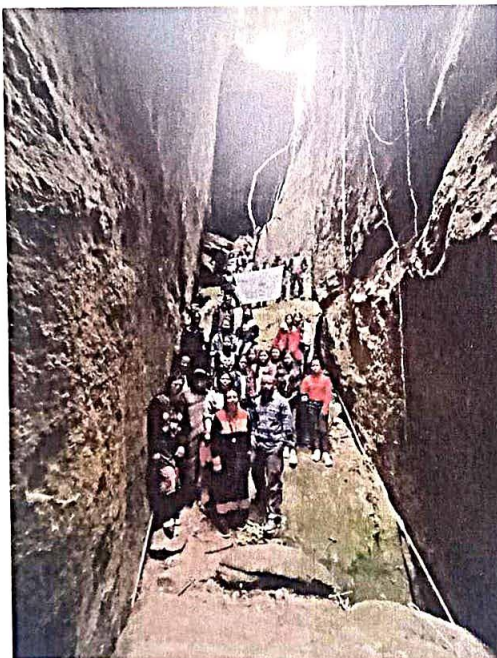
KIANG NANGBAH GOVERNMENT COLLEGE, JOWAI DEPARTMENT OF ZOOLOGY

P.O. Jowai::West Jaiñtia Hills District::Meghalaya - 793150

(E-mail: zoologykngc@gmail.com)



Fossils



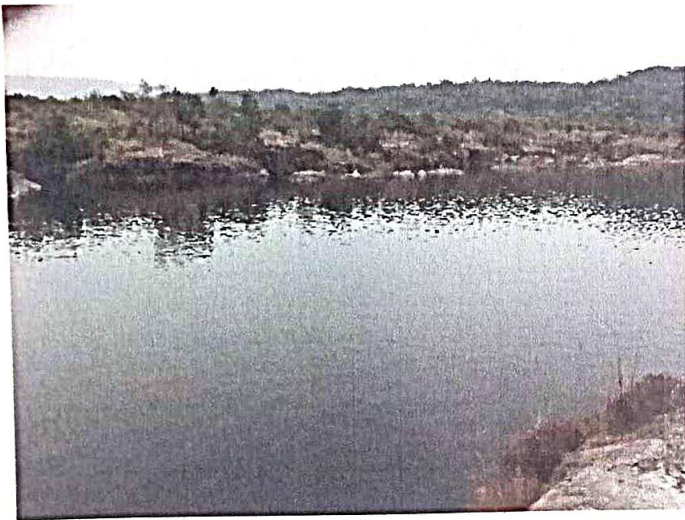
Split rocks



KIANG NANGBAH GOVERNMENT COLLEGE, JOWAI
DEPARTMENT OF ZOOLOGY

P.O. Jowai::West Jaiñtia Hills District::Meghalaya - 793150

(E-mail: zoologykngc@gmail.com)



Umkhakoi Reservoir

Conclusion: The field trip is highly enlightening the young minds to pursue higher studies, and very excited to know the fact which they study theoretically. Thus, field trip gives self-experienced and encouragement to the students.



KIANG NANGBAH GOVERNMENT COLLEGE, JOWAI
DEPARTMENT OF ZOOLOGY

Attendance Sheet for Field Trip to Mawlyngbna Mawsynram

(Date: 14.01.2022)

Class: B.Sc. 6th Semester (Honours - Zoology)

Sl. No.	Univ. Roll No.	Name of the Student	Present/Absent
1	S1902436	RICHANMIKI PHAWA	P
2	S1902437	GERMIOO THUBRU	P
3	S1902439	EBANIKI DKHAR	P
4	S1902440	IBANRISHISHA RYNGKHLEM	P
5	S1902441	AHBOK LANGSHIANG	P
6	S1902442	VICKY A. LAMARE	P
7	S1902443	JOEWILL BERTH JUNGAI	P
8	S1902444	BANRISHAPHRANG SUIAM	P
9	S1902445	MEBANDA LYNGDOH	P
10	S1902446	DIAMOND PAPIAH	P
11	S1902447	DAPHIHI YMBON	P
12	S1902448	RIKADA I RYMBAI	P
13	S1902450	DAIARISA PASSAH	P
14	S1902451	DIKAHIPAIA DKHAR	P
15	S1902454	DA U RU PAIA D SIANGSHAI	P
16	S1902455	BET SHYRMANG	P
17	S1902459	MOSES LYNGDOH	P
18	S1902461	DAYOOHUN I BHOI	P
19	S1902462	MOONIANG LALOO	P
20	S1902463	MORNING SUTING	P
21	S1902465	DONLANG SAYOO	P
22	S1902466	TINA MARY PADU	P
23	S1902467	PREJITA BATHARI	P
24	S1902468	DALADEIMONMI DHAR	P
25	S1902469	THATVURI DARNEI	P
26	S1902470	HEIMONMI LYNGDOH	P
27	S1902471	SONI SUSNGI	P
28	S1902472	DARYL D LAMARE	P
29	S1902473	NIKHIL DKHAR	P



Head
Department of Zoology
K.N. Govt. College, Jowai