



INTRODUCTION TO PRIMATE BEHAVIOUR, CENTRAL KALIMANTAN, INDONESIA

Course ID: ARCH 380G

July 13 – August 1, 2020

Academic Credits: 4 Semester Credit Units (Equivalent to 6 Quarter Units)

School of Record: Connecticut College

FIELD SCHOOL DIRECTORS:

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INTRODUCTION

The island of Borneo is renowned as one of the most biodiverse places on the planet, home to a large array of endemic species and unique ecosystems, including carbon-rich peat-swamp forests. The Borneo Nature Foundation (BNF) is a not-for-profit conservation and research organisation that works to protect some of the most important areas of tropical rainforest in Borneo and safeguard their incredible wildlife. BNF's field programmes include high-quality scientific research as a basis for protecting and managing tropical forests, and we have particular expertise in monitoring the distribution, population status, behaviour and ecology of Borneo's flagship ape species: the critically endangered Bornean orangutan (*Pongo pygmaeus*), endangered Bornean white-bearded gibbon (*Hylobates albibarbis*) and red langur (*Presbytis rubicunda*) which is listed as vulnerable by the IUCN. Our wide-ranging biodiversity and forestry research is used to make the case for conservation and demonstrate the harmful impacts of logging and forest conversion. We provide training and capacity building for local students, researchers

and conservation-area managers, and work with a number of local partners to implement successful conservation projects.

The Borneo Nature Foundation (BNF) was established in 1999 and works to understand, protect and restore the Sebangau Forest and other important rainforests in Borneo, to conserve their precious primate populations. The Sebangau tropical peat-swamp forest is the largest unfragmented area of forest remaining in Borneo's lowlands and supports globally-significant populations of endangered species, including the largest protected population of the Bornean orangutan and Bornean white-bearded gibbon. Its vast peat deposits cover an area of 6,000 km² and reach depths of 15m, making this one of the largest terrestrial carbon stores in the world.

Our base in Sebangau is the Natural Laboratory of Peat-swamp Forest (NLPSF), where research has been carried out since 1993, in partnership with the Centre for the International Cooperation in Sustainable Management of Tropical Peatland (CIMTROP) at the University of Palangka Raya who manage the site. The former logging camp has been converted into a permanent field station and the previous logging railway now carries only the Indonesian field staff, students and supplies to the forest. BNF has been studying orangutan population density in this area since 1995, orangutan behavioural ecology since 2003, gibbon population density and behavioural ecology since 2005, and red langur population density and behavioural ecology since 2009. Major BNF findings include our discovery of the largest protected populations of the Bornean orangutan and Bornean white-bearded gibbon, documenting long-term ape population trends including a dramatic crash in orangutan population density following logging disturbance, observing the first instances of topical self-medication recorded in orangutans, and revealing the energetic tightrope that orangutans here must traverse on a daily basis.

BNF's primate research activities in Sebangau are divided into two key areas:

Primate Behavioural Ecology

In-depth studies of Sebangau's primates, understanding their behaviour, ranging, diet, reproduction, social networks and responses to disturbance; and collecting a long-term record of their density and abundance. Many orangutan, gibbon and red langur individuals have been habituated to human presence and are followed during their daily activities with the results used to discover more about the behaviour of some of our closest relatives, contributing to the study of primate evolution and supporting conservation planning in a multiple-use landscape.

Primate Population Monitoring

Our orangutan density research is the longest continuous study of its kind with results mapping a logging-induced crash and subsequent recovery once protected. This aids conservation management planning for this critically endangered species. Our gibbon and red langur population monitoring datasets are also some of the longest available and have provided valuable insights into how these species are managing across different landscapes.

ACADEMIC CREDIT UNITS & TRANSCRIPTS

Credit Units: Attending students will be awarded 8 semester credit units (equivalent to 12 quarter credit units) through our academic partner, Connecticut College. Connecticut College is a private, highly ranked liberal arts institution with a deep commitment to undergraduate education. Students will receive a letter grade for attending this field school (see grading assessment and matrix). This field school provides a minimum of 160 direct instructional hours. Students are encouraged to discuss the transferability of credit units with faculty and registrars at their home institutions prior to attending this

field school.

Transcripts: An official copy of transcripts will be mailed to the permanent address listed by students on their online application. One additional transcript may be sent to the student's home institution at no additional cost. Additional transcripts may be ordered at any time through the National Student Clearinghouse: <http://bit.ly/2hvrkl>.

COURSE OBJECTIVES

This field school focuses on the behavioural ecology of three sympatric Bornean primate species in a tropical peat-swamp forest: orangutans, gibbons and red langurs. Students will explore these animals' lives, learning how to assess population status, activity patterns, diet, ranging and social behaviour, and exploring the challenges and potential solutions for Bornean primate conservation. The school is based in the Sebangau Forest, Central Kalimantan, Indonesia, and students will be living in a functioning field station, with teaching led by school directors with over 20 years' primate research experience on Borneo. You will be immersed in this field environment while attending 'living lectures' with experienced researchers who will teach you about these unique and fascinating primates in their natural home and the strategies needed to conserve them.

PREREQUISITES

There are no academic prerequisites for participation in this field school. All the course inductions and teaching will be carried out in English, so students must have a good working knowledge of the English language for health and safety purposes.

The field school involves physical activities and exposure to the elements and thus requires acceptance that this will not be the typical university learning environment. You will get hot, sweaty, tired, bitten by insects, fall over logs and have to trek in the outdoors. You will be living in a basic forest camp in shared sleeping quarters, with relatively simple (yet tasty) food. It is essential that students are physically and mentally fit and able to cope in a tropical, and at times challenging, environment. Students must accept that unexpected changes in schedule are not unusual, and be ready to spend long hours in the forest (sometimes starting at 4am) with a multi-national team. Last-minute delays, modifications or cancellations to schedules or plans are unavoidable in a jungle environment.

DISCLAIMER – PLEASE READ CAREFULLY

Our primary concern is with education. Traveling and joining forest activities involves risk. Students interested in participating in any IFR program must weigh whether the potential risk is worth the value of the education provided. While risk is inherent in everything we do, we take risk seriously. The IFR engages in intensive reviews of each field school location prior to approval. Once a program is accepted, the IFR reviews each program annually to make sure it complies with all our standards and policies, including student safety.

The IFR does not provide trip or travel cancellation insurance. We encourage students to explore such insurance on their own as it may be purchased at affordable prices. insuremytrip.com or [Travelguard.com](http://travelguard.com) are possible sites where field school participants may explore travel cancellation insurance quotes and policies. If you do purchase such insurance, make sure the policy covers the cost of both airfare and tuition. See this [Wall Street Journal article about travel insurance](#) that may help you decide whether to purchase such insurance.

We do our best to follow schedule and activities as outlined in this syllabus. Yet local permitting agencies, political, environmental, personal or weather conditions may force changes. This syllabus, therefore, is only a general commitment. Students should allow flexibility and adaptability as forest

activities are frequently subject to change.

Indonesia is situated on the equator, and therefore has a tropical climate consisting of a wet and dry season. In Borneo, the wet season is usually October to April, and the dry season May to September. The dry season is usually (but not exclusively) a little hotter than the wet season, and obviously not as wet. Both the wet season and the dry season can last longer than expected. Sudden downpours and tropical storms are to be expected.

As Sebangau is a peat-swamp forest, it is very different to a dryland rainforest. It can be extremely wet, and during the wet season it is flooded – the standing water can be waist deep in many places. Hummocks, tree roots and hidden holes mean that walking can be extremely hard work. Falling over is something of a rite of passage. On top of this the humidity and temperatures are very high. Typical daytime shade temperatures are 32°C at base camp or in the towns and 27°C in the jungle. In the late evenings the temperature can drop in the forest (by up to 7°C), so it can feel quite cool compared to town. To move around the forest some sections have single plank boardwalks, which may be slippery or broken in some places. The rest of the time is spent walking through the forest itself, which can be very muddy or wet. This makes it a rewarding, yet challenging environment.

Hazards and risks in the forest range from the primates themselves to mosquitoes, tree stilt roots through to venomous snakes, spiders and scorpions. Before students begin the course, they will have an induction to the forest and training.

If you have any medical concerns, please consult with your doctor. For all other concerns, please consult with the project director.

LEARNING OUTCOMES

Upon completion of the course, we expect that students will be able to:

- Understand how and why primates behave the way they do, including in relation to activity patterns, diet, ranging and social behavior;
- Understand the different techniques available to monitor primate populations, including the use of modern technology such as camera traps, and the advantages and shortcomings of using different methods for different purposes;
- Understand the issues threatening primate survival, how and why these impact different primate species differently, and what needs to be done to mitigate these threats;
- Apply scientific principles to all aspects of the study of primates and their environment, from conception, to implementation and interpretation;
- Apply this knowledge in the field and present findings to the group.

This learning will draw upon studies conducted in Borneo and from BNF's activities in Sebangau, in addition to other relevant examples from around the world. By the end of the course, participants will have developed a detailed understanding of primate behavioural ecology, acquired training on various primate study techniques, and gained an understanding of the complexities relating to contemporary primate conservation. Participants will also learn the skills needed to create and implement a primate research project. This knowledge and the experiences gained during this two-week period will offer a window into a career as a primatologist and an unforgettable experience!

GRADING MATRIX

Student performance will be assessed by the field school director, based on the following weightings:

25%: Attend and actively participate each scheduled day, including all lectures, group discussions and forest activities.

- 50%:** Student maintains a field notebook and records lessons learned, insights gained and reflections related to assigned reading and lectures, as well as considerations of wider implications of topics covered in the course. This to be done through daily diary entries and written answers to assigned short essay questions. This must be submitted at the end of the course together with a brief 1-2-page field report that summarizes and highlights key findings and lessons learned.
- 25%:** Design a primate behavior study project, present to the group and write learning outcomes in field notebook.

TRAVEL & MEETING POINT

We suggest you hold purchasing your airline ticket until six (6) weeks prior to departure date. Natural disasters, political changes, weather conditions and a range of other factors may require the cancellation of a field school. The IFR typically takes a close look at local conditions 6-7 weeks prior to program beginning and make Go/No Go decisions by then. Such time frame still allows the purchase deeply discounted airline tickets while protecting students from potential loss if airline ticket costs if we decide to cancel a program.

Students can book their international and domestic flight together through a travel agency or online flight search engine or fly into Soekarno Airport in Jakarta and then book a return domestic flight from Jakarta to Tjilik Riwut Airport in Palangka Raya. Tjilik Riwut Airport is not an international airport. At immigration in Indonesia, agents will require students to show a return ticket out of the country, so it is necessary to purchase a ticket to leave the country before starting their journey. For international flights, United, American or Asian airlines such as ANA, Japan Airlines are usually the cheapest flights flying from the US to Indonesia. These can be booked using a travel agency, the airline's website or cut-price websites, like expedia.com, skyscanner.com or priceline.com. Students need to book their flight to arrive into Palangka Raya on the start date of the course and BNF recommends booking a domestic Garuda flight.

At the time of writing, Garuda offer two flights per day from Jakarta to Palangka Raya, at 5:45am and 2:55pm. Students also need to book their flight leaving from Palangka Raya on the final day of the course. Return flights to Jakarta on Garuda are currently scheduled for 8:20am and 5:30pm. BNF recommends ensuring at least four hours between your domestic arrival/departure time and international arrival/departure time for transferring at Jakarta International Airport. BNF requests all students send a copy of their itinerary to join@borneonature.org at least two weeks prior to their arrival to arrange meeting at the airport.

Upon arrival, students will be greeted at the arrivals exit of Tjilik Riwut Airport. If students miss their connection or flight is delayed, BNF asks students to call the number listed on the Syllabus or contact join@borneonature.org. A local emergency cell phone number will be provided to all enrolled students.

VISA REQUIREMENTS

For participation in the course, students are required to obtain an Indonesian Social-Cultural Visa from the nearest Indonesian Embassy or Consulate in the student's country of origin or residence. BNF will be in contact with students approximately two months prior to their departure to send over the Social-Cultural Visa instructions and documents required from BNF to support the visa application. Under the conditions of the Social-Cultural Visa, students are only permitted to participate in activities related to BNF and travelling around the country after the course strictly as a tourist. This means that students are not permitted to travel before the course on this visa or volunteer/participate in activities with other organisations within Indonesia. If students wish to travel before the programme within Indonesia, students will need to enter Indonesia on a Visa-On-Arrival. Students would then need to leave the country to apply for the Social-Cultural Visa sponsored by BNF's Indonesian counterpart at an

Indonesian Embassy in Singapore or Malaysia and re-enter Jakarta using this Social-Cultural Visa. If students do wish to travel after the course, BNF just requests your travel information for the duration of your stay within Indonesia to inform BNF's Indonesian counterpart (sponsoring the visa) of your plans after the activities with BNF have ended.

There is one Indonesian Embassy located in Washington DC and five Indonesian Consulates in the US, which are located in Chicago, Los Angeles, San Francisco, New York and Houston. Students should refer to this website to determine which embassy or consulate to apply through to obtain their visa based on the jurisdiction of each consulate: <http://www.embassyofindonesia.org/index.php/2016/01/24/list-of-consulates-general-of-the-republic-of-indonesia-in-the-united-states-of-america/>. After students have been accepted on the course, BNF will need the students to send over a copy of their passport and CV and confirm which embassy/consulate they will be applying to so the appropriate support letter from BNF's Indonesian counterpart can be prepared. **NOTE:** Passports must have at least 6 months validity and at least two blank pages for visas (amendment and endorsement pages cannot be used for visa purposes). BNF are responsible for providing the support letter from BNF's Indonesian counterpart and photocopy of the identify card of the Indonesian sponsor, both of which are required for the visa applications. In addition to these two documents, students will need to provide:

- Two recent colour passport photo (4cm x 6cm) (white background)-do not staple or affix to the form;
- Completed online application form (in duplicate)-complete online first to register your application (see instructions below) but then send in the application as well with these documents from the link at the top of the page;
- Copy of your US state license;
- Copy of Green Card (for non-US citizens);
- Travel itinerary-both inbound and outbound to prove that you will be returning to the US and leaving Indonesia before 60 days;
- Proof of financial support (bank statement minimum of \$2000);
- For the embassy in Chicago, students will also need to obtain a letter from their university acknowledging their participation in the course.

Prior to sending in these documents, students will need to complete an online application to register their visa application through this link: <https://consular.embassyofindonesia.org/>. Below are instructions for how to fill out the Online Application Form:

Scroll below on the page and click on "Visit Visa-Socio Cultural to Indonesia". To the right of the page (after you have again read through the instructions), you can click on "start your application".

To start, you need to choose the state you live in, which should then correspond to the correct embassy you have already listed on your support letter from Indonesian sponsor. Then print the registration number you are given for future reference.

Purpose of Visit: Social

Visa Type: SINGLE

Length of Stay: State the length of time you will be spending in Indonesia with BNF (maximum for Social Cultural is 60 days).

Point of Entry and Departure: Jakarta

Fill in your travel information below

Address in Indonesia: JALAN SEMERU No. 91, City: PALANGKA RAYA 73112; Province: KALIMANTAN TENGAH; Tel: 0536 3221429

Sponsorship in Indonesia:

Type of Sponsor: OTHER

Organisation's Name: UPT LLG-CIMTROP, UNIVERSITAS PALANGKA RAYA

Contact Name: Dr. Yusurum Jagau

Address: KAMPUS UNPAR TUNJUNG NYAHO; City: PALANGKA RAYA 73111; Province: KALIMANTAN TENGAH; Tel: 0536 3236880

If you have flight details, please fill them in at the bottom – if not leave the section blank. NB: The Embassy has been known to insist on a ticket proving you plan to leave Indonesia.

Personal Information – Occupation:

If enrolled at University: "STUDENT" then your University address

If not enrolled at University: Tick OTHER and write NOT APPLICABLE for Name of Company and NOT APPLICABLE for any other information involving company details

Fill in other information as so, with passport info and upload a visa photo.

Students need to print two double-sided copies of their application form to send with their application. When applying, students should check embassy opening hours – the embassy is closed on both US and Indonesian national holidays. Visas take 3-5 working days to process if submitted in person and 5-7 working days when submitted via mail. The cost of the Social-Cultural Visa is \$50 for the Chicago, Houston, Los Angeles and San Francisco Consulates and Washington DC Embassy and \$55 for the New York Consulate. Payments can be made by company checks, cashier's checks and money order only. Students should address the money order to the "Indonesian Consulate General" or "Indonesian Embassy" for the respective office. For visa applications by mail, students should submit a prepaid self-addressed return envelope by U.S. Postal Service Express Mail/FedEx (No Ground FedEx) or UPS with tracking number. Please note that the embassy does not have expedited service and students should send the application and required documents listed above to the respective embassy address.

BNF has separate visa instructions for each Indonesian Embassy/Consulate within the US, as well as several other Indonesian Embassies/Consulates throughout the world, so BNF is happy to assist citizens of other countries with the application process via other Indonesian Embassies. Upon arrival at Immigration in Jakarta, students should walk past the Visa-On-Arrival desk, as they will already have the Social-Cultural Visa and go directly to the main foreigners' immigration desks.

ACCOMMODATION

At the field site, students sleep on bunk beds in single-sex dormitory style rooms, equipped with mosquito nets, pillows, mattresses and sheets provided by BNF. Students should bring their own sleeping bag/sleeping bag liner. Shelves and plastic storage boxes are provided for personal belongings. There are no fans or air conditioning at camp. There is a common area with tables for the students to work at and a separate meeting/workshop space within the accommodation block where lectures will be held. Students are responsible for hand washing their own clothes, but all washing equipment will be provided at camp.

There is only one western-style toilet at camp, all other toilets are squat toilets, as is standard throughout Indonesia, and the camp is equipped with a sewage system. Toilet paper is provided, but this is not flushed down the toilets and is disposed of separately. The bathroom in Indonesia is called a 'mandi' and 'to mandi' is to take a shower. These are cubicles with a water supply, in a large bucket, which you pour over yourself. There is no hot water, but water is instead pumped from beneath the surface of the peat to be used for the bathrooms and washing clothes.

Camp is equipped with a generator, which runs from 5pm to 10pm every evening, providing time to charge electrical equipment such as phones, laptops and cameras. While at camp, and within the forest, the internet signal is generally strong enough to contact friends and family using Whatsapp. Sending and receiving emails is sometimes possible, but cannot be relied upon. There is no WiFi, so students need to unlock their US phone and purchase an Indonesian SIM card that is specifically for internet and which usually costs about US\$5.

Meals are served at camp regularly at 7am, midday and at 6pm. Snacks are also provided every day for students to take into the forest with them. Meals are traditional Indonesian food, which includes rice with every meal. Drinking water and hot water for tea, coffee and hot chocolate is freely available at camp. BNF makes every effort to accommodate vegetarian, vegan and any other dietary preferences/food allergies at camp. This will be more difficult for the time spent in Palangka Raya, especially for vegans, so BNF recommends students consider bringing supplements/multi-vitamins along with them. Please note: a severe peanut, soy or egg allergy could be difficult to accommodate as these foods are used frequently in Indonesian cooking, but BNF has no problem with accommodating gluten or lactose intolerant diets.

COURSE SCHEDULE

All IFR field schools begin with safety orientation. This orientation includes instruction on how to behave at the field site, proper clothing, local cultural sensitivities and sensibilities, potential hazards posed by fauna and flora, review IFR harassment and discrimination policies and review of the student Code of Conduct.

The provisional schedule below is designed to present the theory and rationale in lecture form, prior to carrying out practical sessions in the field. The schedule is flexible and subject to potential alterations or delays due to weather or other unforeseen circumstances that are inherent when living in the jungle.

DATE	MORNING	AFTERNOON	EVENING
13	Arrive Palangka Raya; check in to hotel; meet rest of team and relax		
14	Check in at BNF office, complete admin; introductory lecture, buy essential supplies and SIMs, visit local university for opening ceremony.		Lecture: Introduction to BNF and Primates of Peat-swamp Forest
15	Travel to camp; Camp induction and Health & Safety briefings	<u>Practical</u> - Introductory forest walk; GPS/compass training	Settle in, Introduction to the course and coursework.
16	<u>Practical</u> - Introduction to Forestry studies including learning about survey design, tree measuring, habitat assessment and phenology	Lecture - Methods of Surveying Primates	Relax and prepare for early start next morning
		<u>Practical</u> – learn how to use camera trap technology for studying primates	
17	<u>Practical</u> – Learn about gibbon population survey method (call triangulation)	<u>Practical</u> – Learn about the triangulation method to determine gibbon population and	Lecture - Primate Behaviour 1 - study methods, activity budgets, diet and energetics

		<u>Practical</u> - learn about orangutan population estimation	
18	Lecture - Introduction to BNF Primate Behavioural Ecology Data Collection. To include inter-observer reliability, explanation of BNF primate datasheets, etc.	<u>Practical</u> -: Learn how to use ethograms and datasheets, how to measure tree heights and estimate travel distances	Lecture - Primate Behaviour 2 - social behaviour, reproduction, communication and development
19-23	<u>Practical</u> - All day: Rotating small groups to learn how to study primate behavior, including activity budgets and the use of ethograms Rotating Days off for Rest		Q & A, review and discussion of day's activities with school directors and rest of group. Short Talks on <i>Issues in Orangutan and Gibbon Behavior and Conservation</i>
24	<u>CONSERVATION DAY 1: Practical</u> Peatland reforestation and hydrological restoration		Lecture - Orangutan Conservation in Kalimantan
25	<u>CONSERVATION DAY 2: Practical</u> – Join local children's conservation education session in camp with BNF Education Team	<u>Practical</u> – Join the Education Team's activity with local children's group, Anak Sebangau, in the village of Kereng Bangkirai	Overnight in hotel at Rungan Sari
26	CONSERVATION DAY 3: Visit to an orangutan sanctuary including information centre and pre-release islands; lunch and relax at hotel; return to camp late afternoon		
27-30	Learn how to design a primate behavior project to answer specific, defined questions and hypotheses, considering elements such as ethics, resources required, problems and solutions for field implementation etc.		
31	Present learning outcomes from the above to the group; submit field notebooks; pack and clean up	Return to Palangka Raya	Farewell dinner and wrap up
1	Depart from Palangka Raya		

EQUIPMENT LIST

- Rucksack (65 Litres or more); no suitcases please
- Lightweight sleeping bag (1-2 season) or cotton sleeping bag liner. It can get chilly at night in the forest (min. 18°C), particularly once students have acclimatised, so you are advised to bring an extra blanket or thicker liner with you
- Day pack (20-30 Litres) to carry daily supplies in the forest, which include food, water, first aid kit, equipment, poncho etc. A rain cover is also useful. Forest colours only please (greens and browns), no bright colours
- Waterproof bags for any electrical equipment □ Head torch (LED recommended) plus batteries. AA and AAA batteries are available in Palangka Raya, but large square head torch batteries are not
- Whistle
- Compass (Silva quality)

- Water-resistant digital watch(not essential)
- 2 Litre water bottle.
- Camera
- Sunglasses
- Mosquito repellent
- Towel (microfiber towels dry quicker, as do sarongs (see below))
- Sarong which can be purchased in Palangka Raya (quick-drying, cheap and culturally acceptable)
- Lightweight walking boots (Season 2) or walking shoes, which will provide sufficient support. Some people choose to wear wellington boots or trainers, which can be purchased in Palangka Raya (generally only European sizes 37-42 are available). BNF doesn't recommend purchasing expensive boots, as peat water is very acidic and tends to destroy most boots after continuous use. If students bring hiking boots, BNF advises wearing them prior to coming to camp to ensure they are comfortable
- Waterproof jacket or poncho in forest colours (greens and browns)
- Sun hat
- Sweat bands, bandana or head bands (not essential)
- Swimwear (also need shorts and t-shirt to cover up) (not essential)
- Flip flops or sandals
- Min two sets of casual clothes for relaxing in camp. T shirts and longer shorts are ok, but no short shorts please!
- Field clothes in forest colours only as bright colours disturb wildlife. BNF advises against purchasing expensive field clothes for the course, as they become frayed or stained in the forest. Army surplus shops are a good source of cheap clothing. Natural materials, such as cotton, are cool and quick drying

The following list is recommended as a minimum number of field clothes items to bring:

- Two pairs of forest trousers
- Two loose long sleeve tops/shirts
- Two t-shirts
- Two pairs of normal socks
- Two pairs of knee high/long socks/football socks

First Aid Kit

Students will take a small first aid kit with the essentials into the forest and leave other supplies at camp, so a waterproof first aid bag is useful. The starred items can be purchased in Palangka Raya but you are advised to arrive well-prepared.

- Painkillers (paracetamol/ibuprofen) *
- Antihistamine creams and tablets for treatment of insect bites
- Fungicidal cream/antifungal dusting powder
- Plasters (band-aids) *
- Thick bandages (1 long one) *
- Eye drops *
- Alcohol wipes and antiseptic cream/spray *
- Anti-malarial tablets
- Anti-diarrhoeal tablets *
- Scissors and tweezers

- Sachets of re-hydration powders, such as Dioralyte (essential for replacing lost minerals from excessive perspiration)
- Talcum powder recommended for sweat rash *
- Sun screen (a high SPF as we are 1^o off the equator and the sun can be very strong), after sun lotion and lip protection cream. Only advised to bring a small bottle, as you won't be out in the sun often.
- Support bandage, if you have had any previous ankle or knee injuries.
- 'Epi Pen' if you have strong allergies to stings/bites/nuts. Please consult with your GP.
- Any personal medication that you normally bring e.g. Asthma inhaler. Also bring spares.
- For female volunteers; tampons and, if prone to cystitis, one course of preferred treatment.

Other

- ATM card/credit card
- Photocopies/scans of any important documentation, including passport and visa
- Two-prong round plug converter (220v), which is the same as European plugs. Can be used both in town and at camp
- Chargers for any electrical equipment
- Entertainment for when relaxing in camp (e.g. playing cards, books, games, MP3 player etc.)
- Decent waterproof binoculars, 10 x 42 magnification or more. Binoculars are recommended for the field as they are very useful and we do not have spares to lend to people.
- Indonesian phrasebook – students will be working on a daily basis with Indonesian field assistants, with varying degrees of conversational English.
- Small selection of stationery including notebook, pens and pencils *
- USB pen – BNF can back up your photos for you during your visit. USBs are also useful for storing copies of important documentation
- Silica gel
- Multi-vitamins
- Laptop (we strongly recommend you bring a laptop)
- Hammock

CURRENCY EXCHANGE

Traveller's cheques cannot be changed in Palangka Raya and, while possible for notes of large denominations, it can be difficult to exchange cash. There are many Bureau de Change desks in the Jakarta airport, but they may be closed if students arrive late in the evening or early morning, and exchange rates are poor. By far the easiest way to obtain money is via the ATMs (cash machines) in Palangka Raya or at the airport in Jakarta upon arrival in Indonesia. There are many banks in Palangka Raya, which allow international ATM/debit card withdrawals, but BNF advises students to contact their bank before leaving the country to check about international transaction and withdrawal fees and place a note on their bank cards so the cards are not blocked by the bank for suspicious transactions while using the card in Indonesia.

CULTURAL AWARENESS

Indonesia is a tolerant, but socially conservative, religious country, so BNF asks that students dress respectfully and will provide students with further social and cultural awareness information upon arrival in Palangka Raya. At all times in Jakarta, Palangka Raya and at the field site, women are requested to wear a bra and to cover their cleavage, shoulders, upper arms, stomach and legs above the knee, and men are requested to wear long shorts or pants and shirts (no bare-chested). This is non-negotiable and BNF takes a stern view of people who ignore these rules. There are not many foreigners living in

Palangka Raya, so people may approach students and ask to take a photograph together. People are generally friendly throughout Indonesia and this small gesture is very polite if students wish to oblige.

REQUIRED READINGS

PDF files of all mandatory readings will be provided to enrolled students via a shared Dropbox folder.

1. Altmann J (1974) Observational study of behaviour: sampling methods. *Behaviour* 49:227–265.
2. Askew, J.A. and Morrogh-Bernard, H.C., 2016. Acoustic Characteristics of Long Calls Produced by Male Orang-Utans (*Pongo pygmaeus wurmbii*): Advertising Individual Identity, Context, and Travel Direction. *Folia Primatologica*, 87(5), pp.305-319.
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