From: "William B. Karesh" <karesh@ecohealthalliance.org>

Sent: 04/03/2017 8:00:13 AM (-07:00)

To: "David Wolking" < djwolking@ucdavis.edu>
Cc: "Jonna Mazet" < jkmazet@ucdavis.edu>

Subject: Re: Reminder: Next PREDICT Management Team call scheduled for 4/4 @ 10 am PST/1 pm EST

Ok, thanks.

BK

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

EcoHealth Alliance 460 West 34th Street - 17th Floor New York, NY 10001 USA

+1.212.380.4463 (direct) +1.212.380.4465 (fax)

www.ecohealthalliance.org

President, OIE Working Group on Wildlife

Co-chair, IUCN Species Survival Commission - Wildlife Health Specialist Group

EPT Partners Liaison, USAID Emerging Pandemic Threats - PREDICT-2 Program

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On Apr 3, 2017, at 10:58 AM, David J Wolking < diwolking@ucdavis.edu > wrote:

Hey Billy,

This is still internal and not for circulation. Jonna left this document (with edits/comments retained) in Kendra and Andrew's hands to finalize and share with CDC if they think it is ready. We will likely discuss tomorrow on the call how to proceed if USAID still has questions, and there is another call tentatively scheduled for Wednesday at 8AM PDT but no word yet if anyone from CDC is joining so that is up in the air.

More to come soon tomorrow I'm sure (copied Jonna here too in case she wants to weigh in from her perspective).

David

On Mon, Apr 3, 2017 at 7:41 AM, William B. Karesh < <u>karesh@ecohealthalliance.org</u>> wrote: Can you share CDC comments on Ebola Host Project?

BK

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

EcoHealth Alliance 460 West 34th Street - 17th Floor New York, NY 10001 USA

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On Apr 3, 2017, at 10:25 AM, David J Wolking < diwolking@ucdavis.edu > wrote:

Hi there,

Please find attached the agenda and supporting docs for tomorrow's PREDICT management team call. I'll follow-up with the calendar invites next.

David

PREDICT Management Team Agenda

Tuesday, April 4, 2017

10:00-11:00 PDT/1:00-2:00pm EDT

REDACTED Access code REDACTED

International Dial-in number: REDACTED (toll charges apply)

Standing items

USAID Updates

- 1. Administrative items
 - a. Budget issues
 - b. Pending subawards and subcontracts (attachment)
 - c. Meeting planning and priorities discussion
 - d. M&E (EPT-2, GHSA, and Indicator Development Summary report)
 - e. Semi-annual report update
 - f. New mechanism for co-branding?
- 2. Response to CDC comments regarding Ebola Host Project
- 3. Mission communications round-up
 - a. US Ambassador visit in Ghana update
- **4. Outbreak updates** (Monkeypox in RoC, FMD in Sierra Leone, Febrile rashes in Cameroon, Encephalitis in Bangladesh)
- 5. EPT partner collaboration/coordination updates and external panel report (Billy)
- **6. Publication updates** (MERS-CoV in mBio, MERS pub from Egypt team, others...?)

On Thu, Mar 30, 2017 at 1:36 PM, Elizabeth Leasure < <u>ealeasure@ucdavis.edu</u>> wrote:

Hi all. Just a quick reminder that our next SMT call is Tuesday, April 4th. We will send out an agenda prior to the call.

Thanks,

Liz

Elizabeth Leasure

One Health Institute

University of California, Davis

530-754-9034 (office)

REDACTED (cell)

From: Elizabeth Leasure

Sent: Monday, March 20, 2017 4:15 PM

To: David John Wolking; 'Alisa Pereira Emerging Threats Division'; 'Cassandra Louis Duthil'; Christine Kreuder Johnson; 'Clements, Andrew (GH/HIDN)'; 'Eddy Rubin'; 'Lindsay Parish'; 'Peter Daszak'; Jonna Mazet; 'Shana Gillette'; 'William Karesh'; 'PREDICTMGT'; 'Cara J. Chrisman'; 'francisco@ecohealthalliance.org'

Cc: 'Ava Sullivan'; 'Alison Andre'; 'Amanda Fuchs'; 'Catherine Machalaba'; 'Evelyn Luciano'; 'Molly Turner'; 'Taylor Elnicki'

Subject: Next PREDICT Management Team call scheduled for 4/4 @ 10 am PST/1 pm EST

Hi everyone. Just a quick reminder that our next SMT call is scheduled for <u>Tuesday, April</u> **4**th from **10-11** am PST (**1-2** pm EST) We will send out an agenda prior to the call.

Thanks!

Liz

Elizabeth Leasure

One Health Institute

University of California, Davis

530-754-9034 (office)

REDACTED (cell)

<PREDICT MT Agenda (4.4.17)_final.docx><PREDICT-2 New Subaward Status Tracker_updated_3-30-17_SMT.xlsx>

<PREDICT-CDC Guinea responses to USAID 29 March 2016_AC edits JM (1).docx>

From: "William B. Karesh" <karesh@ecohealthalliance.org>

Sent: 04/24/2017 7:57:29 AM (-07:00)

To: "sja2127@cumc.columbia.edu" <sja2127@cumc.columbia.edu>

Cc: "Lipkin, lan W." <wil2001@cumc.columbia.edu>; "Jonna Mazet" <jkmazet@ucdavis.edu>;

"Tracey Goldstein" <tgoldstein@ucdavis.edu>; "Nathan Wolfe" <nwolfe@metabiota.com>; "Peter Daszak" <daszak@ecohealthalliance.org>; "Kramer, Sarah C." <sck2165@cumc.columbia.edu>; "Wells, Heather L."

; "Xiaoyu (Jason) Che" <xc2273@columbia.edu; "Dr. Damien Joly"

<djoly@metabiota.com>; "Chris Johnson" <ckjohnson@ucdavis.edu>; "Allison Harrington" REDACTED

"Denise Greig" REDACTED "Dr. Steve Morse" <ssm20@columbia.edu>

Subject: Re: Global CoV paper accepted

Great news!! Congrats.

BK

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

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On Apr 23, 2017, at 10:42 AM, Anthony, Simon J. < sja2127@cumc.columbia.edu > wrote:

Dear all,

I just received word from Virus Evolution that our global coronavirus paper has been accepted for publication! Congratulations!!! AND the sun is shining today, so a jolly good day all round. :o)

I'll keep you posted on the exact publication date.

Cheers!!!

S.

Simon J Anthony, D.Phil Assistant Professor, Department of Epidemiology Center for Infection and Immunity, Columbia University

722 West 168th Street, 17th Floor NY, NY, 10032

Email: sja2127@cumc.columbia.edu
Mobile: REDACTED

Mobile: REDACTED Office: 212-342-0558

"Martyn Jeggo" REDACTED From: 10/09/2019 1:03:00 PM (-07:00) Sent: "Christel Smeys" <c.smeys@onehealthplatform.com> To: REDACTED "John Mackenzie" Cc: REDACTED "MARK RWEYEMAMU" "Linfa Wang" REDACTED ; "Ottorino Cosivi" <cosivio@paho.org>; "Marietjie Venter" REDACTED REDACTED ; "Peninah Munyua" <ikg2@cdc.gov>; "Rebecca Katz" < REDACTED REDACTED Madoff" REDACTED ; "Jakob Zinsstag" <</p> ; "Bernadette Ramirez" ; "Tracey McNamara" <tmcnamara@westernu.edu>; "Jonna Mazet" <jkmazet@ucdavis.edu>; REDACTED 'William Karesh" <karesh@ecohealthalliance.org>; "Julie Fitzpatrick" · REDACTED ; "Pip Beard" REDACTED >; "Joanne Sharp" < REDACTED : "Mark Bronsvoort' REDACTED ; "Simon Girling" < REDACTED ; "Sue Welburn" < "Grant Stentiford" REDACTED "Delia Grace" REDACTED ; "Patrick Drury" REDACTED ; "Ross Fitzgerald" -REDACTED "Greg Gray" < REDACTED "Katinka DeBalogh" REDACTED "Julianna B. Lenoch" <Julianna.b.lenoch@usda.gov>; "DJIKENG ; "Richard Kock" REDACTED ; "Dilys Morgan" Appolinaire" **REDACTED** REDACTED REDACTED ; "Albert Osterhaus" "Robert Clarke" < REDACTED; "c.vanlangendonck@onehealthplatform.org" <c.vanlangendonck@onehealthplatform.org>; "Neema Heri REDACTED >; "Lisa Boden" REDACTED Mwakabonga" -Re: Invitation to TC meeting of the WOHC2020 Scientific Programme Committee Subject:

Hi Christel,

I have noted the date and time and will do my utmost to attend (it is 03.00 in the morning on the "day that stops a nation").

Thanks,

Martyn

Professor Martyn Jeggo Chair, AUSGEM Governing Board, ILRI Board Member,

E mail REDACTED

REDACTED

On 10 Oct 2019, at 3:12 am, Christel Smeys <c.smeys@onehealthplatform.com> wrote:

Dear Scientific Programme Committee members

On behalf of Ab Osterhaus, chair of the Scientific Programme Committee of the 6th World One Health Congress, 14-18 June 2020 in Edinburgh, Scotland, I would like to invite you to the Scientific Programme Committee telephone conference meeting on Monday November 4, 2019 at 5 pm CET (Belgian time). The toll-free dial in details are enclosed below.

Preparations for the 6th World One Health Congress are well underway. We opened registrations and launched the call for abstracts in July and are now looking forward to shaping the programme of the One Health Science programme track. The aim of the meeting is to select the 14 session topics as well as appoint the abstract selectors.

We will provide you with a meeting agenda and relevant documents closer to the date. May I ask to confirm your participation at your earliest convenience? Many thanks in advance.

Kind regards

Christel **#WOHC2020**

WOHC2020 TC SPC committee Mon, Nov 4, 2019 5:00 PM - 6:00 PM CET

Please join my meeting from your computer, tablet or smartphone.

REDACTED

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Christel Smeys

REDACTED

c.smeys(a)onehealthplatform.org www.onehealthplatform.org

ONE HEALTH PLATFORM REDACTED

REDACTED



From: Klena, John D. (CDC/OID/NCEZID) <irc4@cdc.gov>

To: Brian Bird
bhbird@ucdavis.edu>;Jonna Mazet <jkmazet@ucdavis.edu>;Nichol, Stuart T.

(CDC/OID/NCEZID) <stn1@cdc.gov>

CC: Tracey Goldstein <tgoldstein@ucdavis.edu>;Christine Kreuder Johnson

<ckjohnson@ucdavis.edu>;Jon Epstein <epstein@ecohealthalliance.org>;William B. Karesh
<karesh@ecohealthalliance.org>;Elizabeth S Chase <eschase@ucdavis.edu>;Towner,

Jonathan (Jon) (CDC/OID/NCEZID)" < jit8@cdc.gov>

Sent: 1/3/2017 1:47:03 PM

Subject: RE: CDC visit Jan 5-6, entry to campus approved

Be safe

From: Brian Bird [mailto:bhbird@ucdavis.edu] Sent: Tuesday, January 03, 2017 4:32 PM

To: Jonna Mazet; Nichol, Stuart T. (CDC/OID/NCEZID)

Cc: Tracey Goldstein; Christine Kreuder Johnson; Jon Epstein; William B. Karesh; Elizabeth S Chase; Klena, John

D. (CDC/OID/NCEZID); Towner, Jonathan (Jon) (CDC/OID/NCEZID)

Subject: Re: CDC visit Jan 5-6, entry to campus approved

Just FYI- the weather here is pretty bad (big snow storm). My original flight out of Bend to Atlanta might be cancelled tomorrow. If so I can most likely drive and catch a flight from Portland. I'll let you guys know once I have it figured out.

What bad timing!!! :(

-b

From: "Robert Salerno" REDACTED

Sent: 01/06/2017 1:21:43 PM (-08:00)

To: "William B. Karesh" < karesh@ecohealthalliance.org>

Cc: "David Wolking" <djwolking@ucdavis.edu>; "Jonna Mazet" <jkmazet@ucdavis.edu>; "Katie Taratus" **REDACTED** ; "Catherine Machalaba" <machalaba@ecohealthalliance.org>; "Susan Scribner"

REDACTED

Subject: Re: EPT2 Partner Collaboration

Hi Billy:

First - we love collaborating w/ PREDICT and I'm so pleased to hear that P&R collaborations are featured in your weekly meetings! Our plan is to share this concept in more detail w/ USAID but only after we get a better sense of specific needs and a tentative agenda.

Let's all chat when you're back from the meetings in San Francisco!

Best wishes,

Rob

Robert H. Salerno, MSc Technical Integration Manager Preparedness and Response Project USAID Emerging Pandemic Threats 2 Program (EPT 2)

whatsapp: REDACTED

o: +1.301.771.7714 m: REDACTED

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From: "William B. Karesh" <karesh@ecohealthalliance.org>
To: Robert Salerno REDACTED

Cc: Jonna Mazet < jkmazet@ucdavis.edu>, Catherine Machalaba < machalaba@ecohealthalliance.org>, David Wolking < djwolking@ucdavis.edu>, Susan

Scribner REDACTED Katie Taratus REDACTED

Date: 01/06/2017 04:06 PM
Subject: Re: EPT2 Partner Collaboration

Hi Rob,

This all sounds good to me. Right now I would still be your point of contact to PREDICT-2 and will ehlp in plugging in more people as the different discussions and work products are identified.

Will you be running this by USAID? We are happy to be supportive and as you know, we routinely include our collaborative work with P&R in our annual work plans for USAID approval.

We will all be in San Francisco area next week for a PREDICT meeting, so I'm guessing the following week

might be better for a phone call.

All the Best,

Billy

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

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On Jan 6, 2017, at 3:41 PM, Robert Salerno

REDACTED > v

Dear Billy and Jonna:

Nice seeing you in Australia last month - if only for a short time! As you know, over the course of the last 18 months, from Jamborees to EPT2 M&E Task Force Meetings in Rome, a number of ideas for program collaboration have surfaced. In some cases, these ideas have turned into actual one health collaborations among EPT2 partners - including sharing and integrating technical knowledge, leveraging resources, and supporting information exchange. While good collaboration is happening at the country-level, facilitated by the USG CIP development process and strong working relationships among our field teams, there is still no mechanism for regular EPT2 wide communication and collaboration at the global level.

In 2017, P&R would like to strengthen our EPT2 partnerships and better leverage the entire USG EPT investment. This an opportunity to shape a global EPT learning agenda, identify priority areas for thought leadership, and work together on specific areas of focus that may include research/evidence to policy initiative, global communications and advocacy, and supporting the development and roll out of EPT tools, etc.

We're still tossing around ideas here at P&R HQ about the appropriate rhythm and content of the coordination calls, some of the logistics, and how to make these useful to EPT project partners. In the interim, I would like to chat with you briefly in the coming couple of weeks to hear more about your ideas, discuss potential agenda items, and schedule the first of our EPT2 Partner Calls.

Are you available to chat briefly next week?

Thanks so much!

Best,
Rob

Robert H. Salerno, MSc

Technical Integration Manager

Preparedness and Response Project

USAID Emerging Pandemic Threats 2 Program (EPT 2)

o: +1.301.771.7714

m: REDACTED

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From: "Elizabeth S Chase" <eschase@ucdavis.edu>

Sent: 01/11/2017 4:11:30 PM (-08:00)

To: " (andre@ecohealthalliance.org)" <andre@ecohealthalliance.org>

Cc: "Jonna Mazet" < jkmazet@ucdavis.edu >; "daszak (daszak@ecohealthalliance.org)"

<daszak@ecohealthalliance.org>

Subject: FW: 2017 CUGH Conference Required Documents

Attachments: CUGH CNE Form.doc, CUGH CME Form.docx, Mazet CUGH 2017 GVP Sympoium Proposal.docx

Hi Alison,

Just doing some housekeeping and noticed I don't have the attached forms from Peter yet. He is listed as a panel participant for the CUGH Conference in April 2017 and they are asking for the forms from all panelists. You may have sent it directly to them, which is great. I just sent them Jonna's, Eddy's and Dennis's. The deadline is January 31 so if you haven't sent them yet, you have a little time. If you want to send them to me to forward, that is ok too. Whatever is easiest for you.

I am also attaching the original GVP Symposium proposal for your records. If there is anything I can do to assist, please let me know.

Thanks so much,

Liz

From: Elizabeth S Chase

Sent: Monday, December 12, 2016 12:42 PM

To: (andre@ecohealthalliance.org) <andre@ecohealthalliance.org>; Elnicki Taylor (telnicki@metabiota.com) <telnicki@metabiota.com>; Cassandra Louis Duthil (clouisduthil@usaid.gov) <clouisduthil@usaid.gov>; Cara Chrisman@usaid.gov>

Subject: FW: 2017 CUGH Conference Required Documents

Hello All,

The CUGH Conference email below was sent to Jonna as the lead contact for the GVP panel at the conference scheduled for April 2017. I have replied with our acceptance. (see below)

They are asking for the attached forms from every GVP panelist. Panel members are Dennis, Peter, Eddy and Jonna. The deadline for submission back to CUGH is January 31. Once completed, I am happy to collect for submission as a single packet, or if your prefer to send to CUCH at your convenience, just copy me for tracking.

If you need additional information, let me know.

Thanks, Liz

From: Elizabeth S Chase

Sent: Monday, December 12, 2016 12:25 PM **To:** 'skenne26@jhmi.edu' <<u>skenne26@jhmi.edu</u>>

Cc: 'Jonna Mazet' < <u>ikmazet@ucdavis.edu</u>>; Rebecca Benmahdi < <u>rbenmahdi@metabiota.com</u>>; Elnicki Taylor (<u>telnicki@metabiota.com</u>>; Cassandra Louis Duthil (<u>clouisduthil@usaid.gov</u>) < <u>clouisduthil@usaid.gov</u>>; Cara Chrisman < <u>cchrisman@usaid.gov</u>>; daszak (<u>daszak@ecohealthalliance.org</u>) < <u>daszak@ecohealthalliance.org</u>>; (<u>erubin@metabiota.com</u>) < <u>erubin@metabiota.com</u>>; (<u>dcarroll@usaid.gov</u>)

<dcarroll@usaid.gov>

Subject: RE: 2017 CUGH Conference Required Documents

Greetings Rachel,

I provide administrative assistance to Dr. Jonna Mazet and am replying on her behalf to process the CUGH Conference documents and arrangements. I look forward to working with you.

We are delighted that "The Global Virome Project: a first step toward ending the pandemic era" is on the conference agenda. By this email, the panel accepts the invitation to participate. Dr. Mazet will continue as panel lead contact, supported administratively by myself.

The originally submitted proposal includes names/titles of the participants along with a brief bio on each. We will submit the required conference documents before the deadline of January 31.

Sincerely, Liz

Liz Chase

Executive Assistant to Dr. Jonna Mazet One Health Institute University of California, Davis

530-752-3630 eschase@ucdavis.edu

From: REDACTED On Behalf Of Jonna Mazet

Sent: Monday, December 12, 2016 11:10 AM

To: Elizabeth S Chase <eschase@ucdavis.edu>

Subject: Fwd: 2017 CUGH Conference Required Documents

----- Forwarded message -----

From: Rachel Kennedy <skenne26@jhmi.edu>

Date: Fri, Dec 9, 2016 at 8:01 AM

Subject: 2017 CUGH Conference Required Documents

To: REDACTED

Good morning Dr. Mazet,

I hope this finds you well and that you've had a pleasant start to the holiday season. My name is Rachel Kennedy, and I am assisting the Consortium of Universities for Global Health planning committee on putting together the 2017 CUGH Conference details.

Congratulations on "The Global Virome Project: a first step toward ending the pandemic era" being invited to participate in the conference this Spring. Please let me know **as soon as possible** if you officially accept the invitation to participate in the conference.

If your panel chooses to accept, please let me know if you will continue to be the lead contact, or if that responsibility will be shifting to someone else.

Upon acceptance, please also note the following will need to be completed and confirmed:

- We will also need to be made aware of any changes to your panel description, including speaker confirmations, panel description, or any other details which may have changed from your original proposal.
- In addition, please see the attached forms which MUST be completed by **ALL SPEAKERS & MODERATORS** in your panel. We ask that these please be submitted to us **no later than JANUARY**31, 2017.
 - o These forms will ensure that the conference is accredited to receive Continuing Medical Education and Continuing Nursing Education credits for all attendees. We ask that you please scan and email these to Rachel Kennedy at skenne26@jhu.edu as soon as possible.

We also wanted to inform you, if your panel accepts the invitation to participate, that at this time your session will be scheduled for April 9, 2017 between 11:30am - 1:00pm.

Again, we are excited to have you and your panel as a part of the 2017 CUGH Conference. I apologize for the lengthy email, and please let me know if you have any further questions.

В	est,
D	est,

Boston University School of Medicine Continuing Medical Education/Continuing Nursing Education 72 East Concord Street, A402 Boston, Massachusetts 02118 T 617-638-4605 F 617-638-4905 www.bu.edu/cme



DISCLOSURE OF COMMERCIAL RELATIONSHIPS

			1			
Activity Title:	2017 Annual CUGH Conference		Activity Date:	April 7 to 9, 2017		
Name:	Name:		Degrees:			
Content Area/Topic:						
☐ Faculty ☐ Course Dire	ector Author	☐ ☐ Moderat Reviewer	or	rse		
As a provider accredited by both objectivity, and scientific rigor in to participate in an accredited a relationships with *commercial conflict of interest exists; and, if including the absence of such reparticipation.	n all its individually proc ctivity who is in a posi interests. The intent o iso, 2) if that conflict o	ovided or jointly provided educ tion to control the content is r f this disclosure is to aid the Cl an be resolved. Relevant rela	cational activities. equired to disclose ME/CNE Office in d tionships identified	Any individual being considered e any * <i>relevant financial</i> letermining: 1) if a relevant don the disclosure form,		
*Commercial Interest: As defined by the ACCME and ANCC is any entity producing, marketing, re-selling or distributing health care goods or services consumed by, or used on, patients. Or an entity that advocates for use of products or services of commercial interest organizations.						
*Relevant Financial Relationships are those in which an individual (including spouse/partner) has both: A personal financial relationship (any amount) with a commercial interest within the past 12 months whether the relationship has ended or is currently active. Control in planning or presenting educational content addressing specific products/agents/devices of the commercial interest (not simply a whole class of products or content about the whole disease class						
Section 1: Disclosure of Relevant Financial Relationships Regarding your role in this CME activity, have you (or your spouse/partner) had a financial relationship in the last 12 months with a commercial interest that is relevant to or could impact the content included in this activity? Relationships include grant/research support, stockholder, consultant, speaker's bureau, employee, other (e.g., royalty) NO Proceed to Section 2						
Recipient: Self or Spouse/Partner	Company	Description Relation		Content Area of Relationship		
Example: Self	ABC Company	Grant/Research Sup Consultant, Stockho		Breast Cancer Research		
No dialogue and describe	anahina wish Cr		tional lines lines	**************************************		
No disclosure needed for relati	onsnips with non-profit	s or government units. Add addi	tional lines or sheet	it necessary		
Section 2:						

Have you ever been excluded, debarred, suspended or otherwise deemed ineligible to participate in federal health care programs or

4/2016

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 If I am discussing specific healthcare products or services, I will use generic names to the extent possible. names, I will use trade names from several companies when available, and not just trade names from any I attest to compliance with all applicable laws, including copyright laws. 	
information about the drug/product, and I will include information about reasonable alternative treatme a suggestion of superiority of one drug/product over another, this suggestion will be supported by eviden	ent options. Where there is ace-based data.
information and be presented in a balanced, objective manner.For any drug/product discussed, I will objectively select and present data, fairly present both favorable at	
meta-analysis, etc.). • Research findings and therapeutic recommendations in my content will be based on scientifically accurate	
 All scientific research referred to, reported or used in my content in support or justification of a patient c will conform to the generally accepted standards of experimental design, data collection and analysis. To quality of data provided, I will present the source and type or level of evidence (i.e. animal study, random 	care recommendation help learners judge the
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 I have disclosed all relevant, or lack of, financial relationships, and I will disclose this information to learn If I have been trained or engaged by a commercial entity or its agent as a speaker (e.g. speaker's bureau) interest, the promotional aspects of that presentation will not be included in any way with this activity. 	
(This section does not pertain to planners. Planners may proceed to signature section)	
Section 4: Content Validation / Attestation:	
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☐ I plan on discussing unlabeled/investigational uses of a commercial product and will disclose this to t	he audience.
Section 3: Unlabeled/Investigational Uses Should your presentation include discussion of any unlabeled/investigational use of a commercial product, disclose this to the participants. Please indicate below whether you intend to discuss unlabeled/investigation product	
During the last two years, have you violated or received notice of any violations or potential violations rela other continuing education/continuing professional development policies and standards?	ited to ACCME/ANCC or YES NO
I agree to notify Boston University School of Medicine, Continuing Medical Education Division immediately occurs prior to the completion of the CME Program.	if any of these events
	NO
in federal procurement or non-procurement programs or been convicted of a criminal offense that would i	result in mandatory

The Global Virome Project: a first step toward ending the pandemic era

Dennis Carroll, PhD, Director, Global Health Security and Development Unit, US Agency for International Development (USAID)

Dr. Carroll has a doctorate from the University of Massachusetts at Amherst and was a Research Scientist at Cold Spring Harbor Laboratory where he studied virology. Dr. Carroll was initially detailed to USAID from the US Centers for Disease Control and Prevention (CDC) in 1991. In 1995 he was named the Agency's Senior Infectious Diseases advisor, responsible for overseeing the programs in malaria, tuberculosis, antimicrobial resistance, disease surveillance, as well as neglected and emerging infectious diseases. He was responsible for the initial design and development of the President's Malaria Initiative. Dr. Carroll officially joined USAID in 2005 when he assumed responsibility for leading the USAID response to the spread of avian influenza. Dr. Carroll is currently responsible for providing strategic and operational leadership for the Agency's programs addressing new and emerging disease threats. Dr. Carroll also serves as USAID's Special Representative for Global Health Security.

Jonna AK Mazet, DVM, MPVM, PhD, Professor & Executive Director, One Health Institute, University of California, Davis

Jonna Mazet is a Professor of Epidemiology and Disease Ecology and Executive Director of the One Health Institute in the UC Davis School of Veterinary Medicine, where she focuses on global health problem-solving, especially for emerging infectious disease and conservation challenges. Dr. Mazet is active in international One Health research programs, most notably in relation to disease transmission among wildlife, domestic animals and people and the ecological drivers of disease emergence. Currently, she is the Global Director of a \$175 million viral emergence early warning project, named PREDICT, that has been developed with the US Agency for International Development's (USAID) Emerging Pandemic Threats Program. She was elected to the US National Academy of Medicine in 2013 in recognition of her successful and innovative approach to emerging environmental and global health threats.

Edward Rubin, MD, PhD, Chief Scientific Officer, Metabiota

Edward M. "Eddy" Rubin is an internationally known geneticist. Dr. Rubin received his Ph.D. in biophysics and his M.D. from the University of Rochester. Following a genetics fellowship at the University of California, San Francisco, he became a research associate at the Howard Hughes Medical Institute. Dr. Rubin joined Lawrence Berkeley National Laboratory in 1989 and led the Laboratory's Genome Sciences Department from 1998 to 2002. He then served as the director of the Department of Energy Joint Genome Institute (DOE JGI). After serving as DOE JGI Director for 14 years, Rubin stepped down in March 2016 to become the Chief Scientific Officer at Metabiota, a big data analytics start-up focused on infectious diseases and epidemic risk. Dr. Rubin's scientific work has centered on the functional exploration of the human genome, harnessing sequence comparisons between species for the discovery of genes and non-coding sequences of pivotal evolutionary and biomedical importance.

Peter Daszak, PhD, President, EcoHealth Alliance

Dr. Peter Daszak is a leader in the field of conservation medicine and a respected disease ecologist. EcoHealth Alliance is a global organization dedicated to innovative conservation science linking ecology and the health of humans and wildlife. Nine years ago Dr. Daszak became the Executive Director of EcoHealth Alliance's Consortium for Conservation Medicine (CCM) - a collaborative think-tank of institutions including Johns Hopkins Bloomberg School of Public Health, The University of Pittsburgh Graduate School of Public Health, The University of Wisconsin-Madison Nelson Institute for Environmental Studies, Tufts Cummings School of Veterinary Medicine Center for Conservation Medicine, and the USGS National Wildlife Health Center. The CCM is the first formal inter-institutional partnership to link conservation and disease ecology. Dr. Daszak's research has been instrumental in revealing and predicting the impacts of emerging diseases on wildlife, livestock, and human populations.

TARGET AUDIENCE: global health students, faculty, staff, and administrators; policy makers; international health leaders; health- and environmentally-aware citizens
OBJECTIVE: To build an international coalition of health leaders who are ready to shift the paradigm for emerging infectious diseases from one of response to one of efficiency and readiness – in short to work together to end the pandemic era.
DESCRIPTION:

The frequency of pandemics is increasing, driven by surging populations, environmental change and globalized trade and travel. The SARS, pandemic influenza, MERS, Ebola and Zika virus outbreaks illustrate that we are ill-prepared to mitigate the impact of a novel virus or prevent its emergence – leaving humanity vulnerable to catastrophe. Only a small proportion of viral threats have been identified (estimated to be much less than 1%) and fewer have had vaccines or counter measures developed. Over the coming century we will witness spillover from a pool of more than 1,000,000 "unknown" viruses into human populations. We need to be better informed about these threats so that preparedness programs and countermeasures can be developed. A global initiative to identify and characterize every significant viral threat circulating in the world is achievable over the next ten years at a total cost less than the financial burden of response to just one spillover – a critical and essential step towards ending the pandemic era.

All invited participants have secured the funding to travel to the meeting and will cover all of their associated expenses to participate in the conference.



The Institute for Johns Hopkins

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Billings Administration Room 307
Baltimore, Maryland 21287
IJHN@jhmi.edu

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<u>Commercial interest</u> is defined as an entity producing, marketing, re-selling or distributing health care goods or services consumed by or used on patients, with the exception of non-profit or government entities. Commercial interests do NOT include providers of clinical service directly to patients. Examples of commercial interest include pharmaceutical companies, medical device manufacturers, and companies providing health information technology <u>Relevant Financial relationships</u> are relationships with financial benefits. Examples include but are not limited to receiving a salary/employee or consultant, royalty, intellectual property rights, honoraria, ownership interest (stock and stock options, excluding diversified mutual funds) direct grants or research support, employee contracts, or other financial benefit directly or indirectly from the commercial interest, or a member of speaker's bureau. Such relationships must be disclosed for you and your immediate family members if they are current or have existed within the past 12 months. IJHN reviews disclosures for potential conflicts of interest, and has policies and procedures in place for resolution.

Faculty must disclose their intent to discuss off-label, experimental, or investigational use of drugs or devices.

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Version effective 11.01.09 rev 4/2013, 9/2013, 7/2015



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	I (and my immediate family members) have NO financial relationships with any commercial
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TERMS AND CONDITIONS REGARDING CONFLICT OF INTEREST/COMMERCIAL SUPPORT

Disclosure: All planning committee members and educational activity faculty must complete and submit the Disclosure Statement and ensure that the Disclosure Statement is complete and truthful to the best of the individual's knowledge. As the accredited provider, IJHN and NP are responsible for ensuring that learners are aware of any relevant financial relationships. The IJHN and NP disclose the name of the individual, the name of the commercial interest, and the nature of the relationship to the audience.

Preventing Bias in Continuing Education: The content and format of a CNE activity must promote quality in health care and not a specific proprietary business interest of an entity with a commercial interest. Faculty and presenters are required to prepare fair and balanced presentations that are objective and scientifically rigorous. Use scientific or generic names when referring to products. If it is necessary to use a trade name, then the trade names of all similar products or those within a class should be used.

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Unlabeled and Unapproved Uses: Presentations that provide information in whole or in part related to non-FDA approved uses for drug products and/or devices must clearly acknowledge the unlabeled indications or the investigational nature of their proposed uses to the audience. Speakers/authors who plan to discuss non-FDA approved uses for commercial products and/or devices must advise The IJHN and NP of their intent.

For educational activities supported by commercial interests:

Planning committee members and faculty are not permitted to receive any direct remuneration or gifts from the commercial interest supporting this activity as it relates to this specific activity. The commercial interest must not advise or give direct input regarding the choice of faculty, or any educational matter including the content of presentations. Please report any concerns about commercial interest influence to IJHN and NP immediately.

Conflict Evaluation (to be completed by Nurse Planner)

Version effective 11.01.09 rev 4/2013, 9/2013, 7/2015



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onflict Resolution (to be completed by Nurse Planner): Procedures used to resolve conflict of interest or potential bias if applicable for this activity:
Not applicable since no conflict of interest. Removed individual, with conflict of interest, from participating in all parts of the educational activity. Revised the role of the individual with conflict of interest so that the relationship is no longer relevant to the educational activity. Not awarding contact hours for a portion or all of the educational activity. Undertaking review of the educational activity by Nurse Planner or Content reviewer to evaluate for potential bias, balance in presentation, evidence-based content or other indicators of integrity, and absence of bias, AND monitoring the educational activity to evaluate for commercial bias in the presentation AND reviewing participant feedback to evaluate for commercial bias in the activity. (Content reviewer must submit Biographical data, Conflict of interest and reviewer forms.) Other – Describe:
urse Planner Signature (*If form is for the activity Nurse Planner, an individual other than the Nurse Planner must review and sign).
Completion of the line below serves as the electronic signature of the Nurse Planner reviewing the content of this Biographical/Conflict of Interest Form.
Typed or Electronic Signature: Name and Credentials (Required) Date

From: "Jon Epstein" <epstein@ecohealthalliance.org>

Sent: 01/23/2017 10:19:11 AM (-08:00)

To: "Elizabeth S Chase" <eschase@ucdavis.edu>

Cc: "desmond@ecohealthalliance.org" <desmond@ecohealthalliance.org>; "David John Wolking"

<djwolking@ucdavis.edu>; "Jonna Mazet" <jkmazet@ucdavis.edu>

Subject: Re: Wednesday Predict Call

Sorry - to clarify, tomorrow's not ideal for me, as I'll be in meetings throughout the day, but Wednesday is much better, if that's an option.

Cheers,

Jon

On Mon, Jan 23, 2017 at 1:17 PM, Jon Epstein < epstein@ecohealthalliance.org > wrote:

Hi Liz,

The mission call was actually scheduled for January 25th at 10:30 AM. Is this the time we would speak to Jonna? If so, I am available either at 10:30 or 11:30 EST.

Cheers,

Jon

On Mon, Jan 23, 2017 at 1:12 PM, Elizabeth S Chase < eschase@ucdavis.edu > wrote:

Greetings,

As the participation for the call between USAID + PREDICT scheduled for January 24 at 10:30am – 11:30am EST has been changed, will you be available for a call with Jonna at the same time?

January 24 at 10:30am - 11:30am EST / 7:30 - 8:30 PST

If the time is not optimal, we could adjust one hours later in the day to 11:30am - 12:30pm EST/ 8:30am - 9:30am PST.

Please share your availability and I will send the call information.

Best, LizC

Liz Chase

Executive Assistant to Dr. Jonna Mazet

One Health Institute

University of California, Davis

530-752-3630

eschase@ucdavis.edu

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Jonathan H. Epstein DVM, MPH

Vice President for Science and Outreach

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web: ecohealthalliance.org

Twitter: @epsteinjon

-

EcoHealth Alliance leads cutting-edge research into the critical connections between human and wildlife health and delicate ecosystems. With this science we develop solutions that promote conservation and prevent pandemics.

--

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Vice President for Science and Outreach

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Twitter: @epsteinjon

-

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From: "William B. Karesh" < karesh@ecohealthalliance.org>

Sent: 01/24/2017 1:40:36 PM (-08:00)

To:"Lonnie King" <king.1518@osu.edu>; "JMHUGHE@emory.edu" <jmhughe@emory.edu>; "Ron Waldman" <ronwaldman@email.gwu.edu>; "John MacKenzie' REDACTED "Morzaria, Subhash (TCE)"

REDACTED

Cc: "Amanda Fuchs" <fuchs@ecohealthalliance.org>; "Catherine Machalaba"

<machalaba@ecohealthalliance.org>; "Jonna Mazet" <jkmazet@ucdavis.edu>; "predict@ucdavis.edu"

cpredict@ucdavis.edu>

Subject: Notes from external advisors

Attachments: PREDICT Meeting in Pacifica_External Advisor Feedback 24 Jan 2017.docx, ATT00001.htm,

PREDICT -2 EAP Terms of Reference.docx, ATT00002.htm

Dear PREDICT-2 Advisors,

Thank you again for meeting with the PREDICT-2 team in Pacifica earlier in the month.

Attached you will find the summary comments compiled from Jim, Ron and Lonnie after the meeting. We spoke with USAID yesterday and mentioned a few of your recommendations. They are looking forward to seeing this final document.

Also attached is the newest version of the terms of reference for your records.

John and Subhash, so sorry that you were not able to join us and we all hope things are okay at home. The others received a digital copy of the annual report for the second year of the project. It is too large to email, but you can download it here: http://2016ar.predict.global/

Thank you again for your time and willingness to help us all. The PREDICT-2 team is extremely happy that you are working with us.

All the Best,

Billy

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

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EPT Partners Liaison, USAID Emerging Pandemic Threats - PREDICT-2 Program

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US Agency for International Development EPT PREDICT-2 - External Advisory Panel Terms of Reference

Term of Service: One Year, renewable annually

Service end date: Sept 30, 2019

The USAID EPT PREDICT-2 Project has established a two-tiered evaluation system consisting of semi-annual assessment of progress on it's USAID-approved Monitoring and Evaluation plan by the key personnel, consortium leads and USAID, as well as an annual assessment, estimated at two to three intensive days of effort, by an External Advisory Panel (PREDICT-2 EAP) managed by the PREDICT-2 EPT Liaison.

The PREDICT-2 EAP members have been selected based on their experience conducting successful US government projects and their in-depth knowledge human and animal infectious diseases prevention and control efforts. of USAID monitoring and evaluation. The EAP is currently composed of Dr. James Hughes (Emory University and formerly the US Centers for Disease Control and Prevention (CDC)), Dr. Subhash Morzaria (the Food and Agriculture Organization of the UN), Dr. Ronald Waldman (George Washington University and formerly of the World Health Organization, CDC, and USAID), Dr. Lonnie King (The Ohio State University and formerly CDC and USDA), and Dr. John MacKenzie (Curtain University and formerly WHO).

EAP Responsibilities:

- 1) Attend annual review and planning meeting of the USAID EPT PREDICT-2 project
- 2) Participate in EAP conference calls at least twice annually to review project progress.
- 3) Review semi-annual and annual reports, and other project written products as requested.
- 4) Provide guidance on project activities as requested
- 5) Provide oral and written comments on project activities and performance as requested (at least once per year) on the following project components:
 - a. Biological and ecological risk characterization
 - b. Behavioral risk characterization
 - c. Global surveillance data management networks
 - d. Validation of One Health approaches
 - e. Overall capacity strengthening

USAID EPT-2 PREDICT-2 Meeting 10-11 January 2017 (Pacifica, CA): External Advisor Feedback

from: Dr. Ron Waldman, Dr. Jim Hughes, and Dr. Lonnie King

Based on the meeting presentations and discussion, the Advisors highlighted the following key areas for further consideration, clarification, and/or refinement:

Remaining Time on Project

- Strongly recommend that project leadership develop a strategy for remainder of PREDICT 2 (2.5 years) and any post-project directions
 - Identify desirable end points and map backward to today to set priorities.
 - Gap analysis
 - Make adjustments
 - Prioritize successes and consider dropping components that are not developing well enough to deliver strong results by the end of the project.
- What is the Exit Strategy?
 - What are you going to leave behind after all the local involvement, capacity building and program building?
 - Determine and make clear how countries and programs are going to benefit?
 - How is risk going to continue to be reduced?
- Consider writing a 10 year retrospective summary for a public audience such as a non-scientific audience, legislators, etc. that demonstrates the relevance, impact and worth of 10 years of PREDICT.
 - Who will write it?
 - Aspects to Include:
 - Program summary what we know and can use now because of this project
 - Recommendations to countries for moving forward after the project
 - Recommendations to USAID for moving forward after the project

Open Source Information

- Reinforced importance of making information openly available and maximize access to project data and findings by other scientists that may add value beyond the scope of the core project.
- Findings may have public health implications so need to be shared ASAP (reinforcing capacity for international reporting obligations)
- Should look to solve issues around open source. What is the intent; how others/scientists can get the most out of data
- People may want to hold information until published, but there should be pressure to get it out faster; External Advisors can provide outside pressure to keep this a priority Caution over potential appearance of promotion of intellectual property or commercialized protocols (e.g., PCR approaches)

- Care must be taken in how to notify government officials, especially in agriculture, so that reporting is consistent with OIE requirements and standards.

Behavioral Science

- Advisors pleased to see the addition of behavioral science and risk reduction to the project.
- Try to link field findings with behavior and these linkages need to be well defined and explained to increase risk mitigation opportunities
- Review ongoing behavioral studies to ensure they will meet expectations within the project timeframe (end point)
- Social science component is quite important; current studies are small and appeared to lack scientific rigor based on the presentations given at the meeting. Didn't understand how they fit together or see coherence.
- With new Senior Behavioral Lead, should ask for a comprehensive plan moving forward but realistically advisors are concerned that the project may not have the time for type of evaluation and planning needed
- Need to spend serious time addressing this component of the project
- Behavior is a key component of health outcomes and a key risk determinant; thus, this addition to PREDICT 2 is an important aspect of risk reduction and viral disease spread.
- Should there be a PREDICT 3, this component should receive considerably more emphasis; USAID is remiss at not having insisted on PREDICT 2 taking this more in-depth from the start

PREDICT, GVP and AMR

- Excited about GVP but make sure that energy invested by project leadership doesn't
 derail the goals of the overall PREDICT project by fusing together and losing focus. Need
 to define goals for potential future efforts (post-PREDICT-2), e.g. fusing these or focusing
 on one/addressing them separately.
- If PREDICT 2 is a precursor of GVP then early activities that could be expanded upon in GVP should be explicitly programmed during the final years of PREDICT. Proof of concept in the field could be valuable to GVP start-ups
- AMR could possibly be a major component of future initiatives (alignment as a major focus area for international agencies). Add at least in part to current program to give an idea of possibilities for expansion.

Accounting for changing risk factors and impacts:

- Factoring in profound changes in urbanization and shift in domestic animals and wildlife can increase risk in sampling
 - May want to drill down in a few urban settings on how changes can predict future threats to explore/demonstrate value.
- Make sure the Hotspots maps are accurate and not just interesting, with links to risk areas
 - What should people do with the information?
 - Follow up around interventions and compare interventions with hot spot risk

- Why is the risk different in some places that aren't hot spots? This information may help in identifying how to reduce risk.
- Project activities do not match well with hotspots (notably S. America); more
 research on whether animal viruses in S. America may or may not have the ability to
 spillover should be done. These areas are red for a reason and should not be blown
 off.
- Expand exploring links with food security and relevant economic impacts. The results of the effort could other potential stakeholders in governments, organizations and civil society recognize the value of the project.
- Would like to see more work around global food systems and how food moving worldwide can help increase the risk of spread the current pathways are very good but don't go far enough based on the massive and dynamic global food systems we see today.

Miscellaneous

- Overall impressive results
 - Kudos to the group; virology and genomics in particular were cutting edge.
 - Data analytic capacity and strength in EIDITH would like to see more access to allow engagement of other scientists.
 - It was great to have representation from so many project staff involved at the country level; there is definitely a positive energy and good momentum
 - Liked idea for viral spillover ranking to understanding risk; good for public understanding and decision making
- Identify key FAO countries and what resources they can deliver. Focus on those countries instead of trying to spread too thin over all countries, or focus on where PREDICT can accomplish its goals without depending on FAO.
- Are you seeing impact of program and products developed on actual Ministry-level changes or local approaches based on findings and incorporated into programs? Would like to hear more on this aspect as it would lengthen the life span of the project.
- Recommend stronger engagement with JEE process.
- One Health approach seems to lack strong environmental component and strong public health surveillance, both of which could and should be added even if they aren't explicitly stated in scope.
- Loss of biodiversity through environmental deterioration: looking at importance in changing virulence and spillover or risk reduction? Can these pathogens go straight to humans and add to their virulence or infectivity?
- Distinguish more clearly between what is "fact" (even alternative facts) and what is opinion.

From: REDACTED on behalf of "Jonna Mazet" <jkmazet@ucdavis.edu>

Sent: 02/02/2017 4:10:38 PM (-08:00)

To: "Benard Ssebide" < REDACTED

Cc: "William Karesh" <karesh@ecohealthalliance.org>; "Kirsten Gilardi" <kvgilardi@ucdavis.edu>;

"Mike Cranfield" < REDACTED >; "David J Wolking" <djwolking@ucdavis.edu>

Subject: Re: Uganda One Health / Re: Al Outbreak

Sorry that I forgot to thank you for this info, Benard. Very useful and somewhat reassuring. Have a good night, Jonna

On Tue, Jan 31, 2017 at 8:28 AM, Benard Ssebide < REDACTED > wrote: Dear all,

We had a call this evening with regard to Billy's email below and here are some highlights:

On the call were me and P&R people (David, Winyi, Serge, Susan, and Sambe)

Winyi is the One Health Technical advisor at P&R and has been sitting at the National Task force at the request of USAID Uganda. Kassa and team at USAID Uganda were invited to the NTF but they delegated Winyi and asked him to take notes and brief USAID and other EPT partners accordingly.

The strain was confirmed last Friday 27th as H5N8 by UVRI although we don't have the official communication.

Kenya had a delegation at the NTF at the invitation of the Government of Uganda to enable them understand what's going on and alleviate fears Kenya had and hopefully lift the ban Kenya imposed on Uganda poultry and poultry products. Kenya agreed to send a technical team to work with the Uganda field teams in the investigations before they can take a decision on lifting the ban. The Kenyan delegation is expected to arrive today and go to the field this week.

A National response plan has been finalized and totals about \$900,000. It is going to be presented to the different government sectors / ministries for approval and then to the Prime Minister's office for final approval before it is shared and rolled out for implementation by the different sectors and with partners for support.

USAID support for lab reagents and primers through FAO was received at UVRI last week.

WHO is going to support multidisciplinary and multi-sectoral field teams this week to go and do active surveillance. WHO also ordered 1,000 doses of Tamflu for emergency preparedness. WHO also supported preparation of the isolation unit at the National hospital.

A lot is going on and ministries and other teams are doing response activities but all these have been necessary though done out of the response plan. With the response plan now soon, all activities will be required to be in line with the plan.

There has been no regular updates and streps from the NTF and this has created a lot of information gaps and also created an impression that nothing is going on which is not true. A lot has been going on but not being shared as expected.

Finally, where as we expected that P&R would share updates by virtue of their regular interaction with the NTF, they do share these updates with Andrew and Kassa at USAID and somehow these are not followed up and shared beyond to other EPT partners. To this note Susan is following up with the P&R AOR and USAID DC on a protocol that needs to be followed for information shared beyond their Project since where as this is information and updates they learn by virtue of attendance at the NTF, it is not official government communication as they can't speak on behalf of government. Once that is in place or agreed upon, we should be in a better position to receive regular and similar updates as EPT partners and USAID.

Kind regards,

Dr Benard Jasper Ssebide

Country Head Veterinarian

REDACTED

www.gorilladoctors.org Saving a Species One Gorilla at a Time

Uganda Country Coordinator

USAID Grantee | PREDICT-2 Project | Emerging Pandemic Threats (EPT) Program



Hi Everyone,

Rob and I just had a call to catch up on the Uganda situation - (how the different sectors are working together situation).

It looks like 5 of you are all in Uganda right now, or close by. I know a meeting might be too difficult to organize, but maybe a phone call would suffice to identify issues and come up with some ideas for USAID and next steps. Not that any of you need more work, but if someone could take a few notes on key issues or decisions to share, that would be great also.

All the Best,

Billy

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

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President, OIE Working Group on Wildlife

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EPT Partners Liaison, USAID Emerging Pandemic Threats - PREDICT-2 Program

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From: "William B. Karesh" <karesh@ecohealthalliance.org>

Sent: 03/06/2017 10:03:30 AM (-08:00)

To: "David Wolking" <djwolking@ucdavis.edu>

Cc: "Chris Johnson" <ckjohnson@ucdavis.edu>; "Kirsten Gilardi" <kvgilardi@ucdavis.edu>; "Jonna

Mazet" < jkmazet@ucdavis.edu >; "Benard Ssebide REDACTED "Catherine Machalaba"

<machalaba@ecohealthalliance.org>

Subject: Re: INVITATION TO A WORKSHOP ON PRIORITIZATION OF ZOONOTIC DISEASES IN UGANDA

Very nice, thanks!

BK

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

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On Mar 5, 2017, at 1:55 PM, David J Wolking < djwolking@ucdavis.edu > wrote:

Pretty good outcome I'd say from this workshop on in Uganda. Hoping TZ follows a similar path in a few weeks...

David

----- Forwarded message ------

From: Kirsten Gilardi kvgilardi@ucdavis.edu>

Date: Sun, Mar 5, 2017 at 01:33

Subject: Re: INVITATION TO A WORKSHOP ON PRIORITIZATION OF ZOONOTIC

DISEASES IN UGANDA

To: Benard Ssebide REDACTED

Cc: Mike Cranfield REDACTED, David John Wolking djwolking@ucdavis.edu, Jonna Mazet jkmazet@ucdavis.edu

Benard, thanks for the synopsis, and I think this bodes well for PREDICT.... great!

We'll look forward to reading your report.

Thanks,

-K

On Mar 5, 2017, at 11:18 AM, Benard Ssebide

REDACTED

wrote:

Dear Kirsten,

It was a well facilitated workshop though at the end some participants were disappointed that what came out as priorities was not necessarily what they expected but this obviously was due to the criteria used and the type of questions set to rank the different diseases. The top 7 priority zoonotic diseases agreed upon are:

- 1. Anthrax
- 2. Zoonotic Influenza viruses
- 3. Viral Hemorrhagic Fever (Ebola, Marburg, CCHF, and RVF)
- 4. Brucellosis
- 5. Trypanasomiasis
- 6. Plague
- 7. Rabies

A workshop report with notes will be provided.

Benard.

On Fri, Mar 3, 2017 at 9:52 PM, Kirsten Gilardi < kvgilardi@ucdavis.edu> wrote: Benard, how did this 2-day workshop go? Eager to hear! -K

On Feb 17, 2017, at 7:52 PM, Benard Ssebide REDACTED wrote:

Official invitation to the ZDs prioritization workshop.

----- Forwarded message -----

From: Sheevon Kirabo REDACTED

Date: Fri, Feb 17, 2017 at 3:58 PM

Subject: INVITATION TO A WORKSHOP ON PRIORITIZATION

OF ZOONOTIC DISEASES IN UGANDA

Dear Dr.Benard Sebidde,

The Government of Uganda through the National One Health Platform (NOHP) of the Ministry of Agriculture, Animal Industry and Fisheries, Ministry of Health, Ministry of Water and Environment and Uganda Wildlife Authority with support from USAID Preparedness & Response Project and U.S. Centers for Diseases Control and Prevention (CDC), as a member of the One Health Technical Working Group (OHTWG) you are cordially invited to participate in the two day workshop exercise from 2nd to 3rd March 2017 at Hotel Africana, Kampala.

Attached is your invitation letter and draft Uganda Zoonoses list.

Program/Agenda for the two days will be sent shortly.

Kindly reply to confirm your attendance.

Thank you

Regards
Sheevon Kirabo
Admin
USAID Preparedness & Response Project
Emerging Pandemic Threat Program 2 (EPT 2)
Tel: REDACTED

Email: REDACTED

KEDACTED

http://www.dai.com/disclaimer.

The DAI email disclaimer can be found at

<DR. BENARD SEBIDDE.pdf><DRAFT UGANDA ZOONOSES
LIST.pdf>

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Sent from Gmail Mobile

From: William B. Karesh@ecohealthalliance.org>

To: Jonna Mazet <jkmazet@ucdavis.edu>

CC: predict@ucdavis.edu cpredict@ucdavis.edu ;Catherine Machalaba

<machalaba@ecohealthalliance.org>

Sent: 4/19/2017 11:45:00 AM

Subject: Moktar Diop

Hi there,

I don't remember meeting him and Catherine doesn't know him directly (the 14 Global topical Practices seem to operate separately from the regional structures), though I am sure he knows about the REDISSE project so it will be wonderful to reinforce how PREDICT-2 and REDISSE partners are linked on the ground (right now the second phase of REDISSE is going forward, and a third is planning, to ultimately cover 15 countries in West Africa). We are working with the Bank's Agriculture Global Practice, in coordination with partners from the Health, Nutrition and Population Global Practice and Environment and Natural Resources Global Practice, to advance One Health initiatives to contribute to the global public good of pandemic and epidemic prevention. Our key projects include:

Feedback from Catherine - she's down at the Bank today.

- 1) One Health Operational Framework: We have been providing technical support in developing a One Health Operational Framework that will be finalized by June 30th. This showcases relevance of One Health to the Bank's twin goals of eliminating poverty and ensuring equitable prosperity through reduced disease burden and economic impact and the provision of health security. The Framework is intended for project leads and World Bank client countries to assist with operationalizing One Health and reinforces initiatives by partner organizations (OIE, WHO, etc.) The Framework will include initial guidance on pandemic preparedness planning (25 International Development Assistance- eligible countries -i.e. the lowest-incomewill receive funds for pandemic preparedness planning starting in July so this is intended to assist them). We are emphasizing prevention opportunities learned through PREDICT.
- 2) Environmental Health Capacity Assessment: Through PREDICT, we plan to help pilot a country environmental health capacity assessment tool from the Bank (likely in 2-3 countries in West Africa and Southeast Asia). This tool complements existing tools from WHO and OIE to reflect environmental dimensions of infectious diseases, especially wildlife pathogen, sentinel surveillance, and risk assessment and management opportunities learned from PREDICT. Like the OIE Performance of Veterinary Services and WHO Joint External Evaluation for the International Health Regulations, this intends to identify where there are gaps and can be a resource for donors to target resources, but it also has value in bringing stakeholders together to identify existing coordination opportunities that can be optimized by a country.
- 3) One Health Economics: The Bank is looking at better ways to prepare and mobilize resources for pandemics (e.g. contingency financing). The Bank has conducted global analyses on pandemic prevention through One Health, finding high return on investment from building up veterinary and public health services even if a only a portion of pandemics are prevented (findings reported in the 2012 'People, Pathogens and Our Planet' report which we assisted with during PREDICT, including a survey of wildlife service departments, which found that in general country spending on wildlife disease surveillance is extremely limited). We are now working with the Bank on country-level analyses and convened an expert workshop in early February at the Bank to develop a methodology that assesses multi-sectoral costs of epidemics as well as benefits of prevention across sectors, including the private sector from avoided damages. We are hopeful these findings will be useful to Finance Ministers when designing their country-wide budgets, engaging private sector partners in risk mitigation, and seeing the value of prevention.
- **4) Awareness:** informally, we are generally raising awareness on One Health in the Bank and among its partners, developing events, posts, and papers together. If Mr. Diop or someone on his team might be interested, we would be honored if they wold like to be engaged.

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

EcoHealth Alliance 460 West 34th Street - 17th Floor New York, NY 10001 USA

+1.212.380.4463 (direct) +1.212.380.4465 (fax) www.ecohealthalliance.org

President, OIE Working Group on Wildlife

Co-chair, IUCN Species Survival Commission - Wildlife Health Specialist Group

EPT Partners Liaison, USAID Emerging Pandemic Threats - PREDICT-2 Program

EcoHealth Alliance leads cutting-edge research into the critical connections between human and wildlife health and delicate ecosystems. With this science we develop solutions that promote conservation and prevent pandemics.

From: "Brian Bird" < bhbird@ucdavis.edu>
Sent: 05/16/2017 7:17:38 AM (-07:00)

To: "Anthony, Simon J." <sja2127@cumc.columbia.edu>; "Woutrina Miller"

<wasmith@ucdavis.edu>

Cc: "Tracey Goldstein" <tgoldstein@ucdavis.edu>; "Jonna Mazet" <jkmazet@ucdavis.edu>; "Chris

Johnson" <ckjohnson@ucdavis.edu>; "William B. Karesh" <karesh@ecohealthalliance.org>

Subject: Smaller sized PREDICT outbreak form

Attachments: PREDICT Outbreak Rapid Report, Daily Activities Log, and Points of Contact

Sheet_v.16may2017.docx

Woutrina,

Simon had a great observation that the outbreak reporting form is simply huge ~3.7mb. I hadn't noticed that and figured out it was our logos at the bottom of the page. I've reduced the size down to ~500kb. Can you please have this version updated on EIDITH so that going forward the teams have a much easier sized form to move around on limited internet connections etc?

Thanks!

-brian

From: Simon Anthony <sja2127@cumc.columbia.edu>

Date: Sunday, May 14, 2017 at 11:22 PM

To: Jonna Mazet <jkmazet@ucdavis.edu>, Brian Bird <bhbird@ucdavis.edu>, Tracey Goldstein <tgoldstein@ucdavis.edu>, Chris Johnson <ckjohnson@ucdavis.edu>, "William B. Karesh, D.V.M"

<karesh@ecohealthalliance.org>

Subject: file size

Hey Brian -

Is there a way to reduce the size of the outbreak reports that get emailed around? They are always very large (>3.5 MB) and quickly fill up my inbox. I'm not sure why they are so big, given that they're just word documents, so wondering if there are elements contained within the document that are adding unnecessary MBs to the file?

S.

Simon J Anthony, D.Phil Assistant Professor, Department of Epidemiology Center for Infection and Immunity, Columbia University

722 West 168th Street, 17th Floor NY, NY, 10032

Email: sja2127@cumc.columbia.edu

Mobile: REDACTED Office: 212-342-0558



PREDICT Outbreak or Health Event Rapid Report

Today's Date:
Working Title of Investigation:
Cumulative day of the outbreak investigation:

Please describe the disease signs and symwildlife:	nptoms and species a	affected (huma	ns, domesticato	ed animals,
Location				
Country:				
District:				
Village/Town:				
GPS Coordinates (if known):				
Date that first case(s) of illness				
occurred (if known or estimate):				
Date that PREDICT was first notified				
of outbreak:				
Key Information	Description of Findings/Actions/Outcomes			
How many affected individuals?		Suspected:	Confirmed:	Deaths:
	Humans			
	Domestic Animals Wild Animals			
How was outbreak first noticed?	Wild Animals			
now was outbreak mist noticed:				
Where was the first reported case? What is/was				
the extent of geographic spread? Include				
comments on the apparent speed of spread.				
Has the country requested support from PREDICT				

v.16May2017

If so, which government agency requested

(include date of request)?















PREDICT support?				
When was PREDICT response initiated (date)?				
Are other EPT partners involved in the response				
(which ones and how)?				
What type of assistance did PREDICT initially				
provide? Which PREDICT personnel were involved?				
When was the first official acknowledgement of				
the outbreak (by which government agency or				
other reputable body and date)?				
When was a response initiated and by whom?				
Which agencies were involved? Who was in				
charge of the national response?				
Was the cause of the outbreak confirmed by a				
laboratory? If so, give details of the initial				
confirmation (cause, species, specimen types				
tested and dates of testing if known).				
Note: Daily updates for ongoing laboratory testing				
should be entered in the Daily Activities/Timeline				
table below.				
Where was the laboratory testing performed				
(name of laboratory)?				
Number of days between initiation of government				
Number of days between initiation of government response and lab confirmation of laboratory				
1 5				
response and lab confirmation of laboratory results.	To be filled afte	er active outbreak	or event activity h	as ceased
response and lab confirmation of laboratory results. Summary of the Outbreak or Event:	To be filled afte	er active outbreak	or event activity h	as ceased
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response and lab confirmation of laboratory results. Summary of the Outbreak or Event: Working name of the outbreak:	Humans			
response and lab confirmation of laboratory results. Summary of the Outbreak or Event: Working name of the outbreak: Total number of cases:	Humans Domestic Animals			
response and lab confirmation of laboratory results. Summary of the Outbreak or Event: Working name of the outbreak: Total number of cases: Summary of PREDICT Team response activities	Humans Domestic Animals			
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response and lab confirmation of laboratory results. Summary of the Outbreak or Event: Working name of the outbreak: Total number of cases: Summary of PREDICT Team response activities	Humans Domestic Animals			















PREDICT Outbreak or Health Event Response Daily Activities/Timeline

Working Title of Investigation:

Instructions: This is the timeline of all PREDICT team activities related to this event. Please fill out in detail any PREDICT team activity as they occur on a <u>daily</u> basis (e.g., sample collection, other field activities, laboratory testing, outbreak related meetings attended, communications with the Mission or Government, etc.) in addition to the key specific items listed below.

Add additional rows into the specific activities listed below <u>in chronological order</u> as needed. If a specific listed event has not yet occurred, please put "pending" or "not expected" in the date column.

Key Events:

Date	Day #	Notification or Action Taken
		First notification of unusual disease activity to PREDICT team
		CC notification to PREDICT lead partner
		PREDICT lead partner notification to PREDICT leadership
		Invitation to assist from government received by PREDICT team
		Notification of USAID of government invitation by PREDICT Global
		Director
		USAID/PREDICT communication back to government request
		First Outbreak Taskforce meeting attended by PREDICT CC or PREDICT
		team members
		First deployment of PREDICT teams to outbreak field site
		First specimen collection
		First specimens delivered to laboratory
		First laboratory preliminary results
		First laboratory confirmed results
		First report of results to government and taskforce
		First notification to USAID of government cleared laboratory results













In-Country Government Outbreak or Health Event Points of Contact

Public Health mir	nistry or department:
Name:	
Email:	
Mobile Phone:	
Livestock ministr	y or department:
Name:	
Email:	
Mobile Phone:	
/	
	ment ministry or department:
Name: Email:	
Mobile Phone:	
Mobile Phone:	
OIE focal point:	
Name:	
Email:	
Mobile Phone:	
IHR focal point:	
Name:	
Email:	
Mobile Phone:	
FAO:	
Name:	
Email:	
Mobile Phone:	
WHO:	
Name:	
Email:	
Mobile Phone:	
1410bile 1 Holle.	
EPT ONE HEALTH	WORKFORCE Project:
Name:	
Email:	
Mobile Phone:	













EPT PREPAREDNE	SS and RESPONSE Project:
Name:	
Email:	
Mobile Phone:	
Other Important	Contacts:
Organization:	
Name:	
Email:	
Mobile Phone:	
Organization:	
Name:	
Email:	
Mobile Phone:	
Organization:	
Name:	
Email:	
Mobile Phone:	
Organization:	
Name:	
Email:	
Mobile Phone:	
Organization:	
Name:	
Email:	
Mobile Phone:	











From: "William B. Karesh" <karesh@ecohealthalliance.org>

Sent: 05/17/2017 9:32:48 AM (-07:00)

To:"Jonna Mazet" <jkmazet@ucdavis.edu>; "Chris Johnson" <ckjohnson@ucdavis.edu>; "Tracey Goldstein" <tgoldstein@ucdavis.edu>; "Leilani Francisco" <francisco@ecohealthalliance.org>; "Prime Mulembakani"

REDACTED

Subject: FAO fact sheet on Ebola

Attachments: EVD_FAQ_20140930_dp.pdf, ATT00001.htm

FAO is distributing this in response to DRC outbreak.



EBOLA VIRUS DISEASE

FREQUENTLY ASKED QUESTIONS

VIRUS DISEASE OUTBREAK

LAST UPDATED: 02 OCTOBER 2014









WHAT IS EBOLA VIRUS DISEASE?

Ebola virus disease, formerly known as Ebola haemorrhagic fever, is a human illness caused by infection with an Ebola virus. There are five known species of Ebola viruses, four of which cause human illness. For more information: http://www.cdc.gov/vhf/ebola/about.html

WHAT IS BEHIND THE CURRENT EPIDEMIC IN WEST AFRICA?

The current Ebola virus disease epidemic in West Africa is being sustained by human-to-human transmission of the Zaire ebolavirus, the most lethal of the five known species of the Ebola viruses.

It is believed epidemic began in December 2013 due to an isolated incident in Guinea in which a child became infected directly or indirectly through contact with fluids or secretions from a wild animal carrying the virus. This incident would probably have been linked to contact with an infected bat or organs from a contaminated bat or another infected hunted animal.

It is possible that the Zaire ebolavirus had been circulating undetected in West Africa for some time. The emergence of the virus in Guinea highlights the risk of Ebola virus disease outbreaks in the whole West African subregion.

WHERE DID THE ZAIRE EBOLAVIRUS COME FROM?

The Zaire ebolavirus was the first Ebola virus ever isolated. The virus caused the first reported outbreaks of the Ebola virus disease in 1976 in the Democratic Republic of the Congo and the Sudan. The name of the disease comes from the first recorded outbreak in 1976 in an area that lies on the Ebola River.

The virus has probably circulated in the forests for hundreds or thousands of years. Although rare, outbreaks in humans can occur when humans come into contact with secretions or bodily fluids from infected or diseased animals.

HOW DOES EBOLA VIRUS DISEASE AFFECT HUMANS?

For symptoms and all other human health information, please refer to the World Health Organization (WHO). http://www.who.int/csr/disease/ebola/faq-ebola/en/

HOW ARE EBOLA VIRUSES SPREAD?

Ebola viruses are spread among humans through direct contact of broken skin or mucous membranes with contaminated body fluids from people with symptoms of the disease. See WHO: http://www.who.int/csr/disease/ebola/faq-ebola/en/

Although certain species of bats are considered a natural reservoir of Ebola viruses, spillover from wildlife to humans is extremely rare and almost always occurs as an isolated incident. Therefore, animals do not play a significant role once Ebola virus disease starts to spread among humans. Other forest dwelling animals (e.g. chimpanzees, gorillas or wild ruminants) may become infected and suffer from the Ebola virus. If hunted and prepared for human consumption, these animals may infect those that dress and prepare the carcass prior to cooking.

WHAT SHOULD BE DONE TO PROTECT HUMANS FROM EBOLA VIRUSES?

FAO recommends following WHO guidelines with regard to human health concerns. http://www.who.int/csr/disease/ebola/faq-ebola/en/

IS IT SAFE TO TRAVEL TO WEST AFRICA?

For travel advice, please refer to WHO: http://who.int/ith/updates/20140421/en/

WHICH AREAS ARE MORE AT RISK?

The main countries affected are Guinea, Sierra Leone and Liberia. Nigeria and Senegal have also reported human cases. According to WHO, countries that share land borders or major transportation connections with the affected countries are at risk for spread of the Ebola outbreak, including: Benin, Burkina Faso, Côte d'Ivoire, Guinea-Bissau and Mali. http://www.who.int/csr/disease/ebola/situation-reports/en/

An Ebola outbreak also appeared in the Democratic Republic of Congo in August 2014, but based on available data, this event is independent from the West African outbreak. Moreover, the latest information indicates the outbreak in the Democratic Republic of Congo is under control.

HOW IS EBOLA VIRUS DISEASE ASSOCIATED WITH ANIMALS?

Fruit-eating bats are believed to be the principal animal reservoirs of Ebola viruses. Past research shows that bats can carry the virus without showing clinical signs of illness. Ebola viruses have also been detected in chimpanzees, gorillas, pigs and duikers (i.e. a small wild antelope).

While bats are suspected to have played a role in the start of the current human epidemic, it is unknown which other animal species, if any, may have been involved in the transmission of the virus to a human or how the virus was transmitted from wildlife to people.

10 WHAT IS BUSH MEAT?

Bush meat refers to meat or by-products from wild animals that are hunted for sale and consumption. Many different species of game are hunted as bush meat for consumption and sale, including bats, rodents, monkeys and chimpanzees.

IS BUSH MEAT SAFE TO EAT?

When assessing risk, it is important to distinguish between the many different animal species considered as bush meat. Currently, bats pose a risk to humans, since bats are considered the likely reservoir of the Zaire ebolavirus. Therefore, FAO recommends people in affected and at-risk areas not hunt, dress or eat bats. Other wild animals in areas where Ebola viruses have been detected can play a role in virus circulation at the animal-human interface. For this reason, wild animals that have died from unknown causes should not be handled or eaten. These animals should not be given or sold or used to feed other animals.

With the exception of bats, healthy, wild animals hunted, slaughtered, handed and consumed as bush meat present little to no risk to humans if good hygiene, proper protection and appropriate cooking practices are followed.

Under no circumstances should raw bush meat or uncooked dishes based on the blood of wild animals be consumed, since these practices place people at high risk of contracting any number of infections with dangerous pathogens.

DO WILD ANIMALS POSE A THREAT TO HUMANS OF CONTRACTING EBOLA?

Living, wild animals pose little Ebola threat to humans. It is extremely difficult to contract an Ebola virus from contact with wild game, since transmission requires direct contact of open skin or mucous membranes with the bodily fluids or secretions of an infected animal. The current epidemic is most likely the result of an isolated incident in which an activity brought a person into contact with the blood or fluids of an infected bat or other animal that had acquired an Ebola infection most likely from a bat.

WHAT ARE GOOD FOOD PREPARATION PRACTICES?

Ebola viruses, as well as other microbes, are not transmitted through consumption of well-cooked food. Ebola viruses are inactivated by normal temperatures used for cooking (so that food reaches 60 °C in all parts – "piping" hot); it is safe to eat properly prepared and cooked meat.

Proper food preparation includes:

- hand washing before and after handling food;
- hand washing in between handling raw food and cooked or ready-to eat food;
- keeping raw meat separate from cooked or ready-to-eat foods;
- keeping utensils and surfaces used to prepare raw meats separate from those used for other foods (e.g. chopping boards, knives and plates); and
- washing and disinfecting all surfaces and utensils that have been in contact with raw meat.

Source: WHO and FAO

SHOULD THE MOVEMENT OR SALE OF WILDLIFE AND/OR BUSH MEAT BE RESTRICTED?

FAO is not recommending movement restrictions for bush meat or healthy live wild animals.

FAO does, however, stress the need for proper precautions when hunting, handling, transporting and selling bush meat. Legal restrictions on the trade of bush meat should be strictly enforced. Legal restrictions on the hunting or capture of endangered species should likewise be strictly enforced.

WHAT SPECIFIC PRECAUTIONS SHOULD BE TAKEN BY INDIVIDUALS INVOLVED IN THE BUSH MEAT TRADE?

- Hunting, handling of bats should be avoided.
- Bush meat hunters, transporters, sellers and all other intermediaries should wear gloves when dressing and handling carcasses or meat to minimize the risk of contact with bodily fluids or secretions from wildlife.
- Only healthy wildlife should be considered apt for bush meat; sick or dead wild animals should not be handled, sold or consumed.
- Anyone who encounters dead wildlife should alert the authorities.
- Clean surfaces, knives, and other utensils should be used as good practice; refrigeration to avoid spoilage during transport would decrease the opportunities for other microbes to contaminate the meat.

ARE MY LIVESTOCK SAFE? HOW CAN I PROTECT THEM?

Information is extremely limited on the ability of the Ebola virus to infect livestock like cattle, sheep and goats or chickens. Other, more common diseases pose a much more likely risk to livestock. Consult the veterinary authorities for a comprehensive list of the disease threats in your area. Farmers should protect their livestock from these diseases and other health threats by implementing good biosecurity and hygiene practices, vaccination regimes where available, keep animals in enclosures and not to feed them with raw meat, scraps or dead animals.

For more information:

Biosecurity (FAO ECTAD Information Sheet):

http://www.fao.org/documents/card/en/c/dece81cb-988b-56a1-af14-6699cd1bc0f2/

Sustainable animal production (FAO): http://www.fao.org/3/a-u7600t/index.html

Guide to Good Farming Practices (FAO): http://www.fao.org/documents/card/en/c/4237ec8b-f340-5488-a510-44ce3b38dcd3/

CAN SCAVENGING OR STRAY ANIMALS PLACE MY FAMILY OR ME AT RISK?

The main risk of Ebola spread and infection is through human-to-human transmission. Information on the ability of scavenging animals to carry the virus is limited. However, scavengers like stray dogs can pose a risk by physically moving the remains of infected animals or people closer to human populations.

CAN A PIG FARMER INFECT PIGS?

The potential for humans to infect pigs with Ebola viruses is unknown. The only Ebola virus found to infect pigs is the Ebola-Reston virus in parts of Southeast Asia, which has never been reported to cause human disease. However, in areas where Ebola is confirmed, FAO strongly advises people keep animals in enclosures.

WHAT COULD BE THE IMPACT OF EBOLA ON AGRICULTURE AND FOOD SECURITY?

Ebola virus disease is placing undue strain on health and medical services, economies, livelihoods and food systems across the most affected countries in West Africa. The tragic loss of life is one of many negative impacts. Attempts to control the epidemic, fears of infection and overall panic have caused many people to abandon their activities, including farming, taking care of livestock and marketing of products, such as milk or eggs. This is translating into loss of income and a decrease in food production and sale. The prolonged disruption of the current harvest and subsequent planting season will drive hundreds of thousands of vulnerable people deeper into poverty and hunger as food sources dwindle.

WHAT CAN BE DONE TO REDUCE THE IMPACT OF THE CRISIS ON FOOD SECURITY AND LIVELIHOODS?

As soon as the epidemic is fully controlled, interrupted agriculture practices must be revived where possible and alternative sources of food and income identified to safeguard the livelihoods and food security of those most affected.

FAO stands ready to help countries cope with the current crisis and revive disrupted livelihoods. FAO works with governments to provide training, inputs, tools and expertise to promote food security via support to the agriculture sector.

WHAT IS FAO DOING WITH REGARD TO THE CURRENT EPIDEMIC?

Preventing further loss of human life and stopping the spread of the virus is top priority at this time. FAO is working in supporting the humanitarian response to help stop the epidemic as part of a coordinated UN effort.

To this end, FAO has activated networks of local animal health clubs, Veterinary Services and allied Community Animal Health Workers, producer organizations, forestry contacts and agriculture extension services to help UNICEF and WHO communicate risk to affected and non-affected populations. It is critical for communities – urban and rural – to understand practices that pose the highest risks of human-to-human transmission and potentially spillover events from wildlife so people can make informed decisions.

FAO is also working with UN partners and the governments of Guinea, Liberia and Sierra Leone, Nigeria and elsewhere to improve community knowledge about the virus via rural radio and extension services in order to help reduce the risks posed to humans by Ebola virus disease.

FAO is liaising with key partners, including the United Nations Children's Fund (UNICEF), United Nations Office for the Coordination of Humanitarian Affairs (OCHA), the World Food Programme (WFP) the World Health Organization (WHO) and the World Organisation for Animal Health (OIE).

22 WHAT ARE THE NEGATIVE REPERCUSSIONS OF STIGMA/FEAR ON AGRICULTURE?

The stigma faced by Ebola survivors represents a serious threat to food security. Scientifically unwarranted fear of infection via an Ebola survivor can cause customers to stop frequenting a survivor's shop, to cease to purchase produce or animal products from agrarian survivors and to exclude survivors from agriculture and income generating activities.

WHAT CAN BE DONE TO REDUCE THE LIKELIHOOD OF EBOLA VIRUS DISEASE EPIDEMICS IN THE FUTURE?

Improving global health systems is key to safeguarding the health of future generations. FAO works with WHO, UNICEF, OCHA, Médecins Sans Frontières, OIE and other partners – including technical agencies of the African Union and Regional Economic Communities – in the international effort to improve disease preparedness, health infrastructure and rapid response capacities.

With regard to animals, after the immediate crisis has been overcome, FAO will work with governments, international and local partners to better understand the risks animals might pose to humans in order to give policy makers the information they need to make decisions that protect communities. FAO support will include building capacities in early warning and response at the human-animal-ecosystem interface to reduce the likelihood of future outbreaks.

Increased awareness in at-risk communities who depend on wildlife for food should also be a priority of future work to reduce the risk of spillover of Ebola viruses from wildlife to human populations.

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WHERE CAN I GET MORE INFORMATION?

http://www.who.int/csr/disease/ebola/en/

http://www.cdc.gov/ebola

Investigating the Role of Bats in Emerging Zoonoses (FAO): http://www.fao.org/docrep/014/i2407e/i2407e00.pdf

CONTACT

Bukar Tijani | Assistant Director-General and Regional Representative for Africa | Accra, Ghana | +233 30 2610930 | bukar.tijani@fao.org

Vincent Martin | FAO Representative in Senegal, Head of Subregional Resilience Hub for West Africa | Dakar, Senegal +221 33889 16 59 | vincent.martin@fao.org

Dominique Burgeon | Director, Emergency and Rehabilitation Division | Rome, Italy | +39 06 570 53803 | dominique.burgeon@fao.org

REDACTED predict-request@ucdavis.edu on behalf of "Ehab Abu-Basha" From: 05/23/2017 2:06:06 PM (-07:00) Sent: "Patrick Dawson" <dawson@ecohealthalliance.org> To: "Ehab Abu-Basha" REDACTED "Alisa Pereira" <apereira@usaid.gov>; "Maysa Al-Cc: Khateeb" <malkhateeb@usaid.gov>; "Nicolas Kaufman" <nkaufman@usaid.gov>; "csawalha@usaid.gov" REDACTED <csawalha@usaid.gov>; "Mohmmad Abdallat" ; "Sultan Mabdalla" ; "BELAL SHAQARIN" REDACTED ; "Dr.rachel Dodeen " REDACTED ; "Hijazeen, Zaidoun (FAOJO)" REDACTED **REDACTED** REDACTED ; "predict@ucdavis.edu" <predict@ucdavis.edu>; "Ava Sullivan" <sullivan@ecohealthalliance.org>; "Dr. Billy Karesh" <karesh@ecohealthalliance.org>; "Hani Talafha" "Bilal" REDACTED "Mustafa Ababneh" REDACTED ; "Moh"D Borhan Al-REDACTED >; "Zuhair Bani Ismail" · Zghoul" REDACTED REDACTED Subject: [predict] Re: Partner update report for Y3Q2 No we will meet in june Have a good MailTime On Tue, May 23, 2017 at 7:39 PM, REDACTED wrote: Thanks br/>Are we still on for Thursday meeting at MOE. Sent from my iPhone On May 23, 2017, at 19:31, Ehab Abu-Basha REDACTED wrote: Dear Respected Partners, Please find enclosed the PREDICT-Jordan's mission/partner update for Y3Q2. br/> Best regards to all. Yours, Ehab

Ehab Abu-Basha, DVM, MSc., Ph.D Professor of Pharmacology and Toxicology Faculty of Veterinary Medicine



<PREDICT-2 Jordan Partner Update Y3Q2 (1).pdf>

From: REDACTED

Sent: 06/12/2017 9:58:57 AM (-07:00)

Cc: "Catherine Machalaba" <machalaba@ecohealthalliance.org>; "William B. Karesh"

<karesh@ecohealthalliance.org>; "Jonna Mazet" <jkmazet@ucdavis.edu>

Subject: June 7th surveillance call notes **Attachments:** 6.7.2017 surveillance call notes.docx

Hi Surveillance Team,

Please find attached notes from our call last week -- let me know if you have any corrections by Weds, June 14th. Thank you!

Our next call is **Thurs, June 22nd** @ **10am PT/1pm ET.** We'll share an agenda closer to that time & please let us know if you have anything you'd like to discuss.

Action Items and Reminders for next call:

- 1. Global leads: as you start working with teams to categorize concurrent vs individual sites, please bring any questions or concerns you identify to surveillance team so we can work through these issues on calls. With the wide range of contexts and situations we work in, it may not always seem straightforward and we want this to be an ongoing conversation. Please see definition of a "concurrent" site in the notes.
- 2. Note: When helpful (at the request of our team), we will add ~30 mins to the call for Q&A. Those that wish to stay on to discuss surveillance operational questions/issues are welcome to, but it is not required.
- 3. Africa country updates on next call; field and lab activities updates, GHSA highlights, zoonotic disease prioritization workshops, update on data entry and any hurdles/concerns.

Kind regards,

REDACTED

REDACTED

Research Associate
EpiCenter for Disease Dynamics
One Health Institute
UC Davis School of Veterinary Medicine



June 7th, 2017 Surveillance Team Call

Action Items and Reminders for next call:

- Global leads: as you start working with teams to categorize concurrent vs individual sites, please
 bring any questions or concerns you identify to surveillance team so we can work through these
 issues on calls. With the wide range of contexts and situations we work in, it may not always
 seem straightforward and we want this to be an ongoing conversation. Please see definition of a
 "concurrent" site below.
- 2. Note: When helpful (at the request of our team), we will add ~30 mins to the call for Q&A. Those that wish to stay on to discuss surveillance operational questions/issues are welcome to, but it is not required.
- 3. Africa country updates on next call; field and lab activities updates, GHSA highlights, zoonotic disease prioritization workshops, update on data entry and any hurdles/concerns.

Participants: Tammie O'Rourke, Daniel O'Rourke, David McIver, Matthew LeBreton, Megan Vodzak,
Patrick Dawson, Mindy Rostal, Ava Sullivan, Allison White, Emma Lane, Emily Hagan, Karen Saylors, Sarah
Olson, Kidan Araya, Corina Monagin, REDACTED Taylor Gabourie, David Wolking, REDACTED Terra
Kelly, Chris Kreuder Johnson

Welcome Kidan Araya, new Operations Specialist at UC Davis!

Asia country updates; field and lab activities updates, GHSA highlights, zoonotic disease prioritization workshops, update on data entry and any hurdles/concerns.

Mongolia – Late April/early May sampling data currently under review. Data will be categorized as on-invasive guano collection. Quarterly updates going out regularly.

Viet Nam – Had meetings recently for detailed planning for human surveillance and training on CITI platform. Sampled post-mortem on NHP confiscated from wildlife trade with suspected disease.

Myanmar Dry season wildlife surveillance now includes invasive sampling of bats in two sites and invasive primates. All staff trained on the three main species and dry season surveillance to be completed next week. In Hpa-an collaborated with FAO for duck, pig and goat surveillance. Getting approvals to send samples to Cambodia and UCD. Did not receive invite to first JEE meeting, may get invite to 2nd. Animal testing lab training will begin in July, human testing lab partners to travel to UC Davis in September for training.

Cambodia – recently sampled at bat guano farming communities (200 poultry, 100 cattle, dogs and cats, bats, and rodents). Completed extraction on 1028 samples from animals, testing not yet started. Collected 95 samples from people in Kampong Chan, all samples extracted and testing initiated; also initiated sampling people in Kandal.

Laos PDR – rodent and bat samples (309 rodents, 69 bats); desensitization meetings in a village for community surveillance, training at the end of the month for hospital and community work. IRB now approved.

Indonesia – lab work going forward, all data is up to date in EIDITH; pending IRB approval for EHA's community and MB's hospital work.

Thailand – Completed HQ translation into Thai. Started hospital surveillance in May (5 patients sampled and surveyed); behavioral data collection started in Chonburi; community surveillance -- 115 enrolled, sampled, and surveyed. FAO/DLS/USAID bats, pigs, and human sample collection – working towards triangulation soon. USAID will be observing – the Mission is putting together a documentary. Sampled wildlife in Loei (100 bats, testing in progress).

Malaysia – 105 people sampled concurrently including dogs, bats, rodents, macaques, and goats. PERHLITAN got ministry funding to do bat surveillance (independently of PREDICT), they agreed to share samples and data with us. Sampling to begin again in July, will be conducting training in the meantime. Bangladesh –human team is in final IRB has been pre-approved; 250 samples from 2 influenza outbreak work for all 5 viral families. Will be submitting sequences from suspected Nipah virus outbreak investigations soon.

China – sampling bats and rodents. Tested 483 bats for 5 viral families. Field work will continue in Yunnan in Sept. IRB approval from UCD and local partner, community sampling training is scheduled in September; MB: total n=212 enrolled, n=142 are in EIDITH waiting on results for 75 of samples. Working through issues with EIDITH because China blocks Chrome browser.

India – still going through stages of approval, ethical approval for human subjects. FAO not able to do livestock work in Uttar Pradhesh. Cross-training month-long effort last month. Completed site characterization and will be entering data in the next few days.

Nepal – working with 2 clinics to implement syndromic surveillance. Team is planning rodent/bat/human sampling in Silinge. PAHS sampled 4 syndromic surveillance, starting enrollment at Chitwan Medical College. Chepang community and bat sampling starting soon. AMR work starts in June.

Febrile illness in the community (e.g. patient module)

- Surveillance team will need to further consider how to address sampling of ill people in the community setting. Currently, the illness (patient) module is only available if we select 'hospital or clinic' in our site characterization. This means we typically won't have temp data or syndromic data on patients in the community and, if data were to be collected, there's no way to enter data into EIDITH.
- We discussed as a team whether we should have the option to record temperatures in the
 community, what the implications would be to amend the IRB, and whether sampling febrile or ill
 people in the community is culturally appropriate or feasible in every location. Most agreed this
 would be valuable data to collect, but we would need to add temp to the consent form.
 We will gather more info and revisit this issue as a team on a next call.

Concurrent/independent sites

• In order to group findings that are of relevance for viral sharing, we will be categorizing sites as concurrent or independent. This will also serve as a mechanism for us to be able to evaluate whether we are on track for our surveillance strategy and present data to partners.

Guidelines on Concurrent Surveillance and Concurrent Site Definitions (from a previous surveillance call)

Broad definitions for concurrent or independent sites from a previous surveillance call were recapped and are inserted here. Our definition for a 'site' is necessarily general, as we are trying to implement concurrent surveillance across a wide range of contexts and situations.

a. Concurrent site: A site at which we are sampling multiple taxa of animals and humans in close proximity of time and space to be able to detect virus transmission between species, i.e. viral spillover. We are mainly interested in detecting viral sharing among reservoir hosts, spillover hosts, and amplification hosts. We hypothesize that each site has several taxa of wildlife that could be sharing viruses with each other and humans due to close proximity contact, or effective contact, between wildlife shedding viruses (in saliva, urine, or feces) and susceptible people (or domestic species) nearby.

Some sites targeting bats might be larger if bats are known to forage within the concurrent site but roost elsewhere and can only be trapped at the roost site (but please recognize that this would require additional knowledge of bat movements to verify that these are the same individuals).

Humans can be sampled within the community at the concurrent site, or at the associated clinic/hospital, or both. The hospital or clinic for a concurrent site is within the catchment of the community sampled, where people in the community would go to if they presented with the clinical case definitions targeted.

<u>Example:</u> Country X sampled bats, non-human primates, and people at a site within 2 weeks and 2 km of each other. Sampling was done in several seasons over several years. People meeting specific clinical case definitions are being sampled at a nearby clinic 35 km away from the community year-round. Given multiple sampling trips, these events will be grouped around a concurrent site to demonstrate viral spillover and identify risk factors for spillover and spread.

b. Independent site: Any site at which we sampled outside of the original planned/targeted concurrent sites, or where no concurrent sampling is planned or has occurred. Outbreak investigations will often be at 'independent' sites.

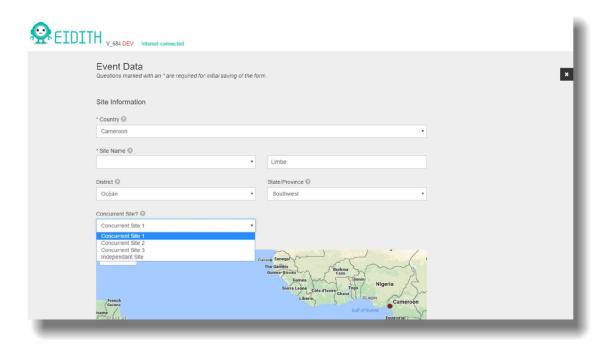
<u>Examples:</u> Country X sampled early on in the project at independent sites 1, 2, 3, 4 when doing initial investigations and scoping. Country X also sampled in response to a government request for assistance during an outbreak at independent sites 5, 6, and 7. All of the sampling data are important, and labeling these as independent sites will further inform how data should be categorized to better assess risk for spillover and spread and plan for necessary sample sizes.

We can set outer limits beyond which sampling would not be considered concurrent, i.e. sampling events that are not close enough in timing (within a month of sampling) or close enough in distance (spp targets are not in effective contact) to detect viral sharing.

Labeling concurrent/independent sites in EIDITH:

• IM team will be sending a spreadsheet of sites out to surveillance team; global leads should work with their in-country teams to categorize sites where we have already sampled at as concurrent or independent sites (see guidance above). Please bring any questions or concerns back to surveillance team as we work through grouping sites – it may not always be straightforward and surveillance activities necessarily vary across the landscape.

Going forward, those entering data will need to assign that event to a specific concurrent or
independent each time when they are uploading data (see below). IM will share monthly site
grouping reports with leads to help determine if country teams are grouping sites as they intend,
and help identify any questions or concerns for discussion on calls.



Risk characterization tables

• Three tables are presented to help us start to categorize risk using data in EIDITH. For now, we are mostly looking at sampling effort to make sure we have enough sample size to eventually characterize risk. The links are below, log into EIDITH first. If going directly to EIDITH.org, they are under the 'Reports' tab.

<u>Animals Sampled by Transmission Interface</u> – summary of sampling effort of wild and domestic animal taxa across disease transmission interfaces.

<u>Humans Sampled by Site Characterization Module</u> –summary of how we have characterized sites where we are sampling people. Later iterations will group animals in addition to humans in this table. <u>Humans Sampled by Livelihood</u> – summary of the occupations we have sampled; please review to ensure we are targeting the type of occupations we originally proposed in the surveillance plan.



EIDITH updates

All site modules are now available on EIDITH for extraction.

Please remind countries to respond to IM team when data have been rejected in QA to get issues fixed quickly (there are 65 events awaiting country input currently).

Indicator	Total	NewInLast2Week
		S
# countries with data	28	0
# animal sampled	33543	1351
# human sampled	2030	2
# specimens	169101	4953
# tests	69359	9110
average days between event and data submission	89	
average days between event and data submission for data submitted in last 2 weeks	44	
number of events/test batches waiting for country input	65	
number of events/test batches waiting for IM review	9	

Next Call
Thursday, Jun 22nd, 2017
@ 10am PT/1pm ET

From: "William B. Karesh" < karesh@ecohealthalliance.org>

Sent: 06/26/2017 10:10:34 AM (-07:00)

To: REDACTED

Cc: "Predict inbox" predict@ucdavis.edu>; "Jonna Mazet" <jkmazet@ucdavis.edu>

Subject: Re: [predict] Project from South of Brazil

Thanks!! Will do.

BK

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

EcoHealth Alliance 460 West 34th Street - 17th Floor New York, NY 10001 USA

+1.212.380.4463 (direct)

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www.ecohealthalliance.org

President, OIE Working Group on Wildlife

Co-chair, IUCN Species Survival Commission - Wildlife Health Specialist Group

EPT Partners Liaison, USAID Emerging Pandemic Threats - PREDICT-2 Program

EcoHealth Alliance leads cutting-edge research into the critical connections between human and wildlife health and delicate ecosystems. With this science we develop solutions that promote conservation and prevent pandemics.

> wrote:

On Jun 26, 2017, at 12:45 PM,

Hi Billy,

Here is Dr. Campos' email address. Thank you for communicating with her.

Aline Campos < REDACTED >

Best,

REDACTED

One health leadership fellow
University of California, Davis
One Health Institute

School of Veterinary Medicine

From: William B. Karesh [mailto:karesh@ecohealthalliance.org]

Sent: Monday, June 26, 2017 9:42 AM
To: REDACTED

Subject: Re: [predict] Project from South of Brazil



Any chance you can find Dr. Campos' email address? I'm happy to write to her and loop in others.

BK

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

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On Jun 14, 2017, at 12:12 PM,

REDACTED

wrote:

Hi Billy,

I am a new fellow working with Jonna. I am passing this email to you that was sent to predict@ucdavis.edu, FYI.

Brooke mentioned that the same group from Brazil has previously reached out to Jonna.

Best,

REDACTED

One health leadership fellow University of California, Davis One Health Institute School of Veterinary Medicine From: predict-request@ucdavis.edu [mailto:predict-request@ucdavis.edu] On Behalf

Of Aline Campos

Sent: Wednesday, June 14, 2017 6:29 AM

To: predict@ucdavis.edu

Subject: [predict] Project from South of Brazil

Dear Sir

We are a multidisciplinary group composed of academic and government professionals with different backgrounds (veterinarians, biologists, bioprocess engineer) and area of expertise (virology, epidemiology, animal behavior), aimed at monitoring and better understanding the ecoepidemiology of viral diseases of public health interest. These actions are regularly carried out in the *Program for the Rabies Control and Prevention of the State of Rio Grande do Sul*, South of Brazil.

The Program for the Rabies Control and Prevention of the State of Rio Grande do Sul (PRCPRS) focuses on activities that, in addition to the monitoring itself, produces samples that may contribute to prevention, elucidation and control of other diseases and microorganisms of interest.

Because of the high complexity of the actions taken for the development of this program (Rabies Control), considering the need of vehicles over long distances - sometimes in places of difficult access, trained professionals, IPE and other materials – we think it would be worth to optimize these actions and share the obtained samples with other research groups. Thus, the research frontiers have been widened based on the routine search for rabies virus in wild animals in the South of Brazil. These new frontiers include the *Bats Monitoring Project*, the *Wildlife Road Killed Project* and the *Wild Primate Monitoring Project*. In addition to these projects, we receive wild animal samples which are part of the natural demand of samples brought by the local population.

In the *Bats Monitoring Project*, we travel through the whole State of Rio Grande do Sul performing the identification of different species of insectivorous, vampire, frugivorous and other bats (through washers) and collect samples (blood, feces, urine, oral swabs), in established colonies of bats (urban and wild). Dead or fallen animals found in these colonies are sent for rabies diagnosis (by immunofluorescence-IF) and other samples are used to perform the identification of their virome by Next Generation Sequencing.

In the *Wildlife Road Killed Project*, we collect tissue samples of different species of wild animals that are road killed in rural areas (carnivores, primates, herbivores), to perform rabies surveillance by IF. In addition, we started to collect and are try to get resources to perform the sequencing by NGS for the identification of other viruses of interest and to help elucidate the possible reservoirs involved in maintenance cycles of emerging diseases.

In the Wild Primate Monitoring Project, carried out with the support of the Brazilian environmental control agency - IBAMA, we collect blood samples

from free living primates and from Wild Animals Collection Centers to perform serology for rabies. In addition, we also collect other biological samples (urine, feces and oral and anal swabs) in order to try to identify their virome by NGS (depending on resources) and other microorganisms that may be of public health interest.

The natural demand contemplates bat specimens found dead and other animals species involved in aggression to humans, or any other type of interaction that may represent risk, brought by the local population.

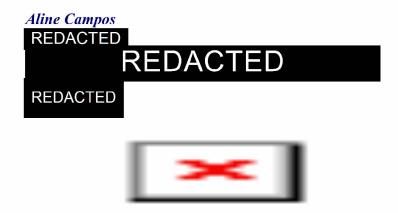
The inclusion of samples obtained through the active search, not only limiting the samples involved in aggression and brought by the population, means a considerable improvement in the monitoring and enables to obtain samples from healthy animals, which may play a main role in the maintenance cycle various diseases, as reservoirs. Such active search for reservoirs has been insufficiently executed because of the lack of financial resources

Our initiative is a collaborative action between the Rio Grande do Sul State Secretary of Health and the Federal University of Rio Grande do Sul - UFRGS, and involves actions covering several areas such as virology, molecular biology, microbiology, bioinformatics, modelling and ecoepidemiology of diseases. The main objective of this project is to improve projects and training in public health through the surveillance of infectious agents, sharing data and expertise between health professionals, students and scientists.

Given the research interests in PREDICT we would like to know more about your methods of research and, if it is in your interest, start a conversation about the possibility of a partnership.

We appreciate your time and consideration and look forward to hearing from you

Best Regards



From: William B. Karesh karesh@ecohealthalliance.org

To: Jonna Mazet < jkmazet@ucdavis.edu>

CC: David Wolking <djwolking@ucdavis.edu>;Predict inbox predict@ucdavis.edu>;Evelyn

Luciano < luciano@ecohealthalliance.org>

Sent: 9/8/2017 4:12:18 PM

Subject: Re: travel to RoC - onboarding new country liaison

Thanks. Completely with you on that. I'll hold off till Monday and we can ponder a bit. Anne is headed into the forest in DRC for two weeks of Ebola sampling and is happy to follow any decision we make.

A bientôt

В

Sent from my iPhone

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

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New York, NY 10001 USA

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On Sep 8, 2017, at 5:55 PM, Jonna Mazet < <u>ikmazet@ucdavis.edu</u>> wrote:

Thanks for the update.

I'm fine with her going over on other funds and smart not to push for an ITA until we really need one. It's been awkward in the past when we let Missions know that people are coming and purposefully not doing an ITA. It works if the person has other reasons to be in-country, but isn't great when we let them know that we're averting the process and still doing Predict work. So a meet & greet w/o notifying USAID is an option, as would be letting the Mission know that she will be there on other EHA business and will stop by to meet the team. May be other options that you have already considered for reasons fo her to be there. Whatever you think.

See you Monday!

On Fri, Sep 8, 2017 at 9:00 AM, William B. Karesh karesh@ecohealthalliance.org wrote:

Hi there.

We've selected Dr. Anne Laudisoit this week as our new country liaison for ROC. She will begin full-time for us at the end of November, but she is currently working/living in DRC and then moving at the end of September.

She is available to do a day trip on the ferry to go over to Brazzaville from Kin on the 25th of September to see and meet the lab folks and the behavior team.

I don't want to push for an ITA at such short notice and we can cover the expense from other funds. I can still let the USAID rep in Brazzaville know about it and copy the regular group.

Just want to check with you to see if you are comfortable with this approach.

BK

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

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From: REDACTED

Sent: 10/20/2017 9:37:50 AM (-07:00)

Cc: "Catherine Machalaba" <machalaba@ecohealthalliance.org>; "William B. Karesh"

Attachments: 10.12.2017 surveillance call notes.docx, EIDITH QA guide for global leads v10.11.2017.docx

Hi Surveillance Team.

Attached please find the notes from our last call for your review. Let us know if you have any corrections before we send on to CCs.

Our next call is Thurs, Oct 26th at 10am PT/1pm ET – let us know if you have any topics for discussion, we'll circulate an agenda next week.

Action Items and Reminders for next call:

- 1. Next meeting Oct 26th, 2017
- 2. Asia country updates on next call; field and lab activities updates, GHSA highlights, zoonotic disease prioritization workshops, update on data entry and any hurdles/concerns.

Have a great weekend,

REDACTED

REDACTED

Research Associate
Emerging Pandemic Threats PREDICT Project
EpiCenter for Disease Dynamics
One Health Institute
UC Davis School of Veterinary Medicine



skype REDACTED



Instructions:

- 1. When an event is ready for QA, the country team should "check in" the event
- 2. The country team contacts the global lead to let them know they have event(s) ready for review
- 3. The global lead logs into http://connect.eidith.org. Choose the country you are working with (if you have access to more than 1 country)
- 4. "Check out" the event by pressing the button in the dashboard. Once the checkout is complete, the event name will become a link into the event data on the dashboard
- 5. It is easiest to QA the site/event & human data directly in EIDITH, in the app forms. However, to review the animal sample/specimen data it may be easier to download the data and review it in excel. Click on the buttons in the sidebar inside the event to execute the download.



6. From this point, it is up to each group to decide who will make any changes to the data and who will finally upload the event to the IM team once all data have been reviewed.

QA Checks

Overall

• Ensure all notes and "other" fields are in English

Site Characterization

- Site Name New names match usual format for that country (check dropdown list of existing sites)
- Is the province correct? (if a new site)
- Is the concurrent sampling flag correct for the site?
- Review site/event locations on map. Do the markers on the map appear in the right country, province and district?
- Event duration does the number of days make sense?
- Transmission Interface
 - Check that the interfaces selected seem logical for the site.
 - If they have chosen "outbreak investigation" ensure this is considered a government assisted outbreak investigation.
- Review the question "at what interface(s) did sampling occur for this event?" These should only be checked if animals/humans were sampled for **this** event only. This is commonly found error.

Page 1 | 5



Review estimated number of animals; does the amount make sense for the site?

Site Characterization Modules

Animal Production

- Number of enclosures multiplied by average number of animals per enclosure should match the count range entered.
- Ensure the number of people who work here makes sense for the site.
- Ensure that any animals entered in the "other" field aren't already in the list.

Crop Production

- Ensure the crops selected make sense for the site.
- Make sure the animals present make sense for the site.
- Ensure that any crops entered in the "other" field aren't already in the list.

Extractive Industry

- Check the extractive industry chosen makes sense for the site, especially "others".
- Make sure the land conversion options make sense for the site.

Market & Value Chain

- Check the number of vendors makes sense for the market.
- Check live/dead/parts sold at market makes sense with other questions in the module.

Zoos

- Make sure the number of visitors makes sense for the area.
- Number of enclosures multiplied by average number of animals per enclosure should match the count range entered.

Animal Sampling

- Review "other" taxonomic groups.
- Check animal IDs for consistency. For example, the number zero (0) is often replaced by the letter (o).
- Check that the date of animal sampling makes sense and is within the timeframe created by the "event date" and the "event duration"
- If the animal is found sick or injured, review the clinical signs. If something is written in "other" ensure it doesn't already exist on dropdown list provided.
- Animal to Human Interfaces Watch that options chosen are logical with the disease transmission interfaces selected for the event. See appendix A for a cross-reference chart.
- Animal Use does the animal use selected make sense for this taxa?

Page 2 | 5



• If this event included non-invasive sampling, such as collecting bat guano from the bottom of a cave, ensure they are recorded correctly (see appendix B).

Specimens

- If using EIDITH generated IDs, ensure the animal ID portion matches the specimen ID. If they do not match, please override the ID so that they match.
- If not using EIDITH generated IDs, ensure the IDs are consistent in form and length.
- Review specimen types collected.
- Review "other" specimen types make sure they aren't already on the dropdowns.
- Review "other" mediums and containers, make sure they make sense for the specimen type.

Human Questionnaires

Demographics

 Q8 - Make sure the age of the participant makes sense for all other responses on the education, animal contact & livelihood modules. For example, a young child going to high school or working as a protected area worker.

Livelihood

- Q24 Check the livelihoods making sure the "other" value doesn't already exist in the dropdown list provided.
- o If "other" livelihood was entered, make sure the "other category" chosen makes sense for the value entered. (this is a future change)

Medical History

- Q29 & Q31 Check the "other" values to make sure they don't already exist in the dropdown list provided.
- If an "other" illness in Q31 Medical History is entered, it should also be entered in the "other" text box in Q29.

Human Illness Module

• Hospitalization date should make sense for the interview date.



Appendix A

	Disease Transmission Interfaces							
	animal production	crop production	dwellings & temporary settlements	extractive industry	market and value chain	natural area	wildlife restaurant	zoos and sanctuaries
	private sale	raiding crops	in human dwelling	within 10m of workers in extractive industry	for sale in market	hunted	for sale in restaurant	private wildlife collection or pet
	preying on livestock or their food	within 10m of workers harvesting crops	public safety hazard (e.g. threat to humans)	contact with domestic animals or humans NOT likely	raiding markets	within 10m of tourists/ecotourism	destined for consumption	200
Acceptable animal-to- human interfaces	destined for consumption				destined for consumption	within 10m of park personnel in intensive wildlife management area		sanctuary
	at abattoir/ slaughterhouse				at temporary holding facility in value chain	within 10m of researchers (other than PREDICT staff)		rehabilitation center
	wild animal farm				in transit along the value chain			within 10m of park personnel in intensive wildlife management area
	guano or manure farm				private sale			



Appendix B

Non-invasive Sampling

If the event includes non-invasive sampling (for example collecting bat guano from the bottom of a cave), create one animal ID for each specimen (there could be 2 specimens, 1 stored in Trizol, the other in VTM). For specimen types, please use what you have collected, for example urine/feces combined (guano), feces or saliva.

When entering non-invasive animal sample data into EIDITH, choose "alive (non-invasive sample collection)" under the "condition at sampling". Also include sampling notes in the note field that appears when this option is chosen. Some examples are: "bat guano from bottom of the cave" or "salvia from a chew rope".

October 12th, 2017 Surveillance Team Call

Action Items and Reminders for next call:

- 1. Next meeting Oct 26th, 2017
- 2. Asia country updates on next call; field and lab activities updates, GHSA highlights, zoonotic disease prioritization workshops, update on data entry and any hurdles/concerns.

Participants: Marcy Uhart, Lucy Keatts, Tracey Goldstein, Taylor Gabourie, Kidan Araya, Chris Kreuder Johnson, Tammie O'Rourke, Karen Saylors, Matt LeBreton, Damien Joly, Dan O'Rourke, Dave McIver, Dawn Zimmerman, Megan Vodzak, Sarah Olson, Leilani Francisco, Jon Epstein, Mindy Rostal, REDACTED



Sharing data collection tools

• We recently received a request from the embassy in Cameroon to share some of our data collection tools (e.g. bubble forms for site characterization, human questionnaire, etc.), but wanted to ensure surveillance team was in agreement before sending in case the team identified any possible issues or unintended consequences. We can go ahead share forms in the collaborative spirit when requested, but should message to recipients that none of these forms are able to be changed at this point. If teams are getting requests from Missions and partners, we can share the bubble form PDFs which bear the watermark "example only -- do not use in field" from EIDITH under Resources>Bubble Form Examples.

Surveillance implementation Q&A

Timeline for sampling symptomatic humans

- There was question about the sampling humans "within a 10 day window from onset of symptoms" on the surveillance and testing priority slides. In general, collecting samples within 5 days of onset of symptoms is ideal to catch the viral shedding window. 10 days would be the upper limit for exceptional cases. Some other clarifications:
 - o In the case definitions from our SOP for human syndromic surveillance, we have within 5 days from onset of symptoms as a guideline. When people present with symptoms, the best practice is to collect samples as soon after onset of fever as possible.
 - o Beyond that, i.e. collecting samples in the 6-10 days following onset of symptoms, is to lend flexibility for teams to use their own judgement as to whether to take and test additional samples that are collected from patients. However, collecting samples in this window should be treated as the exception rather than the norm.
- For interviewing children under 12, should the adults or children be answering the question?
 - o There is no set in stone protocol in order to allow for a judgement call on a case-by-case basis. The child and parent should be together when we ask the questions parent can assist or answer and ask the child additional information if they are not sure.
- When should we release nocturnal rodents we capture at night? When baiting traps with fruits, how to avoid insects inundating traps which might be harmful to the rodents?
 - Recommend release time is in the early evening so they aren't too vulnerable to predation. Some teams provide sugar water to help abate the stress of being captured.

Depending on the insect type, they may be repelled using grease around the outside of the trap. Using different baits may help too, e.g. palm nut, peanut paste, corn cobs, etc.

Global lead data QA

• A data quality assurance checklist was shared with surveillance team -- please take a look at guide and see if it is useful for leads/liaisons/country coordinators to start to participate in the QA process. We can revisit next surveillance call and come up with a plan for how to use this tool.

Labels for HQ/human samples

• IM has been working to develop labels that can be generated in EIDITH to help link HQ/human samples. It should be ready by the end of Oct.

Government report approval letters

• IM team created a Government Reporting Process document that can be found in EIDITH under Resources>EIDITH documents>Government Reporting Process. Please review this document and let IM team know if there are any questions.

EIDITH indicator update

Indicator	Total	NewInLast2Weeks
# countries with data	30	0
# animals sampled	47397	2149
# humans sampled	4268	777
# specimens	259907	16006
# tests	132214	13301
# animals tested	14133	
# humans tested	936	
# animal specimens tested	23603	
# human specimens tested	1177	
# tests active testing ongoing	1030	
# tests waiting interpretation	479	
average days between event and data submission	86	
average days between event and data submission for data submitted in last 2 weeks	70	
number of events/test batches waiting for country input	41	
number of events/test batches waiting for IM review	217	

Africa country updates; field and lab activities updates, GHSA highlights, zoonotic disease prioritization workshops, update on data entry and any hurdles/concerns.

Egypt – Sampled n=244 bats on two trips, sampled and surveyed 150 humans (3 trips, human behavioral risk and biological samples) along the camel value chain. All data in EIDITH. Viral family testing ongoing, serological testing for bat and human samples completed. Bat and human sampling target reached for Y3. Completed bat testing for viral families.

Jordan – Completed 271/538 tests. 153 humans sampled (almost to target), animal sampling complete. Ethiopia –Continuing bat and primate sampling. FAO now wants to share camel samples and funds for testing. Human syndromic MOU is in place and IRB approval is in process - not started on human sampling yet, expected to begin by Oct/Nov.

Kenya – Election shut down occurred around August 8th, so activities will resumed late Aug/early Sept. IRB approved; human surveillance rolled out in September. All wildlife data uploaded and testing is ongoing. Dry season concurrent sampling complete; 2600 samples; planning event for One Health Day in Nov for outreach.

Tanzania – sampling in the Lake zone (bats) and conducting FGs and interviews. The SUA laboratory is working to ship samples for confirmatory testing to UCD. There is a delay in lab testing as the gel doc is currently broken, but is being replaced to prepare for ramp up of sample testing. Ashna Kibria (USAID) visited the SUA and IHI labs on May 15th-16th, and there was a USAID EPT2 partner coordination meeting in Dar es Salaam on May 18th. Human syndromic surveillance began at the Ujiji Health Clinic with 32 patients enrolled in June, the clinic staff have been trained, and sampling supplies are being delivered this week. P4P workshop from P&R is running, PREDICT may be involved. Gombe national park — NHPs (baboon, vervets, chimps). In mid-August will initiate first concurrent community sampling in Kibondo area.

Uganda – subcontract for new laboratory partners (UVRI) approved, will initiate testing bat, rodent, and NHP samples soon. Field and human surveillance activities well underway. Starting discussion on adding a second concurrent sampling site in Y4 in the Queen Elizabeth (National Park) Conservation Area.

Rwanda – actively sampling wildlife. Field Veterinarian is on leave. The National Reference Laboratory, is working on human samples; to address a backlog of wildlife samples that need to be tested, will be sending a large batch of wildlife samples to UC Davis. Shifting to human surveillance at Nyongwe National Park. Y3 animal and human surveillance targets met.

Eastern DRC – The country coordinator has been focusing sampling efforts on baboons, but this got side-tracked this past week by a difficult orphan mountain gorilla clinical case; human surveillance is underway. 150 mountain gorilla fecal samples from the 2016 Virunga-wide census (Rwanda, Uganda and eastern DRC) to UCD, which will be screened for PREDICT priority viral families. Human surveillance underway.

DRC –Y3 rodent and bat targets met; sampling bushmeat in Kinshasa. Y3 enrolled 209 patients & met target. For Y4 – 3 human patients sampled. Completed transcription of all interviews for Y3.

RoC – current focus in RoC is on human behavioral activities in bushmeat markets around Brazzaville; completed 12 human questionnaires and 50 ethnographic interviews in bushmeat markets and are in the process of uploading this data into EIDITH. Planning to conduct a focus group around bushmeat in an island partway between Brazzaville and DRC.

Cameroon – Animal sampling target complete for Y3 and all data is in EIDITH. Started human surveillance on Sept 25th – ahead of that trained more than 20 hospital staff in preparation for surveillance launch. Enrolled 10 patients for syndromic surveillance, 8 for community. CRESAR/Predict lab tested 3 nasal swab samples from a gorilla die-off in East region – nasal swabs negative for Ebola. Lab throughput is increasing (180 samples per week). JEE took place 25-29 of September 2017. Government asked PREDICT staff to assist in the working groups on Zoonosis, National Laboratory Systems and BSS. USAID PREDICT's contribution to developing pilot wildlife disease surveillance programs was explicitly mentioned by the GoC presenter during the Zoonoses session.

Guinea – completed joint field training in Sierra Leone in September mostly for refresher course on biosafety and security. IRB approved for behavioral studies. Preparing first shipment to UCD and lab training.

Sierra Leone – The teams resumed animal sampling in Sept/Oct during a joint training with team members from Senegal and Guinea. During this training a refresher course on PPE, biosafety, the core basic EIDITH modules, and other lessons learned across all three countries were completed and shared. The training was a success and the teams proceeded to sample bats and rodents for 3 days/nights. A total of 42 bats and 6 rodents were sampled.

Cote d'Ivoire – collected samples from n=152 bats and n=54 rodents. EHA joining upcoming sampling trip and launch event. Met with community leaders, police force, etc., and received very positive response for syndromic surveillance. Began sampling humans in Sept/Oct.

Liberia – Preparing the next shipment to Columbia for 2500 samples in early Sept. IRB approved for EHP questionnaire. All data in EIDITH. Second batch of 1000 samples sent to CU.

Senegal – Animal team trained in safe sampling, PPE etc. 104 humans enrolled and starting community engagement enrollment in Oct.

Ghana – Submitted revisions for two local IRB protocols, one has been reviewed. Aiming to launch clinic work by October.

Next call Thurs, Oct 26th, 2017 From: "Amanda Andre" <amanda.andre@ecohealthalliance.org>

Sent: 01/03/2018 8:52:59 AM (-08:00)

To: "Katherine Leasure" <kaleasure@ucdavis.edu>

Cc: "William B. Karesh" <karesh@ecohealthalliance.org>; "Brooke Genovese"

<bgenovese@ucdavis.edu>; "Jonna Mazet" <jkmazet@ucdavis.edu>; "David Wolking" <djwolking@ucdavis.edu>

Subject: Re: First morning - Brussels meeting

Attachments: External Attendees.xlsx

Dear Katie,

We heard back from a few more people planning to attend. Attached is the updated list with new names highlighted in yellow.

Best,

Amanda Andre

Administrative Assistant to the Executive Vice President for Health & Policy

EcoHealth Alliance 460 West 34th Street – 17th floor New York, NY 10001

1.212.380.4470 (direct) 1.212.380.4465 (fax)

www.ecohealthalliance.org

EcoHealth Alliance leads cutting-edge scientific research into the critical connections between human and wildlife health and delicate ecosystems. With this science, we develop solutions that prevent pandemics and promote conservation.

On Tue, Jan 2, 2018 at 6:21 PM, Katherine Leasure < <u>kaleasure@ucdavis.edu</u>> wrote:

Hi Amanda,

Thank you for the attached list. I will prepare accordingly with regard to catering and name tags. Unfortunately, we are not planning for remote access for this meeting.

Happy New Year!

Katie

From: Amanda Andre [mailto:amanda.andre@ecohealthalliance.org]

Sent: Tuesday, January 02, 2018 2:03 PM

To: Katherine Leasure

Cc: William B. Karesh; Brooke Genovese; Jonna Mazet; David Wolking

Subject: Re: First morning - Brussels meeting

Dear Katie,

Attached is a list of external invitees planning to attend. Please note that some people asked about remote access to listen to the session. Do you know if this will be possible? Thank you and Happy New Year!

Best,

Amanda Andre

Administrative Assistant to the Executive Vice President for Health & Policy

EcoHealth Alliance 460 West 34th Street – 17th floor New York, NY 10001

1.212.380.4470 (direct) 1.212.380.4465 (fax) www.ecohealthalliance.org

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On Tue, Jan 2, 2018 at 2:54 PM, Katherine Leasure <kaleasure@ucdavis.edu> wrote:

Hi Billy,

Do you have an update on external invitees for the January 9 afternoon session? I'm trying to finalize the head count for reception catering, and also want to include name tags with their affiliation, if possible.

Thank you,

Katie

From: William B. Karesh [mailto:karesh@ecohealthalliance.org]

Sent: Wednesday, December 06, 2017 10:28 AM

To: Katherine Leasure; Brooke Genovese **Cc:** Amanda Andre; Jonna Mazet; David Wolking **Subject:** Re: First morning - Brussels meeting

Great, all set.
BK
William B. Karesh, D.V.M
Executive Vice President for Health and Policy
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Co-chair, IUCN Species Survival Commission - Wildlife Health Specialist Group
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health and delicate ecosystems. With this science we develop solutions that promote conservation and prevent pandemics.

Hi Billy, Just following up on Brooke's email, the internal PREDICT sessions will be from 9:00am - 12:00pm. The external session is planned for 2:00pm to 5:00pm. Thank you, Katie On Wed, Dec 6, 2017 at 10:00 AM, Brooke Genovese < bgenovese@ucdavis.edu > wrote: Hi Billy, We're planning for the internal PREDICT sessions to run from ~9:00 am to 1:00pm on Jan 9 (Day 1). The "external" session for EU officals, ect is slotted to begin at 2:00 pm. Jonna is also fine with widening the invitee list beyond Brussels and Amsterdam, but wants to reiterate that PREDICT can't pay for any of the attendee's travel costs to and from Brussels. Let us know if you have any other questions, **Brooke Brooke Genovese** PREDICT Project Support **Executive Analyst** One Health Institute School of Veterinary Medicine Tel: 530-752-6459 bgenovese@ucdavis.edu

On Dec 6, 2017, at 1:11 PM, Katherine Leasure < kaleasure@ucdavis.edu> wrote:

From: REDACTED > on behalf of Jonna Mazet < <u>ikmazet@ucdavis.edu</u>>

Date: Wednesday, December 6, 2017 at 9:48 AM **To:** Brooke Genovese < bgenovese@ucdavis.edu **Subject:** Fwd: First morning - Brussels meeting

----- Forwarded message -----

From: William B. Karesh < karesh@ecohealthalliance.org >

Date: Tue, Dec 5, 2017 at 11:26 AM Subject: First morning - Brussels meeting To: Jonna Mazet < jkmazet@ucdavis.edu>

Cc: David Wolking < djwolking@ucdavis.edu>, Amanda Andre < amanda.andre@ecohealthalliance.org>

As I get ready to reach out Europeans about attending the opening session the 9th, I wonder if we should schedule the first morning to be from 10:00 - 1:00, allowing some that want to travel to come on a morning train or flight. WCS wants someone from Germany invited, and if we do that, we should widen the list beyond Brussels and Amsterdam.

What do you think?

BK

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

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Katherine Leasure
HR/Payroll/Financial Assistant
One Health Institute 530-752-7526

	А	В	С	D	Е	F	G	Н
1	First Name	Last Name	Organization			Remote Access		
2	Moritz	Klemm	European Commission			Elizabeth	Mumford	WHO
3	Maria	Pittman	European Commission			Maria	Van Kerkhove	WHO
4	Klaas	Dietze	Friedrich-Loeffler-Institut			Stéphane	De La Rocque De Severac	WHO
5	John Paul	Clark	World Bank					
6	Keith	Hamilton	OIE					
7	John	Mackenzie	External Advisor					
8	Ronald	Waldman	External Advisor					
9	Subhash	Morzaria	External Advisor					
10	David	Lefebvre	Veterinary and Agrochemical Research Centre					
11	Annebel	De Vleeschauwer	Veterinary and Agrochemical Research Centre					
12	Mieke	Steensels	Veterinary and Agrochemical Research Centre					Ĭ
13	Kris	De Clercq	Veterinary and Agrochemical Research Centre					
14	Alexander	Rinkus	Healthfor Animals					

From: "Terra Kelly" <trkelly@ucdavis.edu>
Sent: 01/16/2018 2:36:30 PM (-08:00)

To: "William B. Karesh" <karesh@ecohealthalliance.org>

Cc: REDACTED ; "Jonna Mazet" <jkmazet@ucdavis.edu>;

"predict@ucdavis.edu" <predict@ucdavis.edu>

Subject: Re: [predict] Fwd: Monkey Pox and other zoonoses - West and Central Africa

Thanks Billy! I absolutely agree. Happy to reach out to Richard to gauge his interest/availability if PREDICT should participate.

Best, Terra

On Tue, Jan 16, 2018 at 3:22 PM, William B. Karesh < <u>karesh@ecohealthalliance.org</u>> wrote:

I wouldn't want to stop Richard or your Ghana team from participating, but I did think it was appropriate to ask Scott (FAO) the questions I posed so that we invest time wisely. If it's just something Scott wants to organize to look like they are staying busy and "coordinating" all of us for the region, then I think we should think about how much time we want to take away from other work we have to do for USAID. And if we decide to participate, then we certainly want to report on it to USAID and be able to use the information from the meetings.

BK

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

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On Jan 16, 2018, at 4:48 PM,

REDACTED

> wrote:

Hi Terra,

My pleasure and thank you for the additional information. I will share your information with Billy here, cc'ed.

Thanks,



From: Terra Kelly [mailto:trkelly@ucdavis.edu]

Sent: Tuesday, January 16, 2018 1:14 PM

To: REDACTED

Cc: predict@ucdavis.edu

Subject: Re: FW: [predict] Fwd: Monkey Pox and other zoonoses - West and Central Africa

Thanks much appreciated! Our wildlife veterinarian for PREDICT in Ghana, Dr. Richard Suu-Ire of the Wildlife Division (Min of Land and Nat Resources), has worked on monkey pox (with CDC) and other zoonotic disease projects and will likely be interested in participating in these calls if PREDICT will be joining the discussions. Richard works with Billy on OIE activities. Let me know what Billy and others think as information rolls out and I can follow-up with Richard if needed.

Best, Terra

On Tue, Jan 16, 2018 at 10:10 AM,

REDACTED

wrote:

Hi Terra,

Forwarding this conversation for your awareness.

Thanks,



From: predict-request@ucdavis.edu [mailto:predict-request@ucdavis.edu] On Behalf Of William B.

Karesh

Sent: Tuesday, January 16, 2018 7:59 AM **To:** Predict inbox predict@ucdavis.edu

Subject: [predict] Fwd: Monkey Pox and other zoonoses - West and Central Africa

FYI

Begin forwarded message:

From: William Karesh < karesh@ecohealthalliance.org >

Subject: Re: Monkey Pox and other zoonoses - West and Central

Africa

Date: January 16, 2018 at 10:58:39 AM EST

Cc: Jonna Mazet < jkmazet@ucdavis.edu >

Dear Scott and Charles,

Happy New Year to you both.

Are there some specific goals or deliverables associated with the call and a standing agenda? Is the information discussed open for public dissemination or is more focused on gathering information to inform FAO, WHO and OIE but not to be shared more widely? I ask because if we are using USAID funds to support the discussions, we would want to be able to share the information with USAID/W, local Missions, etc.

Any additional information would be helpful to figure out how we might participate.

BK

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

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On Jan 16, 2018, at 9:59 AM, Newman, Scott (FAORAF)

REDACTED wrote:

Dear Billy and Jonna-

Wishing you a happy and healthy 2018!!

Charles, in cc, and FAO have been working together with WHO and OIE on a regular basis conducting periodic regional conference calls that were initially focused on Monkey pox in West and Central Africa but are now expanding somewhat to include other zoonotic diseases, as needed.

We would like to invite wildlife counterparts to participate in these calls and in light of your PREDICT Program as well as linkages to other wildlife organizations (Wildlife Health Specialist Group, CBD, or others), we wanted to ask if you had any advice on who we might ask to participate in these calls- To start, it may be easier of there was a central or west Africa regional wildlife focal point as we want to be cognizant of not having too many people on the call so if you have any thoughts on wildlife organizations/representatives to include, we would appreciate your suggestions.

Thanks and best wishes, Scott

Scott newman, DVM, PhD
Senior Animal Health & Production Officer
Regional Office for Africa
Food and Agriculture Organization of the United Nations
Accra GHANA

Skype: REDACTED
Land line: - REDACTED
Extension: REDACTED

<image001.jpg>

From: "Andrew Clements" <aclements@usaid.gov>

Sent: 03/05/2018 3:00:51 AM (-08:00)

To: "GHSD Unit Mail List (USAID)" <ghsdunitmaillistusaid@usaid.gov>; "Jonna Mazet"

<jkmazet@ucdavis.edu>; "Jonathan Epstein" <epstein@ecohealthalliance.org>; "Kevin Olival, PhD"
<olival@ecohealthalliance.org>; "William Karesh" <Karesh@ecohealthalliance.org>; "Peter Daszak"

<daszak@ecohealthalliance.org>; "David J Wolking" <djwolking@ucdavis.edu>; "Christine Kreuder Johnson"

<ckjohnson@ucdavis.edu>

Subject: Fwd: Fw: Bat story from Al Jazeera

FYI.

----- Forwarded message ------

From: **Daniel Schar** < <u>dschar@usaid.gov</u>> Date: Mon, Mar 5, 2018 at 4:45 AM

Subject: Fwd: Fw: Bat story from Al Jazeera

To: "Clements, Andrew (GH/HIDN)" < <u>AClements@usaid.gov</u>>, PREDICTMGT

<PREDICTMGT@usaid.gov>

Cc: "Damrongwatanapokin, Sudarat (RDMA/OPH)" < sdamrongwatanapokin@usaid.gov >, Anchalee Jatapai

<a i style="color: blue;"><a jatapai@usaid.gov>, BANGKOK USAID OPH bangkokusaidoph@usaid.gov>

FYI

----- Forwarded message -----

From: S Wacharapluesadee REDACTED

Date: Mon, Mar 5, 2018 at 10:39 AM Subject: Fw: Bat story from Al Jazeera

To: Daniel USAID <<u>dschar@usaid.gov</u>>, "Dr. Sudarat Damromgwatanapokin" <<u>sdamrongwatanapokin@usaid.gov</u>>, Richard Nyberg <<u>rnyberg@usaid.gov</u>>

FYI,

Thank you, Supaporn

Supaporn Wacharapluesadee, PhD
Thai Red Cross Emerging Infectious Health Science Centre,
Neuroscience Center for Research and Development &
WHO-CC for Research and Training on Viral Zoonoses

King Chulalongkorn Memorial Hospital



From: Papitchaya B REDACTED

Sent: Monday, March 5, 2018 9:47 AM

To: S Wacharapluesadee

Subject: Bat story from Al Jazeera

Dear P'Chu,

The story was aired yesterday. You can watch it online here:

https://www.aljazeera.com/news/2018/03/thai-scientists-test-bats-pigs-viruses-passed-humans-180304133923569.html

Thai scientists test bats and pigs for viruses passed to humans

www.aljazeera.com

In Thailand, scientists are testing fruit bats and pigs to find out how viruses are passed on to people. The hope is that this will help them contain and beat pandemics.

Have a nice day ka Phung

--

Andrew Clements, Ph.D.
Senior Scientific Advisor
Emerging Threats Division/Office of Infectious Diseases/Bureau for Global Health
U.S. Agency for International Development

Mobile phone: 1-571-345-4253 E-mail: aclements@usaid.gov

For more information on USAID's Emerging Pandemic Threats program, see: http://www.usaid.gov/ept2

From: "William B. Karesh" <karesh@ecohealthalliance.org>

Sent: 03/07/2018 11:46:58 AM (-08:00)

To: "Chris Johnson" <ckjohnson@UCDAVIS.EDU>

Cc: "Jonna Mazet" REDACTED

Subject: Re: Request for meeting with Congressman Bera, Oct 23

Attachments: UCD letter - WBK.docx

my suggestions attached.

BK

March XX, 2017

The Honorable Tom Cole Chairman Subcommittee on Labor, HHS, Education, and Related Agencies U.S. House of Representatives Washington, D.C. 20515

The Honorable Hal Rogers Chairman Subcommittee on State, Foreign Operations, Operations, And Related Programs U.S. House of Representatives Washington, D.C. 20515 The Honorable Rosa DeLauro
Ranking Member
Subcommittee on Labor, HHS, Education
and Related Agencies
U.S. House of Representatives
Washington, D.C. 20515

The Honorable Nita Lowey Ranking Member Subcommittee on State, Foreign

And Related Programs U.S. House of Representatives Washington, D.C. 20515

Dear Chairmen Cole and Rogers and Ranking Members DeLauro and Lowey,

We write to urge you to fully fund HHS, CDC and USAID activities that help nations monitor, detect, and respond to pandemic threats before they reach our shores.

As you know, in 2014, Congress appropriated over \$5 billion in emergency funding to respond to the Ebola epidemic that killed over 11,000 individuals worldwide. Approximately \$1 billion was allocated to the CDC and USAID to help developing countries prepare for and respond to future epidemics. According to news reports, these funds are about to run out, even as the work is far from over. The CDC is slated to end its work in 39 out of the 49 countries it operates in, while USAID may wind down half of their operations in Africa, the Middle East, and Asia.

We need to ensure that before we start withdrawing from these countries, they have the capacity and know how to effectively detect, contain, and handle infectious disease outbreaks. This should be a gradual and rational process, not a sudden drawdown. Ensuring that USAID and agencies across HHS can undertake this transition is critical to keeping America safe.

USAID's role is critically important as their mission is to build capacity among our allies and friends to stop diseases from spreading around the world. USAID's Emerging Pandemic Threats PREDICT program assists countries in detecting and dealing with emerging diseases. 75% of new or emerging diseases that affect humans originate in animals, including Influenza, HIV/AIDs, SARS, and Ebola. By strengthening country capacity at all levels to deal with these kinds of diseases, USAID plays a critical part in preventing diseases from spreading in humans.

This work has already had a tremendous impact. In Cameroon, the USAID Pandemic Threats program helped the government drop its response time in responding to a Monkey Pox outbreak to just two days. In the Democratic Republic of Congo, the program reduced response time to Ebola outbreaks by months in comparison to the disaster in West Africa and is helping the country to now make diagnoses of Ebola within days...

The 2014 emergency funding allowed CDC to help build surveillance systems in host countries from scratch by training frontline health workers, laboratory technicians, and disease detectives in the monitoring, detection, and attack of dangerous new diseases, while also upgrading outdated laboratories.

Reducing funding now would halt efforts across the world. In our interconnected world, a pathogen can leap from a remote village to a major international city in the US in less than 48 hours. Capable and quick response nearest to its source is critical. As one public health expert noted, withdrawing funding now would be like building a fire station without the trained firefighters. The costs of an outbreak would be extremely high, as our expensive response to the 2014 Ebola outbreak showed. In addition to the emergency supplemental funding passed by Congress, the United States committed some 3000 servicemembers to help contain that outbreak.

To prevent another outbreak and to continue CDC and USAID's current activities, we therefore request \$172.5 million for USAID's Emerging Pandemic Threats account and \$208.2 million for CDC's Division of Global Health Protection account. Appropriations for HHS ASPR and NIH, and for USAID's Global Health accounts, are also critically important for building national security through engagement with our foreign partners.

As members of Congress, we have no higher duty than ensuring the safety of our fellow Americans. We thank you in advance for considering our request and your help in advancing this solemn duty.

Sincerely,

From: "William B. Karesh" < karesh@ecohealthalliance.org>

Sent: 03/15/2018 12:54:04 PM (-07:00)

To: "Kirsten Gilardi" < kvgilardi@ucdavis.edu>

Cc: "Jonna Mazet" <jkmazet@ucdavis.edu>; "Predict inbox" predict@ucdavis.edu>; "jnziza"

REDACTED

Subject: Re: Meeting with at USAID Mission Brief

Thanks.

Nice work Julius!!

BK

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

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On Mar 15, 2018, at 3:50 PM, Kirsten Gilardi kvgilardi@ucdavis.edu> wrote:

Jonna, Billie, David:

Just looping you in on this message from Julius Nziza, Rwanda CC.

-Kirsten

Begin forwarded message:

From: Nziza Julius REDACTED

Subject: RE: Meeting with at USAID Mission Brief

Date: March 15, 2018 at 11:31:31 AM PDT

To: Kirsten Gilardi kvgilardi@ucdavis.edu, Mike Cranfield

REDACTED

Hello Kirsten and Mike-

today at 2.00 p.m I had a meeting at the USAID mission with the following

- 1. Lisa Kramer
- 2. Richard (Mission)
- 3. John (Mission)
- 4. Etienne (OHW)
- 5. Yilma Makonnen ECTDA Regional manager E.A/FAO
- 6. Charles BEBAY Regional OH Coordinator

Lisa briefed us that the FAO team had come to Rwanda at the reuqest of USAID to help on filling some of the gaps left by P&R activities.FAO has limited plan focussing on some activities like providing support to OH platform, eupdating the ROHSC strategic plan.FAO guys talked about they will hire someone to focus on such actions in the country.Thats this is an opening for future FAO/ECTAD collaboration with GOR.FAO more flexible on diseases outbreak response;Veterinary capacity building. Lisa assured as no MOU renew talk with tomorrow meeting with GOR. OHW briefed us about their last year actions.I did the same for PREDICT 2. Also i told them about the gap od domestic animal surveillance which is supposed to be covered by FAO; Response that Rwanda is GSHA 2 so no such action. Julius

From: "William B. Karesh" <karesh@ecohealthalliance.org>

Sent: 05/04/2018 9:53:37 AM (-07:00)

To: "Jonna Mazet" <jkmazet@ucdavis.edu>
Subject: Re: Animal sampling and animal rights

Fascinating. USAID has been on the development committee for what, 2 years now?

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On May 4, 2018, at 5:46 AM, Andrew Clements < AClements@usaid.gov> wrote:

Hi all,

Is there Smithsonian or EcoHealth Alliance disclaimer language that we should use as images are shared in the social media toolkit for Outbreak to prevent any 'backlash' from animal rights groups?

Thanks

Andrew P. Clements, Ph.D.

Senior Scientific Advisor

Emerging Threats Division/Office of Infectious Diseases/Bureau for Global Health
U.S. Agency for International Development

Mobile phone: 1-571-345-4253 Email: aclements@usaid.gov From: "Karen Saylors" <ksaylors@metabiota.com>

Sent: 05/09/2018 4:53:30 PM (-07:00)

To: "William B. Karesh" < karesh@ecohealthalliance.org>; "Tracey Goldstein"

<tgoldstein@ucdavis.edu>

Cc: "Brian Bird" <bhbird@ucdavis.edu>; "Predict inbox" <predict@ucdavis.edu>; "Jonna Mazet"

<jkmazet@ucdavis.edu>

Subject: Re: Slide deck for EBO-SURSY

thanks Billy.

really helpful comments, thanks.

This week I also talked to Sophie Muset, one of the coordinators of the meeting, and she asked me to mention our standardized lab diagnostic platform and EIDITH, as it sounds like those might be the things they've had trouble with?

Anyway, yes, if you have outbreak costing slides you'd like me to add, please send them along.

Tracey, if you have a particular slide that captures our global lab system, please send it on!

thanks,

Karen

On Wed, May 9, 2018 at 3:53 PM, William B. Karesh < <u>karesh@ecohealthalliance.org</u>> wrote: Hi Karen,

The powerpoint content looks good for this group. I'm not sure they are unaware, or overly concerned, about the global airline spread to the US and Europe graphic, but I'll leave that up to you.

I think if you can change the slides to the standard USAID PREDICT-2 format, it would be better. Right now it goes back and forth from the white background to the blue-green one with circuitry or networks or something. As you know, the French notice design and look. ;)

I'm not sure what others are doing, by I try to use PREDICT-2 and EPT-2 to differentiate the work from the first 5 years and align with USAID funding streams.

Also, I'll send you one or two versions for the economics/cost of outbreaks in a separate email so you have the newest ones used by the World Bank and others, and so that we tell a consistent story.

Have fun!!

BK

William B. Karesh, D.V.M

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On May 7, 2018, at 2:54 PM, Karen Saylors ksaylors@metabiota.com wrote:

Hi Billy.

Here is the EBO-SURSY deck that I've compiled from Brian's and Jonna's decks for the OIE meeting, along with the agenda they just sent along. Please let me know if you have suggestions or if you want me to reach out to any particular participants on behalf of PREDICT.

Speaking of participants, I'm very happy to see that Placide from our DRC team will be attending and speaking as a rep for IRD, as he's now doing his PhD with Martine Peeters at Montpelier.

I'll start translating this soon, so please send me any comments you may have in the coming days.

best wishes,

Karen

<EBO-SURSY Comite conseil Agenda FINAL.pdf><PREDICT EHP summary OIE.pptx>

From: "Tammie O'Rourke" <torourke@metabiota.com>

Sent: 05/14/2018 9:46:11 AM (-07:00)

To: REDACTED

Machalaba" <machalaba@ecohealthalliance.org>; "William B. Karesh" <karesh@ecohealthalliance.org>; "Jonna Mazet" <jkmazet@ucdavis.edu>

Subject: Re: [predict-surveillance] Surveillance et al. call this Thurs, May 10th @ 10am PT/1pm ET

Hi again,

It has been brought to my attention that not everyone is seeing the "open" button. If you can't open the sheet in Excel Online, just download it instead and send it to me.

Thanks,

Tammie

On Mon, May 14, 2018 at 9:00 AM, Tammie O'Rourke < torourke@metabiota.com > wrote: Hi All.

I would just like to remind you that the updates to the seasons are due this Friday, May 18th. To update the seasons spreadsheet, click on this link:

https://www.dropbox.com/s/fc8bmnkwdu7feq2/Seasons.xlsx?dl=0

and in the top right corner, click "open", then Microsoft Excel Online. There is no need to save the file, it is auto saved each time you make a change.

Thank-you!

Tammie



On Tue, May 8, 2018 at 4:49 PM,

REDACTED

> wrote:

Hi PREDICT Surveillance Team,

Our next joint surveillance, behavior, & pathogen detection call is this <u>Thurs, May 10th at 10am PT/1pm ET</u>. Call info and agenda are below. Notes from our last call are also attached.

Or iPhone one-tap:

US:

REDACTED

Or Telephone:

Dial(for higher quality, dial a number based on your current location):

US:

REDACTED

Meeting ID: REDACTED

International numbers available:

REDACTED

REDACTED

Draft agenda

- Testing progress updates (Tracey/All)
 - o Please be prepared to give a verbal update on testing progress. The <u>Lab indicator report</u> <u>by country</u> report is helpful for global leads and country teams to start monitoring progress on a regular basis.
- EIDITH updates (Tammie)
 - o Human questionnaire Q23
 - Adding seasons to EIDITH see
 https://www.dropbox.com/s/fc8bmnkwdu7feq2/Seasons.xlsx?dl=0
- Behavior team updates (Kevin)
 - o Bat book updates
 - o Interim Data Review (IDR) reports
- Others?

Action Items from last call

1. Global leads, please coordinate with Catherine to join a regularly scheduled call with country teams to discuss capturing engagement with health security policies.

- 2. Global leads, if your country appears on the rodent age classification spreadsheet and you have not yet done so, please communicate with IM team if you approve the change in rodent age class from juvenile to sub-adult.
- 3. Please be prepared to give a verbal update on testing progress on next call. See notes for April's progress slide.

Thank you!



REDACTED

Research Associate

Emerging Pandemic Threats PREDICT Project

EpiCenter for Disease Dynamics

One Health Institute

UC Davis School of Veterinary Medicine

REDACTED

REDACTED

skype: **REDACTED**

__

Tammie O'Rourke

Metabiota

Senior Information Management Developer

Emerging Pandemic Threats - PREDICT Program

tel +1-250-618-2460 • skype tammie.orourke • www.eidith.org

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From: predict-request@ucdavis.edu on behalf of "David J Wolking" <djwolking@ucdavis.edu>

Sent: 06/25/2018 4:46:48 PM (-07:00)

To: "William Karesh" <karesh@ecohealthalliance.org>

Cc: "Wolking David" <djwolking@ucdavis.edu>; "Catherine Machalaba"

<machalaba@ecohealthalliance.org>; "Amanda Andre" <amanda.andre@ecohealthalliance.org>; "predict@ucdavis.edu"

cpredict@ucdavis.edu>

Subject: [predict] Re: External advisory panel report for USAID Management Team call this week?

Ah perfect thanks for the heads up. I'll flag it for next time.

David

On Mon, Jun 25, 2018 at 4:43 PM William B. Karesh karesh@ecohealthalliance.org wrote:

Not really. Jonna just sent it to me Friday and I haven't passed it back to Lonnie and Jim to review our suggested changes yet.

Sent from my iPhone

William B. Karesh, D.V.M

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On Jun 25, 2018, at 4:14 PM, David J Wolking diwolking@ucdavis.edu wrote:

Hi Billy,

Do you think the external panel report is ready to share with Andrew and team? If so we could do that this week Tuesday on our call and I could attach it with the agenda.

Thanks in advance!

David

From: "David J Wolking" <djwolking@ucdavis.edu>

Sent: 07/20/2018 3:23:57 PM (-07:00)

To: "Wolking David" <djwolking@ucdavis.edu>

Cc: "William Karesh" <karesh@ecohealthalliance.org>; "Christine Kreuder Johnson"

<ckjohnson@ucdavis.edu>; "predict@ucdavis.edu" <predict@ucdavis.edu>; "Prof. Jonna Mazet"

REDACTED

Subject: Re: Roster of P2 country leads for GHSA meetings

Attachments: PREDICT Contact List (7.20.18)_v2.xlsx

Chris,

Please use this version, which now includes updated info for ROC.

David

On Fri, Jul 20, 2018 at 2:25 PM David J Wolking < djwolking@ucdavis.edu> wrote: Thanks Billy,

Chris - attaching the latest I have with Charles listed for DRC.

Billy, I still don't have a country contact for RoC so it just lists you and Anne.

D

On Fri, Jul 20, 2018 at 12:35 PM William B. Karesh < <u>karesh@ecohealthalliance.org</u> > wrote: Good to share. It can only help to get their names out there. But, US does not invite country reps, that's done by local government hosts.

We've been looking at upcoming GHSA events in countries and then letting WHO know about our folks so they can suggest from their end. Then, the local organizers have to be contacted to get our folks invited. For GHSA related meetings, they often do not select people based on projects but by areas of expertise, so that can actually help us

BK

Sent from my iPhone

William B. Karesh, D.V.M

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On Jul 20, 2018, at 12:19 PM, David J Wolking < djwolking@ucdavis.edu> wrote:

Hey there,

No concerns on my end, our list has both global leads and country coordinators/leads so is pretty comprehensive. If we can emphasize including both (US and locally-based contacts) that would be great and help avoid any missed opportunities since a lot of our country folks are in the field through the end of September to wrap up work.

Billy - any reason not to share? If OK, I'll make sure we have the latest (there was a recent change in DRC I don't think is reflected yet) and I can get to you Chris later today....

D

On Fri, Jul 20, 2018 at 9:15 AM Christine Kreuder Johnson <<u>ckjohnson@ucdavis.edu</u>> wrote:

Hi David,

I was hoping we could share our list of P2 country coordinators (and global PoC) with Amy Nagy who is the GHSA Program Officer at US Department of State. She's been working with WHO to identify individuals to invite to the disease prioritization and JEE workshops and was interested in who we thought would bring expertise in zoonotic disease for those countries still going through this process.

I know you and Billy have already done a lot on this front so let us know if you have any thoughts or concerns – if not, please send me the latest list and I will follow up.

Thank you,

Chris

	А	В	С	D	E
1	Partner	Country	Region	PREDICT Global POC (Email)	PREDICT Country POC
2	EHA	China	Asia	EHA: Jon Epstein (epstein@ecohealthalliance.org); Hongying Li (li@ecohealthalliance.org)	ŻhengLi Shi
3	UCD	Nepal	Asia	Chris Johnson (ckjohnson@ucdavis.edu)	Dibe REDACTED In either case, please contact
4	EHA	Bangladesh	Asia	Jon Epstein (epstein@ecohealthalliance.org); Emily Hagan (hagan@ecohealthalliance.org)	Arifu both the country coordinator and the central level coordinators in correspondence
5	EHA	Malaysia	Asia	Jon Epstein (epstein@ecohealthalliance.org); Allison White (white@ecohealthalliance.org)	Hug so they can support each other
6	ЕНА	Thailand	Asia	Kevin Olival (olival@ecohealthalliance.org); Alice Latinne (latinne@ecohealthalliance.org)	Wacharapluesadee, Supaporn
7	UCD	Cambodia	Asia	Tracey Goldstein (tgoldstein@ucdavis.edu); Lucy Keatts REDACTED	Veasna Duong
8	МВ	Lao PDR	Asia	Dave McIver (dmciver@metabiota.com)	Soubanh (Ko) Silithammavong
9	wcs	Vietnam	Asia	Amanda Fine REDACTED; Sarah Olson REDACTED	Fine, Amanda

	F	G	н
	PREDICT Country POC E-mail	PREDICT Country POC Phone	PREDICT Country POC Address
2	REDACTED	REDACTED	REDACTED
3	REDACTED	REDACTED	REDACTED
4	REDACTED	REDACTED	REDACTED
5	REDACTED	REDACTED	Tom Hughes c/o Saharudin Bin Anan, Director Ex-Situ Conservation Division, REDACTED
6	REDACTED	REDACTED	Neuroscience Center for Research and Development and WHO-CC for Research and Training on Viral Zoonoses Faculty of Medicine Chulalongkorn University REDACTED
7	REDACTED		Institut Pasteur du Cambodge
- 2	ssilithammavong@metabiota.com		
9	REDACTED	REDACTED	REDACTED

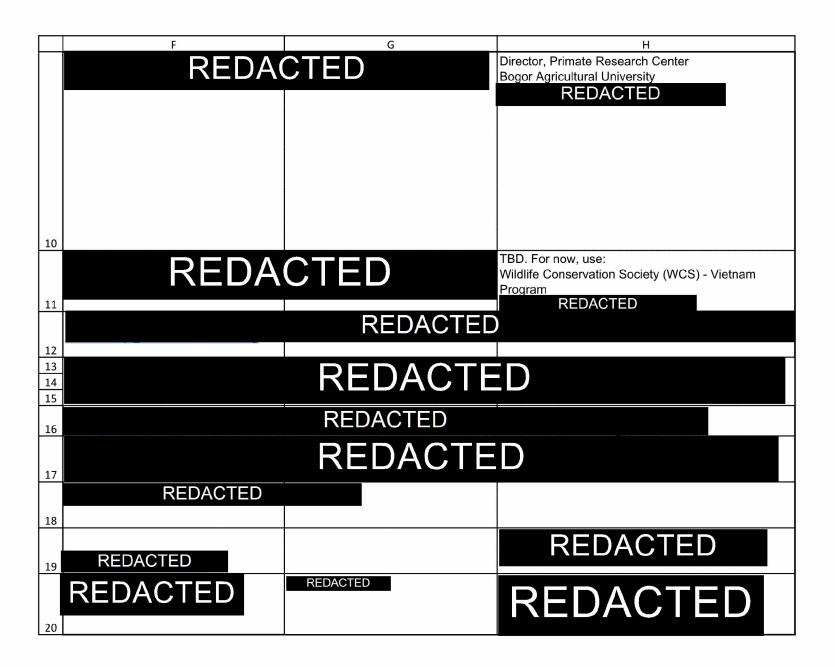
	l I	J	К	L
	PREDICT Animal Testing Partners	FAO POC Name (Title)	FAO POC Email	FAO POC Phone
1	A MALL AND		DEDIATED	
	Wuhan Institute of Virology, TBD Yunnan Provincial Key Laboratory for Zoonosis	Dr Guo Fusheng, National	REDACTED	Mobile: REDACTED
	Control and Prevention at Yunnan Institute of	l echnical Advisor		REDACTED
	Endemic Disease Control and Prevention (human			
	and animal testing, approval pending)			
	3. National Institute for Viral Disease Control and			
2	Prevention, China CDC (approval pending)			
	1. Center for Molecular Dynamics Nepal (CMDN)	Kishan Chand Thakuri	REDACTED	REDACTED
3	Central Veterinary Lab (CVL)			
	1. ICDDR,B	Eric Brum, Country	REDACTED	REDACTED
4			-	
	Veterinary Research Institute			
	2. PERHILITAN Lab			
	3. Wildlife Diagnostic Lab, Sabah			
5				
	Chulalongkorn University	1. Wantanee Kalpravidh		1. REDACTED
		2. Kachen		2. none
		Wongsathapornchi	REDACTED	
6				
	Institut Pasteur du Cambodge	Lotfi Allal	REDACTED	REDACTED
	2. National Veterinary Research Institute (NVRI)			
7	N. C. A. S.			
8	National Animal Health Centre	Chintana Chanthavisouk		CTED
	1.Hanoi Agriculture University	Scott Newman; Laura	REDA	
	National Center for Veterinary Diagnostics	Macfarlane		
9	(NCVD)	(epidemiologist)		

	M	N	0
1	FAO POC Address	FAO Animal Testing Partners	CDC In-Country POC (Email)
2	REDACTED REDACTED	Harbin Veterinary Research Institute (HVRI)-FAO/OIE Reference Centre for Influenza virus CADC Provincial laboratories in Hunan, Guangxi, Yunnan and Chongqing for HPAI work CAHEC laboratory in Qindao for JE and west Nile University laboratories - approval difficult at present	Ron Moolenar (rlm8@cdc.gov)
3		Center for Molecular Dynamics Nepal (CMDN), Nepal	
4		Bangladesh Livestock Research Institute (BLRI); Central Disease Investigation Laboratory (CDIL)	Kevin Russell (krg2@cdc.gov)
5			
6		Chulalongkorn University	John MacArthur (zae5@cdc.gov)
7		Institut Pasteur du Cambodge National Veterinary Research Institute (NVRI)	Robert Newman (rlm8@cdc.gov)
8		National Animal Health Centre National Animal Health Laboratory (NAHL)	TBD
9		1.Hanoi Agriculture University 2. Regional Animal Health Office No.6 (RAHO6)	Tony Mounts (apm8@cdc.gov)

	Р	Q	R	S	Т	U	V
	CDC Country Officer	Regional Coordinator	USAID Regional				
1	(Email)	(Email)	Coordinator (Email)				
	Christie Vu	Lynn Carroll					
	REDAC	TED					
	1,123,13						
2							
3							
	Emily Dodd	Bernie Benecke	Angela Wang				
		REDACTED	, mgod remg				
4		REBACTED					
	Katie Sweeney	Lynn Carroll					
	REDACTE	D					
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	Katie Sweeney	Lynn Carroll					
	REDACT	Lynn Carroll ED					
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8	REDACTE	D					
	lan Hennessee	Lynn Carroll	Angela Wang				
		REDACTED					
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	А	В	С	D	E
10	ЕНА	Indonesia	Asia	Kevin Olival (olival@ecohealthalliance.org); Alice Latinne (latinne@ecohealthalliance.org)	Pamungkas, Joko
10	wcs	Mongolia	Asia	Sarah Olson REDACTED	Dr. Shiilegdamba Enkhtuvshin
12	EHA	India	Asia	Jon Epstein (epstein@ecohealthalliance.org); Ava Sullivan sullivan@ecohealthalliance.org	Rajesh Bhatia, Chakraborty, Debapriyo
13 14 15	SI	Myanmar	Asia	Suzan Murray, SI, (murrays@si.edu); Marc Valitutto (valituttoM@si.edu)	Dr. Ohnmar Aung; Dr. Kyaw Yan Naing Tun
16	EHA	Egypt	Middle East	Patrick Dawson (dawson@ecohealthalliance.org)	Dr. Mohamed Ali (CC) Dr. Ghazi Kayali (Co-PI)
17	EHA	Jordan	Middle East	William Karesh (karesh@ecohealthalliance.org); Patrick Dawson (dawson@ecohealthalliance.org)	Dr. Ehab Abu-Basha (CC)
18	МВ	Cameroon	Africa	Dave McIver (dmciver@metabiota.com); Karen Saylors (ksaylors@metabiota.com)	Moctar Mouiche
19	EHA	Republic of Congo	Africa	Anne Laudisoit (laudisoit@ecohealthalliance.org);William Karesh (karesh@ecohealthalliance.org)	Dr Jean-Vivien Mombouli.
20	МВ	Democratic Republic of Congo	Africa	Dave McIver (dmciver@metabiota.com); Karen Saylors (ksaylors@metabiota.com)	Charles Kumakamba; with Eddy Kambale supporting Eastern provinces



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	Institute Pertanian Bogor (IPB)	James McGrane ECTAD Team Leader; Nining Hartaningsih National Technical Adviser (Lab).	REDAC	
10	State Central Veterinary Laboratory			
12	Sanjay Gandhi Postgraduate Institute of Medical Sciences	Laurence Gleeson	REDACTED	
	Livestock Breeding and Veterinary Diagnostics Lab	Dr. Myat Kyaw NPM ECTAD FAO MM	REDA	CTED
16	FAO	Dr. Lotfi Allal	REDACTED	
17	FAO	Dr. Zaidoun Saleh Hijazeen (Liaison and Technical Coordinator)	REDACT	
18	Centre de Recherche pour la Santé des Armées (CRESAR) Ational Veterinary Laboratory (LANAVET)	Moussa Mai Abari	REDACTI	ED
19				
20	Institut National de Recherche Biomédicale (INRB)	Philippe Kone	REDAC	TED

	M	N	0
		Directorate General of Livestock and Animal Health	
			(fev7@cdc.gov)
		(DIC):	(istr@sasigst)
		a. DIC Wates, Yogyakarta - has run PREDICT	
		protocols;	
		b. DIC Lampung, Sumatra - has run PREDICT	
		protocols;	
		c. DIC Maros (Sulawesi) and DIC Banjarbaru	
		(Kalimantan) to train in PREDICT protocols in August	
		2015;	
		d. DIC Medan, Bukittinggi, Subang and Bali also	
		work with FAO for livestock testing.	
10		Jakarta Province Animal Health Lab (BKHI)	
		State Central Veterinary Laboratory	
11			
		None recently, work in progress	Kayla Laserson
			(kel4@cdc.gov)
12			
13			Mark Wooster
14		Breeding and Veterinary Department of Myanmar	(got1@cdc.gov)
15		(LBVD)	
			Mark Wooster
16			(got1@cdc.gov)
1,,			
17			O Di
			Omer Pasi
18			(obp3@cdc.gov)
10			
19			
1			Raimi Ewetola
			(hcx6@cd.gov)
			(110,000,000,000)
20			

	Р	Q	R	S	Т	U	V
	Katie Sweeney	Lynn Carroll	Angela Wang	3	ı	<u> </u>	V
	(wze3@cdc.gov)	(hlc1@cdc.gov)	(awang@usaid.gov)				
	(wzco@cuc.gov)	(me regada.gov)	(awang@asala.gov)				
10							
10							
11							
	Emily Dodd	Bernie Benecke	Angela Wang				
	(iog2@cdc.gov)	(bxb4@cdc.gov)	(awang@usaid.gov)				
12							
	Emmad Hassan	Bernie Benecke					
	(lkn6@cdc.gov); Michelle	(bxb4@cdc.gov); Bernie					
15	Noonan-Smith	Benecke (bxb4@cdc.gov)					
	Emmad Hassan	Bernie Benecke					
16	(lkn6@cdc.gov)	(bxb4@cdc.gov)					
	Michelle Noonan-Smith	Bernie Benecke					
17	(mdn2@cdc.gov)	(bxb4@cdc.gov)					
1/	Monique Tuyisenge-	Kathie Fazekas	Haroun Habib				
	Onyegbula	(kff6@cdc.gov)	(hhabib@usaid.gov)				
18	(von8@cdc.org)	(Kilowodo.gov)	(Tiridoib@d3did.gov)				
	(12.12.0)						
19							
	Monique Tuyisenge-	Kathie Fazekas	Lisa Kramer				
	Onegbula	(kff6@cdc.gov)	(lkramer@usaid.gov) and				
	(von8@cdc.gov)		Jean-Felly Numbai				
20			(jnumbai@usaid.gov)			į	

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	Α	В	С	D	Е
	UCD	Uganda	Africa	Kirsten Gilardi (kvgilardi@ucdavis.edu)	Ssebide, Benard
21					
		Rwanda	Africa	Kirsten Gilardi (kvgilardi@ucdavis.edu)	Nziza, Julius
22					
23	UCD	Tanzania	Africa	David Wolking (djwolking@ucdavis.edu)	Zikankuba Sijali (Alternate: Prof. Rudavick Kazwala)
24	EHA	Cote d'Ivoire	Africa	Peter Daszak (daszak@ecohealthalliance.org); Anne Laudisoit (laudisoit@ecohealthalliance.org)	Kalpy Coulibaly

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	REDACTED		EPT RESPOND / PREDICT Office
21			REDACTED
	REDACTED		Mountain Gorilla Veterinary Project/PREDICT
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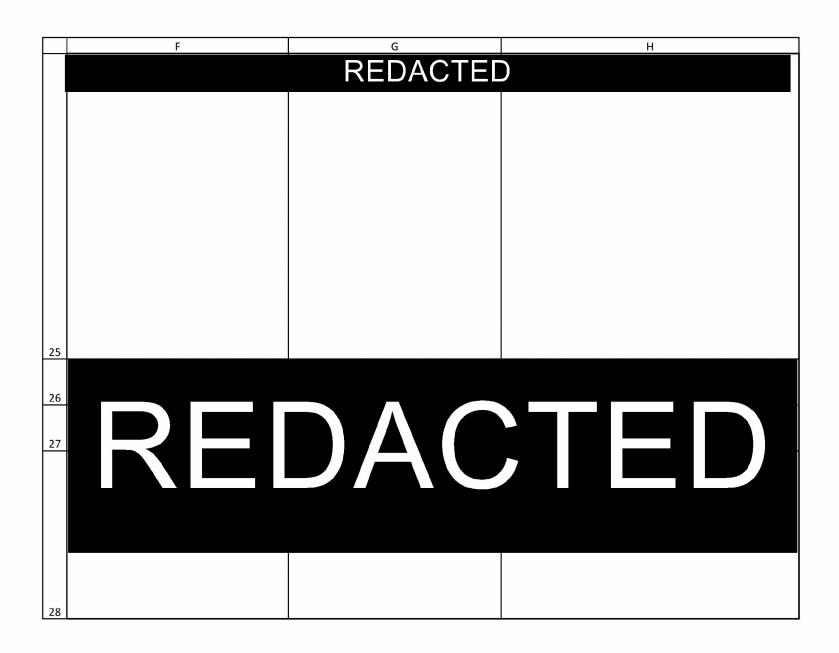
	1	J	К	L
21	Makerere University Walter Reed (MUWRP) lab	Dr. Edward Okori, Livestock Officer	REDAC	TED
	Rwanda Agricultural Board lab	Dr Otto Muhinda, Assistant FAO Representative Programme	REDAC	TED
22			DEDAG	TED
23	Sokoine University of Agriculture Lab	Dr. Fredrick Kivaria, Assistant FAO Representative Programme	REDAC	TED
24	LANADA	Cheihk Ly (FAO CI); Germain Da Sylva, FAO representative (FAOR); Luc Genot (FAO CI); Antoinette Ziehi, FAOR programme assistant; Dr. Donikpo Coulibaly; Monique N'Guessan (FAO CI)	REDACTED	

	M	N	0
21		National Animal Disease Diagnostics and Epidemiology Centre (NADDEC)	Steve Wiersma (sow9@cdc.gov)
22		Rubilizi National Veterinary Laboratory (RNVL)	Gene MacDonald (fuu5@cdc.gov)
23		Tanzania Veterinary Agency (TVLA)	Rachel Eidex (zvd3@cdc.gov)
24			Serigne Ndiaye (scn3@cdc.gov)

	Р	Q	R	S	T	U	V
21	Vance Brown (vhu7@cdc.gov	Millie Trotter (dii2@cdc.gov)	Ashna Kibria (akibria@usaid.gov)				
	Waverly Vosburgh (irx3@cdc.gov)	Millie Trotter (dii2@cdc.gov)					
22							
23	Cleo Adedeji (aqh2@cdc.gov	Millie Trotter (dii2@cdc.gov)	Ashna Kibria (akibria@usaid.gov)				
	Alex Ganim (hrt8@cdc.gov)	Kathie Fazekas (kff6@cdc.gov)	Haroun Habib (hhabib@usaid.gov)				
24			1				

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	А	В	С	D	Е
25	UCD	Ghana	Africa	Terra Kelly (trkelly@ucdavis.edu)	Dr. Col. Samuel Bel-Nono
26	UCD	Guinea	Africa	Corina Monagin (cmonagin@ucdavis.edu); Jaber Belkhiria (jabelkhiria@ucdavis.edu)	Dr. Alpha Camara (country coordinator); Dr Douokoro Kalivogui (field coordinator)
	EHA	Liberia	Africa	Jon Epstein (Epstein@EcoHealthAlliance.org); Emma Lane (lane@ecohealthalliance.org)	Jim Desmond
28	UCD	Senegal	Africa	Corina Monagin (cmonagin@ucdavis.edu); Jaber Belkhiria (jabelkhiria@ucdavis.edu)	Pr.Daouda Ndiaye (UCAD), Dr.Modou Moustapha LO (ISRA), Dr.Yagouba Kane (EISMV)



	l	J	К	L
	TBD	Dr. William Amanfu		
		(retired/contractor, FAO		
		Rome & regional);		
		Jacques Conforti (FAO	55546755	
		regional Program	REDACTED	
		Operations Officer);		
		Benjamin Adjei (Fisheries		
		and Aquaculture Program		
		Officer); Lamourdia		
		Thiombiano (Deputy		
		Regional Representative);		
		Louise Agathe Yacine		
		Tine; Fernando Salinas		
		(Regional Team Leader		
		and Senior Forestry		
		Officer); Berhanu Bedane		
		(Livestock Officer for West		
		Africa); Nourou Macki Tall		
25		(regional program and		
25	VHF	operations officer)	DEDACTED	
	VNF	Isaias Angue Obama Oyana	REDACTED	
26		Oyana		
20	TBD	Luis Filipe Loreiro	REDACT	ED
27				
	TBD	Vincent Martin (Chief of		
		FAO Regional Bureau,		
		REOWA); Cheikh Gueye	REDACTED	
		(Head of programs); Fatou		
		Sock (consultant in food		
		security and safety);		
		Malick Faye (expert in		
		pastoralism); Patrick		
		David (FAO sub-regional;		
20		involved in emergency		
28		and crisis management)		

	M	N	0
	IVI	N	
25			Lise Martel
26			(diz0@cdc.gov)
27		Ministry Of Agriculture	Desmond Williams (zhx0@cdc.gov)
28			Michael Kinzer (mnk6@cdc.org)

	Р	Q	R	S	Т	U	V
25	Sylvia Tangney (knn7@cdc.gov)	Millie Trotter (dii2@cdc.gov)					
26	Mame Akyeampong (knn8@cdc.gov)	Millie Trotter (dii2@cdc.gov)	Haroun Habib (hhabib@usaid.gov)				
27	Brittany Sunshine (ymz6@cdc.gov)	Millie Trotter (dii2@cdc.gov)	Haroun Habib (hhabib@usaid.gov)				
28	Alyssa Wong (wyu9@cdc.gov)	Kathie Fazekas (kff6@cdc.gov)	Haroun Habib (hhabib@usaid.gov)				

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25				
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	Α	В	С	D	E
29	UCD	Sierra Leone	Africa	Brian Bird (bhbird@ucdavis.edu)	Gbakima, Aiah
30	SI	Kenya		Suzan Murray, SI, (murrays@si.edu); Dawn Zimmerman (ZimmermanD@si.edu)	Dr. Joseph Kamau
31	UCD	Ethiopia		Woutrina Smith (wasmith@ucdavis.edu); Jennie Lane (jklane@ucdavis.edu)	Dr. Nigatu Kebede
32					

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20		REDACTED	
29	REDACTED		
	REDROTED		
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29	TBD	Dr. Tesfai Tseggai; Gabriel H.R. Rugalema	REDACTED	
24 5 200020		Dr. Piers Simpkin, Head of Livestock unit	REDACT	ED
30		Prof. Abebe Getachew	REDACT	ED
31				
32				

	M	N	0
29			Sara Hersey (gza9@cdc.org)
30		Central Veterinary Laboratory Kabete	Marc-Alain Widdowson (zux5@cdc.org)
31		National Animal Health Diagnostic and Investigation Center (NAHDIC)	Jeff Hanson (JHanson@cdc.gov)
32			

	Р	Q	R	S	T	U	V
	Erika Meyer	Millie Trotter	Haroun Habib				
29	(wyt1@cdc.gov)	(dii2@cdc.gov)	(hhabib@usaid.gov)				
	TBD (Millie Trotter)	Millie Trotter	Ashna Kibria	2 13 -40 2 -90 4 3 3 2 3 3 3 3 3 3 3 3 3 3 3 3 3 3 3 3			
	(dii2@cdc.gov)	(dii2@cdc.gov)	(akibria@usaid.gov)				
30		3 4440 544					
Î	Cleo Adedeji	Millie Trotter	Ashna Kibria				
	(vqh2@cdc.org)	(dii2@cdc.gov)	(akibria@usaid.gov)				
31		-					
32					1900 1900 1900 1900 1900 1900 1900 1900		

From: "Tammie O'Rourke" <torourke@metabiota.com>

Sent: 07/27/2018 10:32:35 AM (-07:00)

To: REDACTED

Machalaba" <machalaba@ecohealthalliance.org>; "William B. Karesh" <karesh@ecohealthalliance.org>; "Jonna Mazet"

<jkmazet@ucdavis.edu>

Subject: Re: [predict-surveillance] Joint surveillance call this Thurs, July 26th, 2018 @ 10am PT/1pm ET

Dear team,

The testing progress/indicator report discussed on the call yesterday is now available on EIDITH under Reports and is called Test Progress Indicator report.

A few things to note:

- Currently, we are including domestic animals only for Cambodia, Vietnam and Bangladesh. If
 you have domestic animals in EIDITH and want these included in the report, please let the IM
 team know.
- Since Flavis were added to the list of standard tests later in the project, we have included a flag so that if you like, you can include Flavis in into the analysis. It defaults to not include them
- If there is more than 1 organization working in a country, you will be given a separate chart for each organization you have access to. They have a page break between them so you need to click "next page" to see the second chart.
- We have added some text at the bottom of the graph that explains how we derive at a tested animal.

If you have any questions about the report, please let us know!

Tammie

On Tue, Jul 24, 2018 at 5:01 PM,

REDACTED

wrote:

Hi Surveillance Team.

Our next joint call is this <u>Thurs, July 26th, 2018 @ 10am PT/1pm ET</u>. Agenda and call info are below. As always please let us know if you have other items to discuss.

Notes from our last call are also attached for your review.

<u>Agenda</u>

- Pathogen Detection team (Tracey)
 - o Country updates for laboratory progress
- Behavior team (Leilani)

- o Interim Data Review (IDR) report
- o BR analysis planning
- o Bat book updates
- Surveillance team
 - o Risk reports new versions available in EIDITH
 - o Sample disposition form discussion and next steps (attached)
 - o Serology update

Join from PC, Mac, Linux, iOS or Android:

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Or iPhone one-tap:

REDACTED

Or Telephone:

Dial(for higher quality, dial a number based on your current location):

REDACTED

Meeting ID: REDACTED

International numbers available:

REDACTED

REDACTED

Thanks,

REDACTED

REDACTED

Research Associate

Emerging Pandemic Threats PREDICT Project

EpiCenter for Disease Dynamics

One Health Institute

UC Davis School of Veterinary Medicine

REDACTED

REDACTED

skype: REDACTED

__

Tammie O'Rourke

Metabiota

Senior Information Management Developer

Emerging Pandemic Threats - PREDICT Program

tel +1-250-618-2460 • skype tammie.orourke • www.eidith.org

URL: www.metabiota.com

From: REDACTED

Sent: 10/23/2018 4:30:03 PM (-07:00)

Cc: "Catherine Machalaba" <machalaba@ecohealthalliance.org>; "William B. Karesh"

<karesh@ecohealthalliance.org>; "Jonna Mazet" <jkmazet@ucdavis.edu>

Subject: Surveillance team call - Thurs, Oct 25th @ 10am PT/1pm ET

Attachments: SpeciesNames.xlsx

Hi Surveillance Team,

Our next call is this **Thurs**, **Oct** 25th @ 10am PT/1pm ET. Agenda is below – please let us know if you have any other items to add. Also, please quickly review the attached spreadsheet comparing our species ID's in EIDITH to the IUCN/ITIS databases as we will be discussing this on the call.

Join from PC, Mac, Linux, iOS or Android:

Or iPhone one-tap:

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Or Telephone:

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Draft agenda

- Reminder -- upcoming deadlines (Corina)
 - o October 19th, 2018: EMMR Reports
 - o October 24th, 2018: EIDITH data entry for Annual Report
 - o November 2nd, 2018: Success Stories and PREDICT Profiles
 - o November 16th, 2018: Technical Report, M&E sections (Country and Global Teams)
- Field activities completed check in on lab testing progress
- Serology updates/sample lists
- Data validation -- case definitions, self-reported symptoms
- Species ID comparison with IUCN/ITIS databases (see attached)
- Africa country updates

Thanks!

REDACTED

Таха	SpeciesName	IUCN
bats	Acerodon celebensis	Acerodon celebensis
bats	Aethalops alecto	Aethalops alecto
bats	Aethalops alecto	Aethalops alecto
bats	Aselliscus stoliczkanus	Aselliscus stoliczkanus
bats	Balionycteris maculata	Balionycteris maculata
bats	Balionycteris maculata	Balionycteris maculata
bats	Cardioderma cor	Cardioderma cor
bats	Casinycteris argynnis	Casinycteris argynnis
bats	Casinycteris ophiodon	
bats	Chaerephon atsinanana	Chaerephon atsinanana
bats	Chaerephon major	Chaerephon major
bats	Chaerephon plicata	Chaerephon plicatus
bats	Chaerephon plicatus	Chaerephon plicatus
nest cyclicaesidd		and the second s
bats	Chaerephon plicatus	Chaerephon plicatus
bats	Chaerephon plicatus	Chaerephon plicatus
bats	Chaerephon plicatus	Chaerephon plicatus
bats	Chaerephon pumilus	Chaerephon pumilus
bats	Chaerephon pumilus	Chaerephon pumilus
bats	Chaerephon pumilus	Chaerephon pumilus
bats	Chaerephon pumilus	Chaerephon pumilus
Dats	Chaclephon pannas	enderephon purmus
bats	Chaerephon pumilus	Chaerephon pumilus
bats	Chaerephon sp.	
bats	Chironax melanocephalus	Chironax melanocephalus
bats	Chironax melanocephalus	Chironax melanocephalus
bats	Chiroptera	
bats	Coleura afra	Coleura afra
bats	Coleura afra	Coleura afra
bats	Craseonycteris thonglongyai	Craseonycteris thonglongyai
bats	Cynopterus brachyotis	Cynopterus brachyotis
bats	Cynopterus brachyotis	Cynopterus brachyotis
bats	Cynopterus brachyotis	Cynopterus brachyotis
bats	Cynopterus brachyotis	Cynopterus brachyotis
bats	Cynopterus brachyotis	Cynopterus brachyotis
bats	Cynopterus horsfieldii	Cynopterus horsfieldii
bats	Cynopterus horsfieldii	Cynopterus horsfieldii
bats	Cynopterus horsfieldii	Cynopterus horsfieldii

ITIS	Country	barcoded?	# animals
Acerodon celebensis	Indonesia	no	346
Aethalops alecto	Malaysia, Peninsular	no	2
Aethalops alecto	Malaysia, Sabah	no	1
Aselliscus stoliczkanus	China	no	309
Balionycteris maculata	Malaysia, Peninsular	no	3
Balionycteris maculata	Malaysia, Sabah	no	8
Cardioderma cor	Kenya	no	4
Casinycteris argynnis	Republic of Congo	no	1
Casinycteris ophiodon	Guinea	no	13
Chaerephon atsinanana	Sierra Leone	barcoded, species updated	1
Chaerephon major	Ivory Coast	no	81
Chaerephon plicatus plicatus	China	no	35
Chaerephon plicatus	Myanmar	no	420
Chaerephon plicatus	Myanmar	barcoded, species updated	3
Chaerephon plicatus	Thailand	barcoded, matched field ID	23
Chaerephon plicatus	Thailand	no	950
Chaerephon pumilus	Ethiopia	no	381
Chaerephon pumilus	Kenya	no	275
Chaerephon pumilus	Republic of Congo	no	33
Chaerephon pumilus	Rwanda	no	8
Chaerephon pumilus	Sierra Leone	barcoded, species updated	55
Chaerephon	South Sudan	no	73
Chironax melanocephalus	Malaysia, Peninsular	no	4
Chironax melanocephalus	Malaysia, Sabah	no	7
Chiroptera	Cambodia	no	1
Chiroptera	Guinea	no	5
Chiroptera	Jordan	no	163
Chiroptera	Kenya	no	20
Chiroptera	Liberia	no	12
Chiroptera	Myanmar	no	108
Chiroptera	Vietnam	no	200
Coleura afra	Sierra Leone	no	200
Coleura afra	Uganda	no	1
Craseonycteris thonglongyai	Myanmar	no	81
Cynopterus brachyotis	Bangladesh	no	29
Cynopterus brachyotis	Cambodia	no	8
Cynopterus brachyotis	Lao PDR	no	2
Cynopterus brachyotis	Malaysia, Peninsular	no	35
Cynopterus brachyotis	Malaysia, Sabah	no	39
Cynopterus horsfieldii	Lao PDR	no	15
Cynopterus horsfieldii	Malaysia, Peninsular	no	3
Cynopterus horsfieldii	Malaysia, Sabah	no	10

EIDITH/IUCN match?	EIDITH/ITIS match?
yes	yes
no	yes
yes	yes
yes	yes
no	no
yes	yes
yes	yes
yes	yes
no	no
yes	yes
yes	yes
no	yes
yes	yes

bats	Cynopterus horsfieldii	Cynopterus horsfieldii
bats	Cynopterus minutus	Cynopterus minutus
bats	Cynopterus sp.	
bats	Cynopterus sp.	
oats	Cynopterus sphinx	Cynopterus sphinx
oats	Cynopterus sphinx	Cynopterus sphinx
oats	Cynopterus sphinx	Cynopterus sphinx
bats	Cynopterus sphinx	Cynopterus sphinx
bats	Cynopterus sphinx	Cynopterus sphinx
bats	Dobsonia exoleta	Dobsonia exoleta
bats	Dyacopterus spadiceus	Dyacopterus spadiceus
bats	Dyacopterus spadiceus	Dyacopterus spadiceus
bats	Eidolon helvum	Eidolon helvum
bats	Eidolon helvum	Eidolon helvum
bats	Eidolon helvum	Eidolon helvum
bats	Eidolon helvum	Eidolon helvum
bats	Eidolon helvum	Eidolon helvum
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bats	Eidolon helvum	Eidolon helvum
bats	Eidolon helvum	Eidolon helvum
bats	Eidolon helvum	Eidolon helvum
oats	Eidolon helvum	Eidolon helvum
oats	Eidolon helvum	Eidolon helvum
oats	Eidolon helvum	Eidolon helvum
bats	Eonycteris spelaea	Eonycteris spelaea
oats	Eonycteris spelaea	Eonycteris spelaea
bats	Eonycteris spelaea	Eonycteris spelaea
bats	Eonycteris spelaea	Eonycteris spelaea
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bats	Eonycteris spelaea	Eonycteris spelaea
bats	Eonycteris spelaea	Eonycteris spelaea
oats	Epomophorus gambianus	Epomophorus gambianus
bats	Epomophorus gambianus	Epomophorus gambianus
bats	Epomophorus gambianus	Epomophorus gambianus
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bats	Epomophorus gambianus	Epomophorus gambianus
bats	Epomophorus labiatus	Epomophorus labiatus
bats	Epomophorus labiatus	Epomophorus labiatus
bats	Epomophorus labiatus	Epomophorus labiatus
bats	Epomophorus minor	Epomophorus minor
bats	Epomophorus sp.	

Cynopterus horsfieldii	Thailand	no	10
Cynopterus minutus	Indonesia	no	17
Cynopterus	Cambodia	no	5
Cynopterus	Indonesia	no	12
Cynopterus sphinx	Bangladesh	no	383
Cynopterus sphinx	Cambodia	no	86
Cynopterus sphinx	Lao PDR	no	14
Cynopterus sphinx	Malaysia, Peninsular	no	1
Cynopterus sphinx	Myanmar	no	299
Dobsonia exoleta	Indonesia	no	14
Dyacopterus spadiceus	Malaysia, Peninsular	no	1
Dyacopterus spadiceus	Malaysia, Sabah	no	1
Eidolon helvum	Cameroon	no	9
		barcoded, matched	
Eidolon helvum	Cameroon	field ID	1
Eidolon helvum	DR Congo	no	58
Eidolon helvum	Ghana	no	1291
Eidolon helvum	Guinea	no	99
Eidolon helvum	Liberia	no	14
Eidolon helvum	Rwanda	no	110
Eidolon helvum	Senegal	no	154
		barcoded, species	
Eidolon helvum	Sierra Leone	updated	2
Eidolon helvum	Sierra Leone	no	152
Eidolon helvum	Tanzania	no	1162
Eidolon helvum	Uganda	no	193
Eonycteris spelaea	China	no	130
Eonycteris spelaea	Lao PDR	no	5
Eonycteris spelaea	Malaysia, Peninsular	no	80
Eonycteris spelaea	Myanmar	no	33
Eonycteris spelaea	Nepal	no	2
Eonycteris spelaea	Thailand	no	27
Eonycteris spelaea	Thailand	barcoded, matched field ID	1
Epomophorus gambianus	Ghana	no	356
Epomophorus gambianus	Guinea	no	103
Epomophorus gambianus	Ivory Coast	no	11
Epomophorus gambianus	Sierra Leone	barcoded, species updated	1
Epomophorus gambianus	Sierra Leone	no	4
Epomophorus gambianus	South Sudan	no	2
Epomophorus labiatus	Sierra Leone	barcoded, species updated	1
Epomophorus labiatus	Sierra Leone	no	1
Epomophorus labiatus	South Sudan	no	111
Eponiophoras labiatus	Journ Judan	barcoded, species	111
Epomophorus minor	Sierra Leone	updated	3
Epomophorus	Republic of Congo	no	7

yes	yes
yes	yes
no	no
no	no
yes	yes
yes	yes
yes	yes
yes	yes
yes	yes
yes	yes
yes	yes
yes	yes
yes	yes
yes	yes
yes	yes
no	no

bats	Epomophorus wahlbergi	Epomophorus wahlbergi
bats	Epomophorus wahlbergi	Epomophorus wahlbergi
bats	Epomops buettikoferi	Epomops buettikoferi
bats	Epomops buettikoferi	Epomops buettikoferi
bats	Epomops buettikoferi	Epomops buettikoferi
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bats	Epomops franqueti	Epomops franqueti
bats	Epomops franqueti	Epomops franqueti
bats	Epomops franqueti	Epomops franqueti
bats	Epomops sp.	
bats	Epomops sp.	
bats	Glauconycteris poensis	Glauconycteris poensis
bats	Glauconycteris poerisis	Glauconycteris variegata
bats	Glauconycteris variegata	Glauconycteris variegata
bats	Glischropus tylopus	Glischropus tylopus
bats	Glischropus tylopus	Glischropus tylopus
bats	Hipposideridae sp.	Gliscillopus tylopus
Dats	riipposideridae sp.	
bats	Hipposideros abae	Hipposideros abae
bats	Hipposideros armiger	Hipposideros armiger
bats	Hipposideros armiger	Hipposideros armiger
bats	Hipposideros armiger	Hipposideros armiger
bats	Hipposideros armiger	Hipposideros armiger
bats	Hipposideros beatus	Hipposideros beatus
hata	Historial and a bisolon	Himmonial auga laine lau
bats	Hipposideros bicolor	Hipposideros bicolor
bats	Hipposideros bicolor	Hipposideros bicolor
bats	Hipposideros bicolor	Hipposideros bicolor
bats	Hipposideros caffer	Hipposideros caffer
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bats	Hipposideros caffer	Hipposideros caffer
la a de	Hipposideros cervinus	Hipposideros cervinus
pats	I IIDDOSIGETOS CELVITIUS	
bats bats	Hipposideros cervinus	Hipposideros cervinus

Epomophorus wahlbergi	Kenya	no	5
Epomophorus wahlbergi	Liberia	no	9
Epomops buettikoferi	Guinea	no	12
		barcoded, species	
Epomops buettikoferi	Sierra Leone	updated	2
Epomops buettikoferi	Sierra Leone	no	11
Epomops franqueti	Cameroon	no	27
		barcoded, matched	
Epomops franqueti	Cameroon	field ID	2
Epomops franqueti	DR Congo	no	42
Epomops franqueti	Ghana	no	11
Epomops franqueti	Guinea	no	6
Epomops franqueti	Ivory Coast	no	40
		barcoded, matched	
Epomops franqueti	Republic of Congo	field ID	1
Epomops franqueti	Republic of Congo	no	21
Epomops franqueti	Sierra Leone	no	18
Epomops franqueti	South Sudan	no	11
Epomops	Republic of Congo	no	1
Epomops	Sierra Leone	no	1
		barcoded, species	
Glauconycteris poensis	Sierra Leone	updated	1
Glauconycteris variegata	DR Congo	no	1
Glauconycteris variegata	South Sudan	no	2
Glischropus tylopus	Malaysia, Peninsular	no	12
Glischropus tylopus	Malaysia, Sabah	no	7
Hipposideridae	Guinea	no	288
		barcoded, species	
Hipposideros abae	Sierra Leone	updated	7
Hipposideros armiger	China	no	65
Hipposideros armiger	Myanmar	no	17
		barcoded, matched	
Hipposideros armiger	Thailand	field ID	6
Hipposideros armiger	Thailand	no	9
Hipposideros beatus	Sierra Leone	no	116
		barcoded, species	
Hipposideros bicolor	Malaysia, Peninsular	updated	1
Hipposideros bicolor	Malaysia, Peninsular	no	13
Hipposideros bicolor	Malaysia, Sabah	no	1
Hipposideros caffer	DR Congo	no	5
Hipposideros caffer	Guinea	no	5
Hipposideros caffer	Ivory Coast	no	11
Hipposideros caffer	Rwanda	no	54
Hipposideros caffer	Sierra Leone	no	180
Hipposideros cervinus	Malaysia, Sabah	barcoded, species updated	14
Hipposideros cervinus	Malaysia, Sabah	no	3
Hipposideros cineraceus	Bangladesh	no	9

yes	yes
yes	yes
yes	yes
yes	yes
yes	yes
yes	yes
yes	yes
yes	yes
no	no
no	no
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no	no
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yes	yes
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L	100	117
bats	Hipposideros cineraceus	Hipposideros cineraceus
bats	Hipposideros cineraceus	Hipposideros cineraceus
bats	Hipposideros cineraceus	Hipposideros cineraceus
bats	Hipposideros cyclops	Hipposideros cyclops
bats	Hipposideros cyclops	Hipposideros cyclops
bats	Hipposideros cyclops	Hipposideros cyclops
bats	Hipposideros diadema	Hipposideros diadema
bats	Hipposideros diadema	Hipposideros diadema
bats	Hipposideros diadema	Hipposideros diadema
bats	Hipposideros diadema	Hipposideros diadema
bats	Hipposideros diadema	Hipposideros diadema
bats	Hipposideros dyacorum	Hipposideros dyacorum
bats	Hipposideros fuliginosus	Hipposideros fuliginosus
bats	Hipposideros fuliginosus	Hipposideros fuliginosus
bats	Hipposideros fuliginosus	Hipposideros fuliginosus
bats	Hipposideros galeritus	Hipposideros galeritus
bats	Hipposideros galeritus	Hipposideros galeritus
bats	Hipposideros gigas	Hipposideros gigas
bats	Hipposideros gigas	Hipposideros gigas
bats	Hipposideros gigas	Hipposideros gigas
bats	Hipposideros gigas	Hipposideros gigas
bats	Hipposideros gigas	Hipposideros gigas
bats	Hipposideros gigas	Hipposideros gigas
bats	Hipposideros gigas	Hipposideros gigas
bats	Hipposideros jonesi	Hipposideros jonesi
bats	Hipposideros larvatus	Hipposideros larvatus
bats	Hipposideros larvatus	Hipposideros larvatus
bats	Hipposideros larvatus	Hipposideros larvatus
bats	Hipposideros larvatus	Hipposideros larvatus
bats	Hipposideros larvatus	Hipposideros larvatus
bats	Hipposideros larvatus	Hipposideros larvatus
bats	Hipposideros lekaguli	Hipposideros lekaguli
bats	Hipposideros lylei	Hipposideros lylei
bats	Hipposideros pomona	Hipposideros pomona
bats	Hipposideros ridleyi	Hipposideros ridleyi
	, .	
bats	Hipposideros ruber	Hipposideros ruber
bats	Hipposideros ruber	Hipposideros ruber
100 cm c17442	[2 10 10]	
bats	Hipposideros ruber	Hipposideros ruber
bats	Hipposideros ruber	Hipposideros ruber
bats	Hipposideros ruber	Hipposideros ruber
Dats	nipposideros ruber	nipposideros ruber

Hipposideros cineraceus	China	no	2
Hipposideros cineraceus	Malaysia, Peninsular	no	107
Hipposideros cineraceus	Malaysia, Sabah	no	1
Hipposideros cyclops	Cameroon	no	12
Hipposideros cyclops	Ivory Coast	no	6
Hipposideros cyclops	Sierra Leone	no	1
Hipposideros diadema	Indonesia	no	1
Hipposideros diadema	Malaysia, Peninsular	no	2
Hipposideros diadema	Malaysia, Sabah	barcoded, species updated	1
Hipposideros diadema	Malaysia, Sabah	barcoded, matched field ID	3
Hipposideros diadema	Malaysia, Sabah	no	49
Hipposideros dyacorum	Malaysia, Sabah	no	2
Hipposideros fuliginosus	Cameroon	no	1
Hipposideros fuliginosus	Liberia	no	2
Hipposideros fuliginosus	Sierra Leone	no	2
Hipposideros galeritus	Malaysia, Peninsular	no	11
Hipposideros galeritus	Malaysia, Sabah	no	148
		barcoded, matched	
Hipposideros gigas	Cameroon	field ID	12
Hipposideros gigas	Cameroon	no	91
Hipposideros gigas	Guinea	no	14
Hipposideros gigas	Ivory Coast	no	3
Hipposideros gigas	Republic of Congo	no	1
Hipposideros gigas	Sierra Leone	no	1
Hipposideros gigas	South Sudan	no	1
		barcoded, species	
Hipposideros jonesi	Sierra Leone	updated	4
Hipposideros larvatus	China	no	106
Hipposideros larvatus	Malaysia, Peninsular	no	45
Hipposideros larvatus	Myanmar	no	231
Hipposideros larvatus	Sierra Leone	barcoded, species updated	1
Hipposideros larvatus	Thailand	no	2
Hipposideros larvatus	Thailand	barcoded, matched field ID	2
Hipposideros lekaguli	Thailand	no	8
Hipposideros lylei	Thailand	no	1
Hipposideros pomona	China	no	30
Hipposideros ridleyi	Malaysia, Sabah	no	2
Hipposideros ruber	Cameroon	barcoded, matched field ID	1
Hipposideros ruber	Cameroon	no	634
Hipposideros ruber	Cameroon	barcoded, species updated	49
Hipposideros ruber	DR Congo	no	1
Hipposideros ruber	Liberia	no	3209

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bats	Hipposideros ruber	Hipposideros ruber
bats	Hipposideros ruber	Hipposideros ruber
bats	Hipposideros sp.	
bats	Hypsignathus monstrosus	Hypsignathus monstrosus
bats	Hypsignathus monstrosus	Hypsignathus monstrosus
bats	Hypsignathus monstrosus	Hypsignathus monstrosus
bats	Hypsignathus monstrosus	Hypsignathus monstrosus
bats	Hypsugo cadornae	Pipistrellus cadornae
bats	Hypsugo dolichodon	
bats	la io	la io
bats	Kerivoula argentata	Kerivoula argentata
bats	Kerivoula hardwickii	Kerivoula hardwickii
bats	Kerivoula hardwickii	Kerivoula hardwickii
bats	Kerivoula intermedia	Kerivoula intermedia
bats	Kerivoula intermedia	Kerivoula intermedia
bats	Kerivoula minuta	Kerivoula minuta
bats	Kerivoula minuta	Kerivoula minuta
bats	Kerivoula papillosa	Kerivoula papillosa
bats	Kerivoula papillosa	Kerivoula papillosa
bats	Kerivoula pellucida	Kerivoula pellucida
bats	La io	The state of the s
bats	Lissonycteris angolensis	Lissonycteris angolensis
bats	Lissonycteris angolensis	Lissonycteris angolensis
bats	Lissonycteris angolensis	Lissonycteris angolensis
bats	Lissonycteris angolensis	Lissonycteris angolensis
bats	Macroglossus minimus	Macroglossus minimus
bats	Macroglossus minimus	Macroglossus minimus
bats	Macroglossus minimus	Macroglossus minimus
bats	Macroglossus sobrinus	Macroglossus sobrinus
bats	Macroglossus sobrinus	Macroglossus sobrinus
bats	Macroglossus sobrinus	Macroglossus sobrinus
bats	Macroglossus sobrinus	Macroglossus sobrinus
bats	Megaderma lyra	Megaderma lyra
bats	Megaderma lyra	Megaderma lyra
bats	Megaderma lyra	Megaderma lyra
bats	Megaderma lyra	Megaderma lyra
bats	Megaderma sp.	
bats	Megaderma spasma	Megaderma spasma
bats	Megaderma spasma	Megaderma spasma
bats	Megadermatidae sp.	megaacina spasina
bats	Megaerops ecaudatus	Megaerops ecaudatus
bats	Megaerops ecaudatus Megaerops ecaudatus	Megaerops ecaudatus
bats	Megaerops niphanae	Megaerops niphanae
bats	Megaloglossus azagnyi	Megaloglossus azagnyi
Data	ivicaciogiossus azagityi	INICEGIOEIOSSUS AZAKITYI

Hipposideros ruber	Rwanda	no	6
70		barcoded, species	
Hipposideros ruber	Sierra Leone	updated	50
Hipposideros	Guinea	no	93
Hipposideros	Sierra Leone	no	36
Hipposideros	South Sudan	no	20
Hipposideros	Uganda	no	46
Hypsignathus monstrosus	Ghana	no	4
Hypsignathus monstrosus	Guinea	no	1
Hypsignathus monstrosus	Ivory Coast	no	6
Hypsignathus monstrosus	South Sudan	no	1
Hypsugo cadornae	Lao PDR	no	1
	Lao PDR	no	1
la io	China	no	11
Kerivoula argentata	Republic of Congo	no	1
Kerivoula hardwickii	Malaysia, Peninsular	no	2
Kerivoula hardwickii	Malaysia, Sabah	no	3
Kerivoula intermedia	Malaysia, Peninsular	no	3
Kerivoula intermedia	Malaysia, Sabah	no	10
Kerivoula minuta	Malaysia, Peninsular	no	1
Kerivoula minuta	Malaysia, Sabah	no	1
Kerivoula papillosa	Malaysia, Peninsular	no	2
Kerivoula papillosa	Malaysia, Sabah	no	8
Kerivoula pellucida	Malaysia, Sabah	no	2
	China	no	7
Lissonycteris angolensis	Liberia	no	127
Lissonycteris angolensis	Republic of Congo	no	4
Lissonycteris angolensis	Sierra Leone	no	95
Lissonycteris angolensis	Uganda	no	2
Macroglossus minimus	Cambodia	no	25
Macroglossus minimus	Malaysia, Peninsular	no	21
Macroglossus minimus	Malaysia, Sabah	no	33
Macroglossus sobrinus	Bangladesh	no	16
Macroglossus sobrinus	Cambodia	no	6
Macroglossus sobrinus	Malaysia, Peninsular	no	9
	Malaysia, Peninsular	no	49
Megaderma lyra	Bangladesh	no	150
Megaderma lyra	Cambodia	no	1
Megaderma lyra	China	no	15
Megaderma lyra	India	no	7
Megaderma	Bangladesh	no	45
Megaderma spasma	Lao PDR	no	16
Megaderma spasma	Malaysia, Sabah	no	2
Megadermatidae	Guinea	no	30
Megaerops ecaudatus	Malaysia, Peninsular	no	5
Megaerops ecaudatus	Malaysia, Sabah	no	1
	Lao PDR	no	2
Megaerops niphanae			

yes	yes
voc	vos
yes	yes
no	no
yes	yes
no	yes
no	no
yes	yes
no	no
yes	yes
no	no
yes	yes
no	no
yes	yes
yes	yes
no	no
yes	yes

bats	Megaloglossus sp.	
bats	Megaloglossus woermanni	Megaloglossus woermanni
bats	Megaloglossus woermanni	Megaloglossus woermanni
bats	Megaloglossus woermanni	Megaloglossus woermanni
bats	Megaloglossus woermanni	Megaloglossus woermanni
bats	Megaloglossus woermanni	Megaloglossus woermanni
bats	Megaloglossus woermanni	Megaloglossus woermanni
bats	Megaloglossus woermanni	Megaloglossus woermanni
bats	Micropteropus pusillus	Micropteropus pusillus
bats	Micropteropus pusillus	Micropteropus pusillus
bats	Micropteropus pusillus	Micropteropus pusillus
bats	Micropteropus pusillus	Micropteropus pusillus
bats	Micropteropus pusillus	Micropteropus pusillus
bats	Micropteropus pusillus	Micropteropus pusillus
hata	Missortoropus pusillus	Missortoropus pusillus
bats	Micropteropus pusillus	Micropteropus pusillus
bats	Micropteropus pusillus	Micropteropus pusillus
bats	Micropteropus pusillus	Micropteropus pusillus
bats	Miniopteridae sp.	
bats	Miniopteridae sp.	
bats	Miniopterus australis	Miniopterus australis
bats	Miniopterus fuliginosus	
bats	Miniopterus inflatus	Miniopterus inflatus
bats	Miniopterus inflatus	Miniopterus inflatus
bats	Miniopterus magnater	Miniopterus magnater
bats	Miniopterus medius	Miniopterus medius
bats	Miniopterus pusillus	Miniopterus pusillus
bats	Miniopterus pusillus	Miniopterus pusillus
bats	Miniopterus pusillus	Miniopterus pusillus
bats	Miniopterus schreibersii	Miniopterus schreibersii
bats	Miniopterus schreibersii	Miniopterus schreibersii
bats	Miniopterus schreibersii	Miniopterus schreibersii
bats	Miniopterus schreibersii	Miniopterus schreibersii
bats	Miniopterus sp.	
bats	Miniopterus sp.	
bats	Miniopterus sp.	
bats	Molossidae sp.	
bats	Molossidae sp.	
bats	Molossidae sp.	
bats	Molossidae sp.	
bats	Molossidae sp.	
bats	Mops condylurus	Mops condylurus
bats	Mops condylurus	Mops condylurus
bats	Mops condylurus	Mops condylurus

Megaloglossus	DR Congo	no	34
Megaloglossus woermanni	Cameroon	barcoded, matched field ID	1
Megaloglossus woermanni	Cameroon	no	36
Megaloglossus woermanni	Ivory Coast	no	5
Megaloglossus woermanni	Liberia	no	1
Megaloglossus woermanni	Republic of Congo	barcoded, matched field ID	1
Megaloglossus woermanni	Republic of Congo	no	75
Megaloglossus woermanni	Sierra Leone	no	1
Micropteropus pusillus	Cameroon	no	4
Micropteropus pusillus	DR Congo	no	168
Micropteropus pusillus	Ghana	no	6
Micropteropus pusillus	Liberia	no	2
Micropteropus pusillus	Republic of Congo	no	45
		barcoded, matched	
Micropteropus pusillus	Republic of Congo	field ID	5
Micropteropus pusillus	Sierra Leone	barcoded, species updated	2
Micropteropus pusillus	Sierra Leone	no	7
Micropteropus pusillus	South Sudan	no	16
Miniopteridae	Guinea	no	238
Miniopteridae	Sierra Leone	no	6
Miniopterus australis	Malaysia, Sabah	no	2
	China	no	146
Miniopterus inflatus	Liberia	no	514
Miniopterus inflatus	Sierra Leone	no	1
Miniopterus magnater	Thailand	no	9
Miniopterus medius	Malaysia, Peninsular	no	11
Miniopterus pusillus	China	no	93
Miniopterus pusillus	Malaysia, Sabah	no	1
Miniopterus pusillus	Thailand	no	2
Miniopterus schreibersii	Liberia	no	1
Miniopterus schreibersii	Malaysia, Sabah	no	1
Miniopterus schreibersii	Sierra Leone	no	13
Miniopterus schreibersii	Thailand	no	1
Miniopterus	DR Congo	no	19
Miniopterus	Guinea	no	49
Miniopterus	Rwanda	no	1
Molossidae	Guinea	no	1605
Molossidae	Myanmar	no	1
Molossidae	Sierra Leone	barcoded, species updated	1
Molossidae	Sierra Leone	no	1381
Molossidae	South Sudan	no	2
Mops condylurus	DR Congo	no	86
Mops condylurus	Guinea	no	82
Mops condylurus	Ivory Coast	no	80

no	no
yes	yes
yes	yes
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yes	yes
yes	yes
NO.	NO.
yes	yes
yes	yes
yes	yes
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yes	yes
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yes	yes
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Mops condylurus Mops condylurus Mops condylurus Mops demonstrator Murina aenea Murina cyclotis Murina rozendaali	Mops condylurus Mops condylurus Mops condylurus Mops demonstrator Murina aenea Murina cyclotis
Mops condylurus Mops demonstrator Murina aenea Murina cyclotis Murina cyclotis	Mops condylurus Mops demonstrator Murina aenea
Mops demonstrator Murina aenea Murina cyclotis Murina cyclotis	Mops demonstrator Murina aenea
Murina aenea Murina cyclotis Murina cyclotis	Murina aenea
Murina cyclotis Murina cyclotis	
Murina cyclotis	Murina cyclotis
	- 1
Murina rozendaali	Murina cyclotis
	Murina rozendaali
Murina suilla	Murina suilla
Murina suilla	Murina suilla
Murina suilla	Murina suilla
	Lissonycteris angolensis
	Lissonycteris angolensis
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Myonycteris angolensis	Lissonycteris angolensis
Myonycteris leptodon	Myonycteris leptodon
Myonycteris sp.	
Myonycteris sp.	
Myonycteris torqueta	Myonycteris torquata
	Myonycteris torquata
	Myonycteris torquata
-	Myonycteris torquata
iniyoniyotenis torquata	yonyoteno torquata
Myonycteris torquata	Myonycteris torquata
Myonycteris torquata	Myonycteris torquata
Myotis adversus	Myotis adversus
Myotis ater	Myotis ater
Myotis bocagii	Myotis bocagii
Myotis bocagii	Myotis bocagii
Myotis chinensis	Myotis chinensis
	Myotis daubentonii
Myotis fimbriatus	Myotis fimbriatus
Myotis horsfieldii	Myotis horsfieldii
Myotis horsfieldii	Myotis horsfieldii
	Myotis horsfieldii
•	Myotis longipes
, , ,	Myotis muricola
•	Myotis muricola
	Murina suilla Murina suilla Murina suilla Murina suilla Myonycteris angolensis Myonycteris angolensis Myonycteris leptodon Myonycteris sp. Myonycteris torquata Myonycteris torquata

Mops condylurus	Republic of Congo	barcoded, species updated	1
Mops condylurus	Rwanda	no	1
Mops condylurus	Sierra Leone	barcoded, matched field ID	19
Mops condylurus	Sierra Leone	barcoded, species updated	30
Mops demonstrator	Guinea	no	1
Murina aenea	Malaysia, Peninsular	no	1
Murina cyclotis	Malaysia, Peninsular	no	1
Murina cyclotis	Malaysia, Sabah	no	2
Murina rozendaali	Malaysia, Sabah	no	3
Murina suilla	Malaysia, Peninsular	no	1
		barcoded, species	
Murina suilla	Malaysia, Sabah	updated	1
Murina suilla	Malaysia, Sabah	no	4
	Guinea	no	131
	Rwanda	no	15
		barcoded, species	
	Sierra Leone	updated	12
	Guinea	no	45
Myonycteris	Guinea	no	29
		barcoded, species	
Myonycteris	Republic of Congo	updated	3
		barcoded, matched	
Myonycteris torquata	Cameroon	field ID	1
Myonycteris torquata	Cameroon	no	2
Myonycteris torquata	Ghana	no	1
Myonycteris torquata	Ivory Coast	no	41
		barcoded, species	
Myonycteris torquata	Sierra Leone	updated	5
Myonycteris torquata	Sierra Leone	no	10
Myotis adversus	China	no	3
Myotis ater	Malaysia, Sabah	no	1
Myotis bocagii	Sierra Leone	barcoded, species updated	1
Myotis bocagii	Sierra Leone	barcoded, matched field ID	2
Myotis chinensis	China	no	1
Myotis daubentonii	China	no	1
Myotis fimbriatus	China	no	5
Myotis horsfieldii	Cambodia	no	3
Myotis horsfieldii	Malaysia, Sabah	barcoded, species updated	1
Myotis horsfieldii	Thailand	no	11
Myotis longipes	China	no	144
Myotis muricola	Cambodia	no	13
Myotis muricola	Malaysia, Peninsular	no	1

yes	yes
yes	yes
yes	yes
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yes	yes
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no	no
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yes	no
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no	no
yes	yes
yes	yes
yes	yes
yes	yes
yes	yes

bats	Myotis ricketti	Myotis pilosus
bats	Myotis ridleyi	Myotis ridleyi
bats	Myotis ridleyi	Myotis ridleyi
bats	Myotis rosseti	Myotis rosseti
bats	Myotis secundus	Myotis secundus
bats	Myotis siligorensis	Myotis siligorensis
bats	Myotis siligorensis	Myotis siligorensis
bats	Myotis siligorensis	Myotis siligorensis
bats	Myotis sp.	
bats	Myotis sp.	
bats	Myotis welwitschii	Myotis welwitschii
bats	Myotis welwitschii	Myotis welwitschii
bats	Nanonycteris veldkampii	Nanonycteris veldkampii
bats	Nanonycteris veldkampii	Nanonycteris veldkampii
bats	Nanonycteris veldkampii	Nanonycteris veldkampii
bats	Neopteryx frosti	Neopteryx frosti
bats	Neoromicia cf. zuluensis	Neoromicia zuluensis
bats	Neoromicia nana	Neoromicia nana
bats	Neoromicia nana	Neoromicia nana
bats	Neoromicia rendalli	Neoromicia rendalli
bats	Neoromicia sp.	
bats	Neoromicia tenuipinnis	Neoromicia tenuipinnis
bats	Nycteridae sp.	
bats	Nycteris arge	Nycteris arge
bats	Nycteris arge	Nycteris arge
bats	Nycteris grandis	Nycteris grandis
bats	Nycteris grandis	Nycteris grandis
bats	Nycteris hispida	Nycteris hispida
bats	Nycteris hispida	Nycteris hispida
bats	Nycteris hispida	Nycteris hispida
bats	Nycteris major	Nycteris major
bats	Nycteris major	Nycteris major
bats	Nycteris sp.	
bats	Nycteris thebaica	Nycteris thebaica
bats	Nycteris thebaica	Nycteris thebaica
bats	Nycteris thebaica	Nycteris thebaica
bats	Nycteris tragata	Nycteris tragata
bats	Nycteris tragata	Nycteris tragata
bats	Nyctimene cephalotes	Nyctimene cephalotes
bats	Nyctimene sp.	
bats	Otomops martiensseni	Otomops martiensseni
bats	Panthetor lucasi	

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no	yes
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yes	yes
no	no
yes	yes
no	no

bats	Penthetor lucasi	Penthetor lucasi
bats	Philetor brachypterus	Philetor brachypterus
bats	Pipistrellus aegyptius	
bats	Pipistrellus coromandra	Pipistrellus coromandra
bats	Pipistrellus coromandra	Pipistrellus coromandra
bats	Pipistrellus inexspectatus	Pipistrellus inexspectatus
bats	Pipistrellus inexspectatus	Pipistrellus inexspectatus
bats	Pipistrellus javanicus	Pipistrellus javanicus
bats	Pipistrellus javanicus	Pipistrellus javanicus
bats	Pipistrellus kuhlii	Pipistrellus kuhlii
bats	Pipistrellus nanulus	Pipistrellus nanulus
bats	Pipistrellus nanulus	Pipistrellus nanulus
bats	Pipistrellus nanulus	Pipistrellus nanulus
bats	Pipistrellus nanulus	Pipistrellus nanulus
bats	Pipistrellus nanulus	Pipistrellus nanulus
bats	Pipistrellus nanulus	Pipistrellus nanulus
bats	Pipistrellus nanus	Neoromicia nana
bats	Pipistrellus nanus	Neoromicia nana
bats	Pipistrellus paterculus	Pipistrellus paterculus
bats	Pipistrellus rusticus	Pipistrellus rusticus
bats	Pipistrellus sp.	
bats	Pipistrellus sp.	
bats	Pipistrellus sp.	
bats	Plerotes anchietae	Plerotes anchietae
bats	Pteropus alecto	Pteropus alecto
bats	Pteropus giganteus	Pteropus giganteus
bats	Pteropus hypomelanus	Pteropus hypomelanus
bats	Pteropus hypomelanus	Pteropus hypomelanus
bats	Pteropus lylei	Pteropus lylei
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bats	Pteropus lylei	Pteropus lylei
bats	Pteropus medius	Pteropus giganteus
bats	Pteropus vampyrus	Pteropus vampyrus
bats	Pteropus vampyrus	Pteropus vampyrus
bats	Ratufa affinis	Ratufa affinis
bats	Rhinolophus acuminatus	Rhinolophus acuminatus
bats	Rhinolophus affinis	Rhinolophus affinis
bats	Rhinolophus affinis	Rhinolophus affinis
bats	Rhinolophus affinis	Rhinolophus affinis
bats	Rhinolophus alcyone	Rhinolophus alcyone
bats	Rhinolophus alcyone	Rhinolophus alcyone
bats	Rhinolophus alcyone	Rhinolophus alcyone
bats	Rhinolophus alcyone	Rhinolophus alcyone
	Timolophus aleyone	Time opinus dicyone
bats	Rhinolophus arcuatus	Rhinolophus arcuatus

Penthetor lucasi	Malaysia, Sabah	no	14
Philetor brachypterus	Malaysia, Peninsular	no	1
Pipistrellus deserti	Egypt	no	92
Pipistrellus coromandra	Lao PDR	no	3
		barcoded, species	
Pipistrellus coromandra	Malaysia, Peninsular	updated	1
Pipistrellus inexspectatus	Senegal	no	205
Pipistrellus inexspectatus	Sierra Leone	no	1
Pipistrellus javanicus	Cambodia	no	1
Pipistrellus javanicus	Malaysia, Peninsular	no	3
Pipistrellus kuhlii	Jordan	no	2
Pipistrellus nanulus	Cameroon	no	4
Pipistrellus nanulus	DR Congo	no	1
Pipistrellus nanulus	Ivory Coast	no	1
Pipistrellus nanulus	Sierra Leone	barcoded, matched field ID	1
Pipistrellus nanulus	Sierra Leone	barcoded, species updated	2
Pipistrellus nanulus	Sierra Leone	no	1
Neoromicia nana nana	Cameroon	no	1
Neoromicia nana nana	Sierra Leone	no	1
Pipistrellus paterculus	Lao PDR	no	1
Pipistrellus rusticus	Sierra Leone	no	34
Pipistrellus	Bangladesh	no	8
Pipistrellus	DR Congo	no	7
Pipistrellus	Kenya	no	2
Plerotes anchietae	Uganda	no	4
Pteropus alecto	Indonesia	no	983
Pteropus giganteus	Bangladesh	no	4
Pteropus hypomelanus	Malaysia, Peninsular	no	67
Pteropus hypomelanus	Myanmar	no	29
Pteropus lylei	Thailand	no	983
Pteropus lylei	Thailand	barcoded, matched field ID	42
- C	Bangladesh	no	722
Pteropus vampyrus	Indonesia	no	26
Pteropus vampyrus	Malaysia, Sabah	no	5
Ratufa affinis	Malaysia, Peninsular	no	1
Rhinolophus acuminatus	Malaysia, Sabah	no	2
Rhinolophus affinis	China	no	65
Rhinolophus affinis	Malaysia, Peninsular	no	3
Rhinolophus affinis	Malaysia, Sabah	no	1
Rhinolophus alcyone	Cameroon	no	1
Rhinolophus alcyone	Guinea	no	1
Rhinolophus alcyone	Liberia	no	1
Rhinolophus alcyone	Sierra Leone	no	25
, ,		barcoded, species	
Rhinolophus arcuatus	Malaysia, Sabah	updated	2

yes	yes
yes	yes
no	no
yes	yes
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bats	Rhinolophus blasii	Rhinolophus blasii
bats	Rhinolophus clivosus	Rhinolophus clivosus
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bats	Rhinolophus creaghi	Rhinolophus creaghi
bats	Rhinolophus creaghi	Rhinolophus creaghi
bats	Rhinolophus creaghi	Rhinolophus creaghi
bats	Rhinolophus eloquens	Rhinolophus eloquens
bats	Rhinolophus euryale	Rhinolophus euryale
bats	Rhinolophus fumigatus	Rhinolophus fumigatus
bats	Rhinolophus fumigatus	Rhinolophus fumigatus
bats	Rhinolophus fumigatus	Rhinolophus fumigatus
bats	Rhinolophus landeri	Rhinolophus landeri
bats	Rhinolophus landeri	Rhinolophus landeri
bats	Rhinolophus landeri	Rhinolophus landeri
bats	Rhinolophus landeri	Rhinolophus landeri
bats	Rhinolophus lepidus	Rhinolophus lepidus
bats	Rhinolophus luctus	Rhinolophus luctus
bats	Rhinolophus luctus	Rhinolophus luctus
bats	Rhinolophus mehelyi	Rhinolophus mehelyi
bats	Rhinolophus philippinensis	Rhinolophus philippinensis
bats	Rhinolophus pusillus	Rhinolophus pusillus
bats	Rhinolophus pusillus	Rhinolophus pusillus
bats	Rhinolophus rex	Rhinolophus rex
bats	Rhinolophus robinsoni	Rhinolophus robinsoni
bats	Rhinolophus sedulus	Rhinolophus sedulus
bats	Rhinolophus sedulus	Rhinolophus sedulus
bats	Rhinolophus sinicus	Rhinolophus sinicus
bats	Rhinolophus sp.	
bats	Rhinolophus sp.	
bats	Rhinolophus sp.	
bats	Rhinolophus sp.	
bats	Rhinolophus sp.	
bats	Rhinolophus sp.	
bats	Rhinolophus sp.	
bats	Rhinolophus stheno	Rhinolophus stheno
bats	Rhinolophus thomasi	Rhinolophus thomasi
bats	Rhinolophus trifoliatus	Rhinolophus trifoliatus

Rhinolophus blasii	Liberia	no	1
Rhinolophus clivosus	Rwanda	no	12
Rhinolophus creaghi	Malaysia, Sabah	barcoded, matched field ID	4
Rhinolophus creaghi	Malaysia, Sabah	barcoded, species updated	1
Rhinolophus creaghi	Malaysia, Sabah	no	185
Rhinolophus eloquens	Rwanda	no	2
Rhinolophus euryale	Jordan	barcoded, species updated	1
Rhinolophus fumigatus	Ivory Coast	no	1
Rhinolophus fumigatus	Sierra Leone	barcoded, species updated	3
Rhinolophus fumigatus	Sierra Leone	no	5
Rhinolophus landeri	Guinea	no	6
Rhinolophus landeri	Liberia	no	2
Rhinolophus landeri	Sierra Leone	no	1
Rhinolophus landeri	Sierra Leone	barcoded, species updated	1
Rhinolophus lepidus	Bangladesh	no	38
Rhinolophus luctus	China	no	1
Rhinolophus luctus	Malaysia, Sabah	no	2
Allinolophus ractus	ividiaysia, sasaii	barcoded, species	
Rhinolophus mehelyi	Jordan	updated	8
Rhinolophus philippinensis	Malaysia, Sabah	no	16
Rhinolophus pusillus	China	no	168
Rhinolophus pusillus	Malaysia, Sabah	no	1
Rhinolophus rex	China	no	3
Rhinolophus robinsoni	Malaysia, Peninsular	no	1
Rhinolophus sedulus	Malaysia, Peninsular	no	1
Rhinolophus sedulus	Malaysia, Sabah	no	10
Rhinolophus sinicus	China	no	239
Rhinolophus	DR Congo	no	45
Rhinolophus	Guinea	no	235
Rhinolophus	Indonesia	no	7
Rhinolophus	Jordan	barcoded, matched field ID	1
Rhinolophus	Jordan	no	455
Rhinolophus	Liberia	no	20
Rhinolophus	Malaysia, Sabah	barcoded, species updated	1
Rhinolophus	Rwanda	no	4
Rhinolophus	Sierra Leone	no	31
Rhinolophus	South Sudan	no	13
Rhinolophus	Uganda	no	241
Rhinolophus stheno	Malaysia, Peninsular	no	3
Rhinolophus thomasi	China	no	3
Rhinolophus trifoliatus	Malaysia, Peninsular	no	2

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Rhinolophus trifoliatus	Malaysia, Sabah	no	21
	Malaysia, Peninsular	no	1
Rhinopoma cystops	Jordan	no	85
Rhinopoma hardwickii	Jordan	barcoded, species updated	15
Rhinopoma hardwickii	Jordan	no	1
Rhinopoma microphyllum	Guinea	no	2
Rhinopoma microphyllum	Jordan	no	18
Rhinopoma microphyllum	Sierra Leone	barcoded, species updated	1
Rhinopomatidae	Guinea	no	11
Rhinopomatidae	Jordan	no	122
Rousettus aegyptiacus	Cameroon	no	28
Rousettus aegyptiacus	DR Congo	no	282
Rousettus aegyptiacus	Egypt	no	875
Rousettus aegyptiacus	Ghana	no	3
Rousettus aegyptiacus	Guinea	no	12
Rousettus aegyptiacus	Jordan	barcoded, species updated	2
		barcoded, matched	
Rousettus aegyptiacus	Jordan	field ID	2
Rousettus aegyptiacus	Jordan	no	205
Rousettus aegyptiacus	Rwanda	no	254
Rousettus aegyptiacus	Sierra Leone	no	514
Rousettus aegyptiacus	South Sudan	no	1
Rousettus aegyptiacus	Tanzania	no	377
Rousettus aegyptiacus	Uganda	no	7
Rousettus amplexicaudatus	Indonesia	no	198
Rousettus amplexicaudatus	Malaysia, Sabah	no	1
Rousettus amplexicaudatus	Thailand	barcoded, matched field ID	1
Lissonycteris angolensis angolensis	Sierra Leone	no	286
Rousettus lanosus	Rwanda	no	22
Rousettus leschenaultii	Bangladesh	no	114
Rousettus leschenaultii	China	no	65
Rousettus leschenaultii	Nepal	no	446
Rousettus leschenaultii	Thailand	no	2
Rousettus	Indonesia	no	1
Rousettus	Nepal	no	2
Scotoecus albigula	Uganda	no	8
Scotoecus albofuscus	Uganda	no	3
Scotoecus hirundo	Ethiopia	no	7
Scotoecus	South Sudan	no	1
Scotonycteris zenkeri	Ivory Coast	no	1
Scotonycteris zenkeri	Sierra Leone	no	4
Scotophilus dinganii	DR Congo	no	11
Scotophilus dinganii	Ivory Coast	no	6
Scotophilus dinganii	Kenya	no	6

yes	yes
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yes	yes

bats	Scotophilus dinganii	Scotophilus dinganii
bats	Scotophilus heathii	Scotophilus heathii
bats	Scotophilus kuhlii	Scotophilus kuhlii
bats	Scotophilus kuhlii	Scotophilus kuhlii
bats	Scotophilus kuhlii	Scotophilus kuhlii
bats	Scotophilus kuhlii	Scotophilus kuhlii
bats	Scotophilus nux	Scotophilus nux
bats	Scotophilus sp.	
bats	Scotophilus sp.	
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bats	Scotophilus viridis nigritellus	
bats	Styloctenium wallacei	Styloctenium wallacei
bats	Tadarida aegyptiaca	Tadarida aegyptiaca
bats	Tadarida aegyptiaca	Tadarida aegyptiaca
bats	Tadarida mops	Mops mops
bats	Tadarida plicata	Chaerephon plicatus
bats	Tadarida sp.	
bats	Tadarida sp.	
bats	Tadarida teniotis	Tadarida teniotis
bats	Taphozous longimanus	Taphozous longimanus
bats	Taphozous mauritianus	Taphozous mauritianus
bats	Taphozous melanopogon	Taphozous melanopogon
bats	Taphozous melanopogon	Taphozous melanopogon
bats	Taphozous melanopogon	Taphozous melanopogon
bats	Taphozous perforatus	Taphozous perforatus
bats	Taphozous saccolaimus	
bats	Taphozous saccolaimus	
bats	Taphozous sp.	
bats	Taphozous sp.	
bats	Taphozous sp.	
bats	Taphozous theobaldi	Taphozous theobaldi
bats	Thoopterus nigrescens	Thoopterus nigrescens
bats	Thoopterus sp.	
bats	Tylonycteris pachypus	Tylonycteris pachypus
bats	Tylonycteris pachypus	Tylonycteris pachypus
bats	Tylonycteris pachypus	Tylonycteris pachypus
bats	Tylonycteris robustula	Tylonycteris robustula
bats	Tylonycteris robustula	Tylonycteris robustula
bats	Tylonycteris robustula	Tylonycteris robustula
bats	Vespertilionidae sp.	5 66
bats	Vespertilionidae sp.	
birds	Acridotheres tristis	Acridotheres tristis
birds	Aegypius monachus	Aegypius monachus
birds	Alcedo atthis	Alcedo atthis
birds	Anas platyrhynchos	Anas platyrhynchos
birds	Anas sp.	
birds	Anatidae sp.	
birds	Anser anser	Anser anser

Scotophilus dinganii	Sierra Leone	no	3
Scotophilus heathii	Bangladesh	no	38
Scotophilus kuhlii	Bangladesh	no	29
Scotophilus kuhlii	Cambodia	no	4850
Scotophilus kuhlii	Lao PDR	no	3
Scotophilus kuhlii	Malaysia, Peninsular	no	2
Scotophilus nux	Cameroon	no	1
Scotophilus	DR Congo	no	83
Scotophilus	South Sudan	no	26
		barcoded, species	
Scotophilus viridis nigritellus	Sierra Leone	updated	26
Styloctenium wallacei	Indonesia	no	9
Tadarida aegyptiaca	Ethiopia	no	174
Tadarida aegyptiaca	Tanzania	no	380
	Malaysia, Sabah	no	5
	Malaysia, Sabah	no	1
Tadarida	Kenya	no	56
Tadarida	Tanzania	no	82
Tadarida teniotis	China	no	31
Taphozous longimanus	Cambodia	no	5
Taphozous mauritianus	DR Congo	no	1
Taphozous melanopogon	Bangladesh	no	6
Taphozous melanopogon	China	no	108
Taphozous melanopogon	Thailand	no	13
Taphozous perforatus	Egypt	no	11
Saccolaimus saccolaimus	Bangladesh	no	3
Saccolaimus saccolaimus	Malaysia, Sabah	no	1
Taphozous	China	no	37
Taphozous	Myanmar	no	725
Taphozous	South Sudan	no	2
Taphozous theobaldi	Lao PDR	no	2
Thoopterus nigrescens	Indonesia	no	182
Thoopterus	Indonesia	no	10
Tylonycteris pachypus	Bangladesh	no	56
Tylonycteris pachypus	China	no	54
Tylonycteris pachypus	Malaysia, Peninsular	no	22
Tylonycteris robustula	Cambodia	no	1
Tylonycteris robustula	China	no	18
Tylonycteris robustula	Malaysia, Peninsular	no	2
Vespertilionidae	Guinea	no	6
Vespertilionidae	Sierra Leone	no	5
Acridotheres tristis	Bangladesh	no	91
Aegypius monachus	Mongolia	no	20
Alcedo atthis	Mongolia	no	1
Anas platyrhynchos	Nepal	no	154
Anas	Mongolia	no	1121
Anatidae	Mongolia	no	97
Anser anser	Mongolia	no	40

yes	yes
yes	yes
no	no
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yes	yes
no	no
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yes	yes

birds	Anser cygnoides	Anser cygnoid
birds	Anser cygnoides	Anser cygnoid
birds	Anser indicus	Anser indicus
birds	Anser sp.	
birds	Aquila nipalensis	Aquila nipalensis
birds	Aves sp.	
birds	Columba livia	Columba livia
birds	Columba livia	Columba livia
birds	Columbidae sp.	
birds	Corvus macrorhynchos	Corvus macrorhynchos
birds	Corvus splendens	Corvus splendens
birds	Coturnix coturnix	Coturnix coturnix
birds	Coturnix japonica	Coturnix japonica
birds	Cygnus cygnus	Cygnus cygnus
birds	Cygnus sp.	
birds	Dinopium javanense	Dinopium javanense
birds	Gallus gallus	Gallus gallus
birds	Gracupica contra	Gracupica contra
birds	Grus sp.	
birds	Gyps himalayensis	Gyps himalayensis
birds	Halcyon smyrnensis	Halcyon smyrnensis
birds	Hydroprogne caspia	Hydroprogne caspia
birds	Larus ichthyaetus	Larus ichthyaetus
birds	Larus mongolicus	
birds	Larus ridibundus	Larus ridibundus
birds	Larus sp.	
birds	Loriculus vernalis	Loriculus vernalis
birds	Passer domesticus	Passer domesticus
birds	Passeridae sp.	
birds	Phalacrocorax carbo	Phalacrocorax carbo
birds	Pycnonotus goiavier	Pycnonotus goiavier
birds	Pycnonotus jocosus	Pycnonotus jocosus
birds	Rhipidura javanica	Rhipidura javanica
birds	Spilopelia chinensis	Spilopelia chinensis
birds	Tadorna ferruginea	Tadorna ferruginea
birds	Tadorna tadorna	Tadorna tadorna
birds	Todiramphus chloris	Todiramphus chloris
birds	Tringa ochropus	Tringa ochropus
birds	Tyto alba	Tyto alba
camels	Camelus dromedarius	
camels	Camelus dromedarius	
camels	Camelus dromedarius	
carnivores	Arctogalidia trivirgata	Arctogalidia trivirgata
carnivores	Chrotogale owstoni	Chrotogale owstoni
carnivores	Civettictis civetta	Civettictis civetta
carnivores	Helarctos malayanus	Helarctos malayanus
carnivores	Herpestes naso	Herpestes naso
carnivores	Mydaus javanensis	Mydaus javanensis

Anser cygnoides	Bangladesh	no	4
Anser cygnoides	Mongolia	no	80
Anser indicus	Mongolia	no	40
Anser	Mongolia	no	384
Aquila nipalensis	Mongolia	no	2
Aves	Ivory Coast	no	12
Columba livia	Bangladesh	no	3
Columba livia	Mongolia	no	2
Columbidae	Cambodia	no	2
Corvus macrorhynchos	Bangladesh	no	2
Corvus splendens	Bangladesh	no	629
Coturnix coturnix	Bangladesh	no	49
Coturnix japonica	Bangladesh	no	6
Cygnus cygnus	Mongolia	no	274
Cygnus	Mongolia	no	80
Dinopium javanense	Bangladesh	no	1
Gallus gallus	Vietnam	no	3
Gracupica contra	Bangladesh	no	27
Grus	Mongolia	no	10
Gyps himalayensis	Bangladesh	no	1
Halcyon smyrnensis	Bangladesh	no	3
Hydroprogne caspia	Mongolia	no	1
Ichthyaetus ichthyaetus	Mongolia	no	1
	Mongolia	no	8
Chroicocephalus ridibundus	Mongolia	no	1
Larus	Mongolia	no	50
Loriculus vernalis	Bangladesh	no	1
Passer domesticus	Bangladesh	no	2
Passeridae	Cambodia	no	1
Phalacrocorax carbo	Mongolia	no	1
Pycnonotus goiavier	Cambodia	no	2
Pycnonotus jocosus	Bangladesh	no	1
Rhipidura javanica	Cambodia	no	1
	Cambodia	no	3
Tadorna ferruginea	Mongolia	no	677
Tadorna tadorna	Mongolia	no	97
Todiramphus chloris	Cambodia	no	1
Tringa ochropus	Mongolia	no	1
Tyto alba	Bangladesh	no	1
Camelus dromedarius	Bangladesh	no	176
Camelus dromedarius	Kenya	no	514
Camelus dromedarius	Uganda	no	80
Arctogalidia trivirgata	Malaysia, Sabah	no	1
Chrotogale owstoni	Vietnam	no	1
Civettictis civetta	Cameroon	no	9
Helarctos malayanus	Malaysia, Sabah	no	18
Herpestes naso	Cameroon	no	4
Mydaus javanensis	Malaysia, Sabah	no	2

no	yes
no	yes
yes	yes
no	no
yes	yes
no	no
yes	yes
yes	yes
no	no
yes	yes
no	no
yes	yes
yes	yes
yes	yes
no	no
yes	yes
yes	yes
yes	yes
yes	no
no	no
yes	no
no	no
yes	yes
yes	yes
no	no
yes	yes
yes	no
yes	yes
no	yes
no	yes
no	yes
yes	yes

carnivores	Nandinia binotata	Nandinia binotata
carnivores	Nandinia binotata	Nandinia binotata
carnivores	Nandinia binotata	Nandinia binotata
carnivores	Paguma larvata	Paguma larvata
carnivores	Paguma larvata	Paguma larvata
carnivores	Paguma larvata	Paguma larvata
carnivores	Paradoxurus hermaphroditus	Paradoxurus hermaphroditus
carnivores	Paradoxurus hermaphroditus	Paradoxurus hermaphroditus
carnivores	Prionailurus bengalensis	Prionailurus bengalensis
carnivores	Ursus thibetanus	Ursus thibetanus
carnivores	Viverra tangalunga	Viverra tangalunga
carnivores	Viverra tangalunga	Viverra tangalunga
carnivores	Viverra tangalunga	Viverra tangalunga
carnivores	Viverridae sp.	
cats	Felis catus	
cats	Felis catus	
cats	Felis catus	
cattle/buffalo	Bos indicus	
cattle/buffalo	Bos indicus	
cattle/buffalo	Bos taurus	
cattle/buffalo	Bubalus bubalis	
cattle/buffalo	Bubalus bubalis	
cattle/buffalo	Bubalus bubalis	
cattle/buffalo	Syncerus Caffer	Syncerus caffer
dogs	Canis lupus familiaris	
goats/sheep	Capra hircus laniger	
goats/sheep	Caprinae sp.	
goats/sheep	Ovis aries	
goats/sheep	Tatera leucogaster	Gerbilliscus leucogaster
goats/sheep	Tatera leucogaster	Gerbilliscus leucogaster
goats/sheep	Tatera leucogaster	Gerbilliscus leucogaster
goats/sheep	Tatera leucogaster	Gerbilliscus leucogaster
goats/sheep	Tatera leucogaster	Gerbilliscus leucogaster
goats/sheep	Tatera leucogaster	Gerbilliscus leucogaster

Nandinia binotata	Cameroon	no	24
Nandinia binotata	Cameroon	barcoded, matched field ID	1
Nandinia binotata	Republic of Congo	no	1
Paguma larvata	Malaysia, Peninsular	no	1
Paguma larvata	Malaysia, Sabah	no	3
Paguma larvata	Vietnam	no	1
Paradoxurus hermaphroditus	Malaysia, Sabah	no	5
Paradoxurus hermaphroditus	Vietnam	no	301
Prionailurus bengalensis	Vietnam	no	1
Ursus thibetanus	Myanmar	no	1
Viverra tangalunga	Malaysia, Sabah	no	6
Viverra tangalunga	Malaysia, Sabah	barcoded, matched field ID	7
Viverra tangalunga	Malaysia, Sabah	barcoded, species updated	1
Viverridae	Vietnam	no	4
Felis catus	Cambodia	no	14
Felis catus	Sierra Leone	no	5
Felis catus	Thailand	no	52
Bos taurus indicus	Bangladesh	no	6
Bos taurus indicus	Thailand	no	72
Bos taurus	Cambodia	no	608
Bos taurus	DR Congo	no	10
Bos taurus	Lao PDR	no	185
	Cambodia	no	75
Bubalus bubalis	Bangladesh	no	200
Bubalus bubalis	Cambodia	no	12
Bubalus bubalis	Lao PDR	no	32
Syncerus caffer	Lao PDR	no	18
Canis lupus familiaris	Bangladesh	no	19
Canis lupus familiaris	Cambodia	no	176
Canis lupus familiaris	Guinea	no	6
Canis lupus familiaris	Malaysia, Peninsular	no	314
Canis lupus familiaris	Sierra Leone	no	315
Canis lupus familiaris	Thailand	no	51
	Bangladesh	no	8
Caprinae	Sierra Leone	no	4
Ovis aries	Bangladesh	no	141
Ovis aries	DR Congo	no	1
Ovis aries	Guinea	no	214
Ovis aries	Sierra Leone	no	379
Tatera leucogaster	Bangladesh	no	15
Tatera leucogaster	Cambodia	no	33
Tatera leucogaster	DR Congo	no	15
Tatera leucogaster	Guinea	no	107
Tatera leucogaster	Malaysia, Peninsular	no	35
Tatera leucogaster	Myanmar	no	57

yes	yes
yes	yes
no	no
no	yes
no	yes
no	yes
no	no
no	no
no	yes
no	yes
no	yes
no	no
no	yes
no	yes
no	yes
yes	yes
no	no
no	no
no	yes

goats/sheep	Tatera leucogaster	Gerbilliscus leucogaster
goats/sheep	Tatera leucogaster	Gerbilliscus leucogaster
horses	Equus caballus	
humans	Homo sapiens	Homo sapiens
humans	Homo sapiens	Homo sapiens
humans	Homo sapiens	Homo sapiens
humans	Homo sapiens	Homo sapiens
humans	Homo sapiens	Homo sapiens
humans	Homo sapiens	Homo sapiens
humans	Homo sapiens	Homo sapiens
humans	Homo sapiens	Homo sapiens
humans	Homo sapiens	Homo sapiens
humans	Homo sapiens	Homo sapiens
humans	Homo sapiens	Homo sapiens
humans	Homo sapiens	Homo sapiens
humans	Homo sapiens	Homo sapiens
humans	Homo sapiens	Homo sapiens
humans	Homo sapiens	Homo sapiens
humans	Homo sapiens	Homo sapiens
humans	Homo sapiens	Homo sapiens
humans	Homo sapiens	Homo sapiens
humans	Homo sapiens	Homo sapiens
humans	Homo sapiens	Homo sapiens
humans	Homo sapiens	Homo sapiens
humans	Homo sapiens	Homo sapiens
humans	Homo sapiens	Homo sapiens
humans	Homo sapiens	Homo sapiens
non-human primates	Allenopithecus nigroviridis	Allenopithecus nigroviridis
non-human primates	Cephalopachus bancanus	
non-human primates	Cercocebus agilis	Cercocebus agilis
non-human primates	Cercocebus agilis	Cercocebus agilis
non-human primates	Cercocebus chrysogaster	Cercocebus chrysogaster
non-human primates	Cercocebus galeritus	Cercocebus galeritus
non-human primates	Cercocebus sp.	
non-human primates	Cercocebus torquatus	Cercocebus torquatus
non-human primates	Cercopithecidae sp.	
non-human primates	Cercopithecus aethiops	
non-human primates	Cercopithecus aethiops	Chlorocebus aethiops
non-human primates	Cercopithecus ascanius	Cercopithecus ascanius
non-human primates	Cercopithecus ascanius	Cercopithecus ascanius
non-human primates	Cercopithecus cephus	Cercopithecus cephus
non-human primates	Cercopithecus denti	Cercopithecus denti
non-human primates	Cercopithecus erythrogaster	Cercopithecus erythrogaster
non-human primates	Cercopithecus hamlyni	Cercopithecus hamlyni
non-human primates	Cercopithecus Ihoesti	Allochrocebus lhoesti
non-human primates	Cercopithecus mitis	Cercopithecus mitis
non-human primates	Cercopithecus mona	Cercopithecus mona
non-human primates	Cercopithecus mona	Cercopithecus mona

Tatera leucogaster	Sierra Leone	no	470
Tatera leucogaster	Thailand	no	30
Equus caballus	Cambodia	no	7
Homo sapiens	Bangladesh	no	585
Homo sapiens	Cambodia	no	1693
Homo sapiens	Cameroon	no	618
Homo sapiens	China	no	518
Homo sapiens	DR Congo	no	808
Homo sapiens	Egypt	no	1097
Homo sapiens	Ethiopia	no	22
Homo sapiens	Ghana	no	458
Homo sapiens	India	no	65
Homo sapiens	Indonesia	no	864
Homo sapiens	Ivory Coast	no	117
Homo sapiens	Jordan	no	1085
Homo sapiens	Kenya	no	327
Homo sapiens	Lao PDR	no	234
Homo sapiens	Malaysia, Peninsular	no	377
Homo sapiens	Myanmar	no	708
Homo sapiens	Nepal	no	1966
Homo sapiens	Republic of Congo	no	23
Homo sapiens	Rwanda	no	400
Homo sapiens	Senegal	no	551
Homo sapiens	Tanzania	no	1069
Homo sapiens	Thailand	no	555
Homo sapiens	Uganda	no	315
Homo sapiens	Vietnam	no	732
Allenopithecus nigroviridis	DR Congo	no	42
Cephalopachus bancanus	Malaysia, Sabah	no	1
Cercocebus agilis	Cameroon	no	5
Cercocebus agilis	DR Congo	no	5
Cercocebus chrysogaster	DR Congo	no	17
Cercocebus galeritus	DR Congo	no	2
Cercocebus	DR Congo	no	2
Cercocebus torquatus	Cameroon	no	2
Cercopithecidae	DR Congo	no	84
	Ethiopia	no	63
	Ethiopia	no	22
Cercopithecus ascanius	DR Congo	no	113
Cercopithecus ascanius	Tanzania	no	16
Cercopithecus cephus	Cameroon	no	504
Cercopithecus denti	DR Congo	no	1
Cercopithecus erythrogaster	DR Congo	no	2
Cercopithecus hamlyni	DR Congo	no	7
Allochrocebus Ihoesti	DR Congo	no	1
Cercopithecus mitis	DR Congo	no	2
Cercopithecus mona	DR Congo	no	7
Cercopithecus mona	Ghana	no	386

no	yes
no	yes
no	yes
yes	yes
no	yes
yes	yes
no	no
yes	yes
no	no
no	no
no	no
yes	yes
no	no
yes	yes
yes	yes
yes	yes

non human primatos	Carcanithacus mana	Carcanithacus mana
non-human primates	Cercopithecus mona	Cercopithecus mona
non-human primates	Cercopithecus neglectus	Cercopithecus neglectus
non-human primates	Cercopithecus neglectus	Cercopithecus neglectus
non-human primates	Cercopithecus nictitans	Cercopithecus nictitans
non-human primates	Cercopithecus nictitans	Cercopithecus nictitans
non-human primates	Cercopithecus pogonias	Cercopithecus denti
non-human primates	Cercopithecus pogonias	Cercopithecus denti
non-human primates	Cercopithecus preussi	Allochrocebus preussi
non-human primates	Cercopithecus tantalus	Chlorocebus tantalus
non-human primates	Chlorocebus aethiops	Chlorocebus aethiops
non-human primates	Chlorocebus aethiops	Chlorocebus aethiops
non-human primates	Chlorocebus pygerythrus	Chlorocebus pygerythrus
non-human primates	Chlorocebus pygerythrus	Chlorocebus pygerythrus
non-human primates	Chlorocebus sabaeus	Chlorocebus sabaeus
non-human primates	Chlorocebus sabaeus	Chlorocebus sabaeus
non-human primates	Colobus angolensis	Colobus angolensis
non-human primates	Colobus guereza	Colobus guereza
non-human primates	Colobus satanas	Colobus satanas
non-human primates	Colobus sp.	
non-human primates	Erythrocebus patas	Erythrocebus patas
non-human primates	Erythrocebus patas	Erythrocebus patas
non-human primates	Gorilla beringei beringei	
non-human primates	Gorilla beringei beringei	
non-human primates	Gorilla beringei beringei	
non-human primates	Gorilla beringei graueri	
non-human primates	Gorilla beringei graueri	
non-human primates	Gorilla gorilla	Gorilla gorilla
non-human primates	Gorilla gorilla	
non-human primates	Hylobates funereus	Hylobates funereus
non-human primates	Hylobates muelleri	Hylobates muelleri
non-human primates	Lophocebus albigena	Lophocebus albigena
non-human primates	Lophocebus aterrimus	Lophocebus aterrimus
non-human primates	Macaca arctoides	Macaca arctoides
non-human primates	Macaca assamensis	Macaca assamensis
non-human primates	Macaca fascicularis	Macaca fascicularis
non-human primates	Macaca fascicularis	Macaca fascicularis
non-human primates	Macaca fascicularis	Macaca fascicularis
non-human primates	Macaca fascicularis	Macaca fascicularis
non-human primates	Macaca fascicularis	Macaca fascicularis
non-human primates	Macaca leonina	Macaca leonina
non-human primates	Macaca mulatta	Macaca mulatta
non-human primates	Macaca mulatta	Macaca mulatta
non-human primates	Macaca mulatta	Macaca mulatta
non-human primates	Macaca mulatta	Macaca mulatta
non-human primates	Macaca nemestrina	Macaca nemestrina
non-human primates	Macaca nemestrina	Macaca nemestrina
non-human primates	Macaca nemestrina	Macaca nemestrina
non-human primates	Macaca nemestrina	Macaca nemestrina

Cercopithecus mona	Sierra Leone	no	1
Cercopithecus neglectus	Cameroon	no	22
Cercopithecus neglectus	DR Congo	no	19
Cercopithecus nictitans	Cameroon	no	199
Cercopithecus nictitans	DR Congo	no	2
Cercopithecus pogonias	Cameroon	no	57
Cercopithecus pogonias	DR Congo	no	2
Allochrocebus preussi preussi	Cameroon	no	2
· · · · ·	Sierra Leone	no	1
Chlorocebus aethiops	DR Congo	no	4
Chlorocebus aethiops	Senegal	no	1
Chlorocebus pygerythrus	Kenya	no	32
Chlorocebus pygerythrus	Uganda	no	68
Chlorocebus sabaeus	Senegal	no	255
Chlorocebus sabaeus	Sierra Leone	no	2
Colobus angolensis	Rwanda	no	23
Colobus guereza	Cameroon	no	14
Colobus satanas	Cameroon	no	3
Colobus	DR Congo	no	2
Erythrocebus patas	Cameroon	no	1
Erythrocebus patas	DR Congo	no	6
Gorilla beringei beringei	DR Congo	no	49
Gorilla beringei beringei	Rwanda	no	147
Gorilla beringei beringei	Uganda	no	427
Gorilla beringei graueri	DR Congo	no	5
Gorilla beringei graueri	Rwanda	no	1
Gorilla gorilla	Cameroon	no	2
Gorilla gorilla	Cameroon	no	1
Hylobates funereus	Malaysia, Sabah	no	15
, Hylobates muelleri	Malaysia, Sabah	no	5
Lophocebus albigena	DR Congo	no	3
Lophocebus aterrimus	DR Congo	no	30
Macaca arctoides	Vietnam	no	8
Macaca assamensis	Bangladesh	no	2
Macaca fascicularis	Malaysia, Peninsular	no	142
Macaca fascicularis	Malaysia, Sabah	no	7
Macaca fascicularis	Myanmar	no	135
Macaca fascicularis	Thailand	no	356
Macaca fascicularis	Vietnam	no	136
Macaca leonina	Vietnam	no	3
Macaca mulatta	Bangladesh	no	7735
Macaca mulatta	India	no	4
Macaca mulatta	Myanmar	no	179
Macaca mulatta	Nepal	no	1120
Macaca nemestrina	Malaysia, Peninsular	no	11
Macaca nemestrina	Malaysia, Sabah	no	1
Macaca nemestrina	Myanmar	no	12
Macaca nemestrina	Thailand	no	3

yes	yes
yes	yes
no	yes
no	yes
no	no
no	no
yes	yes
no	no
yes	yes
yes	yes
no	yes
yes	yes
no	yes
yes	yes

non human primates	Mandrillus anhiny	Mandrillus anhiny
non-human primates	Mandrillus sphinx	Mandrillus sphinx
non-human primates	Miopithecus talapoin	Miopithecus talapoin
non-human primates	Miopithecus talapoin	Miopithecus talapoin
non-human primates	Nasalis larvatus	Nasalis larvatus
non-human primates	Nomascus annamensis	
non-human primates	Nomascus gabriellae	Nomascus gabriellae
non-human primates	Nomascus leucogenys	Nomascus leucogenys
non-human primates	Nomascus siki	Nomascus siki
non-human primates	Nycticebus menagensis	Nycticebus menagensis
non-human primates	Pan paniscus	Pan paniscus
non-human primates	Pan troglodytes	Pan troglodytes
non-human primates	Pan troglodytes	Pan troglodytes
non-human primates	Pan troglodytes	Pan troglodytes
non-human primates	Pan troglodytes	Pan troglodytes
non-human primates	Pan troglodytes	Pan troglodytes
non-human primates	Pan troglodytes schweinfurthii	
non-human primates	Papio anubis	Papio anubis
non-human primates	Papio anubis	Papio anubis
non-human primates	Papio anubis	Papio anubis
non-human primates	Papio anubis	Papio anubis
non-human primates	Papio anubis	Papio anubis
non-human primates	Papio anubis	Papio anubis
non-human primates	Papio anubis	Papio anubis
non-human primates	Papio hamadryas	Papio hamadryas
non-human primates	Papio hamadryas	Papio hamadryas
non-human primates	Pongo pygmaeus	Pongo pygmaeus
non-human primates	Primates sp.	
non-human primates	Procolobus sp.	
non-human primates	Pygathrix cinerea	Pygathrix cinerea
non-human primates	Pygathrix nemaeus	Pygathrix nemaeus
non-human primates	Pygathrix nigripes	Pygathrix nigripes
non-human primates	Trachypithecus cristatus	Trachypithecus cristatus
non-human primates	Trachypithecus hatinhensis	Trachypithecus hatinhensis
non-human primates	Trachypithecus obscurus	Trachypithecus obscurus
non-human primates	Trachypithecus poliocephalus	Trachypithecus poliocephalus
other	Dendrohyrax dorsalis	Dendrohyrax dorsalis
other	Echinosorex gymnura	Echinosorex gymnura
	<u> </u>	
other	Echinosorex gymnura	Echinosorex gymnura
other	Elephas maximus	Elephas maximus
other	Elephas maximus borneensis	
other	Lama glama	Lama guanicoe
other	Lepus peguensis	Lepus peguensis
other	Oryctolagus cuniculus	Oryctolagus cuniculus
other	Poelagus sp.	,
other	Stenella attenuata	Stenella attenuata
other	Tupaiidae sp.	Steriena atteriaata
pangolins	Manis javanica	Manis javanica
Parigonina	ivianio javanica	inanis javanica

Mandrillus sphinx	Cameroon	no	5
Miopithecus talapoin	Cameroon	no	14
Miopithecus talapoin	DR Congo	no	3
Nasalis larvatus	Malaysia, Sabah	no	28
Nomascus annamensis	Vietnam	no	6
Nomascus gabriellae	Vietnam	no	11
Nomascus leucogenys	Vietnam	no	5
Nomascus siki	Vietnam	no	1
Nycticebus menagensis	Malaysia, Sabah	no	11
Pan paniscus	DR Congo	no	8
Pan troglodytes	Cameroon	no	22
Pan troglodytes	DR Congo	no	43
Pan troglodytes	Rwanda	no	46
Pan troglodytes	Sierra Leone	no	1
Pan troglodytes	Tanzania	no	73
Pan troglodytes schweinfurthii	Uganda	no	2
Papio anubis	Cameroon	no	3
Papio anubis	DR Congo	no	51
Papio anubis	Ethiopia	no	111
Papio anubis	Kenya	no	302
Papio anubis	Rwanda	no	24
Papio anubis	Sierra Leone	no	1
Papio anubis	Tanzania		78
		no	6
Papio hamadryas	DR Congo	no	
Papio hamadryas	Ethiopia	no	258
Pongo pygmaeus	Malaysia, Sabah	no	15
Primates	Sierra Leone	no	6
Procolobus	Tanzania	no	26
Pygathrix cinerea	Vietnam	no	3
Pygathrix nemaeus	Vietnam	no	8
Pygathrix nigripes	Vietnam	no	3
Trachypithecus cristatus	Malaysia, Sabah	no	3
Trachypithecus hatinhensis	Vietnam	no	5
Trachypithecus obscurus	Malaysia, Peninsular	no	1
Trachypithecus poliocephalus	Vietnam	no	1
Dendrohyrax dorsalis	Cameroon	no	2
Echinosorex gymnura	Malaysia, Sabah	no	6
Echinosorex gymnura	Malaysia, Sabah	barcoded, matched field ID	2
Elephas maximus	Myanmar	no	4
	Malaysia, Sabah	no	7
Lama glama	Bangladesh	no	3
Lepus peguensis	Vietnam	no	1
Oryctolagus cuniculus	Malaysia, Peninsular	no	2
Poelagus	Cambodia	no	1
Stenella attenuata	Malaysia, Sabah	no	1
Tupaiidae	Vietnam	no	1

yes	yes
yes	yes
yes	yes
yes	yes
no	yes
yes	yes
no	yes
yes	yes
no	no
no	no
yes	yes
yes	yes
yes	yes
no	no
no	yes
yes	yes
yes	yes
no	no
yes	yes
no	no
yes	yes

pangolins	Manis javanica	Manis javanica
pangolins	Manis javanica	Manis javanica
pangolins	Manis pentadactyla	Manis pentadactyla
pangolins	Manis sp.	
pangolins	Phataginus tricuspis	Phataginus tricuspis
poultry/other fowl	Anas platyrhynchos domesticus	
poultry/other fowl	Anas platyrhynchos domesticus	
poultry/other fowl	Anas platyrhynchos domesticus	
poultry/other fowl	Anas platyrhynchos domesticus	
poultry/other fowl	Anas platyrhynchos domesticus	
poultry/other fowl	Anas platyrhynchos domesticus	
poultry/other fowl	Anser anser domesticus	
poultry/other fowl	Anser anser domesticus	
poultry/other fowl	Anser anser domesticus	
poultry/other fowl	Anser cygnoides domesticus	
poultry/other fowl	Cairina moschata	Cairina moschata
poultry/other fowl	Cairina moschata	Cairina moschata
poultry/other fowl	Cairina moschata	Cairina moschata
poultry/other fowl	Columba domestica	
poultry/other fowl	Columba livia domestica	
poultry/other fowl	Gallus gallus domesticus	
poultry/other fowl	Gallus gallus domesticus	
poultry/other fowl	Gallus gallus domesticus	
poultry/other fowl	Gallus gallus domesticus	
poultry/other fowl	Pavo cristatus	Pavo cristatus
rodents/shrews	Acomys johannis	Acomys johannis
rodents/shrews	Acomys kempi	Acomys kempi
rodents/shrews	Acomys percivali	Acomys percivali
rodents/shrews	Acomys sp.	
rodents/shrews	Aethomys	
rodents/shrews	Aethomys hindei	Aethomys hindei
rodents/shrews	Aethomys sp.	
rodents/shrews	Apodemus chevrieri	Apodemus chevrieri
rodents/shrews	Apodemus latronum	Apodemus latronum
rodents/shrews	Apodemus sp.	
rodents/shrews	Apodemus sp.	
rodents/shrews	Apodemus sylvaticus	Apodemus sylvaticus
rodents/shrews	Apodemus sylvaticus	Apodemus sylvaticus
rodents/shrews	Apodemus sylvaticus	Apodemus sylvaticus
rodents/shrews	Apodemus sylvaticus	Apodemus sylvaticus
rodents/shrews	Arvicanthis niloticus	Arvicanthis niloticus
rodents/shrews	Arvicanthis sp	
rodents/shrews	Arvicanthis sp.	
rodents/shrews	Arvicanthis sp.	
rodents/shrews	Atherurus africanus	Atherurus africanus
rodents/shrews	Atherurus africanus	Atherurus africanus
rodents/shrews	Atherurus africanus	Atherurus africanus
rodents/shrews	Bandicota bengalensis	Bandicota bengalensis

Manis javanica	Malaysia, Sabah	no	55
Manis javanica	Vietnam	no	332
Manis pentadactyla	Vietnam	no	7
Manis	Myanmar	no	11
	Cameroon	no	39
	Bangladesh	no	110
	Cambodia	no	640
	DR Congo	no	7
	Lao PDR	no	72
	Malaysia, Peninsular	no	7
	Myanmar	no	52
	Bangladesh	no	10
	Cambodia	no	23
	Malaysia, Peninsular	no	2
	Bangladesh	no	27
Cairina moschata	Bangladesh	no	11
Cairina moschata	Cambodia	no	37
Cairina moschata	Lao PDR	no	145
	Bangladesh	no	1
	Bangladesh	no	43
	Bangladesh	no	705
	Cambodia	no	850
	Lao PDR	no	61
	Malaysia, Peninsular	no	177
Pavo cristatus	Malaysia, Peninsular	no	2
Acomys johannis	Cameroon	no	1
Acomys kempi	Kenya	no	43
Acomys percivali	Kenya	no	57
Acomys	South Sudan	no	2
Aethomys	Tanzania	no	2
Aethomys hindei	Kenya	no	92
Aethomys	Kenya	no	2
Apodemus chevrieri	China	no	30
Apodemus latronum	China	no	1,
Apodemus	Ghana	no	9
Apodemus	Tanzania	no	3
Apodemus sylvaticus	China	no	1
Apodemus sylvaticus	Ghana	no	6
Apodemus sylvaticus	Nepal	no	36
Apodemus sylvaticus	Tanzania	no	1
Arvicanthis niloticus	Kenya	no	2
	Tanzania	no	5
Arvicanthis	DR Congo	no	1
Arvicanthis	Tanzania	no	52
Atherurus africanus	Cameroon	no	939
Atherurus africanus	DR Congo	no	12
Atherurus africanus	Republic of Congo	no	1
Bandicota bengalensis	Bangladesh	no	49

yes	yes
yes	yes
yes	yes
no	no
yes	no
no	no
yes	yes
yes	yes
yes	yes
no	no
yes	yes
no	no
no	yes
yes	yes
no	no
yes	yes
yes	yes
no	no
no	no
yes	yes
no	no
no	no
no	no
yes	yes

rodents/shrews	Bandicota bengalensis	Bandicota bengalensis
rodents/shrews	Bandicota bengalensis	Bandicota bengalensis
rodents/shrews	Bandicota indica	Bandicota indica
rodents/shrews	Bandicota indica	Bandicota indica
	Bandicota indica	Bandicota indica
rodents/shrews	Bandicota indica	Bandicota indica
rodents/shrews	Bandicota indica	Bandicota indica
rodents/shrews	Bandicota indica	Bandicota indica
rodents/shrews	Bandicota indica	Bandicota indica
rodents/shrews	Bandicota savilei	Bandicota savilei
rodents/shrews	Bandicota savilei	Bandicota savilei
rodents/shrews	Bandicota savilei	Bandicota savilei
rodents/shrews	Bandicota savilei	Bandicota savilei
rodents/shrews	Bandicota sp.	
rodents/shrews	Belomys pearsonii	Belomys pearsonii
rodents/shrews	Berylmys berdmorei	Berylmys berdmorei
rodents/shrews	Bunomys sp.	, ,
rodents/shrews	Callosciurus adamsi	Callosciurus adamsi
rodents/shrews	Callosciurus caniceps	Callosciurus caniceps
rodents/shrews	Callosciurus erythraeus	Callosciurus erythraeus
rodents/shrews	Callosciurus finlaysonii	Callosciurus finlaysonii
rodents/shrews	Callosciurus notatus	Callosciurus notatus
rodents/shrews	Callosciurus notatus	Callosciurus notatus
rodents/shrews	Callosciurus prevostii	Callosciurus prevostii
rodents/shrews	Cavia porcellus	Cricetomys emini
rodents/shrews	Chiropodomys gliroides	Chiropodomys gliroides
rodents/shrews	Chiropodomys gliroides	Chiropodomys gliroides
rodents/shrews	Chiropodomys gliroides	Chiropodomys gliroides
rodents/shrews	Chiropodomys gliroides	Chiropodomys gliroides
rodents/shrews	Cricetomys emini	Cricetomys emini
rodents/shrews	Cricetomys emini	Cricetomys emini
rodents/shrews	Cricetomys gambianus	Cricetomys gambianus
rodents/shrews	Cricetomys gambianus	Cricetomys gambianus
rodents/shrews	Cricetomys gambianus	Cricetomys gambianus
rodents/shrews	Cricetomys kivuensis	Cricetomys emini
rodents/shrews	Crocidura attenuata	Crocidura attenuata
rodents/shrews	Crocidura fuliginosa	Crocidura fuliginosa
rodents/shrews	Crocidura olivieri	Crocidura olivieri
rodents/shrews	Crocidura poensis	Crocidura poensis
rodents/shrews	Crocidura poensis	Crocidura poensis
rodents/shrews	Crocidura poensis	Crocidura poensis
rodents/shrews	Crocidura poensis	Crocidura poensis
rodents/shrews	Crocidura poensis	Crocidura poensis
Touents/SITIEWS	Ci Ocidui a Tussuid	Ci Ocidula Tussula

Bandicota bengalensis	Cambodia	no	2
		barcoded, species	
Bandicota bengalensis	Myanmar	updated	44
Bandicota indica	Bangladesh	no	126
Bandicota indica	Cambodia	no	24
Bandicota indica	Thailand	no	17
Bandicota indica	Thailand	barcoded, matched field ID	2
Bandicota indica	Thailand	barcoded, species updated	4
Bandicota indica	Vietnam	no	9
Bandicota savilei	Cambodia	no	15
Bandicota savilei	Thailand	barcoded, matched field ID	6
Bandicota savilei	Thailand	no	33
Bandicota savilei	Thailand	barcoded, species updated	7
Bandicota	Bangladesh	no	217
Belomys pearsonii	Lao PDR	no	9
Berylmys berdmorei	Lao PDR	no	1
Bunomys	Indonesia	no	9
Callosciurus adamsi	Malaysia, Sabah	no	1
Callosciurus caniceps	Vietnam	no	1
Callosciurus erythraeus	Lao PDR	no	1
Callosciurus finlaysonii	Lao PDR	no	73
Callosciurus notatus	Malaysia, Peninsular	no	1
Callosciurus notatus	Malaysia, Sabah	no	13
Callosciurus prevostii	Malaysia, Sabah	no	1
Cavia porcellus	Cambodia	no	3
Chiropodomys gliroides	Malaysia, Peninsular	no	8
Chiropodomys gliroides	Malaysia, Sabah	no	1
Chiropodomys gliroides	Thailand	no	1
	Malaysia, Sabah	no	1
Cricetomys emini	Cameroon	no	51
Cricetomys emini	Senegal	no	1
Cricetomys gambianus	DR Congo	no	1
Cricetomys gambianus	Ghana	no	12
Cricetomys gambianus	South Sudan	no	8
Cricetomys kivuensis	Liberia	no	26
Crocidura attenuata	China	no	5
Crocidura fuliginosa	Myanmar	no	16
Crocidura olivieri	Uganda	no	20
Crocidura poensis	Cameroon	no	25
Crocidura poensis	Ivory Coast	no	1
Crocidura poensis	Senegal	no	1
Crocidura poensis	Sierra Leone	no	9
Crocidura russula	Republic of Congo	no	5

yes	yes
yes	yes
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yes	yes
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yes	yes
no	yes
yes	yes
yes	yes
-	

rodents/shrews	Crocidura sp.	
rodents/shrews	Crocidura sp.	
rodents/shrews	Dasymys rufulus	Dasymys rufulus
rodents/shrews	Dasymys rufulus	Dasymys rufulus
rodents/shrews	Delanymys brooksi	Delanymys brooksi
rodents/shrews	Dendrogale murina	Dendrogale murina
rodents/shrews	Dendromus mystacalis	Dendromus mystacalis
odents/shrews	Dephomys defua	Dephomys defua
odents/shrews	Dephomys sp.	
rodents/shrews	Dremomys everetti	Dremomys everetti
rodents/shrews	Dremomys rufigenis	Dremomys rufigenis
rodents/shrews	Dremomys rufigenis fuscus	E Link in the second
rodents/shrews	Echiothrix centrosa	Echiothrix centrosa
rodents/shrews	Echiothrix leucura	Echiothrix leucura
rodents/shrews	Elephantulus rufescens	Elephantulus rufescens
rodents/shrews	Elephantulus sp.	
rodents/shrews	Eothenomys miletus	Eothenomys miletus
rodents/shrews	Gerbilliscus robustus	Gerbilliscus robustus
rodents/shrews	Gerbilliscus sp.	
rodents/shrews	Grammomys dolichurus	Grammomys dolichurus
odents/shrews	Grammomys sp.	
rodents/shrews	Graphiurus murinus	Graphiurus murinus
rodents/shrews	Graphiurus sp.	
rodents/shrews	Hadromys yunnanensis	Hadromys yunnanensis
rodents/shrews	Heimyscus fumosus	Heimyscus fumosus
rodents/shrews	Heimyscus fumosus	Heimyscus fumosus
rodents/shrews	Heimyscus sp.	
rodents/shrews	Hybomys univittatus	Hybomys univittatus
rodents/shrews	Hybomys univittatus	Hybomys univittatus
rodents/shrews	Hylomys suillus	Hylomys suillus
rodents/shrews	Hylomyscus alleni	Hylomyscus alleni
rodents/shrews	Hylomyscus sp.	
rodents/shrews	Hylomyscus sp.	
rodents/shrews	Hylopetes phayrei	Hylopetes phayrei
rodents/shrews	Hylopetes spadiceus	Hylopetes spadiceus
odents/shrews	Hystrix brachyura	Hystrix brachyura
rodents/shrews	Lemniscomys rosalia	Lemniscomys rosalia
rodents/shrews	Lemniscomys sp.	
rodents/shrews	Lemniscomys striatus	Lemniscomys striatus
rodents/shrews	Lemniscomys striatus	Lemniscomys striatus

Crocidura	Cameroon	barcoded, species updated	1
Crocidura	Ghana	no	120
Crocidura	Kenya	no	2
Crocidura	Republic of Congo	no	4
Crocidura	Tanzania	no	104
Dasymys rufulus	Cameroon	no	1
Dasymys rufulus	Ivory Coast	no	1
Delanymys brooksi	DR Congo	no	5
Dendrogale murina	Vietnam	no	1
Dendromus mystacalis	Ghana	no	4
Dephomys defua	DR Congo	no	12
Dephomys	Cameroon	no	1
Dremomys everetti	Malaysia, Sabah	no	1
Dremomys rufigenis	Lao PDR	no	26
		barcoded, species	
Dremomys rufigenis fuscus	Lao PDR	updated	1
Echiothrix centrosa	Indonesia	no	9
Echiothrix leucura	Indonesia	no	5
Elephantulus rufescens	Kenya	no	8
Elephantulus	Tanzania	no	1
Eothenomys miletus	China	no	6
Gerbilliscus robustus	Kenya	no	35
Gerbilliscus	Kenya	no	1
Grammomys dolichurus	Kenya	no	8
Grammomys	Kenya	no	53
Graphiurus murinus	Tanzania	no	6
Graphiurus	Kenya	no	1
Hadromys yunnanensis	China	no	1
Heimyscus fumosus	DR Congo	no	10
Heimyscus fumosus	Ghana	no	35
Heimyscus	Ghana	no	10
Hybomys univittatus	Cameroon	no	1
Hybomys univittatus	Republic of Congo	no	4
Hylomys suillus	Malaysia, Peninsular	no	1
Hylomyscus alleni	Republic of Congo	no	1
Hylomyscus	Ivory Coast	no	1
Hylomyscus	Republic of Congo	no	1
Hylopetes phayrei	Lao PDR	no	142
Hylopetes spadiceus	Lao PDR	no	43
Hystrix brachyura	Vietnam	no	339
Lemniscomys rosalia	Tanzania	no	5
Lemniscomys	Cameroon	no	1
Lemniscomys	Ghana	no	3
Lemniscomys	South Sudan	no	3
Lemniscomys	Tanzania	no	34
Lemniscomys striatus	Cameroon	no	17
Lemniscomys striatus	DR Congo	no	9

no	no
no	no
yes	yes
no	no
yes	yes
yes	yes
no	yes
yes	yes
yes	yes
yes	yes
no	no
yes	yes
yes	yes
no	no
yes	yes
no	no
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no	no
yes	yes
yes	yes
yes	yes
no	no
yes	yes
no	no
no	no
yes	yes
no	no
yes	yes
yes	yes

rodents/shrews	Lemniscomys striatus	Lemniscomys striatus
rodents/shrews	Lemniscomys striatus	Lemniscomys striatus
rodents/shrews	Lenomys meyeri	Lenomys meyeri
rodents/shrews	Leopoldamys edwardsi	Leopoldamys edwardsi
rodents/shrews	Leopoldamys edwardsi	Leopoldamys edwardsi
rodents/shrews	Leopoldamys edwardsi	Leopoldamys edwardsi
rodents/shrews	Leopoldamys neilli	Leopoldamys neilli
rodents/shrews	Leopoldamys neilli	Leopoldamys neilli
rodents/shrews	Leopoldamys sabanus	Leopoldamys sabanus
rodents/shrews	Leopoldamys sabanus	Leopoldamys sabanus
rodents/shrews	Leopoldamys sabanus	Leopoldamys sabanus
rodents/shrews	Leopoldamys sabanus	Leopoldamys sabanus
rodents/shrews	Leopoldamys sabanus	Leopoldamys sabanus
rodents/shrews	Leopoldamys sabanus	Leopoldamys sabanus
rodents/shrews	Leopoldamys sabanus	Leopoldamys sabanus
rodents/shrews	Leopoldamys sabanus	Leopoldamys sabanus
rodents/shrews	Leopoldamys sp.	
rodents/shrews	Lophuromys ansorgei	Lophuromys sikapusi
rodents/shrews	Lophuromys flavopunctatus	Lophuromys flavopunctatus
rodents/shrews	Lophuromys nudicaudus	Lophuromys nudicaudus
rodents/shrews	Lophuromys sikapusi	Lophuromys sikapusi
rodents/shrews	Lophuromys sikapusi	Lophuromys sikapusi
rodents/shrews	Lophuromys sikapusi	Lophuromys sikapusi
rodents/shrews	Lophuromys sikapusi	Lophuromys sikapusi
rodents/shrews	Lophuromys sp.	
rodents/shrews	Lophuromys sp.	
rodents/shrews	Malacomys longipes	Malacomys longipes
rodents/shrews	Malacomys longipes	Malacomys longipes
rodents/shrews	Malacomys sp.	
rodents/shrews	Malacomys sp.	
rodents/shrews	Malacomys sp.	
rodents/shrews	Mastomys erythroleucus	Mastomys erythroleucus
rodents/shrews	Mastomys erythroleucus	Mastomys erythroleucus
rodents/shrews	Mastomys natalensis	Mastomys natalensis
rodents/shrews	Mastomys natalensis	Mastomys natalensis
rodents/shrews	Mastomys natalensis	Mastomys natalensis
Todelito/ Sili ews	iviastomys nataiensis	ividatoritya Hataiciiaia
rodents/shrews	Mastomys natalensis	Mastomys natalensis
rodents/shrews	Mastomys natalensis	Mastomys natalensis
rodents/shrews	Mastomys sp.	

Lemniscomys striatus	Republic of Congo	no	38
Lemniscomys striatus	Rwanda	no	3
Lenomys meyeri	Indonesia	no	8
Leopoldamys edwardsi	Thailand	no	21
Leopoldamys edwardsi	Thailand	barcoded, matched field ID	1
Leopoldamys edwardsi	Thailand	barcoded, species updated	6
Leopoldamys neilli	Thailand	barcoded, species updated	1
Leopoldamys neilli	Thailand	no	4
Leopoldamys sabanus	Lao PDR	no	20
Leopoldamys sabanus	Malaysia, Peninsular	barcoded, matched field ID	14
Leopoldamys sabanus	Malaysia, Peninsular	no	8
Leopoldamys sabanus	Malaysia, Peninsular	barcoded, species updated	1
Leopoldamys sabanus	Malaysia, Sabah	no	18
Leopoldamys sabanus	Malaysia, Sabah	barcoded, matched field ID	15
Leopoldamys sabanus	Malaysia, Sabah	barcoded, species updated	5
Leopoldamys sabanus	Thailand	no	10
Leopoldamys	Cambodia	no	1
Lophuromys ansorgei	Republic of Congo	no	1
Lophuromys flavopunctatus	DR Congo	no	45
Lophuromys nudicaudus	Republic of Congo	no	1
Lophuromys sikapusi	Cameroon	no	119
Lophuromys sikapusi	Ivory Coast	no	2
Lophuromys sikapusi	Liberia	no	4
Lophuromys sikapusi	Republic of Congo	no	15
Lophuromys	Republic of Congo	no	2
Lophuromys	Tanzania	no	17
Malacomys longipes	Republic of Congo	no	16
Malacomys longipes	Sierra Leone	no	1
Malacomys	Cameroon	no	3
Malacomys	Ghana	no	1
Malacomys	Sierra Leone	no	5
Mastomys erythroleucus	Sierra Leone	barcoded, species updated	5
Mastomys erythroleucus	Uganda	no	1
Mastomys natalensis	Ghana	no	52
Mastomys natalensis	Liberia	no	42
Mastomys natalensis	Republic of Congo	no	1
Mastomys natalensis	Sierra Leone	barcoded, species updated	11
Mastomys natalensis	Tanzania	no	511
Mastomys	Cameroon	no	6

yes	yes
yes	yes
yes	yes
yes	yes
no	no
no	yes
yes	yes
no	no
no	no
yes	yes
yes	yes
no	no
no	no
no	no
yes	yes
yes	yes
yes	yes
no	no

rodents/shrews	Mastomys sp.	
rodents/shrews	Mastomys sp.	
rodents/shrews	Maxomys alticola	Maxomys alticola
rodents/shrews	Maxomys baeodon	Maxomys baeodon
rodents/shrews	Maxomys hellwaldii	Maxomys hellwaldii
rodents/shrews	Maxomys musschenbroekii	Maxomys musschenbroekii
rodents/shrews	Maxomys ochraceiventer	Maxomys ochraceiventer
rodents/shrews	, Maxomys rajah	Maxomys rajah
	a.re.rrye regen	a
rodents/shrews	Maxomys rajah	Maxomys rajah
rodents/shrews	Maxomys rajah	Maxomys rajah
rodents/shrews	Maxomys rajah	Maxomys rajah
rodents/shrews	Maxomys sp.	
rodents/shrews	Maxomys surifer	Maxomys surifer
,	,	,
rodents/shrews	Maxomys surifer	Maxomys surifer
rodents/shrews	Maxomys surifer	Maxomys surifer
rodents/shrews	Maxomys surifer	Maxomys surifer
rodents/shrews	Maxomys surifer	Maxomys surifer
rodents/shrews	Maxomys surifer	Maxomys surifer
rodents/shrews	Maxomys surifer	Maxomys surifer
rodents/shrews	Maxomys surifer	Maxomys surifer
rodents/shrews	Maxomys whiteheadi	Maxomys whiteheadi
	Name of the base of	Na
rodents/shrews	Maxomys whiteheadi	Maxomys whiteheadi
rodents/shrews	Maxomys whiteheadi	Maxomys whiteheadi
rodents/shrews	Maxomys whiteheadi	Maxomys whiteheadi
Toueitts/sillews	Waxoniys Winterlead	Wiaxomys writteneau
rodents/shrews	Maxomys whiteheadi	Maxomys whiteheadi
rodents/shrews	Maxomys whiteheadi	Maxomys whiteheadi
rodents/shrews	Menetes berdmorei	Menetes berdmorei
rodents/shrews	Meriones sp.	
rodents/shrews	Micromys minutus	Micromys minutus
rodents/shrews	Muridae sp.	
rodents/shrews	Mus (Nannomys) sp.	
rodents/shrews	Mus (Nannomys) sp.	
rodents/shrews	Mus (Nannomys) sp.	
rodents/shrews	Mus caroli	Mus caroli
rodents/shrews	Mus caroli	Mus caroli
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Mastomys	Ghana	no	144
Mastomys	Guinea	no	12
Mastomys	Ivory Coast	no	35
Mastomys	Sierra Leone	no	57
Mastomys	South Sudan	no	6
Mastomys	Tanzania	no	7
Maxomys alticola	Malaysia, Sabah	no	4
Maxomys baeodon	Malaysia, Sabah	no	9
Maxomys hellwaldii	Indonesia	no	3
Maxomys musschenbroekii	Indonesia	no	5
Maxomys ochraceiventer	Malaysia, Sabah	no	4
Maxomys rajah	Malaysia, Peninsular	no	1
		barcoded, species	
Maxomys rajah	Malaysia, Peninsular	updated	4
Maxomys rajah	Malaysia, Sabah	no	2
Maxomys rajah	Thailand	no	2
Maxomys	Indonesia	no	53
Maxomys surifer	Cambodia	no	11
		barcoded, matched	
Maxomys surifer	Malaysia, Peninsular	field ID	1
Maxomys surifer	Malaysia, Peninsular	no	2
		barcoded, species	
Maxomys surifer	Malaysia, Sabah	updated	4
Maxomys surifer	Malaysia, Sabah	no	12
		barcoded, matched	
Maxomys surifer	Malaysia, Sabah	field ID	11
Maxomys surifer	Thailand	no	11
		barcoded, matched	
Maxomys surifer	Thailand	field ID	6
		barcoded, species	
Maxomys whiteheadi	Malaysia, Peninsular	updated	3
		barcoded, matched	
Maxomys whiteheadi	Malaysia, Peninsular	field ID	17
Maxomys whiteheadi	Malaysia, Peninsular	no	13
		barcoded, matched	
Maxomys whiteheadi	Malaysia, Sabah	field ID	22
		barcoded, species	
Maxomys whiteheadi	Malaysia, Sabah	updated	12
Maxomys whiteheadi	Malaysia, Sabah	no	20
Menetes berdmorei	Lao PDR	no	26
Meriones	South Sudan	no	2
Micromys minutus	China	no	1
Muridae	Sierra Leone	no	1
Mus (Nannomys)	Cameroon	no	34
Mus (Nannomys)	Ghana	no	1
Mus (Nannomys)	Sierra Leone	no	1
Mus caroli	Cambodia	no	7
Mus caroli	China	no	5

no	no
no	no
yes	yes
yes	yes
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no	no
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yes	yes
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yes	yes
no	no
yes	yes
yes	yes

rodents/shrews	Mus caroli	Mus caroli
rodents/shrews	Mus cervicolor	Mus cervicolor
rodents/shrews	Mus cervicolor	Mus cervicolor
rodents/shrews	Mus cookii	Mus cookii
rodents/shrews	Mus minutoides	Mus minutoides
rodents/shrews	Mus musculus	Mus musculus
rodents/shrews	Mus musculus	Mus musculus
rodents/shrews	Mus musculus	Mus musculus
rodents/shrews	Mus musculus	Mus musculus
rodents/shrews	Mus musculus	Mus musculus
rodents/shrews	Mus musculus	Mus musculus
rodents/shrews	Mus musculus	Mus musculus
rodents/shrews	Mus musculus	Mus musculus
rodents/shrews	Mus musculus	Mus musculus
rodents/shrews	Mus musculus	Mus musculus
rodents/shrews	Mus musculus	Mus musculus
rodents, sin ews	ivids mascards	ivids iridscalds
rodents/shrews	Mus musculus	Mus musculus
rodents/shrews	Mus pahari	Mus pahari
rodents/shrews	Mus platythrix	Mus platythrix
rodents/shrews	Mus setulosus	Mus setulosus
rodents/shrews	Mus setulosus	Mus setulosus
rodents/shrews	Mus setulosus	Mus setulosus
rodents/shrews	Mus sp.	
rodents/shrews	Myomyscus angolensis	Myomyscus angolensis
rodents/shrews	Myomyscus brockmani	Myomyscus brockmani
rodents/shrews	Myoxidae sp.	
rodents/shrews	Nannomys munitoides	
rodents/shrews	Nannomys setulosus	
rodents/shrews	Niviventer cameroni	Niviventer cameroni
rodents/shrews	Niviventer cremoriventer	Niviventer cremoriventer
rodents/shrews	Niviventer cremoriventer	Niviventer cremoriventer
rodents/shrews	Niviventer cremoriventer	Niviventer cremoriventer
rodents/shrews	Niviventer cremoriventer	Niviventer cremoriventer

Mus caroli	Thailand	barcoded, species updated	4
Mus cervicolor	Cambodia	no	21
Mus cervicolor	Thailand	barcoded, species updated	2
Mus cookii	Thailand	barcoded, species updated	2
Mus minutoides	Republic of Congo	no	17
Mus musculus	Bangladesh	no	238
Mus musculus	Cambodia	no	1
Mus musculus	Cameroon	no	137
Mus musculus	China	no	5
Mus musculus	Ghana	no	14
Mus musculus	Guinea	no	1
Mus musculus	Malaysia, Peninsular	no	1
Mus musculus	Nepal	no	17
Mus musculus	Senegal	no	183
Mus musculus	Sierra Leone	barcoded, matched field ID	11
Mus musculus	Sierra Leone	no	51
		barcoded, species	
Mus musculus	Sierra Leone	updated	1
Mus pahari	China	no	1
Mus platythrix	Nepal	no	1
Mus setulosus	Cameroon	no	550
Mus setulosus	Guinea	no	1
Mus setulosus	Sierra Leone	no	3
Mus	Cameroon	no	10
Mus	Guinea	no	91
Mus	Kenya	no	5
Mus	Myanmar	no	8
Mus	Nepal	no	24
Mus	Sierra Leone	no	1
Mus	Tanzania	no	20
Mus	Thailand	no	30
Myomyscus angolensis	DR Congo	no	1
Myomyscus brockmani	Kenya	no	1
Myoxidae	Tanzania	no	3
	Republic of Congo	no	1
	Republic of Congo	no	1
Niviventer cameroni	Malaysia, Peninsular	no	1
Niviventer cremoriventer	Malaysia, Peninsular	barcoded, species updated	1
Niviventer cremoriventer	Malaysia, Peninsular	barcoded, matched field ID	1
Niviventer cremoriventer	Malaysia, Peninsular	no	9
Niviventer cremoriventer	Malaysia, Sabah	barcoded, species updated	16

yes	yes
yes	yes
yes	yes
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yes	yes
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yes	yes
no	no
yes	yes
yes	yes
no	no
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yes	yes
VAS	VAS
yes	yes
yes	yes
yes	yes
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rodents/shrews	Niviventer cremoriventer	Niviventer cremoriventer
rodents/shrews	Niviventer cremoriventer	Niviventer cremoriventer
rodents/shrews	Niviventer fulvescens	Niviventer fulvescens
rodents/shrews	Niviventer fulvescens	Niviventer fulvescens
rodents/shrews	Niviventer fulvescens	Niviventer fulvescens
rodents/shrews	Niviventer fulvescens	Niviventer fulvescens
rodents/shrews	Niviventer rapit	Niviventer rapit
rodents/shrews	Niviventer sp.	
rodents/shrews	Niviventer sp.	
rodents/shrews	Niviventer sp.	
rodents/shrews	Oenomys hypoxanthus	Oenomys hypoxanthus
rodents/shrews	Oenomys hypoxanthus	Oenomys hypoxanthus
rodents/shrews	Otomys sp.	
rodents/shrews	Paracrocidura schoutedeni	Paracrocidura schoutedeni
rodents/shrews	Paruromys dominator	Paruromys dominator
rodents/shrews	Pelomys sp.	
rodents/shrews	Pelomys sp.	
rodents/shrews	Petaurillus hosei	Petaurillus hosei
rodents/shrews	Petaurista philippensis	Petaurista philippensis
rodents/shrews	Praomys daltoni	Praomys daltoni
rodents/shrews	Praomys jacksoni	Praomys jacksoni
rodents/shrews	Praomys jacksoni	Praomys jacksoni
rodents/shrews	Praomys misonnei	Praomys misonnei
rodents/shrews	Praomys misonnei	Praomys misonnei
rodents/shrews	Praomys misonnei	Praomys misonnei
rodents/shrews	Praomys rostratus	Praomys rostratus
rodents/shrews	Praomys sp.	
rodents/shrews	Praomys tullbergi	Praomys tullbergi
rodents/shrews	Prionomys batesi	Prionomys batesi
rodents/shrews	Prionomys batesi	Prionomys batesi
rodents/shrews	Protoxerus stangeri	Protoxerus stangeri
rodents/shrews	Rattus and amanensis	Rattus andamanensis
rodents/shrews	Rattus annandalei	Rattus annandalei
rodents/shrews	Rattus argentiventer	Rattus argentiventer
rodents/shrews	Rattus argentiventer	Rattus argentiventer
rodents/shrews	Rattus argentiventer	Rattus argentiventer
rodents/shrews	Rattus argentiventer	Rattus argentiventer
rodents/shrews	Rattus exulans	Rattus exulans

Niviventer cremoriventer	Malaysia, Sabah	barcoded, matched field ID	15
Niviventer cremoriventer	Malaysia, Sabah	no	19
Niviventer fulvescens	Cambodia	no	2
Niviventer fulvescens	China	no	20
Niviventer fulvescens	Malaysia, Peninsular	no	1
Nivivencer raivescens	ividiaysia, i elillisulai	barcoded, species	
Niviventer fulvescens	Thailand	updated	1
Niviventer rapit	Malaysia, Sabah	no	2
Niviventer	Cambodia	no	1
Niviventer	Malaysia, Peninsular	barcoded, species updated	6
Niviventer	Thailand	no	1
Oenomys hypoxanthus	Cameroon	no	14
Oenomys hypoxanthus	Republic of Congo	no	23
Otomys	Rwanda	no	2
Paracrocidura schoutedeni	DR Congo	no	5
Paruromys dominator	Indonesia	no	125
Pelomys	DR Congo	no	1
Pelomys	Tanzania	no	10
Petaurillus hosei	Malaysia, Sabah	no	1
Petaurista philippensis	Lao PDR	no	3
Praomys daltoni	Sierra Leone	no	1
Praomys jacksoni	Cameroon	no	57
Praomys jacksoni	Sierra Leone	no	1
Praomys misonnei	Cameroon	no	29
Praomys misonnei	Republic of Congo	no	10
Praomys misonnei	Sierra Leone	no	1
Praomys rostratus	DR Congo	no	14
Praomys	Cameroon	no	46
Praomys	DR Congo	no	76
Praomys	Ivory Coast	no	10
Praomys	Rwanda	no	1
Praomys	Sierra Leone	no	8
Praomys	South Sudan	no	4
Praomys	Tanzania	no	1
Praomys tullbergi	Tanzania	no	19
Prionomys batesi	DR Congo	no	5
Prionomys batesi	Ghana	no	5
Protoxerus stangeri	Cameroon	no	1
Rattus andamanensis	China	no	1
Rattus annandalei	Malaysia, Peninsular	no	1
Rattus argentiventer	Cambodia	no	720
Rattus argentiventer	Malaysia, Sabah	no	2
Rattus argentiventer	Thailand	barcoded, species updated	1
Rattus argentiventer	Vietnam	no	120
Rattus exulans	Cambodia	no	11

yes yes yes		
yes yes yes	VAS	VAS
yes yes yes		
yes yes yes		
yes yes yes yes yes yes no no no no no no yes yes yes		
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yes yes yes yes no yes	yes	yes
yes yes no no yes yes	yes	yes
no no yes yes	yes	yes
no no no no no no no no no no no no yes yes	yes	yes
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no no no no no no no no no no no no yes yes	no	no
no no yes yes	no	no
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no no yes	no	no
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yes yes yes yes	yes	yes
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yes yes		
	yes	yes
yes yes	yes	yes
	yes	yes

rodents/shrews	Rattus exulans	Rattus exulans
rodents/shrews	Rattus exulans	Rattus exulans
rodents/shrews	Rattus exulans	Rattus exulans
rodents/shrews	Rattus exulans	Rattus exulans
rodents/shrews	Rattus exulans	Rattus exulans
rodents/shrews	Rattus exulans	Rattus exulans
rodents/shrews	Rattus exulans	Rattus exulans
rodents/shrews	Rattus exulans	Rattus exulans
rodents/shrews	Rattus exulans	Rattus exulans
rodents/shrews	Rattus exulans	Rattus exulans
rodents/shrews	Rattus exulans	Rattus exulans
rodents/shrews	Rattus exulans	Rattus exulans
rodents/shrews	Rattus flavipectus	Nattus Cxuluiis
rodents/shrews	Rattus losea	Rattus Iosea
rodents/sinews	Mattus iosea	Nattus iosea
rodents/shrews	Rattus Iosea	Rattus losea
rodents/shrews	Rattus marmosurus	Rattus marmosurus
rodents/shrews	Rattus nitidus	Rattus nitidus
rodents/shrews	Rattus norvegicus	Rattus norvegicus
rodents/shrews	Rattus norvegicus	Rattus norvegicus
rodents/shrews	Rattus norvegicus	Rattus norvegicus
rodents/shrews	Rattus norvegicus	Rattus norvegicus
rodents/shrews	Rattus norvegicus	Rattus norvegicus
rodents/shrews	Rattus norvegicus	Rattus norvegicus
rodents/shrews	Rattus rattus	Rattus rattus
rodents/shrews	Rattus rattus	Rattus rattus
rodents/shrews	Rattus rattus	Rattus rattus
madants/shrous	Dottue rottue	Dottus rottus
rodents/shrews rodents/shrews	Rattus rattus Rattus rattus	Rattus rattus Rattus rattus
•	Rattus rattus	
rodents/shrews	Rattus rattus	Rattus rattus
rodents/shrews	Rattus rattus	Rattus rattus
rodents/shrews	Rattus rattus	Rattus rattus
rodents/shrews	Rattus rattus	Rattus rattus
rodents/shrews	Rattus rattus	Rattus rattus
rodents/shrews	Rattus rattus	Rattus rattus
rodents/shrews	Rattus rattus	Rattus rattus

Rattus exulans	Indonesia	barcoded, species updated	3
Rattus exulans	Indonesia	no	7
Rattus exulans	Lao PDR	no	308
Rattus exulans	Lao PDR	barcoded, matched field ID	6
Rattus exulans	Malaysia, Peninsular	barcoded, species updated	1
Rattus exulans	Malaysia, Sabah	barcoded, matched field ID	1
Rattus exulans	Malaysia, Sabah	no	7
Rattus exulans	Myanmar	barcoded, species updated	1
Rattus exulans	Thailand	barcoded, matched field ID	152
Rattus exulans	Thailand	no	89
Rattus exulans	Thailand	barcoded, species updated	23
Rattus exulans	Vietnam	no	30
	China	no	181
Rattus Iosea	Cambodia	no	4
Rattus Iosea	Thailand	barcoded, species updated	10
Nattus 103ea	Illalialia	barcoded, species	10
Rattus marmosurus	Indonesia	updated	4
Rattus nitidus	China	no	18
Rattus norvegicus	Cambodia	no	1
Rattus norvegicus	China	no	136
Rattus norvegicus	Lao PDR	no	2
Rattus norvegicus	Malaysia, Sabah	no	1
Rattus norvegicus	Myanmar	no	173
Rattus norvegicus	Vietnam	no	163
Rattus rattus	Bangladesh	no	324
Rattus rattus	Cambodia	no	1
Rattus rattus	Cameroon	no	87
Rattus rattus	Cameroon	barcoded, matched field ID	1
Rattus rattus	DR Congo	no	327
Rattus rattus	Guinea	no	3
Rattus rattus	Indonesia	barcoded, species updated	1
Rattus rattus	Ivory Coast	no	42
Rattus rattus	Malaysia, Peninsular	no	3
Rattus rattus	Malaysia, Sabah	barcoded, matched field ID	1
Rattus rattus	Malaysia, Sabah	barcoded, species updated	1
Rattus rattus	Malaysia, Sabah	no	9

yes	yes
yes	yes
yes	yes
yes	yes
yes	yes
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yes	yes
no	no
yes	yes
yes	yes
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yes	yes
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yes	yes
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rodents/shrews	Rattus rattus	Rattus rattus
rodents/shrews	Rattus rattus	Rattus rattus
rodents/shrews	Rattus rattus	Rattus rattus
rodents/shrews	Rattus rattus	Rattus rattus
rodents/shrews	Rattus rattus	Rattus rattus
rodents/sinews	Nattus rattus	Nattus fattus
rodents/shrews	Rattus rattus	Rattus rattus
rodents/shrews	Rattus rattus	Rattus rattus
rodents/shrews	Rattus rattus	Rattus rattus
rodents/shrews	Rattus rattus	Rattus rattus
na donto/shravvo	Dottus vottus	Dathus vattus
rodents/shrews	Rattus rattus	Rattus rattus
rodents/shrews	Rattus rattus	Rattus rattus
rodents/shrews	Rattus rattus hainanu	
rodents/shrews	Rattus sladeni	
rodents/shrews	Rattus sp.	
rodents/sinews	nattus sp.	
rodents/shrews	Rattus sp.	
rodents/shrews	Rattus sp.	
1	D. II.	B
rodents/shrews	Rattus tanezumi	Rattus tanezumi
rodents/shrews	Rattus tanezumi	Rattus tanezumi
rodents/shrews	Rattus tanezumi	Rattus tanezumi
rodents/shrews	Rattus tanezumi	Rattus tanezumi
radants/shrows	Pattus tanazumi	Pattus tanazumi
rodents/shrews	Rattus tanezumi	Rattus tanezumi
rodents/shrews	Rattus tanezumi	Rattus tanezumi
rodents/shrews	Rattus tanezumi	Rattus tanezumi
rodents/shrews	Rattus tanezumi	Rattus tanezumi
	Rattus tanezumi	Rattus tanezumi
rodents/shrews		
rodents/shrews	Rattus tanezumi	Rattus tanezumi
rodents/shrews	Rattus tiameniaus	Rattus tanezumi
rodents/shrews	Rattus tiomanicus	Rattus tiomanicus

Rattus rattus	Myanmar	no	293
Rattus rattus	Nepal	no	328
Rattus rattus	Republic of Congo	no	3
Rattus rattus	Rwanda	no	21
Rattus rattus	Senegal	no	58
Rattus rattus	Sierra Leone	barcoded, matched field ID	14
Rattus rattus	Sierra Leone	no	128
Rattus rattus	Sierra Leone	barcoded, species updated	4
Rattus rattus	Tanzania	no	9
Rattus rattus	Thailand	barcoded, species updated	1
Rattus rattus	Uganda	no	376
	China	no	11
	China	no	50
Rattus	Bangladesh	no	22
Rattus	Cambodia	no	18
Rattus	India	no	1
		barcoded, matched	
Rattus	Indonesia	field ID	18
Rattus	Indonesia	no	375
		barcoded, species	
Rattus	Malaysia, Sabah	updated	5
Rattus	Nepal	no	52
Rattus	Rwanda	no	278
Rattus	Thailand	no	7
		barcoded, species	
Rattus	Thailand	updated	5
Rattus	Vietnam	no	248
Rattus tanezumi	Indonesia	barcoded, species updated	1
Rattus tanezumi	Indonesia	no	17
Rattus tanezumi	Lao PDR	no	12
Rattus tanezumi	Malaysia, Sabah	barcoded, matched field ID	2
Rattus tanezumi	Malaysia, Sabah	barcoded, species updated	5
Rattus tanezumi	Malaysia, Sabah	no	11
Rattus tanezumi	Myanmar	barcoded, species updated	3
Rattus tanezumi	Thailand	barcoded, matched field ID	54
Rattus tanezumi	Thailand	barcoded, species updated	23
Rattus tanezumi	Thailand	no	52
Rattus tanezumi	Vietnam	no	19
Rattus tiomanicus	Malaysia, Peninsular	no	1

yes	yes
yes	yes
yes	yes
yes	yes
yes	yes
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yes	yes
yes	yes
no	no
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yes	yes
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yes	yes
yes	yes
yes	yes
yes	yes
yes	yes
yes	yes
yes	yes

rodents/shrews	Rattus tiomanicus	Rattus tiomanicus
rodents/shrews	Rattus xanthurus	Rattus xanthurus
rodents/shrews	Ratufa bicolor	Ratufa bicolor
rodents/shrews	Rhinosciurus laticaudatus	Rhinosciurus laticaudatus
rodents/shrews	Rhinosciurus laticaudatus	Rhinosciurus laticaudatus
rodents/shrews	Rhizomys pruinosus	Rhizomys pruinosus
rodents/shrews	Rhizomys sinensis	Rhizomys sinensis
rodents/shrews	Rhizomys sinensis	Rhizomys sinensis
rodents/shrews	Rhizomys sumatrensis	Rhizomys sumatrensis
rodents/shrews	Rodentia sp.	
rodents/shrews	Saccostomus mearnsi	Saccostomus mearnsi
rodents/shrews	Sciuridae sp.	
rodents/shrews	Soricidae sp.	
rodents/shrews	Soricidae sp.	
rodents/shrews	Steatomys sp.	
rodents/shrews	Stochomys longicaudatus	Stochomys longicaudatus
rodents/shrews	Stochomys longicaudatus	Stochomys longicaudatus
rodents/shrews	Stochomys longicaudatus	Stochomys longicaudatus
rodents/shrews	Suncus murinus	Suncus murinus
rodents/shrews	Suncus murinus	Suncus murinus
rodents/shrews	Suncus murinus	Suncus murinus
rodents/shrews	Suncus murinus	Suncus murinus
rodents/shrews	Suncus murinus	Suncus murinus
rodents/shrews	Suncus murinus	Suncus murinus
rodents/shrews	Suncus murinus	Suncus murinus
rodents/shrews	Suncus murinus	Suncus murinus
rodents/shrews	Sundamys muelleri	Sundamys muelleri
rodents/shrews	Sundamys muelleri	Sundamys muelleri
rodents/shrews	Sundamys muelleri	Sundamys muelleri
rodents/shrews	Sundamys muelleri	Sundamys muelleri
rodents/shrews	Sundamys muelleri	Sundamys muelleri
rodents/shrews	Sundasciurus hippurus	Sundasciurus hippurus
rodents/shrews	Sundasciurus Iowii	Sundasciurus Iowii

Rattus tiomanicus	Malaysia, Sabah	no	1
Rattus xanthurus			56
Ratufa bicolor	Vietnam	no	5
Rhinosciurus laticaudatus	Malaysia, Peninsular	no	1
Rhinosciurus laticaudatus	Malaysia, Sabah	no	1
Rhizomys pruinosus	Vietnam	no	346
Rhizomys sinensis	China	no	140
Rhizomys sinensis	Vietnam	no	1
Rhizomys sumatrensis	Malaysia, Peninsular	no	1
Rodentia	Cambodia	no	14
Rodentia	Cameroon	no	15
Rodentia	China	no	3
Rodentia	Ghana	no	5
Rodentia	Guinea	no	709
Rodentia	Indonesia	no	2
Rodentia	Ivory Coast	no	1
Rodentia	Liberia	no	27
Rodentia	Rwanda	no	4
Rodentia	South Sudan	no	21
Rodentia	Tanzania	no	2
Rodentia	Thailand	no	32
Saccostomus mearnsi	Kenya	no	6
Sciuridae	Vietnam	no	22
Soricidae	Cameroon	no	22
Soricidae	Senegal	no	23
Steatomys	DR Congo	no	1
Stochomys longicaudatus	Cameroon	no	7
Stochomys longicaudatus	DR Congo	no	1
Stochomys longicaudatus	Ghana	no	1
Suncus murinus	Bangladesh	no	230
Suncus murinus	Cambodia	no	18
Suncus murinus	China	no	3
Suncus murinus	India	no	6
Suncus murinus	Indonesia	no	1
Suncus murinus	Myanmar	barcoded, species updated	2
Suncus murinus	Myanmar	no	1
Suncus murinus	Nepal	no	307
Sundamys muelleri	Malaysia, Peninsular	no	1
Sundamys muelleri	Malaysia, Peninsular	barcoded, species updated	1
Sundamys muelleri	Malaysia, Sabah	no	31
Sundamys muelleri	Malaysia, Sabah	barcoded, matched field ID	33
Sundamys muelleri	Malaysia, Sabah	barcoded, species updated	30
Sundasciurus hippurus	Malaysia, Sabah	no	5
Sundasciurus lowii	Malaysia, Sabah	no	1

yes	yes
yes	yes
no	no
yes	yes
no	no
yes	yes
yes	yes
yes	yes
yes	yes
yes	yes
yes	yes
yes	yes
yes	yes

rodents/shrews	Sundasciurus Iowii	Sundasciurus lowii		
rodents/shrews	Sundasciurus Iowii	Sundasciurus lowii		
rodents/shrews	Sylvisorex sp.			
rodents/shrews	Taeromys celebensis	Taeromys celebensis		
rodents/shrews	Taeromys celebensis	Taeromys celebensis		
rodents/shrews	Taeromys sp.	racionitys eclebensis		
rodents/shrews	Tamiops maritimus	Tamiops maritimus		
rodents/shrews	Tamiops rodolphii	Tamiops rodolphii		
rodents/shrews	Tatera indica	Tatera indica		
rodents/shrews	Tatera leucogaster	Gerbilliscus leucogaster		
rodents/shrews	Taterillus sp.	Gerbiniseus leucogastei		
rodents/shrews	Thamnomys venustus	Thamnomys venustus		
rodents/shrews	Thecurus crassispinis	Thanholliya venuatua		
rodents/shrews	Thryonomys swinderianus	Thryonomys swinderianus		
rodents/shrews	Thryonomys swinderianus	Thryonomys swinderianus		
rodents/shrews	Trichys fasciculata	Trichys fasciculata		
rodents/shrews	Tupaia belangeri	Tupaia belangeri		
rodents/shrews	Tupaia belangeri			
*		Tupaia belangeri		
rodents/shrews	Tupaia langinas	Tupaia langinas		
rodents/shrews	Tupaia longipes	Tupaia longipes		
rodents/shrews	Tupaia longipes	Tupaia longipes		
rodents/shrews	Tupaia tana	Tupaia tana		
rodents/shrews	Uropsilus gracilis	Uropsilus gracilis		
rodents/shrews	Vandeleuria oleracea	Vandeleuria oleracea		
swine	Sus scrofa domesticus			
swine	Sus scrofa domesticus			
swine	Sus scrofa domesticus			
swine	Sus scrofa domesticus			
swine	Sus scrofa domesticus			
swine	Sus scrofa domesticus			
swine	Sus scrofa domesticus			
swine	Sus scrofa domesticus			
ungulates	Cephalophus callipygus	Cephalophus callipygus		
ungulates	Cephalophus dorsalis	Cephalophus dorsalis		
ungulates	Cephalophus monticola	Philantomba monticola		
ungulates	Muntiacus muntjak	Muntiacus muntjak		
ungulates	Potamochoerus porcus	Potamochoerus porcus		
ungulates	Sus barbatus	Sus barbatus		
ungulates	Sus scrofa	Sus scrofa		
ungulates	Sus scrofa	Sus scrofa		
ungulates	Tragulus javanicus	Tragulus javanicus		

Sundasciurus lowii	Malaysia, Sabah	barcoded, matched field ID	5
Sundasciurus lowii	Malaysia, Sabah	barcoded, species updated	9
Sylvisorex	Cameroon	no	53
Taeromys celebensis	Indonesia	barcoded, species updated	1
Taeromys celebensis	Indonesia	no	18
Taeromys	Indonesia	no	2
Tamiops maritimus	Lao PDR	no	2
Tamiops rodolphii	Lao PDR	no	1
Tatera indica	India	no	1
Tatera leucogaster	DR Congo	no	5
Taterillus	DR Congo	no	1
Thamnomys venustus	Ghana	no	1
	Malaysia, Sabah	no	2
Thryonomys swinderianus	Cameroon	no	116
Thryonomys swinderianus	DR Congo	no	232
Trichys fasciculata	Malaysia, Sabah	no	1
Tupaia belangeri	Cambodia	no	4
Tupaia belangeri	China	no	13
Tupaia glis	Malaysia, Sabah	no	14
Tupaia longipes	Malaysia, Sabah	no	1
	,	barcoded, species	
Tupaia longipes	Malaysia, Sabah	updated	9
Tupaia tana	Malaysia, Sabah	no	12
Uropsilus gracilis	China	no	5
Vandeleuria oleracea	Nepal	no	35
Sus scrofa scrofa	Cambodia	no	236
Sus scrofa scrofa	DR Congo	no	1
Sus scrofa scrofa	Guinea	no	8
Sus scrofa scrofa	Lao PDR	no	113
Sus scrofa scrofa	Malaysia, Peninsular	no	4
Sus scrofa scrofa	Myanmar	no	64
Sus scrofa scrofa	Sierra Leone	no	1000
Sus scrofa scrofa	Vietnam	no	185
Cephalophus callipygus	Cameroon	no	3
Cephalophus dorsalis	Cameroon	no	11
Philantomba monticola	Cameroon	no	6
Muntiacus muntjak	Malaysia, Peninsular	no	4
Potamochoerus porcus	Cameroon	no	1
Sus barbatus	Malaysia, Sabah	no	1
Sus scrofa	Malaysia, Peninsular	no	8
Sus scrofa	Vietnam	no	6
Tragulus javanicus	Malaysia, Sabah	barcoded, species updated	1

yes	yes
yes	yes
no	no
yes	yes
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no	no
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no	no
yes	yes
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yes	yes
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yes yes yes no	yes yes yes no
yes yes yes no no	yes yes yes no no
yes yes yes no no	yes yes yes no no
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yes yes yes no yes yes yes yes yes yes	yes yes yes no yes yes yes yes yes yes yes

"Peter Daszak" <daszak@ecohealthalliance.org> From: 02/25/2019 1:03:23 PM (-08:00) Sent: To:

"Woutrina A Smith" < wasmith@ucdavis.edu>; "Matthew Blake" < mblake@ucdavis.edu>

"Catherine Machalaba" <machalaba@ecohealthalliance.org>; "Molly Turner" Cc: <turner@ecohealthalliance.org>; "Evelyn Luciano" <luciano@ecohealthalliance.org>; "William B. Karesh"

<karesh@ecohealthalliance.org>; "Kevin Olival" <olival@ecohealthalliance.org>; "Jon Epstein"

<pstein@ecohealthalliance.org>; "Jonna Mazet" <jkmazet@ucdavis.edu>; "Kirsten Gilardi" <kvgilardi@ucdavis.edu>;

"Christine Kreuder Johnson" <ckjohnson@UCDAVIS.EDU>; "Brian H Bird" <bhbird@gmx.ucdavis.edu>; "Tracey

Goldstein" <tgoldstein@ucdavis.edu>; "Elizabeth Leasure" <ealeasure@UCDAVIS.EDU>; REDACTED

REDACTED "Brooke Genovese"

/ "Sanzero, George" <gsanzer@sandia.gov>; "Jutta Lehmer" <JLehmer@salud.unm.edu>; "Bruce Baird Struminger" <BStruminger@salud.unm.edu>; "McNeil, Carrie S." <csmcnei@sandia.gov>; "Sam Halabi" <sfh9@georgetown.edu>; "Costa, Cristiane" <co123@cumc.columbia.edu>; "Parish, Sarah A." <sp3546@cumc.columbia.edu>; "Hunt, Christine T." <ch3326@cumc.columbia.edu>; "sja2127@cumc.columbia.edu" <sja2127@cumc.columbia.edu>; "Wafaa M. El-Sadr" <wme1@cumc.columbia.edu>; "Jennifer K Lane" <jklane@ucdavis.edu>; "Terra Kelly" <trkelly@ucdavis.edu>; "Omar Romero-hernandez" <oromero@haas.berkeley.edu>; "Federico Castillo" <f.castillo@berkeley.edu>; "Emma Lane" <lane@ecohealthalliance.org>; "Alison Andre" <andre@ecohealthalliance.org>; "Nicole R Gardner" <nrgardner@ucdavis.edu>; "Amy Armistad" <AArmistad@salud.unm.edu>; "ElByers@salud.unm.edu" <ElByers@salud.unm.edu>; "mr84@columbia.edu" <mr84@columbia.edu>; "Dele Ogunseitan (UCI)" <oaogunse@uci.edu>; "David John Wolking" <djwolking@ucdavis.edu>; "kp2440@cumc.columbia.edu" <kp2440@cumc.columbia.edu>

Subject: EHA's 5 step program for organization building Attachments: EHA 5 steps to Organizational Independence.docx

Importance: High

Dear all,

Apologies for the delay - here's some text on our "5 steps to Organizational Independence". This came out of a program to build conservation and health capacity within countries and is behind the "Alliance" part of EcoHealth Alliance's name...

Hope it's helpful and I can give some examples if we have space...

Cheers,

Peter

Peter Daszak

President

EcoHealth Alliance 460 West 34th Street - 17th Floor New York, NY 10001

Tel. +1 212-380-4474

Website: www.ecohealthalliance.org

Twitter: @PeterDaszak

EcoHealth Alliance leads cutting-edge research into the critical connections between human and wildlife health and delicate ecosystems. With this science we develop solutions that prevent pandemics and promote conservation.

From: Woutrina A Smith [mailto:wasmith@ucdavis.edu]

Sent: Friday, February 22, 2019 12:32 PM

To: Matthew Blake

Cc: Peter Daszak; Catherine Machalaba; Molly Turner; Evelyn Luciano; William B. Karesh; Kevin Olival; Jon Epstein; Jonna Mazet; Kirsten Gilardi; Christine Kreuder Johnson; Brian H Bird; Tracey Goldstein; Elizabeth Leasure; REDACTED Brooke Genovese; Sanzero, George; Jutta Lehmer; Bruce Baird Struminger; McNeil, Carrie S.; Sam Halabi; Costa, Cristiane; Parish, Sarah A.; Hunt, Christine T.; sja2127@cumc.columbia.edu; Wafaa M. El-Sadr; Jennifer K Lane; Terra Kelly; Omar Romero-hernandez; Federico Castillo; Emma Lane; Alison Andre; Nicole R Gardner; Amy Armistad; ElByers@salud.unm.edu; mr84@columbia.edu; Dele Ogunseitan (UCI); David John Wolking; kp2440@cumc.columbia.edu Subject: OHW-NG tech narrative and scheduling

HI OHW-NG Team,

1. Call scheduling - For this coming week, here are the usual zoom call days/times along with the same zoom call info.

Zoom Meeting link: REDACTED

Or dial by your location:

REDACTED US (San Jose)
US (New York)

Meeting ID: REDACTED

Wednesday, February 27, 8-9am PST = 11am-12pm EST - Overview updates and Obj 1 & 2 focus for discussion.

Thursday, February 28, 9-10am PST = 12-1pm EST - Overview updates and Objective 3 focus for discussion.

- **2. Writing workshop** optional, UCD will host, please share with Woutrina and Matt your interest and availability for March 4 and 5 or March 5 and 6. Others can join via zoom for parts of the workshop. A final decision on dates will be made on Monday, Feb 25 COB based on shared schedules.
- 3. Proposal planning the technical narrative draft with writing assignments is attached. Please review this for places where you or your organization are named with a writing assignment. If you are listed, please confirm with me that you have time to do drafting of text in the coming week, with a goal to share initial drafts of your sections at whatever stage they are at by Monday, March 4, to make the most of the writing workshop time. If more than one person is listed, please coordinate with the others listed so that drafting of text can be started and coordinated. If you don't have time to participate in the initial drafting of text, please let me know that too so we can ask someone else to step up for the initial drafting. You can share your section drafts on box in the 'Writing Workshop 2019' folder within our OHW-NG folder.

Best wishes, Woutrina

Woutrina Smith, DVM, MPVM, PhD
Professor of Infectious Disease Epidemiology
Co-Director, UCGHI Planetary Health Center of Expertise
USAID PREDICT-2 Global Capacity Team and Ethiopia lead
UCD Vet Med: One Health Institute
1042 VM3B Building
1089 Veterinary Medicine Dr
Davis, CA 95616 USA

wasmith@ucdavis.edu

+1 530 219-1369

EcoHealth Alliance 5 steps to Organizational Independence

EcoHealth Alliance (EHA) was founded by the merger of two organizations – Wildlife Trust and the Consortium for Conservation Medicine. The "Alliance" part of EHA's name comes from a program set up to build independent functioning institutions in developing countries. The goals are to build One Health capacity in-country by identifying and supporting academic and other partners, helping them register as legal entities, then helping them raise funds locally and internationally to sustain their work. Each partner signs on to Terms of Reference that detail the relationship to EHA, benefits of membership, and core principles of One Health partners (listed at https://www.ecohealthalliance.org/partners). Each partner moves through a 5-step process designed to build their capacity from collaboration among a group of individual partners through to self-funded, sustainable organizations:

- 1. Identifying the collaborative network. In-country partners (individuals and organizations) are identified, met with and collaborative work begins under project-level MoUs and contracts with the international supporting organization (EHA). Funding from international sources and majority (~90%) of support from EHA.
- **2. Building organizational capacity.** MoUs are signed among organizations to represent the One Health agenda. A home office is identified and in-kind support and/or funding found from in-country agencies. Training is given on how to raise funds, design programs, conduct administrative activities, publish scientific and policy papers etc.
- **3.** Registering as a local, legal entity. Depending on in-country laws and practices, an organizational entity is designed, officers identified within the network's staff, and registration completed. Training in fiscal and staff management and administration is given.
- **4. Building a sustainable, funded program of work.** In-country funding sources are identified and an active campaign begins to raise financial support for One Health projects, organizational staff and unrestricted (bricks and mortar) support. Funding from the international supporting organization is reduced during this period to <50% of the total cost of operations.
- **5. Organizational independence.** Funding from in-country or regional sources is expanded to cover 50-70% of total cost of operations. Funding from international sources continues but with open competition for resources among other in-country organizations.

"Elizabeth Leasure" <ealeasure@UCDAVIS.EDU> From:

06/10/2019 11:22:17 AM (-07:00) Sent:

"Molly Turner" < turner@ecohealthalliance.org> To:

"William B. Karesh" <karesh@ecohealthalliance.org>; "Peter Daszak" Cc: <daszak@ecohealthalliance.org>; "Jon Epstein" <epstein@ecohealthalliance.org>; "Evelyn Luciano" <luciano@ecohealthalliance.org>; "Jonna Mazet" <jkmazet@ucdavis.edu>; "Tracey Goldstein"

<tgoldstein@ucdavis.edu>; "Christine Kreuder Johnson" <ckjohnson@UCDAVIS.EDU>; "David John Wolking"

<djwolking@ucdavis.edu>

Subject: RE: Schedule meeting to discuss China, Egypt, Jordan, India, Bangladesh spending

Hi Molly. Let's just use the same Zoom link that we use for SMT.

Zoom Call-in info

REDACTED Zoom link:

Or iPhone one-tap:

REDACTED US:

Or Telephone:

Dial(for higher quality, dial a number based on your current location):

REDACTED US:

Meeting ID: REDACTED

REDACTED International numbers available:

Elizabeth Leasure

Financial Operations Manager

One Health Institute

REDACTED (cell)

530-754-9034 (office) Skype: ealeasure

From: Molly Turner <turner@ecohealthalliance.org>

Sent: Monday, June 10, 2019 11:05 AM

To: Elizabeth Leasure <ealeasure@UCDAVIS.EDU>

Cc: William B. Karesh karesh@ecohealthalliance.org; Peter Daszak karesh@ecohealthalliance.org; Jon Epstein <epstein@ecohealthalliance.org>; Evelyn Luciano <luciano@ecohealthalliance.org>; Jonna Mazet

<jkmazet@ucdavis.edu>; Tracey Goldstein <tgoldstein@ucdavis.edu>; Christine Kreuder Johnson

<ckjohnson@UCDAVIS.EDU>; David John Wolking <djwolking@ucdavis.edu>

Subject: Re: Schedule meeting to discuss China, Egypt, Jordan, India, Bangladesh spending

Hi Liz,

3 pm on Thursday will work for Peter, Evelyn, and myself.

At what number should we reach you?

Molly

On Mon, Jun 10, 2019 at 12:36 PM Elizabeth Leasure <ealeasure@ucdavis.edu> wrote:

Thanks, Billy and Jon. Unfortunately, this call is too time sensitive to be scheduled any later than Thursday, and between 3 and 5 pm EDT is our only window. We'll have to proceed without you. The topics to be covered are below. Let me know if you have any questions, and please confirm what time between 3 and 5 pm EDT works best for you all.

- We have been advised by USAID that there will be no more funds obligated for China at this time. State approval is required to obligate funds for China, and that approval has not been obtained.
- Based on recent conversations with USAID, our previous ability to move funds between country budgets is apparently being eliminated. As such, overspending of country budgets is now a problem. We will discuss with USAID on our SMT call on Tuesday for further clarity.
- Why are the China, Egypt, and Jordan budgets so overspent? Even with pending obligations factored in, Egypt is \$50K over budget and Jordan \$260K over budget as of July 1 (based on recent May and June projections received). China's budget would have been nearly zeroed out if the remaining Y5 funds budgeted were obligated, but there will be a \$391K overage in China as of July 1 now that no additional China funds are forthcoming.
- Why are the Global administrative management budgets overspent? As of July 1, the projected overage is \$121K.
- What are spending plans for India and Bangladesh through the end of the project? Can you clarify how many samples are remaining to be tested for Bangladesh?

Thanks, Liz

Elizabeth Leasure Financial Operations Manager One Health Institute

REDACTED (cell) 530-754-9034 (office) Skype: ealeasure

From: William B. Karesh < karesh@ecohealthalliance.org >

Sent: Wednesday, June 5, 2019 1:47 PM

To: Elizabeth Leasure < <u>ealeasure@UCDAVIS.EDU</u>>

Cc: Peter Daszak daszak@ecohealthalliance.org; Jon Epstein epstein@ecohealthalliance.org; Evelyn Luciano

<<u>luciano@ecohealthalliance.org</u>>; Molly Turner <<u>turner@ecohealthalliance.org</u>>; Jonna Mazet <<u>ikmazet@ucdavis.edu</u>>; Tracey Goldstein <<u>tgoldstein@ucdavis.edu</u>>; Christine Kreuder Johnson

Nimazet@dcdavis.edd/, Tracey Goldstelli \tagoldstelli@dcdavis.edd/, Christille Rieddel Johnst

<<u>ckjohnson@UCDAVIS.EDU</u>>; David John Wolking <<u>djwolking@ucdavis.edu</u>>

Subject: Re: Schedule meeting to discuss China, Egypt, Jordan, India, Bangladesh spending

Thanks Liz,

I'll be in Asia and the timing will be from 2:00 AM to 4:00 AM.

Could you just send the key points or questions and we can get back to you via email or be more prepared for the call.

Of course, I could be wide awake and happy to call in to fill the darkness.

BK

On Jun 5, 2019, at 2:57 PM, Elizabeth Leasure <ealeasure@UCDAVIS.EDU> wrote:

Hi everyone. Can you all please confirm your availability for a meeting on Thursday, June 13th between 3 and 5 pm EDT (12-2 pm PDT) to discuss spending in the countries noted above and recent developments with the pending Y5 funding obligation? I anticipate only needing one hour, so please let me know your preferred times within the window provided. If you would like to have your country liaisons also join the call, that is up to your discretion. Please provide a response by COB this Friday or sooner.

Thanks!

Liz

Elizabeth Leasure
Financial Operations Manager
One Health Institute
REDACTED (cell)

530-754-9034 (office) Skype: ealeasure

Molly Turner

PREDICT Operations Manager for EHA EcoHealth Alliance Operations

EcoHealth Alliance 460 West 34th Street, Suite 1701 New York, NY 10001

1.212.380.4461 (office)

REDACTED (mobile)

www.ecohealthalliance.org

EcoHealth Alliance leads cutting-edge scientific research into the critical connections between human and wildlife health and delicate ecosystems. With this science, we develop solutions that prevent pandemics and promote conservation.

From: "Wang Linfa" REDACTED

Sent: 07/30/2019 9:39:15 AM (-07:00)

To: "Tracey Goldstein" <tgoldstein@ucdavis.edu>
Cc: "Jonna Mazet" <jkmazet@ucdavis.edu>

Subject: Thanks again

Dear Tracey,

Thanks again for hosting my visit, it's short but very productive. I was impressed that there were so many attendees (the dean included!) considering it is during a summer break!

The following are three papers with Osburn which changed my career!

Wang, L.-F., Doi, R.H., Osburn, B.I., and Chuang, R.Y. (1989). Complete sequence of the NS1 gene (M6 RNA) of US bluetongue virus serotype 17. **Nucl. Acids Res. 17:** 8002.

Wang, L.-F., Doi, R.H., Chuang, L., Osburn, B.I., Maisonnave, J., Benjamini, E., and Chuang, R.Y. (1989). Bluetongue virus-17 fusion protein NS1 expressed in *Escherichia coli* by pUC vectors. **Biochem. Biophys. Res. Commun. 162:** 892-899.

He, X.S., Wang, L.-F., Doi, R.H., Maia, M., Osburn, B.I., and Chuang, R.Y. (1991) Expression of a full-length nonstructural protein NS1 of bluetongue virus serotype 17 in *Escherichia coli*. **Biochem. Biophys. Res.** Commun. 180: 994-1001.

Cheers,

LF

Linfa (Lin-Fa) WANG, PhD FTSE
Professor & Director
Programme in Emerging Infectious Disease

Tel: REDACTED

Important: This email is confidential and may be privileged. If you are not the intended recipient, please delete it and notify us immediately; you should not copy or use it for any purpose, nor disclose its contents to any other person. Thank you.

From: predict-coordinators-request@ucdavis.edu on behalf of "William B. Karesh"

<karesh@ecohealthalliance.org>

Sent: 08/08/2019 2:05:27 PM (-07:00)

To: "Benard Ssebide" REDACTED

Cc: "David J Wolking" <djwolking@ucdavis.edu>; "PREDICT CCs" predictcoordinators@ucdavis.edu>; "Catherine Machalaba" <machalaba@ecohealthalliance.org>

Subject: Re: [predict-coordinators] CITES CoP18 Agenda Item 56 - Emergency Diagnostic Specimens -

National Outreach

Thanks Benard!!

Billy

Sent from my iPhone

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

EcoHealth Alliance

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President, OIE Working Group on Wildlife

Co-chair, IUCN Species Survival Commission - Wildlife Health Specialist Group

EPT Partners Liaison, USAID Emerging Pandemic Threats - PREDICT-2 Program

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On Aug 8, 2019, at 12:01 PM, Benard Ssebide

REDACTED wrote:

Dear David,

As a member of the IUCN SSC WHSG, I received this request earlier from the WHSG and I shared and talked to both the CITES Management Authority (Commissioner Wildlife Conservation at the Ministry of Tourism) and the CITES Scientific Authority (Director Conservation at Uganda Wildlife Authority) both of whom promised to consider supporting this resolution as they prepare the country position on this and other proposals. Normally the country decides on these kinds of resolutions before hand and the delegates just take the country position to the meeting. In-country consultations on this and other proposals for the upcoming COP have been ongoing and we hope for a positive vote.

Thanks,

Dr Benard Jasper Ssebide

Country Head Veterinarian REDACTED

www.gorilladoctors.org Saving a Species One Gorilla at a Time

Uganda Country Coordinator

USAID Grantee | PREDICT-2 Project | Emerging Pandemic Threats (EPT) Program

Wildlife Department, College of Veterinary Medicine, Makerere University Campus



On Wed, Aug 7, 2019 at 12:13 AM David J Wolking < djwolking@ucdavis.edu > wrote: Hi PREDICT team,

At the request of our Consortium colleagues working hard on One Health and policy advocacy, please see the message below with regard to CITES and movement of specimens critical for emergency diagnostics. Your support is greatly appreciated.

Please let Catherine Machalaba (CC'd here) know if you have any questions.

Best,

David

Dear team,

Please find text below as background for global leads and country teams on the proposed CITIES resolution, which is also attached. We encourage teams to reach out to their CITES authorities to express support (it will also help reinforce that the country has wildlife health experts that can be consulted, which I think will be helpful for ensuring countries feel comfortable that they will be able to implement it). Thank you so much!!!!

CITES CoP18 Agenda Item 56 - Emergency Diagnostic Specimens - National Outreach

We are seeking your assistance in reaching out to help support a resolution that will be voted on at the next Convention on International Trade in Endangered Species of Wild Fauna and Flora (CITES) Convention of the Parties.

To promote timely international movement of emergency diagnostic specimens for investigation, a Resolution on "Simplified Procedures for Permits and Certificates" (working document 56) will be voted on at the 18th CITES Conference of the Parties, 17-28 August in Geneva, Switzerland (these are the new dates and venue after postponement of the May meeting in Sri Lanka).

Delays in the export and import of emergency diagnostic specimens from species of conservation concern have impeded effective investigation and control measures, including in recent large-scale die-offs affecting Saiga antelope populations, investigation of mortality events in marine mammals, etc.

The lack of clarity in the current regulations and processes under CITES contribute to unfortunate delays and consequences for already-threatened species and inadvertently imperil conservation and animal health efforts.

The Resolution proposes use of the OIE Reference Laboratory model, building on the existing OIE-CITES collaboration agreement and facilitating necessary expedited transfer of emergency diagnostic materials while ensuring conformity with OIE standards.

We kindly request you to consider contacting the CITES delegate in your country to encourage their vote in support of this resolution to help promote animal health and biodiversity worldwide.

Kind regards,
Catherine
Catherine Machalaba, MPH
Policy Advisor and Research Scientist

EcoHealth Alliance 460 West 34th Street – 17th floor New York, NY 10001

1.212.380.4472 (direct)
REDACTED mobile)
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Chair, Veterinary Public Health Special Primary Interest Group, American Public Health Association

Program Officer, IUCN SSC Wildlife Health Specialist Group

Science Officer, Future Earth oneHEALTH Project

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From: David J Wolking <djwolking@ucdavis.edu>

To: William B. Karesh karesh@ecohealthalliance.org
CC: David Wolking djwolking@ucdavis.edu; Jonna Mazet

<jkmazet@ucdavis.edu>;predict@ucdavis.edu>;Corina Grigorescu

Monagin <cgmonagin@ucdavis.edu>

Sent: 8/29/2019 9:49:42 AM

Subject: Re: Action required: moderators/leads for the closing session in Bali?

Haha good insight on the "terror". We'll work with the internal team options. Subhash is in touch with Katie and they are trying to make it work, we'll keep you and Ava posted. He's pretty casual with it so far (a quote from an email like "maybe I'll see you in Bali") but we're doing what we can.

David

On Thu, Aug 29, 2019 at 8:56 AM William B. Karesh < karesh@ecohealthalliance.org > wrote: PS, I would be terrified to have one of the advisors lead this discussion.

Also, Subhash now wants to attend. Not sure if we can make that happen at this late date.

BK

On Aug 28, 2019, at 5:46 PM, David J Wolking djwolking@ucdavis.edu wrote:

Hey Jonna and Billy,

We have this session on our Bali program "Celebrating PREDICT and what comes next" that closes out the entire meeting.

I'm not sure if Jonna is there for this one with travel for the DTRA Warsaw meeting. If that's the case, one idea was for

the external advisors to maybe lead this one, perhaps with members of the senior team that have been around for 10 years.

What are your thoughts and how do you want us to move forward with plans and prep?

Thanks!

David

REDACTED "DeBalogh, Katinka (FAORAP)" From: 10/09/2019 10:43:14 PM (-07:00) Sent: "Christel Smeys" <c.smeys@onehealthplatform.com> REDACTED To: REDACTED ; "John Mackenzie" REDACTED ; "Martyn Jeggo" REDACTED REDACTED "MARK RWEYEMAMU" < ; "Linfa Wang" REDACTED ; "Ottorino Cosivi" <cosivio@paho.org>; "Marietjie Venter" REDACTED ; "Peninah Munyua" <ikg2@cdc.gov>; "Rebecca Katz" <rk952@georgetown.edu>; "Larry REDACTED Madoff" REDACTED ; "Jakob Zinsstag" · ; "Bernadette Ramirez" ; "Tracey McNamara" <tmcnamara@westernu.edu>; "Jonna Mazet" <jkmazet@ucdavis.edu>; "William Karesh" <karesh@ecohealthalliance.org>; "Julie Fitzpatrick" REDACTED ; "Pip Beard" REDACTED ; "Joanne Sharp" · REDACTED ; "Mark Bronsvoort' REDACTED ; "Simon Girling" REDACTED ; "Sue Welburn" REDACTED "Grant Stentiford" REDACTED ; "Delia Grace" < REDACTED "Patrick Drury" REDACTED; "Ross Fitzgerald" < REDACTED ; "Greg Gray" <gregory.gray@duke.edu>; "Julianna B. Lenoch" <Julianna.b.lenoch@usda.gov>; "DJIKENG Appolinaire" < REDACTED ; "Richard REDACTED ; "Dilys Morgan" · REDACTED "Robert Clarke" REDACTED "Albert Osterhaus" ; "John Mackenzie" Cc: ; "c.vanlangendonck@onehealthplatform.org" <c.vanlangendonck@onehealthplatform.org>; "Neema Heri Mwakabonga" REDACTED ; "Lisa Boden" REDACTED Subject: RE: Invitation to TC meeting of the WOHC2020 Scientific Programme Committee

Thank you Christel for the invitation to the TC. On 4 November I will be in Malaysia organizing an event and therefore only confirm tentatively my participation.

Best regards

Katinka

Katinka de Balogh Senior Animal Health and Production Officer Regional Office for Asia and the Pacific Food and Agriculture Organization of the United Nations (FAO)



From: Christel Smey	rs < c.smeys@onehealth	platform.com>			
Sent: Wednesday, 9	October, 2019 23:12				
To: REDA	CTED John	Mackenzie	REDACTED	; Martyn Jeggo	
REDACTE	; MARK RWEYE	MAMU	REDACTED	→; Linfa Wa	ng
REDACTE	; Ottorino C	osivi <cosivio@< td=""><td>paho.org>; Marietjie</td><td>Venter REI</td><td>DACTED ;</td></cosivio@<>	paho.org>; Marietjie	Venter REI	DACTED ;
Peninah Munyua <ik< td=""><td>kg2@cdc.gov>; Rebecca</td><td>Katz <rk952@g< td=""><td>georgetown.edu>; Lai</td><td>rry Madoff R</td><td>EDACTED ;</td></rk952@g<></td></ik<>	kg2@cdc.gov>; Rebecca	Katz <rk952@g< td=""><td>georgetown.edu>; Lai</td><td>rry Madoff R</td><td>EDACTED ;</td></rk952@g<>	georgetown.edu>; Lai	rry Madoff R	EDACTED ;
Jakob Zinsstag	REDACTED	; Bernadette I	Ramirez REDAC	TED ; Tracey Mo	Namara
<tmcnamara@west< td=""><td>ernu.edu>; Jonna Maze</td><td>- COL</td><td>davis.edu>; William K</td><td>aresh <karesh@eco< td=""><td>healthalliance.org>;</td></karesh@eco<></td></tmcnamara@west<>	ernu.edu>; Jonna Maze	- COL	davis.edu>; William K	aresh <karesh@eco< td=""><td>healthalliance.org>;</td></karesh@eco<>	healthalliance.org>;
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Dilys Morgan	REDACTED	Robert Clarke	REDACTED		
Cc: Albert Osterhaus	REDACT	ED	; John Mackenzie ·	REDACTED	·;
	onehealthplatform.org	; Neema Heri M	wakabonga < R	EDACTED ; Li	sa Boden
< REDACTED	>		-		

Subject: Invitation to TC meeting of the WOHC2020 Scientific Programme Committee

Dear Scientific Programme Committee members

On behalf of Ab Osterhaus, chair of the Scientific Programme Committee of the 6th World One Health Congress, 14-18 June 2020 in Edinburgh, Scotland, I would like to invite you to the Scientific Programme Committee telephone conference meeting on Monday November 4, 2019 at 5 pm CET (Belgian time). The tollfree dial in details are enclosed below.

Preparations for the 6th World One Health Congress are well underway. We opened registrations and launched the call for abstracts in July and are now looking forward to shaping the programme of the One Health Science programme track. The aim of the meeting is to select the 14 session topics as well as appoint the abstract selectors.

We will provide you with a meeting agenda and relevant documents closer to the date. May I ask to confirm your participation at your earliest convenience? Many thanks in advance.

Kind regards

Christel #WOHC2020

WOHC2020 TC SPC committee Mon, Nov 4, 2019 5:00 PM - 6:00 PM CET

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Ireland: REDACTED

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Netherlands: REDACTED
New Zealand

Norway: REDACTED Spain: REDACTED

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Christel Smeys REDACTED

 $\underline{c.smeys@onehealthplatform.org}\\ \underline{www.onehealthplatform.org}$

ONE HEALTH PLATFORM

REDACTED



"Christel Smeys" <c.smeys@onehealthplatform.com> From: 10/15/2019 1:45:12 AM (-07:00) Sent: REDACTED ; "John Mackenzie" To: REDACTED ; "MARK RWEYEMAMU" REDACTED "Martyn Jeggo" · REDACTED ; "Linfa Wang" ; "Ottorino Cosivi" REDACTED REDACTED <cosivio@paho.org>; "Marietjie Venter" < ; "Peninah Munyua" <ikg2@cdc.gov>; "Rebecca Katz" <rk952@georgetown.edu>; "Larry Madoff" REDACTED ; "Jakob Zinsstag" REDACTED ; "Tracey McNamara" REDACTED "Bernadette Ramirez" <tmcnamara@westernu.edu>; "Jonna Mazet" <jkmazet@ucdavis.edu>; "William Karesh" <karesh@ecohealthalliance.org>; "Julie Fitzpatrick" ; "Pip Beard" REDACTED REDACTED REDACTED "Joanne Sharp" ; "Mark Bronsvoort" REDACTED REDACTED >; "Simon Girling" ; "Sue Welburn" REDACTED "Grant Stentiford" < REDACTED REDACTED ; "Delia Grace" "Patrick Drury" REDACTED "Ross Fitzgerald" REDACTED ; "Greg Gray" <gregory.gray@duke.edu>; "Katinka DeBalogh" REDACTED "Julianna B. Lenoch" <Julianna.b.lenoch@usda.gov>; "DJIKENG Appolinaire" >; "Richard Kock" REDACTED "Dilys Morgan" REDACTED REDACTED : "Robert Clarke" "Albert Osterhaus" < REDACTED Cc: "c.vanlangendonck@onehealthplatform.org" <c.vanlangendonck@onehealthplatform.org>; "Neema Heri Mwakabonga" REDACTED REDACTED : "Lisa Boden" Re: Invitation to TC meeting of the WOHC2020 Scientific Programme Committee Subject: Dear all I've sent out a calendar invitation to members who have (tentatively) confirmed participation in the call on November 4 at 5pm CET (Brussels time) as well as to those who haven't replied yet to the original TC invitation. Kind regards Christel #WOHC2020 > On 9 Oct 2019, at 18:12, Christel Smeys <c.smeys@onehealthplatform.org> wrote: > Dear Scientific Programme Committee members > On behalf of Ab Osterhaus, chair of the Scientific Programme Committee of the 6th World One Health Congress, 14-18 June 2020 in Edinburgh, Scotland, I would like to invite you to the Scientific Programme Committee telephone conference meeting on Monday November 4, 2019 at 5 pm CET (Belgian time). The toll-free dial in details are enclosed below. > Preparations for the 6th World One Health Congress are well underway. We opened registrations and launched the call for abstracts in July and are now looking forward to shaping the programme of the One Health Science programme track. The aim of the meeting is to select the 14 session topics as well as appoint the abstract selectors. > We will provide you with a meeting agenda and relevant documents closer to the date. May I ask to confirm your participation at your earliest convenience? Many thanks in advance. > Kind regards > Christel >#WOHC2020 > > WOHC2020 TC SPC committee > Mon, Nov 4, 2019 5:00 PM - 6:00 PM CET

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From: Woutrina A Smith <wasmith@ucdavis.edu>

To: Rabkin, Miriam <mr84@cumc.columbia.edu>;Oladele Ogunseitan

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CC: Jonna Mazet <i kmazet@ucdavis.edu>;Terra Kelly <trkelly@ucdavis.edu>;Tracey Goldstein

<tgoldstein@ucdavis.edu>

Sent: 11/21/2019 5:13:37 PM

Subject: OHW-NG Global Consortium Work Plan Timeline

Hi OHW-NG folks,

Here is an overview of work plan development tasks and timelines where you are all involved in some way.

- 1. Work plan main document that we will submit to USAID in mid-January:
- a. Global consortium activities green highlights Each objective lead needs to flesh out the work plan text for up to four global activities per objective. You should map out the tasks, events, personnel, and cost associated with a minimal and an optimal Year 1 scope/budget. This level of detail may be more than we can incorporate into the final workplan document that gets submitted to USAID but is important for internal planning and will help us to stay organized. As you get started organizing your thoughts, we can work together on helping to balance the contributions among global consortium partner organizations where relevant, and in light of budget available. We may have to prioritize activities for Year 1 and some events that may spill over into Year 2 based on budget and regional network bandwidth constraints. We are currently working on budget targets for each global consortium partner organization to keep in mind given the initial proposal we wrote and also the most recent USAID Year 1 guidance, I hope those budget numbers should be coming out by early next week so we can be realistic about what we can promise in the work plan to USAID. Better to underpromise and overdeliver in my opinion, especially given all the uncertainty in this new project and startup phase. We have 3-5 years to move the needle, our job this year is to get started and to set things up in a way that will build momentum for the regional networks. Objective lead draft text and budget options due to global consortium at onehealthnextgen@ucdavis.edu by Friday, December 13 for review and discussion the following week. Sooner is fine for it to be a more iterative process.

We can count on representatives from most countries engaging with these global activities on calls, etc. when we request it to get their input on development priorities, piloting, etc. Our initial guidance to the countries in SEAOHUN network was for the country to designate one full person or parts of multiple people in their country budget to participate across global level activities, this could include the three main objective as well as M&E reporting, etc., so it is still limited bandwidth from countries. These activities will be led led by the global consortium in Year 1 so that the countries can focus most of their country budgets on implementation on the ground for gray activities this year, many of these already in the planning phase. They are receiving a lower county funding targets than last year given our startup phase and funding uncertainty from USAID, but they also only have part of a year (OHW funded them for fall quarter) to conduct activities with the main window being Feb-Sept 2020. I am optimistic that their in country budgets will go up in later years.

b. Country level activities - gray highlight - SEAOHUN has their template and budget targets now and are working closely with Liz on how to put the forms together in line with their ideas. We will roll out the template and budget targets to OHCEA next week and they may pass them on to the countries next week or while we are together in Entebbe. No action need from global consortium members now. For global consortium organizations with country liaison roles (UCD, ICAP, EHA), please consider who you want to use for a part time position working with the in country teams on project coordination, linking to global level activities, etc, as this could be handled by a team member living in the country or one based in the US who travels periodically to the country. When ready we can discuss, finalize the plan, and make introductions to get things going.

- 2. **Appendices** draft text per assignments below due to <u>onehealthnextgen@ucdavis.edu</u> by **Wednesday**, **December 18**, for initial review and discussion.
- a. Implementation plan **Gantt chart** of activities Bridgette to create, working with Woutrina and objective leads.
- b. Budgets and supporting docs Liz Leasure point person, reaching out as needed.
- c. Knowledge management and learning plans Dele and Miriam leads, working with Woutrina.
- d. Transition plan for direct receipt of USAID funding Alex lead, working with Omar/Fede and Matt.
- e. **Business plan** Matt lead, working with Alex and Omar/Fede for brief overview appendix as placeholder since this is not actually required until the end of Year 1.
- f. MEL plan Corina point person, reaching out to others as needed.
- g. Gender action plan Ndola point person, working with others as needed.

OHW-NG YEAR 1 WORK PLAN

Instructions: Each Secretariat and country One Health University Network (OHUN) must complete the One Health Workforce – Next Generation (OHW-NG) Year 1 Work Plan template provided. All draft work plans and budgets are due to the Secretariat and prime on Monday, November 25, 2019 for first review, so that initial feedback can be provided by November 27, and workplans with budgets and budget narratives can be revised for next review by December 11, 2019. Final workplans will be packaged by mid-January, 2020 for submission to USAID.

The OHW-NG Work Plan is framed with three objectives: 1) Training and Empowerment, 2) Assessment and Tracking, and 3) Organizational Sustainability. Activities highlighted in the work plan template below in green are global/regional activities that all countries will participate in and benefit from as part of the regional networks. The prime and Secretariat will provide the detailed work plan descriptions and budget information for the green activities, so no information needs to be provided by country OHUNs at this time. Each OHUN should dedicate 1 person (or parts of multiple people) to be available for the global/regional planning and reporting activities.

Activities highlighted in gray are a menu of optional activities that countries may select from based on country priorities and anticipated funding available. Additional activities beyond those listed may be proposed as long as they are consistent with the Year 1 objectives and strategies; all newly proposed activities will be considered during work plan review. Please reflect on what the best activities were from the past that you want to continue, as well as proposing new activities that you think will be highly beneficial.

For each activity you want to propose, provide an activity description paragraph and then complete the associated activity details and budget details sections for the activity to the extent possible based on your current thinking and information available.

Activities must be completed by **September 30, 2020** for OHW-NG Year 1 Work Plan.

Work plan strategies are meant to align with Joint External Evaluation Second Edition (JEE 2.0) Technical Areas and Indicators and existing Global Health Security Agenda (GHSA) Action Packages. The JEE 2.0 tool can be accessed <u>at this link</u>. The prime can assist with completing JEE, GHSA, and MEL information as needed for work plan activities in Year 1.

OHW-NG YEAR 1 WORK PLAN TEMPLATE TO COMPLETE

NETWORK AND/OR COUNTRY:

OBJECTIVE 1: ONE HEALTH TRAINING AND EMPOWERMENT

JEE 2.0 Technical Area: Human Resources GHSA 2019 Action Package: Workforce Development

STRATEGY 1.1 One Health Content Curation and Development.

JEE 2.0 Indicators: D.4.1 An up to date multisectoral workforce strategy is in place

D.4.2 Human resources are available to effectively implement IHR

D.4.3 In-service trainings are available

D.4.4 FETP of other applied epidemiology training program is in place

GHSA Action Package: D.4.1 Human resources are available to implement IHR core capacity

requirements

Activity 1.1.1 Curate and update existing One Health competencies, learning objectives, evaluation tools, and training materials.

Activity 1.1.2 Develop new prioritized One Health curricula content to complement existing offerings.

STRATEGY 1.2 One Health Academy.

JEE 2.0 Indicators: D.4.1 An up to date multisectoral workforce strategy is in place

D.4.2 Human resources are available to effectively implement IHR

D.4.3 In-service trainings are available

D.4.4 FETP of other applied epidemiology training program is in place D.4.1 Human resources are available to implement IHR core capacity

requirements

Activity 1.2.1 Establish an open One Health Academy online structure to house existing and new One Health curricula.

Activity 1.2.2 Launch a regional community of practice for One Health faculty.

Activity 1.2.3 Support student One Health clubs to innovate and participate in the open One Health Academy.

Activity Description:

GHSA Action Package:

Activity Details:

Estimated Activity Date(s):

Lead & Participating Institutions:

Direct Beneficiaries (and MEL target #, if applicable – *with assistance from prime in* Y1):

Expected output and MEL indicator (*with assistance from prime in Y1*):

Long-term outcome/impact and MEL indicator (with assistance from prime in Y1):

Products/Deliverables (if applicable):

Budget Details:

Cost:

Location: (Venue, City, Country)

Total Number of Participants & Attendees (if applicable): (including support staff)

Duration/Number of Days (if applicable):

Travel and hosting needs: (e.g. flights, lodging, meals)

Supply and/or Service Needs: (e.g. translation services, supplies)

Activity 1.2.4 Conduct a competitive small grants program to support One Health research and training.

Activity Description:

Activity Details:

Estimated Activity Date(s):

Lead & Participating Institutions:

Direct Beneficiaries (and MEL target #, if applicable – *with assistance from prime in* Y1):

Expected output and MEL indicator (*with assistance from prime in Y1*):

Long-term outcome/impact and MEL indicator (with assistance from prime in Y1):

Products/Deliverables (if applicable):

Budget Details:

Cost:

Location: (Venue, City, Country)

Total Number of Participants & Attendees (if applicable): (including support staff)

Duration/Number of Days (if applicable):

Travel and hosting needs: (e.g. flights, lodging, meals)

Supply and/or Service Needs: (e.g. translation services, supplies)

STRATEGY 1.3 One Health Empowerment and Career Development.

JEE 2.0 Indicators: D.4.1 An up to date multisectoral workforce strategy is in place

D.4.2 Human resources are available to effectively implement IHR

D.4.3 In-service trainings are available

D.4.4 FETP of other applied epidemiology training program is in place

GHSA Action Package: D.4.1 Human resources are available to implement IHR core capacity

requirements

Justification:

Activity 1.3.1 Create a One Health certificate program to set standards for knowledge and skills that One Health practitioners need to have.

Activity Description:

Activity Details:

Estimated Activity Date(s):

Lead & Participating Institutions:

Direct Beneficiaries (and MEL target #, if applicable – with assistance from prime in Y1):

Expected output and MEL indicator (*with assistance from prime in Y1***):**

Long-term outcome/impact and MEL indicator (with assistance from prime in Y1): Products/Deliverables (if applicable):

Budget Details:

Cost:

Location: (Venue, City, Country)

Total Number of Participants & Attendees (if applicable): (including support staff)

Duration/Number of Days (if applicable):

Travel and hosting needs: (e.g. flights, lodging, meals)

Supply and/or Service Needs: (e.g. translation services, supplies)

Activity 1.3.2 Work with public and private partners to create training and job opportunities for One Health practitioners.

Activity Description:

Activity Details:

Estimated Activity Date(s):

Lead & Participating Institutions:

Direct Beneficiaries (and MEL target #, if applicable – *with assistance from prime in* Y1):

Expected output and MEL indicator (*with assistance from prime in Y1*):

Long-term outcome/impact and MEL indicator (with assistance from prime in Y1):

Products/Deliverables (if applicable):

Budget Details:

Cost:

Location: (Venue, City, Country)

Total Number of Participants & Attendees (if applicable): (including support staff)

Duration/Number of Days (if applicable):

Travel and hosting needs: (e.g. flights, lodging, meals)

Supply and/or Service Needs: (e.g. translation services, supplies)

STRATEGY 1.4 One Health Experiential Learning.

JEE 2.0 Indicators: D.4.1 An up to date multisectoral workforce strategy is in place

D.4.2 Human resources are available to effectively implement IHR

D.4.3 In-service trainings are available

D.4.4 FETP of other applied epidemiology training program is in place

GHSA Action Package: D.4.1 Human resources are available to implement IHR core capacity

requirements

Justification:

Activity 1.4.1 Conduct tabletop simulation exercises using One Health scenarios.

Activity Description:

Activity Details:

Estimated Activity Date(s):

Lead & Participating Institutions:

Direct Beneficiaries (and MEL target #, if applicable – *with assistance from prime in* Y1):

Expected output and MEL indicator (*with assistance from prime in Y1*):

Long-term outcome/impact and MEL indicator (with assistance from prime in Y1):

Products/Deliverables (if applicable):

Budget Details:

Cost:

Location: (Venue, City, Country)

Total Number of Participants & Attendees (if applicable): (including support staff)

Duration/Number of Days (if applicable):

Travel and hosting needs: (e.g. flights, lodging, meals)

Supply and/or Service Needs: (e.g. translation services, supplies)

Activity 1.4.2 Support workshop and short course opportunities for One Health experiential learning activities that are linked to core One Health competencies.

Activity Description:

Activity Details:

Estimated Activity Date(s):

Lead & Participating Institutions:

Direct Beneficiaries (and MEL target #, if applicable – *with assistance from prime in* Y1):

Expected output and MEL indicator (*with assistance from prime in Y1*):

 $\textbf{Long-term outcome/impact and MEL indicator} \ (\textit{with assistance from prime in Y1}):$

Products/Deliverables (if applicable):

Budget Details:

Cost:

Location: (Venue, City, Country)

Total Number of Participants & Attendees (if applicable): (including support staff)

Duration/Number of Days (if applicable):

Travel and hosting needs: (e.g. flights, lodging, meals)

Supply and/or Service Needs: (e.g. translation services, supplies)

STRATEGY 1.5 One Health Policy Engagement.

JEE 2.0 Indicators: D.4.1 An up to date multisectoral workforce strategy is in place

D.4.2 Human resources are available to effectively implement IHR

D.4.3 In-service trainings are available

D.4.4 FETP of other applied epidemiology training program is in place

GHSA Action Package: D.4.1 Human resources are available to implement IHR core capacity

requirements

Justification:

Activity 1.5.1 Provide training on advocacy and writing policy briefs to empower One Health practitioners in leadership roles.

Activity Description:

Activity Details:

Estimated Activity Date(s):

Lead & Participating Institutions:

Direct Beneficiaries (and MEL target #, if applicable – *with assistance from prime in* Y1):

Expected output and MEL indicator (*with assistance from prime in* Y1):

Long-term outcome/impact and MEL indicator (with assistance from prime in Y1):

Products/Deliverables (if applicable):

Budget Details:

Cost:

Location: (Venue, City, Country)

Total Number of Participants & Attendees (if applicable): (including support staff)

Duration/Number of Days (if applicable):

Travel and hosting needs: (e.g. flights, lodging, meals)

Supply and/or Service Needs: (e.g. translation services, supplies)

Activity 1.5.2 Support One Health fellows for internships with government and international policy-making organizations.

Activity Description:

Activity Details:

Estimated Activity Date(s):

Lead & Participating Institutions:

Direct Beneficiaries (and MEL target #, if applicable – *with assistance from prime in* Y1):

Expected output and MEL indicator (*with assistance from prime in Y1*):

Long-term outcome/impact and MEL indicator (with assistance from prime in Y1):

Products/Deliverables (if applicable):

Budget Details:

Cost:

GHSA Action Package:

GHSA Action Package:

Location: (Venue, City, Country)

Total Number of Participants & Attendees (if applicable): (including support staff)

Duration/Number of Days (if applicable):

Travel and hosting needs: (e.g. flights, lodging, meals)

Supply and/or Service Needs: (e.g. translation services, supplies)

OBJECTIVE 2: ONE HEALTH WORKFORCE ASSESSMENT AND TRACKING

JEE 2.0 Technical Area: Human Resources GHSA 2019 Action Package: Workforce Development

STRATEGY 2.1: Establish a regional network Knowledge Management System (KMS).

JEE 2.0 Indicators: D.4.1 An up to date multisectoral workforce strategy is in place

D.4.2 Human resources are available to effectively implement IHR

D.4.3 In-service trainings are available

D.4.4 FETP of other applied epidemiology training program is in place D.4.1 Human resources are available to implement IHR core capacity

requirements

Activity 2.1.1 Conduct a Knowledge Management (KMS) needs assessment, evaluate existing OHUN websites, review existing KMS, and develop recommendations for design and development of a regional KMS for each network inclusive of its member countries.

Activity 2.1.2 Pilot the regional KMS.

STRATEGY 2.2: Develop a standardized OH competency assessment toolkit using a capability maturity model

JEE 2.0 Indicators: D.4.1 An up to date multisectoral workforce strategy is in place

D.4.2 Human resources are available to effectively implement IHR

D.4.3 In-service trainings are available

D.4.4 FETP of other applied epidemiology training program is in place D.4.1 Human resources are available to implement IHR core capacity

requirements

Activity 2.2.1 Conduct an in-depth review of existing competencies, learning objectives and assessment tools; identify gaps and/or inconsistencies; add/develop learning objectives where they are missing; match existing evaluation strategies to each learning objective; design evaluation strategies and tools where gaps exist; and develop a OH evaluation toolkit for trainees at the basic, proficient and advanced levels.

Activity 2.2.2 Pilot elements of the OH evaluation toolkit in one or more network countries

Activity Description:

Activity Details:

Estimated Activity Date(s):

Lead & Participating Institutions:

Direct Beneficiaries (and Monitoring, Evaluation, and Learning (MEL) target #, if applicable – with assistance from prime in Y1):

Expected output and MEL indicator (*with assistance from prime in Y1*):

Long-term outcome/impact and MEL indicator (with assistance from prime in Y1): Products/Deliverables (if applicable):

Budget Details:

Cost:

Location: (Venue, City, Country)

Total Number of Participants & Attendees (if applicable): (including support staff)

Duration/Number of Days (if applicable):

Travel and hosting needs: (e.g. flights, lodging, meals)

Supply and/or Service Needs: (e.g. translation services, supplies)

STRATEGY 2.3: Engage One Health coordinating bodies to support workforce assessment and tracking, including inclusion of OH competencies in national Continuing Professional Development certification requirements

JEE 2.0 Indicators: D.4.1 An up to date multisectoral workforce strategy is in place

D.4.2 Human resources are available to effectively implement IHR

D.4.3 In-service trainings are available

D.4.4 FETP of other applied epidemiology training program is in place

GHSA Action Package: D.4.1 Human resources are available to implement IHR core capacity

requirements

Activity 2.3.1 Review existing data and fill gaps to map national and regional One Health coordinating bodies, with a special focus on: mapping coordination of OH workforce activities; identifying countries/regions with the strongest multisectoral partnerships for OHW planning and management and distilling best practices; and identifying countries/regions with opportunities to enhance OHW coordination.

Activity 2.3.2 Engage with One Health coordinating bodies to identify regions/countries in which university network needs and priorities align with the need to enhance OHW

coordination; support interested networks/universities to conduct a situational analysis and determine how best to support their local OHW coordinating bodies; share relevant best practices and tools.

Activity 2.3.3 In a country/countries with existing Continuous Professional Development (CPD) systems and policies, support the national University Network or a member university to: scan CPD policies/guidelines for existing OH competencies; identify opportunities to include basic OH competencies in CPD training, licensure and recertification requirements.

Activity Description:

Activity Details:

Estimated Activity Date(s):

Lead & Participating Institutions:

Direct Beneficiaries (and Monitoring, Evaluation, and Learning (MEL) target #, if applicable – with assistance from prime in Y1):

Expected output and MEL indicator (*with assistance from prime in Y1***)**:

Long-term outcome/impact and MEL indicator (with assistance from prime in Y1): Products/Deliverables (if applicable):

Budget Details:

Cost:

GHSA Action Package:

Location: (Venue, City, Country)

Total Number of Participants & Attendees (if applicable): (including support staff)

Duration/Number of Days (if applicable):

Travel and hosting needs: (e.g. flights, lodging, meals)

Supply and/or Service Needs: (e.g. translation services, supplies)

OBJECTIVE 3: ORGANIZATIONAL SUSTAINABILITY

JEE 2.0 Technical Area: Human Resources GHSA 2019 Action Package: Workforce Development

STRATEGY 3.1: Assessment, benchmarking, and strategic planning.

JEE 2.0 Indicators: D.4.1 An up to date multisectoral workforce strategy is in place

D.4.2 Human resources are available to effectively implement IHR

D.4.3 In-service trainings are available

D.4.4 FETP of other applied epidemiology training program is in place D.4.1 Human resources are available to implement IHR core capacity

requirements

Activity 3.1.1 Evaluate existing assessments, audit performance, and strategic plans to benchmark the previous status and the process for meeting NUPAS criteria.

Activity 3.1.2 Conduct workshops and activities to establish new benchmarks and update existing business plans with a five-year vision.

STRATEGY 3.2: Build network organizational capacities.

JEE 2.0 Indicators: D.4.1 An up to date multisectoral workforce strategy is in place

D.4.2 Human resources are available to effectively implement IHR

D.4.3 In-service trainings are available

D.4.4 FETP of other applied epidemiology training program is in place

GHSA Action Package: D.4.1 Human resources are available to implement IHR core capacity

requirements

Activity 3.2.1 Create an organizational sustainability community of practice to share best practices, discuss challenges, and build competencies across the university networks.

Activity 3.2.2 Conduct site visits and other technical assistance and/or support to build organizational capability in a stepwise nature following the OCA domains and business plan

STRATEGY 3.3: Develop new and diversified partnerships with a five-year vision.

JEE 2.0 Indicators: D.4.1 An up to date multisectoral workforce strategy is in place

D.4.2 Human resources are available to effectively implement IHR

D.4.3 In-service trainings are available

D.4.4 FETP of other applied epidemiology training program is in place

GHSA Action Package: D.4.1 Human resources are available to implement IHR core capacity

requirements

Justification:

Activity 3.3.1 Identify and secure new public and private partners that can work closely with the university networks to train and foster One Health workforce opportunities. Activity Description:

Activity Details:

Estimated Activity Date(s):

Lead & Participating Institutions:

Direct Beneficiaries (and Monitoring, Evaluation, and Learning (MEL) target #, if applicable – with assistance from prime in Y1):

Expected output and MEL indicator (*with assistance from prime in Y1*):

Long-term outcome/impact and MEL indicator (with assistance from prime in Y1): Products/Deliverables (if applicable):

Budget Details:

Cost:

Location: (Venue, City, Country)

Total Number of Participants & Attendees (if applicable): (including support staff)

Duration/Number of Days (if applicable):

Travel and hosting needs: (e.g. flights, lodging, meals)

Supply and/or Service Needs: (e.g. translation services, supplies)

Activity 3.3.2 Build partnership development capabilities within the university networks. Activity Description:

Activity Details:

Estimated Activity Date(s):

Lead & Participating Institutions:

Direct Beneficiaries (and Monitoring, Evaluation, and Learning (MEL) target #, if applicable – with assistance from prime in Y1):

Expected output and MEL indicator (*with assistance from prime in Y1*):

Long-term outcome/impact and MEL indicator (with assistance from prime in Y1):

Products/Deliverables (if applicable):

Budget Details:

Cost:

Location: (Venue, City, Country)

Total Number of Participants & Attendees (if applicable): (including support staff)

Duration/Number of Days (if applicable):

Travel and hosting needs: (e.g. flights, lodging, meals)

Supply and/or Service Needs: (e.g. translation services, supplies)

STRATEGY 3.4: Pilot and scale revenue-generating mechanisms for the university networks.

JEE 2.0 Indicators: D.4.1 An up to date multisectoral workforce strategy is in place

D.4.2 Human resources are available to effectively implement IHR

D.4.3 In-service trainings are available

D.4.4 FETP of other applied epidemiology training program is in place

GHSA Action Package: D.4.1 Human resources are available to implement IHR core capacity

requirements

Justification:

Activity 3.4.1 Institutionalize One Health training into university as well as continuing professional development (CPD) programs of member countries.

Activity Description:

Activity Details:

Estimated Activity Date(s):

Lead & Participating Institutions:

Direct Beneficiaries (and Monitoring, Evaluation, and Learning (MEL) target #, if applicable – with assistance from prime in Y1):

Expected output and MEL indicator (*with assistance from prime in Y1*):

Long-term outcome/impact and MEL indicator (with assistance from prime in Y1):

Products/Deliverables (if applicable):

Budget Details:

Cost:

Location: (Venue, City, Country)

Total Number of Participants & Attendees (if applicable): (including support staff)

Duration/Number of Days (if applicable):

Travel and hosting needs: (e.g. flights, lodging, meals)

Supply and/or Service Needs: (e.g. translation services, supplies)

Activity 3.4.2 Evaluate and pilot revenue-generating models such as fee-based training opportunities, digital attestation app, and member services business model.

Activity Description:

Activity Details:

Estimated Activity Date(s):

Lead & Participating Institutions:

Direct Beneficiaries (and Monitoring, Evaluation, and Learning (MEL) target #, if applicable – with assistance from prime in Y1):

Expected output and MEL indicator (with assistance from prime in Y1):

Long-term outcome/impact and MEL indicator (with assistance from prime in Y1): Products/Deliverables (if applicable):

Budget Details:

Cost:

Location: (Venue, City, Country)

Total Number of Participants & Attendees (if applicable): (including support staff)

Duration/Number of Days (if applicable):

Travel and hosting needs: (e.g. flights, lodging, meals)

Supply and/or Service Needs: (e.g. translation services, supplies)

From: predict-request@ucdavis.edu on behalf of "Elizabeth Leasure" <ealeasure@ucdavis.edu>

Sent: 12/18/2019 9:35:27 AM (-08:00)

To: "Evelyn Luciano" <luciano@ecohealthalliance.org>; "William B. Karesh"

<karesh@ecohealthalliance.org>

Cc: "predict Sympa List" <predict@ucdavis.edu>; "Peter Daszak" <daszak@ecohealthalliance.org>; "Alison Andre" <andre@ecohealthalliance.org>; "Christine Kreuder Johnson" <ckjohnson@ucdavis.edu>; "Hannah R

Chale" < hrchale@ucdavis.edu>

Subject: [predict] Jordan equipment donation to JUST approved (PREDICT)

Attachments: Jordan de minimus letter.docx.pdf

Hi Billy and Evelyn. The request to donate the freezer and vehicle purchased in Jordan under PREDICT has been approved by UC Davis. Please keep a copy of this email confirming approval, as well as the attached de minimis declaration and donation request that was submitted, for your files. If you have any questions, please let me know.

Thanks,

Liz

Elizabeth Leasure

Financial Operations Manager

One Health Institute

REDACTED (cell)

530-754-9034 (office) Skype: ealeasure

From: UC Davis Service Desk <ucdservicedesk@ucdavis.edu>

Sent: Wednesday, December 18, 2019 9:01 AM

Subject: CASE0031253 "Urgent de minimus declaration request " - Notification

This is a notification regarding your request titled: Urgent de minimus declaration request

Please see the comments from your service analyst below. To email us about this service request, please reply to this message, and leave the subject line intact.

If you are a UC Davis affiliate with a login ID, you can check the status of your ticket at the Service Hub.

Sincerely,

UC Davis Service Desk

2019-12-18 09:00:27 AM PST - Katie Ryan Comments

Hi All,

The donation request has been approved.

When you are ready to process additional requests, please forward to us at aggiesurplus@ucdavis.edu

Thank you,

Katie

2019-12-17 02:54:08 PM PST - Elizabeth Leasure $^{\rm Comments}$

reply from: ealeasure@ucdavis.edu

The vehicle was purchased by a partner through a subaward, so there is no record of the item in any of UCD's systems (including Fleet Services). Yes, if the de minimis declaration request is not approved, the title would need to be transferred.

Elizabeth Leasure Financial Operations Manager One Health Institute REDACTED (cell) 530-754-9034 (office)

Skype: ealeasure

2019-12-17 02:50:40 PM PST - Katie Ryan $^{\rm Comments}$

One more question. I'm trying to figure out if the truck has vehicle registration and if title transfer will need to be done. I'm sure the vehicle transfer process is different in Jordan so I'm unsure if this will need to be done and if so how. Is anyone familiar with this process? I checked with UCD Fleet Services and they don't have any record of the truck.

Thank you, Katie

Ref:MSGIT8690779

UNIVERSITY OF CALIFORNIA, DAVIS

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DAVIS, CALIFORNIA 95616-8734

SCHOOL OF VETERINARY MEDICINE ONE HEALTH INSTITUTE UNIVERSITY OF CALIFORNIA (530) 752-4167 FAX (530) 752-3318 http://www.vetmed.ucdavis.edu/ohi

December 13, 2019

Katie Ryan Aggie Surplus University of California, Davis

RE: De minimus declaration request (PREDICT-2, Cooperative Agreement AID-OAA-A-14-00102)

Dear Ms. Ryan:

During the performance period of the USAID funded PREDICT-2 project (Cooperative Agreement AID-OAA-A-14-00102), equipment (items with an acquisition cost of \$5,000 or more and a useful life of one year or more) was purchased with funds subawarded to partner institutions located in the U.S. and abroad. The majority of these subawards ended as of September 30, 2019, with title to equipment reverting back to UC Davis as of October 1, 2019 per the terms of the subawards. As part of the closeout process, subrecipient institutions have submitted disposition requests for these items. An inventory with relevant information and requested disposition(s) for each item is attached.

The value of equipment included in the attached inventory was determined to be *de minimis* for a number of reasons, including: 1) the items are located abroad (Amman, Jordan), making the cost of shipping/transporting the items back to the U.S. (or elsewhere) for use prohibitively high; 2) the equipment (particularly the vehicles) were subjected to heavy use during the course of project implementation as activities were by design conducted in remote tropical forest and wilderness locations, leading to considerable wear and tear of the items that has reduced their resale value; 3) the costs associated with owning the items (including regular maintenance, repair, operation (electricity, fuel), required registrations, insurance, taxes, etc.) are significant; 4) the project is no longer employing staff in Jordan, and has limited staff currently engaged at UC in the US, thus on-site support for the trade or sale of the items is not available and costs; and 5) time for UC staff to engage in trade or sale from abroad or via travel to Jordan is overly burdensome. Given these factors, the fair value of the equipment purchased is less than the costs anticipated for handling, record keeping, storage, removal, and other costs associated with trade, sale, or disposition.

Per the disposition request from the subrecipient institution (attached), the equipment in question will vest with the entity identified in the inventory attached. The recipient entity will be responsible for ongoing maintenance and use of the items in furtherance of their continuing efforts in emerging infectious disease surveillance in the human, animal, and/or environmental health sectors, as appropriate for the institution. The understanding and expectation is that the received equipment will be made available to PREDICT collaborators, UC Davis, and USAID on request for further collaborative health work should that work be identified as mutually beneficial during the useable life of the equipment.

Most importantly, a primary objective of the PREDICT project has been to build long lasting health systems capacity through enhanced surveillance (laboratory infrastructure, outbreak response, and pandemic preparedness) by our in-country partners in furtherance of USAID's overarching goal of greater development

outcomes and emerging pandemic threats preparedness by assisting and empowering developing countries on their *Journey to Self-Reliance* (https://www.usaid.gov/selfreliance). This includes providing in-country partners with various pieces of equipment to implement disease surveillance activities, laboratory testing, and outbreak response capabilities (such as ultra-low freezers, PCR machines, biosafety cabinets, 4x4 vehicles, etc.), including replacing those items worn down as a direct result of project activities so partners can continue to implement critical health surveillance activities in their countries to assure biodefense and health security and prevent the emergence and spread of infectious diseases. As such, the equipment is significantly valuable to our partners, while carrying a *de minimus* value for the University of California, Davis.

Many thanks for your consideration of this request, and please contact us with any questions or additional documentation you may need to provide the required approval(s).

Sincerely,

Jonna A.K. Mazet, DVM, MPVM, PhD

PREDICT Principal Investigator

Professor of Epidemiology and Disease Ecology

One Health Institute

School of Veterinary Medicine

University of California, Davis

Jordan University of Science & Technology **Faculty of Veterinary Medicine**



REDACTED	REDACTED		
Ref.:	الرقــم :		
Date: 10-15-2019	التاريخ :هـ		
	الموافق :م		

This letter is to provide information on equipment that were purchased by PREDICT-2 Jordan and justification of keeping them at Jordan university of Science and Technology.

- 1- Truck: GMC Seirra 4x4 with ID no. 8-13463 with title holder under USAID. The Truck will be used by Faculty of Veterinary Medicine as mobile clinic.
- 2- Upright Freezer, Cryocube F570. This Freezer used to store biological samples from PREDICT-2 Jordan and it will also be used to store these samples for up to 5 years.

Yours,

Ehab Abu-Basha, DVM, MSc, Ph.D PREDICT-2 Jordan Country Coordinator

Faculty of Veterinary Medicine

EDACTE

REDACTED

Tel.: REDACTED Fax: REDACTED

Country	Description	Serial Number or Identifier	Source of Funding	Title Holder	Acquisition Date (dd/mm/yy) & Cost (USD)	Percentage % of US Federal 1)Location 2)Use 3)Condition (New, Good, Participation Fair, Damaged, Broken)	Market Value (USD)	Requested Disposition
Jordan	Upright Freezer, Cryocube F570	N/A	PREDICT-2 (AID-OAA-A- 14-00102)	University of California, Davis	24/05/18 & \$25,000	1)Jordan University of Science and Technology 100% (JUST) 2) For sample storage 3)Good		Donation to Jordan University of Science & Technology
Jordan	Truck: GMC Seirra 4x4	8-13463	PREDICT-2 (AID-OAA-A- 14-00102)	University of California, Davis	23/06/19 & \$39,405	1)Jordan University of Science and Technology (JUST) 2) Vehicle used to travel to study sites. 100% 3) Good		Donation to Jordan University of Science & Technology

From: predict-request@ucdavis.edu on behalf of "William B. Karesh" <karesh@ecohealthalliance.org>

Sent: 12/18/2019 9:47:25 AM (-08:00)

To: "Elizabeth Leasure" <ealeasure@ucdavis.edu>

Cc: "Evelyn Luciano" < luciano@ecohealthalliance.org>; "predict Sympa List"

<predict@ucdavis.edu>; "Peter Daszak" <daszak@ecohealthalliance.org>; "Alison Andre"

<andre@ecohealthalliance.org>; "Chris Johnson" <ckjohnson@ucdavis.edu>; "Hannah R Chale" <hrchale@ucdavis.edu>

Subject: [predict] Re: Jordan equipment donation to JUST approved (PREDICT)

Not any that Evelyn or I know about.

BK

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

EcoHealth Alliance 460 West 34th Street - 17th Floor New York, NY 10001 USA

+1.212.380.4463 (direct) +1.212.380.4465 (fax) www.ecohealthalliance.org

President, OIE Working Group on Wildlife

Co-chair, IUCN Species Survival Commission - Wildlife Health Specialist Group

EPT Partners Liaison, USAID Emerging Pandemic Threats - PREDICT-2 Program

EcoHealth Alliance leads cutting-edge research into the critical connections between human and wildlife health and delicate ecosystems. With this science we develop solutions that promote conservation and prevent pandemics.

On Dec 18, 2019, at 12:43 PM, Elizabeth Leasure < <u>ealeasure@UCDAVIS.EDU</u>> wrote:

Are there any other time sensitive equipment items we should be aware of?

Elizabeth Leasure
Financial Operations Manager
One Health Institute
REDACTED (cell)

530-754-9034 (office) Skype: ealeasure

From: William B. Karesh < karesh@ecohealthalliance.org>

Sent: Wednesday, December 18, 2019 9:43 AM **To:** Elizabeth Leasure < <u>ealeasure@UCDAVIS.EDU</u>>

Cc: Evelyn Luciano < luciano@ecohealthalliance.org>; predict Sympa List < predict@ucdavis.edu>; Peter

Daszak <<u>daszak@ecohealthalliance.org</u>>; Alison Andre <<u>andre@ecohealthalliance.org</u>>; Christine Kreuder Johnson <<u>ckjohnson@UCDAVIS.EDU</u>>; Hannah R Chale <<u>hrchale@UCDAVIS.EDU</u>> **Subject:** Re: Jordan equipment donation to JUST approved (PREDICT)

Thanks Liz.

BK

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

EcoHealth Alliance 460 West 34th Street - 17th Floor New York, NY 10001 USA

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Thanks, Liz

Elizabeth Leasure Financial Operations Manager One Health Institute

REDACTED (cell) 530-754-9034 (office)

From: UC Davis Service Desk <ucdservicedesk@ucdavis.edu>

Sent: Wednesday, December 18, 2019 9:01 AM

To: Christine Kreuder Johnson < ckjohnson@UCDAVIS.EDU>; Jonna Mazet

<jkmazet@ucdavis.edu>; Hannah R Chale <hrchale@UCDAVIS.EDU>; predict Sympa List

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Subject: CASE0031253 "Urgent de minimus declaration request" - Notification

This is a notification regarding your request titled: Urgent de minimus declaration request

Please see the comments from your service analyst below. To email us about this service request, please reply to this message, and leave the subject line intact.

If you are a UC Davis affiliate with a login ID, you can check the status of your ticket at the Service Hub.

Sincerely, UC Davis Service Desk

2019-12-18 09:00:27 AM PST - Katie Ryan ^{Comments} Hi All,

The donation request has been approved.

When you are ready to process additional requests, please forward to us at aggiesurplus@ucdavis.edu

Thank you, Katie

2019-12-17 02:54:08 PM PST - Elizabeth Leasure Comments

reply from: ealeasure@ucdavis.edu

The vehicle was purchased by a partner through a subaward, so there is no record of the item in any of UCD's systems (including Fleet Services). Yes, if the de minimis declaration request is not approved, the title would need to be transferred.

Elizabeth Leasure
Financial Operations Manager
One Health Institute

REDACTED (cell) 530-754-9034 (office)

Skype: ealeasure

2019-12-17 02:50:40 PM PST - Katie Ryan $^{\rm Comments}$

One more question. I'm trying to figure out if the truck has vehicle registration and if title transfer will need to be done. I'm sure the vehicle transfer process is different in Jordan so I'm unsure if this will need to be done and if so how. Is anyone familiar with this process? I checked with UCD Fleet Services and they don't have any record of the truck.

Thank you, Katie

Ref:MSGIT8690779 <Jordan de minimus letter.docx.pdf>

"Jonna Mazet" < jkmazet@ucdavis.edu> From: 03/19/2020 7:45:55 AM (-07:00) Sent: "Georges Benjamin" <georges.benjamin@apha.org> To: "Brown, Lisa" <LBrown@nas.edu>; "Alexandra Phelan (alp81@georgetown.edu)" Cc: <alp81@georgetown.edu>; "David A Relman (relman@stanford.edu)" <relman@stanford.edu>; "David Walt (dwalt@bwh.harvard.edu)" <dwalt@bwh.harvard.edu>; "Diane Griffin (dgriffi6@jhmi.edu)" <dgriffi6@jhmi.edu>; "Embrey, Ellen (eembrey@stratitia.com)" <eembrey@stratitia.com>; "John Hick (REDACTED ; "Kent Kester (Kent.Kester@sanofi.com)" <Kent.Kester@sanofi.com>; "Kristian G. Andersen REDACTED REDACTED ; "Mark Smolinski (mark@endingpandemics.org)" <mark@endingpandemics.org>; "Mary Travis Bassett (mbassett@hsph.harvard.edu)" <mbassett@hsph.harvard.edu>; REDACTED "Patricia King (; "Peggy Hamburg (peggy@hbfam.net)" <peggy@hbfam.net>; "Peter Daszak (daszak@ecohealthalliance.org)" <daszak@ecohealthalliance.org>; "Phyllis D. Meadows (PDMeadows@kresge.org)" <PDMeadows@kresge.org>; "Richard Besser (rbesser@rwjf.org)" <rbesser@rwjf.org>; "Tara O'Toole (totoole@iqt.org)" <totoole@iqt.org>; "Trevor Bedford (trevor@bedford.io)" <trevor@bedford.io>; "Harvey V. Fineberg (harvey.fineberg@moore.org)" <harvey.fineberg@moore.org>; "Pope, Andrew" <APope@nas.edu>; "Pavlin, Julie" <JPavlin@nas.edu>; "Downey, Autumn" <ADowney@nas.edu>; "Shore, Carolyn" <CShore@nas.edu>; "Wollek, Scott" <SWollek@nas.edu> Subject: Re: Note from Harvey - OSTP Request on Data Management System

I agree (and also with the data suggestions and priorities described by others). At this point, the most efficient process could probably be achieved by us reviewing what is being used now or is being proposed for current testing data and suggesting improvements if needed to that. We could all add to the list of data that would be great to have, but compliance for collecting a huge number of data fields is unlikely in this situation, especially at this point in the pandemic. I'm afraid that we've lost the opportunity for the development of the optimal sampling and data collection plan and now need to move to optimize what is required and how data from different sources are consolidated, required fields to be pulled from multiple sources, and optimal data fields to add to collection tools to make consolidation easier. Of course, there will also be multiple types of data, e.g., serological surveillance vs PCR diagnostics. We could make recommendations on those separately, as well as which data should be made public and what needs to be protected for privacy purposes. Also need a central repository for these different types of data & their sources and determinations on who has access, striving to make as much of it public as quickly as possible. Also suggested edits on google doc. Have a healthy day and please let's all continue to promote calm,

On Wed, Mar 18, 2020 at 8:03 PM Georges Benjamin < georges.benjamin@apha.org > wrote: Harvey

I think our response to this needs to be put on the context of what their strategy for management & response from this point forward is. Because the data and surveillance ones needs for decision making and tracking is dependent Upon their strategic goals. If this is a mitigation strategy only then we need to be certain that the data sets are used to track and isolate individuals. If it is a mitigation plus suppression strategy the priority data and research is more comprehensive and we have to prioritize research questions that answer if the virus will return, how long do we have immunity, etc. in order to do effective suppression. The testing strategy (test everyone vs symptomatic & exposed) becomes more important as well. I would Argue we have probably missed the opportunity for a suppression only strategy. But a combination one may control

The outbreak and get us back to some degree of normal life sooner. Innovative surveillance methods like syndromics might be helpful as well to detect reemergence. We might consider responding to them with our thoughts on these things through some kind of framework that puts the research question, data collection, etc. into buckets that reflect their potential response approaches and goals. I have some public health surveillance

thoughts as well but will send in the AM after I crystallize. My thoughts.

Georges

Sent from my iPhone Georges C. Benjamin, MD APHA Executive Director

On Mar 18, 2020, at 2:52 PM, Brown, Lisa < LBrown@nas.edu> wrote:

Dear all,

In follow up to the below email regarding the necessary and desirable data elements for various purposes, current sources and gaps, and any thoughts about data system design and integration, please find attached a list of data needs provided by Dr. Droegemeier to prompt your thinking on this issue. Please note this document is meant to be a starting point and is not entirely comprehensive.

Very best, Lisa

Lisa Brown, MPH
Senior Program Officer
Board on Health Sciences Policy
Health and Medicine Division
The National Academies of Sciences, Engineering, and Medicine
500 Fifth Street, NW, Washington, DC 20001
202-334-2487 (office)
lbrown@nas.edu<mailto:lbrown@nas.edu>

From: "Sam Halabi" <sfh9@georgetown.edu>
Sent: 05/23/2020 9:38:07 AM (-07:00)

The Manak Wand William Advis advis

To: "Jonna Mazet" <jkmazet@ucdavis.edu>

Cc: "alexandra zuber" <alexandrazuber@atahealthstrategies.com>; "Peter Daszak" <daszak@ecohealthalliance.org>; "karesh@ecohealthalliance.org" <karesh@ecohealthalliance.org>;

"f.castillo@berkeley.edu" <f.castillo@berkeley.edu>; "oromero@haas.berkeley.edu" <oromero@haas.berkeley.edu>

Subject: Re: 'board governance review'

Hi, Jonna,

No problem. I'll make sure to also draft a document that makes those recommendations and ties them to the consultant interviews and our own.

Best,

Sam

On May 22, 2020, at 5:23 PM, Jonna Mazet <jkmazet@ucdavis.edu> wrote:

I think that all sounds great. I agree on the slide tone & content, but I also would like to have a good, candid discussion among us about Sam's distillation and finding to make a strong plan for recommendations moving forward.

Have a great weekend everybody,

Jonna

On Fri, May 22, 2020 at 12:28 PM alexandra zuber alexandrazuber@atahealthstrategies.com> wrote:

Thanks again Sam! Here are all the transcripts.

Your timeline sounds great. My recommendation is to keep the content pithy and action-oriented (the objective is to inform and guide our technical support, not to produce a formal report). Your NUPAS findings did this very well, so I am confident this will be a useful product.

And let's make sure (as you've rightly done below) that we message this as a summarization of the Board issues for the global team to better provide technical support (I want to be sure no one mis-perceives this as an additional assessment of any kind).

In fact, we may wish to rename this activity now as "board governance summary" to avoid any issues.

Alexandra Zuber, MPP, DrPH

Founder and CEO, Ata Health Strategies, LLC Email: alexandrazuber@atahealthstrategies.com

Phone: +1 (617) 680-3950 LinkedIn: alexandrazuber/

Website: www.atahealthstrategies.com

Twitter: @alexandrazuber

From: Sam Halabi <sfh9@georgetown.edu> Sent: Friday, May 22, 2020 12:28 PM

To: alexandra zuber <alexandrazuber@atahealthstrategies.com>

Cc: Peter Daszak <daszak@ecohealthalliance.org>; karesh@ecohealthalliance.org

karesh@ecohealthalliance.org; Jonna Mazet < <a href="mailto:karesh@ecohealthalliance.org; Jonna Mazet < <a href=

<f.castillo@berkeley.edu>; oromero@haas.berkeley.edu <oromero@haas.berkeley.edu>

Subject: Re: 'board governance review'

Hi, Alexandra,

That sounds like a terrific idea and way forward. In general, it seems that our AFROHUN planning moves about a month behind our SEAOHUN planning (at least for the Objective 3 work in which I've involved), so I envisioned June 30 as the delivery date for the review draft for the AFROHUN board/Deans' Summit and July 31 for the SEAOHUN board/Foundation Board review/overview documents.

I'm happy to adjust those timelines with input from everyone on the board taskforce team.

I think there may be a few board transcripts taken pursuant to the SWOT reviews that I don't have, but I can certainly get under way with what I have in my possession now.

Best, Sam

On Fri, May 22, 2020 at 9:25 AM alexandra zuber alexandrazuber@atahealthstrategies.com> wrote:

Dear board development TA task team,

I wanted to follow-up on a Y1 Obj 3 work plan item we've discussed before- the 'board governance review'. When we last spoke about this, we agreed we did not have predetermined methodology, and we'd brainstorm this after the workshops. I have a simple suggestion on how to move this forward.

I think it would be good for us as a quick exercise to pull together everything we've learned on the board issues to date facing SEAOHUN and AFROHUN from the SWOT interviews and the NUPAS review. I've asked if Sam could do this for us, by analyzing the board -specific questions in the SWOT interviews with board members and by compiling that together wilth his analysis of board issues as part of the NUPAS assessment of both Secretariats.

I've suggested Sam assemble this information in a single PPT, which we can report to USAID as accomplishing the 'board governance review' in our work plan. The audience for this PPT would be internal to us for the moment, and we can then decide how we want to package the information for broader consumption (or not). (For example, we may wish to title the PPT something softer than "review", such " an overview of network boards for the global team'" to avoid any sensitivities from either secretariat).

I would envision objectives of this board goverance review to be:

- 1) characterize the boards of both secretariats composition, retention, selection criteria, by laws, etc
- 2) identify strengths and challenges/ areas of improvement
- 3) make recommendations for our board government TA task team on key improvements and how to approach in Year 1-2.

Sam can give us a timeline for this work and send you all drafts for review/ input. How does this sound to the team?

Thanks, Alexandra

Alexandra Zuber, MPP, DrPH

Founder and CEO, Ata Health Strategies, LLC Email: alexandrazuber@atahealthstrategies.com

Phone: +1 (617) 680-3950 LinkedIn: <u>alexandrazuber/</u>

Website: www.atahealthstrategies.com

Twitter: @alexandrazuber

From: onehealthnextgen-request@ucdavis.edu on behalf of "Peter Daszak"

<daszak@ecohealthalliance.org>

Sent: 08/09/2020 11:10:03 PM (-07:00)

To: "Elizabeth Leasure" <ealeasure@ucdavis.edu>; "Aleksei Chmura"

<chmura@ecohealthalliance.org>

Cc: "Woutrina A Smith" <wasmith@ucdavis.edu>; "Jonna Mazet" <jkmazet@ucdavis.edu>; "Alison

Andre" <andre@ecohealthalliance.org>; "onehealthnextgen Sympa List" <onehealthnextgen@ucdavis.edu>; "Aleksei

Chmura" <chmura@ecohealthalliance.org>; "Ava Sullivan" <sullivan@ecohealthalliance.org>

Subject: [onehealthnextgen] RE: OHW-NG Y2 Budget and Narrative - draft due July 31st

Aleksei and Ava are working on it and will have it back with you ASAP.

Cheers,

Peter

Peter Daszak

President

EcoHealth Alliance 520 Eighth Avenue, Suite 1200 New York, NY 10018-6507 USA

Tel.: +1-212-380-4474

Website: www.ecohealthalliance.org

Twitter: @PeterDaszak

EcoHealth Alliance develops science-based solutions to prevent pandemics and promote conservation

From: Elizabeth Leasure <ealeasure@UCDAVIS.EDU>

Sent: Tuesday, August 4, 2020 1:45 PM

To: Aleksei Chmura <chmura@ecohealthalliance.org>; Peter Daszak <daszak@ecohealthalliance.org> **Cc:** Woutrina A Smith <wasmith@ucdavis.edu>; Jonna Mazet <jkmazet@ucdavis.edu>; Alison Andre <andre@ecohealthalliance.org>; onehealthnextgen Sympa List <onehealthnextgen@ucdavis.edu>

Subject: RE: OHW-NG Y2 Budget and Narrative - draft due July 31st

Importance: High

Hi Aleksei and Peter. I'm following up regarding your Y2 budget submission, which was due last Friday. Can you please submit the required documents ASAP?

Thanks,

Liz

Elizabeth Leasure Financial Operations Manager One Health Institute

REDACTED (cell) 530-754-9034 (office) Skype: ealeasure

From: Elizabeth Leasure

Sent: Tuesday, July 14, 2020 6:47 PM

To: Aleksei Chmura <<u>chmura@ecohealthalliance.org</u>>; Peter Daszak <<u>daszak@ecohealthalliance.org</u>>; Cc: Woutrina A Smith <<u>wasmith@ucdavis.edu</u>>; Jonna Mazet <<u>jkmazet@ucdavis.edu</u>>; Alison Andre <<u>andre@ecohealthalliance.org</u>>; onehealthnextgen Sympa List <<u>onehealthnextgen@ucdavis.edu</u>>

Subject: OHW-NG Y2 Budget and Narrative - draft due July 31st

Hi Aleksei and Peter. The much anticipated Y2 budget email for OHW-NG has finally arrived, and it is time to get this party started.

As Woutrina noted in her earlier email, draft Y2 work plans, budgets, and budget narratives are due to UC Davis by EOD PST on July 31st. Additional guidance will be provided based on technical lead input into Y2 activities and scope once received later this week, so initial budget targets provided may be adjusted to ensure partner budgets align with technical work plans. Draft budgets and narratives will be reviewed and feedback provided during the first week (or so) of August, and you will then have approximately two weeks to obtain the required institutional approvals and provide final documents to UC Davis.

In an effort to make things as easy and efficient for you as possible, I have attached the final approved detailed budget and narrative from Y1 for you to use as a template. Please modify these documents to reflect Y2 needs. Key information to note when developing your budget and narrative is included below. Please let me know if you have any questions. Thanks and happy budgeting!

Initial Y2 budget target: \$750,000

- Travel budgets should be limited given COVID-19 pandemic. Travel before the middle of Y2 is highly unlikely given the current climate, and budgets should reflect this reality. Any deviation from this guidance should be explained in your budget narrative.
- In-person activity and meeting costs may be budgeted as long as they are in-line with guidance provided to date regarding group size limitations, personal protection and social distancing measures to prevent disease transmission, and applicable restrictions imposed by country governments in response to COVID-19. If you budget such costs, please be sure that the budget narrative includes language that explains how you will address these issues and your contingency plan if in-person activities are not possible.
- Please budget for travel to one Global All Country Consortium meeting at the end of Y2. For budgeting purposes, please use Bangkok, Thailand as the meeting location.
- Please ensure that rates used for lodging and per diem do not exceed GSA rates for destination locations.
- Key personnel minimum effort requirements still apply, so keep in mind when budgeting.
- 5% minimum cost share commitment requirements still apply.
- Global partners are required to provide a budget narrative but can omit the personnel (salary & benefits) section.

Elizabeth Leasure
Financial Operations Manager
One Health Institute
REDACTED (cell)
530-754-9034 (office)

Skype: ealeasure

From: "Alison Andre" <andre@ecohealthalliance.org>

Sent: 01/12/2017 12:31:41 PM (-08:00)

To: "Elizabeth S Chase" <eschase@ucdavis.edu>

Cc: "Jonna Mazet" <jkmazet@ucdavis.edu>; "Peter Daszak" <daszak@ecohealthalliance.org>

Subject: Re: 2017 CUGH Conference Required Documents

Hi Liz,

Thanks for the reminder! Peter will fill out the forms and I'll submit them directly to CUGH.

Best, Alison

From: Elizabeth S Chase <eschase@ucdavis.edu>
Date: Wednesday, January 11, 2017 at 7:11 PM
To: Alison Andre <andre@ecohealthalliance.org>

Cc: Jonna Mazet < jkmazet@ucdavis.edu>, Peter Daszak < daszak@ecohealthalliance.org>

Subject: FW: 2017 CUGH Conference Required Documents

Hi Alison,

Just doing some housekeeping and noticed I don't have the attached forms from Peter yet. He is listed as a panel participant for the CUGH Conference in April 2017 and they are asking for the forms from all panelists. You may have sent it directly to them, which is great. I just sent them Jonna's, Eddy's and Dennis's. The deadline is January 31 so if you haven't sent them yet, you have a little time. If you want to send them to me to forward, that is ok too. Whatever is easiest for you.

I am also attaching the original GVP Symposium proposal for your records. If there is anything I can do to assist, please let me know.

Thanks so much,

Liz

From: Elizabeth S Chase

Sent: Monday, December 12, 2016 12:42 PM

To: (andre@ecohealthalliance.org) <andre@ecohealthalliance.org>; Elnicki Taylor (telnicki@metabiota.com) <telnicki@metabiota.com>; Cassandra Louis Duthil (clouisduthil@usaid.gov) <clouisduthil@usaid.gov>; Cara Chrisman cchrisman@usaid.gov>

Subject: FW: 2017 CUGH Conference Required Documents

Hello All,

The CUGH Conference email below was sent to Jonna as the lead contact for the GVP panel at the conference scheduled for April 2017. I have replied with our acceptance. (see below)

They are asking for the attached forms from every GVP panelist. Panel members are Dennis, Peter, Eddy and Jonna. The deadline for submission back to CUGH is January 31. Once completed, I am happy to collect for submission as a single packet, or if your prefer to send to CUCH at your convenience, just copy me for tracking.

If you need additional information, let me know.

Thanks, Liz

From: Elizabeth S Chase

Sent: Monday, December 12, 2016 12:25 PM **To:** 'skenne26@jhmi.edu' <<u>skenne26@jhmi.edu</u>>

Cc: 'Jonna Mazet' < jkmazet@ucdavis.edu'>; Rebecca Benmahdi@metabiota.com'>; Elnicki Taylor (telnicki@metabiota.com') < telnicki@metabiota.com'>; Cassandra Louis Duthil (clouisduthil@usaid.gov) < telnicki Taylor (telnicki@metabiota.com'>; Cassandra Louis Duthil (clouisduthil@usaid.gov) < telnicki@metabiota.com'>; Cassandra Louis Duthil (clouisduthil@usaid.gov) < telnicki@metabiot

Subject: RE: 2017 CUGH Conference Required Documents

Greetings Rachel,

I provide administrative assistance to Dr. Jonna Mazet and am replying on her behalf to process the CUGH Conference documents and arrangements. I look forward to working with you.

We are delighted that "The Global Virome Project: a first step toward ending the pandemic era" is on the conference agenda. By this email, the panel accepts the invitation to participate. Dr. Mazet will continue as panel lead contact, supported administratively by myself.

The originally submitted proposal includes names/titles of the participants along with a brief bio on each. We will submit the required conference documents before the deadline of January 31.

Sincerely, Liz

Liz Chase

Executive Assistant to Dr. Jonna Mazet One Health Institute University of California, Davis

530-752-3630 eschase@ucdavis.edu

From: REDACTED On Behalf Of Jonna Mazet

Sent: Monday, December 12, 2016 11:10 AM **To:** Elizabeth S Chase <<u>eschase@ucdavis.edu</u>>

Subject: Fwd: 2017 CUGH Conference Required Documents

----- Forwarded message -----

From: Rachel Kennedy <skenne26@jhmi.edu>

Date: Fri, Dec 9, 2016 at 8:01 AM

Subject: 2017 CUGH Conference Required Documents

To: REDACTED

Good morning Dr. Mazet,

I hope this finds you well and that you've had a pleasant start to the holiday season. My name is Rachel Kennedy, and I am assisting the Consortium of Universities for Global Health planning committee on putting together the 2017 CUGH Conference details.

Congratulations on "The Global Virome Project: a first step toward ending the pandemic era" being invited to participate in the conference this Spring. Please let me know **as soon as possible** if you officially accept the invitation to participate in the conference.

If your panel chooses to accept, please let me know if you will continue to be the lead contact, or if that responsibility will be shifting to someone else.

Upon acceptance, please also note the following will need to be completed and confirmed:

- We will also need to be made aware of any changes to your panel description, including speaker confirmations, panel description, or any other details which may have changed from your original proposal.
- In addition, please see the attached forms which MUST be completed by **ALL SPEAKERS & MODERATORS** in your panel. We ask that these please be submitted to us **no later than JANUARY**31, 2017.
 - o These forms will ensure that the conference is accredited to receive Continuing Medical Education and Continuing Nursing Education credits for all attendees. We ask that you please scan and email these to Rachel Kennedy at skenne26@jhu.edu as soon as possible.

We also wanted to inform you, if your panel accepts the invitation to participate, that at this time your session will be scheduled for April 9, 2017 between 11:30am - 1:00pm.

Again, we are excited to have you and your panel as a part of the 2017 CUGH Conference. I apologize for the lengthy email, and please let me know if you have any further questions.

Best,

From: "Claes, Filip (FAORAP)" < REDACTED

Sent: 03/20/2017 11:43:43 PM (-07:00)

To: "Dibesh Karmacharya" - REDACTED

Cc: "Kalpravidh, Wantanee (FAORAP)" REDACTED; "Black, Peter (FAORAP)"

REDACTED ; "Parajuli, Baikuntha (FAONP)" REDACTED ; "Jonna Mazet" <jkmazet@ucdavis.edu>; "Christine Kreuder Johnson" <ckjohnson@ucdavis.edu>; "Tracey Goldstein"

<tgoldstein@ucdavis.edu>; "William B. Karesh" <karesh@ecohealthalliance.org>; "Daniel Schar" <dschar@usaid.gov>

Subject: message of appreciation to the Center of Molecular Dynamics Nepal (CMDN)

Dear Dibesh,

I would like to thank you for the assistance that CMDN provided to the Central Veterinary Laboratory in Nepal. Thanks to the kind provision of N8 primers and protocols, CVL was able to confirm the first outbreak of H5N8 within a week and report this to the OIE.

This shows how important the collaboration is within the EPT program and how PREDICT and FAO are working closer together.

Looking forward to work even closer together on the joint PREDICT-FAO/Government of Nepal surveillance at the wildlife-animal interface

Best wishes, Filip

Filip Claes, PhD

Regional Laboratory Coordinator Emergency Centre for Transboundary Animal Diseases (ECTAD) Food and Agriculture Organization of the United Nations (FAO) Regional Office for Asia and the Pacific





<ealeasur Francisco "Prof. Wo Goldstein <andre@ Evelyn Lu <turner@ <telnicki@ Subject: Sent:</telnicki@ </turner@ </andre@ </ealeasur 	Peter Daszak <daszak@ecohealthalliance.org> David J Wolking <djwolking@ucdavis.edu> Amanda Fine REDACTED , Brian Bird < REDACTED , "Christine Kreuder Johnson" on@ucdavis.edu>, Damien Joly <djoly@metabiota.com>, Eddy Rubin <errubin@metabiota.com>, Elizabeth Leasure re@ucdavis.edu>, Damien Joly <djoly@metabiota.com>, Karen Saylors <ksaylors@metabiota.com>, Leilani on <fraction <="" <fraction="" td=""> offrancisco@ecohealthalliance.org>, "Murray, Suzan" <murrays@si.edu>, "Prof. Johna Mazet" <jkmazet@ucdavis.edu>, on thina Smith" <market <murrays@si.edu="">, "Simon Anthony <sja2127@columbia.edu>, Tracey of <murraysimon <murra<="" <murraysimon="" td=""></murraysimon></sja2127@columbia.edu></market></jkmazet@ucdavis.edu></murrays@si.edu></fraction></ksaylors@metabiota.com></djoly@metabiota.com></errubin@metabiota.com></djoly@metabiota.com></djwolking@ucdavis.edu></daszak@ecohealthalliance.org>
Cheers,	
Peter	
Peter Da Presider	
FcoHeal	th Alliance

EcoHealth Alliance 460 West 34th Street – 17th Floor New York, NY 10001

+1.212.380.4473 (direct)

+1.212.380.4465 (fax)

www.ecohealthalliance.org

EcoHealth Alliance leads cutting-edge research into the critical connections between human and wildlife health and delicate ecosystems. With this science we develop solutions that promote conservation and prevent pandemics.

From: David J Wolking [mailto:djwolking@ucdavis.edu]

Sent: Tuesday, March 21, 2017 4:43 PM

To: David J Wolking

Cc: Amanda Fine; Brian Bird; Christine Kreuder Johnson; Damien Joly; Eddy Rubin; Elizabeth Leasure; Jon Epstein; Karen Saylors; Leilani Francisco; Murray, Suzan; Peter Daszak; Prof. Jonna Mazet; Prof. Woutrina Smith; Sarah Olson; Simon Anthony; Tracey Goldstein; William B. Karesh; Alison Andre; Amanda Fuchs; Ava Sullivan; Evelyn Luciano; Emma Lane; Molly Turner; REDACTED

Dawn Zimmerman; Taylor Elnicki

Subject: Re: Reminder: PREDICT EB Call - Wednesday March 23, 2017 @ 9:00AM PDT/12:00PM EDT

Hi everyone,

Please find the agenda and supporting documents attached.

Talk to you soon,

David

Wednesday, March 23, 2017

9:00am PDT/12:00pm EDT

REDACTED, Access code REDACTED

International Dial-in number: REDACTED (toll charges apply)

Agenda

1. Management team and admin updates

USAID team news Travel: ITA approval POC change at HQ Updated Policies and Procedures doc (Liz - attachment) Summer Jam/Mainz meeting cancelled, implications for other meetings? Updated PMAC attendance guidance

- 2. GHSA and semi-annual reports (David attachment)
- 3. Mission communications round-up (All)
- 4. Outbreak updates (All)
- 5. EPT partner coordination updates (Billy)

SEAOHUN Fellowships (applications close on March 31): https://drive.google.com/drive/folders/0B41JwMG3h9DQMEpteWFaUIFTYzA

6. Operations Team updates:

Surveillance (Chris)

Lab (Tracey & Simon)

Behavior (Leilani & Karen)

M&A (Peter)

Capacity (Woutrina)

IM (Damien)

EHP (Jon, Karen/Eddy, Brian)

- 7. Global Virome Project update? (Peter/Eddy)
- 8. Other recent meeting updates?

- CUGH updates?
- GHSA Global Conference in Kampala, October 2017?
- WDA?

Standing Items: Related grant proposals or conferences, publications updates?

On Mon, Mar 20, 2017 at 3:55 PM, David J Wolking <<u>djwolking@ucdavis.edu</u>> wrote: Hi there,

Just a reminder about this week's PREDICT EB call: Wednesday March 23, 2017 @ 9:00AM PDT/12:00PM EDT.

The call-in information is the same as always: REDACTED Access code: REDACTED

I'll follow-up with an agenda shortly, so please feel free to share any items for discussion.

David

Sent: 05/22/2017 11:15:44 AM (-07:00) "Peter Daszak" <daszak@ecohealthalliance.org> To: "Alice Latinne" < latinne@ecohealthalliance.org>; "Molly Turner" Cc: <turner@ecohealthalliance.org>; "predict@ucdavis.edu" <predict@ucdavis.edu>; "Christine Kreuder Johnson" <ckjohnson@ucdavis.edu>; "Tracey Goldstein" <tgoldstein@ucdavis.edu>; "Dr. Melinda Rostal" <rostal@ecohealthalliance.org> Subject: Re: [predict] RE: Cote d'Ivoire Great -- thanks, On Mon, May 22, 2017 at 10:57 AM, Peter Daszak < daszak@ecohealthalliance.org > wrote: Thanks for doing this Jonna and glad it went ahead without too many issues. I'll go through all of these with folks here and start setting up calls. One of the issues is IPC's selection of a country coordinator – it seems we need to rapidly get involved in that selection process, so I'll work on that also. Cheers, Peter **Peter Daszak** President EcoHealth Alliance 460 West 34th Street – 17th Floor New York, NY 10001

on behalf of "Jonna Mazet" <jkmazet@ucdavis.edu>

REDACTED

From:

+1.212.380.4473 (direct)

+1.212.380.4465 (fax)

www.ecohealthalliance.org

EcoHealth Alliance leads cutting-edge research into the critical connections between human and wildlife health and delicate ecosystems. With this science we develop solutions that promote conservation and prevent pandemics.

From: REDACTED On Behalf Of Jonna Mazet

Sent: Monday, May 22, 2017 1:09 PM **To:** Peter Daszak; Alice Latinne; Molly Turner

Cc: predict@ucdavis.edu; Christine Kreuder Johnson; Tracey Goldstein; Dr. Melinda Rostal

Subject: Cote d'Ivoire

Hi EHA CdI team,

Here are my notes from meeting this morning with Zandra and the Mission, as well as Andrew & Alisa:

- Mission's primary concern is that we not disrupt any progress that they "finally" have going there
- Therefore, they prefer that we maintain the Institute Pasteur Cote d'Ivoire (IPC) relationship -- it took IPC quite a long time to get their mechanisms in place to distribute funds to be able to go into the field, etc., so there was a lot of discussion that we don't want anything to disrupt that
- Mission is very happy with IPC and PI, Prof Mireille Dosso < REDACTED >. They credit success in getting on track recently with organization and clout of Prof Dosso.
- To that end, I reassured that we would maintain the existing subaward with Metabiota to IPC and flow funds through that mechanism, while starting the subaward process between IPC and EHA. That means we will need to work with Metabiota to process invoices until the EHA subaward is finalized **AND** IPC goes through their same procedures to move money through the new mechanism with EHA. We'll see how everything goes, but it may be most prudent to plan for an Oct. 1 start date on the new subaward to allow you to work with IPC for a while and determine your optimal scope and associated budget. Another option would be to start an identical sub to the one that is in place now, but I'm not sure how that will all work out if we have two awards with the same scope in existence at the same time. I'll leave those to discussions with your people and Liz on our end
- There are two approved subs with Metabiota: IPC & LANADA (animal side)
- IPC is currently doing a recruitment for a Country Coordinator
- Zandra is very pleased to be working with Peter, so Peter, you're going to need to be an active presence over the next few months -- calls & trips, included (I don't think it would be prudent to mention selection of another global lead in the near term until everything is moving smoothly. Both Andrew and Zandra asked for someone who is well-versed in PREDICT to be their contact and in charge of country management. They are excited to have Alice as the country liaison because of her native French and recent experience with other countries.)
- She expecting a call with you (Peter & Alice) and Karen by next week, so you all need to set that up. I'll also tell Karen to expect a reach out from you on logistics
- Zandra is currently receiving weekly bullets to keep her informed in CdI from MB and would like to see that continued, at least in the short-term. She also speaks with the IPC team regularly. She's happy

with current information flow at the moment, so you should definitely get all of those details from Karen

- There also appears to be an "Activities Calendar" about which Zandra was asking if there would be any changes -- expect that to be a discussion point when you have your transition call
- There is apparently a country launch for all of the projects soon (this week?), and Zandra mentioned that it is good that all activities in-country, to-date, have been "branded" as "PREDICT" (not a partner institution). She mentioned that it will be important to keep that going for smooth transitions and future operations. So, we'll need to keep the EHA image to a minimum -- PREDICT first, and IPC next if implementing partner is discussed in-country
- Branding and Marking was a point of discussion. I explained that the Predict logo was approved at start of Cooperative Agreement, and that is what will be used for all official communications (unless USAID/DC directs us differently). She was fine with that, but discussion re-iterates that we need to be careful with logos and use the approved versions in CdI (she's watching)
- Interim country coordinator while IPC does their recruitment is:

Dr Kalpy Julien COULIBALY, MD, MSc FS, PhD

Médecin Microbiologiste / Chargé de Recherche

Chef de Département Environnement et Santé (Intérim)



Ball is in your court now -- I'll speak with Eddy about it tomorrow morning and Karen & Eddy again on Wednesday morning. So if you can set up a call with them at the end of the week and with the Mission end of this or beginning of next week, that would be optimal.

Have a good day,

Jonna

From: "William B. Karesh" <karesh@ecohealthalliance.org>

Sent: 06/12/2017 11:36:39 AM (-07:00)

To: "Tracey Goldstein" <tgoldstein@ucdavis.edu>

"sja2127@cumc.columbia.edu" <sja2127@cumc.columbia.edu>; "predict@ucdavis.edu" <PREDICT@ucdavis.edu>;

"Jonna Mazet" REDACTED

Subject: Re: [predict-coordinators] Global corona paper published in Virus Evolution

Nice work. COngrats to all!!

BK

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

EcoHealth Alliance 460 West 34th Street - 17th Floor New York, NY 10001 USA

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President, OIE Working Group on Wildlife

Co-chair, IUCN Species Survival Commission - Wildlife Health Specialist Group

EPT Partners Liaison, USAID Emerging Pandemic Threats - PREDICT-2 Program

EcoHealth Alliance leads cutting-edge research into the critical connections between human and wildlife health and delicate ecosystems. With this science we develop solutions that promote conservation and prevent pandemics.

On Jun 12, 2017, at 2:31 PM, Tracey Goldstein < tgoldstein@ucdavis.edu > wrote:

Dear PREDICT team,

Please see attached, our collective paper "Global patterns in coronavirus diversity" was published in Virus Evolution today. Please forward to your teams. Congratulations to all on the great work you do on the PREDICT project.

Best, Tracey and Simon

Tracey Goldstein, PhD One Health Institute School of Veterinary Medicine

University of California
Davis, CA 95616
Phone: (530) 752-0412
Fax: (530) 752-3318
E-mail: tgoldstein@ucdavis.edu

<Anthony et al., 2017 Global patterns in coronavirus diversity.pdf>

From: "Christine Kreuder Johnson" <ckjohnson@ucdavis.edu>

Sent: 09/29/2017 5:00:09 PM (-07:00)

To:"Corina Grigorescu Monagin" <cgmonagin@ucdavis.edu>; "Jonna Mazet" <jkmazet@ucdavis.edu>; "William Karesh" <karesh@ecohealthalliance.org>; "Tracey Goldstein" <tgoldstein@ucdavis.edu>

Cc: "David John Wolking" <djwolking@ucdavis.edu>; "predict@ucdavis.edu"

<predict@ucdavis.edu>; "Kidan Araya" <karaya@ucdavis.edu>

Subject: Re: Opportunity to Provide Feedback on M&E of Global Action Plan on AMR

Hi Corina – We're likely all of a similar perspective but it looks like there is high level of detail requested in the consultation response and I don't think we'll do this justice at this point, given all else and its due tomorrow Geneva time. I think not a priority for us because the request was really targeted to those who will be accountable for the GAP response and its their input that's most needed.

Meanwhile back to our own M&E.

/ckj

From: Corina Grigorescu Monagin <cgmonagin@UCDAVIS.EDU>

Date: Friday, September 29, 2017 at 9:32 AM

To: Christine Kreuder Johnson < ckjohnson@UCDAVIS.EDU>, Jonna Mazet < jkmazet@ucdavis.edu>, Billy

Karesh karesh karesh@ecohealthalliance.org, Tracey Goldstein karesh@ecohealthalliance.org)

Cc: David John Wolking djwolking@ucdavis.edu, "predict@ucdavis.edu" predict@ucdavis.edu, Kidan

Araya <karaya@ucdavis.edu>

Subject: Re: Opportunity to Provide Feedback on M&E of Global Action Plan on AMR

HI everyone,

I'm sorry for the delay. Can everyone take a quick look and write some comments and I will collate together?

Thanks corina

From: Chris Kreuder Johnson < ckjohnson@UCDAVIS.EDU>

Date: Friday, September 22, 2017 at 3:30 PM

To: Corina Grigorescu Monagin <cgmonagin@UCDAVIS.EDU>, Jonna Mazet <jkmazet@ucdavis.edu>, William

Karesh < karesh@ecohealthalliance.org>, Tracey Goldstein < tgoldstein@ucdavis.edu>

<karaya@ucdavis.edu>

Subject: Re: Opportunity to Provide Feedback on M&E of Global Action Plan on AMR

Hi Corina and everyone,

Thanks for passing along, great to see the tripartite tackling this together. Initial thoughts are there could be more emphasis for M&E on the environmental aspects of AMR, especially with respect to commensal bacteria and potential reservoirs of AMR/AMGs in the environment (e.g., water, soil/sediment). That'd be critical to monitor alongside animal and human usage and patterns in resistance - if missed, that would be problematic for the evidence base.

Seems like we have an opportunity for input on behalf of EPT, as well as one response per institution – so how would we like to handle this?

/ckj

From: Corina Grigorescu Monagin <cgmonagin@UCDAVIS.EDU>

Date: Monday, September 18, 2017 at 9:27 AM

To: Jonna Mazet <jkmazet@ucdavis.edu>, Billy Karesh <karesh@ecohealthalliance.org>, Christine Kreuder Johnson <ckjohnson@UCDAVIS.EDU>, Tracey Goldstein@ucdavis.edu>

Cc: David John Wolking djwolking@ucdavis.edu">djwolking@ucdavis.edu, "predict@ucdavis.edu" predict@ucdavis.edu, Kidan Araya karaya@ucdavis.edu>

Subject: FW: Opportunity to Provide Feedback on M&E of Global Action Plan on AMR

Hi all,

This might be of interest for someone to quickly review these indicators related to AMR...it's our chance for input.

Thanks corina

From: Amy Pekol <pekol@umn.edu>

Date: Monday, September 18, 2017 at 8:58 AM

(AGAH)" < REDACTED , Corina Grigorescu Monagin <cgmonagin@UCDAVIS.EDU>, David J

Wolking djwolking@ucdavis.edu, "Gass, Jonathon D" <Jonathon.Gass@tufts.edu>

Subject: Opportunity to Provide Feedback on M&E of Global Action Plan on AMR

Dear EPT2 M&E team,

Below is an opportunity to provide feedback on a tripartite (WHO with FAO and OIE) M&E plan for the Global Action Plan on AMR. Some of you may already be familiar with this or engaged in this effort.

I'm sharing in case you're interested in jointly submitting feedback on behalf of EPT2 or doing so through your individual institutions. At the very least, you may be interested in reviewing their proposed indicators as there is some alignment with our EPT2 indicators. Indicators are listed in Annex 3 of the draft proposed approach document available for download here.

Best, Amy

----- Forwarded message -----

From: WHO AMR Secretariat < REDACTED

Date: Mon, Sep 18, 2017 at 3:35 AM

Subject: Deadline reminder: Consultation on Tripartite Monitoring and Evaluation (M&E) approach to GAP on

antimicrobial resistance

To: AMRACTIONPLAN@listserv.who.int

Dear Colleagues

We wanted to remind you that the deadline for submission to Consultation on Tripartite Monitoring and Evaluation (M&E) approach to the global action plan on antimicrobial resistance is **30 September 2017**. Please find below more information on the ongoing consultation.

The Global Action Plan (GAP) on Antimicrobial Resistance (AMR) sets out responsibilities for national governments, for the World Health Organization (WHO), the Food and Agriculture Organization of the United Nations (FAO) and the World Organisation for Animal Health (OIE), as well as for other national and international partners in responding to AMR. To ensure action is being taken in response, and to evaluate whether those actions are achieving the intended results, monitoring and evaluation (M&E) is required. Therefore, the "One Health" tripartite organisations – WHO, FAO and OIE – have come together to develop a joint M&E approach, which will cover both:

- a) Monitoring the process of GAP implementation and evaluating the process to identify how to improve implementation
- b) Monitoring and evaluating the results in terms of expected outcomes and impact on AMR.

The consultation is now available at <u>here</u>.

This online consultation is seeking views and advice on the proposed M&E approach from representatives of country governments and organisations with a technical or managerial remit related to national and international responses to AMR, including private sector, industry bodies, research institutions and civil society. It is requested that one representative from each institution submit a response on behalf of the organization as a whole, rather than as an individual. To do this, we strongly encourage each organization to conduct an internal consultation process first, and then nominate one individual to enter the approved, collective response.

The contributions received will be considered in finalising the draft M&E approach and indicators. Please note that the plan is to publish feedback online and attribute contributor responses to the relevant institutions (not to individuals). We will not be providing individual responses to contributor feedback.

This consultation is open until 17:00 (Geneva time) on 30th September 2017.

For any further information, please contact the WHO AMR Secretariat that will link with FAO and OIE when relevant at REDACTED

Best regards WHO AMR Secretariat

To unsubscribe from the AMRACTIONPLAN list, click the following link: http://listserv.who.int/scripts/wa.exe?TICKET=NzM2NjIwIHd1ZWJiMDAyQFVNTi5FRFUgQU1SQUNUSU90UExBTv8dwBFC6889&c=SIGNOFF

From: REDACTED

Sent: 10/05/2017 4:14:37 PM (-07:00)

Cc: "Catherine Machalaba" <machalaba@ecohealthalliance.org>; "William B. Karesh"

<karesh@ecohealthalliance.org>; "Jonna Mazet" <jkmazet@ucdavis.edu>

Subject: Notes & next surveillance call Thurs, Oct 12th @10am PT/1pm ET

Attachments: 9.28.2017 surveillance call notes.docx, Surveillance and Testing Timelines & Priorities

v5Oct2017.pptx

Hi Surveillance Team,

Please find attached notes from our last call and updated surveillance & testing priority guidelines slides.

Our next call is <u>Thursday</u>, Oct 12th, 2017 @ 10am PT/1pm ET – we'll circulate an agenda closer to that time, but as always please let me know if you have any items to discuss.

Action Items and Reminders for next call:

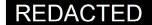
- 1. Deadline to get data into EIDITH for Y3 annual report is Oct 15th
- 2. Africa country updates on next call; field and lab activities updates, GHSA highlights, zoonotic disease prioritization workshops, update on data entry and any hurdles/concerns.

Thank you!



REDACTED

Research Associate
Emerging Pandemic Threats PREDICT Project
EpiCenter for Disease Dynamics
One Health Institute
UC Davis School of Veterinary Medicine



skype: REDACTED

Sept 28th, 2017 Surveillance Team Call

Action Items and Reminders for next call:

- 1. Deadline to get data into EIDITH for Y3 annual report is Oct 15th
- 2. Africa country updates on next call; field and lab activities updates, GHSA highlights, zoonotic disease prioritization workshops, update on data entry and any hurdles/concerns.

Participants: Dan O'Rourke, Dave McIver, Damien Joly, Matt LeBreton, Leilani Francisco, Emily Hagan, Alice Latinne, Leti Guttierez, Allison White, Mindy Rostal, Sarah Olson, Carolina Churchill, Megan Vodzak, Kirsten Gilardi, Tracey Goldstein, Marcy Uhart, REDACTED

Terra Kelly, David Wolking, Chris Kreuder Johnson

Surveillance & testing priorities

- Following the NY meeting, we wanted to review the expectations USAID has for PREDICT and provide clear direction around what we intend to accomplish by the end of the project. Please see attached PowerPoint slides for surveillance & testing priority summaries. If any exceptions to the surveillance and testing priority guidelines are needed, please bring these up to our team so we can discuss on surveillance call. Some additional notes:
 - The most critical aspect is our expectation to have at least one year of human and two years of wildlife sampling at a minimum in every country. USAID expecting us to start all activities by Oct 1 if there are any issues reaching this target beyond what we have already discussed and noted in our surveillance tracking, please let us know.
 - Sample collection from syndromic patients remember that we want to make sure we are collecting samples within a window of time that patients are likely shedding viruses. If we collect samples 10 days after first clinical signs, the likelihood of any sample type being positive for virus is very low. Please ensure teams are checking when samples were collected compared to when the patient experienced first got sick to check whether those samples are worth testing.
 - o Oral and rectal swabs are prioritized to maximize pathogen detection and discovery and are the minimum samples we plan to test from animals and humans.
 - o If, however, we have met all the requirements (sampling for at least one year in two seasons) and think we've reached saturation on virus discovery or have found no positives at all, we can expand testing to other high priority samples.
 - o Prioritizing testing for laboratories = ongoing outbreak > sick humans > apparently healthy humans > animals. We are on a rapid timeline for reporting any findings relevant to public health.
- Q: Are we having good success collecting rectal swabs/fecal samples in hospitals/communities, do we have to collect this sample? Teams that have prioritized this are having good success one successful method is teams ask individuals to collect the rectal swabs themselves or teams can come back the following day to collect fecal samples. If they cannot get rectal swabs or fecal samples, we should collect and test the sample that most reflects likelihood of shedding and virus transmission at the animal-human interface. However, please try to get either rectal swabs or fecal samples wherever possible.

NY meeting debrief

- As a follow up on some items discussed at the NY meeting, UCD is developing a centralized
 checklist which will include things we should be checking in on with our teams on a regular basis.
 It might be helpful with ramping up and onboarding new staff who need to jump in at this later
 stage of the project. We will circulate to surveillance team in case useful for sharing more widely.
- A gentle reminder to please be sure to filter down information discussed at these meetings as well as surveillance calls to in-country partners so that they are following through with the decisions we make.

Human questionnaire, livelihoods, and status starting human work

• The wildlife market/trade module in the human questionnaire has questions relevant to people with livelihoods as livestock traders/sellers. We should prioritize at risk individuals with exposure to the wildlife markets, but if we enroll individuals with livestock trade exposure, they should also be asked to fill out this module. We will not change the name of the module but will be updating the instructions to interviewers. Livestock producers will still be asked to fill out the animal production module as before.

Human sample and specimen ID alignment

Q3 in the sick person module asks to list all the specimens collected from a patient, and we also
enter all this information into the specimen forms, as a way to double check and have a hard
copy in case there any issues down the line. We hope to add these extra measures to ensure we
maintain a link from specimens to the human questionnaire, even in situations in which
additional samples are collected during a patient's stay at a hospital. IM team is working on a
solution where teams will likely be able to print barcode stickers that will also be helpful for
keeping human samples and questionnaires aligned.

Concurrent sites

• Concurrent site labels are live in EIDITH, and a map specifically for concurrent sites in EIDITH is in development (the map in EIDITH currently shows taxa sampled at site/event level). Teams entering new data will need to select the concurrent site label when adding an event, so the maps may be helpful as we've labeled all sites sampled from the beginning of PREDICT-2 retrospectively.

Events to track community engagement/sensitization

• To help with monitoring & evaluation (M&E) reporting, we've identified need to track and capture community engagement/sensitization meetings & activities. While some teams are tracking this already in quarterly partner updates and other reports, we would like to collect this data in a centralized way through EIDITH. IM team will provide guidance on this when it is available.

Deadline to get data into EIDITH for Y3 annual report is Oct 15th so please get your surveillance data in as soon as possible so that your impressive work and amazing progress is reflected in our annual report.

EIDITH indicator update

Indicator	Total	NewInLast2Weeks
# countries with data	30	0
# animals sampled	45333	1141

Page 2 of 4

3491	118
244148	7293
119506	3690
13112	
822	
21638	
1063	
764	
472	
84	
70	
68	
140	
	244148 119506 13112 822 21638 1063 764 472 84 70

Asia country updates; field and lab activities updates, GHSA highlights, zoonotic disease prioritization workshops, update on data entry and any hurdles/concerns.

Mongolia – Quarterly updates going out regularly. Performed avian necropsies. Recently updated trainings in EIDITH as well as outbreak contact sheets. Data release pending laboratory discussions on who will do subtyping and interpretations from UCD.

Viet Nam – Recently sampled in Dong Nai, 500 animals breeding in wildlife farms. In Ha Noi, collected 15 community samples from wildlife restaurants; ongoing testing of bat samples; tested 100 sari samples for corona- & paramyxoviruses.

Myanmar -- Wet season surveillance began in July, n~500 samples from NHPs. In Hpa-an collaborated with FAO for duck, pig and goat surveillance. Getting approvals to send samples to Cambodia and UCD. Did not receive invite to first JEE meeting, may get invite to 2nd. Human testing lab partners (DMR) completed training at UC Davis in Sept. Will begin sampling again in Nov/Dec for sampling for dry season. Completed animal and human sampling for Y3.

Cambodia – 615 bat and 413 rodent samples screened for Corona, Hanta and Rhabdo viruses. 181 human samples for Alpha, Influenza, Flavi, Filo, Hanta and Rhabdo. Y3 sampled humans (385), bats and rodents (total 1835), livestock (1140), and other domestic animals (108). Completed testing of Y2 samples. Completed animal and human sampling for Y3.

Laos PDR – recent trip collected rodent and bat samples; desensitization meetings in a village for community surveillance, training at the end of the month for hospital and community work. Working through 750 tests done in last few weeks. Received government approval for first batch of results. Completed animal sampling for Y3.

Indonesia – Trip in Aug/Sept sampled 200 bats and 171 rodents. IRB approved, human sampling starting first week of Oct in community and hospital.

Thailand —Testing almost complete for all y3 samples, EIDITH is up to date for all events and specimens. Syndromic surveillance 57 patients enrolled and 52 samples have been tested.

Malaysia – sampled 749 wild animals in Peninsular, 965 in Sabah in Y3. Domestic animals being sampled in PM at Orang Asli sites: dogs, goats/sheep mostly No human sampling until new IRBs in place.

Bangladesh —Lab testing ongoing, 192 bat samples tested for 5 viral families. Sampled camels and sheep at farms and markets. All field surveillance data is in EIDITH, test result data all in EIDITH — interpretation pending. Received local IRB approval for human work.

China – Collected samples from 227 rodents and 918 bats in Y3. Bat and rodent samples collected in Y2&3 currently being tested for 5 viral families. IRB approved; conducted first human surveillance trip from September 24-30th. Government approved release wildlife results.

India – FAO not able to do livestock work in Uttar Pradhesh. Good mission communications on a regular basis. IRB approved by UCD, human surveillance to begin in Oct. Local IACUC finalized, sampling to begin in Oct.

Nepal – Completed sampling at temporary settlement which includes triangulated surveillance of 100 people, rodents, & macaques. Syndromic ongoing at PAHS and Chitwan Med Center. Silinge community sampling (animal and human) cancelled due to mudslide.

Next Call
Thursday, Oct 12th, 2017
@ 10am PT/1pm ET

• Timeline • We expect some countries will achieve 3 full years of wildlife sampling, 2 full years for humans at our target sample sizes • For new countries that were late to start surveillance, the minimum is 2 full years animals & 1 full year humans at our target sample sizes • We need to complete field activities and sample/data collection by the end of year 4 in order to meet testing and risk characterization goals

Testing Priorities

- Priority sample types to test (by PCR) at minimum:
 - <u>Animals</u>: oral swab & rectal swab, include blood and urine as budget allows and transmission interface suggests
 - <u>Humans in community</u>: oral swab & rectal swabs, include blood and urine as budget allows
 - <u>Symptomatic humans</u>: oral swab and rectal swab, + additional specimen of clinical relevance based on symptoms (samples prioritized for testing should be collected within 5 days of onset of clinical signs and not more than 10 days after onset of clinical signs)
 - Everyone should collect the full set of samples on all animals and humans per our protocols, including whole blood and serum, to allow re-prioritization based on positive samples and for serological testing
- Order of testing priority for humans = samples from outbreaks > sick humans > apparently healthy humans > animals

"Peter Daszak" <daszak@ecohealthalliance.org> From: 11/09/2017 2:13:04 PM (-08:00) Sent: "Carlos Zambrana-Torrelio" <zambrana@ecohealthalliance.org>; "Kirsten Gilardi" To: <kvgilardi@ucdavis.edu> REDACTED "Jonna Mazet" <jkmazet@ucdavis.edu>; "Benard Ssebide" Cc: "Aleksei Chmura" <chmura@ecohealthalliance.org>; "Erica Johnson" <johnson@ecohealthalliance.org>; "Evelyn Luciano" < luciano@ecohealthalliance.org>; "Mike Cranfield" REDACTED RE: Deep Forest Uganda Subject: Yes – sorry everyone – forget to send round the great news that we have a bunch more time to work on this application! Cheers, Peter Peter Daszak President **EcoHealth Alliance** 460 West 34th Street – 17th Floor New York, NY 10001 Tel. +1 212-380-4473 www.ecohealthalliance.org EcoHealth Alliance leads cutting-edge research into the critical connections between human and wildlife health and delicate ecosystems. With this science we develop solutions that prevent pandemics and promote conservation. **From:** Carlos Zambrana-Torrelio [mailto:zambrana@ecohealthalliance.org] Sent: Thursday, November 9, 2017 4:03 PM To: Peter Daszak; Kirsten Gilardi Cc: Jonna Mazet; Benard Ssebide; Aleksei Chmura; Erica Johnson; Evelyn Luciano; Mike Cranfield Subject: Re: Deep Forest Uganda Hi Kirsten. Thanks for your email. The deadline for this grant has been changed to January 23rd, so we have a few more weeks. We will back to you after Thanksgiving with a more structured plan. In the meantime, please let us know if you have any comments to the reviewer comments. Best, Carlos

Carlos Zambrana-Torrelio, PhD

Associate Vice President, Conservation and Health

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EcoHealth Alliance leads cutting-edge scientific research into the critical connections between human and wildlife health and delicate ecosystems. With this science, we develop solutions that prevent pandemics and promote conservation.--

On Nov 9, 2017, 3:56 PM -0500, Kirsten Gilardi kvgilardi@ucdavis.edu, wrote:

Hey Peter, checking in with you on this.... Deadline for this grant proposal is in a couple of weeks, yes? Are you still interested in implementing in Uganda? Might Benard be able to take advantage of grant funding to support PhD enrollment and research? What do you need from us? -Kirsten

On Oct 24, 2017, at 9:57 AM, Peter Daszak < daszak@ecohealthalliance.org > wrote:

Great to hear back Kirsten.

I think we can do this – depending on budget needs. There are some NSF rules that we can't fund Ph.D tuition in foreign countries, but I'll check on these and there are simple work-arounds, e.g. by using NSF funds towards his salary and field costs etc.

Bottom line – it would be great to involve you all and support Benard's work. I'm happy to join a committee if you think that's helpful, also, but bear in mind we might not get the grant, of course!!

We'll continue working on the draft, and get details on potential budgets, forms required etc. over to you by Monday next week.

Cheers,

Peter

Peter Daszak

President

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From: Kirsten Gilardi [mailto:kvqilardi@ucdavis.edu]

Sent: Tuesday, October 24, 2017 10:52 AM

To: Peter Daszak; Jonna Mazet

Cc: Benard Ssebide; Carlos Zambrana-Torrelio; Aleksei Chmura; Erica Johnson; Evelyn Luciano; Mike Cranfield

Subject: Deep Forest Uganda

Importance: High

Hi Peter and Jonna:

Benard and I had a good discussion on this today, and he's definitely interested in participating in Deep Forest research again in Uganda, assuming that the grant could support his enrollment in a PhD program at Makerere University in Kampala — possible?

The upshot here is that he was working closely with Julius Lutwama (UVRI Arbovirology Lab Director and our lab partner for PREDICT Uganda — an exceptional person) on a joint Makerere University-UVRI proposal to the Wellcome Trust for graduate fellowships: the draft proposal outlined five graduate fellowships, of which one was for Benard to conduct EID-related research. Makerere ended up putting forward just two fellowship proposals (one on bioinformatics and the other on vector ecology), so that potential source of support for Benard has dried up (in fact, not even sure the two got funded...).

THAT SAID, Benard still has the mentoring support of Julius L. as well as a potential faculty mentor at Makerere U. who knows about Benard's involvement and experience with PREDICT, and who has been encouraging him to take advantage of the opportunity to work on at least a subset of PREDICT Uganda data for a portion of his PhD. Benard expressed his strong wishes to me today that he might benefit from the guidance of you Jonna or other UCD PREDICT leads (Chris and/or Tracey) on his dissertation work, if he were to delve into PREDICT data...

So if new funding for Deep Forest work in Uganda could support Benard in a PhD program at Makerere, that would be <u>exciting</u>. The in-country partner would need to be UVRI or Makerere (Benard can advise), as he would have to step away from his position at Gorilla Doctors to enroll in a PhD program.

What are next steps?

-Kirsten

Begin forwarded message:

From: Peter Daszak < daszak@ecohealthalliance.org>

Subject: Time Sensitive!! Resurrecting our Coupled Natural-Human Systems proposal to NSF on

DEEP FOREST

Date: October 17, 2017 at 12:05:17 PM PDT

To: "Jonna Mazet (jkmazet@ucdavis.edu)" <jkmazet@ucdavis.edu>, "kvgilardi@ucdavis.edu"

<kvgilardi@ucdavis.edu>

Cc: Carlos Zambrana-Torrelio < <u>zambrana@ecohealthalliance.org</u>>, Aleksei Chmura < <u>chmura@ecohealthalliance.org</u>>, Erica Johnson < <u>johnson@ecohealthalliance.org</u>>, Evelyn Luciano < <u>luciano@ecohealthalliance.org</u>>

Hi Jonna and Kirsten – a few years ago we submitted a DEEP FOREST proposal to NSF CNH and got semi-decent comments back. We'd like to resurrect it and would like to keep the current focus on DEEP FOREST countries. The plan is to use the DF data from Brazil, Uganda and Malaysia as the basis, but ditch Brazil as a country we're going to continue to work in so that the continued fieldwork will be in Malaysia and Uganda.

The deadline is Nov 21st. Carlos is pulling together the draft and the response to reviewers (reviewer comments attached).

I want to first check with you both that you are interested in doing this – I definitely think it's worth a shot considering the fairly positive reviewers' comments. If so, we'll need to rapidly line up all the paper work, budgets, etc. I've cc'd Carlos and Evelyn who will be able to coordinate.

Hope you'll be part of this and looking forward to getting this grant funded!

Cheers,

Peter

Peter Daszak

President

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From: William B. Karesh karesh@ecohealthalliance.org

To: Kirsten Gilardi <kvgilardi@ucdavis.edu>

CC: Jonna Mazet <ikmazet@ucdavis.edu>;PREDICT-outbreak predict-outbreak@ucdavis.edu>

Sent: 6/26/2018 9:17:42 PM

Subject: Re: [predict-outbreak] Re: Head's up re. Rwanda Agriculture Board request re. RVF

Jonna and Brian's comments sound sound. Let me know if you'd like me reach out to Subhash or Yilma tomorrow to help expedite decision making.

BK

Sent from my iPhone

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

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Co-chair, IUCN Species Survival Commission - Wildlife Health Specialist Group

EPT Partners Liaison, USAID Emerging Pandemic Threats - PREDICT-2 Program

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On Jun 27, 2018, at 12:13 AM, Kirsten Gilardi kvgilardi@ucdavis.edu wrote:

Thanks Jonna... I'll wait to see what Julius comes back with...

On Jun 26, 2018, at 6:14 PM, Jonna Mazet < jkmazet@ucdavis.edu> wrote:

Sounds good, but we do have outbreak funds available to purchase the extra kits if your current supply can support testing while an additional order is placed.

J.

On Tue, Jun 26, 2018 at 3:53 PM, Kirsten Gilardi kvgilardi@ucdavis.edu> wrote: Jonna, David, and Brian:

The head of the Rwanda Agriculture Board's veterinary services division, Dr. Isidore Gafarasi, has asked Julius/PREDICT to provide RAB with extraction kits to process approximately 150 samples collected from livestock as part of the RVF oubreak investigation.

Julius is going to check our in-country stock and let me know if this would significantly impact our ability to continue to process PREDICT human and wildlife samples (as you know, we have little to no funding to spend on any additional supplies between now and Sept 30, so my guess is that it will).

BUT also: there is some lack of clarity around FAO's response to requests for assistance from RAB: it's not clear whether that have responded and said no, or have simply not yet responded to the request.

Before we run RAB's request up the chain for approval or no approval, I want to first find out if FAO has been approached and what their response has been (officially). If they have simply not replied, I think I would like to ask Lisa Kramer to re-send a message to FAO (that she has already sent) asking if they are in a position to assist the Govt of Rwanda with the RVF oubreak investigation, before we make the decision to forward Gafarasi's request up our PREDICT chain of command...

Please share your thoughts,

Kirsten

From: predict-outbreak-request@ucdavis.edu on behalf of "William B. Karesh"

<karesh@ecohealthalliance.org>

 Sent:
 07/05/2018 3:02:24 PM (-07:00)

 To:
 "Beth Edison" ← REDACTED

Are these real? I've seen other "wetransfer" trofans or phishing scams.

BK

Sent from my iPhone

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

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On Jul 5, 2018, at 1:22 PM, Beth Edison < REDACTED > wrote:

predict-outbreak@ucdavis.edu,

you have received files and its availabe for download

Download Files

Please take a moment to review files sent to you.

Thank You

WeTransfer Team

This email and any attached files may contain confidential and/or privileged information. It is intended solely for the addressee(s) predict-outbreak@ucdavis.edu.

From: "David J Wolking" <djwolking@ucdavis.edu>

Sent: 07/20/2018 3:14:01 PM (-07:00)

To: "William Karesh" <karesh@ecohealthalliance.org>

REDACTED

Subject: Re: Roster of P2 country leads for GHSA meetings

Got it, thanks! if you have an email I'll drop it in and wrap that one up.

D

On Fri, Jul 20, 2018 at 3:09 PM William B. Karesh karesh@ecohealthalliance.org> wrote: RoC is Dr Jean-Vivien Mombouli. Director General, Laboratoire National de Santé Publique, Brazzaville, RoC.

Sent from my iPhone

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

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On Jul 20, 2018, at 5:25 PM, David J Wolking < diwolking@ucdavis.edu > wrote:

Thanks Billy,

Chris - attaching the latest I have with Charles listed for DRC.

Billy, I still don't have a country contact for RoC so it just lists you and Anne.

D

On Fri, Jul 20, 2018 at 12:35 PM William B. Karesh < <u>karesh@ecohealthalliance.org</u>> wrote: Good to share. It can only help to get their names out there. But, US does not invite country reps, that's done by local government hosts.

We've been looking at upcoming GHSA events in countries and then letting WHO know about our folks so they can suggest from their end. Then, the local organizers have to be contacted to get our folks invited. For GHSA related meetings, they often do not select people based on projects but by areas of expertise, so that can actually help us

BK

Sent from my iPhone

William B. Karesh, D.V.M

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On Jul 20, 2018, at 12:19 PM, David J Wolking diwolking@ucdavis.edu wrote:

Hey there,

No concerns on my end, our list has both global leads and country coordinators/leads so is pretty comprehensive. If we can emphasize including both (US and locally-based contacts) that would be great and help avoid any missed opportunities since a lot of our country folks are in the field through the end of September to wrap up work.

Billy - any reason not to share? If OK, I'll make sure we have the latest (there was a recent change in DRC I don't think is reflected yet) and I can get to you Chris later today....

D

On Fri, Jul 20, 2018 at 9:15 AM Christine Kreuder Johnson < ckjohnson@ucdavis.edu wrote:

Hi David,

I was hoping we could share our list of P2 country coordinators (and global PoC) with Amy Nagy who is the GHSA Program Officer at US Department of State. She's been working with WHO to identify individuals to invite to the disease prioritization and JEE workshops and was interested in who we thought would bring expertise in zoonotic disease for those countries still going through this process.

I know you and Billy have already done a lot on this front so let us know if you have any thoughts or concerns – if not, please send me the latest list and I will follow up.

Thank you,

Chris

<PREDICT Contact List (7.20.18).xlsx>

From: "Christine Kreuder Johnson" <ckjohnson@UCDAVIS.EDU>

Sent: 07/20/2018 5:16:03 PM (-07:00)

To: "David John Wolking" <djwolking@ucdavis.edu>

Cc: "William Karesh" <karesh@ecohealthalliance.org>; "predict@ucdavis.edu"

Subject: Re: Roster of P2 country leads for GHSA meetings

Excellent, thanks all. Guessing this is one of many requests for a list of our amazing colleagues. Great to hear we are suggesting the P2 team on a couple fronts, maybe that will increase their chances of being involved. /ckj

From: David J Wolking <djwolking@ucdavis.edu>

Date: Friday, July 20, 2018 at 6:24 PM

To: David John Wolking <djwolking@ucdavis.edu>

Cc: Billy Karesh < karesh@ecohealthalliance.org >, Christine Kreuder Johnson < ckjohnson@UCDAVIS.EDU >,

"predict@ucdavis.edu" <predict@ucdavis.edu>, Jonna Mazet

REDACTED

Subject: Re: Roster of P2 country leads for GHSA meetings

Chris,

Please use this version, which now includes updated info for ROC.

David

On Fri, Jul 20, 2018 at 2:25 PM David J Wolking djwolking@ucdavis.edu wrote:

Thanks Billy,

Chris - attaching the latest I have with Charles listed for DRC.

Billy, I still don't have a country contact for RoC so it just lists you and Anne.

D

On Fri, Jul 20, 2018 at 12:35 PM William B. Karesh < karesh@ecohealthalliance.org > wrote:

Good to share. It can only help to get their names out there. But, US does not invite country reps, that's done by local government hosts.

We've been looking at upcoming GHSA events in countries and then letting WHO know about our folks so they can suggest from their end. Then, the local organizers have to be contacted to get our folks invited. For GHSA related meetings, they often do not select people based on projects but by areas of expertise, so that can actually help us

ВК

Sent from my iPhone

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

EcoHealth Alliance

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On Jul 20, 2018, at 12:19 PM, David J Wolking < djwolking@ucdavis.edu > wrote:

Hey there,

No concerns on my end, our list has both global leads and country coordinators/leads so is pretty comprehensive. If we can emphasize including both (US and locally-based contacts) that would be great and help avoid any missed opportunities since a lot of our country folks are in the field through the end of September to wrap up work.

Billy - any reason not to share? If OK, I'll make sure we have the latest (there was a recent change in DRC I don't think is reflected yet) and I can get to you Chris later today....

D

On Fri, Jul 20, 2018 at 9:15 AM Christine Kreuder Johnson <ckjohnson@ucdavis.edu> wrote:

Hi David,

I was hoping we could share our list of P2 country coordinators (and global PoC) with Amy Nagy who is the GHSA Program Officer at US Department of State. She's been working with WHO to identify individuals to invite to the disease prioritization and JEE workshops and was interested in who we thought would bring expertise in zoonotic disease for those countries still going through this process. I know you and Billy have already done a lot on this front so let us know if you have any thoughts or concerns – if not, please send me the latest list and I will follow up. Thank you,

Chris

From: "William B. Karesh" <karesh@ecohealthalliance.org>

Sent: 07/23/2018 10:18:47 AM (-07:00)

To: "Tracey Goldstein" <tgoldstein@ucdavis.edu>

Cc: "Brian Bird" <bhbird@ucdavis.edu>; "David Wolking" <djwolking@ucdavis.edu>; "Jonna Mazet"

REDACTED "Jim Desmond" <desmond@ecohealthalliance.org>

Subject: Re: Filovirus finding fact sheet

This is really good.

BK

William B. Karesh, D.V.M

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On Jul 23, 2018, at 11:37 AM, Tracey Goldstein < tgoldstein@ucdavis.edu > wrote:

Hi Billy,

Sorry we did send it out to Jim last week - missed you on the email.

Here you go, T

On Mon, Jul 23, 2018 at 8:00 AM, William B. Karesh karesh@ecohealthalliance.org wrote:

I might have missed the FAQ/briefing sheet that was going to be shared last week to help us in advance of the announcement on the 25th. Jon is out on parental leave so I just wanted to make sure I haven't missed something.

Also, I may be meeting with the US Ambassador in Congo/Brazzaville later this week and he

may be interested. Thanks !! BK

Tracey Goldstein, PhD One Health Institute School of Veterinary Medicine University of California
Davis, CA 95616
Phone: (530) 752-0412
Fax: (530) 752-3318
E-mail: tgoldstein@ucdavis.edu

<PREDICT FAQ-Sierra Leone new ebolavirus_updated_14july2018.docx>

From: Catherine Machalaba <machalaba@ecohealthalliance.org>

To: David J Wolking <djwolking@ucdavis.edu>

CC: William B. Karesh karesh@ecohealthalliance.org; Corina Grigorescu Monagin

<turner@ecohealthalliance.org>;Ava Sullivan <sullivan@ecohealthalliance.org>

Sent: 3/20/2019 12:08:23 PM

Subject: [predict] Re: Action required: 2019 Semi-annual Report due to UCD HQ April 5, 2019

Thanks David and Corina - we're on it!!!:)

Kind regards, Catherine

On Mar 20, 2019, at 3:00 PM, David J Wolking < djwolking@ucdavis.edu > wrote:

Hi there,

It's reporting season once again!

Global section:

I've attached the text from your section of the 2018 Annual Report for quick reference and to update as a template if you like. Remember the Semi-annual Report covers the 6 month period of performance (October 1, 2018-March 31, 2019), but in many cases we are showing life of project progress and achievements.

The deadline for EIDITH data entry for country teams is March 31. *Therefore, the deadline for submission of these semi-annual report sections is April 5, 2019.* Unlike the annual report we only have 30 days to turn this around for USAID and these now take a lot of design time. Typically the global section of these semi-annual reports is a more concise and abbreviated, so the deadline should be feasible. Here's a link to last year's semi-annual for quick reference.

Because we are now designing these report in InDesign, <u>please provide any figures</u>, <u>photos</u>, <u>etc.</u> as separate files with specific links in the text for ease of reference.

M&E Section:

The M&E data call is also for 6 months (October 1, 2018 – March 31, 2019). We've attached a clean workbook here for data entry. Most instructions are included on the template itself but please refer to the indicator reference sheet if you have questions (or reach out to Corina and I).

One Health (Billy/Catherine):

2B: Qualitative Indicator: Evidence of application of OH trainings and sensitization in the workforce; (country info captured in our questionnaire).

- 2.1b: #, list of publicly available educational, training, and/or implementation resources developed and shared (country info captured in our questionnaire and consult with Capacity Team)
- 3B: Qualitative Indicator: List of global, regional or country strategies under implementation (country info captured in our questionnaire).
- 3.2a: #, list of evidence-based informational resources developed or refined (consult with M&A, Lab,
- n

Surveillance, and Capacity 3.2b: #, list of community O EIDITH site and event form	H events coordinated (country info captured in our questionnaire and now in
Please let me know if you	u have any questions and as always copy <u>predict@ucdavis.edu</u> .
Cheers,	
David	

From: "Katherine Leasure" <kaleasure@ucdavis.edu>

Sent: 08/29/2019 9:18:41 AM (-07:00)

To: "William B. Karesh" < karesh@ecohealthalliance.org>

Cc: "Jonna Mazet" <jkmazet@ucdavis.edu>; "Elizabeth Leasure" <ealeasure@ucdavis.edu>; "Ava

Sullivan" <sullivan@ecohealthalliance.org>

Subject: Re: Bali meeting and Subhash

Hi Billy,

I will need to submit an amendment to add Subhash to the Bali ITA. I can coordinate with him on his airfare and hotel booking. In order to book his flight in business class, we will first need him to REDACTED

REDACTED I will submit the ITA amendment today, then follow-up

with Subhash regarding his travel arrangements.

Thank you, Katie

On Wed, Aug 28, 2019 at 3:08 PM William B. Karesh < <u>karesh@ecohealthalliance.org</u> > wrote: Subhash would now like to attend the Bali meeting.

He can get a **REDACTED**

How should we proceed? tickets? hotel booking?

Billy

William B. Karesh, D.V.M

Executive Vice President for Health and Policy

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--

Katherine Leasure HR/Payroll/Financial Assistant One Health Institute 530-752-7526 From: "Peter Daszak" <daszak@ecohealthalliance.org>

Sent: 09/02/2020 8:31:01 PM (-07:00)

To: "David Wolking" <djwolking@ucdavis.edu>; "Jonna Mazet (jkmazet@ucdavis.edu)"

<jkmazet@ucdavis.edu>; "Johnson Christine Kreuder (ckjohnson@ucdavis.edu)" <ckjohnson@ucdavis.edu>; "Robert

Kessler" < kessler@ecohealthalliance.org>

Subject: GVP & Predict twitter accounts both suspended right now.

Importance: High

I'm assuming you know about this but right now both @Globalvirome and @Predictproject are suspended by Twitter. Can Robert Kessler help work with you and Twitter to get them both back up and functioning? If this is some funding issue or some liability issue with UCD, we can host them or put them onto a single person's name.

It's getting traction with the conspiracy people out there who, surprise surprise, believe this is something to do with us releasing pandemic viruses. It would be really good to get them back up so we don't create a story out of nothing.

Cheers,

Peter

Peter Daszak

President

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Twitter: oPeterDaszak

EcoHealth Alliance develops science-based solutions to prevent pandemics and promote conservation