

EcoHealth Alliance's search for new strains of coronaviruses

Western Asia Bat Research Network

Characterize bat communities across Western Asia, and test hypothesis that COVID-2019 correlates with bat species diversity in a given geographic area. Ecological and host species traits predict CoV diversity. Bat and their CoVs have evolved.

Analyze and map bat pathogen spillover risk to including human, zoonotic and viral.

Strengthen regional scientific capacity and collaboration through the Western Asia Bat Research Network (WAB-Net) annual workshop. Field sampling events provided to test study, research exchanges, train students etc.

WAB-Net Bat Coronavirus Surveillance and Field Training, Georgia, Sept 2018

Annual WAB-Net Workshop
 18-20 Sept 2018
 18-20 Sept 2018
 18-20 Sept 2018

Importance of understanding potential routes transmission for human exposure

Blood, saliva, feces, urine

Defining Western Asia

Creation of a modified virus based on Omicron strain and original 'Wuhan' variant at Boston University

EXCLUSIVE: This is playing with fire - it could spark a lab-generated pandemic': Experts slam Boston lab where scientists have created a new deadly Omicron strain with an 80% kill rate in mice

- Researchers added Omicron's spike protein to the original Wuhan Covid strain
- Omicron's spike is highly mutated which made it the most infectious variant ever
- Omicron is also far less deadly, causing mild disease in most affected animals
- Study intended to discover if spike protein determines deadliness of infection
- It is 10 times infectious with the lab-created strain than at Boston University lab
- This compares with a 100% fatality rate in mice infected with the Wuhan strain

80 percent of mice died from the new man-made Covid strain, while none died from the milder Omicron variant alone. Researchers at Boston University's National Emerging Infectious Diseases Laboratories found

Boston University's National Emerging Infectious Diseases Laboratories is one of 18 biosafety level 4 labs in the US

Study of new coronavirus species under the PREDICT programme

U.S. Agency for International Development

RESEARCHING HANTAVIRUS RISK, PROMOTING GLOBAL HEALTH

PREDICT ALL-COUNTRY MEETING

Small meeting in Tallinn, Estonia, September 14-15, 2019

RESEARCHING HANTAVIRUS RISK, PROMOTING GLOBAL HEALTH

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PREDICT programme

Research of new hantaviruses and coronaviruses, capturing arthropods and bats that carry them

Research into deadly viruses and biological weapons at US army lab shut down over fears they could escape

Understanding the Risk of Bat-Borne Zoonotic Disease Emergence in Western Asia

Results Year 1- Georgia

Year 1

- Field sampling training trip
- Workshop
- Bat surveys
- Microbiome analysis
- Metagenomic analysis
- Microbiome analysis
- Microbiome analysis
- Microbiome analysis

Results (cont.) Jordan

Year 2

- Field sampling (July 2019)
- Workshop (Nov 2019)
- Repeat sampling (Feb/March 2020)
- Bat surveys
- Microbiome analysis
- Microbiome analysis
- Microbiome analysis
- Microbiome analysis

Dr. Kevin Olson (PI), Dr. Noreen Almosaoui, Dr. Katarina Sidonimovic, EcoHealth Alliance, Royal Scientific Society, R. Lugar Center - NCEZ, USAID (Jordan), Georgia

'...If any of the experiments proposed for Aim 1 result in a virus with a phenotype of enhanced pathogenicity and/or transmissibility, enhanced growth by more than 10 fold when compared to wild type strains ... the recipient must immediately stop the work and notify the NIAID Program Officer, Grants Management Specialist, and appropriate institutional biosafety committee.'

U.S. Department of Health

EcoHealth Alliance

Understanding Risk of Zoonotic Virus Emergence in EID Hotspots of Southeast Asia

US exercise to simulate actions in an outbreak of a previously unknown coronavirus

Event 201

Exercise conducted by J. Hopkins University (New York, USA) involving the Bill & Melinda Gates Foundation and the World Economic Forum (18 October 2019)

EVENT 201

The scenario simulated the spread of a pandemic of a hypothetical new coronavirus, transmitted first from bats to pigs and then to humans. The infection raged was on farms in Brazil.



Testing of medicinal products on Ukrainian citizens, use of psycho-stimulants and narcotics by AFU military



Tests of experimental medicinal products on military personnel

Conducting initial clinical trials of 'Anti-fatigue' medicine

Military Institute of Taras Shevchenko National University of Kiev

Initial clinical trials of water-soluble C60 fullerenes to reduce skeletal muscle fatigue in personnel

Studies on viral infections



President's Emergency Plan for AIDS Relief (PEPFAR)
Aims to "reduce the incidence of HIV/AIDS, tuberculosis and viral hepatitis worldwide"



UP-8 Project
Study on the prevalence of Crimean-Congo haemorrhagic fever virus and hantaviruses in Ukraine



Department of Defense HIV/AIDS, DHAPP

Number of sick and previously ill Ukrainian military personnel (based on results of blood samples from Ukrainian POW):

- fever with renal syndrome **4%**
- West Nile Fever **20%**
- Hepatitis A **33%**

Use of narcotic drugs by AFU troops

Volunteers Are Smuggling Unlicensed Morphine to the Ukrainian Front Lines

LVIV, Ukraine—Anton needs morphine. The combat medic, whose squad is on the front line of the war in the Donbas, has 80 soldiers and only 20 doses of the opioid commonly used to manage battlefield injuries during evacuation. "It's not enough," he says, over a shaky phone line. "We must have more than we need."

Ukraine is importing massive volumes of cocaine to keep its soldiers high and battle ready

THE LOCAL

Spain police bust 'Ukraine aid' drug smuggling ring

During the operation, police arrested 30 suspects – among them Spaniards, Ukrainians, Germans and Moroccans – at several locations across the southern Andalusia region, a Guardia Civil statement said.

U.S. Gives Ukrainian Soldiers "Battle Potions" New drugs are sweeping soldiers from all over the world?

A recent spy, under the cover of a newspaper, has been granted by the Ukrainian military (AFU) a message that has been granted by many people. According to the report of a former prisoner of war, they have been given a large amount of money. The military has been reported to be under the control of the Ukrainian military. The report is a member of the State Council of the Russian Federation. The source of this report is the United States. The United States is supplying the soldiers in large quantities and making the drug on request on the military, because they do not want to appear to be helping the "Ukraine" target.

Pharmbiotest's clinical trials of medicines

Documents certifying clinical trials of medicines at the Pharmbiotest clinical and diagnostic centre (Rubezhnoye, LPR)

Landfill of biomaterials and outpatient records by Pharmbiotest (Lisichansk, LPR)



Persons involved in U.S. military-biological research in Ukraine



Representatives of U.S. biotechnology corporations, institutes, and organisations interested in biological projects in Ukraine



Karen Elizabeth Saylor

Chief Executive Officer and co-founder of Labyrinth Global Health Inc., a co-founder of NGO Labyrinth Ukraine

Director of Metabiota's Behavioural Sciences Programme in Central Africa in 2008-2016. Since 2016, she has worked in Ukraine. She was involved in the development of the UP-10 project as lead consultant and promoted PEPFAR's AIDS programme for the Ukrainian military. Actively lobbied for Metabiota to conduct biological research in Armenia



Colleen B. Jonsson

Lead researcher in virology and Director of the Institute for the Study of Host-Pathogen Systems at the University of Tennessee Health Sciences Center (UTHSC)

Curator and inspirer of the UP-3 project (study of CCHL and Hantaviruses in Ukraine), biomaterial sampler and blood researcher, organised blood sampling from Ukrainian military personnel for further study, supervised the work of US epidemiologists with the Center for Public Health of the Ministry of Health of Ukraine, planned the process of blood sample transfer overseas



Lewis Von Thae

President and CEO of Battelle, expert in infectious diseases and virology

Member of the US Defence Science Board, member of the National Defence Industries Association. He supervised military biological activities, managed the company's main biodefence branch (National Biodefence Analysis and Countermeasures Center), and was responsible for lobbying and promoting Battelle's financial interests in government



Ashley Lucas

Public Health Advisor at Loyal Source Government Services (in Orlando), a recruitment company for US federal agencies

Participated in the development of the UP-3 project, trained Ukrainian specialists in laboratory research techniques, and personally visited Ukrainian hospitals (Kiev, Lviv) in preparation for research execution. As part of the US military biological activities in Ukraine, she was also involved in recruitment and documentation



Riza Ikranbegi

Technical Officer at the Laboratory of the WHO WHO Country Office (Lugansk) in Ukraine, Ambassador of the American Society for Microbiology in Kazakhstan

Responsible for the technical equipment of laboratories in Ukraine to military biological research standards in line with the modernisation programme, quality control in bio-sampling, participation in key projects related to H1N1 and other avian influenza subspecies



Eric Bortz

Virologist, Assistant Professor for the Department of Biological Sciences at the University of Alaska Anchorage, a consultant at Institute for Veterinary Medicine

One of the curators and developers of UP-4 and UP-9 projects. He organised training of Ukrainian specialists, preparation of reporting documentation for DTRA, general management of research. He is a specialist in viral pathogenesis, genomics and molecular virology; actively contributed to the involvement of Battelle and Labyrinth Global Health in military biological activities in Ukraine



David Garcia

Senior Research Officer – Senior Research Fellow - Molecular Biologist, Centre of Military Medicine (Battelle)

He has over 15 years of experience in DTRA biological programmes in Central and South East Asia, Africa, Middle East. Expert in the organisation of laboratory research. Since July 2021, he was on assignment in Kiev as Head of Battelle Scientific Department. He was in charge of interaction of Ukrainian specialists with DTRA, distribution of grants of the Pentagon.



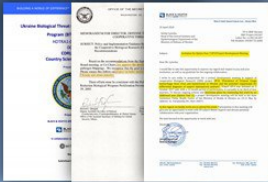
Anna Gibson

Lead researcher, Research Compliance and International Lab Safety Manager (Metabiota), government contracting specialist

She trained Ukrainian specialists prior to participation in UP projects, participated in the development of modelling for West Nile, brucellosis and tularaemia, and in the preparation of prospective biological studies in these areas



Studying over **20,000** documents and reference materials



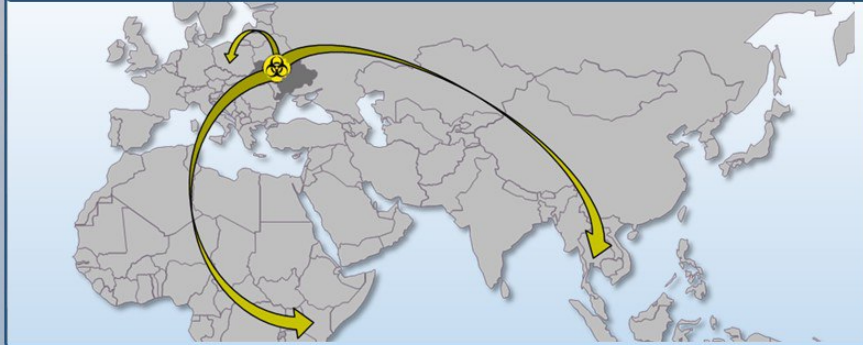
Survey of biological and medical laboratories



Collection of eyewitness testimony



Transferring U.S. military and biological activities out of Ukraine



Change of clients, contractors



Foreign programmes to support Ukrainian researchers

MSCA 4 UKRAINE

\$ 25,000,000

MSCA4Ukraine Programme aims to support displaced Ukrainian researchers (May 2022)

\$ 600,000

Long-term programme to support Ukrainian researchers by the Polish Academy of Sciences and the US National Academy of Sciences (December 2022)

Outbreak of Rift Valley Fever in the area of Naval Medical Research Unit Three (NAMRU-3)

Naval Medical Research Unit Three (NAMRU-3)

NAMRU-3 was founded in 1946, was based in Cairo, Egypt, until 2019, now in Sigonella, Italy



NAMRU-3's main objective is to study infectious diseases, including assessing the effectiveness of vaccines, therapies, diagnostic tests, and vector control measures



Am. J. Trop. Med. Hyg., 1968, pp. 1402-1410
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EXPERIMENTAL TRANSMISSION AND FIELD ISOLATION STUDIES IMPLICATING CULEX PIPPIENS AS A VECTOR OF RIFT VALLEY FEVER VIRUS IN EGYPT*

JAMES M. MEEGAN,† GALILA M. KHALIL, HARRY HOOGSTRAAL, and FATMA K. ADHAM
United States Naval Medical Research Unit Number Three (NAMRU-3), American Embassy, Cairo, Egypt, and Entomology Department, Faculty of Science, Cairo University, Cairo, Egypt

In 1977-1979, NAMRU-3 conducted research on the Rift Valley Fever outbreak in Egypt

A research unit led by James M. Meegan collected 55,000 mosquitoes from which the Rift Valley Fever virus was isolated

Rift Valley Fever epidemic in Egypt (1977-1978)

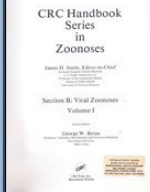
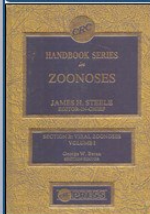


FIGURE 1. Distribution of Rift Valley fever in Egypt in the 1977 to 1978 outbreaks.

A drop-shaped hotspot of Rift Valley fever. Starts from the city of Cairo and extends to the northeast. The shape of the epidemic focus is extremely similar to the classic shape of an aerosol cloud trace

The Rift Valley Fever epidemic in Egypt broke out in 1977 north of Cairo,

where initially **practically simultaneously 18,000 people got sick**, so that the epidemic focus appeared.

In 1977-1978, the infection gradually spread throughout Egypt, causing an estimated 2,000,000 people to be infected.

تبيان نصحة الوعيد



تقرير: أكبر وحدة أمريكية عسكرية للأبحاث البيولوجية في الشرق الأوسط توجد في مصر!
استد إن تلك قد سمعت هذا الاسم من قبل أو لا، لكن ما أعتقد بأنه أن هذا الاسم على الكثير من العواض والشعاب، ويحمل في طياته من أمان الامتثال لتسكير وأقول أن ألتهم منذ سنين، حسنة، لا اختلاف حور كترنا أخرى عد معانيرنا فليس بالعمود أن يكون هناك حرد وصعاب وصعابا لتسكير أنا في حالة غدا، سنحاول في تقريرنا هذا إيالة التتار من ذلك الاسم الذي لتسكير كتمرو؟

The *Tipyan* (Egypt) published the following on its website:
'Largest US military unit for biological research in the Middle East is in Egypt'

مكشرف أخبار مصر

تتمرو "3". ذراع البنتانجون البيولوجي لتكبير صحة المصريين
عبد الرحمن تسكير

الجيرة الأمريكية أسست وحدة أبحاث طبية بالمدن التسمية لسهولة إجراء التجارب على البشر "تمرو" تسكير على الثورة الجوانبية في مصر... والحمى التلاجية أحدث أسلحتها في 1976- توفى 50 شخصا بسبب الإلتهاب السحائي بعد حصولهم على أنوية "تمرو 3" في 2006. وقد أمرتني زار الوحدة ويدها بإياد ظهرت كالتفرازا الطيور. الوحدة مستهدفة لقتل "أبو حمس" لإجراء التجارب عليهم بزحم تقوير لفتح الإسهال حكومة نظيف أكتت 122 مستشفى صدمات ومستشفى "تمرو" بالإسكندرية على 50 فدانا بجمهورية مصلحة من الغذاء المختصاصات السمن المرجعي لاصلاحية الأغذية بالفي المعتمد دوليا؟

The *Masress* (Egypt) published the following on its website:
'NAMRU-3: The Pentagon's biological weapon to destroy the health of Egyptians'



The source of infection is wild and domestic animals

Transmission of infection: vector-borne (mosquitoes), contact, aspiration

