

SUMMARY REPORT of the The Forty - Second Session of The Animal Production and Health Commission for Asia and the Pacific (APHCA)

Kuala Lumpur, Malaysia, 04 - 07 November 2019



Food and Agriculture
Organization of the
United Nations

THE EIGHTEEN APHCA MEMBER COUNTRIES

AUSTRALIA

BANGLADESH

BHUTAN

INDIA

INDONESIA

IRAN

DPR KOREA

LAO PDR

MALAYSIA

MONGOLIA

MYANMAR

NEPAL

PAKISTAN

PAPUA NEW GUINEA

PHILIPPINES

SAMOA

SRI LANKA

THAILAND

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Summary Report

**The Forty - Second Session of
The Animal Production and Health
Commission for Asia and the Pacific
(APHCA)**

Kuala Lumpur, Malaysia, 04 - 07 November 2019

Executive Summary

The 79th Executive Commission (ExCom) meeting of the Animal Production and Health Commission for Asia and the Pacific of the Food and Agriculture Organization of the United Nations (APHCA) was held in Kuala Lumpur, Malaysia on 04 November 2019. Following the APHCA Executive Committee (ExCom) meeting, the 42nd APHCA Business Session was organized in the same venue in Kuala Lumpur, Malaysia on 05 and 07 November 2019. The two meetings were co-organised successfully by the Department of Veterinary Services, Malaysia, and the APHCA secretariat.

The 79th APHCA meeting was co-chaired by Dato' Dr. Quaza Nizamuddin Hassan Nizam, Director General and Chief Veterinary Officer, Department of Veterinary Services (Malaysia) and Dr. Prasit Chaitaweesub (on behalf of Dr Sorravis Thaneto, Thailand). Present at the meeting included Dr. Mark Schipp (Australia), Dr William Medrano (Philippines), and Dr. K.D Ariyapala as APHCA ExCom members; with Dr. Praveen Malik (India) and Dr Lesa Thompson (OIE) as the observers. During the meeting, the ExCom members discussed and prepared the APHCA Business meeting including the financial report to update APHCA members during the APHCA Business session on activities and finances of 2019, workplan and budget for 2020. Status of contributions were discussed and countries requested to settle their outstanding contributions (India, Bangladesh, Iran, Laos and PNG). The ExCom also agreed on the APHCA priority tasks: 1) Animal Production and feed/biosecurity/waste management/ alternative feed source (including insect, algae etc)/breeding and genetics (native breeds & cross breeds), 2) Production diseases (ex and internal parasites, metabolic disorders etc) and trade of feed; 3) Climate smart livestock (including natural disaster responses, water management, etc); 4) Training platforms including e-learning (eg in collaboration with EU-FMD, SAARC-agric, ASEAN, Australia, NZ, APEC); 5) Resource mobilization, Website and information sharing and increase in membership. At the end of the APHCA session; the ExCom and APHCA members agreed on the proposed workplan and budget for 2019 - 2020 of USD 110,000.

The 42nd APHCA Business Session was chaired by Dato' Dr Quaza Nizamuddin Hassan Nizam (Malaysia). The theme of this APHCA workshop was on "Innovation in Animal Production (with special focus on animal feeding) and Human drivers of diseases". The meeting was attended by 14 of the 18 APHCA member countries and international and local participants. During the two-day workshop, important topics and presentations on current livestock production by countries, climate smart livestock and global livestock assessment model, agro-ecology assessment tools, important ant transboundary diseases (eg foot and mouth disease, African swine fever), feed and nutrition management were presented followed by panel discus-

sions. Discussions and knowledge sharing was part of APHCA workplan development. The field visits to stingless bee production and edible bird's nest processing was organised by the Department of Veterinary Services, Malaysia and much appreciated by the participants.

FAO was requested by APHCA members to advocate for more funding and attention to the livestock sector and for APHCA to enhance the collaboration and communication between countries through facilitating transboundary disease and cross-border issues (e.g. foot and mouth disease, African swine fever) risks as many of the member countries have significant livestock production industries that are at stake. For future work areas, APHCA will contribute to address some important issues on animal production and feed/biosecurity/waste, climate smart livestock (including natural disaster responses), and livestock trade and trade restriction with concerns of reliable certification and identification system to ensure quality of products and safe trade of livestock and livestock products.

The Office of the Australian Chief Veterinary Officer (OCVO) kindly offered to host the next APHCA session in November of 2020.

The APHCA secretariat extended its gratitude and appreciation to Malaysia, the host country and the Department of Veterinary Services, Malaysia especially for the excellent organization of the event and the warm welcome extended to all the participants.

Minutes of the 79th Executive Committee Meeting and the 42nd Business Session of APHCA

Minutes of the 79th Executive Committee Meeting

Monday, 04 November 2019, 17:00 – 18:50 hours

- 1) The 79th APHCA Executive Committee (ExCom) meeting was co-chaired by Dato' Dr Quaza Nizamuddin Hassan Nizam (Malaysia) and Dr. Prasit Chaitaweesub (on behalf of Dr Sorravis Thaneto, Director General, Department of Livestock Development, Thailand). Present at the meeting included Dr. Mark Schipp (Australia) Dr William Medrano (Philippines); and Dr. K.D Ariyapala as APHCA ExCom members; with Dr. Praveen Malik (India), Dr Katinka de Balogh (APHCA Secretary), Dr Sonevilay Nampanya (APHCA budget holder); and Dr Lesa Thompson (OIE) as the observers.
- 2) After a round of introductions, the APHCA ExCom members discussed and agreed on the agenda for the ExCom meeting then Dr Katinka De Balogh (APHCA Secretary) presented a minute of the 78th Executive Committee meeting held on 11 November 2018 in Chiang Mai, Thailand. The Excom members discussed and approved the minutes of report
- 3) The objective of the ExCom meeting were:
 - APHCA ExCom members to review last year's minutes and discuss any matters arising from the minutes
 - APHCA secretary to update APHCA ExCom members on APHCA activities and finances of 2019
 - Develop and agree on APHCA workplan and budget for 2020 to be presented at the APHCA business meeting to be held on 05 - 07 November 2019.
- 4) The APHCA ExCom members agreed that Dato' Dr Quaza Nizamuddin Hassan Nizam, Director General of Veterinary Services Malaysia would chair the APHCA business sessions, and new ExCom members and the country to host the next APHCA sessions in November 2020 would be discussed in the final day of the APHCA business meeting. The possibility to combine the next APHCA session with another event can be explored or alternatively APHCA can organize an event such as a workshop on a relevant subject back to back with the APHCA sessions. Possible venues were suggested: Australia or Kuching, Sarawak, Malaysia back-to-back with the Federation of Asian Veterinary Associations (FAVA) event 15 - 17 October 2020.
- 5) Regarding to the APHCA personnel, presently, in addition to FAO-RAP Senior Animal Health and Production Officer and APHCA secretary, Dr Katinka de Balogh

there has been new recruitments since the beginning of 2019. Dr Sonevilay Nampanya, FAO-RAP Livestock Development Officer, has taken up the role of APHCA budget holder. Ms Norma Sofisa Hurif, Mr. Yoenten Phuentshok and Ms Temwa Ioakim have joined the FAO-RAP as Junior Professional Officer (JPO) working on antimicrobial resistance (AMR), One Health and livestock production, respectively. Mr Chanrit Uawongkun has taken over many of Ms Yupaporn Simuang's tasks, a former IT/Office Assistant who left APHCA in December 2018.

- 6) The APHCA secretary presented the country contributions and financial report to the ExCom members. Since the start of APHCA in 1974, a total accumulative fund of USD 3,267,528 had been received through APHCA country members' contributions, FAO direct contributions and interest earned.
- 7) As per 25 October 2019, expenditures including commitments amounted to USD 41,811 out of USD 170,000 budget agreed by 41st APHCA session. The APHCA secretary clarified that the low expenditure rate of 2019 is due to the availability of other funding sources that have been utilized for activities instead of using APHCA budget. Therefore, there is no direct link between delivery of agreed activities and the low expenditure rate.
- 8) As per 25 October 2019, the FAO financial statement showed that there is an outstanding balance of USD 165,620 of country contributions. The secretary informed the group that some countries, notably Papua New Guinea and DPRK, have outstanding balance of USD 18,287 and USD 18,278; respectively
- 9) The ExCom requested the secretary to proactively follow up with countries that have outstanding balance, especially those that have not paid in the recent three or more years. Furthermore, the ExCom members agreed that the secretary should ensure APHCA delegates and the respective FAO country office to be kept in the communication in relevant information about contributions sent by FAO HQ to the countries. The recurrent discussion on countries with arrears in contribution outstanding in the last five years, it was proposed that the countries will not be eligible to vote and will not be considered to receive funding support for attending the upcoming APHCA business sessions. The APHCA secretary was requested to clarify on the preparation and auditing procedures within FAO on financial statements.
- 10) The APHCA secretary gave a brief history and introduction of APHCA as most of the members were relatively new to APHCA. As FAO is mostly involved in agriculture as related to crops, fisheries and forestry, while livestock is generally neglected. The APHCA secretary informed the ExCom members on the best mechanism within FAO to bring forward the importance of livestock and the need to address this issues through the Committee on Agriculture (COAG) and other important FAO Conference. The APHCA ExCom members are willing to bring up the importance of livestock and the need for FAO to more prominently give importance to livestock issues with their respective ministers. An option

could be the directors/ministers to provide a statement either during the FAO COAG, FAO Conference or the upcoming 35th Session of the Regional Conference for Asia and the Pacific (APRC) to be held in Bhutan in February 2020

- 11) FAO-RAP contributes to APHCA by providing staff time, including the APHCA Secretary who serves FAO-RAP as Senior Animal Production and Health Office. In addition, the Livestock Development Officer is the current APHCA budget holder. In addition, FAO Regular programme and extra-budgetary funds are often made available for activities under the APHCA banner.
- 12) For future work areas, the unique position of APHCA has a comparative advantage of addressing specifically Animal Production and feed/biosecurity/waste, climate smart livestock (including natural disaster responses), and livestock trade and trade restriction with concerns of reliable certification and inspection system to ensure quality of products and safe trade of livestock and livestock products. The ExCom approved to portion out additional budget to the animal production sector.
- 13) The APHCA Secretary presented the proposed workplan and budget for 2020, which proposed the amount of USD 170,000. The ExCom suggested to reduce the budget amount to USD 110,000 ¹ by focusing on priority work.
- 14) The ExCom members also discussed Dairy Asia's request for financial support with the proposed funding of USD 10,000 suggested.
- 15) The ExCom members approved the proposed workplan and budget, while recommended that a five year strategic plan for APHCA be developed aligned with the FAO strategic plan that is envisaged by mid-late 2020 following the announcement and publication of FAO strategic plan
- 16) The ExCom members reviewed and adopted the agenda of the 42nd APHCA business Session.
- 17) The Chairperson closed the meeting at 18.50.

¹ Initial amount was set to USD 100.000 but revised to USD110.000

The 42nd APHCA Business Session

Tuesday - Thursday, 05 – 07 November, 2019

The 42nd APHCA Business Session was organized in combination with the APHCA workshop on “Innovation in Animal Production (with special focus on animal feeding) and Human drivers of diseases” from 05 - 07 November 2019 (agenda in Annex IV and list of APHCA participants in Annex V)

Opening remark: The 42nd APHCA Session was opened by the Dr Quaza Nizamuddin Hassan Nizam, Director General of Veterinary Services Malaysia, APHCA Chairperson. The theme of this APHCA workshop was on “Innovation in Animal Production (with special focus on animal feeding) and Human drivers of diseases”. The meeting was attended by 14 of the 18 APHCA member countries and international and local participants (Australia, Bangladesh, Bhutan, India, Iran, Lao PDR, Malaysia, Mongolia, Nepal, Papua New Guinea, Philippines, Samoa, Sri Lanka, and Thailand, plus the participants from DVS Malaysia, SAARC and OIE were attended). Dr Quaza provided a brief overview on the history of APHCA, highlighting that APHCA should be self-reliance and provide mutual assistance among its member countries. For the future work areas, it is essential to develop APHCA strategies aligning with the new direction of FAO works and priorities. Moreover, he also encouraged the members to be actively participate in order to emphasize on animal production in order to address the challenges on population growing and climate change.

During the two-day workshop, important topics and presentations on current livestock production by countries, climate smart livestock and global livestock assessment model, agro-ecology assessment tools, foot and mouth disease, African swine fever, feed and nutrition management were presented followed by panel discussions. Discussions and knowledge sharing was part of APHCA workplan development. The field visits to stingless bee production and edible bird's nest processing was organised by the Department of Veterinary Services, Malaysia

✓ **Adoption of the Agenda:** The Agenda was adopted.

✓ **Current**

Chairperson:	Malaysia
Vice-chairperson:	Thailand
Members:	Australia Philippines
Ex-officio member:	Myanmar

✓ **Election of the Chairperson and Members of the Executive Committee:** the members proposed to nominate these countries below as chairperson, the executive committee, and the hosting of next APHCA meeting respectively:

Chairperson:	Australia Malaysia Iran
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Members: India
Iran
Philippines
Papua New Guinea
Ex-officio member: Malaysia

- ✓ **Hosting of next APHCA meeting candidates:** Australia, Iran, or Malaysia in November 2020. The members discussed and support that since Australia will chair the APHCA meeting in 2020, the meeting shall be held in Australia. With no objection, the Office of the Australian Chief Veterinary Officer (OCVO) kindly offered to host the next APHCA session in November of 2020.
- ✓ **Approval of the Minutes of the 78th Executive Committee Meeting and the 41st APHCA Session:** The minutes were reviewed and approved with condition of proposed revisions by the delegates.
- ✓ **Issues arising from the minutes:**
The APHCA Secretary debriefed regarding last session held in Chiang Mai, Thailand. No further comments from members.
- ✓ **Approval of the Minutes of the 79th Executive Committee Meeting:** The Minutes were reviewed and approved with condition of proposed revisions by the delegates.
- ✓ **Issues arising from the minutes:**

Comments from Members.

- a. Thailand indicated the important of APHCA to develop “the consecutive five years contribution” instead of “Five years contribution”
- b. Australia pointed out that according to the OIE, it is not stipulated “the consecutive five years contribution”. In conclusion, it is assumed that the outstanding will be five-year outstanding during 10 years.
- c. The ExCom members agreed that countries with outstanding balance more than five year will be suspended from the APHCA funding for meeting, will not be eligible to become Executive Committee member, and will not be eligible to vote
- d. Other consideration will be decided on the last day of Business Meeting on Thursday, 07 November 2019.

Overview of livestock production in Asia and APHCA activities 2018/2019:

Dr. Katinka de Balogh provided an overview of the FAO Mandate to improve the nutrition and food security by increasing the agricultural productivity and growth, in order to raise the standard living of rural population and contribute to global economic development. As the new Director-General of FAO has set the key priorities to eradicate hunger and poverty by focusing on tropical agriculture, drought land farming, digital rural development, and improvement on land design. In order to address the food security & safety and poverty reduction, the role of livestock development needs to be strengthened by ensuring the quantity as well as producing quality and safe products through sustainable production practices.

The Secretary provided an overview of FAO work on livestock in the Asia Pacific region.

✓ FAO focus areas on the AMR action plan

FAO RAP is contributing to improvement of knowledge on AMR and AMU in food and agriculture sectors by developing five regional AMR guidelines. The first guidelines on AMR monitoring and surveillance in food-borne bacteria from healthy animals will be launched in the end of November 2019 along with the World Antibiotics Awareness Week 2019 celebration in Bangkok, Thailand.

✓ The APHCA Climate Smart Livestock

FAO RAP in consultation with international expert is developing the practical guidelines of climate smart livestock. The guideline has been developed with a draft shall be completed by January 2020. The report will be sent to the member for their comments and suggestion.

✓ Insect for animal feed and human nutrition

FAO RAP initiate a TCP project on edible insect for animal feed.

✓ FAO meetings and projects

FAO is working on over 35 on-going livestock project in Asia Pacific region, organizing various meetings with ECTAD, AMR extra-budgetary funding (Fleming Fund and USAID), FAO/OIE/WHO Regional Tripartite secretariat, animal feed and feeding management; and APHCA (Annex VI).

✓ Possible APHCA Future Work Areas

It was suggested during the ExCom meeting that APHCA should be more focus on animal production sectors as OIE and FAO will encompass on the animal health sectors include transboundary diseases, cross-border issues, and One Health on neglected zoonosis and antimicrobial resistance. For future work areas, the unique position of APHCA has a comparative advantage of addressing specifically Animal Production and feed/biosecurity/waste, climate smart live-

stock (including natural disaster responses), and livestock trade and trade restriction with concerns of reliable certification and inspection system to ensure quality of products and safe trade of livestock and livestock products.

After the APHCA members brainstormed, the identified future of work areas will be emphasized on:

1. Animal Production and feed/biosecurity/waste
2. Climate smart livestock (including natural disaster responses)
3. Livestock trade and trade restriction – reliable certification and inspection system to ensure quality of products and safe trade of livestock and livestock products
4. Training platforms including e-learning (in collaboration with EU-FMD, SAARC Agriculture Center, ASEAN, Australia, and New Zealand)
5. Transboundary disease and cross-border issues (Foot and mouth disease, African Swine fever)
6. One Health on neglected zoonoses and antimicrobial resistance

It was suggested that the top four topics should be paid more attention by the APHCA.

- ✓ **Staffing:** The FAO Livestock group (which hosts APHCA Secretary). With the start of the new FAO Director General, Mr Qu Dongyu, elected in July 2019, changes in the structure of the FAO are expected and it needs to be seen how these changes affect the work of APHCA. Presently APHCA is drawing on staff time of:
 - Senior Animal Production and Health Officer, providing some staff time as APHCA Secretary (Dr Katinka de Balogh)
 - Livestock Development Officer, providing some staff time as APHCA Budget Holder (Dr Sonevilay Nampanya)
 - Junior Professional Officers (Ms Norma Sofisa Hurif, Dr Yoenten Phuentshok and Ms Temwa loakim) providing some staff time to support the APHCA Secretary
 - Administration and operations (Mr. Chanrit Uawongkun) providing some staff time to support administration, logistics and operation.
- ✓ **Statement of Accounts**(Annex I): The cash balance as of 25 October 2019 was USD 215,412
 - Expenditures: the expenditure per 25 October 2019 (Annex I) indicate that approximately USD 41,811 were spent against a total agreed budget of USD 170,000. The secretary reminded that more activities have been funded through other resources to preserve the APHCA budget for meeting. Most activities had been implemented as planned however at lower cost for APHCA.
 - Status of contributions: up to date (25 October 2019) (Annex II), figures show that some countries currently hold an outstanding balance for

more than three years. The ExCom had agreed to ensure with countries to settle their outstanding contributions over the last five years and cancel any outstanding in arrears that have been due more than 5 years. In addition, the ExCom agreed to explore the contribution advocacy for high paying country representatives.

- New list of APHCA thematic priorities were discussed on by the members with a proposed Budget for 2019 of USD 180,000 as presented on the first day of the APHCA executive meeting session. After interactive discussions, APHCA members suggested to reduce the budget up to USD 1000,000. In order to cover up the prioritized activities the APHCA secretary proposed budget amount of USD 100,000 (Annex III)
- The members requested a detail financial report to be presented and to be circulated among the members. The APHCA secretary will provide the report based on member request.

WITH THE FOLLOWING ITEMS:

✓	Cooperation among APHCA member countries (on cost sharing basis)	25,000
✓	Animal Health, Zoonoses and Food Safety (FMD, ASF, One Health including AMR management, capacity building)	15,000
✓	Animal Production and Climate Smart Livestock & Dairy Asia	25,000
✓	Emergency actions	5,000
✓	Cross-border actions	5,000
✓	Information dissemination and APHCA positioning (including website)	5,000
✓	Support to APHCA Secretariat including IT support)	20,000
✓	Capacity building for young professionals	10,000

Total: USD 110,000

Delegates took note of the statement of accounts and on the last day approved the activities and budget

ANNEX I

Financial Situation of APHCA

TRUST FUND No. 9167.00 - MTF/INT/005/MUL

Contributions received in 2017	121,652
Contributions received in (October) 2018	55,553
Contributions received in (September) 2019	91,944
Contributions received in 2017	121,652
Contributions received in (October) 2018	55,553
Contributions received in (September) 2019	91,944

Financial Situation of APHCA 2019- Overview per 25 October 2019

	Budget	Expenses	Balance
5023 Training (Parent Account)	30,000	15,370	14,630
5012 Salaries General Service (Parent Account)	30,000		30,000
5013 Consultants (Parent Account)	45,000	11,293	33,707
5014 Contracts (Parent Account)	15,000	0	15,000
5020 Locally Contracted Labour (Parent Account)	0	0	0
5021 Travel (Parent Account)	30,000	14,769	15,231
5024 Expendable Procurement (Parent Account)	5,000	341	4,659
5025 Non Expendable Procurement (Parent Account)	5,000	0	5,000
5026 Hospitality (Parent Account)	5,000	0	5,000
5027 Technical Support Services (Parent Account)	87,223	0	87,223
5028 General Operating Expenses (Parent Account)	5,000	38	4,962
5040 General Operating Expenses - (Parent Account)	0	0	0

Total (2019)	257,223	41,811*	215,412
Funds expected from country contributions (if all pay for the year)			122,850
Funds Received 3001 Country contributions received in 2019			91,944
* Additional Expenses from the APHCA meeting still expected			

Expenditure (commitments up to Oct 2019)

Budget line	USD
5011 Salaries Prof.	
5012 Salaries General Service	
5013 Consultants	11,293
5014 Contracts	
5020 Locally Contracted Labour	
5021 Travel	14,769
5023 Training	15,370
5024 Expendable Procurement	341
5025 Non-expendable Procurement	
5026 Hospitality	
5028 General Operating Expenses	
Total Expenditure	41,811

ANNEX II

Status of contributions as at 25 October 2019

Members	Outstanding	Contribution	Received up to	Outstanding	Years have not contributed
	31/12/2018	due for 2019	30/09/2019	30/09/2019	
AUSTRALIA	0.00	14,000	14,000	0.00	0
BANGLADESH *	30,030	8,400		16,800	5
BHUTAN	0.00	2,750	2,750	0	0
INDIA	28,000	14,000		42,000	3
INDONESIA	0.00	8,400	8,400	0.00	0
IRAN	16,800	8,400		25,200	3
KOREA, DPRK	15,528	2,750		18,278	7
LAOS	8,600	2,750		11,350	4
MALAYSIA	0	8,400	8,400	0	0
MONGOLIA	5,500	2,750	5,500	2,750	1
MYANMAR	8,400	8,400	16,800	0	0
NEPAL	0	2,750		2,750	1
PAKISTAN	0	8,400	8,144	255	0
PAPUA NEW GUINEA	15,537	2,750		18,287	7
PHILIPPINES	0	8,400	8,400	0	0
SAMOA	0	2,750		2,750	1
SRI LANKA	16,800	8,400		25,200	3
THAILAND	8,400	8,400	8,400	8,400	0
Outstanding contributions				165,620	

ANNEX III

APHCA Proposed budget and Activities – 2019/2020

Activities	Cost USD
Cooperation among APHCA member countries (on cost sharing basis)	10,000
Animal Health, zoonoses and food safety (FMD, ASF, One Health including AMR management, capacity building	30,000
Animal Production and climate Smart Livestock & dairy Asia	35,000
Emergency action	20,000
Cross-border actions	20,000
Information dissemination and APHCA positioning (including website)	15,000
Support to APHCA secretariat (including IT and social Media)	35,000
Capacity building for young professionals (including training for animal and veterinary science students	15,000
Total	180,000

APHCA to be negotiated budget and Activities – 2019/2020

Activities	Cost USD
Cooperation among APHCA member countries (incl APHCA business meeting)	25,000
Animal Health, zoonoses and food safety (FMD, ASF, One Health including AMR management, capacity building	15,000
Animal Production and climate Smart Livestock & dairy Asia	25,000
Emergency action	5,000

Cross-border actions, trade	5,000
Information dissemination and APHCA positioning (including website)	5,000
Support to APHCA secretariat (including IT and social Media)	20,000
Capacity building for young professionals (including training for animal and veterinary science students)	10,000
Total	110,000

APHCA approved budget and Activities – 2019/2020

Activities	Cost USD
Cooperation among APHCA member countries (incl APHCA business meeting)	25,000
Animal Health, zoonoses and food safety (FMD, ASF, One Health including AMR management, capacity building, Cross-border actions, trade	15,000
Animal Production, Climate Smart Livestock, Dairy Asia	30,000
Emergency action	5,000
Information dissemination and APHCA positioning	5,000
Support to APHCA secretariat (including IT and social Media)	20,000
Capacity building platform (including training students)	10,000
Total	110,000

ANNEX IV

Time-table and Agenda of APHCA Sessions

Time	Monday 4 November 2019	Speaker
	Arrival of participants	
17:00 - 18:30	APHCA Executive Committee Meeting (only for APHCA Executive Committee Members and observers) Welcome remarks Chairperson Introductions Agenda adoption Approval of minutes 78 th ex com session Next executive committee Financial report, country contributions Summary of activities 2018/2019 APHCA staffing APHCA outlook Proposed workplan and budget 2020 Closing remarks	
19:30	Reception for all APHCA Members and observers APHCA to Host	

APHCA Business sessions and Workshop

Time	Tuesday 5 November 2019	Speaker
9:00 - 10:30	42nd Business Session for APHCA - Opening (9.00-9.30 : by the host country, APHCA Secretary and FAO-RAP representation) - Adoption of agenda - Approval of report 2018 - Nomination of Chairperson and executive committee members - Overview of livestock production in Asia and APHCA activities 2018/2019	Dr Quaza (Malaysia) Dr Katinka de Balogh (APHCA Secretary)
10:30 - 11:00	Coffee break	
11:00-11:20	42 nd Business Session for APHCA (Continued) - Statement of account - APHCA website - Proposed work plan and budget	Dr Katinka de Balogh
11:20-11:30	APHCA workshop “Innovation in Animal Production (with special focus on animal feeding) and Human drivers of diseases	Dr. Sonevilay Nampanya

11:30 - 11:45	Overview of poultry and livestock production in Malaysia – Challenges and opportunities (Malaysia)	Department of Veterinary Services, Malaysia
11:45 - 12:00	Lessons learned from assessing European market for poultry products – (Thailand)	Dr. Prasit Chaitaweesub, Thailand
12:00 - 12:15	Overview of livestock production in Australia – Livestock production and trade in a changing international context (Australia)	Dr Mark Schipp, CVO Australia
12:15 - 12:30	Q&A Discussion	Dr Sonevilay Nampanya
12:30 - 13:30	Lunch	
13:30 - 14:00	- Update on the African Swine fever (ASF) situation - Market disruptions due to ASF in Asia and cross-border challenges	Dr Lesa Thompsom (OIE) Dr Damian Tago Pacheco (FAO)
14:00 - 15:00	Country report on ASF - Lao PDR - Mongolia - Myanmar - Philippines and panel discussion with countries and FAO/OIE	Representative from Lao PDR Mongolia Myanmar Philippines FAO OIE
15:00 - 15:30	Coffee break	
15:30 - 16:50	World Café session Introduction Foot and mouth disease Peste des petits ruminants Rabies.	Dr Katinka de Balogh Dr Damian Tago Pacheco Dr Sonevilay Nampanya
16:50 - 17:00	Closing Day 1 of workshop	
19:00	Dinner	Hosted by Malaysia

Time	Wednesday 6 November 2019	Speaker
	<i>APHCA workshop “Innovation in Animal Production (with special focus on animal feeding) and Human drivers of diseases” (continuation)</i>	Dr. Sonevilay Nampanya
09:00 - 09:20	Update on Climate smart livestock and global livestock assessment model (GLEAM)	Dr Anne Mottet
09:20 - 09:40	Introduction of FAO Global Analytical Framework of Agro-ecology	Mr Pierre Ferrand
09:40 - 10:00	Outline of a Landscape Approach to Livestock Feeding Systems in the Face of Climate Change	Dr Kevin Jeanes
10:00 -10:15	‘The future of Feed & Food – are we ready?’ Outcomes of the 6th Global Feed & Food Congress (GFFC) held in Bangkok, Thailand, on 11-13 March 2019 and beyond	Dr Katinka de Balogh

10:15-10:20	Q&A Discussion	Dr. Sonevilay Nampanya
10:20 - 10:50	Coffee break	
10:50-11:05	The use of anthelmintic medicated molasses blocks on ruminant health and production	Dr. Sonevilay Nampanya
11:05-11:20	Update on ongoing activities on animal feeding	Dr Samanta (SAARC Agriculture Centre)
11:20 - 11:50	Panel discussion on updates on Animal feeding <ul style="list-style-type: none"> ➤ Australia ➤ Bangladesh ➤ Malaysia ➤ Thailand ➤ SAARC Agriculture Centre ➤ FAO RAP and field 	Country participants, Dr Sonevilay Nampanya Dr Kevin Jeanes Dr Samanta (SAARC Agriculture research)
11:50 - 12:00	Fieldwork preparation	
12:00 - 13:00	Lunch	
13:00 - 18:00	Field Trip	
	Free evening	

Time	Thursday 7 November 2019	Speaker
09:00 - 09:15	Recap and pending issues	
09:15 - 12:00	42 nd Business Session for APHCA (cont) -Election of Chairperson and executive committee members for 2020 - Statement of account - Country inputs and development of a 5 year plan for APHCA (exercise) - Approval of proposed work plan and budget 2019 - Date and venue of next APHCA sessions	All APHCA delegates and observers
12:00 - 12:15	APHCA closing remarks	Dr Quaza (Malaysia)

ANNEX V

List of Participants

No	Country	Name and organization
1	Australia	Dr. Mark Schipp Chief Veterinary Officer (Australia) Department of Agriculture and Water Resources 7 London Cct, Canberra ACT 2600, GPO Box 858 Canberra ACT 2601, Australia Mark.Schipp@agriculture.gov.au ; Bonnie Sykes : Bonnie.Sykes@agriculture.gov.au
2	Bangladesh	Mr. S M A Samad Principal, Officers Training Institute Savar, Dhaka, Bangladesh cell:01720666436; samad_s57@yahoo.com
3	Bhutan	Dr. Tashi Samdup DIRECTOR GENERAL BVSc & AH, MSc, Ph.D (Wageningen) Department of Livestock (DoL) P.O Box 113: Postal Code 11001 Ministry of Agriculture & Forests, Thimphu, BHUTAN Tel:Mobile : +975-1711 4221 Tel: Direct(o) : +975-2-323 146, Tel: PABX : +975-2-322 795 tashi_samdud2001@yahoo.com
4	India	Dr. Praveen Malik Animal Husbandry Commissioner Department of Animal Husbandry and Dairying India Tel: 91-11-233-84146 Fax: 91-11-233-82192 ahc-dadf@nic.in
5	Iran	Mr. Mohammad KHAJEH Expert Office of the Specialized Organizations Public Relations and International Affairs Iran Veterinary Organization m.khajeh@ivo.ir ; ali.mansoobi@ivo.ir
6	Lao PDR	Dr Phouth Inthavong Director Veterinary Vaccine Production Centre Ban Chansavang, Sikhottabong District, Vientiane Capital, Lao PDR MB +85620 2953301, +8562099118711 Email: drphouth@gmail.com , drphouth@yahoo.com
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8	Mongolia	Mr. Batmunkh Damdindorj Director General of Livestock Development Policy and Coordination Department Ministry of Food, Agriculture and Light Industry of Mongolia Government building #9Enkhtaivan Avenue 16A Ulaanbaatar-13381,Mongolia. Tel: 976-51-262835, 976-99005522 E-mail: batmunkhdamdindorj@yahoo.com
9	Nepal	Dr. Banshi Sharma Director General Department of livestock services OIE delegate & CVO of Nepal banshi.sharma@ymail.com
10	PNG	Dr Farrel Magtoto FMagtoto@nagja.gov.pg
11	Philippines	Dr William C. Medrano Assistant Secretary for Livestock Department of Agriculture Elliptical Road, Diliman; Quezon City 1100 0908-811-5620 wcm.aseclivestock@gmail.com da.internationalorg@gmail.com
12	Samoa	Miss Seykeen Lupe Meleisea Principal Animal Production Officer seykeen.ahkuoi@maf.gov.ws
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14	Thailand	Dr. Prasit Chaitaweesub Veterinary Officer, Expert Level Bureau of disease control and veterinary services, DLD Email: prasitc@dld.go.th
15	SAARC	Dr. Ashis Kumar Samanta Senior Program Specialist (Livestock) SAARC Agriculture Centre (SAC) Cell: 01316195379 Office Ph: +880-2-8141140, 8141655, 9122808 Ext. 107 Office Fax: +880-2-9124596 draksamanta@sac.org.bd
16	OIE	Dr Lesa Thompson Regional Project Officer OIE Regional Representation for Asia and the Pacific l.thompson@oie.int
17	FAO-RAP	Dr Damian Tago Pacheco Regional Animal Health Economics FAO Regional Office for Asia and the Pacific

		Damian.TagoPacheco@fao.org
18	FAO-Lao Project	Dr Kevin Jeanes Chief Technical Advisor Climate Change Adaptation in Wetland Areas (CAWA) FAO Lao PDR Kevin.Jeanes@fao.org
19	FAO-RAP	Dr Katinka de Balogh Senior Animal Health and Production officer FAO Regional Office for Asia and the Pacific Katinka.DeBalogh@fao.org
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21	FAO-RAP	Ms Norma Sofisa Hurif Junior Professional Officer (JPO), Antimicrobial Resistance FAO Regional Office for Asia and the Pacific Norma.Hurif@fao.org
22	FAO-RAP	Mr Chanrit Uawongkun Operation / Logistic, Programme Support Officer FAO Regional Office for Asia and the Pacific Chanrit.Uawongkun@fao.org

Dates and Venues (Host Countries) of APHCA Sessions

First

Bangkok, Thailand, 7 - 11 June 1976
Chairman: Dr J.C. Madamba (Philippines)
Vice-Chairman: Dr M.N. Menon (India)
Members of the Executive Committee:
Delegates from Malaysia, Sri Lanka and Thailand

Third

Bangkok, Thailand, 16 - 21 July 1978
Chairman: Dr S. Thuraisingham (Malaysia)
Vice-Chairman: Dr A. Bandaranayake (Sri Lanka)
Members of the Executive Committee:
Delegates from Australia, Philippines and Thailand

Fifth

Bangkok, Thailand, 6 - 11 October 1980
Chairman: Dr Tim Bhannasiri (Thailand)
Vice-Chairman: Dato' Dr Osman bin Din (Malaysia)
Members of the Executive Committee:
Delegates from India, Indonesia and Sri Lanka

Seventh

Surabaya, Indonesia, 13 - 18 December 1982
Chairman: Prof. Dr J.H. Hutasoit (Indonesia)
Vice-Chairman: Dato' Dr Osman bin Din (Malaysia)
Members of the Executive Committee:
Delegates from India, Philippines and Thailand

Ninth

New Delhi, India, 8 - 13 October 1984
Chairman: Dr O.N. Singh (India)
Vice-Chairman: Dr I.G.R. Davis (Australia)
Members of the Executive Committee:
Delegates from Nepal, Singapore and Sri Lanka

Second

Kuala Lumpur, Malaysia, 22 - 26 August 1977
Chairman: Dr S. Thuraisingham (Malaysia)
Vice-Chairman: Dr A. Bandaranayake (Sri Lanka)
Members of the Executive Committee:
Delegates from Australia, Nepal and Thailand

Fourth

Manila, Philippines, 3 - 7 September 1979
Chairman: Dr S.H. Escudero III (Philippines)
Vice-Chairman: Dr Y. Prased (India)
Members of the Executive Committee:
Delegates from Bangladesh, Malaysia and Singapore

Sixth

Colombo, Sri Lanka, 10 - 15 August 1981
Chairman: Dr S.B. Dhanapala (Sri Lanka)
Vice-Chairman: Dr J.H. Hutasoit (Indonesia)
Members of the Executive Committee:
Delegates from Australia, India and Malaysia

Eighth

Bangkok, Thailand, 3 - 8 October 1983
Chairman: Dato' Dr Osman bin Din (Malaysia)
Vice-Chairman: Dr O.N. Singh (India)
Members of the Executive Committee:
Delegates from Australia, Bangladesh and Papua New Guinea

Tenth

Melbourne, Australia, 7 - 13 October 1985
Chairman: Dr R.W. Gee (Australia)
Vice-Chairman: Dr Giam Choo Hoo (Singapore)
Members of the Executive Committee:
Delegates from Pakistan, Sri Lanka and Thailand

Eleventh

Bangkok, Thailand, 7 - 13 October 1986
Chairman: Dr Giam Choo Hoo (Singapore)
Vice-Chairman: Dr J.A. deS. Siriwardene (Sri Lanka)
Members of the Executive Committee:
Delegates from Iran, Malaysia and Philippines

Thirteenth

Bangkok, Thailand, 25 - 31 October 1988
Chairman: Dr Vitoon Khumnirdetch (Thailand)
Vice-Chairman: Dr Soehadji (Indonesia)
Members of the Executive Committee:
Delegates from India, Malaysia and Sri Lanka

Fifteenth

Bangkok, Thailand 17 - 22 October 1990
Chairman: Dr A.M.B.H. Babje (Malaysia)
Vice-Chairman: Dr R.N. Alcasid (Philippines)
Members of the Executive Committee:
Delegates from Australia, Iran and Pakistan

Seventeenth

Manila, Philippines, 17 - 21 November 1992
Chairman: Dr W A. Geering (Australia)
Vice-Chairman: Dr A.A. Motallebi (Iran)
Members of the Executive Committee:
Delegates from Indonesia, Malaysia and Thailand

Nineteenth

Tehran, Iran, 20 - 24 November 1994
Chairman: Dr Wipit Chaisrisongkram (Thailand)
Vice-Chairman: Dr S.K. Shrestha (Nepal)
Members of the Executive Committee:
Delegates from Australia, India and Indonesia

Twelfth

Islamabad, Pakistan, 5 - 10 October 1987
Chairman: Dr M. Anwar Khan (Pakistan)
Vice-Chairman: Dr A. Mustaffa Babjee (Malaysia)
Members of the Executive Committee:
Delegates from India, Philippines and Thailand

Fourteenth

Jakarta, Indonesia, 30 October – November 1989
Chairman: Dr Soehadji (Indonesia)
Vice-Chairman: Dr A.K. Chatterjee (India)
Members of the Executive Committee:
Delegates from Australia, Philippines and Sri Lanka

Sixteenth

Kuala Lumpur, Malaysia, 7 - 12 October 1991
Chairman: Dr R.N. Alcasid (Philippines)
Vice-Chairman: Dr W.A. Geering (Australia)
Members of the Executive Committee:
Delegates from Iran, Myanmar and Thailand

Eighteenth

Darwin, Australia, 17 - 20 August 1993
Chairman: Dr A.A. Motallebi (Iran)
Vice-Chairman: Dr Wipit Chaisrisongkram (Thailand)
Members of the Executive Committee:
Delegates from Nepal, Philippines and Singapore

Twentieth

Bangkok, Thailand, 30 August - 2 September 1995
Chairman: Dr S.K. Shrestha (Nepal)
Vice-Chairman: Mr K. Rajan (India)
Members of the Executive Committee:
Delegates from Australia, Malaysia and Sri Lanka

Twenty-First

Kathmandu, Nepal, 3 - 6 March 1997
Chairman: Mr G.R. Patwardhan (India)
Vice-Chairman: Dr A.S. Abeyratne (Sri Lanka)
Members of the Executive Committee:
Delegates from Australia, Indonesia and the Philippines

Twenty-Third

Kochi (Cochin), India, 4 - 6 September 1999
Chairman: Dr V.K. Taneja (India)
Vice-Chairman: Dr T.A. Abilay (Philippines)
Members of the Executive Committee:
Delegates from Nepal, Papua New Guinea and Thailand

Twenty-Fifth

Manila, Philippines, 24 - 26 September 2001
Chairman: Dr J.Q. Molina (Philippines)
Vice-Chairman: Dr Mohd Nordin Mohd Nor (Malaysia)
Member of the Executive Committee:
Delegates from Australia, Bhutan, and Thailand

Twenty-Seventh

Lahore, Pakistan, 25 - 29 August 2003
Chairperson: Dr Rafaqat H. Raja (Pakistan)
Vice-Chairperson: Delegate from Indonesia
Members of the Executive Committee:
Delegates from India, Nepal and Thailand
Ex-Officio Member: Delegate from the Philippines

Twenty-Ninth

Bali, Indonesia, 26 - 29 September 2005
Chairperson: Dr Mathur Raidy (Indonesia)
Vice-Chairperson: Delegate from Thailand
Members of the Executive Committee:
Delegates from India, Myanmar and Sri Lanka
Ex-Officio Member: Delegate from Pakistan

Twenty-Second

Bangkok, Thailand, 22 - 24 June 1998
Chairman: Dr S.S.E. Ranawans (Sri Lanka)
Vice-Chairman: Mr G.R. Patwardham (India)
Members of the Executive Committee:
Delegates from Laos, Myanmar and Thailand

Twenty-Forth

Dhaka, Bangladesh, 6 - 9 November 2000
Chairman: Dr V.K. Taneja (India)
Vice-Chairman: Dr T. A. Abilay (Philippines)
Members of the Executive Committee:
Delegates from Bangladesh, Papua New Guinea and Nepal

Twenty-Sixth

Subang Jaya, Malaysia, 24 - 26 August 2002
Chairperson: Dr J.Q. Molina (Philippines)
Vice-Chairperson: Dato' Dr Mohd. Nordin Haji Mohd. Nor (Malaysia)
Members of the Executive Committee:
Delegates from Bhutan, Pakistan and Thailand
Ex-Officio Member: Delegate from India

Twenty-Eight

Chiang Mai, Thailand, 27 September – 1 October 2004
Chairperson: Dr Rafaqat H. Raja/Dr M. Afzal (Pakistan)
Vice-Chairperson: Delegate from Indonesia
Members of the Executive Committee:
Delegates from India, Nepal and Thailand

Thirtieth

Luang Prabang, Lao PDR, 22 - 26 October 2006
Chairperson: Dr Bounkhouang Khambounheuang (Lao PDR)
Vice-Chairperson: Delegate from Sri Lanka
Members of the Executive Committee:
Delegates from India, Myanmar and Thailand
Ex-Officio Member: Delegate from the Indonesia

Thirty - First

Chiang Mai, Thailand, 29 October – 1 November 2007

Chairperson: Dr M.J. Nunn (Australia)

Vice-Chairperson: Delegate from Nepal

Members of the Executive Committee:

Delegates from Bhutan, India and Mongolia

Ex-Officio Member: Delegate from Lao PDR

Thirty - Third

Pokhara, Nepal, 26-28 October 2009

Chairperson: Dr Prabhakar Pathak (Nepal)

Vice-Chairperson: Delegate from Thailand

Members of the Executive Committee:

Delegates from Iran, Malaysia and PNG

Ex-Officio Member: Delegate from Australia

Thirty - Fifth

Cebu, Philippines, 2-4 November 2011

Chairperson: Delegate from the Philippines

Vice-Chairperson: Delegate from Sri Lanka

Members of the Executive Committee:

Delegates from Bangladesh, Myanmar and Samoa

Ex-Officio Member: Delegate from Thailand

Thirty - Seventh

Thimphu, Bhutan, 22-26 September 2013

Chairperson: Delegate from Bhutan

Vice-Chairperson: Delegate from Thailand

Members of the Executive Committee:

Delegates from Indonesia, Pakistan and Papua New Guinea

Ex-Officio Member: Delegate from Sri Lanka

Thirty-Second

Bangkok, Thailand, 27 - 30 October, 2008

Chairperson: Dr M.J. Nunn (Australia)

Vice-Chairperson: Delegate from Nepal

Members of the Executive Committee:

Delegates from Bhutan, India and Mongolia

Thirty - Forth

Phuket, Thailand, 25-27 October 2010

Chairperson: Mr P Somboonprasert (Thailand)

Vice-Chairperson: Delegate from the Philippines

Members of the Executive Committee: Delegates from Australia, Samoa and Sri Lanka

Ex-Officio Member: Delegate from Nepal

Thirty - Sixth

Negombo, Sri Lanka, 21-24 October 2012

Chairperson: Sri Lanka

Vice-Chairperson: Delegate from Bhutan

Members of the Executive Committee:

Delegates from Australia, Myanmar and Samoa

Ex-Officio Member: Delegate from the Philippines

Thirty - Eighth

Chiang Mai, 3-7 November 2014

Chairperson: Delegate from Thailand

Vice-Chairperson: Delegate from Myanmar

Members of the Executive Committee:

Delegates from Australia, Indonesia, Mongolia

Ex-Officio Member: Delegate from Bhutan

Thirty-Ninth

Bangkok, 11 - 14 November 2016
Chairperson: Delegate from Myanmar
Vice-Chairperson: Delegate from India
Members of the Executive Committee:
Delegates from Lao PDR, Nepal, Samoa
Ex-Officio Member: Delegate from Thailand

Forty-first

Thailand, 11 - 14 November 2018
Chairperson: Delegate from Thailand
Vice chair-person: Delegate from Malaysia
Member of the Executive Committee:
Delegates from Australia, Philippines, Sri
Lanka
Ex-Officio Member: Thailand

Fortieth;

Myanmar, 07 -10 November 2017
Chairperson: Delegate from Myanmar
Vice chair-person: Delegate from Thailand
Member of the Executive Committee:
Delegates from Lao PDR, Nepal, Samoa
Ex-Officio Member: Thailand

Forty-Second

Malaysia, 04 - 07 November 2019
Chairperson: Delegate from Malaysia
Vice chair-person: Delegate from Thailand
Member of the Executive Committee:
Delegates from Australia, India, Iran,
Philippines
Ex-Officio Member: Myanmar

List of APHCA Chairpersons by Country (as of 2019)

Australia	5	Lao PDR	1	Philippines	5
Bangladesh	0	Malaysia	5	Samoa	0
Bhutan	1	Mongolia	0	Singapore	1
India	4	Myanmar	1	Sri Lanka	3
Indonesia	3	Nepal	2	Thailand	5
Iran	1	Pakistan	3		
Korea DPR	0	PNG	0		

List of APHCA Executive Committee Members by Country (as of 2019)

Australia	13	Lao PDR	2	Philippines	9
Bangladesh	3	Malaysia	8	Samoa	4
Bhutan	6	Mongolia	2	Singapore	3
India	10	Myanmar	6	Sri Lanka	13
Indonesia	5	Nepal	8	Thailand	17
Iran	4	Pakistan	5	Malaysia	14
Korea DPR	0	PNG	4		

ANNEX VI

APHCA Business Session Presentation summary

The 42nd APHCA Business Session was organized back to back with the APHCA workshop “Innovation in Animal Production (with special focus on animal feeding) and Human drivers of diseases” held from 5 – 6 November 2019 in Kuala Lumpur, Malaysia. The APHCA country delegates, international participation from OIE and SAARC; and national participants from Department of Veterinary Service (DVS) Malaysia were attended. This two-day workshop provided their insights during the Q&A sessions and the World Café plus a field trip to visit the stingless bee farm and swiftlet production industry. Summaries of presentation and group discussions are below:

5.1. Overview of Livestock Production by selected countries.

5.1.1. Overview of poultry and livestock production in Malaysia – Challenges and opportunities - Malaysia) - Dr. Kamaliah Gazhali

Dr. Kamaliah Gazhali presented that of 49% the Gross Domestic Product contribution from agriculture sector are from agro-food industry and the livestock industry has contributed 1.1% to GDP. Malaysia can produce enough eggs and poultry required locally, while beef, mutton, milk and their products have been imported to meet the demand. However, the government aim to increase the beef production to 30%, with cattle integration under oil palm plantation system. This system has been shown to help oil palm plantation in reducing cost of labour, cost of pesticide and can increase oil palm fresh bunch yields.

Some of the issues and challenges indicated were feed cost, animal diseases, land, labour cost as well as pollution issues. Nevertheless, the increase demand for meat and poultry as protein source, strong support from government to produce livestock products, used modern technology in livestock production, and existing farm and livestock product certification program are some of the opportunities to be further explored.

5.1.2. Overview of livestock production in Australia – Livestock production and trade in a changing international context in Australia, Dr. Mark Schipp:

Dr. Mark Schipp described the Australia’s major livestock commodities are beef, milk, sheep and wool. Most cattle and sheep are raised in low density, pasture based systems. Australia’s agricultural industry is highly export focused and Australia’s disease-free status provides a competitive advantage, with China being the largest market.

Global changes present opportunities and challenges for agriculture including climate change by increasing heat stress, reducing feed availability and quality, and increasing the impact of some pests and diseases. It has led to high feed prices and a decrease in livestock production. The global spread of African swine fever has reinforced the importance of biosecurity and led to increased Chinese demand for Australian beef. Antimicrobial resistance reduces the ability to treat

livestock diseases, which threatens animal health, welfare, productivity and public health. Consumer preferences and expectations change over time, and producers will need to anticipate and respond to these changes to ensure ongoing demand and support for livestock products.

5.2. Update information on important transboundary diseases

During this session, Dr. Lesa Thompson from OIE representative Asia and the Pacific and Dr. Damian Tago Pacheco from FAO regional Asia and the Pacific office, shared their updated situation on ASF outbreak in Asia. Following their presentations, two country delegates from Lao PDR and Philippines presented the country current situation related to the ASF outbreaks, meanwhile the delegate from Mongolia shared the current livestock production situation in the country.

5.2.1. Update on the African Swine fever (ASF) situation - Dr. Lesa Thompson:

ASF is notifiable to the OIE. It is a contagious haemorrhagic viral disease with up to 100% mortality in domestic and wild pigs, causing serious economic and production losses. The first report in Asia was in August 2018 in China but it has now been confirmed in many countries in the region. There is no effective treatment or vaccine and the virus' persistence in the environment and contaminated pork products aid transmission. The focus for prevention is on early detection and biosecurity, with strong border vigilance and awareness among stakeholders. Early reporting of the disease is vital. Control measures include strict biosecurity and quarantine, movement control, culling and compensation. The ASF Regional Collaborative Framework for Southeast (and East) Asia has been formed to help prevent the spread and mitigate the impacts of ASF in SE Asia. There is also a Standing Group of Experts on ASF for Asia, and ASF was discussed as a Technical Item at the 87th OIE General Session in May 2019. Further information and communication materials for awareness can be found on OIE websites.

5.2.2. Market disruptions due to ASF in Asia and cross-border challenges - Dr. Damian Tago Pacheco

The impact of ASF and related control measures has been reflected in a dramatic increase in the price of live pigs and pork in China. The inter-provincial price differential has increased substantially, which reflects the disruption of the value chains within China. Moreover, spillover effects to other animal meat proteins is materializing, with chicken being the most affected since it is the closest substitute of pork.

Relevance of China for global pork markets: Given the size of China's pork market and the expected supply-demand gap, international markets are recording record high levels in terms of exporting volume but also value (prices) to China. Other importers of pork will face higher prices. Due to the pig population contraction and the higher prices in China, other affected countries in SEA are expected to experience similar scenarios (high prices). This has been already observed in Vietnam, even though the government has banned pork exports to China to stabilize the domestic price of pork.

The main challenges for controlling ASF in the region are the high level of connectivity in the region, which is reflected in the trade networks of live pigs and pork products; the limited capacity to control smuggling of products; the tensions between different stakeholder groups that undermine the capacity to collaborate and have a coordinated response to this crisis.

5.2.3. Country report on ASF - Philippines: Country update on ASF, Dr. Claro N. Mingala:

The swine industry in the Philippines is still prevalently in small scale farming but remains the vital source of economic growth. An important source of animal protein with an increasing annual per capita consumption of 15.07 kilogram. Swine production is a 260 Billion peso industry with an estimated 400 Billion peso allied industry.

African Swine Fever (ASF) entered the boundaries of the Philippines in the early weeks of August 2019 due to highly suspected feeding of infected swills in the small hold farms southeast of Metro Manila. As of October 30, 2019, data submitted the World Organization for Animal Health (OIE), four provinces are already affected by ASF with a total number of 14,746 heads subjected to depopulation to control the spread.

Impacts of ASF on the industry brought loses on actual income to farmers, traders and small holders; low consumption of pork; movement restrictions leading to increase demands in other meat commodities. Estimated losses are currently about USD 14 Million. This ASF concern also cut across other issues such as “self-slaughtering practices” of some farms just to save their produce, consumers avoid consumption of pork and pork products even though certified negative to ASF, prohibition of swill feeding though cheap source of feed that can be used by small hold farmers, issuances of ordinances by local governments to protect the entry of ASF to their jurisdictions, and economic and trade implications.

Control and preventive actions are put in place by the Philippine Department of Agriculture through the Bureau of Animal Industry by elevation and stricter quarantine measures, field surveillances with the 1-7-10 kilometers zoning from the outbreak areas, serological surveillances, awareness and advocacy campaigns, and issuance of guidelines and policies. The Philippines authorities continuously reminding the public that the responsibility to control the ASF is not of the government alone but of each individual Filipinos.

5.3. Climate smart livestock and global livestock assessment model (GLEAM) - Dr. Anne Mottet

Dr. Anne Mottet presented that livestock are key to food security but livestock products are responsible for 14.5% of global anthropogenic greenhouse gas emissions than most other food sources. Emissions are caused by feed production, enteric fermentation, animal waste and land-use change. However, low carbon livestock production is possible. Ninety-two developing countries have included livestock in their Nationally Determined Contributions (NDCs) under the Paris Climate Agreement. The COP23 decision on agriculture listed six areas of work to which livestock contributes, including a dedicated area of improved livestock management systems. To move

forward, effective policies, strong institutions and the adoption of advanced practices are needed.

As one of the leading organization, FAO proposes GLEAM-I, an on-line, user-friendly and the first open and livestock specific tool designed to support governments, project planners, producers, industry and civil society organizations to calculate emissions from livestock supply chains and identify mitigation options. It works by default at country level for the entire national herds and flocks and offers default parameters that need to be revised using the most recent and accurate data from the country/project. It is also used by FAO in a number of countries to design low carbon livestock development strategies and/or to build national capacity in planning and monitoring the livestock sector.

GLEAM-i has been used in over 25 countries and has supported the design of Green Climate Fund proposals (e.g. in Kyrgyzstan), Global Environment Facility projects (e.g. Ecuador), World Bank and International Finance Corporation investments in the sector (e.g. Paraguay, Ethiopia, Nicaragua). It is also used by FAO in a number of countries to design low carbon livestock development strategies and/or to build national capacity in planning and monitoring the livestock sector (e.g. Ethiopia, North Macedonia, Mongolia).

5.4. Introduction of FAO Global Analytical Framework of Agro-ecology - Mr. Pierre Ferrand:

Agroecology is an effective approach to tackle climate change and the interconnected challenges facing food security and nutrition. It offers a unique approach to meet the needs of future generations while ensuring no one is left behind. It seeks to transform food and agriculture systems, addressing the root causes of problems and providing holistic and long-term solutions based on co-creation of knowledge, sharing and innovation, including the combination of local, traditional, indigenous and practical knowledge with multi-disciplinary science. Agroecology contributes directly to multiple SDGs through integrated practices that cut across many areas.

Many successful agroecological approaches are today being scaled up through the support of public policies, networks of knowledge exchange, and by strengthening rural institutions and improving access to markets. By bringing together the valuable knowledge, capacities and experience of diverse actors including governments, research, civil society and producer organizations, international institutions and the private sector, FAO's engagement is adding strength to Agroecology.

In addition, FAO and partners have developed a global analytical framework and a supporting database to assess the multi-dimensional performance of Agroecology: the Tool for Agroecology Performance Evaluation - TAPE. The framework collects data on the performance of agroecological systems and is harmonized and survey-based within a particular territory and can be used by farmers, scientists, extension workers at low financial and time costs. The general objective of TAPE is to produce evidence on the performance of agroecological systems across the environmental, social & cultural, economic, health & nutrition, and governance dimensions of sustaina-

bility to support agroecological transitions at different scales, in different locations, through different timeframes and to support context-specific policy making on Agroecology. In simplified words, the analytical framework aims at providing a diagnostic of agricultural performance across many dimensions to move beyond standard measures of productivity (e.g. yield/ha) and better represent the benefits and trade-offs of different agricultural systems.

TAPE is currently being presented and tested in a variety of regions and countries with partners who have existing projects and networks of producers engaged on a transition towards more sustainable agricultural production.

5.5. Outline of a Landscape Approach to Livestock Feeding Systems in the Face of Climate Change - Dr Kevin Jeanes

In Asia–Pacific region, climate change is expected to result in average annual temperature increase of + 1.6 – 2.0 °C by 2100. Temperature increase will result in medium to long term ecological impacts (evaporation, heat stress, diseases and pest related). However, more immediate direct short-term impacts are expected to arise from water which will make the existing problems of water supply, droughts and floods worse. The impact of climate change on patterns of water supply will increase the risk of cropping whereas extensive livestock systems will suffer less risk. However, Climate change driven water impacts will also more seriously impact small-scale farmers and rural populations.

The rising climate risk of cropping versus livestock, and higher risks for rural small holders, suggest that improved livestock feeding systems can play an increasing and integral role in landscape management to support SDGs, promote small holder CCA and form basis for improved interaction between climate smart livestock and cropping systems. The improved function of these livelihood systems can intern reduce human pressure on land and natural resources and act as a key intervention in catchment management. The whole interacting system in term can be termed to be a landscape approach to address the key climate threat of changed water supply – as such the landscape approach of livestock feeding systems in face of climate change.

5.6. Q & A session – all workshop participants

Dr. Katinka de Balogh mentioned about that FAO initiated the inclusion of edible insect by publishing edible insect book that look further into small-scale production. FAO RAP is currently bringing up again the issue in order to explore the benefit of edible insects as animal feed and food in terms of science and farming. She expected to collaborate with Codex Alimentarius to move forward and include the edible insect.

The Philippines delegate questioned the position of FAO on Genetically Modified Organism (GMO). Dr. Katinka de Balogh clarified that FAO remains neutral in GMO as well as grants the countries to make their own decision.

5.7. The use of anthelmintic medicated molasses blocks on ruminant health and production, Dr. Sonevilay Nampanya:

This presentation showed a recent research work to determine whether triclabendazole-mediated molasses blocks were potentially efficacious for the control of *Fasciola gigantica* in smallholder large ruminant production in Laos. The study involved 86 smallholder farmers and 241 cattle, allocated into three groups of medicated molasses block (MMB), unmedicated molasses block (UMB) and a control group. Faecal samples were collected and examined by the sedimentation technique for trematode eggs, and relevant animal details obtained from 4 data collections (weeks 1,4,8 and 12). Data analysis performed in the Genstat statistical package. Faecal egg counts reduction (FECR) of the MMB group was 45.24% and 90.48% with a mean FEC of 23 ± 11 and 4 ± 17 at week 4 and 12 post treatment, respectively. Reduction in FEC of the UMB group was also observed from 28.78% to 18.96% at weeks 1 and 12, respectively. There were significant differences in live weights within the MMB, with the mean weights of $174.60(\pm 3.35)$ kg and $191.50(\pm 3.69)$ kg in weeks 1 and 12, respectively ($P=0.01$) and average daily gain of 201g/day. This study suggests that the use of nutritional supplements via molasses blocks may have a positive impact on the susceptibility of the animal to *F. gigantica* infection with the positive impacts of supplementation enhanced if triclabendazole added in compounding of the block; delivering parasite suppressive or potentially therapeutic doses on feeding MMB. The use of MMB may offer a more sustainable strategic parasite management strategy for Lao smallholder farmers where farmer knowledge of parasites is poor and availability of restraint facilities for administration of therapeutics is largely non-existent.

5.8. Update on ongoing activities on animal feed in SAARC Agriculture Center Dr. A.K. Samanta:

According to Dr. Ashis Kumar Samanta, the SAARC region is the richest habitat for several livestock species and is the platform of livelihood and food security for millions of small and marginal farmers. In light of the above fact, every year the SAC conducted multiple regional training and expert consultation meeting on priority areas of livestock.

In 2020, the SAC is expected to carry out two capacity building program (“Hands on training on rabies diagnosis in animals”, and “Poultry production and management for safe food production”) and two expert consultation meeting (“Feeding and healthcare management of livestock during natural calamities” and “Curbing usages of antimicrobials in livestock to reduce the burden of antimicrobial resistance”). In addition, SAARC will prioritize activity on “Regional cooperation for genetic improvement of indigenous livestock” for cattle and buffalo.

5.9. The World Café Results:

During the World Café, the participants were divided into four group in order to visit four stations with different topics about foot and mouth diseases (FMD), Peste des Petits Ruminant (PPR), Rabies, and new emerging or re-emerging issues, respectively. In each station, participants had to provide answers on: the issues and challenges; the key interventions in national and regional level; and the role of APHCA.

5.9.1. Station A (Foot and Mouth Diseases (FMD):

Issues and challenges:

- Quarantine and movement control

- Resource constrain / vaccine
- Transparency / reporting

The key interventions in national and regional level:

- Effective vaccination
- Strategic plan to quarantine and inter-agency collaboration
- Strengthen lab capacity

The role of APHCA:

- Regional collaboration
- Capacity building
- Information dissemination

5.9.2. Station C (Rabies)

Issues and challenges:

- Insufficient vaccine coverage
- Increasing number of stray dogs
- Transboundary issues, caused by different level of awareness and alertness among countries

The key interventions in national and regional level:

- National rabies program, e.g. vaccination, licensing
- Regional consultation and consensus
- Capture, Neutralize, Vaccinate, and Release (CNVR)

The role of APHCA:

- APHCA members can discuss about the consensus, collaboration, and cooperation among countries
- Provide technical assistance in rabies control project
- Awareness development through social media

5.9.3. Station D (Emerging / Re-emerging issues)

Issues considered: AMR/AMU, ASF, LSD, CSF, AI, climate change, water scarcity, feed availability

Main challenges:

- Population growth and the increasing demand for livestock and livestock products
- Limited capacity in terms of resources, diagnosis, human power, preventive strategies (vaccines)
- Lack of preparedness plans – especially important in systems with a lot of small-holders/backyard farming, and they should address the whole value chain

The key interventions in national and regional level:

- Information: data collection and sharing

- Changing human behavior: sustainable practices (organic), education, and awareness
- Laws and regulations (and its enforcement)
- Trainings, including economic analysis and epidemiology

The role of APHCA:

- Resource mobilization
- Trainings
- Setting up platforms for data management and sharing (information systems)
- Identify research priorities and coordinate efforts, including joint emergency operations
- Need assessments for countries, including sharing PVS results

5.10. Panel Discussion on The APHCA countries innovations on animal feeding:

- ✓ Philippines: Block and silage technology
- ✓ Bangladesh: Urea molasses straw, rice Straw
- ✓ Malaysia: Rice Straw (processed with prebiotic and probiotic), palm oil integration system
- ✓ Nepal: farming in winter season
- ✓ Australia: Red Seaweed for methane reduction
- ✓ Bhutan: Fodder trees
- ✓ Samoa: Pasture management, planting cassava for pig farming, and use local feed resources
- ✓ Iran: Nomadic movement of small ruminants, use traditional forage / feed such as *Alfafa*
- ✓ Sri Lanka: commercial fodder production
- ✓ India: Herbal anthelmintic, hydroponic fodder
- ✓ PNG: Agriculture by product palm kernel mill (PKM)

ANNEX VII

Key Meetings organized/attended during December 2018 to October 2019

Date	Purpose / Project	Location
3 – 6 December 2018	the ASEAN- Tripartite Rabies Meeting	Hanoi, Viet Nam
14 – 17 January 2019	To provide backstopping to project UNJP/MYA/022/OPS “Improving Farmer Livelihoods in the Dry Zone through Improved Livestock Health, Productivity, and Marketing”	Yangon and Nay Pyi Taw, Myanmar
20 – 23 January 2019	The inception workshop and provide backstopping to TCP “Strengthening Capacity for enhanced Animal Nutrition Services” TCP/BHU/3704	Thimpu, Bhutan
5- 8 March 2019	The Annual Regional Meeting for the ECTAD Regional Programme in Asia and the Pacific (AREM)	Phuket, Thailand
11 – 13 March 2019	The 6 th Global Feed and Food Congress (GFFC) - Future of Feed & Food- are we ready?	Bangkok, Thailand
13 – 15 March 2019	VIV Asia 2019: Feed, Food, and Animal Health	Bangkok, Thailand
14 March 2019	The 12 th Feed Regulators Meeting	Bangkok, Thailand
18 – 19 March 2019	AMR Technical Working Group for South East Asia	Bangkok, Thailand
20 March 2019	Bangkok Responsible Business Forum Bangkok, Expert Panel Dairy	Bangkok, Thailand
20 – 22 March 2019	Consultative Meeting on Fall Armyworm in Asia	Bangkok, Thailand
23 – 28 March 2019	Project inception workshop and backstopping mission of TCP/MON/3703 “Piloting Climate Smart approaches in the livestock production systems”	Ulaanbaatar, Mongolia
31 March – 3 April 2019	OSRO/RAS/502/USA & GCP/GLO/710/UK	Rome, Italy
2 – 3 April 2019	Asian Regional Workshop on Food Safety Risk Communication in Bangkok	Bangkok, Thailand
25 May – 1 Jun 2019	Project training programmes and back stopping mission of TCP/TON/3702 “Cattle and sheep production and management in Tonga”	Tonga

6 – 7 June 2019	The BWC Regional Workshop on “Preparedness to Respond to the Deliberate Use of Biological Weapons” for the Association of Southeast Asian Nations (ASEAN) States Parties	Bangkok, Thailand
25 – 29 June 2019	SAARC- Tripartite Rabies meeting	Kathmandu, Nepal
26 – 29 June 2019	Feed Additives Asia 2019	Bangkok, Thailand
8 – 12 July 2019	FAO RAP Training Workshop Emergency Preparedness and Response	Bangkok, Thailand
17 – 19 July 2019	Regional Consultation Meeting on Mainstreaming Biodiversity across agricultural sectors	Bangkok, Thailand
22 - 24 July 2019	The 7 th Meeting of CVO s Forum and the 4 th FAO/OIE Sub-Regional Meeting of GF-TADs for SAARC	Islamabad, Pakistan
22 – 26 July 2019	Project training programmes and backstopping mission of TCP/LAO/3607 “Strengthening capacity to promote conservation and production of native livestock breeds at community level”	Vientiane and Udomxay, Laos
27 July – 4 August 2019	Joint External Evaluation (JEE) mission	Koror, Palau
6 – 8 August 2019	Progressive control pathway support officer (PSO) Training workshop	Bangkok, Thailand
26 – 29 August 2019	Invited speaker of SAFE PORK Conference	Berlin, Germany
26 – 30 August 2019	OSRO/PAK/901/CHA “Emergency support to ensure Food Security and Agriculture-based Subsistence Livelihoods of Drought Affected Population in Balochistan and Sindh Provinces of Pakistan”	Islamabad and Karachi, Pakistan
1 – 5 September 2019	The Regional Conference of the World Organization for Animal Health (OIE) Commission for Asia, Far East, and Oceania	Sendai, Japan
18 – 19 September 2019	High-level Meeting on Risk Communications for Public Health Emergencies	Bangkok, Thailand
24 – 26 September 2019	Regional workshop on the Application of the FAO Global Analytical Framework for the multidimensional assessment of Agroecology	Bangkok, Thailand
25 – 26 September 2019	IABS Conference on Rabies	Bangkok, Thailand
30 September – 4 October 2019	OSRO/PAK/902/USA “Critical support to ensure food security and agriculture-based subsistence livelihoods of drought affected population in Balochistan and Sindh provinces of Pakistan” and TCP/PAK/3705 “Livelihood Assistance to Support Drought Affected Vulnerable Farmers in Sindh”	Islamabad and Karachi, Pakistan
11 October 2019	Training of Trainers for the Disease Prioritization for Asia-Pacific Region	Bangkok, Thailand

AMR meetings and missions

Date	Purpose / Project	Location
07 – 11 January 2019	To attend The optimal multi-sectoral surveillance system for antibiotic resistance in Vietnam	Hanoi, Vietnam
17 -23 February 2019	Technical backstopping of project GCP/GLO/710/UK	Manila and Iloilo City, Philippines
19-22 February 2019	AMR One Health Conference	Tokyo, Japan
26 February – 1 March 2019	To implement the enhanced assessment of knowledge, attitudes and practices; and intervention (KAP+) on antimicrobial resistance (AMR) and discuss communication and advocacy activities	Manila, Philippines
13 – 15 March 2019	To assist the Consultative Workshop on Legislation to Curb Antimicrobial Resistance in Cambodia	Phnom Penh, Cambodia
20 – 22 March 2019	Provide technical assistance to project GCP/GLO/710/UK and conduct workshop on Lao PDR residue monitoring framework development	Vientiane, Lao PDR
16 – 19 April 2019	Two-day AMR Surveillance plan development workshop for animal and human health sectors	Dhaka, Bangladesh
13 – 15 May 2019	Framework development workshop for National AMR surveillance implementation	Dhaka, Bangladesh
9 – 12 June 2019	To finalize the work-plan for the Antimicrobial Resistance Project funded by Fleming Fund through Mott Macdonald and to be implemented together with UNOPS and WHO in Lao PDR	Vientiane, Lao PDR
11 – 15 June 2019	To evaluate the implementation of Pilot AMR Surveillance in DIC Subang and the Progress of Pilot Clinical AMR Surveillance Under DIC Wates Covered Area	Jakarta, Indonesia
17 – 19 June 2019	SEA-BeaST Network Meeting	Bangkok, Thailand
23 – 27 June 2019	Regional Workshop on Antimicrobial Resistance (AMR) in Asia	Penang, Malaysia
8 – 9 July 2019	The 2 nd Regional Workshop on Legislation Relevant for Antimicrobial Use (AMU) and Antimicrobial Resistance (AMR) in the Food and Agriculture Sector	Bangkok, Thailand
11 – 12 July 2019	Regional Forum on Antimicrobial Stewardship in Agriculture	Bangkok, Thailand
23 – 25 July 2019	Planning on Regional AMR Communication and Advocacy	Bangkok, Thailand

4 – 8 August 2019	The FAO Assessment Tool for Laboratories and Antimicrobial resistance Surveillance Systems (FAO ATLASS) mission to NEPAL	Kathmandu, Nepal
18 – 19 August 2019	To provide oversight and support to the hands on training on veterinary drug residue laboratory training provided by the FAO Reference Centre in project GCP/GLO/710/UK	Vientiane, Lao PDR
19 – 21 August 2019	First Meeting of AMR Technical Advisory Group (AMR TAG) of South Asia	Bangkok, Thailand
22 August 2019	Internal FAO Training on Data Management using WHONET	Bangkok, Thailand
31 August – 6 September 2019	The FAO Assessment Tool for Laboratories and Antimicrobial resistance Surveillance Systems (FAO ATLASS) mission to Bhutan	Thimpu, Bhutan
2 – 4 September 2019	The “Consultative Workshop on Shaping up the Antimicrobial Resistance (AMR) Surveillance in Animal Health in Cambodia” and the Training Workshop on AMR Data Management, WHONET	Phnom Penh, Cambodia
8 – 13 September 2019	Conduct laboratory capacity assessments in project GCP/GLO/710/UK	Manila, Philippines
30 September – 8 October 2019	GCP GLO 710 UK “Engaging the food and agriculture sectors in sub-Saharan Africa and South and South-East Asia in the global efforts to combat antimicrobial resistance (AMR) using a One Health Approach	Vientiane, Lao PDR Hanoi, Viet Nam
30 September – 2 October 2019	The FAO Assessment Tool for Laboratories and Antimicrobial resistance Surveillance Systems (FAO ATLASS) mission to PNG	Port Moresby, Papua New Guinea
16 – 18 October 2019	The FAO Assessment Tool for Laboratories and Antimicrobial resistance Surveillance Systems (FAO ATLASS) mission to Sri Lanka	Colombo, Sri Lanka
22 – 25 October 2019	The inception meeting of antimicrobial resistance (AMR) project (TCP/MDV/3702) “ Supporting the Agriculture Sector in the Implementation of the National Action Plan for Containment of Antimicrobial Resistance in Maldives”	Male, Maldives

ANNEX VI

Projects on animal production and feeding

No.	Country(s)	Project number	project title	Project Dates	Budget
1	Afghanistan	OSRO/AFG /804/CHA	Emergency Agriculture Livestock Assistance for Drought Affected Populations in the provinces of Hera	Jul '18 - Dec '18, New: 11 Jul 2018 - 10 Mar 2019	2,000,000
2	Afghanistan	OSRO/AFG /805/BEL	Emergency livelihoods assistance to vulnerable smallholder farmers affected by drought in Badghis	Oct '18 - Feb '19	300,000
3	Afghanistan	OSRO/AFG /802/USA	Support for Drought-Affected Farming Families with Immediate Livestock Protection Assistance	Aug '18 - Apr '19	2,500,000
4	Afghanistan	TCP/AFG/3 702/E	Integrated emergency livestock protection in support to drought-affected pastoralists in Balkh and Samangan provinces.	Aug '18 - Jul '19	500,000
5	Afghanistan	OSRO/AFG /806/CHG	Emergency agriculture assistance to drought-affected farmers in Kandahar, Faryab and Saripul	15 Oct 2018 - 14 Apr 2019	1,500,000
6	Afghanistan	OSRO/AFG /808/SWE	Emergency livelihoods support to farmers in Badkshan, Nuristan, Daykundi and Kandahar	Dec '18 - Nov '19	4,400,000
7	Afghanistan	OSRO/AFG /811/DEN	Emergency livelihoods support for vulnerable livestock owners in Badghis, Daikundi, Ghor, Helmand	Dec '18 - Jun '19	3,000,000
8	Afghanistan	OSRO/AFG /812/JPN	Integrated emergency livestock assistance to drought-affected farming families in Jawzjan & Balkh provinces	Feb '19 - Aug '19	625,000
9	Afghanistan	GCP/AFG/ 089/USA	Promoting Value Chains- Western Afghanistan	Sep '17 - Sep '20	19,000,000
10	Afghanistan	OSRO/AFG /901/JPN	Integrated emergency livestock assistance to drought affected farming families	31 March 2019 - 30 March 2020	625,000
11	Afghanistan	OSRO/AFG /903/USA	Support to drought affected farming families for agriculture and livestock protection	01-Jun-2019 - 31-Jan-2020	2,500,000
12	Bangladesh	OSRO/BGD /801/SWE	Livelihoods Recovery for Agricultural and Fishing Communities affected by the Refugee Crisis in Cox'	01 Jan 2018 - 31 Dec 2018	
13	Bangladesh	OSRO/BGD /505/USA	Improving food security and public health through strengthened veterinary services in Bangladesh	01 Oct 2015 - 30 Apr 2019	3,500,000
14	Bangladesh	TCP/BGD/ 3607	Addressing Feed Shortages through Exploration of Unconventional Feed Resources for Accelerated Livestock Development in Bangladesh	Jan '18 - 31 Oct '19	250,000

15	Bhutan	TCP/BHU/ 3704	Strengthening capacity for enhanced animal nutrition services in Bhutan	01 Dec 2018 - 30 Nov 2020	200,000
16	China	OSRO/CPR /401/USA	Immediate technical assistance to strengthen emergency preparedness for Highly Pathogenic Avian Influenza (HPAI) in China	01 Oct 2014 - 30 Sep 2019	3,348,001
17	Korea, DPR	TCP/DRK/3 604	Improvement of Pig Breeding System	Oct 16 - 31 Oct 18, new NTE 31 Dec 2018	330,000
18	Fiji	TCP/FIJ/37 02	Technical assistance for the review of Fiji's Biosecurity Promulgation	Aug 18 - July '20	219,000
19	India	TCP/IND/3 70X	Development of Integrated Crop-Livestock Farming System in MP and Odisha in India	01 Mar 2019 - 31 Dec 2020	200,000
20	India	OSRO/IND /801/CHA	Time-critical saving of livestock, emergency employment, agriculture, and livelihoods recovery for communities affected by floods in Kerala.	24 Sep 2018 - 23 Mar 2019	1,163,745
21	Indonesia	OSRO/INS/ 501/USA	Strengthening National Capacity to Prevent and Control Emerging and Re-Emerging Pandemic Threats Including Influenza A in Indonesia EPT2	NTE: 30-9-2019	
22	Laos	TCP/LAO/3 607	Strengthening capacity to promote conservation and production of native livestock breeds at community level	1 Sep 2017 - 31 Aug 2019	289,000
23	Laos	OSRO/LAO /801/CHA	Emergency agriculture support to flood affected communities in Khammoun province	18 Oct 2018 - 15 April 2019	
24	Laos	TCP/LAO/3 605	Support to Establishment of the Centre for Agricultural Economics and Markets (CAEM) in the Ministry of Agriculture and Forestry	Oct 16 - Mar 18, new NTE: 31 December 2018	299,000
25	Mongolia	TCP/MON/ 3607	Mongolia Animal Health and Veterinary Services Support	May 2017 - 30 Jun 2018, ext 31-12-2018	100,000
26	Mongolia	TCP/MON/ 3701	Emergency assistance for the control of FMD in central and western regions of Mongolia	Aug '18 - Aug '19	300,000
27	Mongolia	TCP/MON/ 3703	Piloting the Climate-Smart Livestock approach in Mongolia	10 Dec 2018 - 30 Nov 2020	250,000
28	Mongolia	MTF/MON /018/IDE	Animal identification and registration system in Mongolia		312,905
29	Mongolia	GCP/MON /014/EC TCP/MON/ 3606	Support to employment creation in Mongolia (SECiM) component 2: Piloting quality private sector work in selected livestock vegetable value chains	01/02/2016 - 31/01/2020	3,295,455
30	Myanmar	UNJP/MYA /022/OPS	Improving Farmer Livelihoods in the Dry Zone through Improved Livestock Health, Productivity and Marketing	01 Jul 2015 - 31 Dec 2018	4,400,000

31	Myanmar		AMR mitigation in poultry, Myanmar (Entity no 647721)	NTE: 14-07-2019	1,377,850
32	Myanmar	OSRO/MY A/803/CH A	Improving food and nutrition security of the most vulnerable population in Northern Rakhine State	11-09-18 - 10-06-19	599,203
33	Myanmar	OSRO/MY A/805/JPN	Improvement of Agricultural Livelihoods and Resilience for Conflict Affected Communities in Ethnic M	16 Oct 2018 - 30 Jun 2019	430,165
34	Nepal	GCP/NEP/070/LDF	Reducing vulnerability and increasing adaptive capacity to respond to impacts of climate change and variability for sustainable livelihoods in agriculture sector (FSP)	NTE: 30-09-2019	2,689,498
35	Nepal		Tackling Anti-Microbial Resistance in Nepal		694,445
36	Pakistan	OSRO/PAK /801/JPN	The project for enhancement of Foot-and-Mouth disease control in Pakistan	27 Feb 2018 - 26 Feb 2021	2,648,276
37	Pakistan	OSRO/PAK /802/JCA	Project for the Restoration of Livelihoods in FATA	01-04-2018 - 31-03-2021	4,999,995
38	Pakistan	OSRO/PAK /601/UK	Technical Support to Stakeholder Capacity Development for Effective Implementation of Pakistan's National Disaster Risk Reduction Policy	01 Sep 2016 - 31 Aug 2020	
39	Pakistan	UNJP/PAK/136/UNJ	Community Resilience and Recovery Support to FATA's Returning Internally Displaced Persons	11 Sep 2015 - 28 Feb 2019	
40	Pakistan	GCP/PAK/138/USA	Restoring Subsistence And Commercial Agriculture In FATA	15 Feb 2017 - Dec 2019	10,000,000
41	Pakistan	OSRO/PAK /803/CHA	Critical support to ensure food security and agriculture based subsistence livelihoods for recently returned families to FATA	05 Apr 2018 - 31 Mar 2019	2,800,432
42	Pakistan	UTF/PAK/139/PAK	Control of Transboundary Livestock Diseases (Foot and Mouth Disease and Peste des Petits Ruminants)	3 Jan 2017 - 30 June 2017, 30 Sep '17, new NTE: 31-12-2018 31 Mar 2019	25,417,807
43	Pakistan	TCP/PAK/3603	Support for the formulation of projects for strengthening markets and rural transformation (SMART) initiatives in Punjab, Pakistan	Oct '17 - Jun '19	300,000
44	Pakistan	UTF/PAK/145/PAK	Risk based control of FMD in Pakistan	15 May 2018 - 14 May 2024	6,610,340
45	Pakistan	UTF/PAK/148/UNJ	The project for the Restoration of Livelihoods in KP Tribal Districts (KP-TD)	01 Nov 2018 - 30 Apr 2020	13,387,154

46	Pakistan	OSRO/PAK/503/IOM	Provide immediate response and early recovery assistance for the people with greatest humanitarian needs following emergencies in Pakistan Contribute towards strengthening the capacity of government and communities to manage risks faced by disasters, reducing peoples vulnerability	07/09/2015 - 16/07/2019	5,818,329
47	Pakistan	OSRO/PAK/901/CHA	Critical support to ensure food security and agriculture-based subsistence livelihoods of drought affected population in Balochistan and Sindh provinces of Pakistan	06 Feb 2019 - 05 Aug 2019	2,500,000
48	Pakistan	TCP/PAK/3705	Emergency support to ensure Food Security and Agriculture-based Subsistence Livelihoods of Drought Affected Population in Balochistan and Sindh Provinces of Pakistan	03-04-2019 - 02 Apr 2020	498,000
49	Pakistan	OSRO/PAK/902/USA	Livestock support activity to assist vulnerable drought affected households of district Tharparkar, Sindh	March 2019 - June 2019	150,000
50	Philippines	TCP/PHI/3702	Development of Halal Agricultural Production Systems in Mindanao, Philippines	Aug 18 - Jan '20	180,000
51	Philippines	OSRO/PHI/801/CHA	Improve food security through access to food, livelihood restoration and increased agricultural capacities	9 months, from April '18?	849,997
52	Philippines	OSRO/PHI/806/BEL	Early Action for rice farmers in selected vulnerable areas of Mindanao against El Nino	01/12/2018 - 31/05/2019	400,000
53	Philippines	OSRO/PHI/901/JPN	the Project for Agricultural Training for the Establishment of Peace in Mindanao	01 Mar 2019 - 29 Feb 2020	1,765,069
54	Tokelau	TCP/TOK/3601	Strengthening capacity in home gardening, healthy food awareness and effective biosecurity for Tokelau	January 2017 - December 2018	205,000
55	Tonga	GCP/TON/001/GFF	Integrated Land and Agro-ecosystem Management Systems for Tonga (FSP)	15/02/2019 - 31/08/2020	2,344,954
56	Tonga	TCP/TON/3602	Development of integrated cattle and sheep breeding management strategies to improve productivity	- 31 Dec 2018	294,000
57	Tuvalu	TCP/TUV/3703	Strengthening capacity in integrated crop – livestock farming production system for Tuvalu.	Sep '18 - Aug '20; New: 22 Oct 2018 - 21 Sep 2020	200,000

58	Vietnam	TCP/VIE/3 605 (E)	Emergency assistance to restore the livelihoods of the poultry producers and poor farming communities affected by the El Niño-induced drought and salt-water intrusion effects	01 Feb 2017 - 31 January 2018, new NTE 31 July 2018, new NTE 31 Dec 2018	400,000
59	Vietnam	##/##/##	Bringing broiler chickens to Urban Consumers in Vietnam		2,428,960
60	RAS	OSRO/RAS /502/USA	Addressing Antimicrobial usage in Asia's livestock production industry	NTE: 30 Sep 2017, new NTE 30-09-2019	4,400,000
61	RAS	TCP/RAS/3 7xx	Strengthening capacity towards rabies elimination in Asia (Bangladesh, Bhutan, Nepal, Sri Lanka)	01/09/19 - 31/08/2021	300,000
62	RAS	TCP/RAS/3 706	Technical support to develop and implement live-stock identification and registration systems (LIRS)	August 2019 - July 2021	250,000
63	INT	MTF/INT/0 05/MUL	Animal Production and Health Commission	Jan '18 - Dec '19	3,057,822