

OIE Reference Laboratory Reports Activities

Activities in 2021

This report has been submitted : 2022-01-19 09:33:08

Name of disease (or topic) for which you are a designated OIE Reference Laboratory:	Classical swine fever
Address of laboratory:	China Institute of Veterinary Drug Control (IVDC)/Center for Veterinary Drug Evaluation (CVDE) Department of Swine Viral Biologics Inspection No.8 Zhongguancun South Street Haidian District Beijing 100081 CHINA (PEOPLES REP. OF)
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Website:	http://www.ivdc.org.cn/
Name (including Title) of Head of Laboratory (Responsible Official):	Prof. Li Ming, General Director of IVDC and CVDE
Name (including Title and Position) of OIE Reference Expert:	Prof. Qin Wang Designated expert, OIE Reference Laboratory for Classical Swine Fever at IVDC
Which of the following defines your laboratory? Check all that apply:	Governmental

ToR 1: To use, promote and disseminate diagnostic methods validated according to OIE Standards

1. Did your laboratory perform diagnostic tests for the specified disease/topic for purposes such as disease diagnosis, screening of animals for export, surveillance, etc.? (Not for quality control, proficiency testing or staff training)

Yes

Diagnostic Test	Indicated in OIE Manual (Yes/No)	Total number of test performed last year	
		Nationally	Internationally
Indirect diagnostic tests		Nationally	Internationally
Indirect ELISA Kit to Detect Antibody against Classical Swine Fever Virus	yes	1056	0
Blocking ELISA Kit to Detect the Antibody against Classical Swine Fever Virus	yes	1056	0
fluorescent antibody virus neutralisation test(CSFV)	yes	6	0
Direct diagnostic tests		Nationally	Internationally
Reverse-transcription quantitative polymerase chain reaction (CSFV)	yes	444	
Reverse-transcription nest polymerase chain reaction (CSFV)	yes	30	240
Genetic Typing (CSFV phylogenetic analysis)	yes	1	
Virus isolation (CSFV)	no	0	
Fluorescent antibody test (CSFV)	no	0	

**ToR 2: To develop reference material in accordance with OIE requirements, and implement and promote the application of OIE Standards.
To store and distribute to national laboratories biological reference products and any other reagents used in the diagnosis and control of the designated pathogens or disease.**

2. Did your laboratory produce or supply imported standard reference reagents officially recognised by the OIE?

No

3. Did your laboratory supply standard reference reagents (non OIE-approved) and/or other diagnostic reagents to OIE Member Countries?

Yes

Type of reagent available	Related diagnostic test	Produced/ provide	Amount supplied nationally (ml, mg)	Amount supplied internationally (ml, mg)	No. of recipient OIE Member Countries	Region of recipients
CSFV RT-nPCR kit [24 reactions/kit]	detects viral nucleic acid of CSFV	Produced/provide	46 kits	10 kits	2	<input type="checkbox"/> Africa <input type="checkbox"/> Americ as <input checked="" type="checkbox"/> Asia and Pacific <input type="checkbox"/> Europe <input type="checkbox"/> Middle East
National Reference Positive Serum of C-strain vaccine for vaccine detection (1ml/Ampoule)	Control for enzyme-linked immunosorbent assay (ELISA) for vaccine antibody detection	Produced/provide	365 ml	0	1	<input type="checkbox"/> Africa <input type="checkbox"/> Americ as <input type="checkbox"/> Asia and Pacific <input type="checkbox"/> Europe <input type="checkbox"/> Middle East
National Reference strong Positive Serum of CSFV for detection (1ml/Ampoule)	Fluorescent antibody virus neutralisation test (FAVN)/ Neutralising peroxidase-linked assay (NPLA)/ Enzyme-linked immunosorbent assay (ELISA) for antibody detection, virus Isolation / Fluorescent antibody test (FAT)/ Immunoperoxidase test (IPT) for antigen detection	Produced/provide	64 ml	5 ml	2	<input type="checkbox"/> Africa <input type="checkbox"/> Americ as <input checked="" type="checkbox"/> Asia and Pacific <input type="checkbox"/> Europe <input type="checkbox"/> Middle East
Reference weak Positive Serum of CSFV for detection NO.2(1ml/Ampoule)	FAVN/ NPLA/ ELISA for antibody detection, virus Isolation / FAT/ IPT for antigen detection	Produced/provide	16 ml	0	1	<input type="checkbox"/> Africa <input type="checkbox"/> Americ as <input checked="" type="checkbox"/> Asia and Pacific <input type="checkbox"/> Europe <input type="checkbox"/> Middle East
Reference weak Positive Serum of CSFV for detection NO.1(1ml/Ampoule)	FAVN/ NPLA/ ELISA for antibody detection, virus Isolation / FAT/ IPT for antigen detection	Produced/provide	13 ml	0	1	<input type="checkbox"/> Africa <input type="checkbox"/> Americ as <input checked="" type="checkbox"/> Asia and Pacific <input type="checkbox"/> Europe <input type="checkbox"/> Middle East

Reference negative Serum of CSFV for detection (1ml/Ampoule)	FAVN/ NPLA/ ELISA for antibody detection, virus Isolation / FAT/ IPT for antigen detection	Produced/provide	35 ml	0	1	<input type="checkbox"/> Africa <input type="checkbox"/> Americ as <input checked="" type="checkbox"/> Asia and Pacific <input type="checkbox"/> Europe <input type="checkbox"/> Middle East
National Reference strong Positive Serum of CSFV (Rabbit Neutralization Test, 1:847±1)(1ml/Ampoule)	FAVN/ NPLA/ ELISA for antibody detection, virus Isolation / FAT/ IPT for antigen detection	Produced/provide	50 ml	0	1	<input type="checkbox"/> Africa <input type="checkbox"/> Americ as <input checked="" type="checkbox"/> Asia and Pacific <input type="checkbox"/> Europe <input type="checkbox"/> Middle East
National Reference weak Positive Serum of CSFV (Rabbit Neutralization Test, 1:8.5±1.3)(1ml/Ampoule)	FAVN/ NPLA/ ELISA for antibody detection, virus Isolation / FAT/ IPT for antigen detection	Produced/provide	24 ml	0	1	<input type="checkbox"/> Africa <input type="checkbox"/> Americ as <input checked="" type="checkbox"/> Asia and Pacific <input type="checkbox"/> Europe <input type="checkbox"/> Middle East
National Reference weak Positive Serum of CSFV (Rabbit Neutralization Test, 1:9.6±1)(1ml/Ampoule)	FAVN/ NPLA/ ELISA for antibody detection, virus Isolation / FAT/ IPT for antigen detection	Produced/provide	6 ml	0	1	<input type="checkbox"/> Africa <input type="checkbox"/> Americ as <input checked="" type="checkbox"/> Asia and Pacific <input type="checkbox"/> Europe <input type="checkbox"/> Middle East
National Reference negative Serum of CSFV(1ml□0.5 ml /Ampoule)	FAVN/ NPLA/ ELISA for antibody detection, virus Isolation / FAT/ IPT for antigen detection	Produced/provide	25 ml	5 ml	2	<input type="checkbox"/> Africa <input type="checkbox"/> Americ as <input checked="" type="checkbox"/> Asia and Pacific <input type="checkbox"/> Europe <input type="checkbox"/> Middle East
CSFV E2 monoclonal antibody	FAVN/ NPLA/ ELISA for antibody detection, virus Isolation / FAT/ IPT for antigen detection	Produced/provide	15	5 ml	2	<input type="checkbox"/> Africa <input type="checkbox"/> Americ as <input checked="" type="checkbox"/> Asia and Pacific <input type="checkbox"/> Europe <input type="checkbox"/> Middle East

Reference Positive Serum of ASFV(0.5 ml /Ampoule)	FAVN/ NPLA/ ELISA for antibody detection, virus Isolation / FAT/ IPT for antigen detection	Produced/provide	354 ml	0	1	<input type="checkbox"/> Africa <input type="checkbox"/> Americ as <input checked="" type="checkbox"/> Asia and Pacific <input type="checkbox"/> Europe <input type="checkbox"/> Middle East
Reference Positive Serum of ASFV (CD2v deletion) (0.5 ml /Ampoule)	ELISA for antibody detection, virus Isolation / FAT/ IPT for antigen detection	Produced/provide	239.5 ml	0	1	<input type="checkbox"/> Africa <input type="checkbox"/> Americ as <input checked="" type="checkbox"/> Asia and Pacific <input type="checkbox"/> Europe <input type="checkbox"/> Middle East
Reference Positive Serum of PRV(1ml/Ampoule)	detection for extraneous agents of C-strain vaccine	Produced/provide	625 ml	0	1	<input type="checkbox"/> Africa <input type="checkbox"/> Americ as <input checked="" type="checkbox"/> Asia and Pacific <input type="checkbox"/> Europe <input type="checkbox"/> Middle East
Reference Positive Serum of PCV II(0.5ml/Ampoule)	detection for extraneous agents of C-strain vaccine	Produced/provide	20 ml	0	1	<input type="checkbox"/> Africa <input type="checkbox"/> Americ as <input checked="" type="checkbox"/> Asia and Pacific <input type="checkbox"/> Europe <input type="checkbox"/> Middle East

4. Did your laboratory produce vaccines?

No

5. Did your laboratory supply vaccines to OIE Member Countries?

No

ToR 3: To develop, standardise and validate, according to OIE Standards, new procedures for diagnosis and control of the designated pathogens or diseases

6. Did your laboratory develop new diagnostic methods validated according to OIE Standards for the designated pathogen or disease?

Yes

7. Did your laboratory develop new vaccines according to OIE Standards for the designated pathogen or disease?

Yes

Name of the new test or diagnostic method or vaccine developed	Description and References (Publication, website, etc.)
1. CLIA Kit to Detect Antibody against Classical Swine Fever Virus	Chinese registration certificate of new veterinary drugs [NO.2021,0]. http://www.moa.gov.cn/govpublic/xmsyj/202103/t20210305_6362963.htm?keywords=%E5%8F%B7
2. ASFV Real-time RT-PCR kit	Chinese registration certificate of new veterinary drugs [Passed the check inspection test by IVDC.
3. A multiplex real-time PCR assay for simultaneous detection of classical swine fever virus, African swine fever virus and atypical porcine pestivirus	Complete laboratory research data
4. A monoclonal antibody cell line against E2 protein of classical Swine fever virus and its application	Obtained the national invention patent (NO.ZL 2017 1 0089049.2), http://epub.cnipa.gov.cn/cred/CN107058239B
5. CSFV live vaccine (C-strain, PK/WRL cells)	Have obtained the certificate (http://www.xmsyj.moa.gov.cn/zfw/202006/t20200610_6346285.htm); Different clinical presentations of subgenotype 2.1 strain of classical swine fever infection in weaned piglets and adults, and long-term cross-protection conferred by a C-strain vaccine [Qin Wang, Huanhuan Liu, Lu Xu, Junping Li, Huawei Wu, Chenghuai Yang, Xiaochun Chen, Yong Deng, Yanyong Sun, Changchun Tu, Ning Chen*, Wenjie Gongc*, Guanghua Chen*] Veterinary Microbiology. 253 [2021] 108915.

ToR 4: To provide diagnostic testing facilities, and, where appropriate, scientific and technical advice on disease control measures to OIE Member Countries

8. Did your laboratory carry out diagnostic testing for other OIE Member Countries?

No

9. Did your laboratory provide expert advice in technical consultancies on the request of an OIE Member Country?

Yes

Name of the OIE Member Country receiving a technical consultancy	Purpose	How the advice was provided
PHILIPPINES	Diagnosis, Epidemiology, Molecular Characterization and Control of CSF and ASF in Southern Philippines	1. Provide 10 kits CSFV RT-nPCR kit [24 reactions/kit] [5 ml National Reference strong Positive Serum of CSFV for detection (1ml/Ampoule) [5 ml National Reference negative Serum of CSFV (1ml/Ampoule) and 5 ml CSFV E2 monoclonal antibody (1C8) to Central Mindanao University, Bukidnon, Philippines by shipping 2. Remote Technical guidance by email exchange and meeting online

ToR 5: To carry out and/or coordinate scientific and technical studies in collaboration with other laboratories, centres or organisations

10. Did your laboratory participate in international scientific studies in collaboration with OIE Member Countries other than the own?

No

ToR 6: To collect, process, analyse, publish and disseminate epizootiological data relevant to the designated pathogens or diseases

11. Did your Laboratory collect epizootiological data relevant to international disease control?

Yes

If the answer is yes, please provide details of the data collected:
The annual reports of the antigen and antibody surveillance and situation of CSFV from Key provinces in pig farms, slaughterhouses and CNAS certified laboratories in mainland China, update to CSFinfo database developed by CSFRL in IVDC.

12. Did your laboratory disseminate epizootiological data that had been processed and analysed?

Yes

If the answer is yes, please provide details of the data collected:
1.Submit the annual reports after processed and analysed collected epizootiological data to Ministry of Agriculture and Rural Affairs. 2.Published the articles.

13. What method of dissemination of information is most often used by your laboratory? (Indicate in the appropriate box the number by category)

a) Articles published in peer-reviewed journals: 6

1. Different clinical presentations of subgenotype 2.1 strain of classical swine fever infection in weaned piglets and adults, and long-term cross-protection conferred by a C-strain vaccine□Qin Wang, Huanhuan Liu, Lu Xu, Junping Li, Huawei Wu, Chenghuai Yang, Xiaochun Chen, Yong Deng, Yanyong Sun, Changchun Tu, Ning Chen*, Wenjie Gongc*, Guanghua Chen*□Veterinary Microbiology. 253□2021□108915.

2. Molecular characterization, receptor binding property, and replication in chickens and mice of H9N2 avian influenza viruses isolated from chickens, peafowls, and wild birds in eastern China. Jing Guo, Yanwen Wang, Conghui Zhao, Xinxin Gao, Yaping Zhang, Jiqing Li, Mengjing Wang, Hong Zhang, Wenqiang Liu , Chao Wang, Yingju Xia, Lu Xu , Guimei He, Jinyan Shen, Xiaohong Sun, Wenting Wang, Xinyu Han, Xiaoxuan Zhang, Zhengyang Hou, Xinlin Jin, Na Peng, Yubao Li, Guohua Deng, Pengfei Cui, Qianyi Zhang*, Xuyong Li* and Hualan Chen*. Emerging Microbes & Infections, 2021.1999778.

3. The latest research progress on the functions of the structural and non-structural proteins of classical swine fever virus. SONG Xiang-peng,XIA Ying-ju,XU Lu, ZHAO Jun-jie,WANG Zhen,WANG Qin,ZHANG Qian-yi. Chinese Veterinary Science, 2021,1207.2313.005.

4. Development of a visual method for differential detection of Classical swine fever virus. LI Yuan-xi,XIA Ying-

ju,XU-Lu,So I Xing-qi, Li Cui, Wang Zhao, Xu Yuan, Want Jian-qing, Zhao Qi-Zu, Wang Qin.. Chinese journal of preventive veterinary medicine, 2021,(03):274-279

5. Scientific significance on Molecular Epidemiological of CSFV, Wang Qin*, Zhang Qian-yi, Xu Lu, Zhao Qi-zu, Xia Ying-ju ,Zou Xing-qi , ZhuYuan-yuan , Ning Yibao, Fan Xuezheng ,Wang Zaishi,Zhao Yun, Proceedings of 2021 International Symposium for Classical Swine Fever,P1-7.

6. A multiplex real-time PCR assay for identification and detection of Classical Swine Fever Virus, African Swine Fever virus and Atypical Porcine Pestivirus, SONG Xiang-peng¹, XIA Ying-ju¹, XU Lu, ZHAO Jun-jie, WANG Zhen, ZHAO Qi-zu, LIU Ye-bing, ZHANG Qian-yi*, WANG Qin*, Proceedings of 2021 International Symposium for Classical Swine Fever,P8-10.

b) International conferences: 6

1. 2021 International Symposium for Classical Swine Fever (on line), 2-3th December 2021, Beijing, China

Wang Qin (Key Speaker), Eradication strategies of CSF

Xu Lu (Key Speaker), Development and Application of Diagnostic Technology for CSF

Xia Yingju, Simultaneous interpretation

Other lab researchers in IVDC: attending and discussing

2. The 3rd OIE Regional Meeting for OIE Reference Centres in Asia and the Pacific (on line). 24-25th February 2021, Tokyo, Japan

Wang Qin(Key Speaker), Research Achievements and scientific events of CSF in OIE RL in China

3. The 3rd International Veterinary Test and Diagnosis Conference (AVDC, <http://en.avdc-china.com/>),25-27th June in Hangzhou, China

Wang Qin(Key Speaker.),Laboratory Diagnostic Techniques of CSF

Xia Yingju(Key Speaker.), Gene chip detection of Classical Swine Fever Virus, African Swine Fever virus and Atypical Porcine Pestivirus,

Song Xiangpeng, Development of multiple real-time PCR test for detection of CSFV, ASFV and APPV.

4.The 32nd Conference of the OIE Regional Commission for Asia, the Far East and Oceania (on line), 15-16th September 2021. Bangkok, Thailand

Wang Qin and Xia Yingju attend meeting and Discusses.

5. NARO(National Agriculture and Food Research Organization) International Symposium 2021 "Outbreak and control strategy for transboundary animal and zoonotic diseases in Asia"(on line), 5th November 2021, Tokyo, Japan

Wang Qin. attend meeting and Discusses

6.IAEA and WHO-SEARO Webinar Series to support the COVID-19 testing laboratories in the Asia and the Pacific Region (on line), 16th February 2021, Vienna, Austria

Xia Yingju and Wang Qin attend meeting and Discusses.

c) National conferences: 5

1.The 12th National Symposium on Monitoring and elimination of major epidemic diseases in large-scale pig Farms□24-26th April 2021,

Wang Qin (Key Speaker),, The situation and Eradication strategies of CSF in China

2.Report to the Ministry of Agriculture and Rural Affairs, 2th February 2021, Beijing, China

Wang Qin(Key Speaker.), CSF Research Achievements of OIE/NCSFRL at IVDC

3.Seminar of College of Veterinary Medicine, Sichuan Agricultural University, 13th May 2021, Chengdu, China

Wang Qin(Key Speaker.), Current situation and control of CSF in China

4.Seminar of College of Veterinary Medicine, Nanjing Agricultural University, 17th September 2021, Nanjing, China

Wang Qin(Key Speaker.), Current situation and control of CSF in China

5.CAAV Biologics Branch Academic Forum, 20th June 2021, Beijing, China

Xia Yingju(Key Speaker.), Evaluation of ASFV molecular diagnostic kits.

d) Other:

(Provide website address or link to appropriate information) 6

1.Submitted 2021 annual report of CSF Research Achievements of OIE/NCSFRL at IVDC to the animal husbandry and veterinary bureau of the ministry of agriculture and rural affairs of China(MARA).

2.Submitted 2021 annual surveillance report of CSF in key areas in China to the animal husbandry and veterinary bureau of MARA.

3.Submitted Chapter < Classical Swine Fever > of Report on development of Veterinary Science and Technology to Animal Husbandry and Veterinary Bureau of MARA.

4.Submitted Revision < technical Specification for Prevention and Control of Classical Swine Fever > to MARA.

5.Wang Qin Communicated with OIE-CSF group About CSF Review (Chapter 3.8.3)

6.Wang Qin received the outstanding contribution award of the Journal of Scientia Agricultura Sinica in China 2021.

ToR 7: To provide scientific and technical training for personnel from OIE Member Countries**To recommend the prescribed and alternative tests or vaccines as OIE Standards**

14. Did your laboratory provide scientific and technical training to laboratory personnel from other OIE Member Countries?

Yes

- a) Technical visits: 0
- b) Seminars: 2
- c) Hands-on training courses: 0
- d) Internships (>1 month): 0

Type of technical training provided (a, b, c or d)	Country of origin of the expert(s) provided with training	No. participants from the corresponding country
b	Germany, UK, the United States, Spain, Japan, Russia, Poland, Sweden, Cuba, the Philippines ,Canada and China	40000 attendees
b	Vietnam□USA□Thailand□Singapore□Pakistan□Papua New Guinea□New Zealand□Nepal□Malaysia□Maldives□Mongolia□myanmar□ SriLanka□South Korea□Japan□India□UK, Franch, Fiji, China, Bhutan, Australia, Indonesia, Chinese Taibei,Timoe	110 attendees

ToR 8: To maintain a system of quality assurance, biosafety and biosecurity relevant for the pathogen and the disease concerned

15. Does your laboratory have a Quality Management System?

Yes

Quality management system adopted	Certificate scan (PDF, JPG, PNG format)
ISO/IEC 17025:2005	689815812420946162.jpg
CNAS-CL05:2009	CNAS-CL052009-eng.jpg

16. Is your quality management system accredited?

Yes

Test for which your laboratory is accredited	Accreditation body
Sampling, storage and transportation of CSFV samples	CNAS
Handling CSFV tissue samples	CNAS
CSF viral RNA extraction	CNAS
Isolation of CSFV in cell culture	CNAS
CSFV TCID50 test	CNAS
Fluorescent antibody test for CSFV antigen detection	CNAS
Immunoperoxidase test for CSFV antigen detection	CNAS
Reverse-transcription nest polymerase chain reaction (CSFV)	CNAS
Reverse-transcription quantitative polymerase chain reaction (CSFV)	CNAS
Indirect ELISA Kit to Detect Antibody against Classical Swine Fever	CNAS
Blocking ELISA Kit to Detect the Antibody against Classical Swine Fever Virus	CNAS
Antibody virus neutralization test (rabbit)	CNAS
Florescent antibody virus neutralization test	CNAS
ASFV virus isolation viral isolation in porcine leukocytes and hemadsorption	CNAS
ASFV virus isolation in porcine alveolar macrophages and hemadsorption	CNAS
Polymerase chain reaction for ASFV	CNAS
Quantitative polymerase chain reaction for ASFV	CNAS
Genotyping of ASFV strains	CNAS

17. Does your laboratory maintain a “biorisk management system” for the pathogen and the disease concerned?

Yes

(See *Manual of Diagnostic Tests and Vaccines for Terrestrial Animals, Chapter 1.1.4*)

ToR 9: To organise and participate in scientific meetings on behalf of the OIE

18. Did your laboratory organise scientific meetings on behalf of the OIE?

Yes

National/ International	Title of event	Co-organiser	Date (mm/yy)	Location	No. Participants
International	2021 International Symposium for Classical Swine Fever (on line)	N/A	12/2021	Beijing, China	40000

19. Did your laboratory participate in scientific meetings on behalf of the OIE?

Yes

Title of event	Date (mm/yy)	Location	Role (speaker, presenting poster, short communications)	Title of the work presented
2021 International Symposium for Classical Swine Fever (on line)	2-3th December 2021,	Beijing, China	Key Speakers(Wang Qin and Xu Lu),,shortcommunications(Xia Yingju,Zhao Qizu and Zhang Qianyi),	Eradication strategies of CSF, Development and Application of Diagnostic Technology for CSF
The 3rd OIE Regional Meeting for OIE Reference Centres in Asia and the Pacific (on line)	24-25th February 2021	Tokyo, Japan	Key Speakers(Wang Qin),short communications(Xia Yingju)	Research Achievements and scientific events of CSF in OIE RL in China
2021 Annual Veterinary Diagnostic Conference (AVDC, http://en.avdc-china.com/)	25-27th June 2021	Hangzhou, China	Key Speakers(Wang Qin and Xia Yingju)	Laboratory Diagnostic Techniques of CSF Gene chip detection of Classical Swine Fever Virus, African Swine Fever virus and Atypical Porcine Pestivirus,
4.The 32nd Conference of the OIE Regional Commission for Asia, the Far East and Oceania (on line)	15-16th September 2021	Bangkok, Thailand	short communications(Wang Qin and Xia Yingju)	Introduction to Laboratory activities
5.NARO(National Agriculture and Food Research Organization) International Symposium 2021 "Outbreak and control strategy for transboundary animal and zoonotic diseases in Asia"(on line)	5th November 2021	Tokyo, Japan	short communications(Wang Qin)	Discuss the animal trial of classical swine fever virus infection
6.IAEA and WHO-SEARO Webinar Series to support the COVID-19 testing laboratories in the Asia and the Pacific Region (on line)	16th February 2021	Vienna, Austria	short communications(Xia Yingju and Wang Qin)	Discuss surveillance programs of CSF

ToR 10: To establish and maintain a network with other OIE Reference Laboratories designated for the same pathogen or disease and organise regular inter-laboratory proficiency testing to ensure comparability of results

20. Did your laboratory exchange information with other OIE Reference Laboratories designated for the same pathogen or disease?

Yes

21. Was your laboratory involved in maintaining a network with OIE Reference Laboratories designated for the same pathogen or disease by organising or participating in proficiency tests?

Yes

Purpose of the proficiency tests: ¹	Role of your Reference Laboratory (organiser/participant)	No. participants	Participating OIE Ref. Labs/ organising OIE Ref. Lab.
Proficiency testing of all tests used for serological	Participant	39	My lab participated CSF inter-laboratory proficiency tests 2020 organised by OIE/EU Ref Lab for CSF from TiHo Hannover Germany, and got the evaluation letter_ILCT-CSF in 15 May 2021. The results are completely in line with the expectations.

¹ validation of a diagnostic protocol: specify the test; quality control of vaccines: specify the vaccine type, etc.

22. Did your laboratory collaborate with other OIE Reference Laboratories for the same disease on scientific research projects for the diagnosis or control of the pathogen of interest?

No

ToR 11: To organise inter-laboratory proficiency testing with laboratories other than OIE Reference Laboratories for the same pathogens and diseases to ensure equivalence of results

23. Did your laboratory organise or participate in inter-laboratory proficiency tests with laboratories other than OIE Reference Laboratories for the same disease?

Yes

Note: See Interlaboratory test comparisons in: Laboratory Proficiency Testing at: <http://www.oie.int/en/our-scientific-expertise/reference-laboratories/proficiency-testing> see point 1.3

Purpose for inter-laboratory test comparisons ¹	No. participating laboratories	Region(s) of participating OIE Member Countries
Participant determining laboratory's capability to conduct diagnostic tests for CSF. My lab participated CSF inter-laboratory proficiency tests 2020 organised by OIE/EU Ref Lab for CSF from TiHo Hannover Germany.	39	<input type="checkbox"/> Africa <input type="checkbox"/> Americas <input checked="" type="checkbox"/> Asia and Pacific <input checked="" type="checkbox"/> Europe <input type="checkbox"/> Middle East

ToR 12: To place expert consultants at the disposal of the OIE

24. Did your laboratory place expert consultants at the disposal of the OIE?

Yes

Kind of consultancy	Location	Subject (facultative)
Advice	China	Review the update of OIE Terrestrial Manual CSF Chapter 3.8.3

25. Additional comments regarding your report:

1. Biological sample transportation

Biological sample transportation is under strict control due to African swine fever outbreaks in east/southeast Asia countries as well as the impact of COVID-19 pandemic. Nonetheless, in 2022 we will try our best to test suspicious CSF cDNA samples collected from OIE member countries when inquired. We will committed to provide diagnostic testing facilities, and, where appropriate, scientific and technical advice on CSF control to OIE Member Countries, cooperate and exchange information with other RL, and OIE Member Countries.

2. Face-to-face scientific meetings

It is difficulty to organize and to participate in face-to-face scientific meetings and hands-on training courses for laboratory personnel from other OIE Member Countries due to the ongoing COVID-19 pandemic.

Nevertheless, we organized the 2021 International Symposium on Classical Swine Fever online and offline in Beijing. In summary, the Symposium has the following three characteristics.

a. High level conference: This Symposium supporting by officials, representatives and veterinary experts attended the Symposium, representing the Bureau of Animal Husbandry and Veterinary Services of the MARA, China Animal Disease Prevention and Control Center, and the National Animal Husbandry Agency, OIE Regional Representation for Asia and the Pacific, six OIE Reference Laboratories for CSF, veterinary researchers from 10 foreign countries (Germany, UK, Spain, USA, Japan, Philippines, Russia, Poland, Cuba and Canada). China's Chief Veterinary Officer (CVO). Dr. Li Jinxiang from the MARA addressed the Symposium. Dr. Hirofumi Kugita has emphasized that the China IVDC has been taking a strong initiative and performing very active roles to contribute to the region and the world by organizing the International Symposium. He believes that the Symposium serves as a very useful communication platform for swine disease researchers around the world not only for CSF but also for other swine diseases such as ASF.

b. Outstanding research progress and of high academic standards: At the Symposium, 30 national and international experts and scholars focused on key technologies of CSF and ASF, sharing the latest research results and exchanging experiences in CSF and ASF field.

c. A large number of online attendees and enthusiastic responses from various quarters: The conference attracted more than 40,000 online viewers across the world.