

HEALTH CERTIFICATE FOR EXPORT OF <i>IN VIVO</i>-DERIVED BOVINE EMBRYOS FROM LIECHTENSTEIN TO THE UNITED STATES OF AMERICA					
Note: A separate certificate must be issued for each consignment of embryos. The original of this certificate must accompany the shipment.					
1. Name of the national competent authority.			2. Health certificate number:		
A. ORIGIN OF EMBRYOS					
3. Approval number of the embryo collection team.....					
4. Name and address of the embryo collection team:			5. Name and address of the consignor:		
6. Area of Liechtenstein where embryos were collected:			7. Means of transport:		
B. DESTINATION OF EMBRYOS					
8.1. Name and address of the consignee:					
8.2. Port of entry into the United States:					
C. IDENTIFICATION OF THE EMBRYOS					
9. Identification of straws (freeze code):					
9.1 ID# on straws	9.2 ID# of dam/ ID# of sire	9.3 Breed of dam/ Breed of sire	9.4 Date of embryo collection	9.5 Number of straws	9.6 Indicate if sexed semen was used
10. Seal number of container:.....					

D. HEALTH INFORMATION**Section A** (to be signed by the Team Veterinarian)

11. I, the undersigned Team Veterinarian of the described embryo collection team, hereinafter "ECT," certify, either by direct examination or based on supporting documentation in my possession that has been separately attested to by an official veterinarian, that:
- 11.1 During the 12 months prior to the collection of embryos for export to the United States, there was no clinical or pathological evidence of brucellosis or tuberculosis (TB) found in the donor dams or on any premises on which the donor dams were located during that time.
- 11.2 During the 60 days prior to the collection of embryos for export to the United States, the donor dams were not corralled, pastured, or held with animals of lesser health status or under any restrictions which would make them ineligible as embryo donors for export to the United States.
- 11.3 During the 60 days prior to the collection of embryos for export to the United States, the donor dams were inspected at least once and appeared healthy and were found clinically free of contagious or communicable diseases.
- 11.4 Each of the donors were examined on the day of embryo collection and appeared healthy and were clinically free of contagious or communicable diseases.
- 11.5 The donor dams originated from herds officially free of tuberculosis.
- 11.6 The embryos were either (retain the applicable part and strike out the other) collected prior to June 1, 2011;
OR
The embryos were collected after June 1, 2011 from donors that were negative to two serum neutralization tests for Schmallenberg virus (using a 1:8 cutoff titer), with the first performed within 30 days prior to collection, and the second between 28 and 60 days after collection. Tests were performed in a laboratory approved by the national Competent Authority
- 11.7 The semen used to fertilize the embryos for export to the United States was collected in an approved semen collection centre (SCC), in accordance with legislation in force, notably Council Directive 88/407/EEC, as amended. At the time of collection of the semen, Liechtenstein was considered by the USDA to be free of foot-and-mouth disease and rinderpest, as listed in Title 9 Code of Federal Regulations, Part 94 and other official publications. In addition, the semen was either (retain the applicable part and strike out the other) collected prior to June 1, 2011; OR
the semen in the consignment was collected after June 1, 2011 from donors that were negative to two serum neutralization tests for Schmallenberg virus (using a cutoff titer of 1:8), with the first performed within 30 days prior to collection, and the second between 28 and 60 days after collection. Tests were performed in a laboratory approved by the national Competent Authority
- 11.7.1 (Retain if applicable or strike out if not applicable) If embryos were fertilized with sexed semen:
- 11.7.1.1 The semen sexing facility used to sex the semen is located in Liechtenstein, where the semen was collected. The semen collection center is under the supervision of an approved Center Veterinarian, and is regularly inspected and approved in accordance with EU Directive 88/407/EEC. The sexing facility followed a United States Department of Agriculture approved "Cleaning and Disinfection Standard Operating Protocol" while processing the semen.
- 11.7.1.2 The integrity of the semen shipment was maintained through the semen sexing process and no semen from other donors was mixed with semen during processing
- 11.8 The embryos were collected using a closed collection system, and any instrument coming in contact with reproductive tract tissue or fluids was either new or equipment sterilized before use.
- 11.9 The embryos were washed at least 10 times and treated with trypsin in accordance with the latest edition of the Manual of the International Embryo Transfer Society. After the last wash, each embryo was examined microscopically over its entire surface at not less than 50x magnification. The zona pellucida of each embryo was found to be intact and free from any adherent material subsequent to washing.

11.10 Embryos from different donors were not washed together.		
11.11 The storage and shipping containers were clean, recently disinfected, and empty prior to use for this project, and only fresh liquid nitrogen has been used.		
12.1. Date and place	12.2. Name and address of Team Veterinarian	12.3. Signature and stamp of Team Veterinarian

Section B (<i>to be signed by the Official Veterinarian after the Centre Veterinarian has signed</i>)		
<p>13. I, the undersigned Official Veterinarian of Liechtenstein certify that:</p> <p>13.1. Liechtenstein is considered by the USDA to be free from foot-and-mouth disease (FMD) and rinderpest as listed in Title 9 Code of Federal Regulations, Part 94 and other official publications, and was free of these diseases at the time of embryo collection;</p> <p>13.2. Liechtenstein is free from contagious bovine pleuropneumonia;</p> <p>13.3. the donor dams were part of the national herd of Liechtenstein for a minimum of 60 days prior to collection and were free from any movement or quarantine restrictions;</p> <p>13.4. the embryos were collected from live cattle of documented health history and processed in accordance with the standards of the International Embryo Transfer Society (IETS) by an embryo collection team approved by the competent authority of Liechtenstein in accordance with EU legislation in force, notably Council Directive 89/556/EEC, as amended.</p> <p>13.5. all diagnostic testing of the donor dams and sires were conducted in laboratories approved by the National Veterinary Services to conduct such tests for export.</p> <p>13.6. all media additives of animal origin were sourced from countries considered by the USDA to be free from FMD and rinderpest. Trypsin of porcine origin was sourced from countries considered by USDA to be free from FMD, rinderpest, classical swine fever and African swine fever as listed in 9 CFR Part 94 and other official publications. (https://www.aphis.usda.gov/wps/portal/aphis/ourfocus/importexport?1dmy&urile=wcm%3apath%3a%2Faphis_content_library%2Fsa_our_focus%2Fsa_animal_health%2Fsa_import_into_us%2Fct_animal_disease_status);</p> <p>13.7. the embryos were maintained under lock and key or in the custody of the embryo collection team veterinarian until being sealed for direct transport to the United States;</p> <p>13.8. the Team Veterinarian that completed Section A of this certificate is authorized by the National Veterinary Service to perform this service.</p>		
14.1. Date and place	14.2. Name and address of Official Veterinarian	14.3. Signature and stamp of Official Veterinarian