

Influenza Reagent
Influenza Anti-A/Victoria/361/2011-like HA Serum
NIBSC code: 12/116
Instructions for use
(Version 2.0, Dated 03/10/2014)

1. INTENDED USE

Influenza antiserum reagent 12/116 is prepared for single radial diffusion (SRD) assay of A/Victoria/361/2011-like antigens using an appropriate NIBSC antigen reagent.

The antiserum reagent was prepared in sheep 558, 559, 560, 561, 562 and 563 to the purified HA of A/Victoria/361/2011-like virus. The HA antigens were extracted from purified virus by treatment with bromelain and purified by sedimentation on sucrose gradients (Brand, CN and Skehel, JJ, Nature, New Biology, 1972, 238, 145-147.

2. CAUTION

This preparation is not for administration to humans or animals in the human food chain.

The material is not of human or bovine origin. As with all materials of biological origin, this preparation should be regarded as potentially hazardous to health. It should be used and discarded according to your own laboratory's safety procedures. Such safety procedures should include the wearing of protective gloves and avoiding the generation of aerosols. Care should be exercised in opening ampoules or vials, to avoid cuts.

3. UNITAGE

No unitage is assigned to this material.

4. CONTENTS

Country of origin of biological material: United Kingdom.

The immunization schedules for all sheep was as follows: One dose of approximately 50µg of A/Victoria/361/2011-like (IVR-165) HA with Freund's Complete Adjuvant (FCA) was given intramuscularly, followed two weeks later with a 10 microgram dose of including Freund's Incomplete Adjuant (FIA). One further 10 microgram dose of A/Victoria/361/2011-like (IVR-165) including FIA was given one week later. A further immunization of 10 microgram dose of A/Victoria/361/2011-like (NIB-79) followed one week later. Six weeks after the initial immunization, serum was collected and sodium azide (0.05% w/v) added.The sera were then treated by an APHIS approved method for the inactivation of FMDV.

The sera were pooled and then diluted 1:3.75 with PBS buffer containing sodium azide (0.05% w/v) and filled into vials in 2ml volumes.

5. STORAGE

The recommended storage temperature is +2-8°C. However, if it is intended to store the reagent for long periods i.e.>2years, they may be stored at -20°C. The antiserum can be frozen and thawed without any adverse impact on use in the SRD assay.

6. DIRECTIONS FOR OPENING

Vials have a screw cap; an internal stopper may also be present. The cap should be removed by turning anti-clockwise. Care should be taken to prevent loss of the contents. Please note: If a stopper is present on removal of the cap, the stopper should remain in the vial or be removed with the cap.

7. USE OF MATERIAL

For the assay of antigens containing 20-50 micrograms of HA activity in 1ml, approximately 14µl of the undiluted reagent should be added to 1ml agarose. It may be necessary to change the antiserum concentrations according to local laboratory conditions.

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Antiserum Reagent 12/116 should be used according to the method described by Wood, JM, Schild, GC, Newman, RW and Seagroatt, VA. Journal of Biological Standardisation, 1977, 5, 2.

8. STABILITY

It is the policy of WHO not to assign an expiry date to their international reference materials. They remain valid with the assigned potency and status until withdrawn or amended.

Reference materials are held at NIBSC within assured, temperature-controlled storage facilities. Reference Materials should be stored on receipt as indicated on the label. Once reconstituted, diluted or aliquoted, users should determine the stability of the material according to their own method of preparation, storage and use.

NIBSC follows the policy of WHO with respect to its reference materials.

Users who have data supporting any deterioration in the characteristics of any reference preparation are encouraged to contact NIBSC.Reference materials are held at NIBSC within assured, temperature-controlled storage facilities. Reference Materials should be stored on receipt as indicated on the label.

9. REFERENCES

None

10. ACKNOWLEDGEMENTS

None

11. FURTHER INFORMATION

Further information can be obtained as follows;

This material: enquiries@nibsc.org

WHO Biological Standards:

http://www.who.int/biologicals/en/ JCTLM Higher order reference materials:

http://www.bipm.org/en/committees/jc/jctlm/

Derivation of International Units:

http://www.nibsc.org/standardisation/international_standards.aspx

Ordering standards from NIBSC:

http://www.nibsc.org/products/ordering.aspx

NIBSC Terms & Conditions:

http://www.nibsc.org/terms_and_conditions.aspx

12. CUSTOMER FEEDBACK

Customers are encouraged to provide feedback on the suitability or use of the material provided or other aspects of our service. Please send any comments to enquiries@nibsc.org

13. CITATION

In all publications, including data sheets, in which this material is referenced, it is important that the preparation's title, its status, the NIBSC code number, and the name and address of NIBSC are cited and cited correctly.

14. MATERIAL SAFETY SHEET

Classification in accordance with Directive 2000/54/EC, Regulation (EC) No 1272/2008: Not applicable or not classified

| Physical and Chemical properties | | | |
|----------------------------------|------------|----|--|
| Physical appearance: Liquid | Corrosive: | No | |
| Stable: | Oxidising: | No | |
| Yes | _ | | |





| Hygroscopic: No | Irritant: | No | | |
|--|---|--|--|--|
| Flammable: No | Handling: | See caution, Section 2 | | |
| Other (specify): Contains Sheep Serum and Sodium Azide (0.05% w/v) | | | | |
| Toxicological properties | | | | |
| Effects of inhalation: Not established, avoid inhalation | | | | |
| Effects of ingestion: Not established, avoid ingestion | | | | |
| Effects of skin absorption: Not established, avoid contact with skin | | | | |
| Suggested First Aid | | | | |
| Inhalation: S | eek medical adv | ice | | |
| Ingestion: Seek medical advice | | | | |
| | /ash with copious amounts of water. Seek nedical advice | | | |
| Contact with skin: W | ash thoroughly v | with water. | | |
| Action on Spillage and Method of Disposal | | | | |
| material wetted with a appropriate disinfectal | n appropriate dis nt followed by wa | e taken up with absorbent sinfectant. Rinse area with an ater. age should be treated as | | |

15. LIABILITY AND LOSS

In the event that this document is translated into another language, the English language version shall prevail in the event of any inconsistencies between the documents.

Unless expressly stated otherwise by NIBSC, NIBSC's Standard Terms and Conditions for the Supply of Materials (available at http://www.nibsc.org/About_Us/Terms_and_Conditions.aspx or upon request by the Recipient) ("Conditions") apply to the exclusion of all other terms and are hereby incorporated into this document by reference. The Recipient's attention is drawn in particular to the provisions of clause 11 of the Conditions.

16. INFORMATION FOR CUSTOMS USE ONLY

Country of origin for customs purposes*: United Kingdom
* Defined as the country where the goods have been produced and/or sufficiently processed to be classed as originating from the country of supply, for example a change of state such as freeze-drying.

Net weight: 2g

Toxicity Statement: Non toxic

Veterinary certificate or other statement if applicable.

Attached: Yes SH558 SH558A SH559 SH559A SH560 SH560A

SH561 SH561A SH562 SH562A SH563 SH563A

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VETERINARY CERTIFICATE OF ANIMAL HEALTH

This is to certify that I have examined a Sheep with ear tag number: UK 028 8289 1261 [Virology no. SH558], which has been used in the production of blood antiserum between 1st March 2012 and 11th April 2012. Both the ear tag number and the animals' record show that it is of UK origin.

This animal was a breeding Ewe which became surplus to requirements. In my opinion at the time of clinical examination, the ewe was in good health and showed no clinical signs of infectious disease.

Dr Jean-Philippe Mocho MRCVS Named Veterinary Surgeon







This is to certify that serum collected from Sheep no. UK 028 8289 1261 [Virology no.SH 558] has been treated by an APHIS approved method for inactivation of Foot and Mouth Disease Virus. The treatment method used was maintenance of pH5.5 or lower for a minimum of 40 minutes.

Dr Philip Minor Deputy Director

National Institute for Biological Standards and Control

World Health Organization





VETERINARY CERTIFICATE OF ANIMAL HEALTH

This is to certify that I have examined a Sheep with ear tag number: UK 028 8289 5931 [Virology no. SH559], which has been used in the production of blood antiserum between 1st March 2012 and 11th April 2012. Both the ear tag number and the animals' record show that it is of UK origin.

This animal was a breeding Ewe which became surplus to requirements. In my opinion at the time of clinical examination, the ewe was in good health and showed no clinical signs of infectious disease.

Dr Jean-Philippe Mocho MRCVS Named Veterinary Surgeon







This is to certify that serum collected from Sheep no. UK 028 8289 5931 [Virology no.SH 559] has been treated by an APHIS approved method for inactivation of Foot and Mouth Disease Virus. The treatment method used was maintenance of pH5.5 or lower for a minimum of 40 minutes.

Dr Philip Minor Deputy Director

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VETERINARY CERTIFICATE OF ANIMAL HEALTH

This is to certify that I have examined a Sheep with ear tag number: UK 028 8289 5970 [Virology no. SH560], which has been used in the production of blood antiserum between 1st March 2012 and 11th April 2012. Both the ear tag number and the animals' record show that it is of UK origin.

This animal was a breeding Ewe which became surplus to requirements. In my opinion at the time of clinical examination, the ewe was in good health and showed no clinical signs of infectious disease.

Dr Jean-Philippe Mocho MRCVS Named Veterinary Surgeon

> Dr Jean-Philippe Mocho MRCVS Phone/Fax 020 7468 5333 Mobile: 07809 099 458 Email: <jmocho@rvc.ac.uk>

UK Official Medicines Control Laboratory







This is to certify that serum collected from Sheep no. UK 028 8289 5970 [Virology no.SH 560] has been treated by an APHIS approved method for inactivation of Foot and Mouth Disease Virus. The treatment method used was maintenance of pH5.5 or lower for a minimum of 40 minutes.

Dr Philip Minor Deputy Director

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VETERINARY CERTIFICATE OF ANIMAL HEALTH

This is to certify that I have examined a Sheep with ear tag number: UK 028 8289 1561 [Virology no. SH561], which has been used in the production of blood antiserum between 1st March 2012 and 11th April 2012. Both the ear tag number and the animals' record show that it is of UK origin.

This animal was a breeding Ewe which became surplus to requirements. In my opinion at the time of clinical examination, the ewe was in good health and showed no clinical signs of infectious disease.

Dr Jean-Philippe Mocho MRCVS Named Veterinary Surgeon







This is to certify that serum collected from Sheep no. UK 028 8289 1561 [Virology no.SH 561] has been treated by an APHIS approved method for inactivation of Foot and Mouth Disease Virus. The treatment method used was maintenance of pH5.5 or lower for a minimum of 40 minutes.

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VETERINARY CERTIFICATE OF ANIMAL HEALTH

This is to certify that I have examined a Sheep with ear tag number: UK 028 8289 5932 [Virology no. SH562], which has been used in the production of blood antiserum between 1st March 2012 and 11th April 2012. Both the ear tag number and the animals' record show that it is of UK origin.

This animal was a breeding Ewe which became surplus to requirements. In my opinion at the time of clinical examination, the ewe was in good health and showed no clinical signs of infectious disease.

Dr Jean-Philippe Mocho MRCVS Named Veterinary Surgeon







This is to certify that serum collected from Sheep no. UK 028 8289 5932 [Virology no.SH 562] has been treated by an APHIS approved method for inactivation of Foot and Mouth Disease Virus. The treatment method used was maintenance of pH5.5 or lower for a minimum of 40 minutes.

Dr Philip Minor Deputy Director

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VETERINARY CERTIFICATE OF ANIMAL HEALTH

This is to certify that I have examined a Sheep with ear tag number: UK 028 8289 5966 [Virology no. SH563], which has been used in the production of blood antiserum between 1st March 2012 and 11th April 2012. Both the ear tag number and the animals' record show that it is of UK origin.

This animal was a breeding Ewe which became surplus to requirements. In my opinion at the time of clinical examination, the ewe was in good health and showed no clinical signs of infectious disease.

Dr Jean-Philippe Mocho MRCVS Named Veterinary Surgeon







This is to certify that serum collected from Sheep no. UK 028 8289 5966 [Virology no.SH 563] has been treated by an APHIS approved method for inactivation of Foot and Mouth Disease Virus. The treatment method used was maintenance of pH5.5 or lower for a minimum of 40 minutes.

Dr Philip Minor Deputy Director

National Institute for Biological Standards and Control