



National Sanitary Veterinary and Food  
Safety Authority



# Report 10 August-6 September West Nile in Romania

SCFCAH 07 – 08.09.2010

## West Nile Virus Transmission Cycle

Mosquito  
vectors  
(primarily  
*Culex* species)



VIRUS



Vertebrate reservoirs



VIRUS



Dead - end hosts





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# EPIDEMIOLOGICAL SITUATION IN ROMANIA REGARDING WEST NILE INFECTION IN HUMAN

- **BACKGROUND : 1996: 393 COFIRMED CASES IN HUMAN**
- **AFTER 14 YEARS:**
  - **2 death** in Bucarest and Constanta counties (old peoples with cardiac and immunity problems);
  - **15 humans confirmed infected** in other 6 counties (CT, TR, DJ, AB, CJ, SB)







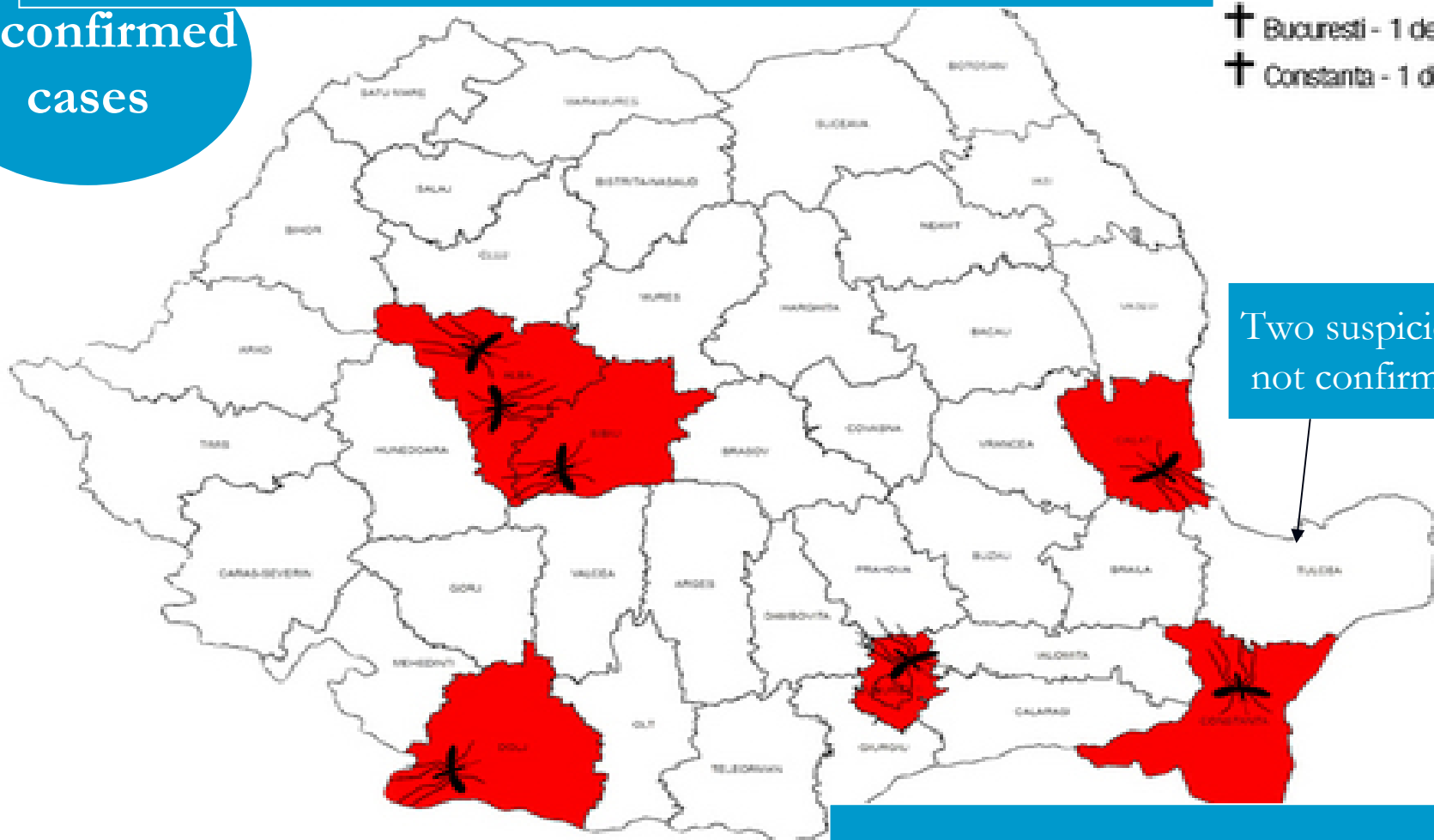
## HUMAN CASES – until six september 2010

15 confirmed cases



ode

- † Bucuresti - 1 deces
- † Constanta - 1 deces



Two suspicions not confirmed

**TWO DEAD: Constanta, Bucharest**



## WEST NILE ANIMALS SURVEILLANCE

- ACTIVE and PASIVE 2009-2010
- RISK ZONE: active monitoring is carry out on three components :
  1. serological
  2. virusological
  3. entomological
- In wild birds West Nile surveillance : together with avian influenza samples .







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## ELISA IgG tests in 2009

2009 : serological tests, 1923 samples serum from horses, sheep and domestic birds, 530 serological ELISA IgG-positive without clinical signs, mortality) 1393 negative; wild birds: tests on dead birds: no positives.



No ELISA IgM tests.

*\*serological surveillance: Ab for WNF- NO  
CLINICAL SIGNS ! So only contact with virus .*





## ELISA IgG tests in 2010

- 918 samples of serum were analyzed up to July
- 18 counties surveillance.
- 211 samples positive and 707 negative.
- **The distribution of tested samples :**
  - horses – 198 positive; 626 negative (total – 824 samples)
  - birds – 9 positive; 10 negative (total – 19 samples)
  - wild dead birds – 50 negative (total – 50 samples).

**NO ELISA IgM tests.**





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## MEASURES

- Protocol and Active surveillance plan with the public health authorities
  - Mosquito management program
  - Investigate all suspected cases of WNF
  - Mass media information
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- VIGILANCE in suspicions
  - ELISA IgM tests acquisition - if necessary





## CONCLUSIONS

- There are not registered morbidity and mortality in birds and horses due to WNV
- The results of virological examinations carried out on samples harvested from wild birds were negative.
- National Reference Laboratory for Arboviroses is ready to finalize a protocol for the detection of viral specific genom W.N.
- Continuing the mosquitoes monitoring plan
- VIGILANCE in suspicions
- ELISA IgM tests acquisition if necessary



# Thank you for your attention!

