## TETANUS

<table>
<thead>
<tr>
<th>ANIMAL GROUP AFFECTED</th>
<th>TRANSMISSION</th>
<th>CLINICAL SIGNS</th>
<th>FATAL DISEASE?</th>
<th>TREATMENT &amp; CONTROL</th>
</tr>
</thead>
<tbody>
<tr>
<td>Macaca mulatta, Papio cynocephalus, Callicebus moloch, Saimiri sciureus</td>
<td>Deep wounds (bite wounds)</td>
<td>Lockjaw: torpor, stiffening, trismus, opisthotonus, status epilepticus, death</td>
<td>Yes</td>
<td>Hyperimmune serum, Penicillin</td>
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<td></td>
<td>In houses</td>
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<td>in zoos</td>
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<td>vaccination</td>
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Fact sheet compiled by Manfred Brack, formerly German Primate Center, Göttingen / Germany.

Fact sheet reviewed by W. Rietschel, Wilhelma Zoologischer-Botanischer Garten, Stuttgart, Germany
C. Furley, Howletts Zoo, Bekesbourne, United Kingdom

Susceptible animal groups
Macaca mulatta, Papio cynocephalus, Callicebus moloch, Saimiri sciureus.

Causative organism
*Clostridium tetani.*

Zoonotic potential
Questionable.

Distribution
World-wide.

Transmission
Deep wounds – bite wounds!

Incubation period
In man 2 – 14 days.

Clinical symptoms
Torpor, inability to prehend food, difficulties in swallowing food, stiffening “kangaroo hopping”, trismus, opisthotonus, status epilepticus, death.

Post mortem findings
None.

Diagnosis
Clinical Symptoms, only exceptionally anaerobic cultivation of the lesions.

Material required for laboratory analysis

Relevant diagnostic laboratories
Konsiliarlaboratorium für anaerobe Bakterien
Zentrum für Infektionsmedizin
Institut für Medizinische Mikrobiologie und Infektionsepidemiologie
Universität Leipzig
Liebigstr. 24
D 04103 Leipzig
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e-mail: acr@medizin.uni-Leipzig.de

Treatment
Hyperimmunoserum, Penicillin, Tetracycline.

Prevention and control in zoos
Tetanus – toxoid vaccination.

Suggested disinfectant for housing facilities
<table>
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<th>Notification</th>
</tr>
</thead>
<tbody>
<tr>
<td>Guarantees required under EU Legislation</td>
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<tr>
<td>Guarantees required by EAZA Zoos</td>
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<tr>
<td>Measures required under the Animal Disease Surveillance Plan</td>
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<td>Measures required for introducing animals from non-approved sources</td>
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<tr>
<td>Measures to be taken in case of disease outbreak or positive laboratory findings</td>
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<tr>
<td>Conditions for restoring disease-free status after an outbreak</td>
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</tbody>
</table>

**Experts who may be consulted**
Prof. Dr. A. C. Rodloff, Konsiliarlaboratorium Leipzig

**References**