involved in shared dining activities, first responders in our jurisdiction are entire units, departments, or shifts of. Appropriate planning may reduce the potential for naturally occurring outbreaks (7). Our recommendations here are similar to those employed by airlines to protect pilots and copilots on long flights by serving separate meals prepared in different kitchens (11).

Our intention is to share with other preparedness agencies our observation that first response assets might be compromised by something as seemingly innocuous as a holiday party. Appropriate planning may reduce the risk of intentional food contamination that targets security forces or first responders, either as an isolated strike or as part of a larger, coordinated terrorist attack.

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References

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Rickettsiae in Ixodid Ticks, Sicily

To the Editor: Members of the spotted fever group rickettsiae are intracellular bacteria usually associated with ixodid ticks, which are transferred to vertebrates by salivary secretions and within ticks transstadially and transovarially. Several tickborne rickettsiae cause human or animal diseases and, in the last 10 years, the increased use of molecular-based...
Identification methods have resulted in new spotted fever group rickettsiae being characterized in ixodid ticks throughout Europe (1). Until recently, no rickettsiae, other than *Rickettsia conorii*, were reported in Italy. Since 2002, *R. helvetica* and Israeli spotted fever *Rickettsia* (*R. conorii* complex) have been detected in *Ixodes ricinus* and *Rhipicephalus sanguineus*, respectively (2–4). In Italy, Mediterranean spotted fever is endemic. This disease appears to occur more commonly in some central and southern regions (5); in 2002, more than half (498 of 890) of the cases of Mediterranean spotted fever identified in Italy and reported to the Ministry of Health came from Sicily.

Because of the relatively high prevalence of rickettsial diseases in southern regions, we analyzed tick samples collected during 2001 and 2002 from herbivores (bovines, ovinous, donkeys) from Sicilian farms in Corleone (Palermo Province) to determine the diversity of spotted fever group rickettsiae in various ixodid tick species. DNA from 238 tick samples from various genera (*Dermacentor, Rhipicephalus, Hyalomma, Haemaphysalis, Ixodes*) was extracted; in some cases, individual ticks of the same species collected from the same animal were pooled. Polymerase chain reaction screening and sequencing with primers for the gene encoding the cell surface antigen (sca4) (previously known as “gene D”) and the 17-kDa antigen gene were performed as previously reported (6,7). A total of 7 positives were found, and the sequences obtained were compared to other bacterial sequences present in the GenBank database (Table). A 469-bp fragment with 100% identity to the *R. slovaca* sca4 sequence (AF155054) was obtained from 2 *Dermacentor marginatus* and 1 *Haemaphysalis punctata*. A 403-bp fragment with 99.75% identity (1-bp difference) to the sca4 sequence from *R. africae* (AF151724) was found from 1 *Hyalomma marginatum*, and a 423-bp fragment with 100% similarity to *R. conorii* sca4 sequence (AE008626) was found from *Rhipicephalus turanicus*. Finally, a 489-bp fragment with 99.79% identity (1-bp difference) to *R. aeschlimannii* sca4 sequence (AF163006) was obtained from 2 *H. marginatum* samples. The levels of identity between the 17-kDa antigen sequences (ranging in length from 351 to 419 bp) obtained during this study and those in GenBank were generally lower than those for sca4 because the 17-kDa antigen gene has not been sequenced for most of the *Rickettsia* spp. identified here on the basis of sca4 sequences. One exception was the fragment obtained from the *Rhipicephalus turanicus* sample, which had 100% identity between the 17-kDa antigen sequences described in this study have been deposited in the EMBL database (accession no. AJ781411-AJ781420).

Among the numerous rickettsia species recently described in Europe, *R. africae* and *R. slovaca* are known as human pathogens (8), and the first case of *R. aeschlimannii* infection in humans has recently been reported (9). African tick bite fever caused by *R. africae* is known as an imported disease in patients returning from sub-Saharan Africa or the West Indies (8), but our report raises the possibility that the rickettsial agent is actually present in European ticks from genera other than *Amblyomma*. *R. slovaca* has been shown to be responsible for a human disease known as tick-borne lymphadenopathy (10). Considering the problem of cross-reaction between different spotted fever group rickettsiae during serologic tests, our findings underscore the importance of using antigens from other spotted fever group rickettsiae, in addition to that of *R. conorii*, to obtain a more specific diagnosis of rickettsioses in Italy (10). Considering the large number of tick species present in Italy, and their infection with different spotted fever group rickettsiae, identifying the tick species responsible for a bite could be helpful for accurate diagnosis.

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