Rhodococcus equi: are phenotypic tests the best method for accurate identification?

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Received: 11 June 2015 / Accepted: 4 August 2015 / Published online: 9 August 2015
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Heidari Sureshjani and colleagues recently reported Isolation of *Rhodococcus equi* from a mule with cutaneous wound (Sureshjani et al. 2014). In this article, they describe the use of phenotypic testing for identification of species. The genus *Rhodococcus* is one of the actinomycete families and the name of this genus first used by Zopf. *Rhodococcus* are Gram-positive, partially acid fast, aerobic, and non-motile bacteria (Bell et al. 1998). Identification of *Rhodococcus* species using conventional methods is difficult, and the results of these methods are not suitable for accurate identification. There is some published evidence that the identification of *Rhodococcus* and *Gordonia* from each other is impossible with phenotypic tests (Blanc et al. 2007). CAMP (Christie-Atkins-Munch-Petersen) test is actually a rapid identification phenotypic marker for *R. equi*, although this test is also positive in other bacteria such as *Rhodococcus erythropolis*, *Rhodococcus rhodochrous*, *Dietzia* spp., and *Mycobacterium* spp. (Pd et al. 2012). The use of conventional methods with molecular technique such as polymerase chain reaction (using *choE* gene) is very important and necessary for accurate identification of *R. equi* (Pd et al. 2012; Krewer et al. 2008; Ladrón et al. 2003).

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