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A Bayesian herd-level diagnostic test evaluation – *Mycoplasma bovis*

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**OBJECTIVE**
To evaluate the performance, at herd level, of the BIO K 302 *Mycoplasma bovis* ELISA against the PathoProof Mastitis-3 PCR.

**CONCLUSION**
The BIO K 302 ELISA positive predictive value improves, at herd level, if the cut-off is increased.

**RESULTS**

- Worse sensitivity at higher cut-off
- Better specificity at higher cut-off
- A high cut-off increases the PPV…
- … but reduces the NPV.

**BAYESIAN LATENT CLASS ANALYSIS**

Elisa - ODC% 20, 30, 37, 40, 50, 60 & PCR - C_t 37

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Posterior: Sensitivities, Specificities & Prevalence

Gibbs Sampler
OpenBUGS v3.2.2 rev 1063
Uninformative priors

**M. Bovis causes disease in cattle** of all ages. Recently the prevalence among Danish dairy cattle has increased. A diagnostic test evaluation is required to establish a control program.

**REFERENCES**


b) Data were supplied by the Knowledge Centre for Agriculture, Aarhus, Denmark.

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