



Name:	Christopher Browne		
Project title:	Assessment of three novel methods of reduction of pathogen load in the environment of pigs		
Institute:	Royal Veterinary College		
Start date:	November 2011	Finish date:	October 2014
Lay summary of project (<i>in your own words</i>) I am investigating alternative methods to reduce bacterial load/ infections in pigs using the example of <i>M. hyopneumoniae</i> (enzootic pneumonia). These methods do not rely on antibiotics or vaccination. These alternative methods cleanse the environment of the pigs, thus reducing the overall pathogen load the pigs are exposed too. The work currently being carried out is looking at; <ul style="list-style-type: none">• How <i>M. hyopneumoniae</i> survives in the environment.• Testing the alternative methods of pathogen reduction in the laboratory to assess if <i>M. hyopneumoniae</i> is killed.• Perform environmental studies to see if there are reductions in environmental bacteria using these alternative methods. It is important to establish whether the alternative methods prevent or kill <i>M. hyopneumoniae</i> and to assess if they are practical and economically viable to be used in pig buildings. This work will hopefully benefit the pig industry by reducing the amount of antibiotics being given to pigs in the controlling respiratory diseases.			
A bit about yourself (<i>one paragraph</i>) I studied an BSc (Hons) and MSc in Animal sciences. Working on a pig farm developed my interests in pigs. I enjoy studying disease pathogenesis and aetiology, and have worked on both PCV2 and <i>M. hyopneumoniae</i> . In my spare time I enjoy rock climbing, walking along the beach with the dog and relaxing with friends.			
What you hope to get out of your PhD I would like to remain in academia and therefore a PhD is essential. There are several specific laboratory techniques I hope to develop more and continue working in the lab on various bacterial pig diseases.			
A photograph of your work  <i>M. hyopneumoniae</i> exposed to silver ions after 20 minutes.			

Declaration: I hereby give permission for my photo and the information provided to be used by BPEX in any publication, printed or electronic, for the purpose of informing stakeholders about my work.

Signature: C.S. Browne

Date: 17 September 2013