



VETERINARY PRODUCTS AND AQUATIC ANIMALS

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The use of antimicrobial agents in aquaculture raises some unique and important issues. Bacteria possess a remarkable ability to become resistant to antimicrobial agents. The overuse or misuse of these agents automatically leads to a reduction in their therapeutic value with serious consequences for animal health and welfare and the economics of aquaculture. Antimicrobial agents use in aquaculture may also present risks for human health. For these reasons, it is essential that the use of these agents be regulated to ensure that it is both prudent and rational. The OIE initiated the development of standards on this topic in January 2010. This paper will discuss current thinking on the administrative procedures and structures, involving both regulation and monitoring, which will be required to achieve these goals.

The main objective of regulation is to ensure that only those agents that can be demonstrated to be both safe and efficacious are used. This should be achieved by a process of evidence-based licensing. There is, in many jurisdictions, a dramatic shortage of licensed products and it will be argued that increasing the number of licensed products is an essential prerequisite to the efficient management of antimicrobial agent use.

As the emergence of resistant bacteria is a major negative consequence of antimicrobial use, administrative structures are needed to provide a framework for the monitoring and surveillance of these phenomena. However, the protocols and interpretive criteria required to quantify bacterial resistances in aquatic bacteria have not yet been fully developed. It will be argued that these methods are an essential prerequisite for performance of monitoring and surveillance programmes. Therefore, competent authorities and other relevant regulatory bodies need, as a matter of some urgency, to engage with the current international research aimed at harmonizing and validating the required antimicrobial susceptibility testing methods.

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