Protocol for Evaluating Animal Health Surveillance Systems

Surveillance can be defined as the process of systematic collection, collation, and data analysis with prompt dissemination so that relevant action can be taken in a timely manner. A well-functioning disease surveillance system provides information for planning, implementation, monitoring, and evaluation of control and eradication programs. The surveillance system's objective—and how information is to be used—helps determine what data to collect and the speed with which the information is disseminated within the system.

Contributions to animal health surveillance systems are made by different units within Veterinary Services (VS). Overall, VS participates in multiple surveillance systems, using different surveillance methods, terminology, reporting mechanisms, and frequency of collection. This variability has resulted in unevenly developed systems, inefficiencies, and extra costs. Surveillance programs should be assessed regularly to ensure that they remain efficient, useful, and effective, i.e., operate to meet objectives. An evaluation of surveillance systems should also promote the best use of public resources by ensuring that the system is serving a useful function and that its objectives are in line with national priorities.

The Safeguarding Review recommended that VS promote a more coordinated and synergistic approach to the surveillance and control of infectious disease. Following that recommendation, the National Surveillance Unit (NSU) developed the Protocol for Evaluation of Animal Health Surveillance Systems, which will allow VS and its partners to consistently and objectively assess the overall structure, organization, costs/benefit, and performance of surveillance activities.

The Evaluation Protocol also will address the structure, process, and quality of national surveillance programs and will help to determine the extent to which objectives are met, whether or not to continue the system or modify it, and make suggestions for improving quality and efficiency. Because surveillance systems vary widely in methodology, scope, and objectives, specific attributes critical to one surveillance system may be less important to another. Therefore, any approach in evaluation will be flexible. Evaluations also must address the basic quality attributes of surveillance that impact program effectiveness, including simplicity, flexibility, acceptability, sensitivity, positive predictive value, representativeness, timeliness, and usefulness.

The NSU is in the process of finalizing the Evaluation Protocol, which will be an important tool for achieving an integrated animal health surveillance system.