USDA's NAIS Business Plan September 2008

Blue type = completed Red type = Proposed Rule (cattle, sheep, & goats + PIN for swine)

High Priority Medium Priority Low Priority		Beef	Dairy	Horses ₂	oultry	Sheep	Goats	Swine
Action		Be			Д			S
Action Target Date			3	Species B	y Actio		eu	
2. Harmonize Animal Identification Programs								
Domestic Programs: Standardize ID requirements								
Federal, State, and Industry Programs and Initiative	res							
Breed Registries and Performance Recording Programs								
 Breed Registries – Initiate use of AIN in breed registry programs 	March 2008	•						
3. Standardize Data Elements of Disease Program	s To Ensure C	ompat	ibility		•			
Establish Uniform Data Elements								
Publish a proposed rule to consider establishing the 7-character premises identification number (PIN) as the national location identifier standard	Fall 2008	•	•		-	•	-	•
Publish a proposed rule to consider establishing the "840" AIN as the single version for the Animal Identification Numbering system	Fall 2008	•	•					
Utilization of Standards with Disease Programs	•							
Establish procedure and initiate implementation for using PIN for all Federal animal health programs and foreign animal disease outbreaks	Fall 2008	•	-	•	•	•	•	•
Establish procedures to facilitate the use of the PIN for origin and destination premises on the ICVI	Jan 2009	•	•				•	•
Publish proposed rule to consider using the PIN for all import/export facilties and the first destination of imported livestock, the ship from premises of livestock being exported, and adding the requirement for ISO- compliant RFID devices for imported and	Spring	•	•	٠	•	٠	•	•
exported livestock where individual ID is applicable.	2009							
	4. Integrate Automated Data Capture Technologies with Disease Programs							
Develop and implement electronic data collections for disease programs								
Develop and implement the elCVI nationwide	July 2009	-						
5. Partner with States, Tribes, and Territories								
Ulize the Traceability Business Plan to guide local level priorities in coopertive agreements								
Continue to provide performance-based cooperative agreements with States and adjust the FY 08 criteria to allow flexiblity in advancing traceability priorities at the State/regional level.	Jan. 2008 Ongoing	•	-	•	•	•	•	•

High Priority Medium Priority Low Priority		Beef	Dairy	Horses ₂	Poultry	Sheep	Goats	Swine
Action _			S	•		Affecte	d	
Target Da	te			В	y Actic	on		
6. Collaborate with Industry				l	ı		ı	l
NAIS Subcommittee and Species Working Groups								
Receive updated reports from species working groups	March 2009				•		•	•
Consolidate report from NAIS Subcommittee	July 2009			•	•	•	•	•
Support Industry Leadership Efforts								
Establish premises registration cooperative agreements with non-profit industry organizations	July 07 - Dec. 08	•	•	•	•	•	•	
Accredited Veterinarians								
Develop and implement communication program	Oct. 2007	-			-		-	-
Publish NAIS Veterinarian Toolkit	Oct. 2008				•		•	
Provide large-animal veterinary accreditation training module	March 2009				•	•	•	•
7. Advancement of Identification Technologies								
Emerging technologies								
Establish processes to evaluate new and/or advancing technologies, including the recognition of defined technical standards	Dec. 2008	•	•			•	•	•
Establish protocols to authorize the use of 840 AINs in new and/or advanced, market- ready technologies	Jan. 2009		•	•		•	•	•

² Horses that, when moved, <u>require either a test for equine infectious anemia or a health certificate</u>, are designated Tier 1 [top priority] and Medium priority among Tier 1 species.

Equine

Industry Size

June 2007 estimates indicate that there are approximately 5.8 million horses on 570,000 premises. The horse industry has a significant number of horses that are individually identified. Based on breed registry statistics, it is estimated that this number may be as high as 50 percent of the 5.8 million horses.

Industry Structure

Among livestock, horses are unique in that they live longer, are generally more valuable, are transported interstate and internationally more often, and are imported and exported on a regular basis. Many horses are routinely identified for breed registries, horse identification services, or to ensure the integrity of the racing and wagering industry. The traceability of horses for disease control purposes is considered critical by the horse industry. Existing identification programs can be utilized to support disease traceability efforts. The sport/competition horses are identified through two major categories, with the following subgroups:

- Race Horses identified through the breed registry identification programs; Jockey Club, United States Trotting Association and American Quarter Horse Association
- Show Horses identified through the new mandatory United States Equestrian Federation Horses Identification Program

Tracing Capabilities

Of the 5.8 million horses in the United States, approximately 2.2 million are tested annually for equine infectious anemia (EIA). There are numerous equine breed registries that record individual animal identification and location-related information. However, availability of registry information for traceback purposes is variable. Because a given equine premises can board many different breeds of registered horses, utilized in a variety of different disciplines, a single

premises might be registered with multiple organizations, with the resulting address redundancy complicating premises identification.

This traceability plan focuses on those horses that move to other premises and are commingled with horses from other premises, in particular at races, shows and sales, and exhibitions where horses move from across a State and/or multiple States. The Equine Species Working Group recommends that the population of horses that, when moved, require a certificate of veterinary inspection (CVI) or EIA test, be considered a priority in the business plan. The significant revenues to animal agriculture from these horses and the frequent, sometimes continuous, movements of these horses to events, warrant their designation as a high-priority sector.

Equine	Sector Rank				
Sector	Low	Medium	High		
Horses that require a CVI or EIA test			•		
Horses that do not require a CVI or EIA test					

Opportunities to Advance Traceability

Testing for EIA is a prerequisite for all interstate movement (State requirement), and in some States, for intrastate movement as well. Efforts are underway to develop a USDA national State-Federal cooperative program for the control of EIA that would establish national EIA testing requirements for (a) interstate movement and (b) change of ownership.

Horses must be identified (description/drawing, digital photograph, electronic implant) on the requisite EIA test-related paperwork. Overall, establishing regulations to require premises registration in association with EIA testing would substantively increase the number of both premises registered and horses identified. When horses move interstate to attend shows or exhibitions, registration is required upon entry. Accordingly, event officials are able to track horses moving intrastate or interstate (via interstate passport) to the farm of origin. Concurrently, animal health officials are able to track to the premises of origin and destination via interstate CVI for horses moving interstate. Though impossible to quantify nationally, experience has shown that the number of EIA tests performed annually increased three-fold following implementation of a "change-of-ownership" testing requirement in Texas.

The NAIS Equine Species Working Group has recommended the use of ISO-compliant injectable transponders for horse identification.

Recommended Actions

- Integrate the standardized PIN on EIA test-related paperwork;
- Implement the recording of PINs for the destination of all imported horses and the last premises of exported horses;
- Use PINs for both premises of origin and destination on interstate CVIs:
- Collaborate equine organizations to integrate the utilization of the AIN "840" identification devices;
- Expand the utilization of electronic interstate CVIs; and
- Provide communication standards to support industry efforts to integrate automated data capture technologies at equine events and establish necessary interfaces with APHIS-VS information systems.

SPECIES	Benchmarks 7	Date
Objective Horses*		
Competition horses will be identified with NAIS-compliant identification methods through the integration of equine infectious anemia (EIA) testing requirements and interstate certificates of veterinary inspection. Adjacent	70%	Oct 2009
percentages reflect the level of 48-hour traceability to the locations of horses specifically linked to an EIA test.	90%	Oct 2010

^{*} While not a specific sector, horses that require an EIA test and/or health papers are the focus of the traceability plan. As referenced in the NAIS *User Guide,* horses that travel greater distances to participate in events and that commingle with other horses are a higher priority.

Critical Location Points

Critical location points are those premises that present a high biosecurity risk of disease transfer and dissemination via commingling or exposure at a common premises. This risk can be because either the location is a short-term, frequent commingling environment (e.g., daily or weekly livestock markets or dealers, processing facilities, etc.) or is associated with throughput volume, (e.g., longer-term environments such as county and State fairs and livestock exhibitions where

⁷All percentages listed as key benchmarks are provided as an estimate to help gauge forward progress toward improved traceability. These levels are not intended to serve as scientifically validated values that represent exact levels of identification needed to achieve optimum traceability.

disease amplification among susceptible animals and species can occur). Critical location points are generally premises that accept animals from multi-source locations and premises and often do so in a continuous flow manner. The following table lists several of the critical location points that are a priority for premises registration. As noted, a high level of premises registration is targeted for these locations.

CRITICAL LOCATION POINTS	Total	Goal	Date
Exhibitions and Sporting Events			
County and State Fairs, Racetracks	2750	50%	March 2009
		70%	Oct 2009
Import/Export Facilities			
Import Quarantine Stations	3	100%	Oct 2008
Export Inspection Facilities	30	100%	Oct 2008
Ports of Entry	65	100%	Oct 2008
Semen Collection and Embryo Transfer Facilities			
Commercial Units	22	70%	March 2009
		100%	Oct 2009
Custom Collection	12	50%	March 2009
		100%	Oct 2009
Veterinary Clinics (Large animal practices that	8000	70%	March 2009
receive livestock		>90%	Oct 2009

Conclusion

The vision and long-term goal for NAIS is 48-hour animal disease traceability. The ability of each industry segment to achieve this goal is dependent upon its complexity and specific factors—for example, the size, diversity, disease status, and management systems involved. The allocation of resources as outlined in this business plan provides direction and focus as to where the greatest value for the advancement of traceability will result.

Industries will face new animal health demands as the animal agriculture industry changes and as new disease concerns arise. Technology advancements also will impact how livestock are managed, providing improved means of administering animal disease programs. Therefore, strategies to advance traceability will continue to be evaluated and adjusted to ensure that continued progress is made toward achieving the optimum goal of 48-hour traceback—in a timely, cost-effective, and efficient manner.

Appendix 2

Case Studies — Recent Animal Disease Investigations

Equine

Equine Viral Arteri	itis (EVA)
2006	
Incident:	Outbreak of EVA on New Mexico equine breeding facility in June 2006.
Investigative Summary:	With up to 50 percent of early term abortions in broodmares, the index farm in New Mexico initially evaluated 26 blood samples for the presence of the virus; 24 were positive. Additionally, breeding stallions were positive for the virus. Within a short time, all 200 plus broodmares and all 4 stallions were positive for viral antibodies. Due to the interstate movement of resident animals, return movement of broodmares brought to the facility for breeding, and the transport of fresh and frozen semen, 18 additional States were involved in the disease investigation. Sixty-nine direct exposures were identified, with 69.5 percent associated with mares inseminated with shipped semen and 29 percent associated with mares and foals that had visited the index premises during the timeframe in question. In one destination State alone, over 591 horses from 21 different premises were guarantined.
Impact:	Multiple owners from several States were severely restricted in their ability to manage their equine operations. More importantly, the rapid spread of the virus to many States substantially increased the risk of the disease status nationally in an extremely short period of time. The use of assisted reproductive technologies, and the associated transport of semen and embryos, also was demonstrated in this case to increase the risk of animal disease transmission.