

Prevalence comparison among different MSHMP cohorts

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<http://z.umn.edu/MSHMPsciencepages>

Key points:

- Prevalence among cohorts does not differ.
- Seasonal patterns can be seen in different cohorts located in different regions.

The Morrison Swine Health Monitoring Project (MSHMP) originally started with 13 production systems who voluntarily shared their sow herd disease status on a weekly basis. As the program continued to grow, the number of sow herds located in different regions provided a better perspective of disease dynamics. A comparison from a prevalence standpoint between the cohort of farms belonging to the 13 systems participating at the start of the MSHMP (CS) and the cohort of farms from systems that joined the program later (CL), was performed with the objective of assessing whether the patterns between cohorts compare. As seen in Figure 1 – CS, there was a clear shift towards more use of MLV over LVI for sow herd stability purposes. The proportion of farms using LVI in the CS versus the CL is 5% and 10%, respectively. When assessing the proportion of farms in each AASV PRRS category (Holtkamp et al., 2011) both groups are comparable (Table 1). Also the temporal pattern of infection can be seen in both cohorts as described by Tousignant et al (2014). In summary, both cohorts of farms (CS versus CL) yield similar results which continue to highlight the robustness of the program and the representativeness of the systems contributing to this program.

PRRS category	CS	CL
4	37.25	37.46
3	5.44	4.24
2fvi	5.16	10.78
2vx	21.78	18.55
2	4.01	3.18
1	26.36	25.8

Table 1. Percentage of farms in each AASV definition category for each cohort at current point in time (January). CS – cohort of systems that were present since the beginning of the project. CL- cohort of systems that have joined the Morrison Swine Health Monitoring Project after the CS.

References

Holtkamp et al. (2011) Terminology for classifying swine herds by porcine reproductive and respiratory syndrome virus status

Tousignant et al (2014) Temporal and spatial dynamics of porcine reproductive and respiratory syndrome virus infection in the United States

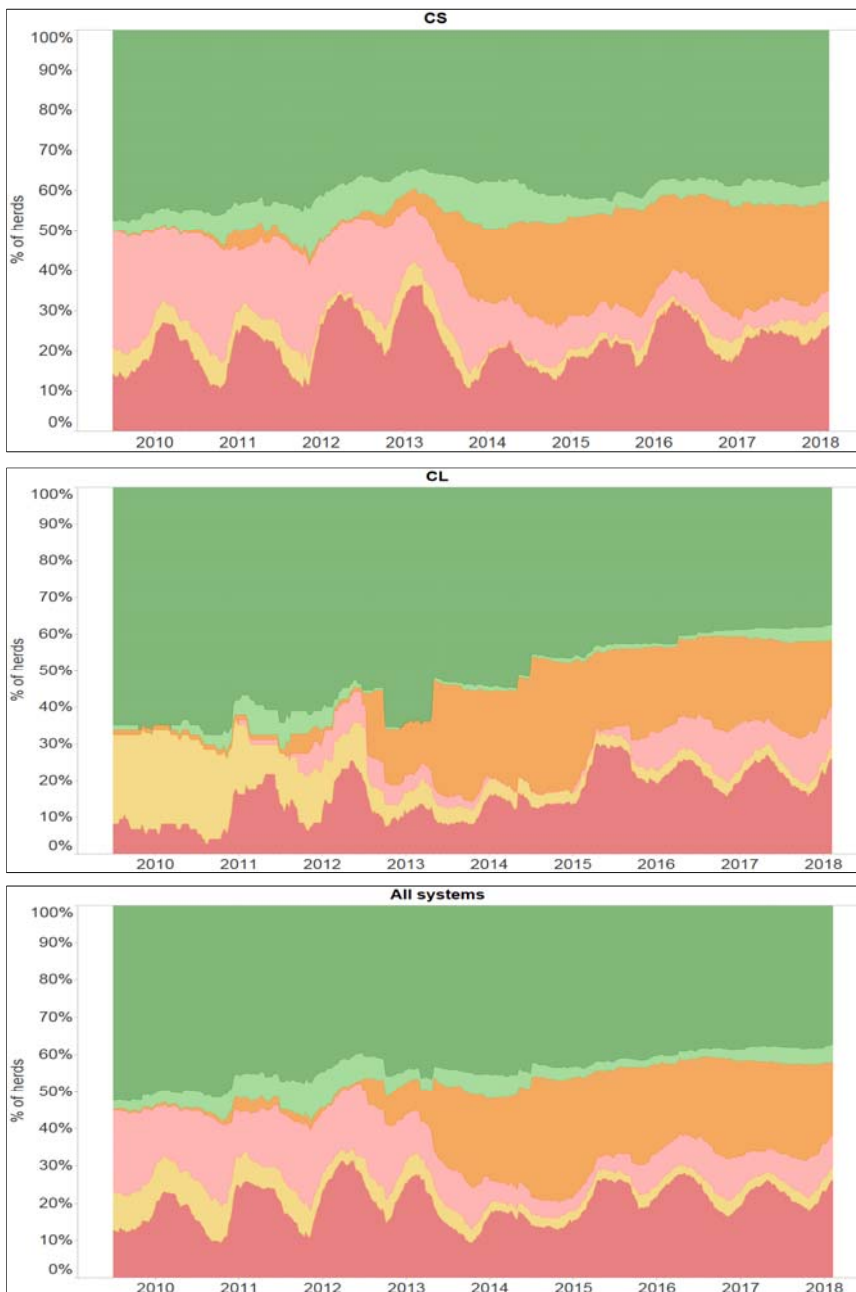


Figure 1. Prevalence chart of the farms of the systems that started the Project (CS), the ones that joined later (CL) and both cohorts combined. PRRS Status 4, 3, 2vx, 2fvi, 2 and 1 are represented in green, light green, orange, pink, yellow and red.