

Reporting by connectedness on across flock reports

SIL TECHNICAL NOTE

Relates to: Connectedness, blanking

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Reporting connected values only on across flock reports

The weekly New Zealand Genetic Evaluation (NZGE) generates breeding values for all traits for all animals. However comparison of breeding values between unconnected flocks is not valid as they cannot be correctly benchmarked relative to the other flocks.

Monitoring connectedness across a range of goal trait groups, and especially indexes, can be difficult. Across flock reports are often used to select link sires or candidates for progeny testing and it is important those decisions are made using the best possible information. SIL have provided the option to restrict reporting to connected flocks, with unconnected breeding values not being reported i.e. they are left blank. This provides a simple tool that only presents breeding values and indexes that can be validly compared on across flock reports.

Connectedness for each goal trait is considered independently, so a flock may be connected for some but not all traits. If an animal is from a flock that is not connected for every component trait in an index, the index will be blank. For example, ram 236/13 is connected for reproduction, survival, growth, adult size and wool but not for meat. This ram would have a value for the NZ Maternal Worth index but not for Maternal Worth with Meat. A flock may not be connected for a goal trait group, such as meat, if there are too few measurements on link progeny or if the flock has not recorded that goal trait and so is unable to be connected. Sires from unconnected flocks may appear on sire summaries if they have progeny in connected flocks.

Fig 1. Example of an across flock report with blanks (pink) for unconnected index and sub-index.

ID	NZMW	MW+M	DPCR	DPS	DPG	DPA	DPW	DPM
34/13	2666	2830	785	302	1557	-340	362	164
33/13	2856	3017	785	371	1759	-413	354	161
236/13	1729		357	325	1623	-793	217	
95/13	501	655	140	-61	1312	-1033	143	154
6504/13	444		258	180	1000	-973	-21	

All individuals and values on the report can be validly compared.

Reporting by connectedness is optional but SIL strongly recommends reporting only connected values for across flock reports to add confidence to decision making.