

13th May 2018

ANALYSIS OF A ROUTINE VOYAGE SEPT-OCT 2017: AL SHUWAIKH

This is an analysis of documents, obtained under FOI Act 1982 from a routine voyage (mortality 0.84%) of the Al Shuwaikh in September/October 2017. Industry routinely use this figure as being indicative of excellent animal welfare on live export voyages for sheep. The voyage had a consignment of sheep and a consignment of cattle from Emanuel Exports and a consignment of sheep from International Livestock Export.

REPORT SUMMARY

On Days 1-3, these sheep had a normal respiratory rate recorded. On Day 4, WBT exceeded 24° C on the closed decks and this coincided with an increase in respiratory rate indicating an increase in heat load. From Days 5-16 and Days 19-24 inclusive, the WBTs on most decks exceeded 27°C the HST for 53kg merino sheep as defined by Stockman (2011). In other words, these animals were exposed to temperatures likely to cause considerable heat stress and suffering for 11 consecutive days and then a further six consecutive days with only 2 days of respite separating the two periods.

Although there will probably have been some maintenance of thermal homeostasis during the initial period, it is likely based on the available science, that the animals will have been unable to thermoregulate from about Day 5 onwards. This is especially likely given that shipboard WBT measurements are usually not made at the level of the sheep pens and are taken between 9.30-11 am (ie not in the hottest part of the day), thereby underestimating temperatures in the sheep pens.

It is interesting to note that the respiratory rate remained increased on days 17 and 18, when the WBTs were reported to decrease considerably, highlighting the fact that recovery after sustained heat stress takes some time.

It is also important to note that after the initial rise in WBT, these sheep had **increased respiratory rates for 19-20 consecutive days**. No-one in the world would find this acceptable in terms of animal welfare. Breathlessness is a defined parameter for poor animal welfare irrespective of heat stress.

OTHER CRITICAL POINTS

The AAV does not comment on the fact that the highest mortalities occurred on the closed decks and that these decks had the highest wet bulb temperatures (both absolute daily measurements and number of days); 2.39% mortalities on one closed deck.

In actual fact, AAV does not mention “heat stress” at all in the daily voyage reports or End of Voyage Report. This is somewhat inexplicable given that WBT reached 33 degrees on one deck (well above even the Government’s erroneous HST of 30.6 degrees and getting close to the Government’s mortality limit of 35.5 degrees).

The AAV notes that the main cause of death in the ILE consignment was inanition: but actually only 2 deaths due to inanition and 10 were too autolysed (ie too rotten) to ascertain a cause of death so the main cause not actually identified.

The AAV notes that the main cause of death in the Emanuels consignment was inanition: 374 deaths (174 too autolysed for a definitive diagnosis).

The company records a discrepancy of 38 sheep. The shipboard veterinarian recorded the total number of sheep loaded as 73841 whereas the number recorded as being loaded in Fremantle for Emanuels (on every daily voyage report - top left hand corner) and used in the Masters report (the only report that counts for Parliamentary reports etc) was recorded as 73591, a discrepancy of 250 sheep even before the voyage was under way ie the usual complete dog's breakfast that is sheep numbers for any voyage and make almost any numbers quoted by industry and government as, at best, a rough estimate.

VALE CONCERNS

1. Significant heat stress has occurred in a routine, low mortality voyage in May to Octobers as could be predicted by ME weather forecasts.
2. A low mortality voyage does not rule out heat stress
3. Despite the objective evidence that heat stress occurred, heat stress was not recorded or mentioned in the daily or end of voyage reports. One AAV advised VALE that he was instructed not to mention the phrase 'heat stress' in his reports. Given this and other evidence of exporters seeking to minimise negative comments in reports to the Department (including under-reporting mortalities), one assumes this is what happened here. The only other possibility is that the shipboard veterinarian is so "inured" to this event that he no longer perceived it as abnormal.

CONCLUSION

The voyage on the AI Shuwaikh is yet another routine voyage that bears out, in practical terms, the relevance of the experimental findings re wet bulb temperatures and heat stress threshold (Stockman et al 2011) and the conclusion of the review by Caulfield et al (2014). It also provides clear evidence that the **heat stress model fails to protect animal welfare on routine voyages** and that **animal welfare is poor on routine voyages to the ME northern summer period, extending to October**. It is also evidence that acceptable mortalities (as defined by industry) are not a measure of animal suffering and that voyage reports do not mention heat stress even when heat stress is definitely present.