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The welfare of animals during transport

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An animal transport journey should be regarded as commencing when the first animal is loaded onto a vehicle and as ending when the last animal is unloaded. The journey includes any resting or transfer periods and a new journey starts only after 48 hours of adequate recuperation. There are many scientific studies of the welfare of animals during and after transport. The principal measures are heart-rate; glucocorticoids and other hormones and proteins in blood, saliva, urine or faeces; a range of behaviour measures such as avoidance movements, pain grimaces or inability to show normal movements; injuries that can be scored such as bruises, cuts or broken bones; immunosuppression; extent of pathology and survival rate¹.

Factors affecting welfare during transport include: knowledge and attitudes of staff involved, laws, codes of practice, training, species, breed, previous experience of the animals, vehicle design, space allowance for animals, duration of journey, tying, mixing, staff payment method, planning of journey, handling during loading and unloading, driving quality, bad physical conditions during journeys and quality of animal monitoring^{1,2}.

If those with responsibility for animals during transport receive training, this has major beneficial effects for animal welfare. Those responsible include owners, buying or selling agents, transport companies, vehicle owners and loading facility or slaughterhouse owners as well as animal handlers and vehicle drivers.³ The greatest animal welfare problems during transport are: poor handling of animals leading to pain and fear, insufficient space on vehicles for animals to stand without contact with other animals or to lie down, poor conditions during the journey because of bad driving or bad physical conditions, or fatigue and exhaustion because the journey is too long. Maximum road journey times should be 4 hours for poultry, 8 hours for pigs, 15 hours for sheep, cattle and horses.⁴

Transport by ship can involve good conditions for the animals when the sea is calm, the stocking density low and the food appropriate. However, sea conditions can be very bad and on some ships, the stocking density is high enough for welfare to be poor throughout the voyage. The food provided for transported animals has sometimes been so different from that which the animals normally eat that they did not eat it and some died of inanition. Especially on longer journeys, ammonia concentration in the air breathed by the animals can be high enough to cause respiratory disease. The combination of high stocking density, inadequate ventilation and high external temperature can lead to very poor welfare and high mortality. A particular risk when the animals are imported by some countries is the use of cruel handling methods⁵. The risk of major problems is so great that journeys of more than 24 hours duration should be avoided.

When deciding whether or not a particular animal transport system or practice should be permitted, the risk of poor welfare should be assessed. Publicity about events that have very negative consequences for animal welfare can be very costly for commercial companies, or for whole countries, because large numbers of consumers may refuse to buy the products of the company or country⁶. Live export from Australia by ship is already resulting in some people refusing to buy any Australian goods and the number of people doing this is likely to rise. Carcass transport does not lead to such trade problems.

References

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⁴EFSA 2004. *The Welfare of Animals During Transport*. European Food Safety Authority Scientific Panel on Animal Health and Welfare, Parma, Italy.

⁵Philips, C.J. C. and Santurtun, E. 2013. The welfare of livestock transported by ship. *The Veterinary Journal*, 196, 309-314.

⁶ Broom, D.M. 2010. Animal welfare: an aspect of care, sustainability, and food quality required by the public. *Journal of Veterinary Medical Education*, 37, 83-88.