

Lameness prevention: Is my housing contributing to lameness problems?

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Despite the grass based nature of the system on the majority of Irish dairy farms, cows spend a significant portion of the year fully housed. The quality of the winter accommodation has an impact on hoof health. In an optimal housed environment, about 70% of a cow's time budget should be spent lying or eating..

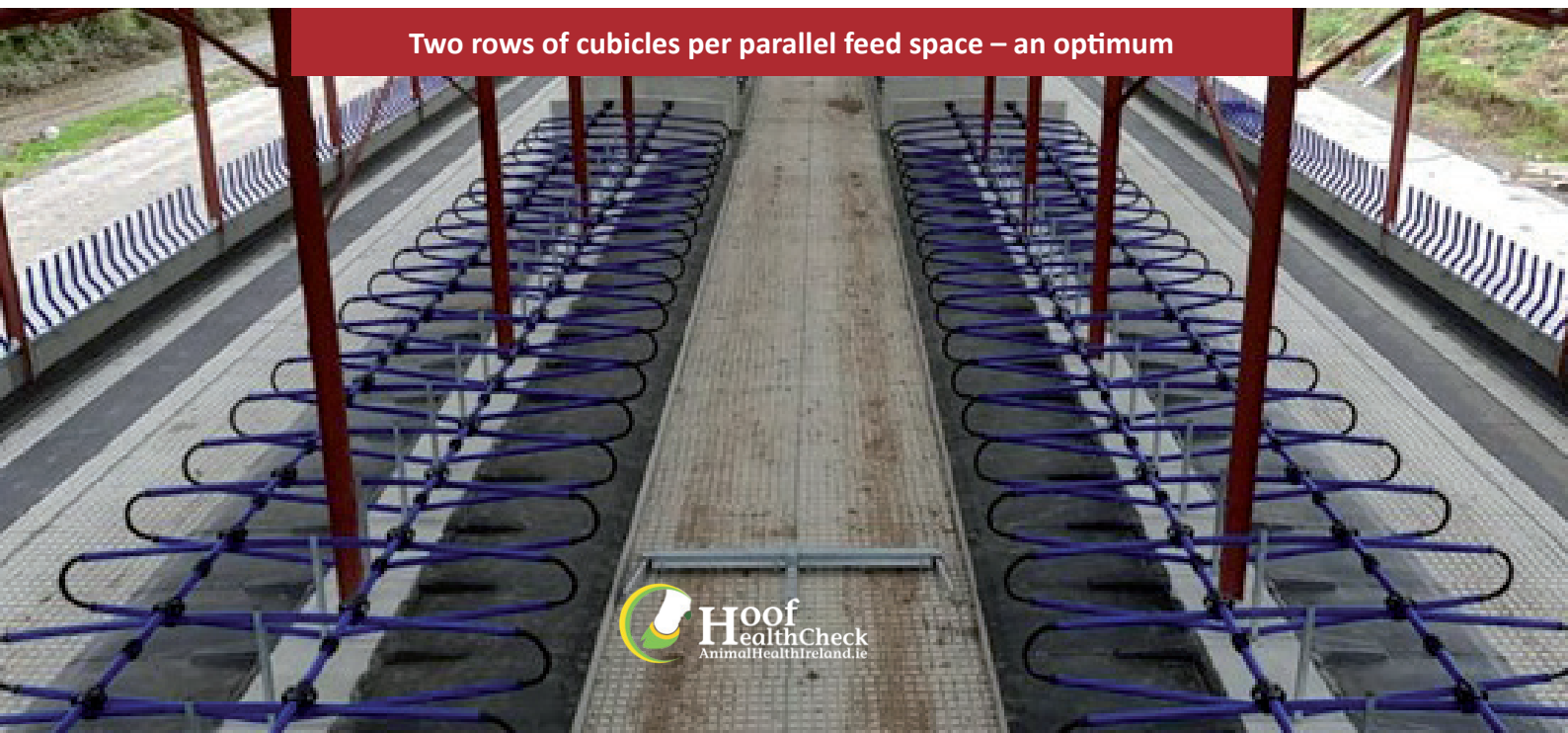
Lying time

A cow should spend at least 12 hours a day lying. Too much time spent standing on concrete will adversely impact hoof health. Having at least one comfortable cubicle per cow will maximise lying time for all cows. Too many cows (more than 20%) perching or standing in cubicles is a sign of poor design or lack of comfort. Small changes like repositioning the neck rail and fitting a brisket board can often improve cubicle use and lying time.

Feed space

Inadequate feed space will mean more competition at the barrier when feed is being put out or pushed up. Stronger dominant cows will feed first while weaker subordinate cows must wait. Competition at the barrier will also impact hoof health due to the shearing forces applied when cows are pushing. The solution is having a feed space per cow. Two rows of cubicles with a parallel feed barrier offer an optimum in terms of feed space and cubicle access – see picture.

Two rows of cubicles per parallel feed space – an optimum



Cleanliness

If cows have to stand excessively in manure, the incidence of infectious lameness like digital dermatitis (Mortellaro) and slurry heel are likely to increase. Having adequate space, adequate ventilation and ensuring that scrapers are running with adequate frequency will ensure cows are standing on a clean surface. Scrapers not running often enough can result in cows being foot bathed in manure as they step over the scraper.



Conclusion

Dairy cow housing impacts cow wellbeing, cow performance and hoof health. Reviewing your housing system with a critical eye may identify areas for improvement. Often small changes in management and/or design can have a significant impact. Larger investments may be difficult to justify in the short term, but will easily pay for themselves in term of cow performance, cow longevity and cow wellbeing.