

TECHNOLOGIES OF ALTERNATIVE COW-SHEDS AND EMISSION OF HARMFUL GASES

Rolandas Bleizgys, Jonas Čėsna

Lietuvos žemės ūkio universitetas, Studentų g. 11, Akademija LT-4324, Kauno r.

Tel. 39 75 77; faks. 39 75 00; el paštas: bleizgys@tech.lzua.lt

Summary. Scientists have been intensively working to develop new animal keeping technologies that would reach the compromise among such criteria as animal protection, environmental protection and expenses. Construction of not isolated unexpensive cowsheds and reduction of investments in buildings have been started. Being based on specific research data these cowshed technologies can be easier introduced in Lithuania. Cows are recommended to be kept in cold cowshed boxes if animals have warm place to lie. Due to cold den the percentage of cows producing milk that contains 200-400 thousand/cm³ somatic cells increases up to 15-18% in winter. It has been established that condensate in cold cowshed with uninsulated roof can be avoided, if air circulation is sufficient. The width of the cowshed ridge crack, through which air is removed, should make 2,4-2,7% of the cowshed width. Emission of ammonia in cold cowsheds decreases 2,5-3 times winter.

Keywords: cold cowsheds, technologies, gas emission.