

## ASSESSMENT OF THE UKRAINIAN RED COWS DAIRY BREED IN THE PARAMETERS OF THE LACTATION CURVE

V.I. Logvinenko

State Institute of Agriculture of the steppe zone of Ukraine NAAS

It is known that the milk yield of cows depends on many factors, which can be divided into two large groups: hereditary (breed, line, family, etc.) and paratypic, among which the main are: feeding and cows, the effective use of animals when playing, fatness, age, season of calving, calving interval, the multiplicity of milking, the type of nervous activity, and others.

Important role in determining the milk production of cows per year playing intensity and evenness of lactation during the year. Changes in the amount of milk produced per cow daily, decade, month represented as a lactation curve. In assessing the cows lactation curve characterizes the level of productivity, the ability to retain stable yields and the reaction of animals to environmental factors. As a rule, the ability of cows to give uniform or sharply flowing during lactation milk yield repeated in subsequent lactation.

These individual characteristics have a marked tendency to inheritance, so they must be taken into account in breeding work with cattle.

The aim of our research was to study the parameters of the lactation curve of cows Ukrainian Red dairy breed different lactations under «Erastovska OS» Dnipropetrovsk region.

Methods of research. The object of our research were the Ukrainian Red cow dairy breed pedigree reproducer "«Erastovska OS»" (n=97). To study the nature of the lactation curve was formed by a group of origin. Each cow into account the daily milk yield during the 305 days of lactation. On the basis of the data determined by the index: the constancy of lactation J. Johansson and A. Hansson ratio of milk yield for the second 100 days of lactation in the first 100 days; constancy milking H. Turner: milk yield per lactation ratio (or 305 days) to a higher monthly milk yield; fall lactation on DV Elpatevskogo ratio should follow the previous month, starting with the second. The mean ratios of the amount parameter is falling right.

Investigations were carried out on the basis of data analysis zootechnical and pedigree records. Statistical data processing was performed by the method of GF Lakin using SPSS 17 software and the Excel Misrosoft.

The research results. In pedigree reproducers use sires common factory lines: Ingansera, Richelieu and Hanover. The studies found that the maximum daily milk yield in cows of the experimental herd is observed on the second month of lactation, which corresponds to the physiological norm. Milk yield of cows decreased after the second month in connection with their pregnancy. But representatives of the line Richelieu peak lactation occurs in the first month. Highest daily milk yield at peak lactation was in fresh cows Hanover line -  $20,2 \pm 0,49$  kg milk, 0,5 kg more than the average value in the herd. Below is the daily milk yield kg of milk in cows observed line Richelieu -  $19,0 \pm 0,63$ , which is 0,7 kg less than the average herd ( $P \geq 0,95$ ). Later lactation curve is characterized by gradual reduction of daily milk yield by month of lactation.

We believe that in terms of production more preferred animals in which the lactation curve gradually increases and decreases evenly. Stable lactation curve inherent cows lines Hanover and

Richelieu. The sharp decline in lactation (11,3 %) is observed in fresh cows Ingansera lines, and their lactation curve is low and rapidly decreasing.

For a more accurate assessment of the sustainability of lactation using indices that characterize their nature.

The average yield on the herd for 305 days of lactation is  $4755,1 \pm 157,23$  kg of milk. In line representatives Hanover and Richelieu level nadoyu at 431,6 and 52 kg of milk is higher than the average for the herd ( $P \geq 0,95$ ).

According to the index persistence is necessary, (by H. Turner), had the best value for heifers and Hanover Richelieu respectively  $8,2 \pm 0,18$  and  $8,0 \pm 0,11$ , compared with the average herd. The smallest value for this indicator was the cows line Ingansera  $7,1 \pm 0,17$ ;  $P \geq 0,95$ .

According to the index decline lactation recommended for the evaluation of animal DV Elpatevskogo best lines were heifers Hanover on average  $107,8 \pm 0,79$  %;  $P \geq 0,99$ . A lower value in terms similar to the previous line of cows Ingansera and Richelieu ( $97,1 \pm 0,34$  ( $P \geq 0,95$ ) and  $98,5 \pm 0,50$  %).

Analysis of experimental data indicate that it is necessary for between lactation and lactation index drop is set low in strength and reliable in nature relationship ( $r = 0,324 \pm 0,1672$ ;  $P \geq 0,95$ ), and between the index and the index of the constancy of lactation milk yield weak and constancy nonsignificant relationship ( $r = 0,259 \pm 0,045$ ;  $0,707 \pm 0,8412$ ).