ISSN: 0975-8585

Research Journal of Pharmaceutical, Biological and Chemical Sciences

Application of the Recommendations of the International Committee for Animal Recording (ICAR) in Assessing the Yields of Dairy Cattle in Russia.

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ABSTRACT

Based on the results of the analytical review of domestic and foreign regulatory documents on accounting dairy cattle it shows that an important step towards full implementation of Russia's animal husbandry in the world system is the implementation of universally accepted principles of the International Committee of the institutional animal registration (ICAR, 2014). The aim of the research is to develop a regional model of the formation and management of highly productive livestock genetic resources. The material for the research is the Russian and foreign (ICAR) regulatory documentation for the account in dairy cattle breeding. Based on the use of zootechnical practices and comparative analysis have been developed guidelines for the organization of the departments of the regional selection and technology center, including conducting linear estimation articles body (Expert Appraisal Service) and accounting of milk production of cows. The methodical recommendations include ways to harmonize national legal documents of the account in dairy cattle with the recommendations of the International Committee for Animal Recording.

Keywords: International Committee of the Animal Registration (ICAR), dairy cattle, milk production estimate.

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ISSN: 0975-8585

INTRODUCTION

The main trends of the modern dairy cattle are to increase production efficiency and product quality, and further specialization of production [1].

An important factor in ensuring a steady trend of positive development of dairy farming in Russia, and Stavropol Territory will be the introduction of modern methods of herd management and milk production records, proven international practices, which based on the application of the recommendations of ICAR [2, 3].

METHODS

The material for the research is the Russian [4, 5, 7] and foreign [2] standard documentation for the account in dairy cattle breeding. On the basis of the use of zootechnical practices and comparative analysis have been developed guidelines for the organization of the departments of the regional selection and technology center, including conducting linear estimation articles body (Expert Appraisal Service) and accounting of milk production of cows (control-assistance service).

Accounting data zootechnical accounting based on the guidelines developed to let you create a database of information that meet the requirements for granting national ICAR annual report [2].

MAINPART

Because of work performed, it was establish that the inclusion of indicators of dairy cattle at the regional level should be carry out according to the forms of 01-04. These forms will continue to use in the preparation of the National Report on the milk production and will include accounting data on the number of cows and herds of dairy productivity, average annual milk production of cows (kg), gross production of milk, milk fat and protein content, the methods of accounting lactation.

Accounting for milk production in cattle carried out by expert's monitoring-assistance service. When accounting for milk production using automatic counters of three types of milk: Waikato, DeLaval MM6 and USM-1A, of which the first two models are approve by ICAR [2].

The implementation in practice of the said livestock reporting system will enhance the image of the Stavropol region, as a region with a high cultural animal husbandry, improving the quality of products and create conditions for a reliable assessment of bulls-leading quality offspring.

Because of purposeful work of scholars and practitioners of livestock breeders in the Stavropol region based on the best breeding companies were establish genetic resources in the most technologically advanced dairy breeds (Table. 1).

Table 1: Indicators milk production genetic resources breed Stavropol Territory (Russia's reproduction)

Breedcows	Productivity of cows for 305 days of lactation				The rate of milk, kg/min	Form udder
	Highestproductivity		Lastcompletelactation			
	Number of lactation	Milk yield, thous. kg	Number of lactation	Milk yield, thous. kg		
Holstein black-and-white	2,3	10,3	3,5	9,2	2,72	1
Holsteinred-and-white	2,0	8,0	1,8	7,7	2,51	1
Black-and-white	2,3	8,9	3,0	8,3	1,93	1; 2
Ayshirskaya	2,9	8,8	3,5	8,5	2,12	1
Yaroslavl	3,2	8,6	3,7	8,3	2,05	1; 2
Redsteppe	2,2	6,5	3,0	6,8	1,87	1; 2

Analysis of the data shows that the milk production of the animal populations are represented at the level of the best achievements of dairy farms EU, US and Canada. [2, 6]

Thus, the genetic potential of the world's best dairy cattle breeds allows you to develop regional programs to increase milk production and, thereby, increase the food security of the region.

Comprehensive assessment of tribal and economically useful signs of cattle of dairy and dairy-beef productivity carried out by experts expert service appraisal regional breeding and technology center and includes a linear estimation of body type and appraisal [4, 5, 8].

The Russian system of linear estimation of body type 18 describes the main features of the exterior, where each feature has independent significance and is estimated from 1 to 9 points. For each feature is determined by the arithmetic mean and standard deviation. The vertical center line of the profile corresponds to the exterior ground level, or 5 points, i.e. the normal development of the article. The assessment takes into account the biological extremes (- +) for its development. Points 1 and 9 represent extreme deviation feature. With an average value of the flag at least 5 points, it is written to the left of the sign -; more - to the right with +.

When grading is carried out assessment and selection of animals, followed by cool, and in some cases individual selection. Valuation of livestock is held every autumn. In order to determine the value and purpose of breeding animals on farms, stations of artificial insemination, breeding companies spend annually appraisal of bulls, cows, heifers and breeding bulls.

According to the recommendations ICAR (2014) in a linear estimation of body type you want to include an additional 5 Exterior features: angular edges; characteristic of the movement; fatness (fat deposition); the thickness of the metatarsal bones (back and side); the thickness of the nipple.

SPECULATION

The developed method of selection and organization of a regional technology center for dairy farming, taking into account the number of controlled cattle dairy efficiency can be used in the organization of the national accounting system in dairy farming in the interaction-control assistant and expert appraisal services, laboratory and genetic control reference- that will meet the requirements of the Russian legislation in the field of animal and show the path of harmonization with international recommendations ICAR.

CONCLUSION

Genetic resources of Stavropol in dairy farming in terms of milk production is at the level of the leading countries-members of the ICAR and can become breeding base for the formation of highly productive dairy cattle population in the region.

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