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Establishing and Operating a Stud Farm Using Stallions from Karabair Breed Producers

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Abstract: The article outlines the findings of study on how to increase the caliber of horse progeny, organize a breeding program, and discover strategies to produce a superior, healthy foal from a single mare.

Keywords: manual, mowing, cooking mating, stallion, mare, foals, stall, feeding, diet, fattening and walking.

Introduction. One of Central Asia's historic horse breeds is the Karabair. Horses who lived in Central Asia 2–2.5 thousand years ago are the progenitors of the Karabair horse. Later, mares from the area were bred with stallions of riding breeds brought in from Turkey and Persia. The introduction of Arab blood caused modifications in the breed at that point and led to improvements. She also took inspiration from Turkmen stallions. In order to create the breed, mares from the Davan Argamaks were bred with stallions of the Akhal-Teke, Arabian, Mongolian, Persian, and Kazakh breeds. It differs in terms of its distinctive outward traits, composition, and economic traits.

The republic attaches great importance to the development of horse breeding. Since 2017, a number of resolutions have been adopted on the development of horse breeding.

Methodology. Project KH-A-KH-2018-458, "Technology for Improving Horses of the Karabir Breed, Feeding, Increasing Livestock, and Preparing them for Sports Games," involved scientific and production research.

The unitary enterprise "Karabair" of the Yakkabag horse-breeding complex, the border troops of the Jizzakh region's National Security Service, the "Fergana tulpars" of the city of Kuvasay, the LLC of the Yakkabak district, and the horses of the Karabair breed that the population owns were the study's subject matter.

For the first time, during insemination, each young and elderly stallion had 12 heads of mares; each middle-aged stallion had 25 heads of mares. Additionally, 30 mare heads were strengthened for hand mating.

According to the commonly recognized approach, mares were chosen and mated with stallions of a class lower than their own. For example, a mare from class 2 mated with a stallion from class 1.

The handbook Plokhinsky A.N. "Guide to Biometrics for Animal Science" (1969) was used to process the results.

Results. The most crucial circumstance that determines whether or not activity in the sector is successful is a casual horse breeding firm. Three basic types of mating are used in horse breeding:

manual, mowing, and artificial insemination. Breeding herd horses makes use of kosyachnaya. The most typical manual method is used for horse stable maintenance.

Because to the development of sperm freezing, long-term storage, and long-distance transit, it is now feasible to utilize stallions in breeding with a considerably bigger impact (on a large breeding stock).

Cooking mating is a somewhat uncommon practice.

Any breeding business's ability to be successful hinges on how well the horses are organized and prepared for mating. Maintenance, feeding, and the manner in which producers are used in a random company are only a few of the actions involved in creating a random company.

Content. Stallions are kept in stables that have been set aside just for them. They can be housed in the same stable as the uterine or young animals on farms with a limited number of horses and few stallions, but be sure to fence off a portion of the area with a separate exit for them. Every stallion has a bright stall with a minimum floor space of 16 m^2, ideally with a densely packed adobe floor. In the stables of producers, the stall walls, doors, and door locks must be exceptionally sturdy. At the stable, there must be paddocks for stallion walks that are at least 600 m^2 in size as well as grazing paddocks that are 0.3–0.5 hectare in size per stallion. Stallions should only be kept indoors during extremely cold, bad weather, or extremely hot conditions.

The stallion's age, general health, and temperament all influence the length of the exercise and the intensity of its burden. During mating, younger stallions receive a heavier burden than older ones.

Every day, stallions are washed. They take clean water baths in ditches and reservoirs during the summer months, or they wash in a bucket and under the shower. Producers who use mowing equipment and have injuries or bites should undergo the proper veterinary procedure.

Breeding stallions' stables should follow a consistent daily schedule that is only altered when necessary for output.

Schedule

At the stable of stallions during manual mating

$6 - 7^{30}$	- watering, feeding, cleaning stalls, cleaning stallions before mating;
$7^{30} - 9^{30}$	- trial and mating of mares with stallions;
$9^{30} - 11^{00}$	- stallion grooming, ride or release of stallions for a walk in the paddock;
12-13	- watering, feeding, refueling stalls;
13-18	- walk in the paddock or rest in the stalls;
18-20	- watering, feeding, filling stalls, cleaning stallions and mating mares;
23	- watering place, nighttime haymaking (by a night groom)

Preparing and holding a random company. Drawing up a breeding plan with the selection of queens for stallions, choosing locations for breeding stations, choosing the necessary number of approved stallions, preparing stallions and queens for mating, testing and mating techniques for mares, registration and recording of results, and training are some of the general issues of setting up a breeding company.

First, stallions of planned breeds are allotted for usage at breeding facilities. They should not inherit physical faults and deformities; instead, they should be superior in breed, better in conformation, and more workable than mares matched to them. Checking the quality of the producers' sperm on a regular basis is required both before and throughout the breeding season. You need to have a stallion—a probe—at each random location.

Stud stallions and samplers get high levels of nutrition one to one and a half months before to the commencement of the breeding cycle. They are kept in a healthy fatness throughout the breeding season and given frequent exercise by staying in lefters and paddocks and working under the saddle and in a light carriage. Those animals that can't reproduce are pastured. The breeding network's

chosen stallions are situated on farms in such a way as to bring them as near to the mares' location as is practical.

Zoo engineers and veterinarians do a general examination of all queens aged four and older on their farm before to the commencement of the breeding company, making a list stating the name and age. The diet of mares chosen for reproduction but with a lower-than-average level of physical condition is enhanced. The following guidelines are observed while choosing mares for stallions: In order to consolidate important features in the progeny and to avoid closely related mating, which is followed by a decline in the production of foals and their increased mortality, the stud stallion must have a higher grading class than mares. The dates of sampling, hunting, mating, weaning, and the outcomes of mares' rectal examinations must all be recorded precisely throughout the breeding cycle. All of these details are documented on a specific sheet in the notebook of samples and mare matings, as well as in the breeding of herd horses. These main sources include information on the predicted timing of a mare's foaling as well as the location of the offspring.

The percentage of fertility, or the number of foal mares per 100 covered, is the primary metric of a stud company's performance. Find the ratio of mares that successfully bear 100 calves in a given year.

Feeding. Stallions utilized for manual and mechanical mating must be fed on an individual basis. The nutritional value of their diets is determined by taking into consideration the quantity and frequency of cages, the stallion's energy level, his capacity to maintain a healthy level of fatness, live weight, breed, health, and other characteristics specific to each individual horse.

The recommended feeding guidelines during mating season call for two feed units per 100 kg of live weight each day, with each feed unit containing 110–130 g of digestible protein, 6 g of calcium, 5 g of phosphorus, and 5 mg of beta-carotene. The quantity and quality of the dietary protein affect the sperm quality, concentration, and resistance of spermatozoa. It is important to make an effort to employ a range of feeds, including simple, maize, oats, barley, meal (sunflower, linseed), premix, and legume grains. During the mating season, it's especially essential to include animal feed, such as reverse, blood meal, and chicken eggs, to the stallions' diet. Vitamins A, E, and B should be abundant in the stallion's diet. Green grass and fodder carrots are rich sources of vitamins A and E. Bran, eggs, and milk are full of vitamin B.

Stallions should be fed fodder consisting of 2–6 kg of carrots, 1–2 kg of wheat bran, 5–10 kg of skim milk, and 5–10 eggs in the shell every week (2–3 times they are easily supplied combined with crushed barley, bran, or rolled oats). Only when the stallions' sperm quality or potency deteriorates are milk and eggs added to their diet.

Producers should be given calcium phosphate, 50 g each, or chalk, 30 g each, together with table salt in the form of a lick, mixed with end feed, to promote regular sexual activity and to preserve their health. Every 12 to 15 days, concentrated feed ratios should be changed up. The diet should also include some new concentrates that weren't included in the prior one at the same time. Only finely crushed food should be provided during meals.

For stallions weighing 400–500 kg, the recommended diet per head per day during the pre-breeding and breeding periods is as follows: cereal hay mixed with legumes (alfalfa) at the rate of I–10 kg, oats–3–flattened, barley–1.5, wheat bran–1, meal–1–linen, sunflower, carrots–3, premix–0.15 kg, chicken eggs–4-5, and salt–30–35 g.

Mowing stallions are fed end feed from a sack of 4-5 kg each day throughout the mating season. After watering in the morning and the evening, concentrates should be fed twice a day.

The stallions are chosen from the shoals at the end of June, at the conclusion of the breeding company, and placed in the stable. Typically, they are in poor health when they leave the mating and require treatment within 2.5 to 3 months. improved nutrition and careful attention. Currently, it is required to provide 5–6 kg of end feed and 10–12 kg of premium hay per head per day in a blend of grains and legumes. The daily average of end feed might be decreased to 4 kg while getting stallions into factory condition.

Mode of use of stallions in mating. Beginning in mid-March and lasting until the third decade of June, mares undergo manual mating and artificial insemination.

For bedding, dry straw or sawdust is utilized. Straw weighs 5 kg, sawdust weighs 15, and each stallion consumes that much each day. When it gets cold in the summer, it is important to insulate the ceiling, windows, and doors to keep the temperature in the stallions' stable at least 6 to 8 °C. Straw mats are used as curtains on the sunny side of the stables' windows during the hot weather.

All stallions may be used every day for light labor in harness and under saddle for two to three hours, or they can be used for exercise by being ridden at a walk or trot for five to ten kilometers. Stallions are maintained in paddocks for a longer period of time in addition of being ridden.

The stable should always have fresh, dry, and clean air. The ventilation system has to be dependable and simple to use so that you can keep the stable's ideal microclimate conditions without introducing drafts.

Care must be exercised while handling the horse when washing. Her anger and mistrust are exacerbated by rough treatment.

A stallion should mount on average once every day.

Two cages may be relatively standard for certain manufacturers, and the second cage should be finished after 8 to 10 hours. There shouldn't be more than 175 cages in total throughout a breeding operation. Depending on the stallions' health at full-aged (6–15 years old) age, boiling mating can include up to 30 mares, mowing can involve up to 25 mares, and manual mating can involve up to 30 mares. For stallions at the age of four, going to mating for the first time, up to 12 mares are picked.

Similar to manual mating, the load rate of mares per stallion occurs during boiling mating.

Mowing mating lasts for three to five months. (mid-March to July).

It is important to undertake a veterinarian and zootechnical check of stallions and mares a month prior to the breeding company. Only creatures that are 100 percent healthy should mate. Because the stallion may be a carrier of the infections causing glanders, durine, and infectious abortion, it is especially crucial to check him for these illnesses.

The veterinarian report has to mention if stallions and mares are suitable for mating.

It is required to remove the shoes, clean the hooves, and arrange the tail and mane a few days prior to the release of the stallions into the shoals.

Conclusion. The study looked at the aspects of feeding and caring for horses throughout a breeding season. In manual, mowing, and boiling matings, the characteristics of mares of young, medium, and elderly ages linked to one stallion were investigated. It is well known that the month of March is a wonderful time to find good foals. 92 heads of foals were produced from 100 heads of mares. Each stallion's semen was collected over the course of three days, and its quality was examined before insemination. For mating, stallions with spermatozoa that were more than 50% motile were employed.

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