NOMAD'S FOODS: TRADITIONAL FOODS OF THE KYRGYZ PEOPLE

Abstract

Kyrgyz nomadic cuisine, deeply rooted in their rich cultural heritage and nomadic lifestyle, is a testament to their adaptability to the rugged landscapes of Central Asia. With a focus on hearty meat-centric dishes, an array of dairy delicacies, and staple grains, it reflects their resourcefulness in utilizing locally sourced ingredients. Milk, obtained from various animals, takes center stage, resulting in diverse dairy products like "kaimak," "cream butter," and probiotic-rich ayran. Additionally, kurut, sary mai, and the beloved fermented mare's milk, koumiss, contribute to their unique culinary tapestry. Meat, especially mutton and horse meat, holds a revered place, and their meat preparation techniques are a testament to their culinary mastery. Beyond sustenance, Kyrgyz nomad foods embody cultural identity and community bonds, shared in a spirit of togetherness, making them more than just nourishment for the body but also for the soul.

Keywords: Kyrgyz nomadic foods, Central Asia, dairy products, kaimak, kurut, ghee, koumiss.

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I. INTRODUCTION

The Kyrgyz people, renowned for their rich cultural heritage and nomadic lifestyle, possess a culinary tradition deeply rooted in their history and surroundings. Kyrgyz nomadic foods exemplify the ingenious adaptation of this population to the rugged landscapes of Central Asia. The sprawling mountain ranges, pristine lakes, and vast meadows have all contributed to shaping their unique culinary practices. The nomadic way of life has significantly impacted their food culture, prioritizing portability, simplicity, and the use of locally sourced ingredients. From hearty meat-centric dishes to dairy delicacies and staple grains, Kyrgyz nomadic foods embody the ingenuity and resilience of a people intimately connected to their natural environment.

The noted Soviet Ethnographer P. Kushner characterizes "mountainous Kyrgyz food as remarkably simple." Although Kushner is familiar with a considerable array of Kyrgyz dishes, he acknowledges preparing only a select few. He describes the culinary scene in the Kyrgyz household: while meat occupies a position of honor on the table during guest visits, dairy in all its forms is a staple when guests are absent. As a result, Kyrgyz cuisine predominantly features high-calorie meat-based fare such as mutton, beef, and horse meat. Animal products hold a special place in the hearts of the Kyrgyz people, outshining even agricultural products in prestige. Meat products remain predominant in Kyrgyz diets to this day. Cow's milk takes a close second place, serving as a universal food. Many ethnic dishes in Kyrgyzstan are milk-based, offering a high-calorie and nutritious option. Some of these dairy delights even possess medicinal properties [1]. To ensure prolonged product storage, the Kyrgyz employ straightforward preparation techniques, including boiling, frying, drying, and leveraging lactic acid and yeast fermentation [2].

P.I. Kushner (Knyshev) categorizes traditional Kyrgyz food into three main groups: 1) milk-based dishes; 2) meat-based dishes; and 3) cereal-based dishes. Except for cereal-based foods, Kyrgyz cuisine largely excludes vegetable products [2]. As one of the ancient peoples who have embraced a nomadic and semi-nomadic lifestyle for ages, the Kyrgyz have devised unique culinary approaches influenced by the changing seasons. Winter ushers in the consumption of hearty meat and dough-based meals, while summers are marked by the indulgence of dairy products [3].

II. MİLK-BASED DİSHES

Milk and its myriad forms take center stage in Kyrgyz cuisine. The Kyrgyz employ milk from cows, horses, goats, sheep, and yaks to craft an array of dairy delights. Noteworthy dairy products prepared from boiled sheep, cow, and goat milk include:

"kaimak" – boiled cream often paired with tea;
"cream butter" – a delicacy savored exclusively by the affluent;
"butter" – another creation from cream;
"ayran" – a liquid sour milk with the cream removed (ayran is crafted from boiled milk).

Furthermore, the Kyrgyz fashion "katyk," "kurut," and "cheese" from cow, sheep, and goat milk. Even in present times, in rural regions, families rely on cow's, sheep's, or goat's milk to craft dairy products such as Ayran, Süzmo, Kurut, Butter, Ghee, and Chobogo. These staples, consumed year-round, offer versatility and serve as key ingredients in various dishes.

However, limited scientific literature exists on these dairy wonders, hindering their inclusion in nutritional programs. These traditional foods, however, hold promise as a foundation for modern dairy products. Smanalieva et al. comprehensively elaborate on many dairy delights, including Ayran, Süzmo, Kurut, Chalap, Ghee, Mare's milk, and Koumiss [3, 4].

1. **Ayran:** Fermented foods, including Ayran, hold esteemed positions in the daily diets of the Kyrgyz people, as well as in the culinary practices of diverse nations. Ayran, a homemade fermented milk beverage, embodies both nutritional benefits and cultural significance. The Kyrgyz adage "Ayran keeps satiety all day long" further underscores its healthful qualities. Ayran shares similarities with kefir, though it aligns more closely with the consistency of Turkish yogurt. Unlike the Turkish variant, Kyrgyz Ayran lacks the addition of water and salt during production [5, 6]. Remarkably, Ayran boasts a diverse spectrum of 62 lactic acid bacteria species. These probiotic properties have garnered substantial attention within the former Soviet Union. Notably, two indigenous lactic acid bacterial strains from Kyrgyz Ayran have been harnessed for the development of a novel pediatric nutritional product named "Biolact" [7]. Ayran, known for its high viscosity and creamy texture, features a distinct acidity and significant syneresis. It finds versatile use in the creation of delightful beverages such as Chalap and Zharma. In a more concentrated form, it serves as an ingredient in various dishes [4].

2. **Kyrgyz Kurut:** Kurut, cherished among the nomadic peoples of Central Asia, embodies the creative mastery of milk-based flavors. This nourishing delight not only provides sustenance on an empty stomach but also offers health benefits. Kurut, a versatile fermented milk product, enhances a range of dishes as a seasoning or standalone meal. It contributes an easily digestible source of essential macro- and micronutrients, promoting a healthy intestinal microflora. Among the Kyrgyz Republic's populace, Kurut enjoys popularity among both children and adults, positioned as a sought-after healthful food.

   In the Kashgari "Divan Lugat at-Turk" dictionary, many culinary terms have endured in the modern Kyrgyz language. For instance, "ash" signifies food, "süt" denotes milk, "kesme" signifies noodles, and "kurut" aptly represents the food itself. Kurut, embraced by various nomadic Turkic peoples, transcends the status of a mere fermented milk product; it emerges as a distinct form of dry, young cheese [8].

   Kurut boasts a diverse landscape of types in Kyrgyzstan. The suzmo is meticulously coated with salt and mixed to craft Kurut. The mixture is then shaped into walnut-sized units and dried in the cool shade. "Mai Kurut," featuring rich butter and suzmo boiled together, presents an enriched offering with the addition of cream (or butter) and salt. The prepared mixture, slightly cooled, is shaped and dried in the shade. Mai Kurut distinguishes itself through its elevated fat content, sumptuous flavor profile, and soft texture. After thorough mixing, the concoction is rolled and dried in the shade [9, 10].

   "Kainatma (Boil) Kurut" involves uniting suzmo, fresh ayran, and salt in a pot and simmering the mixture for a span of 30–40 minutes. Upon thickening, the mixture is removed from heat, cooled, shaped, and dried in the shade. This meticulous process enhances the elegance of the dining experience. "Ejigey Kurut" amalgamates all the aforementioned components and heats them over low flames until a luxuriously thick

texture is achieved. Subsequently, the mixture cools, is rolled, and is dried in the shade. Ejigey Kurut, a more exclusive variety, garners distinction for its lavishness and superior flavor. The preparation necessitates 5 liters of sheep's milk to yield a mere 1.5 kilograms of the coveted ejigey, obtained through extended boiling of sheep's milk. "Irimchik Kurut" mirrors the preparation of Ejigey Kurut. Irimchik emerges as a prized and delectable treat, akin to goat cheese. Historically reserved for the affluent, Irimchik derives from sheep's milk, requiring a substantial 5 liters to produce a mere 1.5 kilograms [11].

3. **Ejigey:** Ejigey, a product akin to kurut, originates from an intricate process involving prolonged boiling of sheep's milk. The method involves gradually adding starter to sheep's milk as it warms in a pot.

The resulting concoction possesses a distinct sour taste. Through continuous boiling and vigilant stirring, the milk content diminishes, yielding a rich yellow liquid. Ejigey's creation not only relies on sheep's milk but also embraces yak and goat milk. Ejigei's starter preparation involves the use of colostrum from sheep, combined with ayran starter while still warm. Subsequently, the concoction is introduced into a freshly cleansed lamb's abomasum, sealed, and left to hang in the sun for several days. Once separated from the solid residue, the starter is dried and retained for year-round use. This dish is often crafted during spring, summer, and early autumn [11].

Figure 1: Kurut Assortments at the Market in Bishkek, Kyrgyz Republic

4. **Sary Mai – Ghee:** Ghee, also known as 'Sary mai' or clarified butter, stands as a prominent fixture in Kyrgyz traditional cuisine. Derived from the clarification of cow's milk fat at high temperatures, ghee holds cultural and historical significance. Ghee extends its influence beyond Kyrgyzstan, finding a central role in Ayurvedic medicine within traditional Hindu culture [12]. Jordan, too, produces a variant known as Samn, featuring a reduced water content and various flavorings. Diminished water content augments storage capacity, contributing to its desirability [13]. Throughout traditional Kyrgyz cuisine, cow butterfat features prominently [4].

Figure 2: Small parts of Sary mai at the market in Bishkek, Kyrgyz Republic

5. **Koumiss:** Koumiss, a beloved dairy product in Mongolia, Kazakhstan, Kyrgyzstan, and certain regions of the Russian Federation, has its roots in the traditional fermentation of mare's milk [15]. This historical elixir has long been celebrated for both its delightful taste and its positive impact on human health [15-17]. Scientists have maintained a keen interest in koumiss, recognizing its rich nutritional content and probiotic microorganisms. While its primary production centers are in Kyrgyzstan, Kazakhstan, Mongolia, China, and Russia [14, 15, 18, 19], koumiss can also be crafted from camel's and cow's milk, with the camel's milk variation referred to as "shubat."

   The meticulous process of koumiss production involves freshly strained milk passing through fine sieves into vessels known as "chanach," "saba," and casks (Fig.3) [20]. To initiate fermentation, a mixture of over 10% old koumiss from the previous year or freshly prepared koumiss is added to fresh mare's milk, and the blend is churned using a stick called a "bishkek" [21].

   The longer the churning, the richer the flavor becomes. Warm milk results in a slightly sour koumiss, so it is essential to add it when it cools. The vessels used for koumiss preparation must be periodically cleaned, dried, and smoked to prevent contamination and the growth of unwanted cultures [22].

   Preserving the fermenting agent of koumiss from one year to the next posed a significant challenge for our ancestors. They achieved this by fermenting milk using "korongo" and "urp." "Urp" refers to the sediment that settles at the bottom of the chanach in the autumn, similar to curds. It was wrapped in gauze and dried. On the other hand, "korongo" was typically collected from the edges of the koumiss-making dish and used to ferment milk the following year. However, fermentation using "urp" was found to be more potent than "korongo" [14, 23].

A B C

Figure 3: Vessels for Koumiss Making, A- Chanach, B- Saba, and C- Casks

The utility of koumiss hinges on its chemical and bacterial composition, which varies not only with the type of milk used but also due to the microbial community at play. These microorganisms play a significant role in enhancing the nutritional content, beneficial properties, and unique aroma of koumiss. The microbiological diversity can vary depending on the geographical area, climate conditions, and temperature fluctuations during fermentation [14, 24].

Beyond its delicious taste, the consumption of koumiss has been associated with a range of health benefits. It is believed to boost innate immunity, aid in the treatment of tuberculosis and cardiovascular diseases, and improve various bodily systems, including the alimentary canal, metabolism, circulatory and nervous systems, blood-forming organs, kidneys, endocrine glands, and the immune system [25 - 27].

III. CEREAL-BASED DISHES IN KYRGYZ NOMAD CUISINE

Staple grains, including wheat, barley, and millet, play a crucial role in the tapestry of Kyrgyz nomad foods. These grains are skillfully transformed into hearty bread and nourishing porridge, sustaining the nomadic way of life. An exemplary creation is the famed "boorsok," an unleavened bread that is fried to golden perfection and serves as an essential accompaniment to many meals. Furthermore, both handcrafted and store-bought noodles are widely savored, taking center stage in soups and stews.

The Kyrgyz nomads have harnessed the nutritional prowess of grains, crafting a multitude of delectable and wholesome dishes. Among these are cereal-based lactic acid fermented beverages, including Bozo, Maksym, and Zharma. These beverages are crafted from milled cereals such as barley, millet, and corn, either fermented with lactic acid bacteria or yeast [28]. Traditionally prepared in homes by women for familial consumption in villages, these beverages have transcended their origins and embarked on an industrial journey, becoming popular fixtures both in supermarkets and as street fare. These libations

are categorized based on seasons, with summer offerings encompassing Zharma, Maksym, and Chalap, while Bozo takes the spotlight as a winter favorite. These delightful concoctions hold a special place in Kyrgyz hospitality, ensuring they are graciously presented to guests [4].

Kyrgyz nomad foods extend beyond their role as sustenance, serving as vibrant reflections of cultural identity and communal bonds. Meals are shared in a spirit of togetherness, fostering unity and celebration. Traditional festivals and special occasions become platforms for showcasing the culinary artistry of Kyrgyz nomads, as elaborate feasts are meticulously prepared to honor visitors and exemplify the essence of hospitality.

In essence, the culinary landscape of Kyrgyz nomad foods encapsulates a harmonious blend of grains, tradition, and shared experience. With their mastery of transforming grains into delightful creations and their commitment to preserving their culinary heritage, the Kyrgyz people have woven a rich tapestry of flavors that not only nourish the body but also nourish the soul and strengthen the bonds of community.

Figure 4: Bozo, Maksym, Zharma and Chalap at the market in Bishkek, Kyrgyz Republic

IV. MEAT: THE HEART OF KYRGYZ NOMAD CUISINE

The essence of Kyrgyz nomad foods is intertwined with the bounty of livestock that thrives in the region. Among these precious resources, mutton and horse meat reign supreme, occupying a revered place in the culinary repertoire of the Kyrgyz people. The age-old practices of nomadic herding and open grazing have gifted the Kyrgyz with an abundance of meat, which they artfully transform into a tantalizing array of dishes that celebrate their heritage and sustain their way of life.

Horses, beyond being mere animals, hold a profound and multifaceted significance within Kyrgyz culture, history, and daily existence. They are not only cherished companions but also powerful symbols of freedom, embodying the core essence of Kyrgyz identity. Here are some key insights into the profound importance of horses for the Kyrgyz people:

In Kyrgyz culinary tradition, the intricate art of meat cutting, known as "ustakandoo," is a skilled practice entrusted to a designated chef, the "jaasakchy" or "bokol bashi." This role carries immense responsibility, as precision in meat cutting is paramount, with any mistakes potentially carrying traditional consequences. The process involves meticulous bone removal and precise division, ensuring that the integrity of the meat is preserved with utmost care [3].

Distinctive culinary practices such as "olobo" involve the preparation of sheep's lungs in a mixture of milk and oil, resulting in a delicacy highly esteemed and even revered as the epitome of exquisite cuisine by some.

Historical records unveil fascinating methods of meat preservation. One intriguing approach is the "stone cordon" method, wherein a slaughtered sheep or goat is stuffed with heated stones, effectively preserving the meat over extended periods.

Chuchuk, a sausage crafted from horse meat, stands as a testament to ancient preservation techniques and continues to hold a special place in Kyrgyz gastronomy [29].

Horse meat transcends mere sustenance; it occupies a central and revered role in Kyrgyz culinary traditions. Marrow extracted from horse meat is reserved for esteemed guests, embodying a gesture of honor and respect. The meticulous drying of meat during summer months ensures a ready supply of sustenance during the colder seasons.

Traditional delicacies like naaryn, uyurme, kuurdak, and chuchuk are meticulously crafted from meat, underscoring its pivotal status in second courses.

Kyrgyz nomad cuisine is an intricate tapestry that interlaces meats with vibrant vegetables, aromatic herbs, and tantalizing spices, resulting in a symphony of flavors and textures. Dried and fresh fruits, along with luscious berries, are ingeniously incorporated into culinary creations.

In times gone by, the revered Kulazyk, an ancient Kyrgyz dish, exemplified practicality and longevity. Ground meat flour, derived from meticulously salted and dried meat, played a vital role in this treasured culinary masterpiece [11].

In essence, horses are a living embodiment of Kyrgyz culture, reflecting deep-rooted historical narratives and indelible spiritual beliefs. Beyond their utilitarian roles, these majestic creatures inspire admiration, stand as symbols of courage and resilience, and enrich the tapestry of Kyrgyz identity.

V. CONCLUSION

Kyrgyz nomad cuisine serves as a captivating gateway to a vibrant culinary heritage deeply rooted in nomadic traditions and a profound connection to the natural world. These dishes embody the essence of resourcefulness, adaptability, and a strong sense of communal togetherness. Ranging from succulent meat dishes to tangy dairy delights and nourishing grains, Kyrgyz nomad cuisine invites you on a sensory journey that encapsulates the enduring traditions and values of this captivating Central Asian culture.

Over centuries, the Kyrgyz food culture has been shaped by the nomadic way of life, characterized by constant movement across steppes and mountains in varying weather conditions, resulting in a high-calorie, nutritious, and functional diet often achieved through fermentation with lactic acid bacteria. Although traditional cuisine primarily featured meat, milk, and cereal-based products, political, technical, and economic changes are currently reshaping Kyrgyzstan's food culture.

After gaining sovereignty, Kyrgyz ethnic products have gained widespread popularity, especially during traditional celebrations, and industrial-scale production of items such as Bozo, Maksym, Ayran, Zharma, Chalap, Ghee, and Kurut, has surged over the last two decades. This transformation, coupled with the displacement of fermented beverages by non-alcoholic alternatives, necessitates comprehensive studies on the chemical composition, nutritional value, and production processes of traditional products.

In essence, Kyrgyz nomad cuisine is a rich tapestry that weaves together history, tradition, and the bounties of nature. It reflects the resilience and adaptability of a people intimately connected to their land, their heritage, and their collective spirit.

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