PRESENTATION

The "milk question" in Latin America: experts, markets, and public policies in the twentieth century

The inclusion of cow's milk in the human diet has ancient origins. However, according to the relevant literature, its regular consumption in liquid form is a relatively recent dietary habit, both in the Western world and in other parts of the globe. In the United States and Northern Europe, for example, it was only in the second half of the nineteenth century that a market for liquid milk emerged, mainly because of the rapid spread of artificial infant feeding in the context of urbanization (Teuteberg, 1986; Spiekermann, 1994; Dittler, 1996; Vernon, 2000; Wolf, 2001; Velten, 2010). The crucial moment for the generalization of milk consumption came only with the dissemination of the information contained in the book The Newer Knowledge of Nutrition after the First World War (1914-1918), mainly due to the discovery of what are known as micronutrients - vitamins, minerals etc. - and their vital functions. Thus, since the 1920s and owing to its extraordinary abundance of these and other elements, milk came to be seen as a kind of "superfood" and "universal corrective" of traditional diets, whose daily consumption in large amounts would help to preserve the health and vitality of people all over the world (McCollum, 1918; Carpenter, 2003). In the countries of the Northern Hemisphere, which had just suffered the terrible hardships of the First World War, the message fell on fertile soil and was easily reinforced by widespread propaganda deployed through a novel alliance between science, health authorities and a thriving dairy industry (DuPuis, 2002; Orland, 2004; Valenze, 2011).

However, a crucial precondition for the final breakthrough of milk as a staple food was the restoration of consumer confidence, which had been severely damaged towards the end of the nineteenth century. Because, in the light of germ theory and the rise of bacteriology, which since the 1880s had revolutionized medical knowledge, it was argued that, if not treated with the necessary care, milk could easily become an ideal carrier for all kinds of pathogens and a vehicle for the transmission of numerous diseases. And, in fact, bacteriological controls carried out in different cities long before the turn of the century confirmed the worst suspicions with regard to the hygienic conditions of most of the traditional dairy industry. Thus, at the same time that its nutritional properties were being highlighted, liquid milk was identified as a serious health threat, the most alarming expression of which were the high rates of infant mortality attributed to it. Therefore, it is not surprising that the "milk question," that is, the problem of supplying the rapidly growing cities of the Western world with safe milk, became one of the great public health concerns of the era and mobilized physicians, urban reformers and important sectors of civil society in support of radical government action (Rosenau, 1912; Dwork, 1987; Atkins, 1992; Wolf, 2001; Koslow, 2004; Czaplicki, 2007; Jenkins, 2008).

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As the relevant literature shows, the speed and efficiency of public responses to this challenge differed from one country to the other, with the United States being the undisputed pioneer in this field. However, the important fact is that in all the "milk countries" of the Northern Hemisphere, it took an astonishingly short period of time to replace the fatal image of milk as "white poison" with that of a miracle drink with healing powers. Thus, the 1920s were already considered to be the decisive decade for the final breakthrough of a new "milk drinking culture" that – not only in the United States, but also in countries such as Great Britain, Germany, Denmark and the Netherlands - led to a lasting increase in per capita milk consumption to hitherto unimaginable levels. Among the factors that made it possible to correct the image of milk and implement its inclusion in the diet of millions of people, the literature highlights – alongside enormous propaganda efforts – the industrial transformation of the entire dairy production chain, whose key element was the introduction of pasteurization. This technology not only made it possible to definitively contain the health risks of milk and restore lost confidence, but it also accelerated capitalist concentration by subjecting the entire dairy sector to the principles of the economies of scale, with important effects on prices. In other words, it is the quality and the price that stand out as key factors of the new "age of milk" in the countries of the Northern Hemisphere (DuPuis, 2002; Velten, 2010; Valenze, 2011; Smith-Howard, 2014).

As these lines suggest, the modern transformation of bovine milk into an industrial product of mass consumption was a highly complex process that also became a rich field of research with an already extensive literature involving multiple approaches (DuPuis, 2002; Atkins, 2010; Valenze, 2011; Smith-Howard, 2014). In most Latin American countries, on the contrary, the modern history of milk still represents a major gap in the context of food studies, despite the fact that, in many countries of the region, the white liquid occupies an important place in everyday diets. From a historical perspective and against the background of the modern transformation of milk in the countries of the Northern Hemisphere, a couple of pertinent questions arise with regard to Latin America: What impact did the modern hopes for and fears of milk consumption have on public health discourses in the countries of the region? What specific nature did the "milk question" take on in different parts of the subcontinent? What solutions were discussed and which were implemented or discarded? And, finally, what were the roles of experts, consumers, the dairy sector and public authorities in these processes?

The dossier brings together five research articles that focus on the metropolises of four countries – Buenos Aires (Argentina), São Paulo (Brazil), Bogota (Colombia) and Mexico City (Mexico) – while sharing a common interest in the two basic dimensions of the "milk question", guaranteeing safety and improving diets. The texts focus on the first 2/3 of the twentieth century – a fact which, on the one hand, underlines the lasting echo that modern milk doctrine had in the region while, on the other hand, it also shows the unusually long persistence of the "milk question" on the public health agenda of these countries. Thus, and despite their focus on different periods, the papers of María Pilar Zazueta (Mexico City), Sören Brinkmann (São Paulo), Stefan Pohl Valero (Bogota) and José Buschini (Buenos Aires) all examine public efforts to regulate the production and trade of liquid milk, with the aim of improving its hygienic quality. The work of Sandra Aguilar

Rodríguez, meanwhile, concentrates on Mexican government strategies to increase milk consumption, which included the importation, reconstitution and sale of powdered milk at subsidized prices.

Notwithstanding the particularities of each case, the five articles have important similarities with regard to the basic patterns of the "milk question" and its underlying problems. Thus, even as late as the 1940s and 1950s, this issue was still part of the public debate and the health agenda in all four cities, due to persistent problems regarding quality, high prices and low consumption. At the same time, regulatory efforts to improve the situation were strongly resisted by different actors in the milk product chain, and in none of the cases did the authorities fully succeed in transforming the supply systems according to their objectives. Moreover, all the cases show – implicitly or explicitly – that the reasons for these failures are to be found not only in the inability of state authorities to enforce their standards, but also in the underdevelopment of the dairy industry. In that sense, it is important to bear in mind that capitalist transformation of the sector in countries such as the United States – which also solved the problems of price and quality – was based on an already specialized, high-yield dairy production system. On the contrary, in Latin American countries - perhaps with the sole exception of Argentina - dairy farming at that time was still a marginal activity, based mostly on primitive methods and with little capacity to adapt to the consumption demands of modern times. Therefore, it is hardly surprising that the history of milk in many places in the region during the first half of the twentieth century was characterized by repeated failures of state regulation, the formation of fragmented markets, with milks of different types and quality - pasteurized, raw, reconstituted - and comparatively low rates of consumption.

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