Cocoa butter fats and possibilities of substitution in food products concerning cocoa varieties, alternative sources, extraction methods, composition, and characteristics

ABSTRACT

The current concern for cocoa butter fat as major ingredients of chocolate intake in the World has raised the question of the high price of cocoa butter among all other vegetable fats. Productions of natural cocoa butter fats are decreasing day by day due to the decrease of cocoa cultivation worldwide; moreover, cocoa fruit contains only a little amount of cocoa butter. Therefore, the food industries are keen to find the alternatives to cocoa butter fat and this issue has been contemplated among food manufacturers. This review offers an update of scientific research conducted in relation to the alternative fats of cocoa butter from natural sources. The findings highlights how these cocoa butter alternatives are being produced either by blending, modifying the natural oils or fats from palm oil, palm kernel oil, mango seed kernel fats, kokum butter fat, sal fat, shea butter, and illipé fat.

Keyword: Natural cocoa butter; Cocoa butter alternative; Fatty acid; Triglyceride; Cocoa butter properties