Brazil is the country of paradox with respect to famine and waste. While 32 million Brazilians are living without adequate food, it is estimated that 30% to 40% for some products such as vegetables and fruits are wasted, impacting the environment. This study aimed to develop three formulations of chocolate bars, characterized according cocoa mass content: bittersweet (48% and 42%) and sweet (39%), using flour obtained from the residues of sport drink production, which was based on the concentrated juice of fruits and vegetables. The nutritive value was determined in quintuplicate and sensory analysis was conducted with 33 untrained panelists through a 9-point hedonic scale. To the degree of sweetness a 4-point scale was used. The results were subjected to analysis of variance (ANOVA) with comparison of means by Tukey test (p < 0.05). The caloric value was calculated by applying values of conversion. There was no significant variation in the composition of the formulations, the averages obtained were: moisture 7.2%, mineral fraction 3.6%, fat 22.9%, protein 14.9%, 11% crude fiber and 40.4% carbohydrate with a caloric value of 427.3 kcal. The average for all sensory attributes were between 5 and 7, respectively, "neither liked/ or disliked" to "liked moderately." Concerning the degree of sweetness, the bitter and sweet chocolates, had an average of 2.1 and 2.7, respectively. As conclusion, these products can be characterized as rich in fiber and presented sensory potential, being a good alternative to reduce food waste.