

Wheat Flour Manufacturer

Challenge

The company in this case study was facing a major bottleneck with its production process. Despite working with different suppliers to solve this production challenge, their vitamin premix was limiting the speed of the mill since it could only process 100 g of premix every 1 minute.

WIN America's Solution

During WIN Group's visit to the company's plant, the production manager told us that none of their suppliers had been able to solve this problem. Their goal was to accelerate the application speed of the vitamin premix by at least 30%. WIN's R&D department focused on the task of enhancing production by improving the vitamin premix and making the mill work more efficiently.

Impact

In a month and a half, with the support of our engineering technology, we presented the first samples of a new vitamin premix. The new premix increased the speed of the mill, which was now able to process 400 g in 2.3 minutes. This exceeded the company's original goal of increasing the application time by 30%, and they continue to use our premix in their product.

Health Sector

Challenge

A company in the health sector had problems with its premixed food designed for patients with feeding tubes. The premixed food was intended for dilution with water prior to use; however, the premixed powder would settle out of solution too rapidly and clog the feeding tube.

WIN America's Solution

WIN Group's team performed extensive research and tested several premix options to solve this problem. After several revisions, we were able to produce a premix that could be incorporated into the powdered food substitute. Our premix prevented the original premixed food powder from settling out of solution, which made this food easier for patients and caregivers to administer. Multiple forms of quality controls (Atomic Absorption, Fourier-transform infrared spectroscopy (FTIR) and High-performance liquid chromatography (HPLC)) ensured that our health care client received premixes that met or exceeded their safety expectations.

Impact

Currently, the health sector purchases the largest volume of customized premix products. We supply over 115,000 lbs of vitamin and mineral premixes per year. Our clients continue to use WIN America's products as our quality, cost, and customization capabilities beat our competitors.

Extruded Snacks

Challenge

More than 10 years ago, WIN Group became the first producer of innovative fortification premixes for extruded snacks. The company in this case study approached us for assistance in improving the nutritional content of snacks that are often considered “junk food”.

WIN America's Solution

After talking with the company's production manager, we agreed to venture into this field and suggested that the company vitaminize its snacks. We generated a vitamin premix that could be incorporated into their snacks without compromising taste, with the overall goal of reducing the “unhealthy food” stigma of these snacks.

Impact

After developing the innovative vitamin premix, we initially delivered 25 kg every three months. Within two years of the initial customization, we now deliver more than 5 tons of premix per month to satisfy the demands of our client and their consumers. Today, we are pleased to deliver our vitamin and mineral premix to a variety of Mexican companies that manufacture extruded snacks.

Dairy Products

Challenge

After an analysis of some of its dairy products, the company in this case study was warned by the owners of the product license that the vitamin content in the products was too low. The vitamin additives that the company was previously using were either not mixing well with the dairy products or were not able to withstand the ultra-high temperature processing methods.

WIN America's Solution

The company's production manager contacted us to solve the problem that was caused by another vitamin supplier. We formulated a customized vitamin premix and were able to exceed the vitamin standard set by the license owner of these dairy products.

Impact

WIN Group was the only supplier that was able to meet the final standards for these dairy products. We now have 11 dairy clients and deliver over 32,000 lbs of premix per year. When our clients use our premixes, they are confident in knowing that they have the correct vitamin concentration in their finished products. This includes more challenging products such as those processed at ultra-high temperatures or those with a low pH such as yogurt. Due to this success, additional dairy companies are interested in replacing their old oil-based vitamin blends with our customizable powder blends.

Soft Drink Manufacturer

Challenge

The company in this case study found considerable variation in the vitamin premix that they used to vitaminize the drinks that they produce. The different amounts of premix, different premix colors, and even different levels of acidity led to significant variations in their products.

WIN America's Solution

The company's production manager contacted WIN Group for help with solving this production problem. After an exhaustive analysis, which was supported by our production process, we proposed that the client make kits of all the ingredients in its formula. The process entailed receiving the ingredients in bulk packaging, which were then precisely weighed and repackaged at WIN Group's facilities to generate a premix kit for each production batch.

Impact

Today, we are the only vitamin premix supplier for this company's production process, and we supply 2,800 lbs per year. By standardizing their vitamin premix and eliminating human error, they were able to obtain homogeneity in their products, as well as reduce waste, production times, and warehouse inventories.

Aloe Vera Based Beverage

Challenge

Vitamin C is highly sensitive to the production processes and temperature changes involved in beverage production. The company in this case study detected that pasteurization of their product led to almost complete vitamin C depletion. Their goal was to maintain suitable vitamin C levels in their finished product.

WIN America's Solution

WIN Group's R&D team investigated the process and developed the exact formulation needed to prevent the vitamin C from being depleted during production. They also confirmed that the vitamin C was still present at the end of the beverage's shelf life.

Impact

WIN Group now ships 64,000 lbs per year to this client, who continues to be satisfied with the customized product. Additionally, we have other clients (mainly manufacturers of multivitamin or immunity blends) that buy our premixes containing vitamin C due to the satisfactory stability throughout the production process.

Isotonic Beverage

Challenge

Isotonic drinks normally have a salty taste due to their chemical composition since the incorporated salts overpower the flavor of the drink. The company in this study approached WIN Group with the goal of improving the flavor of their isotonic beverages.

WIN America's Solution

Using our mineral technology, our R&D team was able to remove the salty taste and provide the consumer with a wonderful tasting and refreshing beverage. We used innovative ingredients versus the standard products, which helped us achieve a clean, low-mineral flavor that mixed well with the beverage's other flavors and sweeteners.

Impact

We now sell 40,000 lbs per year of premix to isotonic beverage companies. We are able to achieve this success since our premix has better solubility, shelf-life stability, and flavor than other premixes. Our ability to customize premixes with the newest minerals in the international market has led to our clients' success.

Kid's Milk

Challenge

The company in this case report ventured into the field of children's dairy products. They wanted to fortify their product by incorporating a premix that would help improve the cognitive development of consumers. The client contacted us to develop a customized blend that would be able to resist ultra-high temperature processing and still meet the vitamin expectations listed on the product labelling.

WIN America's Solution

WIN Group developed a premix that fulfilled this company's requirements, which was a powder blend instead of their prior oil-based vitamin blend. Our formulation met the company's functional objective as it was designed to improve cognitive development in children who consume their dairy products.

Impact

Our customized premix helped the client properly handle the product and keep it in a standard warehouse with a reduction in the risk of spoiling. Our dairy product customers, along with the rest of our clients, will always have the advantage of getting customized, stable, flavorful, high-quality blends of vitamins and minerals. With WIN Group's flexibility and collaboration with our clients, we are able to achieve success. Today we have 11 dairy clients and deliver over 32,000 lbs of premix per year.

International Brewery, Mexico Division

Challenge

The company in this case study wanted to develop a new fortified energy drink; however, they did not want to include synthetic vitamins. Since the customer also wanted to streamline their production process, they contacted WIN Group to find a solution.

WIN America's Solution

We were able to incorporate a vitamin C premix that was obtained directly from natural extracts. The premix was designed to be highly soluble so it could easily be incorporated into the drink manufacturing process. We developed the natural vitamin C premix according to the nutritional values requested by the client, which took the processing conditions, shelf-life, and flavor into consideration.

Impact

WIN Group's premix allowed this new fortified energy drink to be the first one in the market with a vitamin premix of 100% natural origins. Using WIN Group's premix allowed the customer to streamline their production process since only one vitamin blend was needed versus many individual ingredients. Additionally, our certifications gave our client confidence that our premix products are manufactured according to international standards.