

# The Fortification of Sugar



Sugar fortification is a well-established practice to combat micronutrient deficiencies. Sugar is part of the food culture worldwide and consumed in relatively stable quantities. Hence, the fortification of sugar with vitamin A is one of the safest, most

efficacious, and cost-effective interventions to prevent and control vitamin A deficiency. BASF as a leading nutrient manufacturer owns decades of experience in supporting and supplying the fortification of sugar producers.

**60 years**

experience in producing high-quality vitamin A at scale.

**40 different forms**

of highly stable vitamin A.

**25 years**

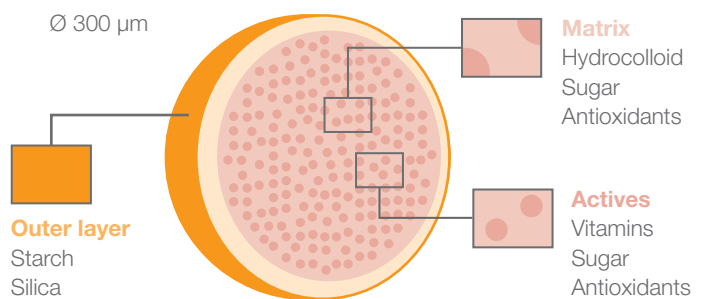
of partnering in leading sugar fortification programs worldwide.

## Our Product Solution

**BASF Beadlets — up to 80% more stable and cost-effective**

- BASF has developed highly stable, bioavailable and affordable vitamin A formulations for fortification.
- All of our solutions show excellent stability in bulk, as well as in sugar, since effectively protected by antioxidants.
- The results of our continuous stability tests show that our products have excellent stability in a finished sugar blend. This is due to our encapsulation technology, with which we aim to guarantee the desired safety and impact of fortification projects.

## Micro Encapsulation — Quality for a better performance





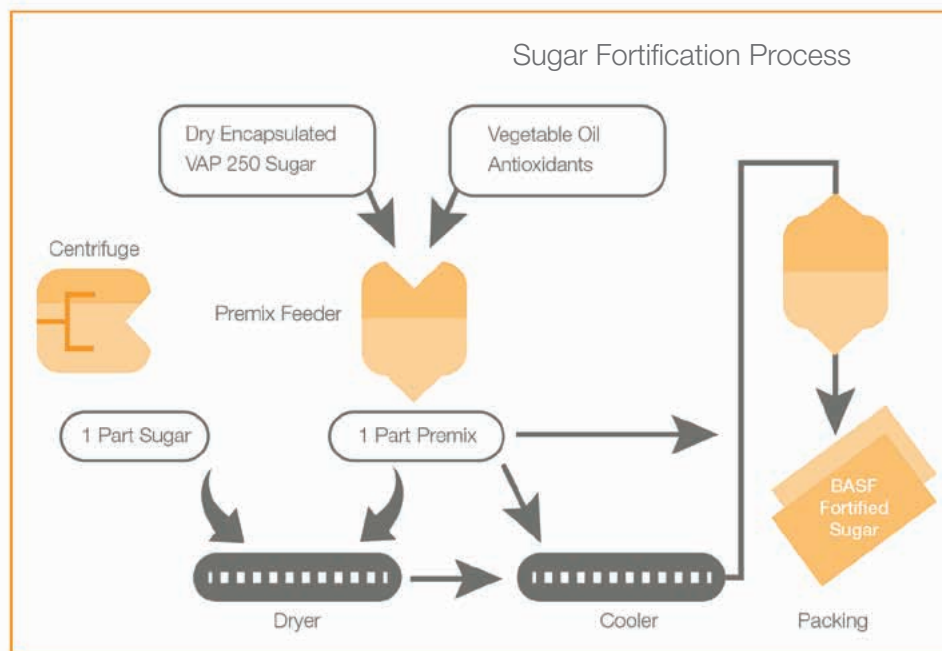
### Our Technical Support

#### How to fortify sugar with the highly concentrated vitamin A

The principle is to mix powder vitamins with sugar using vegetable oil as a binder in a pre-blend. Both refined and raw sugar can be used as a carrier. The fine particle size of BASF's vitamins ensures a homogeneous distribution in sugar.

#### How to fortify sugar with the pre-blended vitamin A

BASF can provide vitamin A for sugar fortification in a pre-blended product form, which is easier to apply and requires very little equipment. This innovation makes sugar fortification even easier.



### Our Analytical Support

#### Test kits monitoring the quality of food fortification

BASF developed analytical methods and a mobile laboratory equipment for the cost-effective determination of the vitamin A content of food. These lab cases allow the quality and effectiveness of the programs to be assessed close to the end-costumer. Producers can use the test kits for continuous monitoring of their production quality.



**Want to know more about sugar fortification?**

**Contact your BASF partner below for more support:**

Dr. Andreas Blüthner  
Director—Food Fortification & Partnerships  
BASF SE

Claus Soendergaard  
Global Application Specialist  
BASF SE

[Food-fortification@basf.com](mailto:Food-fortification@basf.com)  
[www.food-fortification.com](http://www.food-fortification.com)