everyday INSPIRATIONS & innovative PROJECTS
How we do it?

Welcome

We meet consumer’s expectations
We’re researching market trends
We listen & adapt to the client’s needs
We support sustainable agriculture
We provide drying service

Tasty & Functional

Where there is a will and a passion, there is a way. We are here to create new, natural and functional food product’s solutions. The biggest success for us is the one of our Partners.

2 modern production facilities
20 persons in R&D Department
36 export markets
since 1991 family company
Our Strength

The basis for our production are innovative technologies as well as natural high quality raw materials.

Our natural food ingredients are used in every production domain in the food industry.
The unique drying method in an exceptionally short time and low (but positive) temperature e.g.: of fruit, vegetables and cheese. Thanks to proper parameters, it allows very high levels of nutritional components to be preserved in the final product. In the rehydration process, products regain the natural texture, flavour and aroma typical of the raw material used.

As compared to popular freeze drying - MIRVAC production technology meet all the present needs and market trends.
Spray drying technology

Drying does matter

Spray drying technology with the use of nozzles allows a product of yet higher quality and better solubility in cold solutions to be obtained.

Handy functionality

This makes it possible to obtain microbiologically clean and easy-to-apply powdered products produced from liquid thickened juice, concentrate or other wet raw materials. Solutions are sprayed by means of a spray disk, while drying is effected by immediate evaporation of water with the use of hot air.

The final product is microencapsulated, therefore releases its aroma only after being submerged in water.

<table>
<thead>
<tr>
<th>PRODUCT CHARACTERISTICS</th>
<th>TRADITIONAL SPRAY DRYING METHOD</th>
<th>SPRAY DRYING TECHNOLOGY WITH THE USE OF NOZZLES</th>
</tr>
</thead>
<tbody>
<tr>
<td>MEDIUM QUANTITY</td>
<td>STANDARD</td>
<td>REDUCED</td>
</tr>
<tr>
<td>SOLUBILITY</td>
<td>GOOD IN WARM SOLUTIONS</td>
<td>VERY GOOD IN WARM SOLUTIONS, BETTER SOLUBILITY IN COLD SOLUTIONS</td>
</tr>
<tr>
<td>HYGROSCOPICITY</td>
<td>STANDARD</td>
<td>SMALLER</td>
</tr>
<tr>
<td>POWDER STRUCTURE</td>
<td>TYPICAL OF PRODUCTS OF TRADITIONAL SPRAY DRYING</td>
<td>IMPROVEMENT IN STRUCTURE AND QUALITY OF POWDER</td>
</tr>
</tbody>
</table>
Reduced-meat ready meals in line with positive nutrition trends

Healthy eating has moved more towards a trend for boosting food with “good stuff” as opposed to removing “bad stuff”. Among consumers, the positive act of boosting food with more vegetables is significantly more popular than the more restrictive act of reducing meat consumption – eg. Meatless Mondays. Highlighting the benefits of the added non-meat component instead of the reduced meat content would resonate with those consumers focused on adding to their diet as opposed to taking away.

"Which of the following do you typically do? Select all that apply", 2016

- Include plenty of vegetables in meals
- Reduce meat consumption at least some of the time
The new opportunities

The meat snack format can be seen as an interesting delivery mechanism for energy ingredients.

Consumers are calling for convenient food and drink products that also provide functional, not just nutritional, benefits since today's lifestyles are more hectic than ever before.

Incorporating energy benefits into meat snacks is a rare yet potentially profitable strategy as, with today’s increasingly fast-paced lifestyles.
Our best answer

We already did it

The simplicity is the key. We have natural ingredients and clean composition, as well as claims in line with trends and the functional role of food for each of us. The foundation is the taste that gives pleasure to every palate!

- Suitable for Vegan / Vegetarian
- High in fibre / protein
- With Superfoods
- Gluten free

- Easy & convenient to prepare
- Dairy free
- Lactose free
- Organic
- No added sugars
Cold Meats

Ingredients proposal

VEGETABLE MIX
(mixes)

BLACK PEPPER
(dried vegetable & spice extracts)

HVP WITH SMOKED BACON FLAVOUR
(SD hydrolyzed vegetable protein)

Storage Convenience & Ease of preparation.
100% natural products.
Meats
Natural source of great taste

ZUCCHINI
(dried vegetables)

Appetizing, replacing ready products from the fridge.
Natural ingredients paired with great taste and aroma.

VEGETABLE BROTH
ON NATURAL INGREDIENTS
(mixes)
Proper ingredients are the key

**Pates**

CHAMPIGNON  
(dried vegetables powders)

RED BELL PEPPER  
(dried baked vegetables)

Tasty, convenient in preparing in fast-pace world.

Natural ingredients.
Advanced technologies we use let us propose the vast range of fractions and shapes of ready products (from 0 - 0.5 mm to every client’s need).

### DRIED FRUIT

<table>
<thead>
<tr>
<th>Apple</th>
<th>Apple with strawberry juice</th>
<th>Cranberry</th>
<th>Raspberry</th>
</tr>
</thead>
<tbody>
<tr>
<td>Apple with banana puree</td>
<td>Apricot</td>
<td>Mango</td>
<td>Redcurrant</td>
</tr>
<tr>
<td>Apple with cinnamon</td>
<td>Blackcurrant</td>
<td>Peach</td>
<td>Strawberry</td>
</tr>
<tr>
<td>Apple with mango juice</td>
<td>Cherry</td>
<td>Pineapple</td>
<td>-</td>
</tr>
<tr>
<td>Apple with pineapple juice</td>
<td>Chokeberry</td>
<td>Plum with rice flour</td>
<td>-</td>
</tr>
</tbody>
</table>

### DRIED VEGETABLES

<table>
<thead>
<tr>
<th>Broccoli</th>
<th>Caramelized onion</th>
<th>Pumpkin</th>
<th>Tomato with basil &amp; oregano</th>
</tr>
</thead>
<tbody>
<tr>
<td>Black eyed bean</td>
<td>Green pea</td>
<td>Red bean</td>
<td>White bean</td>
</tr>
<tr>
<td>Beetroot</td>
<td>Jerusalem artichoke</td>
<td>Red onion</td>
<td>White onion</td>
</tr>
<tr>
<td>Beetroot with vinegar</td>
<td>Kale</td>
<td>Red bell pepper</td>
<td>Zucchini</td>
</tr>
<tr>
<td>Carrot</td>
<td>Parsley</td>
<td>Spinach</td>
<td>-</td>
</tr>
<tr>
<td>Celery</td>
<td>Parsnip</td>
<td>Sweet potato</td>
<td>-</td>
</tr>
<tr>
<td>Chickpea</td>
<td>Potato</td>
<td>Tomato</td>
<td>-</td>
</tr>
</tbody>
</table>

### SUPERFOODS

<table>
<thead>
<tr>
<th>Beetroot</th>
<th>Cranberry</th>
<th>Spinach</th>
</tr>
</thead>
<tbody>
<tr>
<td>Blackcurrant</td>
<td>Jerusalem artichoke</td>
<td>Strawberry</td>
</tr>
<tr>
<td>Carrot</td>
<td>Kale</td>
<td>Sweet potato</td>
</tr>
<tr>
<td>Chokeberry</td>
<td>Raspberry</td>
<td>-</td>
</tr>
</tbody>
</table>
Advanced technologies we use let us propose the vast range of fractions and shapes of ready products (from 0 - 0,5 mm to every client’s need).

### FRUIT POWDERS

<table>
<thead>
<tr>
<th>POWDER</th>
<th>MIX</th>
<th>GRANULATES</th>
<th>POWDER</th>
<th>MIX</th>
<th>GRANULATES</th>
<th>POWDER</th>
<th>MIX</th>
<th>GRANULATES</th>
</tr>
</thead>
<tbody>
<tr>
<td>APPLE</td>
<td>❖</td>
<td>❖</td>
<td>CRANBERRY</td>
<td>❖</td>
<td>❖</td>
<td>PLUM</td>
<td>❖</td>
<td>❖</td>
</tr>
<tr>
<td>APRICOT</td>
<td>❖</td>
<td>❖</td>
<td>LEMON</td>
<td>❖</td>
<td>-</td>
<td>POMEGRANATE</td>
<td>❖</td>
<td>-</td>
</tr>
<tr>
<td>BANANA</td>
<td>❖</td>
<td>-</td>
<td>LIME</td>
<td>❖</td>
<td>-</td>
<td>RASPBERRY</td>
<td>❖</td>
<td>❖</td>
</tr>
<tr>
<td>BLACKCURRANT</td>
<td>❖</td>
<td>❖</td>
<td>MANGO</td>
<td>❖</td>
<td>❖</td>
<td>STRAWBERRY</td>
<td>❖</td>
<td>❖</td>
</tr>
<tr>
<td>BLUEBERRY</td>
<td>❖</td>
<td>❖</td>
<td>ORANGE</td>
<td>❖</td>
<td>-</td>
<td>-</td>
<td></td>
<td></td>
</tr>
<tr>
<td>CHERRY</td>
<td>❖</td>
<td>❖</td>
<td>PEACH</td>
<td>❖</td>
<td>❖</td>
<td>-</td>
<td></td>
<td></td>
</tr>
<tr>
<td>CHOKEBERRY</td>
<td>❖</td>
<td>❖</td>
<td>PINEAPPLE</td>
<td>❖</td>
<td>❖</td>
<td>-</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

### VEGETABLES POWDERS

<table>
<thead>
<tr>
<th>POWDER</th>
<th>MIX</th>
<th>GRANULATES</th>
<th>POWDER</th>
<th>MIX</th>
<th>GRANULATES</th>
<th>POWDER</th>
<th>MIX</th>
<th>GRANULATES</th>
</tr>
</thead>
<tbody>
<tr>
<td>BEETROOT</td>
<td>❖</td>
<td>❖</td>
<td>GARLIC</td>
<td>❖</td>
<td>❖</td>
<td>SAUERKRAUT</td>
<td>❖</td>
<td>-</td>
</tr>
<tr>
<td>CARROT</td>
<td>❖</td>
<td>❖</td>
<td>ONION</td>
<td>❖</td>
<td>❖</td>
<td>TOMATO</td>
<td>❖</td>
<td>❖</td>
</tr>
<tr>
<td>CHAMPIGNON</td>
<td>❖</td>
<td>-</td>
<td>PICKLED CUCUMBER</td>
<td>❖</td>
<td>-</td>
<td>WILD MUSHROOM</td>
<td>❖</td>
<td>-</td>
</tr>
</tbody>
</table>

### FERMENTED VEGETABLES

- BEETROOT
- CARROT
- CELERY
- CUCUMBER
- RED BELL PEPPER
- PARSNIP
- PARSLEY

### BASE PRODUCTS

<table>
<thead>
<tr>
<th>CHICKPEA FLOUR</th>
<th>LENTIL FLOUR</th>
<th>RICE FLOUR</th>
<th>YELLOW PEA FLOUR</th>
</tr>
</thead>
<tbody>
<tr>
<td>GREEN PEA FLOUR</td>
<td>RED BEAN FLOUR</td>
<td>WHITE BEAN FLOUR</td>
<td></td>
</tr>
</tbody>
</table>
Anna Zamojska  
Export Manager  
Anna.Zamojska@PAULAingredients.com  
+48 600 318 365  

PAULA Ingredients  
Sp. z o. o. Sp. k.  
ul. Łódzka 145a  
62-800 Kalisz,  
POLAND  

PAULAingredients.com  
Inspirations from the good side!