HOW TO OBTAIN A NUTRITIONAL ANALYSIS OF YOUR FOOD PRODUCT

AN EBOOK FROM ESHA RESEARCH
Obtaining an accurate nutritional analysis of your food product is an important step in getting your product to the marketplace. Not only is it mandatory for regulatory compliance, but it’s also crucial for building consumer trust and ensuring truth in advertising.

**REGULATORY COMPLIANCE**

Many countries require the display of nutrient content on packaged foods. For example, in the U.S., the Food and Drug Administration (FDA) says “all products intended for human consumption and offered for sale” must display a Nutrition Facts label listing: Calories, Total Fat, Saturated Fat, Trans Fat, Cholesterol, Sodium, Total Carbohydrate, Dietary Fiber, Total Sugars, Added Sugars, Protein, Vitamin D, Calcium, Iron, and Potassium.

The FDA has not mandated how a company should determine the nutrient content of its products for labeling purposes, but it does expect you to perform due diligence and report information as accurately as possible, whether you use a lab or database software.

The regulations provide acceptable tolerance levels and allow for variations in reported nutrient content. Even so, you will want to carefully document your processes and what sources you used to arrive at your values.

**CONSUMER TRUST AND TRUTH IN ADVERTISING**

Accurate product labels are necessary for building consumer trust and complying with truth-in-advertising laws.

Both your audience and the FDA want the product to deliver what it promises. Your audience, the consumers, want to know that the nutrition content meets their needs; the FDA requires accuracy.

This eBook will discuss the pros and cons of the primary methods for obtaining the necessary nutrition breakdown of your food product:

1. **LABORATORY ANALYSIS**
2. **NUTRITION ANALYSIS SOFTWARE**
3. **CONSULTANTS**
LABORATORY ANALYSIS

Pros

This is a specific, comprehensive, and exact method. With lab analysis, you can get a detailed breakdown of the nutritional makeup of your food in its current state, per the sample you provide, for as many nutrients as you request. In addition, food testing laboratories can also test for allergens, microbiological contaminants, and more.

Often, labs will offer complementary services with analysis. Services will differ from one lab to another and may include the generation of Nutrition Facts labels, ingredient statements, allergen declarations, shelf life and overage calculations, and other data points.

Lab analysis is ideal for products that are heavily processed. Take, for example, a fried product. Without lab analysis, it is difficult to determine how the ingredients — and thus, their nutrients — were altered, and how much oil remains in the product after frying.
Cons

Lab analysis can take time. In order to get an accurate lab analysis, you have to manufacture a physical sample of your product and send it to the lab. The lab, then, has to process the sample for analysis. This can take up to 30 days or more.

There are exceptions, of course. Some labs do offer one-day turnaround. If your lab does this, make sure you ask them how. Hint: it’s likely that they will be using a nutrition analysis software to accomplish this.

The costs can quickly add up. A lab analysis for Nutrition Facts nutrients and proximates averages about $800-1,000 per sample, and analysis for any extra nutrients could run up to $100 each. Every time you modify an ingredient or recipe, you have to pay for a new analysis.

Pros

Using nutrition analysis software is fast and convenient. You create a recipe by entering ingredient amounts, and the software returns the nutrient profile. This analysis can be viewed in a variety of reports and easily shared with other stakeholders.
If you don’t like what you see after the analysis (too many carbs?), you can easily experiment with ingredient amounts. Modify ingredients in your recipe and the software recalculates the analysis for you. You can reformulate your recipe again and again, without incurring new costs for each analysis.

In addition, you can add an unlimited number of ingredients from supplier data sheets, lab analysis results, and other sources.

Most nutrition analysis programs on the market offer Nutrition Facts label templates, ingredient statement generation, allergen tracking, nutrient content claim calculators, and other regulatory compliance features.

**Cons**

The cost-effectiveness of database analysis software depends on your operation. A software subscription is ideal for large companies that produce a high volume of products over a long period of time. But it’s less cost-effective if you have one or two products and a static product line.

While most recipe analysis programs come with an extensive database of ingredients and include flavors, colors, and other processing items, (as well as the ability to add your own ingredients), database analysis may not account for recipes or ingredients that undergo heavy processing. In such cases, lab analysis will be required.

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**Nutrition Facts**

4 servings per container
Serving size 1 cup (140g)

<table>
<thead>
<tr>
<th>Amount per serving</th>
<th>Calories 160</th>
</tr>
</thead>
<tbody>
<tr>
<td>% Daily Value*</td>
<td></td>
</tr>
<tr>
<td>Total Fat 8g</td>
<td>10%</td>
</tr>
<tr>
<td>Saturated Fat 3g</td>
<td>15%</td>
</tr>
<tr>
<td>Trans Fat 0g</td>
<td></td>
</tr>
<tr>
<td>Cholesterol 0mg</td>
<td>0%</td>
</tr>
<tr>
<td>Sodium 60mg</td>
<td>3%</td>
</tr>
<tr>
<td>Total Carbohydrate 21g</td>
<td>8%</td>
</tr>
<tr>
<td>Dietary Fiber 3g</td>
<td>11%</td>
</tr>
<tr>
<td>Total Sugars 15g</td>
<td></td>
</tr>
<tr>
<td>Includes 5g Added Sugars</td>
<td>10%</td>
</tr>
<tr>
<td>Protein 3g</td>
<td></td>
</tr>
</tbody>
</table>

*The % Daily Value tells you how much a nutrient in a serving of food contributes to a daily diet. 2000 calories a day is used for general nutrition advice.*
CONSULTANTS

Pros

Consultants are generally well-versed in recipe formulation and labeling regulations, and can provide nutritional analysis for your food product, create Nutrition Facts panels, ingredient lists, allergen statements, and review your products for eligible marketing claims.

Consultants can also offer a variety of other services, such as regulatory guidance, product formulation, label review, and more.

Like laboratories, Consultants often use a nutrition analysis software unless laboratory analysis is required.

Cons

Consultant services and pricing vary widely, again, depending on what you need. The cost for a simple recipe analysis and Nutrition Facts label for a single product can range from $300 to $750. For a full recipe analysis, Nutrition Facts label, allergen declaration, ingredient statement, and allowable content claims, you could be spending more than $1,000.
Conclusion

While obtaining a nutrition analysis for your food product can seem daunting at first, you now have more knowledge and can approach this step with added confidence. Remember, when comparing lab analysis, software, and consultants, it comes down to your needs and budget.

ESHA Research has been the leading provider of nutrition databases, food and supplement labeling, and nutrition analysis software solutions for more than 35 years. Our team of consultants is knowledgeable in nutrition, labeling and regulatory compliance, which allows us to meet your unique needs, whatever they are.

If we can be of assistance, please do not hesitate to contact us:

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