Keto Certified Standards

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**KETO CERTIFIED STANDARDS 2021**

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When The Ketogenic Diet was finally standardized in 1925 by Dr. Peterman [1], it was strict in its requirements; 1g of protein per kilogram of bodyweight, 10-15 grams of carbs per day, fill the rest of the remaining calories with fat. Unfortunately, Dr. Peterman didn’t make any specific requirements about where the carbohydrates could come from, or what foods should have been allowed or restricted in the ketogenic diet, leaving much open for speculation.

While public acclaim and medical advocacy for the ketogenic diet is growing, it did not initially become the primary therapeutic option even though it largely eliminated the need for drugs and potential side effects. While there are many explanations for why this occurred, one point seems clear: the ketogenic diet can be extremely difficult for patients to adhere to, and it can cause serious adverse effects [2].

In the development of Keto Certified Standards, The Paleo Foundation included ingredients and foods that serve the purpose of mitigating the most well-known adverse effects of the Ketogenic Diet, as well as increasing its tolerability. Individual tolerability of the ketogenic diet is the most important factor for diet acceptance and adherence. Therefore, improving palatability, availability, affordability, and convenience of compliant foods is crucial to preventing diet discontinuation.

Keto Certified products are in a unique position to improve tolerability of the ketogenic diet through improving palatability, convenience, and availability factors. The Keto Certified Standards and Keto Certified program are aligned with The Paleo Foundation’s mission to help improve the tolerability of the ketogenic diet.

Karen Pendergrass
Paleo Foundation
Standards Team | CEO
The 4 Major Factors That Influence Diet Tolerability

**Availability**: Product Offerings, Location and Limitation of Products

**Affordability**: Socio-Economic Limitations, Distribution Limitations

**Palatability**: Product Variations, Ideological Acceptance

**Convenience**: Cultural Acceptance, Ease of Identification
Standards & Research

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1. Keto Certified Label

The Keto Certified™ requirements are outlined herein. These standards apply to all products certified by The Paleo Foundation for the Keto Certified program. Only certified products following these standards are explicitly given the rights to use Keto Certified logos, trademarks, certification marks, or other design marks hereinafter referred to as “Keto Certified label”.

1.1 Applicability

The Keto Certified label was developed and trademarked by The Paleo Foundation to identify food products that meet the standards of the ketogenic diet. The Keto Certified label is a certification mark with use permitted only to those who have entered into a contractual agreement with the Paleo Foundation. The Keto Certified label was designed to establish an easily identifiable mark indicating that a product has met the strictures of the ketogenic diet and merit use of the Keto Certified label.
1.2 Guidelines

1.2.1 The Keto Certified label is allowed to be used on any company advertising materials, including packaging, promotional materials, point-of-purchase materials, websites, sales literature, banners, and company stationery, provided that the use of the Keto Certified label complies with the guidelines outlined in this document. If a company wishes to present the logos in a manner other than as described as outlined in section 1.3, The Paleo Foundation must approve the request and give written permission to the producer.

1.2.2 Producers may display the Keto Certified™ label only on products that have been certified by The Paleo Foundation.

1.2.3 Producers must have a contractual agreement with The Paleo Foundation to use the Keto Certified label.

1.2.4 Producers may only use the trademark on company stationery if the entire product line has been audited and Keto Certified.

1.2.5 If the entire product line has been audited and Keto Certified, producers may display the Keto Certified label on their entire website.

1.2.6 If the entire product line was not certified, the Keto Certified label may appear on a page containing the audited and certified Keto Certified products only.

1.2.7 Products that have not been audited and Keto Certified are not permitted to appear on the same page as the Keto Certified label, as this could mislead consumers.
1.3 Use of the Keto Certified™ Label

1.3.1 To complete the application process, the applicant must sign an affidavit stating that all answers and statements provided in their application were true to the best of their knowledge.

1.3.2 Use of the Keto Certified™ label is only permitted after audit and certification of the applicant’s products by The Paleo Foundation.

1.3.3 The Paleo Foundation retains the right to inspect the producer’s products to verify that all requirements are met.

1.3.4 Use of the Keto Certified label for any product that does not meet each of the Keto Certified requirements, that has not been audited, or that has not been given explicit permission, is strictly prohibited.

1.3.5 Misuse of the Keto Certified™ Label will result in immediate suspension of the agreement and/or prosecution.

1.3.7 The Keto Certified label must be:

1. Upright
2. Complete
3. Clearly Visible
2. Carbohydrate Content

The allowed carbohydrate content for the Keto Certified program is based on the USDA standard serving size of a food product.

2.0.1
Meal and Meal Replacement products must not contain more than 10g net/effective carbohydrates per serving. For products which contain minimally processed, whole-food ingredients or ingredients with reduced digestibility, 12g net carbohydrate per serving is permissible.

2.0.2
Snack products must not contain more than 6g net/effective carbohydrates per serving. For products which contain minimally processed, whole-food ingredients or ingredients with reduced digestibility, 8g net carbohydrate per serving is permissible.

2.0.3
Condiments must not contain more than 2g net/effective carbohydrates per serving. For products which contain minimally processed, whole-food ingredients or ingredients with reduced digestibility, 3g net carbohydrate per serving is permissible.

2.0.4
Auxiliary Category products are those which do not fit the “normal use” criteria of meals, meal replacements, snack products, or condiments. Auxiliary Category products will be judged on an individual, per-product basis for their eligibility of the Keto Certified label.
2.1 Allowed Carbohydrate Content

<table>
<thead>
<tr>
<th>Product Type</th>
<th>Net Carbohydrate Allowance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Meals and Meal Replacements</td>
<td>10g per serving</td>
</tr>
<tr>
<td>Snacks</td>
<td>6g per serving</td>
</tr>
<tr>
<td>Condiments</td>
<td>2g per .5 oz</td>
</tr>
</tbody>
</table>

Meals, Meal Replacements, and Snacks which contain minimally processed, whole-food ingredients, or a high concentration of ingredients with reduced digestibility are allowed an additional 2g to be permissible for the Keto Certified program. Condiments are allowed an additional 1g per 0.5oz for reduced digestibility, or low-usage threshold for the product (such as hot sauce).

Quantification of Net Carbohydrates for Keto Certified eligibility may also be determined using a high-performance anion exchange chromatography assay.
2.2 Prebiotic Fiber

2.2.1. **Prebiotic fiber** is adjusted for when net carbohydrate is calculated for Keto Certification eligibility. Product formulations and may be required for accurate dietary fiber calculations. Prebiotic fibers are fermentable fibers that selectively contribute to the growth and maintenance of commensal bacterial species such as Bifidobacteria and Lactobacilli.

In the simplest terms, a prebiotic is a selectively fermented ingredient that allows specific changes, both in the composition and/or activity in the gastrointestinal microflora that confers benefits upon host well-being and health.

The three criteria of prebiotics are that they must be: (a) Resistant to gastric acids, hydrolysis by mammalian enzymes, and gastrointestinal absorption; (b) Fermented by large intestinal microflora; and (c) selectively stimulate the growth and/or activity of intestinal bacteria associated with health and well-being.

The non-digestible carbohydrates can be broken down into groups, and include:

- **Resistant starches** (types I, II, III, IV, V)
- **Non-digestible oligosaccharides** (fructooligosaccharides, galactooligosaccharides, xylooligosaccharides, isomaltooligosaccharides, and lactulose).
- **Non-digestible polysaccharides** (cellulose, hemicellulose, polydextrose, beta-glucans, pectins, mucilages, galactomannans, glucomannans, chitin, and chitosan).
3. Allowed Ingredients List

3.1
The following ingredients are eligible for use of the Keto Certified label, provided that they do not exceed total carbohydrate criteria. Allowed ingredients will be amended from time to time as necessary. These ingredients include, but are not limited to:

<table>
<thead>
<tr>
<th>Meats and Seafood</th>
<th>Fruits and Vegetables</th>
<th>Nuts and Seeds</th>
<th>Dairy</th>
</tr>
</thead>
<tbody>
<tr>
<td>All meats and seafood are allowed in the Keto Certified program.</td>
<td>All vegetables and fruits including berries are allowed provided that they meet the carbohydrate requirements of the Keto Certified Program.</td>
<td>All nuts and seeds are allowed.</td>
<td>All dairy is allowed. Full fat dairy is ideal.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Protein</th>
<th>Milks</th>
<th>Oils and Fats</th>
<th>Flavors and Coloring</th>
</tr>
</thead>
<tbody>
<tr>
<td>Gelatin, collagen, bone broths, protein concentrates, isolates, and hydrolysates including whey, casein, egg white, pea, chickpea, soy, peanut, and hemp proteins.</td>
<td>All nut milks are allowed. Other allowed milks include, but are not limited to: hemp milk, almond milk, coconut milk, cashew milk, rice milk, soy milk, and tiger nut Milk.</td>
<td>All animal fats and nut oils are allowed. Other allowed oils include red palm oil*, avocado oil, olive oil, coconut oil, high-oleic sunflower oil, cocoa butter, and peanut butter.</td>
<td>Allowed flavors include essential oils, oleoresins, extracts*, distillates*, and ingredients that contain flavoring derived from spices, fruits, vegetables and other plant material, meat or insect derivatives, insect oils, and stearic acid*.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Sweeteners</th>
<th>Coffee and Teas</th>
<th>Stabilizers and Emulsifiers</th>
<th>Spices</th>
</tr>
</thead>
<tbody>
<tr>
<td>Honey, stevia (Reb A), coconut sugar, date sugar, fruit juice, monk fruit (lo han guo), inulin, cane sugar, allulose, and sugar alcohols are allowed.</td>
<td>All coffees and teas are allowed in the Keto Certified Program.</td>
<td>All food-grade hydrocolloids, anti-caking agents, stabilizers, and emulsifiers are permissible.</td>
<td>All spices are allowed.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Supplements</th>
<th>Chocolate</th>
<th>Grains</th>
<th>Legumes</th>
</tr>
</thead>
<tbody>
<tr>
<td>Allowed supplements include but are not limited to vitamin and mineral supplements, MCT oil, omega 3s, vitamin D, digestive enzymes, exogenous ketones, electrolytes, creatine, caffeine, HMB, BCAAs.</td>
<td>Chocolate and cocoa powder are allowed in Keto Certified Products provided that the end-product meets the carbohydrate requirements of the Keto Certified program.</td>
<td>All grains are allowed in the Keto Certified program provided that the end-product meets the carbohydrate requirements of the Keto Certified program.</td>
<td>All legumes are allowed in the Keto Certified program provided that the end-product meets the carbohydrate requirements of the Keto Certified program.</td>
</tr>
</tbody>
</table>
4. Applicability of Exogenous Ketones

4.1 Exogenous ketone supplementation is allowed in the Keto Certified program. These include naturally-derived beta-hydroxybutyrate compounds such as beta-hydroxybutyrate mineral salts, medium-chain triglycerides, and ketone esters.

5. Disallowed Ingredients List

5.1 The following are completely disallowed ingredients in the Keto Certified Program. Additional ingredients may be added or removed from this list based on new information or research.

<table>
<thead>
<tr>
<th>Partially-Hydrogenated Oils</th>
<th>Sweeteners</th>
<th>Artificial Flavors</th>
</tr>
</thead>
<tbody>
<tr>
<td>Partially-hydrogenated, trans fats such as soybean, margarine, and vegetable oils.</td>
<td>Artificial sweeteners such as saccharin, cyclamate, acesulfame, aspartame, and sucralose.</td>
<td>Artificial flavors are not allowed in the Keto Certified program.</td>
</tr>
</tbody>
</table>

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