PRODUCT SPECIFICATION OF THE PROTECTED GEOGRAPHICAL INDICATION 'УВС ЧАЦАРГАНА' (Uvs chatsargana)

<u>SCOPE</u>

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0. Background

The main objective of this document is to state the product specification of the Protected Geographical Indication 'YBC 'ALLAPFAHA' (Uvs chatsargana). It has been drafted in accordance with:

- The art. 7 of the regulation (EU) No 1151/2012 of the European Parliament and of the Council dated November 21st of 2012, about quality schemes for agricultural products and foodstuff's (hereafter referred as Regulation EU 1151/2012)
- and the provisions contained in Commission Implementing Regulation (EU) No 668/2014, dated June 13th of 2014, laying down rules for the application of Regulation (EU) 1151/2012 (hereafter, Implementing Regulation EU 668/2014).

As it will be shown further on 'VBC 'AALAPFAHA' (Uvs chatsargana) is a geographical indication that identifies a specific product from one province in the northwest of Mongolia. The qualities and reputation of the product are due to its geographical origin. The name, therefore, should be registered as a Protected Geographical Indication in the European Union.

As required by art. 8(1) in line with Regulation EU 1151/2012, 'VBC ΨΑЩΑΡΓΑΗΑ' (Uvs chatsargana) is protected as a Geographical Indication in the country of origin, Mongolia. In this regard, a copy of the registration certificate issued by the Intellectual Property Office of Mongolia (IPOM), along with its translation into English, is enclosed as Annex 1. The protection in the country of origin was granted on the 3rd April 2007.

It is worth mentioning that a sui generis system on Geographical Indication has been modified in the country of origin in 2009.

I. Identification of the applicant group

Name: Seabuckthorn Producers Association of Uvs Province Address: Uvs Foods JSC bldg., 5th team, Ulaangom sum, Uvs Province, Mongolia Telephone: (+976)99452949; (+976)75558686 E-mail: <u>info@uvsfoods.mn</u>; <u>marketing@uvsfoods.mn</u>

Uvs province's seabuckthorn is planted by individuals, companies and processing factories that enrolled this association.

II. Name of the protected geographical indication

'УВС ЧАЦАРГАНА' (Uvs chatsargana)

In its original script, in Mongolian language, the name of the Protected Geographical Indication is:

'УВС ЧАЦАРГАНА'

Its transcription in Latin characters, as required by art. I (I) of Implementing Regulation EU 668/2014, is the following: 'Uvs chatsargana' (translated as 'seabuckthorn of Uvs').

Examples of the effective use of the name in businesses are provided in the Annex 2. Examples of the historical use of the name in trade and in common language are provided below in Section VII – Link with the territory.

III. Description of the product

'YBC ЧАЦАРГАНА' (Uvs chatsargana), the Seabuckthorn from Uvs, refers to berries of which the Latin name is *Hippophae rhamnoides*. It is a cultivated species of a flowering plant in the family Elaeagnaceae.

'YBC ЧАЦАРГАНА' (Uvs chatsargana) can take different colours generally yellow or orange but can also sometimes reddish, cream of maroon.

It it is characterized by its smell and size and has an elliptical or bulb shape. The elliptical berries have a length of 11 to 13 mm and a width of 8 to 10 mm. The round ones (bulbs) have a diameter of 6 to 9 mm. According to their form they weigh between 0.3 and 0.8 g (50-96 g/100 fruits).

The fruit pulp is juicy, not acidic; it has also an aromatic smell and a sour taste.

The seed is of white, brown, black, or shiny brown colour with a length of 4-7 mm, and width of 2-3 mm and the weight is around 13 gr for 1000 seeds.

Moreover, depending on the harvest time, either in autumn or in winter, the berry will either be juicy, and therefore dedicated to juice processing, or it will be full of fat and thus processed into oil, respectively. The physical and organoleptic characteristics of the product are shown below (Table 1).

Types	Taste	Smell	Weight (g)
Elliptical	Sweet	Sour	0.6-0.8
yellow	and sour		
Elliptical	Oily	Flavorous	0.6-0.8
orange			
Bulb	Sweet	Sour	0.3-0.4
yellow			
Bulb	Sour oily	Sour	0.3-0.4
orange			

Table 1. The physical and organoleptic characteristics:

Uvs Seabuckthorn brings together fruity, acidulous, and subtly sweet flavour pairings. 'УВС ЧАЦАРГАНА' (Uvs chatsargana) is particularly rich and has a higher content of fat produced from all its parts (seed, lash and shell), carotene, vitamin B1 and vitamin C as shown in the table below.

Table 2. Nutritional components of berry pulp (fresh weight):

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No.	Nutritional components	Scale	Minimum amount of Uvs

			Seabuckthorn
1	Fat	%	2.50
2	Protein	%	1.4
3	Vitamin C	mg/kg	128
4	Vitamin B1	mg/kg	0.84
5	Carbohydrate	%	8.9
6	Acidic	%	0.75
7	Moisture	%	78.13
8	Carotene	mg/100gr	2.32

IV. Geographical area

4.1 Administrative delimitation



Figure 1. Map of Mongolia. Uvs region is marked in red.

From the administrative point of view, the geographical area for the production of 'YBC 'YALAPTAHA' (Uvs chatsargana) consists of 10 administrative divisions (soums) of Uvs Province located in north-western Mongolia. These are the soums of Davst, Sagil, Turgen, Ulaangom, Tarialan, Naranbulag, Malchin, Zuungovi, Khyargas and Tes. They are located in the surroundings with a distance of approximately 50 km of the Uvs Lake basin. The territory is marked in the map below (Figure 2).



Figure 2. the geographical area of the production of 'VBC ЧАЦАРГАНА' (Uvs chatsargana)

V. Proof of the origin of the product

To ensure that the final product originates from the defined geographical area and complies with all the requirements of the Specifications, both an internal and an external control are conducted. The internal control, in order to verify the compliance of all the operators with the specifications, is implemented by the "Seabuckthorn producers' association of Uvs province" itself.

The external control is implemented by the Food and Agro-alimentary department of the General Inspection Agency of Mongolia.

The checks and controls conducted are the following:

5.1 Registration and accreditation of producers and operators

The operators (cultivators, producers, processors and packagers) shall register at the Sea Buckthorn Producers' Association of Uvs Province and will be accredited according to the Specifications. Each producer has to declare the land plot on which he wishes to produce 'VBC 'ALLAPTAHA' (Uvs chatsargana). The Association will check the compliance of the parcel with the requirements of the Geographical Indications, i.e.:

- The location of the parcel is inside the delimited area,
- The land plot complies with the criteria defined in Section 4.2

• The land plot strictly complies with Mongolian Standard "Guidelines on Good agricultural practices MNS 6737:2018" approved by Mongolian Agency for Standardization and Metrology

Each operator must sign a letter of commitment to follow the Book of Specification and be inspected at least once a year. Each operator must have statutes of the association, contract (letter of commitment,) the Book of Accounting and the Book of Specification.

Quinquennial inspection must be carried on environmental conditions of each cultivators' land plot by an ISO/IEC17025 accredited laboratory. Detailed assessments are performed on the soil, chemical, physical, and microbiological parameters of the water. Water must be assessed yearly before cultivation by an ISO/IEC17025 accredited laboratory.

5.2 Control of compliance with the Book of Specification

Two types of control are performed: internal control (by the association) and external control (by the Inspection agency). A producer or operator cannot refuse the access of internal or external inspectors to the plots or to its facilities. He cannot refuse more than once an inspection schedule.

5.3 "Accounting matters" and traceability

Each operator in the commodity chain has to keep records of all the transactions he operates on 'YBC 'AALAPFAHA' (Uvs chatsargana) (volume produced and sold, purchases and sales for traders, etc.), in order to make these documents available for control purposes, and to declare stocks once a year. In addition, a traceability mechanism is stepped up in order to be able to track each batch and to identify the parcels where it was produced.

5.4 Actions undertaken in the event of non-compliance with the Specifications

Producers that do not comply with the Specifications shall be withdrawn from the market. Corrective measures and/or sanctions shall be applied against operators that do not comply with the Specifications. In this regard, a Sanction Catalogue, with three levels (i. remark, ii. warning and iii. rejection of a batch of product), exists and is enforced by both Inspection agency and the association.

VI. Method to obtain the product

The method to obtain the product is based on an artisanal and traditional know-how in this province which built up over generations.

6.1 Crop management

The two first years, the plant is not productive yet. In order to care for the young plant, some of the branches are cut (one out two) when it reaches 20 cm. Generally, the cut takes place during springtime. In summer, the young plants are slowly irrigated. Concerning the fertilizing part, non-chemical organic fertilizers are provided only.

The third year is the first year of production that means there is not anymore the springtime cut of the branches but natural cut for the design which respects the shape of the trees. The plants are

still irrigated in summertime and the fertilizer part is still limited. One of main problem is the seabuckthorn fruit fly, so the producers need to install paper to stick them otherwise they eat the trees.

Fertilizers, pesticides and disinfection substances strictly confine with the Resolution No. A/125, A-69, A/143 approved the Ministers of the Ministry of Food, Agriculture and Light Industry, Ministry of Nature, Environment and Tourism, Ministry of Health of Mongolia.

6.2 Harvest

Maturity of seabuckthorn directly influenced by the weather and soil, so it may vary each year. Thus, depending on the maturity of the fruits, cultivators harvest seabuckthorn berries twice in a year, autumn and winter.

- 1. Mostly in autumn berries are fully matured and it is suitable to harvest with hands. It has to be harvested very gently, because the berries may be crushed. Harvest time continues from the late 20s of August until the October. Overripe berries are very soft, and they cannot be harvest by hand. Thus, the harvest of these berries will be delayed until They are frozen.
- 2. In winter, cultivators harvest the rest and left seabuckthorn berries. They put mats under the trees and shake until the berries fall.

6.3 Transformation Process

The transformation process of 'YBC ЧАЦАРГАНА' (Uvs chatsargana) consists of four phases described below:

- 1) Gathering. Seabuckthorn berries are gathered by hand manually in order to prevent the fruits from being smashed and seabuckthorn trees damaged.
- 2) Cleaning. Gathered berries are separated from leaves, branches and deteriorated berries.
- 3) Washing. Cleaned berries are washed by automatic sprays with water.
- 4) Freezing. Washed berries are frozen in -20° C in aluminium aseptic bags.

VII. Link with the geographical area

A strong causal link exists between the quality of VBC ЧАЦАРГАНА' (Uvs chatsargana) and its geographical origin.

The cultivation area is characterized by a set of various geographical peculiarities. The southern and western part of this territory is delineated by a mountain range of high altitude, which are part of the Altai Mountains. Their altitude goes up to 4,000 metres above sea level. The centre of this territory is a wide plain where seabuckthorn is cultivated in altitudes between 750 up to 1,100 metres above sea level. The wide plain used to be a salty inland sea approximately a million years ago. The sea vanished and a salty lake remained. The Uvs Lake, like the Dead Sea, is empty of fishes or of any kind of life forms but presents big concretions of salt apparent on its shores.

In the geographical area the soil appears to be very peculiar and unique and impacts the different cultures such as seabuckthorn. Indeed, according to the soil analysis in the study made by Mr Alain Hoguet¹, we can notice that the rates of exchangeable CaO, of MgO and K2O are exceptionally high in the zone of cultivation and even more in the zone of irrigated cultivation (2.819 mg/kg). The pH of the soil is also outstanding since it is around 8.4. This exceptional wealth of the water and the soil in calcium is due to the former salty sea.

The high concentration of calcium is also accentuated by the very low precipitation in the province, which reached an average of 161.5 mm by year over a period of 8 years from 2006 to 2013. For seven months there is no rain at all. Consequently, the CaO remains in the soil and is not washed away by the rain.

In contrast to the low precipitation, the number of sunshine hours is very high². This leads Uvs seabuckthorn to develop a rich and sweet aroma of a berry otherwise known for its more acidic flavour.

In wintertime, the mountain range in the south and west inhibits cold air streams from the north to proceed further. The cold air remains in the Uvs Basin and leads to extremely low temperatures. The coldest month is January with an average temperature of -32.9° C, with minimum temperatures reaching up to -49.6° C.

In contrast, the summer is hot with an average temperature in June of 19.2° C and a maximum of 36.6° C. As a result of this, the seabuckthorn traditionally grown in Uvs province, belonging to the "yashilduu" seabuckthorn group of varieties³, is highly resistant to harsh climatic conditions. This also leads to the plasma of seabuckthorn germ buds growing in this region being less exposed to common seabuckthorn drying diseases⁴.

In winter, snow is covering the southern and western mountains and due to the high altitudes is melting only gradually in spring and summer. As a result, myriads of streams and rivers are carrying melt water to the cultivation areas and fill underground water basins. As the melting proceeds gradually the cultivation areas enjoy a relatively even inflow of water which benefits productivity of seabuckthorn growing and the quality of the berries.

The geographical area where 'YBC 4ALAPFAHA' (Uvs chatsargana) is grown, is well-known for its seabuckthorn among Mongolians. Just as a tourist buys a souvenir that reflects the specifics of his/her destination, it is no coincidence that everyone who visits Uvs buys a package

¹ RAPPORT DE MISSION (Extraits) "PROJET DE PRODUCTION DE FOIN DE LUZERNE", *Dans l'Aimag UVS; sur une superficie de 2.000 ha irrigues* by Alain Hoguet, 2014

² National Agency Meteorology and the Environmental Monitoring, retrieved from http://tsag-agaar.gov.mn/

³ Avdai, Ch. (2018). Чацаргана тариалах, боловсруулж ашиглах [Sea bukhtorn planting and usages]. Ulaanbaatar: Mongolian National University of Science and Technology

⁴ Ruan, Ch, Qin, P., Zheng, J., & He, Zh., 2004, Genetic relationships among some cultivars of sea buckthorns from China, Russia and Mongolia based on RAPD analysis, Scientia Horticulturae, 101, pp 417-426

of seabuckthorn products as a souvenir of the area. Reversely, it has become a tradition for Uvs residents to present this package as a gift to people from other provinces and cities.

The elements of the soil of the Uvs basin namely its content in Calcium and other subtances and the particular harsh climate conditions influence the local cultivations around the uvs lake and they also have an impact on the qualities of 'VBC 4ALAPFAHA' (Uvs chatsargana). Indeed the berries have a higher yield than in other Mongolian provinces (namely Tuv and Selenge provinces). The berries which produce oil from all its parts (seed, lash and shell) have also a particularly high content of oil, high rates of vitamins such as vitamins C, B1 and B6 and carotene. Thanks to the high number of sunshine hours, the berries also develop a rich aroma.

'YBC Ψ ALLAP Γ AHA' (Uvs chatsargana) is well-respected by its rich nutrients. The fat of YBC Ψ ALLAP Γ AHA' (Uvs chatsargana) contains 2.5 times more palmitic acid compared to seabuckthorns in other regions in Mongolia⁵.

'VBC ΨΑЩΑΡΓΑΗΑ' (Uvs chatsargana) production has been contributing to mitigate climate change effects in Mongolia. Seabuckthorn belonging to the "yashilduu" variety has a high level of resistance to harsh climate conditions, so that in recent years the seabuckthorn from the region has been transplanted in many other administrative sub-divisions at different regions of Mongolia to prevent soil erosion and desertification.

The region of Uvs is recognized not only in Mongolia, but also worldwide for its seabuckthorn which has unique characteristics and rich nutrients. Thus, we claim for the geographical indication for seabuckthorn from Uvs region. We have included some evidence of the reputation of the product in annex 2 for further information.

VIII. Control body

<u>Internal control :</u> A seven-member team selected from the Sea Buckthorn Producers' Association of Uvs Province will inspect farm plots once a year. They will maintain field history books, registration documents and research results. Also, they will ensure that the production process fits Mongolian standards and present the controlled results to the representative's meeting of the Association.

<u>External control</u>: The state inspector of the inspection agency will conduct visit fields to control planting practices. Also, she/he will maintain documents such as field history book, registration documents and research results and can take samples from fruits and other products in order to analyze them in duly accredited laboratories.

The control body i.e. the general authority of the specialized inspection is responsible for the full verification of compliance with the specifications before placing the product on the market.

The contact details of the control authority are the following: Plant quarantine inspector Government Regulatory Agency

⁵ ibid

Inspection Office of Uvs province Ulaangom sum, Uvs province, Mongolia

Tel: 976-70452524 Web: uvs.inspection.gov.mn

IX. Labelling

Packaged products must contain⁶ the following information: raw materials of product, product name, manufacturer's name and address, product's serial number, volume and parcel, production date, storage period and the end of period, storage condition, nutrition fact, side effect.

The packets and containers of the product shall bear the name 'YBC 'AALAPFAHA' (Uvs chatsargana) and the following logo (herewith included both logos in English and Mongolian):



⁶ Mongolian Law on Food Safety



ANNEX 1: Geographical indications certificates of 'YBC 4ALAPFAHA' (Uvs chatsargana)

1. Geographical indication: 'VBC ЧАЦАРГАНА' registration No. 6638



2. Geographical Indication: 'УВС ЧАЦАРГАНА' UVS CHATSARGANA registration No. 40-0015315

ANNEX 2: LISTS OF REFERENCES

List of references regarding 'YBC 4AUAPFAHA' (Uvs chatsargana).

I. BOOKS

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II. NEWSPAPER

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