

Statement of case for 'Jhabua Kadaknath Black Chicken Meat'

(A) Name of the Applicant:

Gramin Vikas Trust

(Established & Supported by KRIBHCO-Govt, of India)

(B) Address:

Shiv Villa, Ramkrishna Nagar, Jhabua-457661 Madhya Pradesh

(C) Name of the Geographical Indication: (Herein, type the GI

and paste the logo, if any) : - '**Jhabua Kadaknath Black Chicken Meat**'



(D) Type of Goods :- (Natural / agricultural /
Select appropriate) manufactured / industrial /
textile / food stuff / wines / spirits)

: - **Meat & Meat Product,** ~~handicraft~~
Poultry Meat

(E) Class/ Classes: **Class 29**

(E) SPECIFICATION:-

The **Kadaknath** is an Indian breed of chicken (It is also spelt as 'Karaknath'). It is also locally known as **Kali masi** in local language meaning black meat because the bird is black inside and out side skin, feathers, legs, meat, blood, etc. Most of the internal organs of these birds exhibit intense black colouration which is due to the deposition of melanin pigment in the connective tissue of organs and in the dermis. The black flesh of Kadaknath is felt very delicious and very popular among the native tribal people. The native poultry breed of Madhya Pradesh, Kadaknath is well suited to extreme climatic conditions. It tolerates extreme heat and cold climatic conditions and requires minimal costs for maintenance. The meat is considered a delicacy and the birds have good demand in the market. Though comparatively expensive the meat and eggs are rich source of protein. The commonly available varieties of Kadaknath are **jet-black pencilled** and **Golden**, which are found in Jhabua. The bird is very popular among the Adiwasis (tribals) mainly due to its special capabilities such as adaptability to local environmental conditions, disease resistance, meat quality, texture and flavour.

(F) NAME OF GEOGRAPHICAL INDICATION:

'Jhabua Kadaknath Black Chicken Meat'

(G) DESCRIPTION OF GOODS: -

The eggs of the 'Kadakhnath' breed are light brown. The day-old chicks are bluish to black with irregular dark stripes over the back. The adult plumage varies from silver and gold spangled to bluish-black without any spangling. The skin, beak, shanks, toes and soles of feet are slate like in colour. The comb, wattles and tongue are purple. Most of the internal organs show intense black colouration is also seen in the skeletal muscles, tendons, nerves, meanings, brain etc. The blood is darker than normal blood. The black pigment has been due to deposition of melanin, a genetic condition called "Fibromelanosis". The flesh, although repulsive to look at, is delicious. A medium layer lays about 80 eggs per year. The bird is resistant to disease in its natural habitat in free range but the 'Kadakhnath' breed is more susceptible to Mareks's disease under intensive rearing conditions. Standard weight (kg): Cock 1.5; hen 1.0.

The Kadakhnath is popular mainly for its adaptability, and the well-tasting black meat, which is believed to infuse vigor. The tribals value the breed for its cultural as well as its health values and also consider it sacred.

The bird is high in iron and amino acids and low in fat & cholesterol. The breed is disease resistant and is valued for the quality and flavour of its black meat. Kadakhnath chicken contains many kinds of amino acids (18 kinds of amino acids including the 8 essential amino acids for human body), Vitamins B1, B2, B6, B12, C and E, niacin, protein, fat, calcium, phosphorus, iron, nicotinic acid, etc.

Characteristics of *Kadakhnath* Poultry Breed:

- Black colour meat
- Blue-black plumage
- Black-hued internal organs
- Body weight at 20 weeks: 920 gm
- Body weight of adult cockerel: 1.5–2 kg
- Body weight of adult hen: 1–1.5 kg
- Sexual maturity at: 180 days
- Average annual egg production: 105
- Egg weight at 40 weeks: 49 gm
- Annual egg production (number) 105
- Fertility (%) 55
- Hatchability FES (%) 52

(H) **Geographical Area of Production and Map as shown in page no. (6) :** Jhabua, Dhar & Barwani districts of Madhya Pradesh and the adjoining districts of Rajasthan and Gujarat spreading over an area of about 800sq. miles is considered to be its home tract.

i) **Primary Centre of origin:** - Called as '*Jhabua District*' of Madhya Pradesh. 22° 45' N Latitude and 74° 38' E Longitude.

ii) **Secondary Centres of origin :-**

Dhar (Madhya Pradesh)	22° 35' N	75° 20' E
Barwani (Madhya Pradesh)	22° 03' N	74° 57' E

iii) **Climate:** The climate is hot and the temperature varies between 10° c to 43° c. The area gets an annual rainfall of 500 to 1,000 mm. The *Kadakhnath chicken variety* has been reared by tribals over a long period of time and its unique breed characteristics have been established through many generations of selection and fixation of genes. It tolerates extreme climatic conditions of summer heat and cold winter stress and thrives very well under minimal management inputs like poor housing, no health care or supplementary feeding while exhibiting appreciable degree of resistance to diseases compared to other exotic breeds of fowl.

Nutritional Quality of '*Jhabua Kadakhnath Kalamasi Black Chicken Meat*' (Analysis done by National Research Centre on Meat (NRC) Chingicherla, Hyderabad, A unit under Indian Council of Agriculture (ICAR)

1. Proximate Composition:-

Composition	Quantity (%)
Moisture	71.5 - 73.5
Protein	21 - 24
Fat	1.94 - 2.6
Ash	1.1 - 1.4

2. Fatty Acid Profile

Composition	Quantity (mg/100g)
Myristic Acid (14:0)	40 - 70
Palmitic Acid (16:0)	800 - 1100
Stearic Acid (18:0)	210 - 370
Total Saturated Fatty Acids	1050 - 1540

Palmitoleic Acid (16 :1)	220 – 370
Oleic Acid (18:1)	1200 – 1770
Eicosenoic Acid (20 :1)	20 – 30
Total Monosaturated fatty acids	1440 – 2170
Linoleic Acid (18:2)	400 – 600
Gamma Linoleic Acid (18:3)	20 – 40
Arachidonic Acid (20:4)	20 – 40
Docosahexaenoic Acid	30 – 50
Total Poly unsaturated fatty acids	480 - 730

3. Cholesterol Content 59 – 60 mg / 100 g

(I). PROOF OF ORIGIN (Historical Records):-

'**Kadakhnath Chicken**' is a popular variety of bird with unique quality, based upon the climatic characteristics unique to the Jhabua district of Madhya Pradesh. The following table shows the various evidences for proof of origin for '**Kadakhnath black meat chicken**' (*also appropriate annexures from extracts of various journals etc are provided to purport proof of origin*)

Historical Record	Remarks
Reviving the Indigenous Poultry Breed - <i>Kadakhnath</i> (Good Practice Code: INGP04)	In 1982, the Animal Husbandry Department of Madhya Pradesh established a breeding farm and hatchery in Jhabua district, with the objective of conserving and propagating Kadakhnath in and around the district.
Estimation of genetic heterogeneity of chicken germplasm being used for development of rural varieties utilizing DNA markers. Rudra n. Chatterjee, matam niranjan, ramashraya p. Sharma, meenakshi dange And tarun k. Bhattacharya <i>Project Directorate on Poultry, Rajendranagar, Hyderabad 500 030, India; Journal: Indian Academy of Sciences</i>	The home tract of Kadakhnath is mainly in the Jhabua and Dhar districts of in western Madhya Pradesh and adjoining areas of Gujarat and Rajasthan. Most of the internal organs of these birds exhibit intense black coloration which is due to the deposition of melanin pigment in the connective tissue of organs and in the dermis. The black flesh of Kadakhnath is very delicious and popular among tribal people (Sharma and Chatterjee 2006).
Reviving the Indigenous Poultry Breed - Kadakhnath: Enhancing Livelihoods of Tribals Through Niche Market Opportunities (<i>Based on the experiences of MPRLP and BAIF</i>) (2009)	<i>Kadakhnath</i> is a native breed of poultry inhabiting Jhabua and Dhar districts in Western parts of Madhya Pradesh. The Jhabua District's mean altitude ranges from 450 to 700 m above mean sea level.

<p>Evaluation of egg quality traits in indigenous Kadaknath breed of poultry S N S Parmar, M S Thakur, S S Tomar and P V A Pillai <i>Department of Animal Breeding and Genetics, College of Veterinary Science and Animal Husbandry, JNKVV, Jabalpur (M. P.), India- 482001</i> <i>drmohansingh@gmail.com (18.09.2006)</i></p>	<p>The Kadaknath indigenous breed of poultry is being reared by tribals living in Jhabua district of Madhya Pradesh (India). The birds require no extra care and housing which makes them suitable for backyard poultry farming.</p>
<p>Effect of Vitamin E on Production Performance and Egg Quality Traits in Indian Native Kadaknath Hen. A. Biswas*, J. Mohan and K. V. H. Sastry Division of Physiology and Reproduction, Central Avian Research Institute, Izatnagar, Bareilly-243122, Uttar Pradesh, India (Asian-Aust. J. Anim. Sci.; Vol. 23, No. 3 : 396 – 400 March 2010)</p>	<p>Kadaknath (KN) is an important Indian reared poultry breed which is well known for poor egg production, slow growth rate, smaller body size as well as late sexual maturity. KN breed is being reared by tribal living in Dhar and Jabua districts of Madhya Pradesh, India.</p>
<p>THE HINDU Online edition of India's National Newspaper Thursday, Apr 28, 2011 Conserving Kadaknath poultry breed</p>	<p>An Indian poultry breed, called Kadaknath is native to Jhabua district of Madhya Pradesh.</p>
<p>Unpacking a poultry myth</p>	<p>Similarly, efforts focused on the Kadaknath—another indigenous breed of chicken found largely in the Jhabua district of Madhya Pradesh – have paid off.</p>

(J) Method of production:

Production characteristics of Kadaknath birds:

Kadaknath hens start laying eggs from 6 months onwards. Eggs are laid in two to three clutches in a year, with 25 to 30 eggs per clutch; thus, 80 to 90 eggs are produced annually. Hens of this breed show poor brooding ability and the eggs are, therefore, kept under *Desi* hens for hatching—a traditional practice followed by tribals in this area.

A bamboo basket is lined with crop residue of paddy/wheat or dried grass to provide a cushion for the eggs to be hatched. Eggs of both *Desi* and Kadaknath birds are placed on this cushion to be hatched by a broody *Desi* hen. This traditional technique is being encouraged by the PFT to propagate Kadaknath through natural means and ensure availability of Kadaknath chicks in the villages.

(K) Uniqueness:

- The peculiarity of this breed is that most of the internal organs show the characteristic black pigmentation which is more pronounced in trachea, thoracic and abdominal air sacs, gonads, elastic arteries, at the base of the heart and mesentery.
- The shining blue tinge of the earlobes adds to its unique features.
- Kadaknath possesses a distinctive taste.

(L) Inspection body: (Proposed)

The inspection body of (Kadaknath Black Meat Chicken) proposed to consist of the following;

- a) Agencies like Commissioner of Agriculture, Govt. of M.P.
- b) Subject Matter Experts from Madhya Pradesh State from institutions like Rajmata Vijayaraje Scindia Krishi Vishwa Vidyalaya, Gwalior.
- c) Subject Matter Experts from outside Madhya Pradesh State National Research Centre on Meat (NRC on meat) have consented to be part of the Inspection body (A letter of consent given by NRC on meat, Chingicherla, Hyderabad is attached)
- d) Representatives from Progressive Kadaknath breed chicken farmers from Jhabua region .

(M) Other:

The Kadaknath bird commands an elevated position since a year old Kadaknath bird fetches Rs 250 to 300 (as compared to Rs 150 for a *Desi* bird) and the eggs are sold at Rs 4 to 5 each, depending on the season and the location. The meat of a Kadaknath bird is softer than that of a *Desi* bird, a characteristic preferred by local consumers. Though the Indian Poultry Industry has grown by leaps and bounds over the last few decades, it is a sad fact that the well established tradition of back yard poultry farming which is a quintessential aspect of Indian farm practice has progressively declined over the years and is a matter of grave concern.

The tribal uses Kadaknath blood in the treatment of chronic disease in human beings and its meat is believed to be an aphrodisiac. Kadaknath possesses a distinctive taste and has special medicinal value for treating nervous disorders and in addition to it is claimed to be a well known aphrodisiac. Abundant clinical experience has indicated that Kadaknath chicken has a peculiar effectiveness in treating women's discuss, sterility, menoxenic (abnormal menstruation), habitual abortion, blood leucorrhoea,

metorrhagia and sickness after giving birth to offspring and also aids in curing pulmonary problems - tuberculosis (TB), heart diseases, neurasthenia (a condition of nervous debility supposed to be dependent upon impairment in the functions of the spinal cord), and children's osteomalacia neurasthenia (a condition marked by softening of the bones). The eggs of Kadaknath chicken can be used effectively to treat headaches, headaches after giving birth, faintness, asthma and nephritis (acute or chronic inflammation of the kidney). The eggs are also an ideal nutritive, especially for old people and high blood pressure victims, since the cholesterol content is lower and free amino acids which are found to be higher than that of eggs of other kinds of birds.