

The Taming Process of Red Junglefowl

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ABSTRACT

The objective of this paper is to depict how local farmers tame junglefowl in the distribution area of junglefowl. Specifically, we conducted research about the capturing and taming of live junglefowl in northern Thailand. We found four junglefowl raised in northern Thailand. The junglefowl raisers had in common that they were all male and hunted junglefowl during the agricultural off-season. The places where they captured junglefowl were of two types, forest or orchard. They encountered the junglefowl accidentally and failed to capture the parent junglefowl but captured the junglefowl chicks relatively easily. The methods of raising junglefowl were that they fed them maize and rice. The raising places, for example raising in a cage, on a tree branch or free range, differed according to the junglefowl's age. It is known that junglefowl are very cautious and nervous birds but our research found some local farmers succeeded in raising junglefowl using a cage or basket. There is a high possibility that, although the junglefowl on the basis of local resident's recognition were the same, different individuals had different natures and characteristics.

Key Words: junglefowl, taming process, chicks, hunting, semi-domestication

INTRODUCTION

It is known that Red Junglefowl (*Gallus gallus*, hereinafter called junglefowl) are distributed roughly in humid tropical Asia. We have found several Red Junglefowl raised in the remote areas of Thailand, Laos, Vietnam, Burma and Bangladesh etc.(Photo1). The objective of this paper is to indicate how local farmers tame Red Junglefowl in the distribution area of junglefowl in humid tropical Asia. Specifically, we elucidate how they capture junglefowl, the process of taming them and the methods of rearing and the reason why they raise junglefowl.

At the moment there is not enough basic information concerning the taming process of chickens. We attempt to present basic information concerning the taming process of chickens in northern Thailand on the basis of the direct observation, interview and collecting documents. In this paper we focus on some case studies in terms of the relationship between Red Junglefowl and hillside farmers. We have checked the morphological and body colour changes of captive junglefowl and have observed the methods of raising junglefowl and its variations through observation. We conducted this study at a Hmong village in Nan Province and two Mien (Yao) villages in Phayao Province in northern Thailand and employed an anthropological approach.

The people in humid tropical Asia have long had a close relationship with junglefowl, for example hunting them for food (Ikeya et al. 2008). Although it is said that taming junglefowl is difficult since they are very cautious and nervous birds (Okamoto, 2001), it has been partly reported that local residents have raised captured junglefowl and junglefowl crossed with native chickens (Nishida et al. 2000).

ECOLOGY OF JUNGLEFOWL AND LOCAL PEOPLE'S PERCEPTION

Junglefowl hunting has been conducted in Thailand, Laos and southern China (Ikeya et al. 2008). The hunters of junglefowl have an in-depth knowledge of the ecology of junglefowl and recognise that junglefowl are very nervous birds (Takada and Oshima 2008:181). They believe it is difficult to bring junglefowl under their control. The male junglefowl makes a mating call in the breeding season so hunters can easily find them, so junglefowl hunting takes place in this season. Junglefowl, especially males, establish their territory in the breeding season. If a hunter brings a male domestic chicken into their territory, the male junglefowl will approach the male domestic chicken and attack it, in some cases because the male junglefowl thinks that its territory is being invaded. There is a report on the ecology of junglefowl in Chiang Rai Province which suggests that junglefowl have a different ecological behavior in the rainy season (June-October) and the dry season (November-May). In the breeding season (February-April), they make a breeding flock which consists of one male and several females. The home range of junglefowl in the dry season is smaller than in the rainy season. Calling at dawn is done by male flock leader (Ohshima, Takada and Kawashima, 2006).

Several ethnic minority groups, so-called hill tribe people, for example the Karen, Akha (E-ko), Lahu (Musser), Hmong and Mien (Yao) live in the hillside areas of northern Thailand. Principally, we focused on the Hmong and Mien people and conducted a field study in three villages, one village in Nan Province which consisted of Hmong people mainly and two villages, in Phayao Province consisting of Mien peoples. These two ethnic groups originated in South China and migrated to northern Thailand in the nineteenth century.

The main subsistence and economic activity in the villages studied is agriculture. They grow upland rice, maize and lychee, etc. As far as livestock raising in the study village is concerned, chickens and pigs are very common in all villages and some villagers raise cattle (Nakai 2009).

We will start by explaining the local name for Red Junglefowl. Hmong people called chickens *Qaib* in the Hmong language and junglefowl *Qaib qus* or *Qaib teb*. The word *qus* means a thing that runs away when it meets people, so *Qaib qus* means a chicken that so runs away in literal translation. The word *teb* means agricultural field, so *Qaib teb* means a chicken that lives in an agricultural field, in literal translation. The male chicken and female chicken are called *Hlau qaib* and *Poj qaib*, respectively. The junglefowl is similarly named, for example, the male junglefowl is called *Hlau qaib qus*. In addition, a decoy chicken is called *Qaib dib*.

On the other hand, Mien people called chickens *Jai* in the Mien language. Junglefowl are usually called *nx'g-Jai* and also called *hiad-Jai*. The word *nx'g* means a bird and the word *hiad* means wild or not tamed. So in literal translation, *nx'g-Jai* and *hiad-Jai* mean wild chicken and not tamed chicken, respectively (Masuno, 2006). The male chicken and female chicken are called *Jai-kxvj* and *Jai-Eeid*, respectively. Lastly, *Kai paa* in Thai word show pure wild chicken and the domestic chicken entered into the forest from the settlement (Takada and Oshima 2008:184). As the result, we have to be take care of the genetic aspect of junglefowl.

As described above, Hmong and Mien hillside farmers in northern Thailand recognize junglefowl as 'the chicken that runs away when it meets people', 'the chicken that lives in an agricultural field' and 'the chicken that is not tamed' and they maintain their knowledge about the ecology of junglefowl by hunting junglefowl.

RESULTS

The methods of taming Junglefowl

1. The situation when people captured junglefowl

Case 1: We could find two junglefowl called *Kai paa* (one male and one female), raised by Mr.X living in the Village B, Nan Province. In May 2005, Mr. X was looking at his cattle grazing the grass under lychee trees and found junglefowl in the lychee orchard. He captured five chicks but failed to capture their parents. He brought the chicks back home to raise them but three chicks (sex unknown) died immediately. The remaining two chicks (one male and one female) survived.

Case 2: In May 2005, Mr. K captured Junglefowl in the longan orchard of his Village (Photo2). He found Junglefowl, which was not a chick but already grown, and chased it. Junglefowl ran into some dense thickets of *Mimosa sp.*, which was viny with hooked thorns and became trapped in the thicket, so Mr. K was able to catch it with his hands.

Case 3: In 2002, when Mr. S was roaming the forests alone hunting but not seeking any particular animal, he happened to meet several junglefowl chicks and a female parent junglefowl. The female parent junglefowl flew away but the chicks remained. He caught one male and one female chick with his hands. Mr. S brought these two chicks home to raise them. Although Mr. S was able to keep the female chick alive for a while, it died before growing to adulthood.

2. The process of taming junglefowl

Case 1: Firstly we focus on the rearing environment of the junglefowl. On 25 April 2006, two Junglefowl were kept together in a box type cage woven from bamboo and placed 50 cm above the ground at Mr. X's house. Both junglefowl jumped in the cage so their wings were damaged. These junglefowl were not tethered in the cage but when we asked Mr. X to show us his junglefowl, he tied the junglefowl's leg with string to bring it out of its cage. When we revisited in October 2007, the same cage was used to raise these junglefowl.

Secondly we focused on the feed of the junglefowl. The junglefowl were fed in the cage which has two small plastic holders, one for water and the other for feed. We studied the frequency of feeding and the variety of feed for seven days from 13 to 19 September 2006 by direct observation (Table 1). The junglefowl were fed once per day for five days, two times per day for one day and they were not fed on 17 September. The feeding times were five times in the morning, one time at noon and one time in the evening. Mr. X fed the junglefowl two times and his mother fed them five times. We observed four kinds of feed, unhusked rice, milled rice, boiled rice and maize. The maize was fed after they ground it by using a millstone. They fed unhusked rice on two occasions, milled rice two times, boiled rice one time and hybrid maize two times. Thus, they fed rice or maize to their junglefowl once a day usually.

Case 2: In November 2005, Junglefowl was raised in a basket made of bamboo in the backyard (Photo3). Junglefowl and the cage were tied with string. Mr. K use maize, unhusked rice and boiled rice as food stuff. In March 2006, Junglefowl was raised on a tree branch near Mr. K's house. Its right leg and tree branch were secured with string. In May 2006, Junglefowl was raised in a cage made of wood in the backyard. In March 2008, Junglefowl was raised under the floor of the hut which is on stilts. Under the planks Junglefowl and domestic chickens were raised together and cross bred with each other.

Case 3: Mr. S succeeded in raising one male junglefowl and continued to raise it. Junglefowl was raised with Mr. S's domestic chickens and kept free range throughout the day. Mr. S fed maize and milled rice to Junglefowl and his domestic chickens. Although Mr. S raised Junglefowl for more than three years, Junglefowl kept a certain distance at all times from people, including Mr. S. When sensing danger, Junglefowl flew away. Mr. S told us that Junglefowl was different from his domestic chickens in the difficulty of getting close to it and its flying off when alarmed.

Mr. S also told us that if he forced Junglefowl to live in a cage, Junglefowl would not eat any feed so he had no other choice but to raise Junglefowl free range. In the daytime, Junglefowl moved around the village, the fields and elsewhere but in the evenings Junglefowl came back to its sleeping place and stayed there the night. Mr. S told us that Junglefowl had slept in the tree every night but when he chased the junglefowl with a stick to move it to another place, Junglefowl spent the night in the gap between the chicken house and its roof.

3. The purpose of raising junglefowl

Case 1: During our research from April 2006 to December 2006, Mr. X told us that he would cross his junglefowl with his domestic chickens but the crossing had still not succeeded during our research in October 2007.

Case 2: In November 2005, Mr. K told us that he tried to cross the junglefowl and a

domestic chicken but had still not succeeded. In our research in August 2007 and March 2008, he had succeeded in cross-breeding. At first, he obtained five crossed chickens of which two fowls died and one fowl was used as gift, so two fowls remained. In the next case he obtained five crossed chickens of which one fowl died so four fowls remained. Mr. K told us that he would choose a good one and use it as a decoy chicken in junglefowl hunting.

Case3: More than three years have passed since the Junglefowl was raised and there have been several clutches of crossed chickens between Junglefowl and domestic chickens (hereinafter called crossed chickens). Junglefowl crossed with the domestic chickens spontaneously because they were raised free range. In November 2005, Mr. S kept three crossed chickens and we were able to confirm two chickens in his garden. Mr. S told us that the crossed chickens flew less well than Junglefowl and that a male crossed chicken could be used as a decoy chicken in junglefowl hunting. But in November 2005, the crossed chickens in fact had still not been used as decoy chickens.

DISCUSSION

The objective of this paper is to depict how local farmers tame junglefowl in the distribution area of junglefowl. Specifically, we conducted research about the capturing and taming of live junglefowl in northern Thailand had raised junglefowl. The results can be summarized as follows.

1. We found four junglefowl raised in northern Thailand. The junglefowl raisers had in common that they were all male and hunted junglefowl during the agricultural off-season.

2. The places where they captured junglefowl were of two types, forest or orchard (longan or lychee). They encountered the junglefowl accidentally and failed to capture the parent junglefowl but captured the junglefowl chicks relatively easily.

3. The methods of raising junglefowl were that they fed them maize and rice. The raising places, for example raising in a cage, on a tree branch or free range, differed according to the junglefowl's age (one month to three years). It is known that junglefowl are very cautious and nervous birds but our research found some local farmers succeeded in raising junglefowl using a cage or basket. There is a high possibility that, although the junglefowl on the basis of local resident's recognition were the same, different individuals had different natures and characteristics.

4. One of the important purposes of taming and raising junglefowl is to make decoy chickens for use in junglefowl hunting. The local farmers think that a decoy chicken whose body shape, wing colour and call resembles the junglefowl is suitable for junglefowl hunting, and cross-breeding between junglefowl and domestic chickens can produce good decoy chickens.

As stated at the beginning, the taming process from junglefowl to domestic chicken is not a simple process. It has been said that once humankind developed a close relationship with junglefowl, they developed semi-domesticated chicken and then domestic chickens were created from the repeated process between semi-domesticated chickens and escaped chickens (Akishinomiya 2008, 2010). In this paper we could clarify the methods that local farmers use for taming junglefowl.



Figure 1. The junglefowl raised in the cage in Vietnam



Figure 2. The lychee orchard where junglefowl were captured in Thailand



Figure 3. The junglefowl called *Kai paa* in Thai word are raised in a baboon cage

Table 1. Feeding activities and feed stuff of reared junglefowl in September 2006.

Source: Ikeya K.et al.(2010:84)

Date	Time	Feeding Number	Variety of feed				Feeding person	
			Maize	Unhusked rice	Milled rice	Boiled rice	Mr.X	Mother
13	Morning	1		X				X
	Noon							
	Evening							
14	Morning	2	X					X
	Noon							
	Evening							
15	Morning	3	X				X	
	Noon							
	Evening					X		X
16	Morning	5						
	Noon				X			X
	Evening							
17	Morning							
	Noon							
	Evening							
18	Morning	6		X				X
	Noon							
	Evening							
19	Morning	7					X	
	Noon							
	Evening							

Source: Direct observation by the author.
Note: (X) indicated fed.

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