Bannag: A Journal of Local Knowledge
ISSN:2423-1347
E-ISSN: 2627-2367
Vol. 2 No. 1, 2015

ETHNOZOOLOGY OF THE KALINGAS

Chtistine B. Mendoza
Graduate School
University of Saint Louis
Tuguegarao City, Philippines

***Abstract*—** As population has multiplied and industry has expanded, accompanied by science and technology, man's fear for the future fate of the world has increased. Right now, a new body of knowledge called Ethnozoology has emerged to provide a background of ethnic group and its useful animals, and the animasl that are of potential value to them. It also shows the relationship of animals to these ethics (the people of the area) regarding their customs, beliefs, and practices. This study is focused on the ethnozoology of the Kalinga Province. Descriptive method was utilized in the study. Results revealed that the Kalinga Province is rich with animals that are used by the residents for various purposes.

Keywords— ***Ethnozoology, Kalinga Province, Vertebrates, Invertebrates***

INTRODUCTION

Over the years, the world's population has increased tremendously. The United Nation essayed this in the World Population Prospect I February 2001, which tells that the world's population has reached 6.1 billion and is currently growing at an annual rate of 1.2% or 77 million per year. In a world of plenty, many interrelated problems become many.

Such that populations have multiplied and industry has expanded, accompanied by science and technology, man's fear for the future fate of the world has increased. The fear that the whole world which is regarded as the source of all the needs of man will come to a point when it could no longer supply the demands of the increasing population for foods, medicines and space for shelter.

Brown (1987) in his book "The Twenty Ninth Day" wrote that during the final quarter of this century, population growth and rising affluence were projected to double world demand for food. This thought was substantiated by Echols (1985) who said that there's a wide range of opinions as to whether or not the whole world would be able to produce enough space as fast as the rapid population creates a greater demand for it.

For history, human beings have maintained a balance with the environment. According to Brown (1987) primitive man lived in an ecosystem without essentially destroying it because his numbers were few. Today the picture is different. Billions of human beings with rising aspirations inhabit the earth and exert great pressures on the ecosystem. If world population will go on increasing as it is today, it will also mean the disruption of many of the balanced ecosystem with the diversion of energy and matter into human population. At present, we have the abundance of natural resources and yet man still encounters problems such as malnutrition, hunger, energy crisis, more space to build his home and more farm to cultivate in order to feed his growing families. According to Malthusian theory, "More mouth to feed, less food to eat", is an evidence of the law of supply and demand.

In the developing countries where rapid population growth is evident, the problem of shelter is becoming apparent. Gunn (1989) in his book "Habitat: The man settlement in an Urban Age" stated that housing conditions have worsened in most of the developing world. Besides, the speculations of many different countries to have a worldwide scarcity of foods starting on the 1980's have come to reality.

In the Philippines alone, severe nutritional stress and rise in death rates are experienced because of food shortage. This is emphasized by report coming from Nutrition Center of the Philippines. Despite certain improvements in the nutritional status of the Filipino's, malnutrition remains as a serious problem in our country affecting most seriously pre-school children {0-6} years old and even pregnant and lactating mothers (NEDA – CAR 1990).

Nutritionists warn that grain by itself does not provide an adequate diet. Most of the world high protein comes from fish, beef, and soybeans. According to marine biologists, the catch of table-grade species cannot be markedly expanded beyond current levels. The oceans and other bodies of water which are considered as sources of human food become the planet's ultimate waste receptacles, the positive recipient of staggering amounts of industrial, agricultural, and municipal waste. Thus, pollution jeopardizes human nutrition as well as marine life. Advance technology is trying to combat food insufficiency but this is not likely to happen unless steps are taken to balance growth in population with increase in food production. (Echols 1985)

The Kalinga in the Cordillera Region of the Philippines are not exemption to this world and national problems on foods and shelter as well as medicines. The search for the elements of culture, beliefs, attitudes, and tools, towards the distinction of this tribe from the other ethnic groups of Filipino people is important, basically because the indigenous materials being used are now vanishing as brought by the tremendous industrialization and immense cultural change.

Balubal (1994) stated that as a new body of knowledge which is Ethnozoology, now an important field of science because it provides a background of ethnic groups and its useful animals, and the animals that are of potential value to them. It also shows the relationship of animals to these ethnics (the people of the area) regarding their customs, beliefs and practices.

More than anything else, given the world the natural and the provincial facts about the current life situation, a fair picture of the ethnicity of the Kalingas and their use of animals come to the fore. It is in this context that this study was deemed significant.

METHODS

This study made use of the descriptive method for this attempted to describe the ethnozoology of the Kalingas and a fair view of their culture. This study was conducted in the province of Kalinga. Five municipalities namely Balbalan, Lubuagan, Pasil, Tanudan, and Tinglayan were considered as part of the locale of the study.

The respondents of the study are the residents of the five selected municipalities of the Kalinga Province. Slovins Formula was used to determine the sample size for the study.

Table 1. Distribution of the Respondents of the Study

Municipality	Frequency	Percentage
Balbalan	84	24.53
Lubuagan	71	17.86
Pasil	64	16.12
Tanudan	81	21.19
Tinglayan	97	29.29
Total	397	100.00

Structured questionnaire with three parts, personal interview, photography were the main tools in order to gather the needed data of the study. Moreover, personal interview and photography were also utilized in the study.

RESULTS AND DISCUSSION

Table 1. Profile of the Respondents

Profile	Frequency	Percentage
Age		
66-70	68	17.13
61-65	63	15.87
56-60	55	13.86
51-55	41	10..
46-50	31	7.81
41-45	23	5.79
36-40	30	7.56
31-35	17	4.28
26-30	37	9.32
21-25	18	4.53
16-20	14	3.53
Total	397	100.00
Family Size		
9-10	47	11.84
7-8	136	34.26
5-6	131	33.00
2-4	83	20.91
Total	397	100.00
Annual Family Income		
301,000 – 500,000	12	3.02
101,000 – 300, 000	44	11.08
81, 000 – 100, 000	53	13.35
61, 000 – 80, 000	29	7.30
51, 000 – 60, 000	56	14.11
31, 000 – 50, 000	110	27.71
30, 000 and below	93	23.43
Total	397	100.00
Educational Attainment		
College Graduate	70	17.63
College Level	45	11.34
High School Graduate	33	23.43
High School Level	93	23.43
Elementary Graduate	72	18.14
Elementary Level	84	21.16
Total	397	100.00

The table presents the profile of the respondents. The data show that out of the total respondents, majority belong to the ages that range from 66 – 70 and only 3.53% belong to the lowest age bracket of 16-20.

Also, most of the respondents have a family size of 5- 6 members. Moreover, majority of the respondents have an annual family income that ranges from PhP 31, 000 – PhP 50, 000. This can be attributed to the fact that most of the respondents were not able to finish tertiary level of formal education that would help them look for better job opportunities. And finally in terms of educational attainment, most of the respondents are not college graduates. This could be affected by the fact that they tend to go to field to help their families earn a living. Other reasons include the lack of motivation to continue schooling and lack of money to pursue their studies.

Table 2. Frequency of the Use of Vertebrates

Name of Animals	Food	Medicine	Decoration	Wearing Apparel	Body Accessories	Toys	Cultural Practices
1. Alligator [si'lay]	207	56		95	52		
2. Bat [panni'ki]	106	90				38	
3. Bird [sissiwi't]	243	73	69				
4. Carabao [luwa'ng]	261		103		36		252
5. Cat [ku'sa]						77	63
6. Wild chicken [idaw]	193		151		89	122	211
7. Deer [ug'sa]	246		192		92		
8. Dog [aso]	187	41				94	
9. Ducks [ka'mit]	216					81	
10. Heron [kannaway]	97		78			62	
11. Frog [tu'kak]	212					96	
12. Horse [kafyayo]	29			88		64	
13. Japanese eel [pali'spis]	297	107	53		49		
14. Lizard [allu'tiit]		132					112
15. Million/mosquito fish	251					129	
16. Monitor lizard [fayyak'as]		380			88	66	
17. Monkey [ka'eg]	261	195				125	
18. Mudfish	117						
19. Owl [ku'op]						67	167
20. Parrot [ka'si]	53		80			244	
21. Pig [fuy'ok]	367						377
22. Rabbit	149	119		100		96	
23. Rat [utot']	61			83		66	
24. Snake [u'yog]	264	239		127			152
25. Squirrel [mu'tit]	213	134		81		44	
26. Turkey	61						
27. Turtle [cha'gga]	156	190	80			210	189
28. Wild pig [la'man]	324				163		
29. Hawk [fu'kaw]	251						136

Based on the data, the vertebrate animals used by the Kalingas include alligator, bat, bird, carabao, cat, wild pig, deer, dog, ducks heron, frog, horse, Japanese eel, lizard, mosquito fish, monitor lizard, monkey, mudfish, owl, parrot, pig, rabbit, rat, snake, squirrel, turkey, turtle, wild pig, and hawk. It is also shown that these animals found in the province of Kalinga are used for varied purposes such as food, medicines, decorations, wearing apparels, body accessories, toys, and medium for cultural practices.

The vertebrate most commonly used as food is pig. Families domesticate this animal in their backyard. This animal is also used as offering during cultural ceremonies and rituals. Cat, lizard, and owl are not consumed for food. As for medicine, the monitor lizard is commonly used for treating cough, fever and asthma while the dog has the least frequency for it is not a common practice in the place to use such animal in treating illnesses.

As wearing apparel, snakes are commonly used. The bones and integument of snakes are used in making earrings, necklace, and accessories of the clothes. On the other hand, the squirrel has the least frequency

Table 3. Frequency on the Use of Invertebrates

Name of Animals	Food	Medicine	Decoration	Wearing Apparel	Body	Toys	Cultural Practices
1. Ants [a'yaga]	254	129					
2. Bees [iyukan/a'lig]	317	300					214
3. Beetle							
4. Butterflies [kul'lapoy]			165			107	93
5. Clams [tikam']	360	122			154	117	
6. Cockroach							
7. Crabs [ag'guma]	381		254			161	
8. Dragonfly [pinpitok]	52					238	174
9. Earthworm [fyatoy]	44						
10. Grasshopper [du'dun]	121					139	158
11. Leech [a'limatok]		211					
12. Crickets [koryat]	181						
13. Periwinkle [a'ggong]	397	215					
14. Shrimps [la'gchaw]	362	141				106	
15. Snail [fi'ssukoy]	350						

The table shows the invertebrate animals found in the locality of Kalinga and their usefulness to the Kalingas. The invertebrate animals used by them are ants, bees, butterflies, clam, cockroaches, crabs, dragonflies, grasshopper, leech, crickets, periwinkle, shrimps, and snails. It is also shown that these animals are used for varied purposes such as food, medicines, decoration, wearing apparel, body accessories, toys, and medium for cultural practices/rituals. The respondents rely so much on these local available animals for their subsistence and needs.

Table 4. Extent of Use of Vertebrate Animals in Kalinga

Animals	Weighted Mean	Description
1. Alligator [si'lay]	3.51	Greatly used
2. Bat [panni'ki]	3.83	Greatly used
1. Bird [sissiwi't]	3.71	Greatly used
2. Carabao [luwa'ng]	4.35	Greatly used
3. Cat [ku'sa]	2.31	Rarely used
4. Wild chicken [idaw]	4.39	Greatly used
5. Deer [ug'sa]	4.17	Greatly used

6. Dog [aso]	3.96	Greatly used
7. Ducks [ka'mit]	3.36	Moderately used
8. Heron [kannaway]	2.94	Moderately used
9. Frog [tu'kak]	3.36	Moderately used
10. Horse [kafyayo]	2.32	Rarely used
11. Japanese eel [pali'spis]	3.52	Greatly used
12. Lizard [allu'tiit]	2.65	Moderately used
13. Million/mosquito fish	3.74	Greatly used
14. Monitor lizard [fayyak'as]	3.23	Moderately used
15. Monkey [ka'eg]	4.15	Greatly used
16. Owl [ku'op]	2.75	Moderately used
17. Parrot [ka'si]	3.59	Greatly used
18. Pig [fuy'ok]	4.38	Greatly used
19. Rabbit	2.58	Moderately used
20. Rat [utot']	1.91	Rarely used
21. Snake [u'yog]	3.52	Greatly used
22. Squirrel [mu'tit]	2.87	Moderately used
23. Turkey	2.47	Moderately used
24. Turtle [cha'gga]	4.05	Greatly used
25. Wild pig [la'man]	4.40	Greatly used

The table reveals that the vertebrates are moderately used by the people of Kalinga. The moderate use of animals for varied purposes can be attributed to the fact that in Kalinga, there are commercial stalls like groceries, pharmacy, and department stores where they could obtain materials for food, medicines, and clothing apparels and other related uses. On the other hand, alligator, bat, bird, carabao, wild chicken, deer, dog, horse, million fish, monkey, parrot, pig, snakes, turtle, wild pigs, snakes, turtle, and wild pig occur abundantly. Among the animals mentioned, wild pigs are greatly used by the Kalingas. The Kalingas still hunt wild pigs for food and as a source of income.

Table 5. Extent of Use of Invertebrate Animals in Kalinga

Animals	Weighted Mean	Description
1. Ants [a'yaga]	3.24	Moderately used
2. Bees [iyukan/a'lig]	3.86	Greatly used
3. Beetle	1.86	Rarely used
4. Butterflies [kul'lapoy]	1.98	Rarely used
5. Clams [tikam']	4.50	Very greatly used
6. Cockroach	1.19	Never used
7. Crabs [ag'guma]	4.64	Very greatly used
8. Dragonfly [pinpitok]	2.42	Rarely used
9. Earthworm [fyatoy]	2.27	Rarely used
10. Grasshopper [du'dun]	3.16	Moderately used
11. Leech [a'limatok]	2.02	Rarely used
12. Crickets [koryat]	1.70	Rarely used
13. Periwinkle [a'ggong]	4.45	Very greatly used
14. Shrimps [la'gchaw]	4.02	Greatly used
15. Snail [fi'ssukoy]	3.88	Greatly used

The table shows that invertebrates are moderately used in the province of Kalinga. The animals that are very greatly used by the people are clams, crabs, periwinkle due to the fact that they are readily available in the freshwater habitat in the Kalinga waters. The moderately used animals include grasshopper, leech, earthworm, dragonfly, butterfly, beetle, owl, monitor lizard, frog, heron, and ducks while cockroaches are never used.

Table 6. Factors that Endanger the Kalinga Local Fauna

Factors	Frequency	Rank
Kaingin system of farming	246	1
Lack of appreciation on the importance of animals	196	2
Unregulated hunting	183	3
Dynamite fishing	154	4
Mining	131	5
Contamination of water	117	6
Natural calamities	97	7

The table shows that most of the respondents believed that the kainigin system is the main reason why some animals that have existed before do not exist now. The table further shows that the least factor that endanger the Kalinga fauna are natural calamities like typhoons, drought, diseases, and these could be supported by the belief of the Kalingas that Kabunyan or God will not permit natural disasters to destroy nature where the Kalingas depend so much for their daily living, instead Kabunyan sometimes bring such natural calamities as a form of trial in their lives.

CONCLUSION

The Kalinga province is rich with animals that are used by the residents for various purposes. The animals are moderately used by the residents of Kalinga. Tha Kaingin system of farming is the primary factor that endanger the Kalinga fauna.

REFERENCES

Adam, L. (1989). *Population ecology.* California: Dickenson Publishing Company.

Balubal, G. (1994). *Ethnozoology of the itawes.* Unpublished Master's Thesis University of Santo Tomas.

Billiet, F. (1996). The kalinga ullalim. *Igorot Culture Research Studies.*

Brown, L. (1987). *The twenty ninth day.* USA: John Wesley and Sons Inc.

Daligdig, E. (1987). Folk healing the Ifugao of Kiangan. *St. Mary's University Research Journal, 21.*

Fernandez, P.(1985). The religion, life, and customs of the Negritos in Bataan in the mid-19th century. *UST Journal of Graduate Research.*