

Evaluation of Disaster Perception of University Students in Wuhan City of China and Suggestions on Disaster Reduction Education

Chen Juan

School of Politics & Law and Public Administration, Hubei University, Wuhan, P.R.China, 430062
(E-mail: chenjuan430070@163.com)

Abstract: The chief aim of this article is to evaluate the disaster perception of university students in Wuhan, which would influence the establishment and implement of disaster emergent management. Furthermore, it would help to develop the school education of disaster knowledge and practical education. The method used in this article is survey and statistical analysis. The evaluation index system of disaster perception of university students would be built and the questionnaire on disaster perception evaluation would include the three parts, that is the acquirement of disaster knowledge, disaster reduction attitude and disaster reduction behavior. It was found that disaster reduction knowledge of the university could not be popularized, especially, university students who pay more attention to society lacked experience education. Therefore, some related suggestions would be presented for disaster reduction education.

Key words: Evolution; Disaster perception; University student; Disaster reduction education

1 Introduction

China has been in the period of natural environment deterioration and social contradiction continuous deepening. Various public emergencies frequently occurred such as natural disaster, sudden accident, public health emergency and social safety events. Especially, natural disasters would be in the forefront. ^[1]Various natural disasters caused serious damage and casualties, which lead to severe economic losses. Thereby, we should have to face with the fact that China has already entered a new period of high risks. Our government has already established emergency management preplan of natural disaster, and would adopt every possible method to prevent, rescue, and reconstruct in order to reduce damages caused by disasters. The evaluation of disaster perception would have significant influence on the establishment and implement of emergency management policy.

Foreign scholars' are engaged in the research mainly by risk perception angle, which primarily emphasize on evaluating public risk consciousness. These researches ranged over many topics involving safety, environment, ecological, science and technology. Domestic scholars rarely study on evaluation of disaster perception ability.

However, the study of evaluating the disaster perception ability gives rise to two main difficulties: one is that how to establish a set of index system which is simple and practical to evaluate the disaster perception ability; the other is what method would be proper for evaluating the disaster perception ability.

Our study in this article is confined to identify the index system which contributes to evaluate the disaster perception ability and the method to use. Here the object of investigation is university students in Wuhan. The paper consists of five sections. Section one begins by introduction of the research has been done by domestic and foreign scholars. The index system of evaluating disaster perception ability of university students has been provided in section two. The questionnaire on disaster perception evaluation of university students in Wuhan which including three parts and the results of statistical analysis is presented in section three. Section four would give the concrete suggestions to disaster reduction education for university students. Finally, conclusions for the whole work are put forward in section five.

2 Establishing Index System of Evaluating Disaster Perception Ability

The research on disaster perception ability is developed with the help of perception theory of psychology and behavioral geography. Disaster perception refers to the subjective impression of disaster phenomena or disaster events in our brains and its developmental mechanism. ^[2]The public have the same process of perception psychology except for discrepancy of perceptive objects, which including three stages of obtaining information, processing information, and behavioral decision. ^[3]

The knowledge and understanding about the disaster events would be obtained by multi-channel, which mainly including fundamental knowledge education, media promotion and experience education

of disaster prevention.

Same information imported lead to the discrepancy of different type of public perceptive ability because of the discrepancy of individual background. The discrepancy of individual background is mainly reflected in the following: sex, age, profession, educational level, and residence. [4]The key influence factors to evaluate disaster perception ability would be showed in figure1.

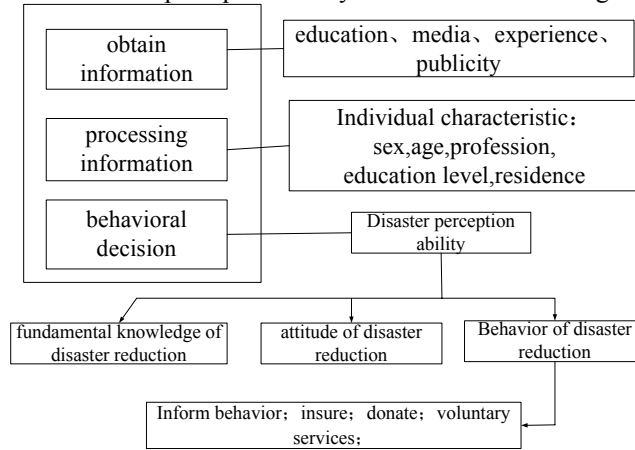


Figure 1 Key Influence Factors to Evaluate Disaster Perception Ability

The index system of evaluating disaster perception ability of university would be established in figure 2 based on the key influence factors to evaluate disaster perception ability. The evaluation of disaster perception ability mainly involve in three levels as showed in the following: one is the knowledge of disaster reduction obtained; the second is the disaster reduction attitude, and the last is disaster reduction behavior. University students obtain the knowledge of disaster reduction primarily from foundational education of school, various media spreading, and experience education. After receiving the same information, different individuals develop different attitude of disaster reduction as the discrepancy of individual characteristic. Upper factors would lead to variant disaster reduction behaviors.

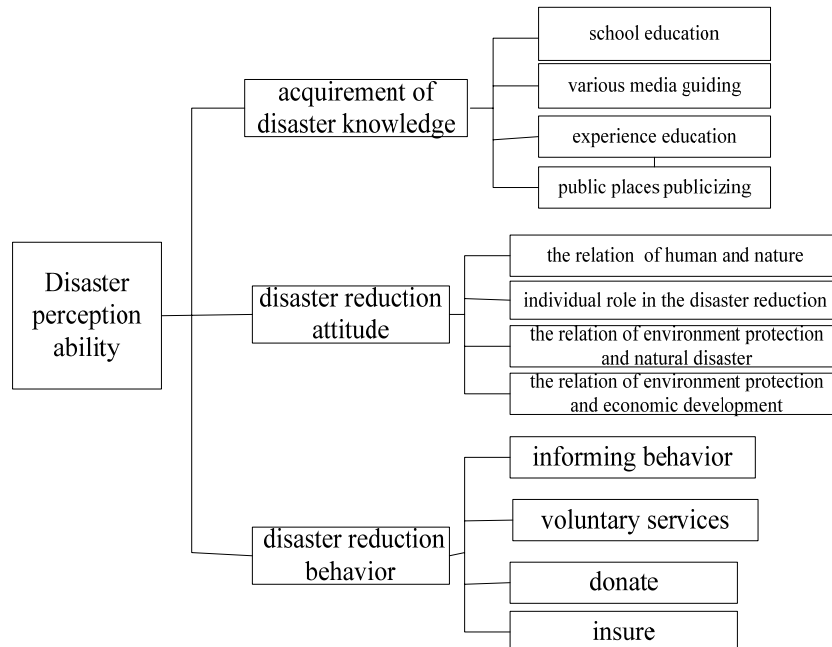


Figure 2 Index System of Evaluating Disaster Perception Ability

3 Questionnaire Design and Analysis of Disaster Perception Ability of University Students in Wuhan

3.1 Questionnaire design of disaster perception ability

Research material source would be obtained by questionnaire of disaster perception ability for university students in Wuhan. The investigation would adopt the sampling from the university students of Hubei University on the principle of convenience sampling. Convenience sampling is not belonging to probability sampling, so the population characteristic could not be inferred. However, the assumption of disaster perception ability of university students would be well-founded. Questionnaire of disaster perception ability for university students in Wuhan is showed in table 1.

Table 1 Questionnaire of Disaster Perception Ability for University Students in Wuhan

	questionnaire content	option
acquirement of disaster knowledge	Popularity rate of disaster reduction knowledge of the university	A. regular B. seldom C. never
	Whether you always pay attention to various natural disasters information?	A. regular B. seldom C. never
	the channels to get the natural disaster information (multiple-choice)	A. network B. TV C. broadcast D. paper E. community
	Whether you attend to the practices of disaster pretention?	A. yes B. no
disaster reduction attitude	Is human related to nature?	A. yes B. no
	Will individual play positive role in the disaster reduction?	A. great B. a little C. nothing
	Would environment protection be benefit to disaster reduction?	A. yes B. no
	the relation of environment protection and economic development	A. environment protection promote economic development B. environment protection prevent economic development C. no relation
disaster reduction behavior	Who would you inform if the disaster happened or potential disaster? (multiple-choice)	A. families B. friends C. community D. government E. media F. nobody
	Do you ever attend the training of preventing disaster or disaster reduction?	A. yes B. no
	Do you ever donate to help people in the disaster?	A. regular B. seldom C. never
	Do you ever attend any insurance?	A. yes B. no

3.2 Analysis of disaster perception ability of university students in Wuhan

The evaluation of disaster perception ability of university students in Wuhan mainly involved in three respects. The survey concerned on the content of acquirement of disaster knowledge including popularity rate of disaster reduction knowledge, attention-degree of various natural disaster information, the channels to obtain disaster information, and involvement of disaster pretention practices. According to the input results of Statistical Product and Service Solutions, the results would be showed in the following figures. The figure 3 describes that the popularity rate of disaster reduction knowledge for university students in Wuhan is very low, and most of the students seldom receive or never receive any related fundamental knowledge education of disaster reduction. Figure 4 indicate that most of university students intensively pay attention to the information of natural disaster, and the main channels of receive natural disaster information are network, TV, and newspaper showed in table 2. Figure 5 presented that most of students never attend any practice training of disaster pretention or reduction and the basic reason is that none related experience training have been carried in schools or communities.

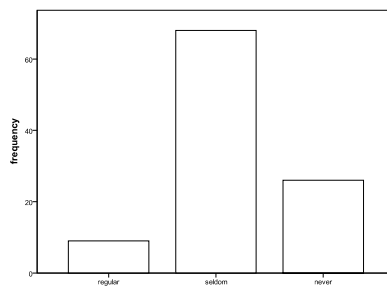


Figure 3 Popularity Rate of Disaster Reduction Knowledge of University Students in Wuhan

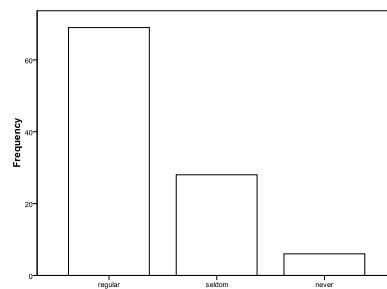


Figure 4 Attention-degree of Various Natural Disaster Information of University Students in Wuhan

Table 2 Channels of Receive Natural Disaster Information

Schannels ^a		Responses		Percent of Cases
		N	Percent	
	network	95	41.9%	93.1%
	tv	54	23.8%	52.9%
	broadcast	21	9.3%	20.6%
	newspaper	48	21.1%	47.1%
	community	9	4.0%	8.8%
Total		227	100%	222.5%

a. Dichotomy group tabulated at value 1

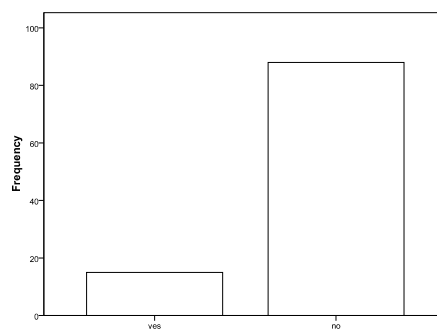


Figure 5 Involvement of Disaster Pretention Practices

4 Suggestions of Natural Disaster Reduction to University Students

4.1 Identify the objective of disaster reduction education

The purpose of disaster reduction education is the spread of fundamental knowledge of disaster reduction and the public attitude of disaster reduction would be established on the base of reduction education. First, the relation of human and nature would be correctly recognized. Second, the function of environment protection and the positive role of individual in the disaster reduction would be understood. Furthermore, public psychological ability of anti-disaster would be reinforced by the

disaster reduction education. In addition, school and society should cooperate to carry out anti-disaster practice and employ theory to practice in order to improve the ability of disaster reduction of university students. ^[5]Thereby, it is the long and important work of disaster reduction education, which would be implemented by various education measures.

4.2 Channels of disaster reduction education

School courses are not only the single way to spread the knowledge of disaster reduction. The disaster education should be done by multi-channels, which would be not the occasional tasks. The fundamental knowledge education of disaster reduction should be reinforced first except for the publicity of paper, network, and media. The learning platform such as courses, lectures, and blog should be provided in order to improve the students' consciousness of disaster prevention and cultivate their social responsibility. Secondly, the practical skills of disaster prevention and reduction should be imparted as many as possible in school, which would help university students self and mutual medical aid. In addition, publicity of disaster prevention and reduction should not only be limited in the classes, but also should be dissolved into the Party activities or general knowledge tests.

5 Conclusions

To sum up, this article explores the disaster perception ability of university students in Wuhan and the following results would be achieved. Firstly, university students in Wuhan receive very limited disaster reduction education. Secondly, they are lack of the practical skills of disaster prevention and reduction. However, they are very concern with the natural disaster information, although lacking of the theory knowledge and practical skills. Therefore, some suggestions of disaster reduction education for university students have been provided, which would help to improve the disaster perception of university students.

References

- [1] Cheng Shen. A Study of Government Emergency Capacity in Five Areas Very Seriously Affected by the Wenchuan Earthquake: Based on Victims Appraisals [J].China Public Administration Review, 2009, (8):112-131 (In Chinese)
- [2] Gold J. R. An Introduction to Behavioral Geography[M]. New York: Oxford University Press, 1980:42
- [3] Barneett K. P. Behavioral Geography and Philosophy of Mind[M].Columbus: Onio State University Press,1976:23-50
- [4] Li Jingyi, Zhou Qi, Yan Rui. Study on Index System for Assessment of Populace's Ability in Calamity Perception [J]. Journal of Natural Disaster, 2002, (11):129-134(In Chinese)
- [5] Chen Li, Chen Si, Feng Ke. Survey on Students' Perception in Calamity and Proposals of Education in Disaster Reduction [J].Chinese Geological Education, 2007, (2) (In Chinese)