www.ThePharmaJournal.com

The Pharma Innovation

K Jenita
Department of FRMCS, College of Community Science, Assam Agricultural University, Jorhat, Assam, India

M Kalita
Assistant Professor, Department of Family Resource Management Community Science, Assam Agricultural University, Jorhat, Assam, India

R Borah
Professor, Department of Family Resource Management Community Science, Assam Agricultural University, Jorhat, Assam, India

Knowledge level on Vaastushastra for house design in Jorhat city

K Jenita, M Kalita and R Borah

Abstract
Vastu shastra is a traditional Hindu system of architecture which literally translates to "science of architecture". It is a science which deals with the management of cosmic energy in building and structures. The present study was conducted to assess the knowledge of the respondents on exterior house design and on orientation of rooms in Jorhat city. For the present study multistage purposive cum random sampling procedure was applied. From the Jorhat municipality area 120 numbers of household were selected from 5 wards by applying Probability Proportional to Size (PPS) method. Both interview and observation methods were used to elicit the information. Questionnaire was used as a tool for collection of data. Findings on housing attributes showed that more than 51.70 percent of families had land ownership by their husband. About 36.70 percent of respondents were having North facing plot of the house. Majority of the respondents 74.20 percent had pucca house followed by RCC house (23.30%) and kutcha house (2.50%). Highest percentage of respondents i.e. 61.70 percent of respondents had 5-10 year old building. Knowledge level on Vastu shastra for external house design was not satisfactory. About 52.00 percent of the respondents had poor knowledge regarding Vastu shastra on external house design. It was found that about 43 percent had average knowledge about Vastu principles for orientation of rooms in their house design. Knowledge index (39.52%) of the respondents were maximum in kitchen area.

Keywords: Application, knowledge, nomination, orientation, Vastu shastra

Introduction

Vastu shastra is a "science of architecture" which deals with the managing of outer space energy in construction. Vastu is the systematic study of directions which aims at utilizing the natural energies which extracts the positive energy from the natural elements of the universe - the Pancha Bhoota namely, earth, water, air, sun and sky. If we give proper place of the five elements of earth, water, wind, fire and ether (the air) at proper place in our building and follow the Vastu directions we become one with nature. Vastu principle has good and positive effect on human's life to make it more prosperous, healthy and wealthy (Agrawal *etal.,* 2016) [1]. Vastu considered the relationship of diverse forces of nature connecting the five elements and strives to keep up symmetry as these elements control, direct and transform the living styles of every living being on earth. As Vastu is prehistoric science that will direct the individual to construct their house in a better way that will help in healthy living and create overall prosperity (Krishnarav, *et al.* 2008, Surnarayanan *et al.*, 2016) [7, 12]. Kshirsagar *et al.* (2019) [8] concluded that about 30 percent present modern buildings are suffering from sick building syndrome.

Despite the fact that, modernization and improvement of living styles, people are more interested for Vastu shastra for their house design as people have different opinion likewise difference in varied income level of the people. There is a need to find out whether the people follow the Vastu guidelines in constructing their own home or they are facing problem regarding the direction which can lead the people with various problems like mental, emotional and physical. According to Patel and Talwelkar (2015) [10] revealed that the families faced the problem before the application of Vastu Shastra and they were highly satisfied after application of principles of Vastu for house design. Keeping this in mind the investigator is interested to undertake a study on to study the personal and demographic profile of the respondents, their knowledge on Vastu Shastra for exterior house design and interior house design in Jorhat city.

Corresponding Author:
K Jenita
Department of FRMCS, College of Community Science, Assam Agricultural University, Jorhat, Assam, India

Methodology

A multistage purposive cum random sampling method was adopted for the study. From the Jorhat municipality area 120 numbers of household were selected from 5 wards by applying Probability Proportional to Size (PPS) method. People who constructed their own home were the respondents for the present research study. Both interview and observation methods were used to elicit the information. Questionnaire was used as a tool for collection of data. To determine the clarity and reliability of the instrument or the interview schedule, pretesting was done. The instrument was administered with 12 non sampled households of municipality areas. The collected data were analysed in accordance with the objectives of the study. All the data were analysed in percentage. These statements were assigned scores and based on these scores mean and standard deviation was computed for finding out knowledge of re4spondents on Vaastushatra.

After calculating the mean, standard deviation was calculated by using the formula:

$$S.D. = \sqrt{\frac{\sum(Xi - \overline{X})^2}{N}}$$

Where,
S.D. = Standard deviation
Xi = Raw score

$\overline{X}$ = Mean
N = total number of respondents

Then, Mean ± Standard deviation was calculated for knowledge Good level of knowledge the score above Mean + SDA average level of knowledge the score between Mean + SD and Mean- SD Poor level of knowledge The score below Mean- SD The following formula was used for calculating knowledge index (Halakatti and Sundarswami 1996) [6].

$$\overline{X} = \frac{Score\ obtained}{Obtainable\ score} \times 100$$

Where, $\overline{X}$ = Mean of knowledge index and practice index

Result and discussion

Demographic profile of the respondents:

The findings of the study showed that 55.00 percent of respondents belonged to the age group of 41-50 years whereas only 4.00 percent of respondents belonged to the age group of 61-70 years. Almost fifty percent of respondents i.e. 52.00 percent were graduate and above. More than fifty percentages of respondents i.e. 53.30 percent belonged to Other Backward Classes which was followed by other caste i.e., Scheduled Tribe (40.00 percent), General (5.80 percent) and Scheduled Caste (0.80 percent). Highest percentages of respondents i.e. 97.50 percent were married. Demographic characteristics of the respondents showed that large percentage of respondents i.e. 61.70 percent of respondent belonged to nuclear family and same percentage of respondents had small sixed families comprising of 2-4 members. Socio economic characteristics of the family showed that large percentage of respondents i.e. 52.50 percent of the head of the family had salaried occupation or service holder. Major percentages of respondents i.e. 79.20 percent had no salaried job or business.

Thus it indicates that almost 43.34 percent of the respondents in the study area belonged to non-working category. About 47.50 percent of respondents had monthly family income below Rs. 25,000/-. Housing attributes of the study showed that more than fifty percentages of respondents i.e. 51.70 percent of families had land ownership by their husband. About 36.70 percent of respondents were having North facing plot of the house. Majority of the respondents 74.20 percent had pucca house which was followed by RCC house (23.30 percent) and kutcha house (2.50 percent). Highest percentage of respondents i.e. 61.70 percent of respondents had 5-10 year old building.

Assessment of knowledge level of the respondents on Vastu Shastra for house design

These sections of the study deals with knowledge level of the respondents on vastu principles both for exterior and interior house designs. Exterior house design includes the design of garden or external view of the plot and interior house design means orientations of different room's that is everything inside the home from bedrooms to the kitchen and bathrooms in house design.

Knowledge level of respondents on exterior house design

Exterior house design includes design of the garden, shape of the plot, shape of building, slope of the land, projection of plot and open spaces around the buildings which is very important for any residential house design.

The overall assessment of knowledge level of respondents on external house design was revealed that 52.00 percent of the respondents had poor knowledge followed by 41.00 percent had average knowledge and only 7.00 percent had good knowledge on external house design (Table 1 and Fig1). This may be due to fact that they did not get any exposure to increase their knowledge level regarding guidelines of Vastu for external house design. The present study is in disagreement with study conducted by Divya and Shashi (2015) [5] on identifying level of faith in Vastu principles by the home dwellers where it was found that the knowledge for selection of plot, beginning of construction, main direction of entrance of house, slopes, drains and boring in house, shape of ideal plot, in houses were very high. The present study is disagreement with the study conducted by Batra et al. (2018) [3] entitled "Vastu shastra in house construction and furnishings" the knowledge of various Vastu principles by respondent's showed that the knowledge of various Vastu principles under beginning of construction aspect were highest with % scores 65.43, surrounding of plot and its geographical location aspects (63.71%), and septic tank principles (62.81%). The study aims to find out the knowledge level of the respondent on principles Vastu shastra for external house design. Knowledge level of the respondents on Vastu shastra for external house design was not satisfactory.

Knowledge level of the respondents on principles of Vastu shastra on orientation of rooms for house design.

Orientation of different room's or interior house design includes everything inside the home, from bedrooms to the kitchen and bathrooms in house design. This part attempts to find out the knowledge of the respondents on orientation different rooms for house design. For these purpose six common rooms i.e. pooja room, kitchen, dining room, living room, bedroom and bathroom were considered.

Analysis of data on overall assessment of knowledge level of respondents on Vastu shastra for orientation of rooms for house design was presented in Table 2 and Fig 2 and found that 43.00 percent of the respondents had average knowledge whereas, 37.00 percent had poor knowledge and only 20.00 percent had good knowledge on Vastu Shastra for orientation of rooms for house design in the study area. A very clear picture was observed from the Table 2 and Fig. 2 showed that less number of respondents had good knowledge regarding principles of Vastu shastra for orientation of rooms for house design. However, nearly 43.00 percent of them had average knowledge on it. This may be because of respondents who were educated they have a good exposure with architects, engineers and person dealing with housing boards etc. About 37.00 percent respondents had poor knowledge regarding principles of Vastu shastra for orientation of rooms for house design may be due to the fact that there is a lack of awareness and lack of exposure with the professional persons. And 20.00 percent had good knowledge on it. The present study is in disagreement with study conducted by Divya and Shashi (2015) [5] on identifying level of faith in Vastu principles by the home dwellers where it was found that the knowledge on location of pooja room, kitchen and master bed room in houses were very high.

The knowledge level of the respondents on Vastu shastra on orientation of rooms for house design which deals with pooja room, kitchen, dining room, living room, bedroom and bathroom. In the Hindu Culture, a place is allocating for prayer at home is called as pooja ghar. The pooja or prayer room is a sacred space in Indian homes. Pooja rooms are special areas within the house that are dedicated to meditation and spiritual worship to God. It is said that the pooja room should always be in the North-East corner of the house to enhance the positive energies (Saran and Shirodkar 2017, Ahirrao, 2017, Kulkarni *et al.* (2009) [11, 2, 9].

Knowledge level of the respondents on orientation of rooms was not satisfactory in the study area. This is very disappointing to note that half of the respondents had aware about some of the Vastu shastra principles for kitchen design or location of kitchen in the house design. Another fifty percent of the respondents in study area are not aware regarding kitchen principles for house design. This may be due to the reason that respondents are less interested to know about the importance of ancient science for house design. It is a tradition among Assamese people that Kitchen should be located in North East side of the house which is a place3 for Pooja room according to Vastu Shastra.

Knowledge index on Vastu shastra for orientation of rooms for house design

It was prominent from the Fig. 3 that that the respondents had knowledge score 39.52 percent was on kitchen which was followed by 31.25 percent on dining room, 31.16 percent on bedroom and 30.20 percent on living room. A very meagre percentage of knowledge index was found on bathroom area (16.83%) and pooja room (15.41%).

It was apparent that knowledge on the principles of Vastu shastra for house design is not satisfactory. This may be because of that they are not aware of the problems faced due to lack of principles of Vastu regarding their house design. Sometimes considering these principles may hamper placement of rooms accordingly which usually does not have any option.

Table 1: Distribution of respondents according to knowledge level on external house design. N=120

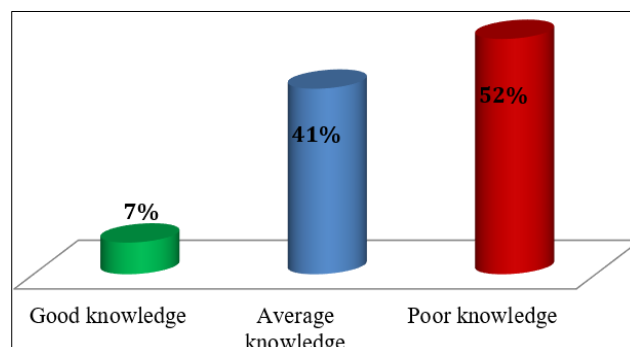| Knowledge	Frequency	Percentage
Good knowledge	8	7
Average knowledge	49	41
Poor knowledge	63	52
Total	120	100

Fig 1: Distribution of respondents according to their knowledge level on external house design

Table 2: Distribution of respondents according to knowledge level on orientation of room for house design N=120

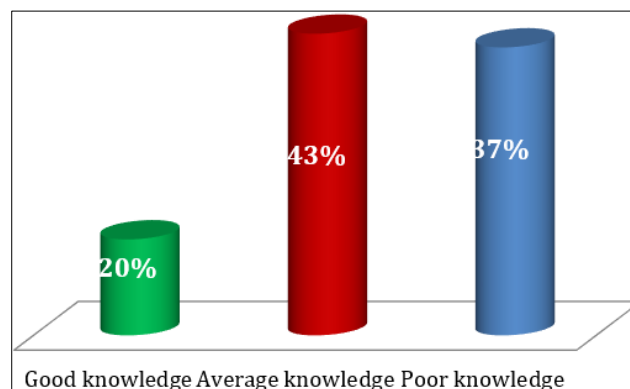| knowledge	Frequency	Percentage
Good knowledge	23	20
Average knowledge	52	43
Poor knowledge	45	37
Total	120	100

Fig 2: Distribution of respondents according to their knowledge level on orientation of room for house design
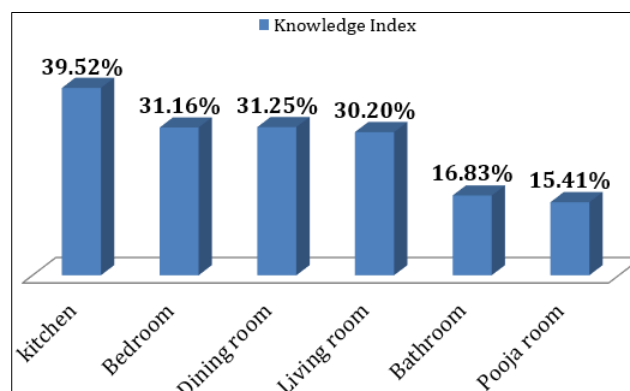

Fig 3: Distribution of respondents of knowledge index on orientation of room in house design

Conclusion

There is a need to create awareness among the dwellers to increase the knowledge level on Vastu shastra, so that they can be motivated to take measures right from planning of the house in order to reduce housing problems. The overall knowledge score on different rooms like kitchen, bedroom, dining room, living room, bathroom and pooja room was not found satisfactory where there knowledge is not good. Therefore the knowledge level of the respondents needs to be improved.

Awareness camp or training programme, seminars, and symposium could be organized in this area to create awareness among the people.

References

1. Agarwal A, Mirajkar N, Singh D. Vastu shastra: A Guide to Sustainable Building and Settlement Design. In PLEA 2016–32nd International Conference on Passive and Low Energy Architecture: Cities, Buildings, People: Towards Regenerative Environments; c2016 p. 751-756
2. Ahirrao RM. Importance of temple (Worship place) in Northern East Direction of Premises. Vasturaviraj Vastu shastra. 2017;4(1):23-32.
3. Batra N, Malik P. Vastu shastra'. A tool for stress free living and empowering homemaker psychologically, physically and aesthetically. Indian Journal of Health and Wellbeing. 2018;9(3):407-412.
4. Batra N, Mehta M. Psychological satisfaction and constraints in applying Vastu principles in homes. International Journal of Science, Engineering and Computer Technology. 2017;3(3-4):226-230.
5. Divya H, Shashi C. Identifying level of faith in Vastu principles by the home dwellers. Asian Journal of Research in Social Sciences and Humanities. 2015;5(9):21-32.
6. Halakatti Sundarswami. Reference job attitude of agricultural assistance and the discriminating characters in T and B systems. Journal of Extension Education. 1996;15:90-94.
7. Krishnarav V, Chennai G. Study of residential Vastu, Manora publications; c2008
8. Kshirsagar HS, Kotian SS, Surana SS, Kamthe CC, Lomte VM. A Survey on Vastu Shastra, AR and IoT. International Journal of Research in Engineering, Science and Management. 2019;2(5):279-280.
9. Kulkarni D, Kalkarni N. Shree Vishwakarma Puran (Ninth Edition), Pune: Uma Publication; c2009. p-34-37.
10. Patel S, Talwelkar M.Extent of satisfaction experienced by home owners on application of Vastu shastra. 2015;4(3):188.
11. Saran S, Shirodkar AD. Vastu Shastra and Feng Shui the Ancient Sciences and Their Fusion in Context of Indian Architecture. International Journal of Scientific & Technology Research. 2017;6(11):136-144.
12. Surnarayanan S, Muthu D, Venkata Subramanian C. Application of Vastu shastra in modern architecture. International Journal of Civil Engineering and Technology. 2016;7(6):686-697.