

Evaluation of kitchen in rural areas

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ABSTRACT

Kitchens belonging to nearly same socio-economic status were evaluated and comparison made of construction features with standards. There was much difference in their kitchen arrangement. It was found that carpet area of kitchens varied between 42-112.5 sq.ft. and in 43 houses kitchens were situated outside the plinth area of the house. There was a great variation of flooring, roofing and the condition of wall. Admittance of day light and ventilation to the kitchens also varied to a great extent. As regards to the space makers, in 30 kitchens there were no shelves but in 22 kitchens two shelves were present. In all the houses proper orientation was observed and no drainage facility was found. Still then, medium level of satisfaction was expressed with 57 housewives, as they were unaware of the advantages of using an ergonomically layout kitchen.

Key words : Work-triangle, Ergonomically layout.

Kitchen is the crux of the home and it should be planned and designed carefully in order to induce satisfaction and efficiency of the home maker. According to *Vastushastra*, proper placement and orientation of kitchen invite blessings and prosperity for its inmates. Studies of Varghese, (1990) indicated that Indian women spend about 5 to 7 hours a day in the kitchen for cooking and related activities, which amount to about 1/4th of their life period. The storage area and work counters not within the normal reaches of home makers and that is one of the major reasons for discomfort (Oberoi *et al.*, 1996). In view of the above, a study was undertaken in Pipli block of Puri District Orissa, to identify the lacunae regarding various general and specific construction features of the kitchens in rural areas.

METHODOLOGY

Following the random sampling technique, 20% households from five villages were selected from Pipli block of Puri district of Orissa, with almost equal socio economic status of middle income groups, making the total sample size to 100. Majority of respondents were between 30-40 years of age, educated upto M.E. standard and all of them had 6-10 family members. The study related to the year 2002-2003.

RESULTS AND DISCUSSION

General features:

It was found that, in 43 houses kitchen were situated outside the main plinth area and the distance of which varied between 2 mts to 9 mts. As regards to the carpet area of kitchen, it varied between 42 and 112.5 sq.ft. Out of which 56 kitchens (Fig. 1) had plinth area varying

between 51-60 sq.ft. In 89 kitchens, mud flooring was found and rest had cemented flooring. In 62 kitchens the walls were made out of stones, In 21 kitchens of mud and in 17 kitchens of brick. Again, it was found that 77 kitchens had thatched roofing, where breaking were also noticed in some of them.

Correct orientation was found in all 100 kitchens. As regards to the placement of doors and windows, in 27 kitchens (Fig. 2), there were no doors and windows, in 57 kitchens a single door was present and in rest 16 kitchens, there was provision of 1 door and 1 window. As regards to the grouping of kitchen, in 72 houses, they were directly opened to a small adjacent varandah which was used for eating purposes.

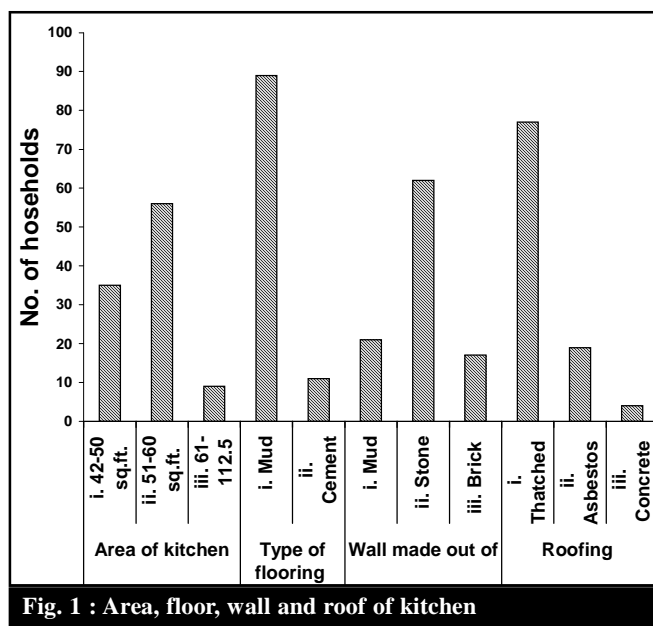


Fig. 1 : Area, floor, wall and roof of kitchen

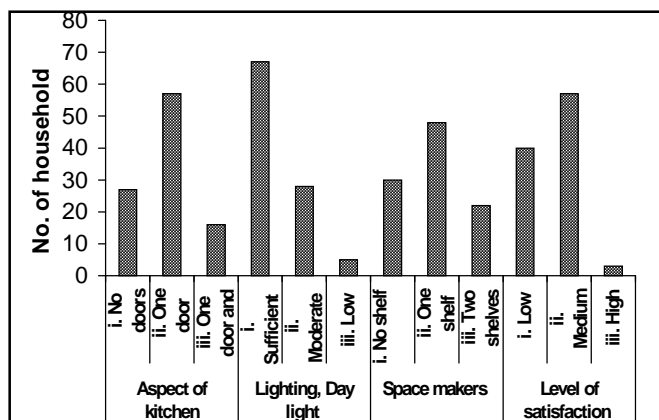


Fig. 2 : Showing aspect, lighting, space makers and level of satisfaction

As regards to the lighting facility, there was admittance of sufficient day light in 67 kitchens, as there were no doors and windows and only a shed was present as the roof. Moderate day light was available in 28 kitchens and insufficient light was noticed only in 5 kitchens.

As regards to ventilation, in 43 kitchens there was proper ventilation and in 57 kitchens ventilation was poor with little circulation of air, due to the presence of only one door in the kitchen.

Specific features:

Thirty two houses had their own source of water. They had to cover a distance of 4mts. to 42 mts to fetch water for the kitchen. As regards to the drainage facility, not in a single house a drainage channel was found inside the kitchen. So all of them had to come outside to throw up the used water.

As regards to the internal planning, no working counters were present in any of the kitchens. Only cooking area was earmarked with the placement of hearth and rest of the area was used for preparation, storage of cooked food, serving and eating purpose. In all the houses, cleaning of utensils was done outside the kitchen.

Again, it was found that there was not a single cupboard or shelf in kitchens of 30 households. Only one shelf was present in 48 kitchens and two shelves were present in rest 22 kitchens (Fig. 2). They used to keep their utensils on the floor of kitchen. Then, it was also observed that they kept their regular ingredients like cooking oils and spices near the hearth but other heavy ingredients (such as rice, dal, vegetables etc.) were kept outside the kitchen.

It was also observed that all of them had a much

bigger work-triangle which was found to be 16 mts – 70 mts.

At last the level of satisfaction was studied and was found that in 57, 40 and 3 houses, the housewives expressed their medium, low and high level of satisfaction in using their kitchens, respectively. Low level of satisfaction was attributed mainly due to mud flooring and thatched roofing where they felt discomfort mainly during the rainy season.

Conclusion:

It could be concluded that village people had a clear cut knowledge for the placement of kitchens in Ayshanya corner of the house. But some of the features, such as location of kitchen, outside plinth area, uncomfortable wall, roof and floor condition, keeping of heavy ingredients in other rooms, a distant water source, outside washing platform, lack of drainage facility inside the kitchen, absence of cupboards and shelves in the kitchen. Improper lighting and ventilation and bigger work-triangle affected their working process and efficiency and act as hindrances against the principles of work – simplification. Still then majority of them expressed their medium level of satisfaction as they were habituated in using that type of kitchens but they are not aware of the advantages of using an ergonomically lay out kitchen to increase their efficiency.

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