# The Meaning of Vertical Housing for Balinese People, the Debate between Cultural Demands and the Need for Urban Housing in Bali, Indonesia 

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#### Abstract

In the midst of fears of an increase in the conversion of agricultural land into residential areas, the implementation of housing needs program for urban communities in the region of Bali, with one solution to build a vertical housing, apparently has not been able to attract the interest of Balinese Hindus to choose residential in vertical housing. Faced with a dilemma, the economic needs and demands of indigenous culture and traditions that are believed, with the implementation of the Panca Yadnya (five ritual ceremonies), in their daily lives, is a unique local wisdom, which requires facilities even in the vertical housing. The purpose of this research is to find out what exactly is the meaning of vertical housing for Balinese who are Hindu? Because until now the Balinese have not made vertical housing as an option for their residence. With a qualitative method, through tracing Balinese perceptions and the processes of cognition, affection and cognition, from residents of vertical housing and people who need housing, it is hoped that from this research it will be known what exactly the meaning of vertical housing is for Balinese.


Keywords--- The Meaning of Vertical Housing, Cultural Demands, Housing Needs.

## I. Introduction

Vertical housing, is recommended as an alternative solution to address the problem of housing needs, and the Balinese do not really understand about what and how vertical housing. What they know through a number of existing and occupied vertical housing such as flats is understood as small, crowded housing and by sharing shared public spaces and on the other hand they recognize apartments as hotel accommodations (Seek 1983, Setiawan 2010, Nurjana 2020).

Balinese people whose lives are based on the concept of Tri Hita Karana, strongly believe that the way to achieve a harmonious relationship with God, humans, and the natural environment, is realized through bakti (devotion) way through the implementation of traditional traditions of Panca Yadnya culture. So to make it happen every Balinese family needs a holy place or merajan with the concept of Tri Lingga (Dwijendra 2003, 2008, 2009).

In the midst of the pros and cons of the presence of vertical housing in Bali as an alternative, research was

[^0]carried out by distributing questionnaires to residents of vertical housing in Bali, and interviewing religious, political and authority figures, residents, people who need housing, and observing occupancy behavior. in vertical housing, as well as through talk shows in electronic and print media, with this method it is hoped that this study will be able to discover what and how vertical housing really means to Balinese.

The home for Balinese Hindus is in addition to functioning as a general home (Despress 1991), but has a function of carrying out Hindu religious ritual activities (Bagus 1980, Dwijendra 2010, Nutrisia 2008, Dharmayanty 2019, Nurjani 2019). As part of community members, the house is also a pawongan part of a village with its traditional structure (Rapoport 19769, Parimin 1996, Pitana 1994, Peters 2014, Pambudi 2020) (Figure 1).


Figure 1: Traditional Balinese House Architecture
Source: https://www.senibudayaku.com, 2019.
The house for Balinese is a place where family members interact with their ancestors, which in every family is manifested in the Hyang Pertiwi/rong three building in the sanggah/merajan (shrine) with a minimum of Pelinggih Tri Lingga (Ngoerah 1981, Dept. Culture 1993, Dwijendra 2008, 2014, 2014, 2019, Winanti 2009). For Balinese, this attachment to ancestors has led to an unlimited connection with the past from generation to generation, only manifested in the structure of the level of worship, starting to merajan (shrine), then in a larger context there is Merajan Agung (big shrine), then even greater there are Mother Temple such as Pura Ibu, Pura Panti and so on (Shils 1971, Kagami 1983, Kaler 1983, Wiana 1994, Ngakan 2017).


Figure 2: Typical Design of Vertical Housing in Indonesia
Source: https://www.housing-estate.com, 2019.

The vertical housing referred to in this study is a group of houses inhabited by individuals and/or nuclear families, in housing units arranged horizontally and vertically, which are equipped with housing facilities and infrastructure in a neighborhood/plot of ownership and are well managed (Seek 1983 , Dwijendra 2020).

Vertical housing is a group of houses built as a multi-story building in an environment that is functionally arranged horizontally and vertically, which is equipped with shared parts, shared land and shared objects (Figure 2). Meanwhile, in the Urban area, housing needs for urbanites continue to increase (Ziegert 1988), based on data year 2015 the Bali Provincial Housing Office, urban areas especially Badung and Denpasar lack 7500 and 8000 units (BPS Bali 2019, BPS Badung 2019).

In expressing the meaning of an object, often through images, signs and symbols. Image is a psychological perception of the similarity of an object, a sign that can give meaning to an object, while a symbol is something that replaces something else as a result of an association, convention or even a certain event. (Gibson, 1966, Yogantari 2020).

The meaning in architecture according to Marcella (2004) is said to have two categories of meaning namely representational meaning and responsive meanings. The meaning of repetition if associated with the process of perception is the process of cognition a person receives information with the five senses and experience, until it can be understood. Responsive meaning can be interpreted as a response/acceptance of a person/hopes/desires of an object that is in the cognition and the process of perception is in the stages of one's affection on an object (Rapoport 1977, 1985, 2003, Proshansky 1983).

In this research object representational meanings can be debated into presentation meanings which pay more attention to the appearance/shape of an object and referential meanings which are more observing the usefulness/value of an object (Daglin 1975, Altman 1985, Wood 1993). This research emphasizes the significance of the function of vertical housing compared to the original home in Bali. This referential meaning process is passed through the process of perception of vertical housing residents who are already inhabited/known by the Balinese people.

## II. Research Method

This study uses qualitative research methods, with data collection techniques through questionnaires to residents and people who need housing, with the distribution in residential areas with many boarding houses (Cresell 1977, Brubaker 2000). Interviews were also conducted with residents, policy makers, community leaders, traditional leaders and political figures in the region (Siregar 2005, Widiastuti 2017, Adhika 2020). Using conventional perception theory will further explore the referential meaning of vertical housing in Balinese perception.

## III. RESULTS

Balinese people who are very attached to their traditional lives, as individuals and social groups, prioritize the use of vertical housing, and the values contained therein. The attachment to the Panca Yadnya tradition of a person/family involving their social group (dadia or banjar) is continuously hereditary until now is still very strong (Koentjaraningrat 1985, Dwijendra 2008).

In fact, in the community, from 2011 the government program by building a million households through
alternative vertical housing for the public has not been successful. This can be seen from the vertical housing that was built by the Provincial Government, according to the management data, from the capacity of 280, there were only 71 people ( $25.3 \%$ ) and almost all were not yet married. Although this facility is given free of charge. From the interview results in 2019, this is due to several factors, namely the physical shape of the house is the same as the shape built by the Vertical Institution (POLDA, Immigration, TNI) but structurally, civil servants have the freedom to choose their housing because the service is direct to the community, another factor is because it contains the element " forced "because of the attachment of the command line that demands acceleration towards the institution in unexpected situations.

In the case of the vertical housing case it can be said to have failed to attract the interest of employees with families to inhabit it. In the end $75 \%$ was occupied by contract employees who were still single. This means that Balinese do not feel comfortable to expect vertical housing as their preferred residence.

According to Rapoport (1969), it is said that the house is a cultural phenomenon and its management is strongly influenced by the environmental culture and environmental quality where housing is located. This is proven by the results of a survey of the distribution of questionnaires to people who are in need of houses and who have occupied vertical housing, apparently according to them vertical housing has not been able to provide facilities for Balinese cultural activities in general, and according to them that vertical housing is only temporary housing, and not a hope as the preferred home of the Balinese Hindu community going forward.
"Home is the palace where one lives, especially, with one family in the district or country where one was born or where one has lived for a long time or to which one feels" (Barnet, 1984: p.3). According to Barnet (1984), in general vertical housing can be interpreted as a house because a person can be born and live for a long time of at least 30 years with a family with memories from birth.

But for the Balinese, from the results of interviews with spiritual figures, the house is not only a place to live, but also as a place to carry out ritual rituals that function to keep ancestral spirits in order to keep their relationship with ancestral spirits (bounding to anchor). This ritual activity called Dewa Pitara Prastita is not possible in a vertical housing, because it is personal privacy, and cannot be carried out together with different families of people. Thus, vertical housing is meant only as a temporary house, and not a permanent residence forever and cannot be used as a place/status for the Spirit of Ancestors (see Figure 3 and Table 1).


Figure 3: Vertical Housing Problems in Bali, Indonesia
Source: https://www.tribunnews.com, 2019.

Table 1: Activities of Balinese in Vertical Housing through the Perception Process

| No | Perception Process Activity | Cognition /Understanding through Five Senses | Affection (Response Made) | Cognition (Actions Taken) | Remarks |
| :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | Domestic Activities: <br> - Sleep <br> - Eat Drink (kitchen) <br> - Family room <br> - Dry and laundry rooms <br> - Living room | - A small house (2 bed rooms $3 \times 3$ and $2.5 \times 3$ ) meter, and multifunctional facilities. <br> - Exposed sunroom looks dirty. <br> - Circulation facilities in units must share. <br> - Demand very high tolerance in utilizing shared space. | - Learn by adapting to the unit received. <br> - There is no choice "forced". | - Adjust the size and amount of furniture so it is not tight. <br> - Set the time of certain space utilization. | - "Forced" and obliged to adjust activities to the facilities available. |
| 2 | Social activity: <br> - Socializing with people in the area. <br> - General social activities. <br> - Customary and traditional group activities (banjar). | - Sports and service activities. <br> - Joining the funeral activities is not available. | - Part of manager's settings. <br> - Administrativ e activities. <br> - Heterogeneo us hosts. | - Make use of the space available by the manager only ( $6 \times 4$ ) meter. <br> - Forms a joyous banjar and goes home. | - There is a compulsion to accept what we are and go home (kampong). |
| 3. | Customary and Cultural Activities: <br> - Ritual Dewa Yadnya. <br> - Ritual <br> Manusa <br> Yadnya <br> - Pitra Yadnya (Ngaben, Memukur) <br> - Dewa Pitara Prastita | - Can be carried out outside the dwelling but within the area if Padmasana and Bale facilities are provided. <br> - Can be carried out in public facilities (local crematorium/setra <br> - Can be held mass and outside the Home. <br> - Must be implemented at home. | - Only carry out daily rituals. <br> - Rarely and never before have bodies departed from vertical housing. <br> - A choice waiting for the right time in the village. | - Implement at home because it requires a large family in the process. <br> - Return to the village in an adat social group. <br> - Return to the village. <br> - Must be carried out in the village. | - Cannot be implemented in vertical housing, because it requires an adat social organization. <br> - It cannot be implemented in vertical housing, because there is no way to have Tri Lingga in the unit that only has 2 bedrooms and not the original house. |

Source: Questionnaire and Interview Survey, 2019.
Thus the vertical housing gives a referential meaning only to temporarily shelter from natural and other security disturbances, and not a house that is expected to last forever. Vertical housing is not possible to provide Pelinggih Kemulan from all the various family hurdles, except Padmasana which is universal. Thus the relationship with Leluhur (Bounding to Ancestor) is very unlikely to be carried out in vertical housing because it is very personal.

## IV. CONCLUSION

Based on the discussion above, it can be concluded that vertical housing for Balinese is a temporary residence during productive periods and/or investment that cannot be functioned as a place for carrying out non-personal religious rituals and is related to each family's bounding to ancestor process. It is clearly concluded that meaning home for the Balinese is a place that is able to attract family members, and return to remember their ancestors. The house is a place where one's soul/spirit is regained. Bounding to the processor cannot be forgotten though, being born or residing outside of Bali, at the time of the Ngelinggihang Pitara ritual, is the belief to return to its origin.

## REFERENCES

[1] Adhika, I Made and Dwijendra, Ngakan Ketut Acwin. (2020). Selfie Photos Area and Its Implication to Water Availability and Social Culture in Wanagiri Village, Bali Indonesia. In: International Journal of Psychosocial Rehabilitation, Vol. 24, No. 4, DOI: 10.37200/IJPR/V24I4/PR201652.
[2] Altman, I, and Werner.C (1985) Home Environments Human Behaviour and the Environment, New York, Plenum Published
[3] As, Daglin. (1975). "Observing Environmental Behavior. The Behavior Setting" dalam W. Michelson (Ed.), Behavior Research Methods in Environmental Design (Community Development Series, Volume 8) Stroudsburg, Pennsylvania: Dowden Hutchinson and Ross, Inc. hal 280-300.
[4] Bagus, I G.N. (1980). Balinese Culture. Jakarta: Djambat.
[5] BPS Badung (2019). Badung dalam Angka 2019. Mangunpura: BPS Kabupaten Badung.
[6] BPS Bali (2019). Bali dalam Angka 2015-2018. Denpasar: BPS Provinsi Bali.
[7] Brubaker, R \& Cooper, F (2000) 'Beyond identity,' Theory and Society, vol. 29, no. 1, pp. 1-47. Clifford, J (1994) The predicament of culture: twentieth-century ethnography, literature, and art, Harvard University Press, Cambridge. Covarrubias, M (1974) Island of Bali. Kuala Lumpur: Oxford University Press.
[8] Creswell, W John. (1977). Qualitative Inquiry and Research Design (coosing among five approaches second edition)
[9] Department of Culture. (1993). Settlement as the Regional Ecosystem Unit of Bali. Denpasar: Regional Cultural Inventory and Documentation Project.
[10] Despres, C. (1991). The Meaning of Home; Literatur rivew and direction for future research and theoretical Development; Journal of Architecture and Planning research, 8 (2), pp 96-115.
[11] Dharmayanty, Ni Luh Putu Dessy, Paturusi, Syamsul Alam, Dwijendra, Ngakan Ketut Acwin, and Dewi, Ni Ketut Agusinta. (2019), Development and Behaviour Response of the Balinese Inhabitting in Denpasar City and Badung Regency, Bali-Indonesia. In: Journal of Social and Political Sciences, Vol.2, No.2, 455-467.
[12] Dwijendra, N.K.A. (2003). Perumahan dan Permukiman Tradisional Bali. Permukiman "Natah", 01(01), 824.
[13] Dwijendra, N.K.A. (2014). Affordable Housing Provision Projects in Bali, Indonesia: Improving Quality and Cultural Acceptability. (Doctoral), Curtin University. Retrieved from http://hdl.handle.net/ 20.500.11937/2042.
[14] Dwijendra, N.K.A. (2019) 'Transformation of Traditional Housing in Bungaya Village,Karangasem Bali, Indonesia', International Journal of Current Advanced Research, 08(01), pp. 16793-16798.
[15] Dwijendra, N.K.A. and Sueca, Ngakan Putu. (2019). The Determinant Factor of Home Transformation in Bali, Indonesia, In: The Journal of Social Sciences Research, Vol. 5, No. 12, pp 1855-1860.
[16] Dwijendra, N.K.A. (2019), Morphology of House Pattern in Tenganan Dauh Tukad Village, Karangasem Bali, Indonesia. In: Journal of Social and Political Sciences, Vol.2, No.1, 173-181.
[17] Dwijendra, N.K.A. (2020). Identity Struggle Perspective in Car-Shaped Shrine in Paluang Temple, Nusa Penida Bali, Indonesia, In: International Journal of Psychosocial Rehabilitation, Vol. 24, No. 4, DOI: 10.37200/IJPR/V24I4/PR201653.
[18] Dwijendra, N.K.A. (2003). Bali Traditional Housing and Settlements. Journal of Settlement Natah, Vol. 1 No. February 1, 2003: 8-24.
[19] Dwijendra, N.K.A. (2008) Arsitektur Bangunan Suci, Berdasarkan Asta Kosala Kosali, Denpasar: Udayana University Press.
[20] Dwijendra, N.K.A. (2008) Arsitektur Rumah Tradisional Bali, Berdasarkan Asta Kosala Kosali, Denpasar: Udayana University Press.
[21] Dwijendra, N.K.A. (2009) Arsitektur Kebudayaan Bali Kuno, Denpasar: Udayana University Press.
[22] Dwijendra, N.K.A. (2010) Arsitektur Tradisional Bali di Ranah Publik, Denpasar: Udayana University Press.
[23] Kagami, H (1988). Balinese traditional architecture in process, Inuyama: the Little World Museum of Man.
[24] Kaler, I G. K. (1983). Shattered Points about the Customs of Bali. Denpasar: Bali Agung.
[25] Koentjaraningrat. (1985). Culture, Mentality and Development. Jakarta: PT. Gramedia.
[26] Marcella Laurenns, Joice. 2004. Arsitektur dan Perilaku Manusia. PT Grasindo.
[27] Ngakan Made Anom Wiryasa \& Dwijendra, N.K.A. (2017). Institutional Structure Models in Implementation of Spatial Planning. Journal of Sustainable Development; Vol. 10, No. 4; 2017 ISSN 1913-9063 E-ISSN 1913-9071. Published by Canadian Center of Science and Education.
[28] Ngoerah Gde Ngoerah IGN, at all. 1981. Arsitektur Tradisional Bali.
[29] Ni Made Emmi Nutrisia Dewi, Dwijendra, N.K.A. (2018). 'Transformation of Bale Daja Architecture in Housing of Sading Village, Badung, Bali, Indonesia', International Journal of Current Advanced Research, 07(6), pp. 13221-13225.
[30] Nurjani, Ni Putu Suda, Dwijendra, N.K.A. (2020). How Traditional Balinese Houses Can Adjust and Cater for International Tourist in the Canggu Area, Bali Indonesia? In: International Journal of Psychosocial Rehabilitation, Vol. 24, No. 03, DOI: 10.37200/IJPR/V24I3/PR201901.
[31] Nurjani, Ni Putu Suda, Paturusi, Syamsul Alam, Dwijendra, Ngakan Ketut Acwin, and Putra, I Dewa Gede Agung Diasana. (2019), Morphology of Backpacker Dormitory Inside Traditional Balinese House, Canggu Village, Bali, Indonesia. In: Journal of Social and Political Sciences, Vol.2, No.3, 514-521.
[32] Pambudi, Y.S., Purnama, Y., Dwijendra, N.K.A., Kholifah, S., Caniago, A. (2020). The effect of internal factors on the improvement of the role of the community and quality of waste bank management "Mekar Asri" in Rt. 5 RW. XVI, Mojosongo Sub-district, Surakarta city, Indonesia. In: Test Engineering and Management, Vol. January-February 2020, Page No. 14695-14703.
[33] Parimin, A.P., (1986). Fundamental Study on Sacred-Profane Spatial Formation Concepts in Bali. Dissertation at Osaka University, Japan.
[34] Peters Hendrik Jan; Wardana Wisnu. (2014). Discovering the Spirit of Bali (Costumary Village as Icon of Tri Hita Karana).
[35] Pitana, I Gede. Editor. (1994). The Dynamics of Balinese Society and Culture. Denpasar: BP Offset Printing.
[36] Proshansky, HM et al. (1983). 'Place identity: physical world socialization of the self', Journal of Environmental Psychology, vol. 3, pp. 57-83.
[37] Rapoport, Amos. (1969). House Form and Culture. Engelwood Cliffs, New York. Prentice Hall.
[38] Rapoport, Amos. 1977. Human Aspect of Urban Form. Oxford Pergamon Press.
[39] Rapoport, Amos. 2003 Culture, Architecture, and Design, Chicago; Locke Science pub.co.
[40] Rapoport,Amos. 1985. Thinking about Home Environments; A Conceptual Framewoek; in Altman, I, and Werner.C.M. (eds) Home Environments, New York; Plenum Press,pp 255-281.
[41] Seek, N.H. (1983). Adjusting housing consumption: Improve or move. Urban Studies, 20(4): 455-69.
[42] Setiawan, Haryadi. B. 2010. Arsitektur, Lingkungan dan Perilaku, pengantar metodologi dan aplikasi. Gajah Mada University Press.
[43] Shils, E (1971). 'Tradition', Comparative Studies in Society and History, vol. 13, no. 2, Special Issue on Tradition and Modernity, pp. 122-159.
[44] Siregar, Laksmi G. (2005). Fenomenologi dalam Arsitektur. Universitas Indonesia Press.
[45] Wiana, Drs I Ketut, (1994), Pelinggih di Pamerajan, Upada Satra di Denpasar.
[46] Widiastuti, Syamsul Alam Paturusi \& Dwijendra, Ngakan Ketut Acwin. (2017). Cultural Value Transformation in Traditional Market Spatial Planning in City of Denpasar, Gianyar and Klungkung - Bali, Indonesia. Journal of Sustainable Development; Vol. 10, No. 4; 2017 ISSN 1913-9063 E-ISSN 1913-9071. Published by Canadian Center of Science and Education.
[47] Winanti, Ni Putu. 2009. Pura Keluarga dan Pratima (Meneguhkan Keyakinan Kepada Tuhan).
[48] Wood RE (1993) 'Tourism, culture and the sociology of development,' in K Hitchcook \& Parnwell (eds), Tourism in South-East Asia, Routledge, London, pp. 48-70.
[49] Yogantari, Made Vairagya and Dwijendra, N.K.A. (2020). Visual Exploration Using Acrylic Paint on Used Fashion Items for Sustainable Use. In: International Journal of Psychosocial Rehabilitation, Vol. 24, No. 03, DOI: 10.37200/IJPR/V24I3/PR201902.
[50] Ziegert, A.L. (1988). The Demand for Housing additions: an empirical analysis. AREUEA Journal, 16(4): 47992.


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