

CLASS FOOTPRINTS IN THE LANDSCAPE

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0 Abstract

This paper reports on results of a comparative study among very diverse societies, from pre-state cases to a contemporary formation, concerning the relationships between class structure and settlement spatial patterns. It is obvious that there are many social traits that cannot be retrieved *purely* from the built landscape. It is less obvious, though, to what extent it is actually possible to retrieve *structural* characteristics of social formations, which recurrently imprint themselves on the ground along history.

Architectural literature often stresses the "arbitrariness" of settlement forms, which would supposedly "mean" different things, in different circumstances. It will not be denied that there exist architectural "conventions", or that there is a "semantics" which qualifies each and every place societies build. Nevertheless the actual possibilities of movement of people along barriers and permeabilities on the ground impose strong limitations on such conventions. Different ways of using and assessing the city by different social classes in a contemporary setting (Brasília), offer interesting clues concerning this.

By means of Space Syntax analytic categories, it will be shown not only that "classness" equals physical discontinuities, blind spaces and hierarchies on the ground, but that these are precisely the spatial attributes which are mostly praised by the dominant social layers.¹

1 What sort of "perversity"?

There is reasonable consensus that the social-spatial formation of the Federal District in Brazil, in which Brasília is located, is "perverse", in the sense that it imposes strong social costs particularly for the low income people who live here. However, there is little consensus, if at all, as to the degree in which such "perversity" is related to the physical morphology of the place. Some argue that we simply find here the socio-spatial segregation characteristic of Brazilian society, which reproduces itself not only in the Federal District, but everywhere in the country (Machado & Magalhães, 1985). Few have tried to discuss the peculiarities of the formation we find in the Capital. When this has been done, conclusions seem unsatisfactory for the lack of clear separation, for analytical purposes, of a) settlement spatial patterns, b) encounter systems, and c) general socio-economic traits of the population who lives here, by

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means of which relations might be established among these aspects. I have elsewhere offered a detail description of the spatial patterns found in the Federal District (Holanda, 1997a). Let us briefly recall it.

2 Separation, insulation, blindness

Consider the spatial attributes we find at the Esplanade of Ministries, in Brasilia (Fig. 1): a) the place is globally constituted as a "morphic peninsula", attached to the Pilot Plan, which in turn is strongly separated from the rest of the spatial formation of the Federal District; b) all buildings are isolated units - there is no single instance of aggregation of individual cells; c) the Esplanade is built on an artificial *plateau* five metres above the surrounding ground level; d) the amount of open space by far surmounts the space occupied by buildings, which implies a very large permeability indeed, for movements across space in all directions; e) there is a great proliferation of blind walls, which, together with other attributes previously referred to, generate a large number of blind spaces; f) a strong insulation of building interiors from exterior spaces is obtained, by means of flyovers, tunnels, ramps, pools. I have elsewhere characterised these traits as constituting the "paradigm of formality", as opposed to the "paradigm of urbanity", constituted by traits as contiguity, direct relationships between interior spaces and exterior ones, public spaces intensely "fed" by doors of individual buildings everywhere etc. (for a more detailed description see Holanda, 1997a).



Fig. 1. Esplanade of Ministries, Brasilia

Mutatis mutandis, the syntactic attributes we find in the Esplanade of Ministries are practically the same we predominantly find all over the Pilot Plan, some of them even more explicitly realised, as the large open space surface in-between buildings, which is higher in the residential superblocs than in the Esplanade. Moreover, these are not only *local* attributes of specific areas, but as well *global* attributes of the Federal District, particularly in what concerns the vast "no-man's land" separating both central nucleus - i.e. Pilot Plan - from periphery, and the various satellite cities among themselves. Nevertheless, it must be pointed out that there are many "non-conforming bits" which contradict the morphological trio above, in fact "urbane" enclaves which have been building up along the years, and which have significantly changed the character of the Pilot Plan since its beginning.

But the point is: what are the social implications of these patterns, for those who live here, or for those who eventually visit the city? Do these implications vary according to social class? Do these patterns imply a peculiar social structuration? On the basis of the study to be reported (Holanda, 1997b), I have reached the belief that, in order to understand such a contemporary reality, we profit a lot by looking at longer term history. I will only refer the reader to some of the findings of that study, more specifically to the co-variations that have been observed between a certain trend of spatial patterns and the way relationships are established among diverse social categories that have inhabited them. The spatial patterns I am referring to, constitute again a story of separation, insulation and blindness, in all cases, with some minor variations.

3 With a little help from history

Consider first the Classic Maya Ceremonial Centres, evolved from the 1st to the 8th century of our era (Fig. 2). Settlements were constituted by isolated built units, temples perched on top of pyramids, "palaces" built on artificial platforms high above ground level, "squares" which are simply defined by pyramid stairs or ramparts (and not by buildings with entrances directly connecting exterior with interior spaces), house compounds also built on platforms, albeit lower than the former, and dispersed over a large areas etc. Socially we have a society with layers strongly insulated from each other: commoners tilling the fields, an elite living in the centres, full-time dedicated to specialised knowledge concerning calendar, writing, arts, religious activities. True, there was commoner's participation in the activities of the centres, but only by means of a strongly hierarchical religious system, and during which there was a transmutation of the commoner from food-producer to an exclusive symbolic agent. Differentiation between commoner and elite reproduced itself in the domestic realm: cleavages between genders were profound, from participation in religious ceremonies, to attitudes constituting family mores. Following Hillier & Hanson (1984), we witness here strong *class differentiations*, by means of radically distinct forms of *social solidarity*, opposing, in a lower instance, men and women, and, in a upper one, commoner and elite.



Fig. 2. Tikal.

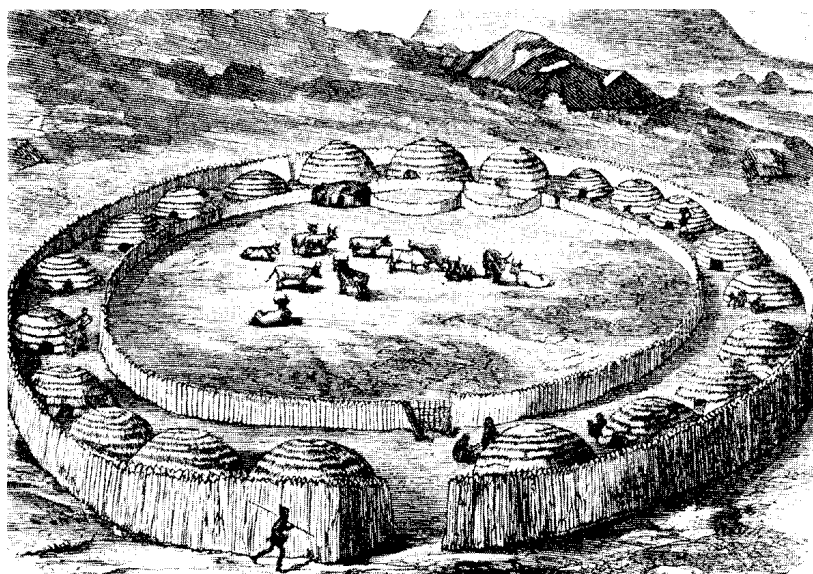


Fig. 3. Zulu *kraal*.

The Zulu of South Africa constitute another chapter of the same story. Zulu *kraals* are isolated structures which scatter over the landscape (Fig. 3). Separation is here even more complete than among the Maya, for there is no trace of any sort of agglomeration of built units, even to form the blind spaces of the "squares" in-between pyramids. *Kraals* replicate in isolation all over the country, varying only in size and social practices found therein, according to layer of social hierarchy to which the head belongs, up to the king. At the scale of the *kraal* itself, separation repeats itself, now in the guise of the various wives of the headman, who work, cook and eat separately. Socially the split is thus even more rigorous than among the Maya, although related to different sorts of practices. However, the latter still belong to the super-structural level of social order: if before we had religion as the ordering device, now we have military training. In fact, so strong is the cleavage, that Zulu adult men are almost exclusively "super-structural beings": they dedicate themselves full-time to war and politics, and production is in the hands of women and of male youngsters and old men. There is a peculiar trait of adult men which is worth noting, and which will be found again in Feudal France, as we shall see: their transpatiality, by which they inhabit not only different *kraals* along one's life time, but also different huts in the family *kraal*, rotating among his various wives, contrasts sharply with the spatially fixed women, strongly separated among themselves by a collection of devices, both spatial and social.

Finally, in Feudal France, we perhaps witness one of the most transpatial and "symbolic" dominant classes found in the historical record. They inhabited their castles, specialised places for ceremonies, military training, the seat of justice, the source of all visible authority (Fig. 4). They constituted one of the three layers of French society at the time, the other two being "those who prayed" and "those who worked". The last two inhabited the monasteries, on the one hand, and the villages and towns, on the other. As "those who prayed" were as well from noble origin, the clear split in Feudal France was between the nobles, inhabiting the isolated structures of castles and monasteries, and "those who worked" - i.e. peasants and burghers - inhabiting villages and towns. The insulation of the noble class brought together the fact that they were made knights only by means of hereditary privilege, and the fact that they were a specialised class of warriors, having nothing to do with the material production of society, which, when somehow related to them, was delegated to stewards and bailiffs. This

peripatetic class *par excellence*, lived their lives from castle to castle, their own or those belonging to relatives and/or allies, in which training or ceremonial tournaments took place.

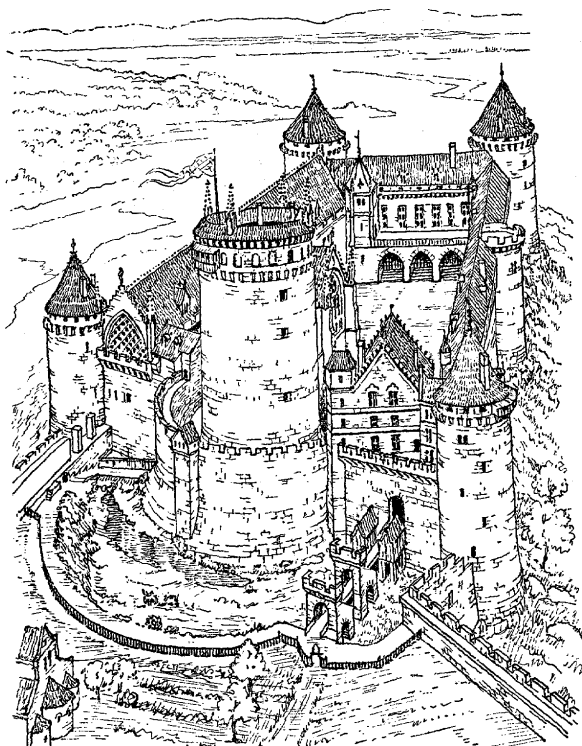


Fig. 4. Castle of Coucy, 1225-30 AD. Reconstruction after Tuulse.

Notwithstanding the empirical variation of the social practices carried out by the respective social segments of the societies examined in the three case-studies above, we have the same story of class insulation *cum* physical separation taking place. The consistence thus obtained suggests that the morphological trio commented above - separation, insulation and blindness - has to do historically with formations in which we find great differentials in the forms of social solidarity, which comes along with strong differentials in the access to knowledge and power. In turn, other case-studies not reported here (see Holanda, 1997b) reinforce the idea that the opposite also holds: smaller physical insulation usually comes along with weaker barriers among social layers, by which there is not only a greater interchange of roles concerning the various types of social practices (infra- or superstructural in character), but a greater share in power as well.

Now the point: is it possible to establish some relations between class attributes verified in the cases above, and a contemporary situation as the one found in Brasilia? Are there ethical lessons we can learn from the above, and use in our action upon the complex reality of the Brazilian Capital? In search for an answer, I will comment on the findings of an inquiry realised in the Federal District, by which we have tried to characterise class attributes, including the way people use and assess the city.

4 Private and public spheres

We have carried out an inquiry with people living in different areas and belonging to different social strata (297 home interviews were made, in five distinct residential environments). Our

inquiry has allowed the identification of such styles, by means of the encounter systems which are established along the social spectrum we have here. This was done basically through two different sorts of information: a) type of places which are used in leisure time, according to social class and income level, and b) category of people that constitutes one's group of friends (Tables 1 and 2). As follows, some comments on the picture thus obtained.

Table 1. Use of places in leisure, per class and income levels.

TYPE OF PLACE	INCOME: UP TO 5 MINIMUM WAGES		INCOME: MORE THAN 5 MINIMUM WAGES	
	MANUAL WORKERS	MIDDLE CLASS	MANUAL WORKERS	MIDDLE CLASS
One's own home	60.0	45.5	60.0	47.2
Other 's homes	20.0	13.6	20.0	24.5
Public space	5.7	18.2	40.0	23.6
Irrestrictive access (freq)	-	22.7	6.7	16.0
Irrestrictive access (reg)	17.1	27.3	6.7	27.4
Restrictive access (freq)	2.9	4.5	13.3	14.2
Restrictive access (reg)	5.7	22.7	26.7	20.8
Leisure in the neighbourhood	79.4	45.5	66.7	29.2
Leisure outside the neighbourhood	11.8	31.8	20.0	49.1

Observation:

The income levels were divided into two categories: up to 5 minimum wages, and more than 5 minimum wages. This is a traditional threshold adopted in Brazil as a reference for family financial support with public funds. In October 1994 (the time the interviews were made), the minimum wage in Brazil was the equivalent to US\$ 70.00. In December 1998, it was US\$ 108.00.

Table 2. Group of friends, per class and income level.

GROUP OF FRIENDS	INCOME: UP TO 5 MINIMUM WAGES		INCOME: MORE THAN 5 MINIMUM WAGES	
	MANUAL WORKERS	MIDDLE CLASS	MANUAL WORKERS	MIDDLE CLASS
Relatives	42.9	27.3	26.7	36.8
Neighbours	31.4	18.2	33.3	10.4
Work mates	5.7	22.7	20.0	24.5
School mates	2.9	4.5	-	8.8
Group structure: same people	73.5	45.5	60.0	56.6
Group structure: new people	26.5	54.5	40.0	43.4

Encounter systems within the *same* class presents, of course, some variations, according to income levels, but invariances are much more significant. This demystifies some traditional propositions concerning the behaviour of the poorest segments of the population as being de-

terminated essentially by their buying power: some fundamental social mores are kept, for the same class, even when income levels increase significantly.

Manual workers use their own homes much more than the middle class. The same happens with the use of public space, more intense among the manual workers than among the middle class, but here an interesting qualification is needed. Among the manual workers there is a great difference in quotations according to income level: 5.7% and 40.0%, respectively. It may as well be that daily and random use of public space itself seems to present different modalities. It is possible that there were few declarations of leisure time in public space, in the former case, because the presence of the people in the streets has more to do with the instrumentalities of daily life than with the entertainment of encounters for their own sake. At the very least, it has to do with leisure in such a way imbricated with the practicalities of life as not to be identified with leisure as such.

Quotations about going to closed places of irrestrictive access (night clubs, restaurants, cinemas, theatres etc.) also reveal interesting features: there are far greater number of quotations by the middle class, than by the manual workers: 22.7% and 16.0%, for the two income levels, respectively, in the former, and 0.0% and 6.7%, for the two income levels, respectively, in the latter.

Let us now examine the nature of the group of friends (*Table 2*). Relationships with relatives do not differentiate the two classes clearly, but the relationships with neighbours indeed do: manual workers refer to the latter in more than 30% of the cases, for both income levels, while middle class does this 18.2% of the cases for the first income level and 10.4% for the second, defining clearly transpatial tendencies. The relationships with work mates also differentiates the two classes, in the sense that, independent of income, these relationships are high for the middle class, but they will only be high for the manual workers when the income level is also high. This also confirms the predominance of transpatial relations for the middle class, independent of income. In the case of the school mates, such consistency repeats itself, although in less significant ratios: in the two income levels, the cases of the manual workers are clearly in smaller numbers, compared to the cases in the middle class.

5 Unanimous, but not quite

Against the most popularised critical evaluation of Brasilia, by which everybody would supposedly dislike the city "for want of street corners" (for example Holston, 1993), this is certainly not the significantly statistical view held by its inhabitants - and this is not to say that the plea for greater urbanity is completely lost. A summary of such results is offered as follows (for a complete report see Holanda, 1997b).

First, in terms of the global assessment of the city, we are clearly facing an "apologetic hegemony": to live in the Federal District is considered as "good" or "very good" by the majority of social classes or income levels (*Table 3*). Second, this "middle class paradise", as more often than not it is referred to, is overall more praised by manual workers than by middle classes (among the latter, approval increases markedly with income).

Now in this sort of inquiry it is always difficult to disentangle spatial from non-spatial reasons related to the evaluation, as some authors have correctly pointed out (e.g. Marques & Loureiro, 1998). A way to somehow bypass such a problem was to ask people to identify the *problems* and *qualities* of the places under consideration. Through this, and notwithstanding

that “apologetic hegemony”, different stances on the city according to social class have been revealed. Let us first consider the identification of problems, as pointed out by interviewees.

Table 3. Assessment of the city, according to social class and income level.

ASSESSMENT	INCOME: UP TO 5 MINIMUM WAGES		INCOME: MORE THAN 5 MINIMUM WAGES	
	MANUAL WORKERS	MIDDLE CLASS	MANUAL WORKERS	MIDDLE CLASS
Very bad + bad	-	9.5	6.6	1.0
Good + very good	97.1	66.7	93.4	83.7

In the interviews, we did not, on purpose, specify the *type* of problems we were asking people to identify: they were completely free to indicate any sort of problem they believed it was worth pointing out. It is thus important that, for both classes, the two main problems are urbanistic ones: “transportation” and “bad accessibility” occupy the first two places in the list, for both classes - the only difference is that they change places, according to class (*Tables 4 and 5*). Public transport is considered “bad” or “very bad” by 35.5% of the people who use it, and “periodicity”, “convenience” and “cost” (the highest fares in the country), are the main reasons for such negative assessment. Social discourse thus confirms the diagnosis of technical discourse, by which it has been pointed out that we have, in Brasilia, a ratio of 1.0 passenger per kilometre of bus lines, whereas in other Brazilian cities of similar size, this ratio jumps to 2.6 (CODEPLAN/SEPLAN/GDF, 1991). Such problem is structurally related to the land use pattern we have in Brasilia: with such low densities, discontinuities of the urban tissue, and zoning, there is no economically viable public transport solution.

Table 4. Main problems and qualities of the city for the middle class.

PROBLEMS	QUOTATIONS (%)	QUALITIES	QUOTATIONS (%)
Bad accessibility	18.6	Availability of services	15.3
Transports	9.3	Quietness	13.1
Climate	8.5	Landscape design	11.7
Safety	7.8	Generous spaces	9.5
Availability of leisure	7.8	Good accessibility	7.3

Specifically under the point of view of the manual labours, “cost of life” is among the five more important problems. Although in a more indirect way, again here we find relations with the city’s spatial order. Land prices in Brasilia are 2 to 3 times higher when compared to areas of similar social status of other Brazilian cities. Such prices are largely a result of “monopoly rent” (Gonzalez, 1985) determined by the relatively small amount of available land in the vicinities of the more privileged areas as far as the existence of jobs and services is concerned. This is typically what occurs with the Pilot Plan in its isolation in relation to the satellite cities. This accordingly implies higher costs of the built space, which in turn implies higher costs of the services it houses.

Table 5. Main problems and qualities of the city for the manual workers.

PROBLEMS	QUOTATIONS (%)	QUALITIES	QUOTATIONS (%)
Transport	16.7	Availability of jobs	25.0
Bad accessibility	14.3	Quietness	15.0
Availability of leisure	14.3	Sociability	10.0
Safety	11.9	Climate	10.0
Cost of life	9.5	Availability of services	7.5

As to the qualities, the aspects which have been quoted in the interviews illustrate better the different points of view about the city. For the manual workers, I have confirmed in great measure the conclusions reached by a previous study by Machado & Magalhães: except for “quietness”, which is somehow related to the spatial order, the main qualities are related to “life chances” - i.e. “jobs”, “services”, “sociability” -, not to the city’s urbanism (Machado & Magalhães, 1985). Concerning the middle class, however, the picture is a rather different one, for Brasilia’s urban space peculiar attributes are explicitly praised: “good accessibility” (for an intensely motorised population, of course), “landscape design” and the “generosity of open spaces”. There is an apparent paradox here, for those who best praise the open spaces, are exactly those who less use them, as we have seen. But it just happens that in Brasilia, as anywhere else, the “use” that middle class makes of open spaces is essentially symbolic: large empty spaces constitute the other side of the coin of an essentially transpatial life-style. Furthermore, there is an important ethical implication here: although more systematic work is still wanting in this field, it is reasonable to hypothesise that those who inhabit the most generous spaces of the city are exactly those who pay less for it. For even considering the high income levels found in the Pilot Plan and its immediate vicinities, it is virtually impossible for its inhabitants to pay for the real costs of the infrastructural operation of such spaces, which are, therefore, strongly subsidised by the state. We witness here a specific contribution of Brasilia’s urbanism to the well-known perverse income concentration of Brazilian society.

6 Separation, insulation, blindness - old and new

Some conjectures may be built upon this material. The recurrences observed in the longer term historical studies point to a combination between the morphological trio above and strong social cleavages. It is not only that there are very clear differentials in social solidarities in those societies, but the groups corresponding to these solidarities are both socially *and* physically strongly insulated from each other. Bringing together different social classes in all those cases is rather a matter of *representation* - as they happen in ritualised situations of whatever kind - than of actual *realisation*. We can totally dispense with any deterministic reasoning: it suffices to point out that the recurrent combination between physical and social insulation, in societies widely separated in space as well as in time, indicates that *there must be* a logic to it, that they must be part of a same phenomenon, i.e. a certain type of society. Our studies suggest that these societies present much greater social inequalities than otherwise. And, therefore, spatial separation, insulation, blindness, are constituents of such inequalities.

I might end here, and say that if this was so consistent and recurrent in the past, it must apply today as well. Indeed this is a strong argument, but we should not put such a burden on his-

tory shoulders. Specific evidence must be presented concerning a contemporary reality as Brasilia. I have argued elsewhere that, globally, i.e. considered as an element of the Brazilian spatial formation, the Capital is a constituting device of an authoritarian and impermeable state (Holanda, 1997b, particularly Chap. 6). Locally, however, the picture is not as clear-cut as the one concerning the other case-studies briefly summarised above.

I have shown that, here as elsewhere, middle class entertain a more transpatial encounter system, and manual workers are more spatially based. For this reason, Brasilia's problems as well as qualities are characterised differently by those classes, as commented. But we do not have the clear duality fixity/mobility we found in the case-studies reported above, either because manual workers also entertain, to a significant degree, transpatial encounters, or because they are allowed an actual physical mobility (which therefore overcomes the barriers imposed by the morphological trio), unthinkable to a Mayan commoner, for example. In this line of thought it might be argued that the constraints on mobility of the working class is circumstantial, and that the increase in their mobility is just a matter of time - and so, at least those inequalities arising from spatial morphology would vanish.

By the same token, if physical barriers are easily overcome today, perhaps they do not carry with them the same social implications that they did in old times. This might lead to the conclusion that the need for spatial propinquity, or, more generally, for all those traits that constitute the paradigm of urbanity is something of the past. Such is the stance of people like Webber (1964), for whom we have long entered the "non-place urban realm". The more so would be this planet in times of the Internet.

However, evidence is building up that this is not so. To quote only a couple of examples, Sennett (1974) has pictured the peculiar pathology of contemporary society as the "tyrannies of intimacy", by which public life dies together with public space. With this, the politics of the city becomes out of sight, favouring the reproduction of present class relations. More recently, Dewey (1997) has offered evidence on the weakening of citizenship rights, in the "cyberbanistic" way of life.

Admittedly, more hard evidence is needed on our problem. Nevertheless, both historical and contemporary data available support the conjecture that the morphological trio suggested in this paper constitutes an intrinsic part not only of the existence of deep social cleavages, but also of a strategy for its concealment and reproduction. Ironically, class relations leave their signs in the most important of all artefacts: the human settlement built on the ground. Unambiguous class footprints in the landscape.

Bibliography

- CODEPLAN/SEPLAN/GDF (1991) *Brasília - A construção do futuro*. Brasília.
- Dewey, Fred. (1997) "Cyburbanism as a Way of Life", in Nan Ellin. (org) (1997) *Architecture of Fear*. New York: Princeton Architectural Press.
- Gonzalez, Suely. (1985) "A renda do solo urbano: hipóteses de explicação de seu papel na evolução da cidade", in Farret, Ricardo. (org) (1985) *O espaço da cidade - contribuição à análise urbana*. São Paulo: Projeto.
- Holanda, F. (1997a) "Typology of urban layouts - the case of Brasília, in *Space Syntax First International Symposium - Proceedings*, London, pp. 08.01-08.15.
- Holanda, F. (1997b) *Exceptional space*, Doctoral Thesis, presented to the Bartlett School of Graduate Studies, University College London.
- Holston, James. (1993) *A cidade modernista - Uma crítica de Brasília e sua utopia*. São Paulo: Companhia das Letras. Originally published by The University of Chicago Press, 1989, under the title *The modernist city - An anthropological critique of Brasília*.
- Machado, L. Z. & Magalhães, T. Q. (1985) "Imagens do espaço: imagens de vida", in Paviani, A. (org) (1985) *Brasília, ideologia e realidade - espaço urbano em questão*. São Paulo: Projeto.
- Marques, Sonia & Cláudia Loureiro. (1998) "A moradia econômica: bonitinha, ordinária e barata", in *V Seminário de História da Cidade e do Urbanismo* [Electronic Proceedings], Campinas, São Paulo.
- Sennett, Richard. (1974) *The Fall of Public Man*. Cambridge: Cambridge University Press.
- Weber, M. (1964) "The urban place and the nonplace urban realm", in M. Webber et al., *Explorations into Urban Structure*. Philadelphia: University of Pennsylvania Press.