A method-based planning framework for informal settlement upgrading

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Abstract

Informal settlements house a significant percentage of the population of developing cities, yet there is no common planning framework for upgrading these settlements. Conventional method-based approaches applicable to new areas or sites and services schemes are inappropriate and so the dominant approaches currently available tend to focus on principles and best practices. Yet neither of these has yet provided a convenient basis for replicability on a significant scale. This paper argues for a return to a method-based approach for upgrading and sets out a planning framework that could form the basis for such an approach. It is based upon the ability of external interventions to address the key issue of vulnerability and argues for the need to plan for the long-term sustainability of informal settlements. It uses the experience of a pilot project in Cape Town to demonstrate the practicality of the planning framework. r 2002 Published by Elsevier Science Ltd.

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1. Introduction

Informal settlements provide shelter for a large, and growing percentage of the urban population of cities in the developing world. After almost three decades of debate on how best to deal with these settlements, there now appears to be a broad agreement among a variety of different actors that upgrading of the settlements in situ is the most appropriate. Yet, in spite of this consensus, it remains far from clear as to what is the most effective way to achieve this. The net result is a wide range of diverse approaches.Still the most prevalent is that set of approaches that are based upon sectoral interventions.These have achieved a degree of success, when measured in terms of quantifiable output (e.gnumber of water connections). However, their broader social impact remains difficult to measure (Amis, 2001). They are also associated with a more traditional, infrastructure-driven top down approach. This created a backlash, particularly among NGOs, which resulted in two alternative responses. The first emphasised process and community control, and was championed by NGO coalitions and CBOs. This has led to a set of principles that are intended to guide the upgrading process. The second alternative was developed by UNCHS (Habitat) and is constructed around a database of 'Best Practices' from different countries, which is then made available on the Internet.

Both of these alternatives reflect disillusionment with method, as an upgrading tool. Yet it can be shown that a number of settlement upgrading successes internationally are founded in method (Abbott, 2002). The failure of traditional planning and engineering approaches simply means that a particular type of method-based approaches was inappropriate. This does not mean that method-based approaches have to be abandoned altogether. Rather, it means that a new methodbased approach is required. That is the basis of this paper.

The first step is to define what is meant by a method-based approach. This is more than a collection of good practices, although it may include those. It is, rather, a structured and interrelated set of actions that have a logical framework and an internal cohesion, and which lead to a defined outcome. In this case the outcome is a settlement that has sufficient internal cohesion for it to become self-sustaining as an element of the wider urban fabric. The development and acceptance of a comprehensive method-based approach to informal settlement upgrading is something that cannot be set out within the framework of a single paper, or derived from a single experience. It needs to be the product of an international collaborative effort. In this context, the of this paper are twofold. Firstly the paper set out the argument for a method-based approach. It then provides a planning framework that could provide the basis for a more generic, comprehensive methodology. This provides, as it were, the skeleton of the method-based approach and provides a basis for international collaboration. In this way it seeks to provide the basis for long-term planning of informal settlement upgrading in a structured, cohesive and replicable manner.

2. Background

An international review of informal settlement upgrading practices carried out by the University of Cape Town (Abbott & Douglas, 2001) identified three specific approaches to informal settlement upgrading that were underpinned by a methodological approach and which appeared from the literature to demonstrate a degree of replicability (Abbott, 2002). These were then

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termed thematic approaches, because each one had a clearly defined thematic basis underpinning it. The three approaches were centred around the following:

1. an incremental approach to physical provision,
2. micro-planning at a community level,
3. the creation of an holistic plan ('Plano Global' in Portuguese).

Of these, the first is the most widely publicized, yet ironically it is the most problematic in terms of evaluating its replicability. This is because its success is interpreted in widely different ways, depending upon the set of objectives used to define success. This is illustrated by the review carried

out by Verma (2000) and supported by the study described by Amis (2001). The main problem with this approach is that its apparent centrality as a basic need makes it difficult to integrate into a more holistic approach. The resultant tendency is for infrastructure to drive, rather than to support the upgrading process. There was no clear way of dealing with this dichotomy. Amis (2001) has made a start but it still remains a very indistinct relationship. The other two approaches are easier to analyse, and the review tended to focus much more on these.

There were two forces that drove the particular direction that the Cape Town research took in respect of these two quite diverse approaches. The first of these derived from the composition of the steering committee that was tasked with reviewing progress on the research. On this committee were two international experts, one of whom had played a key role in the Sri Lanka million houses project and the other who had played a central role in facilitating the Belo Horizonte approach in Brazil. Through discussions the tensions and fundamental differences underpinning these two approaches began to emerge. Furthermore, while the Cape Town project was specifically exploring the Belo Horizonte methodology, this was taking place in a geo-political environment that demanded a much greater degree of grass-roots community involvement than was the case in Brazil. And much of the South Africa's existing grass-roots experience stems from practices that evolved in the Indian sub-continent.

The second force related to the dichotomy between theory and empiricism that emerged from the comparative analysis. The preference in the Cape Town study was for a strong theoretical approach, as was typified by the Belo Horizonte experience. However, the dominant local influence was anglophone empiricism, particularly in the sector-based activity areas of housing, urban planning and engineering. Fortunately, the study had a practical case study component, which meant that the project was able to benefit extensively from both theory and practice, with the Belo Horizonte influence being modified both by different participatory pressures and by practical experience on the ground. It was in attempting to resolve these apparent contradictions between theory and practice, and between different historical and conceptual differences that the viability of a method-based planning framework began to emerge.

3. The conceptual debate

In an analysis of upgrading interventions, Huchzermeyer (1999) draws a distinction between externally designed comprehensive upgrading and what she terms support-based interventions

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(Huchzermeyer, 1999, p. 47). Then, within this latter category, she distinguishes between Government-initiated support-based interventions and NGO-initiated support-based interventions (Huchzermeyer, 1999, pp. 47–75). And then, after an extensive discussion of the differences, argues strongly in favour of the latter (see Abbott, 2002 for a more detailed exposition of this analysis).

What exists here is a duality, and it is the duality between government and community. Its roots lie in the community participation debate of the 1980s, and it is essentially recreating the means and ends debate of that era (Moser, 1983, 1989) in a different form and within a specific context, namely informal settlement upgrading. The major protagonists in this scenario are quite clear. On the one side is the World Bank. In the 1970s, its approach was constructed around the twin approaches of sites and services and slum upgrading (Huchzermeyer, emphasis placed upon the delivery of physical services. By the 1990s its perspective had shifted quite dramatically, with the emphasis now being on poverty alleviation (World Bank, 1991, 2000). In spite of this conceptual shift, however, its approach remains heavily means driven, in that it uses quantifiable deliverables as output and stresses the importance of efficiency and effectiveness. These are the same objectives that were defined for the organisation by Paul (1987) and classified by Moser (1989) as means-based community participation. In juxtaposition to the Bank are the NGOs who, through their community support-based interventions, seek community control. But this is simply another term for empowerment. And here the output is measured against the extent to which a set of core principles has been adhered. Thus both approaches continue to reflect a historical ideological view of government-community relations situated in the context of a duality.

The present reality, on the other hand, is that both are equally important. And, furthermore, both can be accommodated in a method-based approach. To accommodate them, however, requires a paradigm shift. For the paradigm that defines government–community relationships in terms of a duality can only be sustained by making the practice fit the desired outcome. The conclusion derived by Huchzermeyer that both the Belo Horizonte experience and that of Sri Lanka fitted into a category that she called Government-initiated support-based interventions (Huchzermeyer, 1999) supports this view, since the conclusion is actually contrary to the reality of those two programmes. Belo Horizonte cannot be described as being community-driven, at least from a South African or Indian grass-roots perspective. In the first instance, the City of Belo Horizonte set up a non-profit company, named URBEL, to coordinate informal settlement upgrading within the city. This planning body had extensive powers, and it also played a major role in determining the spatial form of upgraded settlements. On the other hand, the community also had a power base. URBEL could not work without the support of CBOs. And the community also had strong technical support through an NGO (AVSI). So it had its own independent power base.

A similar situation existed in Sri Lanka, although there the balance of power was more towards the community. Here the community-planning component of the programme provides a good example. When this concept was taken and developed into a planning methodology (Action Planning) applicable to a wider geographical framework, there was an underlying support for the concept of 'shared' decision-making, rather than full community control (Hamdi & Goethert, 1996). On this basis, they argued, convincingly, that ''the plan stage is seen as the most crucial for the community and the city to be jointly involved, [on the grounds that] this is the stage at

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which key decisions are taken and the full programme is defined'' (Hamdi & Goethert, 1996, p. 78).

Thus the government-community duality paradigm fails to provide a satisfactory way for analysing these international case studies. The reality is that the relationship between government and community is both complex and changeable. And between the extremes of government/ agency controlled, and NGO-driven community-based, projects lies a whole area of government community partnerships. Here both community and government play an important role. The community is able to provide the best reflection of internal needs, while the local authority brings a wider perspective of the city to bear. This paper will argue that it is in fact within this contextual framework of community–government partnerships that the most successful approaches originate. This is, therefore, the starting point for the evolution of the method-based planning framework.

4. Defining the objectives of upgrading

Upgrading revolves around an identifiable community, and this is what differentiates it most distinctly from new developments. Furthermore, these settlements are characterised by high levels of poverty, to the extent that poverty alleviation is now considered by the World Bank to be the primary objective of upgrading (World Bank, 1991, p. 2000). However, as Amis has shown, the definition of poverty links strongly to the profession of the observer and differs accordingly (Amis, 2001, p. 103). When asked, communities can give their own perceptions of poverty (Amis, , pp. 104–6). The question then becomes one of how physical interventions can best alleviate some or all of these, with a view to determine the most appropriate form of intervention.

The starting point is a recognition that the physical and social conditions pertaining to continued habitation of these areas is extremely precarious. The nature of land invasion/ occupation, situated as it is within an antagonistic political and economic framework, is such that people are likely to target land where the political response will be minimised. This means that it will generally take place on land that is physically marginal. Thus the condition of the settlement, and its impact on the people living there, is of crucial importance. Building on the concepts of Amis expressed in an earlier paper (Amis, 1995), the core issue is really one of vulnerability, which is easier to quantify objectively than is poverty, yet which still incorporates the community's perceptions of poverty. Hence the objective of upgrading should reduce the vulnerability of those living in the settlement.

By looking at this from the perspective of intervention, it is suggested that there are four elements of vulnerability. The first links to the fact that informal settlements are generally physically marginalised environments. Hence there are potential physical problems such as landslides (Jiminez Diaz, 1992), or flooding, (Fadare & Mills-Tettey, 1992), land where the groundwater table is high (the situation in Cape Town), or where there is subsidence due to mining activities (Johannesburg), geological faults, or old landfill sites. There are social problems associated with the site, from insecurity about the permanence of the settlement and the subsequent risk of eviction (Lee-Smith, 1989, p. 178) to problems of mental disorder (Reichenheim & Harpham, 1991, pp. 683–6). And there are personal risks also including the risk of epidemics (Hardoy, Cairncross, & Satterthwaite, 1990) and the risks relating to theft,

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bodily injury, molestation and domestic violence, which are likely to be significantly higher in these settlements than in the city as whole (Friedman, 2001).

The second element relates to the absence of opportunities for asset retention and growth. There are different interpretations of this term assets. Moser gives the following classification of assets: Labour, being 'the poor's greatest asset' (1995b, p. 5); Human Capital referring to the connection between, on the one hand, social and economic infrastructure (the former being health and education, the latter being municipal services such as water, transport, electricity) and, on the other hand, a household's immediate and long-term income-earning capacity; Productive Assets, a concept that Moser does not explain explicitly, other than mentioning that an important productive asset is housing as it has direct implications for a household's capacity to earn an income; Household Relations being 'a household's composition and structure and the cohesion of family members' (1995b, p. 10); and Social Capital being 'the trust, reciprocal arrangements, and social networks linking people in the community' (1995b, p. vi). There are also other views of that also need to be incorporated, particularly those of Chambers' (1995) and Amis' (1995, 2001). Particularly important here is the differentiation between tangible assets, as being stores and resources, and intangible assets, as being claims and access, since the two are understood as determining livelihood capabilities, that is the ability of people to cope with shock. And this in turn relates to the important concept of shocks and trends (Amis, 1995) and the impact that these have on community members. Thus vulnerability in this context is closely linked to asset ownership. Thus the more assets people have, the less vulnerable they are. And the greater the erosion of their assets, the greater their insecurity (Moser, 1995b, p. 2).

The third element deals with perceptions of poverty. Of primary importance here is the dominance of economic definitions of poverty. Chambers ascribed this, at least partly, to the dominance in number of economists over social anthropologists and sociologists in the World Bank (Chambers, 1995). However, Amis shows that it goes much wider and that all professionals suffer from this problem, whether they are economists, engineers or social scientists. In theory, economic and social policies in poverty reduction were together adopted for the World Bank, 1991 Assistance Strategies to Reduce Poverty (Moser, 1995a). In theory the intention was to achieve socio-economic objectives (i.e. objective that are neither purely social nor purely economic). However, Moser argues that, while this may become the case at the level of abstract discourse about broad development objectives, it is not occurring at the 'level of concrete planning practice'. Here she argues that a dualist methodology is practiced, in which ''hard'' economic determinism' has dominated over ' ''soft'' social policy' and that the two have yet to be brought 'together into a comprehensive framework for urban social policy that is appropriate for operational practice' (Moser, 1995a, p. 171). For this to happen requires that social policy 'recognises the importance of the poor's own perception of poverty and their context specific identification of priorities' (Moser, 1995a, p. 166). So the third element of vulnerability is that which addresses this local perception of 'own poverty'.

The fourth and final element of vulnerability deals with the compromised use of space, something that has received very little attention in the literature. The reality of informal settlements is that space is compromised at both the individual and the communal level, i.e. both private and public space. While the predominantly pedestrian environment can be of social benefit, this is to the detriment of access by emergency and service vehicles. While the spatial

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aspect of access is not addressed in the literature reviewed, Hardoy et al. describe how the lack of paved surfaces and the resulting mud and standing water on the streets of an informal settlement in Buenos Aires prevent services vehicles such as sanitation trucks from entering the settlement, besides causing discomfort to the residents (Hardoy & Schusterman, 1991, p. 107).

An intervention in an informal settlement should have then, as its primary objective, a reduction in vulnerability. This can apply to any element of vulnerability. However, in seeking to address just one element, the impact on the remaining elements should be identified. Thus it is counter-productive to address one element if the net result is an increase in vulnerability in a different area. In seeking to measure the effectiveness of an upgrading intervention in these terms, it is suggested that the following list summarises the specific indicators that should be measured:

* physical risk associated with the site,
* personal risk,
* livelihood,
* ability to withstand shocks,
* ability to withstand negative trends,
* the recognition of intangible assets,
* the social value of tangible assets,
* the social value of communal assets,
* the impact on informal sector activity,
* spatial relationships.

5. The relationship between the informal settlement and the city

The previous section looked at the individual elements of vulnerability. However, they also need to be viewed collectively. An important principle of soft systems thinking is emergence (Checkland, 1981), whereby new properties emerge that relate to the larger grouping that relate to that level and were not present in the individual components. Such is the case here. Not all elements of vulnerability emerge from an in-settlement analysis. Some arise when the settlement is viewed in the context of the settlement as a whole. In informal settlements there are two elements that emerge from this macro-perspective of vulnerability. The first is social exclusion, and the second is settlement sustainability, where this term is used in its widest sense. Hence, while the primary objective of upgrading should be to reduce vulnerability, this should take place within wider planning framework that seeks, ultimately, to achieve social integration and create a sustainable settlement. For a settlement to meet both of these goals it has to satisfy two distinct needs. Firstly, it has to achieve internal cohesion. And secondly it has to be integrated into the surrounding areas, a process described by the Recife Declaration (UNCHS, 1996) as the integration of the informal city into the formal city.

This raises the question: Is this realistic or is it an idealised and unachievable goal, given the degree of poverty and marginalisation that is the reality of informal settlements. The Cape Town experience, although in its early stages, indicates that it is both realistic and achievable.

Furthermore, the whole thrust of the Recife Declaration is one that shows that real empowerment of a community cannot be achieved by an introspective approach alone. Brazil's largest favela, Rocinha in Rio de Janeiro, provides a good example of this. Named a neighbourhood in

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1992,this meant that Rocinha started to receive a number of public services that began to connect it with the surrounding areas. This was the start of a transformation process that has culminated in the siting of a campus of the Estacio de Sa university (Cape Times, 2001). There is obviously much that needs to be done internally, but the importance of interactions across the settlement interface is clearly demonstrated. This is the starting point for the development of the planning framework; the recognition thatn there are two underlying developmental needs that are linked to vulnerability. The first of these is to deal with the issues of social exclusion and sustainability. Here the need is to turn the community outwards, spatially, socially and economically, in order to link it with the surrounding areas. A settlement is not an island; it is an integral part of the city of which it constitutes a physical part. To isolate it is to cut off a part of the city, to the detriment of all who live there. This is the need that is addressed so succinctly by the Recife Declaration (UNCHS, 1996).

The second developmental need is to integrate all the elements of vulnerability into the upgrading process. This means finding an alternative to the mechanistic, sector-based approach indealing with the multiplicity of community needs and demands that exist within the settlement. Moser (1995a) provides a starting point here when she talks of the importance of a cross-sectoral planning methodology, arguing that individual sectoral interventions have no guarantee of significantly impacting on urban poverty reduction. She confirms that, in a supply-driven approach, 'planning agencies plan at the sectoral level' (Moser, 1995a, p. 161) and therefore households are unable to make contextually and culturally specific cross-sectoral trade-offs. On the contrary, she argues that households and individuals do in fact plan cross-sectorally, therefore a demand-driven approach and inter-sectoral policy linkages are critical (Moser, 1995a).

Added to this, the experience from the Cape Town project would indicate that peoples' needs also have a degree of spatial correlation but that this linkage between need and its spatial relationship may differ across the settlement. Thus the closer decisions move to an individual dwelling the clearer and stronger the definition and expression and/or prioritization of need. But different areas within the settlement may have different needs or different priorities. This is consistent with a systemic perspective, except that in this case it is moving lower down to the level of the individual family. This is an issue that has not been explored specifically in community planning. This may be because much of the community planning theory has been developed for formal areas, or built around the construction of formal areas. The experience in Cape Town, however, indicates that there are different levels of decision-making within the settlement itself, which are related to spatial scale, and that these different levels require different approaches to decision-making. Thus scale becomes a crucial element of decision-making, to the extent that different organisational relationships (both within the community and between the government and the community) may be required to deal with the issues that emerge and are most directly relevant at different scales.

To operate simultaneously at different levels of decision-making requires a knowledge of what decisions lie at what level. But equally it requires a clear understanding of roles and relationships, and recognition that these might be different at the different levels of decision-making. In this context Abbott (1996) draws a useful distinction between what he terms consensus decision making on the one hand and inclusive (i.e. community-based) decision-

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making on the other. In the former, a number of diverse parties have input into the decision-making process. The community, through its representatives, is one of these groups, and therefore it has an equal, but not an exclusive, right. In the latter case the situation is different. There the government may be responsible for setting the enabling framework, but it is the community that takes decisions and the government supports those decisions.

In the context of informal settlement upgrading, what this means is a need to have a variable relationship between the community and the government, as well as different sets of organisational relationships operating within the community itself. The issue then becomes one of identifying the decisions that need to be made and linking these to the appropriate form of decision-making.

6. Constructing the planning framework: the experience of new rest

The development of a planning framework for New Rest was an evolutionary process. It began with a theoretical construct that is derived from the experience of Belo Horizonte in Brazil. At the same time it had to take into account a more intense participatory process. It progressed slowly, due to funding constraints, and this allowed for changes to be made to the approach, all of which were explored from an academic perspective. Thus the project was able to merge empiricism with theory.

The project began with a need to confront the physical constraints of the site itself. There was a powerful lobby seeking to have the informal settlement removed, on the grounds that the land was prone to flooding and therefore unsuitable for low-cost housing. This was shown to be invalid. However, this did not prevent objections. It then became obvious that this piece of land was strongly contested, and wanted by a number of different stakeholders for a variety of uses, all of which required the removal of the residents. Hence it became imperative to address this issue if the upgrading was to succeed. At the same time, there remained the needs of residents, since the land was marginal from a development perspective. In this context though, there were distinctions with regard to scale. And finally there were issues arising at the level of the individual family or shack that affected the potential of those residents to participate fully in the decision-making. So what emerged were four broad levels of decision-making, each requiring different structures to deal with them. These are not discrete levels. Each flows into the other. But all of them contribute to the sense of vulnerability and all of them need to be addressed. What emerged from the attempt to deal with all four of these levels simultaneously was the importance of spatial relationships, and the potential of ''space'' as a tool for dealing with and integrating diverse needs across the different levels.

6.1. Level 1: integration with the surrounding areas

At the first level, which deals with the integration of the informal settlement into the surrounding areas, it was found that self-interest was not the only element driving outsiders. There was also a fear of the settlement, because it was not accessible to outsiders and was therefore seen as a potential base for criminal activity. So a number of different parties had a valid and justifiable interest in the settlement, and this needed to be recognised and dealt with if the upgrading was to gain widespread support. At the same time though, it was recognised that this interest of the external parties did not extend to all facets of the upgrading process. Instead, it limited itself to

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specific issues, concerned primarily with the use of the land and the nature of the interfacing activities. Once this was understood, it could be dealt with, using a representative forum that involved a number of different parties.[1] But the plan that was put forward could not be separated from the second level of decision-making, which dealt with the long-term structure of the settlement as a whole. Thus the spatial planning elements were the same for both levels but the institutional structure required to deal with the two levels was completely different.

6.2. Level 2: the spatial integrity of the settlement

This second level operated with a framework of a partnership between the community and the local authority. On the community's side there was a Residents' Committee and a Development Trust (set up to act as the developmently responsib the university research group took on the role of a NGO and supported both of these bodies. On the local authority's side was a team representing all of the major line departments with an interest in the area. The two groups came together and formed a Steering Committee chaired by the local councillor. This provides a forum that enabled the local authority to separate two functions that are essentially contradictory, namely the developmental function and the regulatory function. The Steering Committee could agree to a particular action. This could in turn require changes to standards, service levels or materials for house construction, to use just a few contentious . In Belo Horizonte this was dealt with by making the informal settlements zones of special interest where municipal regulations did not apply. This approach is not possible in South Africa. Instead the Steering Committee identified changes that need to be made and these were then fed through the regulatory system, knowing that they have already been discussed and have support in Council among the relevant departments.

It was at this level that the issues of physical risk, communal facilities, social services and movement corridors were dealt with. The last of these issues will be used to illustrate the approach. An example of how this works is shown using the concept of movement corridors.

Fig. 1 shows an aerial photograph of New Rest in December 1999.

 In looking at access and movement through the area it was agreed that the existing network of paths and tracks would be used wherever possible. Fig. 2 shows how this network could be formalised. This constitutes the primary movement corridor. All other access routes have been planned as footpaths. In Fig. 2 there is no differentiation between the main movement routes, and they are all shown as being the same. This will not remain the case. A study is underway to define the social use of these different routes, both internally and integratively with the areas around. Depending on the outcome of this study the routes will be graded for different uses and sized accordingly. Similarly, Fig. 2 may give the impression of hard boundaries. The brief behind the study seeks to ensure that these will remain as soft boundaries.

The twin concepts of social space and soft boundaries are central to the achievement of sustainability and the alleviation of vulnerability. They provide a totally different set of spatial relationships to both greenfield developments and for upgrading projects that are driven by service provision. In the latter case the context is one of public space which, in an Anglophone planning context, often reduces to the spaces that remain once private space has been demarcated. Social space is multi-functional space and the different functions that this space already provides have to be defined and retained. At the same time the threats posed by this space have also to be dealt with. This then becomes a crucial element of social integration, both internally and externally. This in turn provides security and lays the foundation for the recognition of social
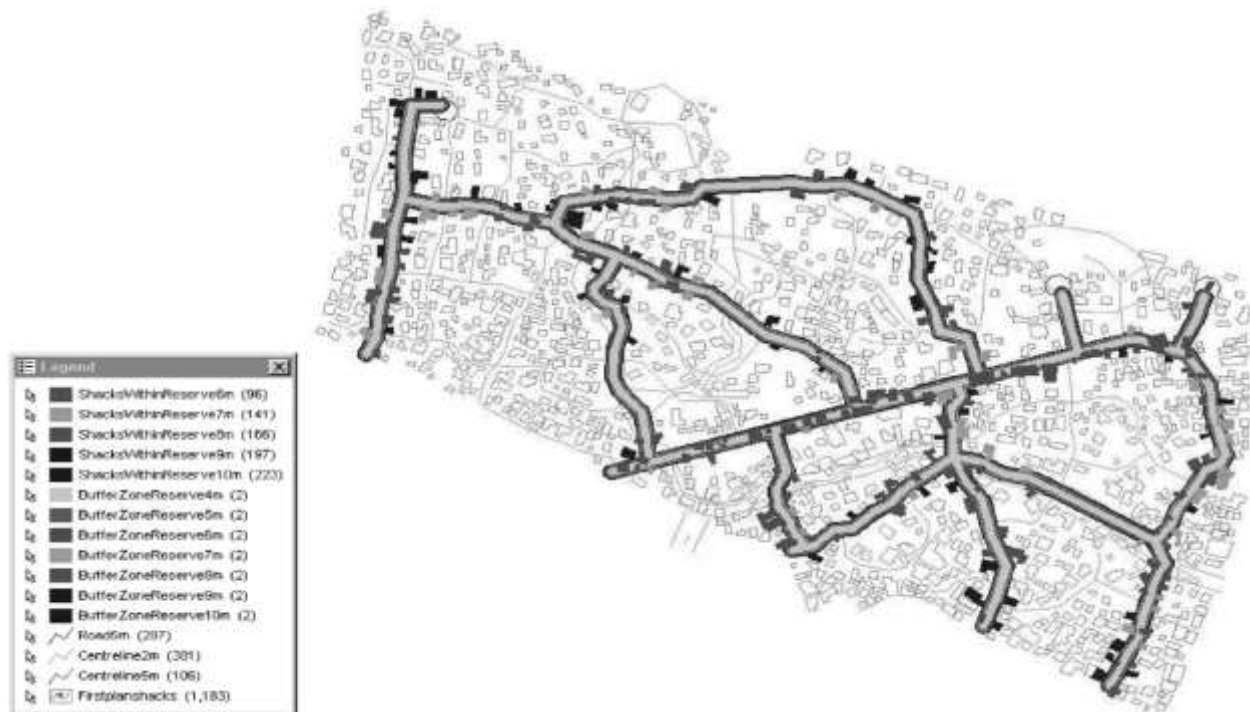

Fig. 2. Formalisation of the movement network for New Rest Informal Settlement, May 2001.

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assets. In this way spatial relationships come to be seen as an important tool in the preservation of these assets, rather than providing a basis for their destruction.

It is recognised that integration will take different forms in different geographical contexts. The nature of informal settlement growth in Cape Town is similar to that in Brazilian cities. Settlements form generally within the city boundary on vacant plots of land. In addition the percentage of the population occupying informal settlements is relatively low at 10% of the total (Abbott & Douglas, 1999). Integration in this context is very much the integration into the formal city. In African cities (Dar-Es Salaam for example) the situation will be very different. There the informal settlement population is much higher, at over 70%. Integration there will mean something different. It may be an integrative linkage between rural and formal core for example. But this does not change the principle, only the detail and the choice of institutional partners.

6.3. Level 3: addressing localised community needs

The upgrading of New Rest is built upon a policy of minimum relocation. Nonetheless, one of the consequences of creating a more sustainable spatial structure at a macro-level is the need to relocate a number of families internally within the settlement. This leads to the issue of local level decision-making. At this level the project is dealing with people in small groups. The way in which groups are constituted is an issue that requires extensive debate and discussion across the community-professional divide. In New Rest, however, small groupings were formed using the spatial definition created by the movement corridors shown in Fig. 2.

The nature of the decisions made at this level differ significantly with those at the macro-level, with the full extent of the difference being dependent upon the overall size of the settlement. Those decisions taking place at the local level revolve around questions of local space and the use of that space. Hence different elements of vulnerability are addressed. This ability to address vulnerability at different levels of spatial organisation is considered to be extremely beneficial, and an important element of the upgrading process. Communities are neither homogeneous entities nor totally individualistic. They form and coalesce around common interests. Whilst not all of these can be defined in spatial terms, this planning method is constructed around the recognition that there is a correlation between social bonds and distance, particularly in poor communities. In a study of community participation, Abbott (1996) described the difference between small group work (the basis for traditional community development) and mass mobilisation around a single dominant issue (the basis of conscientisation in Latin America in the 1970s). Both are important participatory forms and both are accommodated in this process. At a local level, the reemergence of community development as a branch of social work makes effective use of spatial organisational structure and forms the basis for the third level of decision-making.

In terms of institutional frameworks, the focus at this level shifts to one that is constructed around community decision-making. The role of the local authority changes from being a partner to support the community and allowing the community to take the decisions. And the tools of decision-making at this level are those of participatory planning. This deals with one of the major failings of participatory planning, which is its failure to engage with the issue of scale. This case study has attempted to show the importance of scale, and the way in which it is linked with

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different types of decision-making. By focussing on level three, where it is most effective, this provides participatory planning with a logical base. It becomes the correct tool at the correct level. Coupled with the mechanism for decision-making (the institutional framework) is the content of that decision-making. All facets of development are included here. However, the New Rest study indicates that the guiding element relates to spatial relationships. This is significantly different to other approaches driven by either service delivery or land regularisation. This is quite compatible with participatory planning. It does, of course raise the issue of the community deciding priorities, and challenges the basis, and findings, of, for example, the Orangi project (Environment and Urbanisation, 1995; Hasan & Vaidya, 1986). But the underlying philosophies of the two approaches are very different. Orangi is developed through a series of discrete projects, where needs are addressed individually. This may lead ultimately to a sustainable environment. Only time will tell. The basic thrust here is very different. Sustainability is the central issue. And in this context the central element is the integration of public and private space. Both have to be dealt with together. This contrasts with traditional approaches, which tend to create rigid boundaries, whether because of the need to satisfy the cadastral concerns of surveyors, the service delivery needs of engineers, or the rigid land use designation of urban planners. All of these are inappropriate in informal settlements.

6.4. Level 4: the individual family unit

And this then leads to the fourth level of decision-making, which relates to the individual family or head of household (particularly in the case of single-parent families). It was mentioned earlier that poor communities are not totally individualistic. Nonetheless people do have needs at the level of the individual family. Informal settlements are generally characterised by elements of poverty and marginalisation. But they themselves are often stratified, with their own internal marginalisation. Forty percent of the families in New Rest are female-headed households, and over 70% of these are single-parent families. A gender profile of the settlement shows that these families have a higher average number of dependents, lower mean incomes and more limited access to work opportunities (Abbott & Douglas, 2001). A study of gender and poverty in New Rest found that the women in New Rest were not represented in any of the formal decision-making structures of the project at anywhere close to the demographic reality (Friedman, 2001).

This was dealt with in New Rest by employing a social support team, comprising a social worker trained in social development and local community workers. This approach has its roots in previous South African experience (Abbott, 1989) and in Brazilian experience. Thus Imperato and Ruster stress the importance of what they term good social intermediaries (Imperato & Ruster, 2000). They argue that ''Intermediaries between project promoter and beneficiaries are perhaps the key component of the link between the development project and the social process that needs to be created for participation to succeed'' (Imperato & Ruster, 2000, p. 7). In the context of informal settlement upgrading, this means that the attempt to reach individual households via the social work/community development team is a highly significant project mechanism.

This description of the New Rest upgrading has focussed on two major elements, namely decision-making structures and spatial relationships. These are considered the core elements of the upgrading process. However, they do not operate in isolation. They rely on an extensive

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knowledge of the community derived from an in-depth demographic, social and economic survey of each household in the settlement coupled with experiential knowledge contributed by community groups and organisations and by the community development support group. The ability to manage all of this information and track and test the output from this multi-level decision-making process is made possible through the extensive use of a geo-spatial information management system constructed around a GIS interface.

Also omitted from the discussion is the provision of hard infrastructure services and the issue of cadastre boundaries. Both of these have been accommodated by the project. The ability to provide physical services at an affordable level has been an important consideration in this project. But the provision of these services has followed the process described here; it has not led it. A methodology for providing services in such a way that they play their real role of serving and supporting the community has been developed, and details can be found elsewhere (Abbott & Douglas, 2001).

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7. Conclusions

The upgrading of informal settlements is a process. Thus it is important to think of it not from a development perspective, but more in terms of urban renewal. The intent is to transform the settlement under conditions of minimum relocation. Within this paradigm, the World Bank has identified poverty alleviation as the most pressing issue facing developing cities. However, this paper has argued that the issue is not just one of poverty, but a much wider issue of vulnerability linked to social exclusion. What is being sought therefore is social integration, and the way in which this is done is through settlement transformation, which is something much more encompassing than simply physical upgrading, which constitutes just one element of the broader process. This is recognised in the NGO-driven approach of upgrading that places the emphasis on community management and control. Here the process is all-important. In this approach the physical component is defined by the elucidation of a set of principles. At this stage, though, this approach has not shown that it provides the basis for replicability at a scale large enough to deal the reverse growth of informal settlements.

In attempting to analyse the NGO-based approach, it is useful to recognise the extent to which the approach is itself reactive. It is a response to the failure of conventional approaches that emphasised physical development. These historical approaches lost credibility because they failed to address wider social and economic needs. Unfortunately, this also led, by default, to a much wider rejection of method as an approach. And this has no justification (although there may be good grounds for caution and wariness). The reason why method has been dismissed in absolute terms stems from the foundation of NGO practice in anglophone empiricism, which itself has an innate distrust of theoretical constructs. And theoretical constructs provide the only basis for the formulation of new methodological approaches.

In this regard, there have been upgrading projects (Belo Horizonte provides a good example) characterised by a methodological approach which have been successful. It is suggested here that method has been too easily dismissed, and that the development of sustainable upgrading strategies actually requires a method-based approach. The purpose of this paper has been to formulate a planning framework that would then provide a basis for the development of a generic method-based approach to informal settlement upgrading.

An approach to upgrading that is constructed around method seeks to use physical change constructively to aid the broader social transformation of the settlement. In order to address social transformation effectively, two distinct sets of needs have to be recognised, those of the settlement as an entity and those of the families occupying the settlement. And the only way to accommodate both sets of needs effectively is to recognise the importance and centrality of scale. Different needs have to be dealt with at different scales. This in turn highlights two elements that then emerge as central to the settlement transformation process, namely spatial relationships and institutional/ organisational relationships.

In this context, scale can be defined along a continuum that moves from the internal/external interface, down through the different areas of the settlement, to the level of the individual family. To simplify this continuum, it has been divided into four levels of activity, although different settlements may have more or less. But these four are sufficient to cover the spectrum of

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interactions. The first level of scale is that of the internal/external interface itself, which deals with the issue of integration of the settlement into the surrounding areas. The second level of scale deals with the needs of the settlement as a whole, covering those needs that are common to the large majority of residents. The third level of scale deals with small, clearly defined areas within the settlement, where families can be defined in decision-making terms as more homogeneous groups. And the fourth level of scale is the individual family unit, and in particular the head of household and partner within that unit. The emphasis is on social and economic integration, but the tools used to provide the framework for achieving this are spatial integration and the formation of cohesive and appropriate institutional/ organisational structures.

From an institutional/organisational perspective, this means that four distinct types of structure have to be considered, which can be summarised as follows.

1. stakeholders and consensus decision-making (decision-making across the internal–external interface),

2. a partnership between community and government (settlement planning at a macro-level),

3. community-based participatory planning (settlement planning at a local level),

4. community development support (involvement of individuals in the decision-making process).

This approach requires a significant review of the role of local government. In order to make the transformation of informal settlements it needs to be recognised that local government actually plays a different role at each of the different levels. At the first level the role is that of facilitator. At the second level it is as a partner with the community. At the third level the role is that of community enablement. And at the fourth level the role becomes one of providing or facilitating social support.

The spatial perspective shows a similar change. At the first level of scale, the issue is that of spatial integration, not as an end in itself but as a mechanism of social integration. This may well function within the context of a local area spatial development plan. The second level of scale is the settlement, and here the spatial issues relate primarily to movement, attenuation of physical risk and the identification of economic opportunities. The third level of scale deals with the creation of effective and sustainable social space. And finally, the fourth level of scale deals with the dwelling unit, and its improvement.

This approach limits the use of hard boundaries, and in particular the creation of individual site boundaries (explores, the relationship between private, semi-private, social (collective) and public space. Using the different levels of scale described above, it seeks to allow the flow of space outwards, across the settlement boundary, to the formal city or to other settlements. At the same time it seeks to provide an internal transition from the settlement level to the sub-settlement level in a way that allows a shift from settlement decision-making to local level decision-making, thereby paving the way for community decision-making in a more structured, effective and creative manner.private space) too early in the transformation process. Instead it works with, and

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References

1- Abbott, J. (1989). Community participation in water supply planning: The Ramagodi experience. First biennial conference of the water institute of Southern Africa, Cape Town, South Africa, March 29–31.

2- Abbott, J. (1996). Sharing the city: Community participation in urban management. Earthscan: London, ISBN Number 1 85383 323 1.

3- Abbott, J. (2000). Upgrading informal settlements for integration into the formal city. Conference on formal and the informal city–what happens at the interface? Nordic Africa Institute, Uppsala, the Centre for Development Research, Copenhagen and the Department of Human Settlements, Copenhagen in Copenhagen, Denmark, June 15–18, 2000.

4- Abbott, J. (2002). An analysis of informal settlement upgrading and critique of existing methodological approaches. Habitat International, 26(3), 303–315.

5- Abbott, J., & Douglas, D.J. (1999). Trends in informal settlement in the Cape Metropolitan area, 1993–1998.Cape Metropolitan Council, Spatial Planning, Housing, and Environment Directorate, Cape Town, May 1999, unpublished.

6- Abbott, J., & Douglas, D.J. (2001). A methodological approach to the upgrading, in situ, of informal settlements in South Africa. Water Research Commission, Pretoria, South Africa.

7- Amis, P. (1995). Making sense of urban poverty. Environment and Urbanisation, 7(1), 145–156.

8- Amis, P. (2001). Rethinking UK aid in urban India: Reflections on an impact assessment study of slum improvement projects. Environment and Urbanisation, 13(1), 101–114.

9- Cape Times (2001). Rio community climbs out of slums for good. Cape Times, Cape Town, Thursday February 22, 2001, p. 9

10- Chambers, R. (1995). Poverty and livelihoods: Whose reality counts? Environment and Urbanisation, 7(1), 173–204.

11- Checkland (1981). Systems thinking, systems practice. Chichester: Wiley.

12- 12- Environment and Urbanisation (1995). NGO profile: Orangi pilot project. Environment and Urbanisation, 7(2), 227–236.

13- Fadare, W., & Mills-Tettey, R. (1992). Squatter settlement in Port Harcourt. Habitat International, 16(1), 71–81.

14- Friedman, M. (2001). Gender and poverty study for the new rest informal settlement Cape Town. A document prepared for the Cape Metropolitan Council, March, 2001, unpublished.

15- Hamdi, N., & Goethert, R. (1996). Action planning for cities, a guide to community practice. Chichester and New York: Wiley.

16- Hardoy, J., Cairncross, S., Satterthwaite, D. (Eds.) (1990). The poor die young: Housing and health in third World cities, London: Earthscan.

17- Hardoy, A., Hardoy, J., & Schusterman, R. (1991). Building Community Organisation: The history of a squatter settlement and its own organisations in Buenos Aires. Environment and urbanisation, 3(2), 104–120.

18- Hasan, A., & Vaidya, C. (1986). Two approaches to the improvement of low-income urban areas–Madras and Orangi. Habitat International, 10(3), 225–234.

19- Huchzermeyer, M. (1999). The exploration of appropriate informal settlement intervention in South Africa: Contributions from a comparison with Brazil, Ph.D. thesis, University of Cape Town, South Africa, unpublished.

20- Imperato, I., & Ruster, J. (2000). Participatory urban upgrading: A road map for going to scale. A summary of a book to be published shortly by the World Bank. Presented to the Fifth Global Forum of the Water Supply and Sanitation

21- Imperato - Collaborative Council, Foz do Igua-cu, Brazil, 24–29 November 2000.

22- Jiminez Diaz, V. (1992). Landslides in the squatter settlements of caracas; Towards a better understanding of causative factors. Environment and Urbanisation, 4(2), 80–89.

23- Lee-Smith, D. (1989). Squatter landlords in Nairobi: a case study of Korogocho. In P. Amis, & P. Lloyd (Eds.), Housing Africa's urban poor. Manchester: Manchester University Press.

24- Moser, C. (1983). The problem of evaluating community participation in urban development. In C. Moser (Ed.), Evaluating community participation in urban development projects. Development Planning Unit working paper 14 (pp. 3–11). London: Development Planning Unit.

25- Moser, C. (1989). Community participation in urban projects in the third World Progress in Planning, 32, Part 2.

26- Moser, C. (1995a). Urban social policy and poverty reduction. Environment and Urbanisation, 7(1), 159–171.

27- Moser, C. (1995b). Confronting crisis: A comparative study of household responses to poverty and vulnerability in four poor urban communities. Environmentally

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Sustainable Development Studies and Monographs Series No. 8. Washington, DC: The World Bank.

28- Paul, S. (1987). Community participation in development projects: The World Bank Experience, World Bank Discussion Paper 6, Washington: World Bank.

29- Reichenheim, M., & Harpham, T. (1991). Maternal mental health in a squatter settlement in Rio de Janeiro. British Journal of Psychiatry, 159, 683–690.

30- UNCHS (Habitat) (1996). Urban poverty: A world challenge–the Recife declaration, March 1996, Habitat II, Recife International Meeting on Urban Poverty, Recife, Brazil, 17–21 March.

31- Verma, G. D. (2000). Indore habitat improvement project: Success or failure? Habitat International, 24(1), 91–117.

32- World Bank (1991). Urban policy and economic development: An agenda for the 1990s, Washington: World Bank.

33- World Bank (2000). World bank development Report 2000, World Bank, Washington.