CHILDREN, PARTICIPATION, GLOBAL CHALLENGES AND EDUCATIONAL PRIORITIES

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Introduction

Many cities in the developing world are expected to double in population over the next 20-30 years, requiring the same again in land, housing, services and employment - and all in a terrifyingly short period. Coupled with the explosive growth of the informal sector - the dominant form in developing countries which not uncommonly represents 60-80% and more of new growth - the stage is set for a potentially overwhelming situation. For all practical purposes the formal sector has lost control, and in effect has ceded proactive initiatives to the informal explosion. It has become an issue of speed and scale, and our current planning approaches are inadequate and may even be considered helpless.

Upgrading has been the de facto policy dealing with this explosive urban growth. This after-the-fact attempt to fix an out-of-control situation is not succeeding when considering the overall picture. Some claim that over the last 30 years while the population has doubled the problem has tripled: in short, we are falling ever further behind. Unfortunately this is not unique to planning alone, but the surge in demand is overwhelming most other sectors as well.

The current preparation of professionals does not instill hope for future success, and a fundamental rethinking of what is taught and moreover how it is taught is warranted. We are not historians studying narrow after-the-fact cases, but need to become future thinking and action-oriented. There is never enough information in guiding programs, and we should shift the balance

toward more immediate action. Some argue that this increases risk, but our current seemingly more deliberate practices may be characterized as a luxury that is being overwhelmed and irrelevant.

This paper argues for a model that directly links education with practice. A 'student-practitioner' or better, a 'practitioner-student' approach is proposed to start addressing the 'speed' issues of development, and in doing so begin to address the 'scale' issues as well. 'Sequence' in changing the classroom/field work relationship may be a useful start. The entry would be field based; working in 'real' situations, and only after that followed by more customary courses. This has several advantages: it has the potential of direct benefits, it provides a base for students on which to reference their future course work, and it offers a minimally biased situation in nurturing creative solutions.

The increasing familiar and practiced 'action-planning' model at the community level is an example of successful linking of education with practice, with education for professional as well as for community. This approach has become widespread, but still there is reluctance to cede full partnership in development planning, and it has not achieved its potential.

And to take this a step further, children make up over 50% in most developing countries, and their participation could have immediate benefit in many planning efforts and substantial long-term benefits. They can learn as well as contribute to the development of their community.

In a participatory planning workshop in El Salvador in an earthquake resettlement project, children were drawn into the process and provided substantial inputs into the designs and the long-term health of their community, and provides an example of how children can effectively become a part of the process.

The Workshop with Adults in San Cayetano, El Salvador

The SIGUS Group at MIT partnered with 45 earthquake-displaced families in designing their resettlement community through a rapid action-planning process. Both adults and children were participants: essentially there were two parallel workshops with several joint sessions to exchange ideas. The workshop was held over a period of 3 days at the local community center, with approximately 38 families and their 68 children, led by SIGUS, an NGO team of 5 staff, and assisted by local university students.

The 45 earthquake displaced families.

The workshop goals were to design a new community plan that located the main components to allow immediate implementation. The outcome was the layout plan with definition of the properties; the alignment, expected use and surfacing of the road; location of public space; and location of public water standposts and water tower. Houses were to be built through self-help with assistance by various international NGO funders. Community task-teams were identified during the workshop to monitor the implementation of the project, with December 2004 as the completion target. House design and construction were not explored in the workshop, but would follow previous experience in other reconstruction projects.

Deliberately crude materials were used in the design exercises to allow

Preparing
the model.

The model:
crude but
effective.

uninhibited experimentation. Simple cardboard paper roofs with rocks were used as houses (the rocks were gathered by the children, following a size template), colored cardboard was cut out for properties, and colored string was used for pipes. A large printed base map of the site taped to the floor of the community center provided the base.

The workshop followed a 4-stage process:

• Stage 1 was focused on understanding the site, relating the real site to plans on paper, and forming teams. Most of the activities took place on-site, with both the adults and the children.

• Stage 2 explored various design alternatives. The model pieces were crudely made out of paper and stones. Each of the key elements was discussed with the community to understand their function, characteristics, and alternatives, and criteria for decisions were agreed.

Four groups were formed, with each exploring an alternatives site layout. After an initial layout was prepared, they were compared considering the number of lots in their design, the cost-critical length of streets, land-use percentages, and density. Priorities and tradeoffs were assessed in reviewing the alternatives. Finally, public water standpipes were located and a rudimentary piped water network was designed together with an elevated storage tank. Advantageous and disadvantages of the layout arrangement were then listed on a chart.

Each group then presented their project with advantages and disadvantages, the street length indeces (i.e. cost surrogates), number of lots

(all had more than needed), number of water points and walking distance, and summarized the information on a comparative chart. At that point it became clear which to choose and there was not much further discussion on the layouts.

Note that at the beginning the groups were cautioned not to become personally involved in their design, and to consider themselves as reviewers. They were not to understand the summary as a reflection of their skills.

• Stage 3 set up committees to shepherd the various components during implementation. Immediate 'next steps' were agreed, and the long term goals and agenda were defined.

• Stage 4 was the closing of the workshop with the whole community, which formalized through celebration the new community design, and began the process of implementation.

Adults took the lead in the layout development, but the input of the children was brought in during the course of the workshop to add different perspectives and critique the alternatives being considered.

The resulting layout was applauded by the community members as well as technical staff from the supporting NGOs. From a technical and economic perspective, it was very efficient in terms of infrastructure and landuse, and focused the new community around a central node encouraging and reinforcing a sense of community identity.

A formal, professionally drawn plan was produced by the NGO during the evening of the last day for immediate review. The model (fig. A) of

paper and rocks was digitally photographed, and directly converted into an AutoCAD file (fig. B). The file plan was then readjusted to meet codes (fig. C) and the final layout was produced after a last final adjustment to lower street lengths and resultant infrastructure costs. (fig. D). From start to finish, the process took approximately 4 days.
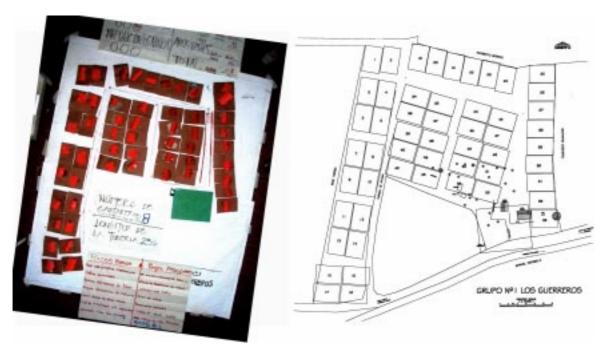

Fig. **A:**
Selected alternative
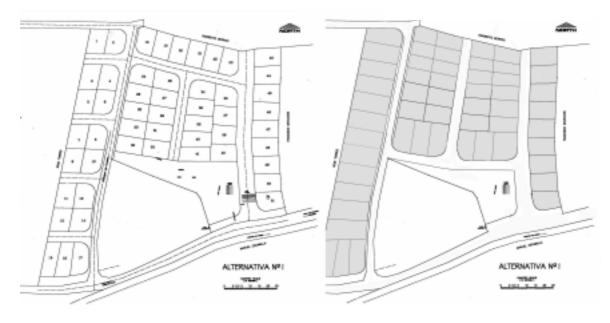

Fig. **B:**
Digitized AutoCAD layout

Fig. **C:**
Adjusted to meet codes.

Fig. **D**:
Final optimized layout.

The Parallel Workshop Creating Communities with Children

Working with 45 earthquake-displaced families demands a planning method that focuses on collaboration, ownership, creativity, and sustained involvement. Given that the end product is for the entire familial unit, it is logical to include children in the creation of their new communities. The workshop in San Cayetano brought children into the planning process, which ensured that their voices and ideas were integrated into the plan and into the future of these communities

Following is a summary of the process used in the workshop held for children to parallel the adult community planning. The workshop was a mixture of teaching children how to reflect about their former communities, to imagine future possibilities, and ways to accomplish their goals, while simultaneously contributing to the adult workshop their own ideas, comments, and priorities for their new homes.

The children's workshop
took place in a local shop.

Children Working and Learning Together

Children participating in community participation workshops invariably implies a large number of children. In this workshop, sixty-eight children attended that were between the ages of four and fourteen.

The formation of small groups with various age ranges helped children of all ages collaborate and learn from one another. Older children were designated as leaders within these smaller groups and therefore were able to help the younger children grasp information and lead discussion, while at the same time giving them an opportunity to become role-models and exercise leadership roles.

Students from universities in El Salvador provided invaluable input, ideas and leadership throughout the entire children's workshop. The university students not only led children with activities but also contributed to shaping the activities themselves. Practitioners who lead a participatory workshop may have an idea as to what kinds of activities will elicit the kind of information needed to create a successful workshop; however, university students working directly with every child can provide useful feedback as to what children are having trouble with understanding, what activities are useful, and when changes need to be made.

Children as Problem Solvers

The children's groups developed a collective identity and began to explore the land on which their new homes will be constructed. Each group

was assigned a question to reflect upon collectively and then was expected to make a presentation to the larger community of their findings. Five major issues were addressed: 1. Where should a water source be placed? 2. If they want a community center, where should it be built? 3. Where should animals be kept? 4. Where should the homes be built? 5. What should be done with all the garbage?

Children first had to learn how to read a map to gain some sense of scale and place. Then within their groups, they answered the particular question that was assigned to them. Participants came together to talk about the advantages and disadvantages of their solutions and negotiate if two groups were thinking of using one area for multiple services. This conversation allowed children to contemplate and discuss how they want to live, what are their priorities, and issues such as garbage disposal and water contamination that they could avert through the design of their new neighborhood.

(L) Playing while learning about the site
(R) Presenting the ideas of the children to the adults.

The children then presented their findings to the adults of the community. This presentation gave their parents a source of pride, but most importantly, allowed the adults and opportunity to listen to the children's recommendations and remarkably keen insights. For example, children brought up the problem of keeping animals close to water sources, as this practice causes the contamination of water and preventable illnesses in the community.

Children as Conveyors of Information and Insight

After critically thinking about their future housing, it was essential that children reflect on what their current neighborhood is like and things they would like to prevent or see replicated in their new neighborhood. Children were issued the task of being "guides" to outsiders of the community and with the use of photographs they would take, show them what they like and dislike about their current homes. Due to the range of ages of the children, participants walked around as one huge group and took pictures using disposable cameras. This actually inspired greater discussion about the community than if it were done on an individual basis and made children realize their various opinions about their same community, which sparked debate and most importantly at times, a discussion as to how to solve the issue. For instance, cars were seen as a threat to safety, however some children argued for their necessity to provide quick transportation to the center of town, particularly if an emergency. A discussion of what to do with

cars in the new community then ensued. These pictures were then shared with the entire community at the final celebration.

Several of the older children were asked to be a part of a panel that compared the alternatives of the plans at an intermediate stage. Each was asked to give their comments, along with the adult advisors. By being on the panel as equals their parents, they felt the gravity of their inputs and offered surprisingly sensitive comments.

(L) Children as 'guides' in understanding their community.
(R) Mounting photographs and sketches of their impressions.

Children as Visionaries Through Drawing

To bring the current and future neighborhoods together, children were asked to draw their ideal communities, based on what is available in their new area and what they value most in their current neighborhood. We then discussed the similarities and differences amongst all drawings and what that

means for the planning of their new neighborhood. Some images recurred

throughout a majority of the drawings, such as places of worship, therefore

insinuating the importance of a religious area in the new neighborhood.

Sketches of their impressions on public display.

Children as Fuel for Future Progress and Collaboration

Finally, as a celebration of their learning process and participation,

children summarized their ideas through the metaphor of a circus. This was

to inspired future collaboration amongst children and parents in their new

homes, show what they have learned through songs and skits the children had

created, and finally, have fun and set the stage for continued progress.

(L) Preparing for the 'circus' presentation.
(R) The closing 'circus' parade.

Some Considerations

What are some of the special things to consider when bringing children into the planning process?

• As in all work with children, their attention span is a key factor to consider, and their interest must be maintained. Essentially, how do you convert - or bring in - play that is more purpose directed? The use of a cutout template which sized the 'houses' for the models was one example: children searched the fields for rocks that fit through the template, assuring a proper size for the models. The use of the circus metaphor in the closing was very successful, and the learning 'games' in understanding the site is another example.

• Would the large number of children become disruptive and difficult to manage? As noted, the students from the universities provided valuable assistance. The age of the university students, their familiarity with the

children in El Salvador and their own enthusiasm matched the enthusiasm of the children. Also, a few mothers helped when necessary. It was not a problem despite the large number - 68! - perhaps because of the common understood goal and the deference and respect given to all inputs, young and old.

• Is it a problem handling the wide range of ages of the children, from very young, pre-teen, to teenagers? The broad range of children was a benefit and clear gain in capturing the varied experience and reflects the different perspectives of the age groups. The older children became the leaders of small groups of younger children. Leadership and responsibility were tested and nurtured in the older children and the younger children looked with respect to their older members. The university students were instrumental in maintaining the momentum and the helper-mothers provided additional support as needed.

• Detailed, fine grain decisions are probably not appropriate with children, and more general concepts based on their experience are best. No math! Getting a sense for things is more important. 'Quick and dirty' are good strategies which consider both the attention spans of children and their degree of understanding. Children may not be able to formulate the ideas, but they certainly can ask questions that are important to them, for example: "Where am I going to play" or "Where do I have to go to watch my siblings? How far do I have to walk to get water for my mother to cook?" These are all generally children's duties and they are the ones to best make an assessment.

Their input gives a sense of what is important to them in a community, and indirectly reflects the values of adults. They indicate the kinds of activities favored by children.

• In any projects, an underlying issue particularly favored by donors is to know how people are going to take care of it. Since children are 50% of the population in many of these communities, and have a tendency to stay for long periods of time, or simply just to take over the house once the parents pass, there must be the realization that children are stakeholders in this process, and their awareness is critical over the long-term. This is the environment adults are going to grow up in, along with their children. Encouraging children to have a commitment to their community - and incorporating them in the planning process - is one positive step.

• Involvement of children would be particularly useful in sustaining their cultural heritage. It may be too late when children become older, and there is a need to start early to develop a sense of heritage. Building an early appreciation provides a base for children to measure, compare, and confront the overwhelming outside influences of TV, etc.

Summary: What You Get

1 - The workshop demonstrated a successful 'hands-on' rapid planning approach involving the full range of community members, both adults and children, in a positive, contributory and mutually reinforcing format. It showed how children of all ages - even relatively young - could contribute in meaningful ways in the planning of their communities.

2 - Children benefited as well as contributed. They were good equal partners. We feel they have a better sense of awareness and feel ownership and commitment in their community. They provided strong insights on what was important from the perspective of children, and for perspectives that involved what they do. Their inputs and awareness bodes well for the long-term health of the community.

3 - From a broader perspective, a rapid approach is viable with favorable outcomes, achieving scale through more rapid delivery methods. By bringing in children as well, all partners contribute with their unique perspectives, building a stronger viable community today and in the future.

4 - A key element is an effective, sensitive moderator and a framework around which the workshop is developed. A clear framework structures effective inputs from community. Communities have experience, local knowledge, and a sense of what may be done to resolve issues - they lack a format/frame around which organize and test their ideas. Additionally when working with children, it is crucial to veer away from an overly rigid plan but rather be as flexible as possible. It is difficult to focus active children under

the best of circumstances, and you lose the creative and spontaneous inputs with an unduly fixed program. You want to allow and encourage as much creativity as possible.

The moderator or guide must have the respect of all ages, and be able to knit the community together toward their common goal.

5 - Crude and simple does not mean unimportant and useless. The use of common materials without pretense of elaborate form provided directly useable inputs into a final 'professional' design. The use of play and games does not invalidate their relevance.

6 - There is no indication that involving children would not be equally successful in other contexts. The example shown here is in Latin America, but children have already been involved as resources in planning in the Middle East. For example, in Shibam, Yemen, children drew visions of their city, providing insights into how the city is perceived. (See Shibam in the Eyes of its Children. 2001.) Gender may be a consideration in some cultures, and particular attention would need to be given in the selection of workshop moderators.

References

1 - Step-by-step summary of workshop procedure in San Cayetano, poster format: see: /web.mit.edu/sigus/www/ under 'News: June: El Salvador'

2 - General community action-planning reference, with detailed examples: <u>Action Planning for Cities: A Guide to Community Practice.</u> Nabeel Hamdi and Reinhard Goethert. John Wiley & Sons, London. 1997.

3 - Example with children as planning resource: <u>Shibam in the Eyes of its Children.</u> Zein El-Abdin Fouad, Yemeni-German Urban Development Project. Omeir Mubarak Omeir, Deputy-Governor of Hadhramaut for the Valley and the Desert; Awadh Omar Hassan, Headmaster of Fatima Secondary School for Girls; Ursula Eigel, GTZ Teamleader. 2001.

4 - Two local NGOs in El Salvador partnered with SIGUS in the workshop: Balsamo and REDES. Balsamo staff included Emilia Taboada and Rosy Hernriquez; REDES staff included Rafael Garay, Edgardo Lezama, Douglas Guardado, and Jamie. Students from the Universidad de El Salvador included Aldomario Estrada, Yeni Landaverde and José Antonio Cardona. Students from Universidad Albert Einstein included Liliane Reyes, Tania Marquina, Sandy Melendez and Carmen Elena Rodeiguez. SIGUS staff included Gabriel Arboleda, Melody Tulier, and Susana Williams. Funding was partly by Trocaire and the MIT Service Learning Program, with matching funds from the local NGOs.