

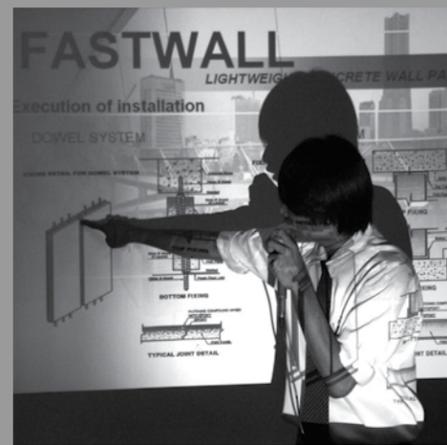
## SUMMER INTERNSHIPS

Seven interns were selected to work on various TAO projects during the summer months of April and May 2007. The student internships are part of the Young Professionals Orientation and Training Program organized by TAO-Pilipinas and supported by SELAVIP (Latin American, African and Asian Social Housing Service). The focus of the internship is community-based technical assistance and fieldwork in TAO-assisted urban poor communities in Metro Manila. The YP interns were exposed to alternative approaches in



TAO INTERNS (FROM TOP LEFT TO RIGHT) AARON CHING, MARK LOPEZ, NICO NOBLE, MICHELLE GALARION, ANNE EVANGELISTA, OWNERY DIALA, AND JASMINE SORIANO.

## RESEARCH ON ALTERNATIVE BUILDING MATERIALS



A PUP STUDENT REPORTS ABOUT LIGHTWEIGHT CONCRETE WALL PANELS.

TAO-Pilipinas recently collaborated with the Polytechnic University of the Philippines - College of Architecture and Fine Arts (PUP-CAFA) in undertaking research for the Sourcebook of Alternative Building Materials and Technologies for Socialized Housing (SABMAT), a research project conceptualized by TAO-Pilipinas. During the second semester of the school year 2006-2007, fourth year architecture students enrolled in the Research Methods subject under Dean Ted Inocencio looked for alternative building materials and technologies that were appropriate, affordable, and locally available for social housing projects or for communities doing self-help building projects. The sourcebook is primarily intended for the use of poor communities as a reference in constructing sustainable houses.

Students identified several alternative building materials such as compressed earth blocks, concrete interlocking blocks, lightweight concrete panels,

composite building panels, micro-concrete roof tiles, and fiber cement-bonded boards. The results of the first stage of the research activity was compiled into a database.

Following the submission of the students' first draft outputs, a short program was held on March 8, 2007 so the class could present their research to a panel composed of representatives from TAO-assisted communities and partner NGOs such as: Dike-Side Organization of Punta (DSOP), Samahan ng Nagkakaisang Maralita ng Navotas (SANAGMANA), Community Organizers of the Philippines Enterprise (COPE), Community Organizers Multi-versity (COM), and Foundation for the Development of the Urban Poor (FDUP). Fr. Jorge Anzorena and Illac Diaz, two distinguished personalities in issues of social housing and social entrepreneurship, also gave lectures during the SABMAT Project presentations.

Fr. Jorge Anzorena, TAO Advisory Board member and Ramon Magsaysay Awardee for International Understanding in 1994, presented a global perspective of social housing by relating the experiences of Latin American countries in the struggle for security of tenure and shelter rights of poor people. He commended the efforts of PUP-CAFA students as a good way of starting architects to work with the poor. Fr. Jorge also advised the students that in their research for alternative building materials, those that local people themselves could produce or manufacture should be prioritized.

Mr. Illac Diaz, a recipient of the Ten Outstanding Young Men Award for Social Entrepreneurship, presented the initiatives of his organization, My Shelter Foundation.

housing poor communities through community workshop facilitation, research, and development of training tools in land research, participatory planning, solid waste management and disaster-resistant housing.

This summer's intern pool included four BS Architecture students from Polytechnic University of the Philippines and Mapua Institute of Technology: Rose Anne A. Evangelista, Paulo Nico S. Noble, Jasmine M. Soriano, and Ownery Rose DC. Diala; a BS Civil Engineering student from University of Sto. Tomas: Michelle G. Galarion; and two BS Geodetic Engineering students from University of the Philippines: Mark Anthony I. Lopez and Aaron Andro V. Ching. Their internship also forms part of the on the job training (OJT) requirements in their respective universities

## YP REGIONAL CAMP IN SAN CARLOS CITY, NEGROS OCCIDENTAL

JF Ledesma Foundation, Inc., TAO-Pilipinas' Young Professionals (YP) network partner, organized the 2007 YP Regional Camp in San Carlos City, Negros Occidental on April 27-29, 2007. The YP Regional Camp is held annually as a venue for young professionals to explore their role in issues of poverty, homelessness and sustainable development.

Representatives from twelve universities and colleges in the Visayas and Mindanao participated in the camp. A professor-student tandem represented the architecture or engineering departments of the following institutions: Xavier University - Ateneo de Cagayan; Mindanao Polytechnic State College; Silliman University; University of Cebu; Lyceo de Cagayan; MSU-Iligan Institute of Technology (MSU-IIT); Central Philippines University; Colegio de San Agustin; Ateneo de Davao University; Southwestern University; Holy Name University; and University of Bohol.

The highlights of the YP Camp included a series of lectures on the theme, "Network Strengthening and Disaster Risk Management in Social Housing: A YP Challenge for 2007 and Beyond," and an immersion on the Interlocking Compressed Earth Block (ICEB) technology. Geoffrey Wheeler, Executive Director of the Center for Vocational Building Technology in Thailand, and Prof. Daniel Mostrales of MSU-IIT facilitated the immersion. The facilitators oriented YP camp participants in the actual production process and quality control of ICE Blocks, an innovative building material for low-cost housing projects. Examples

## LECTURE SERIES ON SOCIAL HOUSING AT MAPUA

The School of Architecture, Industrial Design and the Built Environment of Mapua Institute of Technology (MIT) co-sponsored TAO's YP Lecture Series on May 8, 2007 at the MIT, Intramuros, Manila. The YP Lecture Series is organized by TAO to provide more opportunities for the discussion of issues in social housing, shelter security and sustainable development especially for students in the fields of architecture and engineering.

The major topics presented in the YP lecture included the experiences of SELAVIP (Latin American, African and Asian Social Housing Service) in sheltering the poor, and the implementation of Decentralized Wastewater Treatment Systems (DEWATS) in urban poor communities.

Architect Joan Mac Donald, current president of SELAVIP and former Vice Minister of Housing and Urban Development in Chile introduced the efforts of their foundation in providing poor people with modest shelters especially during the period when security of tenure is still being processed. She also recounted how the poor in Latin American countries such as Chile and Argentina have mobilized themselves to gain shelter security and the various ways they have coped with housing policies that prevented them from attaining land ownership. Arch. Mac Donald urged the students to be more socially-committed in their professional practice and to advocate pro-poor housing policies.

Engineer Jonas Maronilla of Basic Needs Services Philippines, Inc. presented the initiatives of their organization in providing affordable wastewater treatment systems through pilot



SPEAKERS LINA OLOFSSON, SOPHIA TRUONG, ARCHITECT JOAN MACDONALD, AND ENGINEER JONAS MARONILLA POSE WITH TAO EXECUTIVE DIRECTOR ARLENE LUSTERIO AND DEAN GLORIA TEODORO OF MAPUA.

projects in local government units. Engr. Maronilla explained the various treatment methods, such as anaerobic baffles and filters, planted gravel filters and indicator ponds, which can also be implemented in urban poor communities.

Lina Olofsson and Sophia Truong, students from the Lund University, Sweden who visited TAO-assisted poor communities in Navotas as part of their thesis on "Sustainable Housing in the Philippines," also presented the findings of their research in the YP Lecture. Their study highlighted the self-help initiatives of the people's organization SANAGMANA, their struggle for shelter security and the construction of disaster-resilient houses.

## COMMUNITY TRAINING ON MCR (MICRO-CONCRETE ROOF) TILE PRODUCTION

The Foundation for the Development of the Urban Poor (FDUP) recently trained members of the Technical Committee of the Samahan ng Nagkakaisang Maralita ng Navotas (SANAGMANA) in Micro-Concrete Roof (MCR) Tile production. The training was done in March 2007 through the coordination of TAO-Pilipinas.

The training included hands-on production, quality control and maintenance of the machine and production facility. After the required curing cycle, actual tile laying was done on one of the houses now serving as a model roof installation for MCR tiles in the community.

MCR tiles are an inexpensive and durable alternative to conventional galvanized iron (GI) sheet roofing. MCR tiles are made of sand, cement and water and are produced using special equipment (a screeding machine and moulds). Its main advantages are the following: the tiles can be produced locally where cement is available; can easily be installed with good training of even unskilled workers; and unlike



YP CAMP PARTICIPANTS LEARN ABOUT INTERLOCKING COMPRESSED EARTH BLOCKS.

of its use in the post-tsunami reconstruction efforts in southern Thailand were also presented.

Several resource speakers also presented on diverse topics, such as urban design and development, disaster risk management in flooding-affected areas, and communication advocacy tools. Social housing policies and the Community Mortgage Program were also extensively discussed, particularly the functions of institutions such as the Philippine Undertaking for Social Housing (PUSH) and the Social Housing Finance Corporation (SHFC).



ARCHITECT CESAR ARIS OF FDUP DEMONSTRATES HOW TO MAKE MCR TILES.

galvanized sheets, are rust and fire resistant. The technology has been applied in several low-cost housing projects of Pagtambayayong Foundation in Cebu City and FDUP in Metro Manila.

For the self-build housing project of the SANAGMANA resettlement community in the reclaimed fishponds of Tanza, Navotas, MCR provides a viable roofing alternative for their houses and a livelihood opportunity for the community.