




Projects library of the specialized group for construction

SCHOOLS

Project	Postconflict School Reconstruction	
Project name	THURKKAPURAM SCHOOL, Tellipalai, Jaffna District	
Country	Sri Lanka	
Town/Region	Thurkkapuram DS Division Tellipalai District Jaffna	
Project type	Reconstruction / New reconstruction	
Typology	6 classrooms in 3 blocks Primary school, from Grade 1-11 and Preschool	
Approach	Private sector contracted construction	
Beneficiaries	Affected people in response to the conflict (IDP's, Refugees, Returnees)	
Climate	Tropical, hot and humid	
Special constraint	Cultural and religious context	
Start / End of project	2010 / 2011	
Country GDP	1'296 USD/cap (2010)	
Pictures	SDC Jaffna/Maps UN OCHA	

Partners

Organization (Donor)	SDC-HA
IO/NGO partners	-
Government partners	PTF Presidential Task Force Ministry of Education Northeast Province Provincial Education Director Zonal Education Director School Works Branch (SWB), Jaffna

Context to project

Initial situation	<p>By the end of 2009, approximately 70'000 IDP's returned from Vavunya area to the Jaffna peninsula. Most of them are living with host families or in semi permanent shelters until the return to their places of origin is permitted and/or their land safely accessible.</p> <p>High Security Zones (HSZ) continue to exist in the Jaffna District, but the adjoining so called "Buffer Zone", a 600m by 21 km protecting band along the borders of the HSZ has been released by the GoSL (Government of Sri Lanka) for resettlement. In September 2009, UNDP initiated an early recovery programme for twelve villages located in the former buffer zone of the Palay airport.</p> <p>During the same month, based on UNDP plans and in close collaboration with the local authorities and the SWB, SDC assessed the situation in the former buffer zone and identified the primary school of Thurkkapuram as most pressing and best situation location for a school rehabilitation project. From this area, all 591 families were displaced in 1990, many way beyond the boundaries of the Jaffna district. In march 2010, 370 families were back. In Thurkapuram DS Division at the end of 2011, 422 have resettled in permanent housing, while 66 families lived in temporary shelters.</p> <p>By 31st December 2009, 105 children went to the heavily damaged school and 25 small children to the preschool. By end of 2011, 22 children visit the Preschool while 98 students go to the primary school (1 to 11 level).</p>
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Humanitarian Aid construction group

Goals, Beneficiaries	<p>The aim was to permanently restore adequate schooling condition in the former buffer zone, an area that has been badly affected by the conflict in the past and that has been inaccessible for its former residents for many years. The rehabilitation of the school was done in close collaboration with the relevant authorities.</p> <p>Through the reconstruction of the Thurkkapuram School an approximate number of 98 students and 22 children (120 total) can actually benefit.</p>
Implementations	SDC-HA pledged to reconstruct on behalf of the request of the School Development Society, the principal of the School and the teachers. The request was supported by the Government Agent, the additional Director of Education and the School Works Branch Office Jaffna.
Results by November 2011	120 students are currently attending the school. 14 teachers are employed at the school.

Reference data			
GIS data (WGS 84)	N 9.783° E 80.0207°	Altitude 4 msl (13 feet)	
Land plot	2'780 m ²	Number of blocks	3
Classes/rooms per blocks	1/4 per block	Number of units	6 (+ 1 unit kindergarden)
Beneficiary /classroom	16.3 (primary school) 22 (Kindergarden)	Total beneficiaries	98 students / 22 children (Kindergarden)
Sanitary facilities	2 toilets for teachers 7 toilets for students (3 for boys, 4 for girls) 4 urinals (boys)	Other infrastructure	1 Hall with stage 1 Library 1 Principals's office 1 Kitchen 1 Watchers hut 1 Water Tank 1 Kindergarden
Ground floor (covered area)	765.4 m ²	Floor levels	1 / 2
Total surface	1'030.90 m ²	Surface / beneficiary	8.5 m ² / beneficiary
Volume (outside dim.)	3'451 m ³	Volume / beneficiary	28.75 m ³ / beneficiary
Heated surface	No heating	Electrification	yes
Cost per m ²	147.23 USD	cost/beneficiary	1'264.88 USD/beneficiary
Total cost (1US\$=110.19LKR)	151'786.66 USD (16'726'193.99 LKR)	Self help (beneficiaries) No self help	0 USD/beneficiary



Approach to results	
Initial Situation	<p>Thurkkapuram is situated in the northeastern part of Jaffna district.</p> <p>The old building of the school was originally build in 1900 by Mr. Sunderamoorthy as his residence. Later the building was donated to the Government of Sri Lanka and became a school.</p>
Project concept	<p>Reconstruction and New construction</p> <p>In agreement with the Ministry of Education, the School Works Branch (SWB), the village authorities and the principal, SDC decided to rebuild the Thurkkapuram School (approx. 150 students) and therewith establish a decisive return factor for the former residents of the area. The main school building was newly constructed while the former heavily damaged main building dating from 1910 was demolished to make space for a kitchen, a separate toilet block, an elevated water tank of 9m³ and a water fountain area. The annex building dating from 1985 was restored and is used as preschool (approx. 30 children), library and an office area. A small maintenance annex offers cover for a school maintenance person and essential tools. The whole project is closely accompanied by the parent's community that further ventures to take on responsibilities in developing and managing a sustainable school maintenance scheme.</p> <p>A small team of one SHA experts and several national engineers as construction managers and site engineers managed the above described tasks.</p>
Project procedure	<p>Following a rather bureaucratic identification, selection and approval procedure that involves the Department of Education, local Government as well as ERRA and NESPAK the required technical date is surveyed and the final design and tender documents were prepared. Based on exact bills of quantities and through public bidding procedures, the lump sum contracts were given to the private sector construction contractors. Through a set of specific criteria in terms of price, quality and performance, capable contractors have been identified and the contracts awarded. Contract documents were derived and adapted from international FIDIC standards.</p> <p>An average size school of 6 classrooms was completed within 10 months depending on the contractor's performance, site access and weather conditions. Site supervision was carried out directly by the School works branch engineer, project site engineers and Project Officers of SDC. The finishing standards are of good quality.</p> <p>Legal handing over certificates, as built drawings and maintenance plans were provided upon project completion.</p>
Structural concept and finishing design	<p>RCC frame / confined masonry on strip foundation; roof with steel trusses and tiles; floor finish in tiles; walls masonry, plastered, inside distemper/enamel, outside weather shield painted; aluminium windows with splinter proof glass and safety grill; door frames in aluminium, blade in wood; suspended ceiling in wood; all rooms with electrification, lighting and ceiling fans; ramp for wheelchair access.</p> <p>Double/triple seat benches for 40 students/classroom, black board on two walls, teachers desk and furnished teacher's office, incl. Storage</p>
Issues/Constraints	<p>Complex bureaucratic approval procedure to obtain all documents to start construction.</p> <p>Marginal community involvement.</p> <p>Weather conditions – hot and wet monsoon season shortens the construction.</p>
Lessons learned	<p>Using the national capacity and know-how in the design and carry out direct supervision by project staff and not the consultant was useful.</p> <p>Consistent improvements on the structure and the finishing works of the buildings must be based on the experiences made.</p> <p>High quality of work and timely completion resulted in a good reputation and image of SDC-HA.</p>

Legal framework	
Political attachment	Through the bilateral agreement between SDC and the Government of Sri Lanka followed by an MoU between SDC-HA and PTF
Type of ownership	District Education Department on behalf of Ministry of Education Northeast Province



Relevant building construction costs (excl. planning, design and supervision)

Construction	In SLR	In USD
Two storied multipurpose building	9'576'655.15	86'902.56
Watchers room with Store room	380'196.68	3'450.06
Sanitary block	2'163'162.58	19'629.44
Kitchen with store room and hall	1'173'266.31	10'646.71
2000 G Water Tank	789'386.44	7'163.22
Boundary wall (400 ft)	697'326.47	6'327.83
Extra work	1'192'015.32	10'816.84
Renovation of the Existing class room building	754'185.04	6'850.00
Total	16'726'193.99	151'786.66

Urban planning

Government Primary School Thurkkapuram

Distance to:	Main area called Thellipalai	0.5 km
	Public transport	No public transport available

For further information

Involved SDC-HA construction group consultants	Peter Etter
Other involved SDC-HA consultants	Srikantha Rajaratnam
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Recommended Institutions:	N / A
Recommended partners:	N / A
Recommended books/reports:	Further information (drawings, contracts...) on construction group website or email above available
Relevant other projects (links):	Project Document of the Cash for School Program, Sri Lanka, containing the reconstruction of Schools. Website: www.cfhsrilanka.com

Relevant illustrations



1L	Whole complex
2R	2 Storey Multipurpose Building



3L	Toilet Building
4R	Watchers Hut with other classrooms



Relevant Drawings (without scale)

