

# San Gaspar Ixil Bridge Construction Supervision



ANZUETO & ASOCIADOS

Contractor and Consulting Engineers

LOCATION		YEARS	
<b>Guatemala</b>		PROFESIONAL SERVICES	CONSTRUCTION <i>(if applicable)</i>
		<b>2006 - 2007</b>	
PROJECT OWNER INFORMATION			
a. PROJECT OWNER	b. CONTACT	c. CONTACT PHONE NUMBER	
<b>MICIVI</b>	<b>Dirección General de Caminos</b>	<b>+502-2223-4000</b>	
PROJECT REPORT (Reach, Size and Cost)			

**Project Background** – The Project is located on the RD-HUE-17 which goes from the RN-7W junction to the town of San Gaspar Ixil in the Huehuetenango department.

This Project was included on the reconstruction program after the Stan tropical storm that did hit the country on October 2005. A former 100 meter long bridge with a 4 meters track that didn't have the right design to cope with floods. It became necessary to design a bridge with the right technical characteristics that took into account the hydrologic studies into account.



The structure was built using post tensed reinforced concrete.

Control and alleviation works 200 meters upstream and 200 meters downstream were also built.

The total cost of the project was Q 20 millions (US \$ 2.5 millions) and was built in 9.6 months.

**Technical Supervision** – A plan was made to make sure all work is up to the client technical specifications. Technical Supervision included hydrologic, hydraulic studies review and approval for all 16 rivers that were going to be crossed with bridges. All detailed engineering design and construction schedule was also reviewed and approved. A day to day log was kept on work progress and construction materials quality assurance tests. Anzueto y Asociados certified work progress and approved construction contractor payments.

**Hydrologic and Hydraulic Studies** – Hydrologic and Hydraulic Studies were taken into account for their design. Anzueto y Asociados reviewed all studies and certified that designs did take into account those studies.

**Quality Assurance** - Day to day verifications were made on the necessary construction materials tests including geotechnical soil tests, soil mechanics tests, concrete and asphalt tests and steel quality certificates.

**Construction Schedule and Payments** – On site personnel was available at all time to verify construction progress and make reports to the financial officer for payments authorization.

Project Key Elements
➤ Bridges
➤ Technical Supervision
➤ Hydrology and Hydraulics studies review and approval
➤ Detail Engineering Design Review and Approval
➤ Construction Schedule Review and Approval
➤ Quality Assurance Inspection
➤ Construction Contractor Payment Approval