



Taiwan High Speed Rail Project Detailed Design for Civil Work Lot C291

Project

Detailed Design Services of Taiwan High Speed Rail Project Contract C291

Contractor

Evergreen-Shimizu Joint Venture

Location

Taiwan

Service Period

2000/04~2004/01

Scope of Services

The Designer of all permanent works. Major works are as follows:

- The design of viaduct and bridge structures of a total length of 28,513 meters.
- The design of viaduct passing through the Shin-Haw fault.
- The design of viaduct passing through Tainan Science Based Industrial Park.
- The design of excavation of foundation
- The design of permanent diversion works of road and drainage.
- Acting as Lead Structure Engineer and Lead Geotechnical Engineer.

- Providing Key Personnel of QA Manager, Design QA Manager and Interface Manager.
- Executing core system interface coordination and design.

Project Description

This contract is for design and construction of the section of the Taiwan High Speed Rail Civil Works C291 between Chainages TK 284+221 and TK 312+734. The general topography consists of a flat alluvial plain, most of which is privately owned and closely cultivated with rice, fruit vegetable and sugar crops.

The contract includes the design and construction of viaduct and bridges of total length of 28,513 meters, including the crossings of the Tseng Wen and Yen Shui rivers, and other drainage channels. The alignment lies approximately parallel to the existing Taiwan Railway and the North / South Freeway Number 1.

There is a history of intense seismic activity and major earthquakes have occurred frequently. The alignment passes through Hsin-Hwa active fault and Tainan Science Industrial Based Park (TSIP). Special design has been taken to overcome the active fault effect and to reduce the vibration effect to TSIP.

The viaducts/bridges are constructed by CIP, MSS and BCM methods.

