

Toyota Kohki Co., Ltd., Tokio, 183-0035, Japan

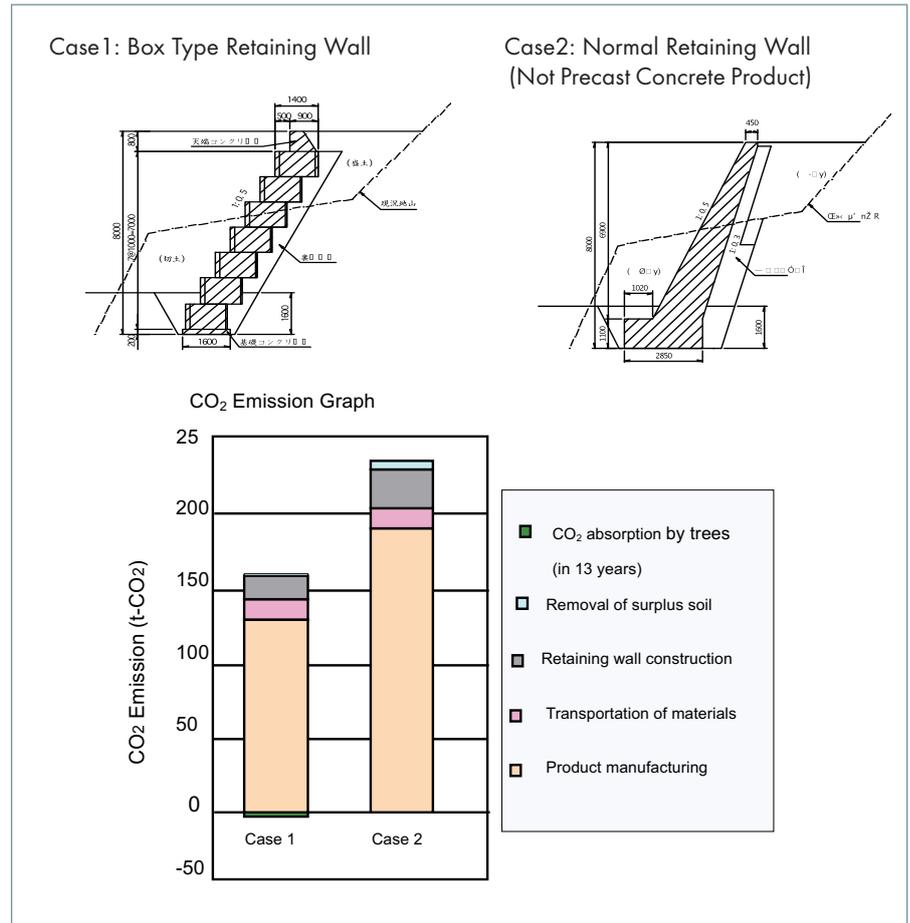
Molds for various types of retaining walls

Toyota Kohki Co. Ltd. is a skilled, high technical and precision precast concrete mold manufacturer. Toyota Kohki is able to meet the demands of complex and diverse precast concrete products used at Japanese civil engineering jobsites on a daily basis. With their cultivated know-how, skills, and experiences, Toyota Kohki has been one of the leaders in Japan and offered durable and precise molds to their customers.

Japan is considered as one of the world's top producers and users of precast concrete. Many types of precast concrete products have been developed for making living better. Various types of retaining walls have been used in Japan for geographical reasons.

Japan is a comparatively small island in the Pacific Ocean with a very high population density. The development of the retaining walls was an absolute necessity due to the geographical features of Japan. The mountains in Japan make up nearly 70% of the total land area, and conversely the plains make up only 25%. In addition to the land feature, Japan is one of the world's major rainy countries and has many rapid-flowing rivers. This rich natural environment causes severe flooding and extensive damage. Naturally, the flood control and the land development have become an important issue for the Japanese government. Continual government investment is made to develop and increase the agricultural and the habitable area. For those reasons, retaining walls have been used throughout Japan extensively.

Figures 1a and 1b show the hollow concrete blocks mainly used for river revetment. The blocks can be filled with stones when used under water. The space between stones can provide a shelter and a living space for aquatic habitants. The blocks also could be filled with soil mixed with sand and small stones when used above water. This enab-



les the ability to plant trees, flowers, or grasses. Figures 2a and 2b show precast box type-blocks mainly used for large size leaning-type retaining walls. The feature of this block is to be able to back fill using the dug-

out soil to fill the area inside the box to insure the stability of the retaining wall. The width and the height of the block are standardized to 1.5M (w) x 1.0M (h). The depth can be varied from 0.75M - 4.0M. The height of



Fig. 1a, 1b: Hollow concrete blocks - mainly used for river revetment



Fig. 2a, 2b: Precast box type-blocks



Fig. 3a, 3b: Examples of retaining wall molds used in Japan

the retaining walls can be built up to 10M by the combination of these various block sizes. They enhance the construction procedure by offering a more diverse, flexible, rational and economical design.

When compared to traditional retaining wall designs, this box type block filled with dug-out soil can reduce 30 percent of the CO₂. The product allows for trees or shrubs to be planted due to the soil inside:

Various types of retaining walls built by precast concrete have been developed and produced in Japan. The molds play a crucial part in manufacturing the precast concrete products in terms of the quality, accuracy, and the productivity.

Toyota Kohki, a mold manufacturer in Japan, produces a variety of adjustable molds for making precast retaining walls. The different size or multiple finished texture design can be made by using an adjustable mold. The unique mold technology makes it possible to produce a variety of complicated precast retaining walls.

Many advanced concrete product manufacturers have collaborated with Toyota Kohki at the beginning stages of engineering and design for new product development. Collaborating with each other can

maximize their knowledge for the best solution of a new precast product which is easy to make with low cost.

Since 1966, Toyota Kohki Co., Ltd. has been one of the leaders in Japan for precast concrete molds, plant machinery and concrete delivery systems for producing wet cast concrete products. Today, Toyota Kohki is known as the leading contributor to the development of the concrete industry and precast concrete molds in Japan. Their mold precision is so accurate that they are actually water tight. In addition, the durability, productivity, and ease of use are attributes that have attracted many of their customers.

Toyota Kohki will exhibit at bauma 2010 and display their molds. Their booth stand number is C1, 512. You can check out Toyota molds at www.cpi-tv.com – search for Toyota Forms.

FURTHER INFORMATION



Toyota Kohki Co., Ltd.
6-12-8 Yatsuya Fuchu-shi
Tokio, 183-0035, Japan
T +81 42 3666011
F +81 42 3642530
info@toyotaforms.com
www.toyotaforms.com