



Project Profile - Civil Engineering & Infrastructure

PROJECT

West Kowloon Expressway

SUMMARY

Reinstatement of effective cover on precast concrete segments

PRODUCTS

Cementitious Coating 851

CLIENT

Highways Department, Government of Hong Kong

CONTRACTOR

Kumagai-Maeda-CRABC JV

BACKGROUND ▶

Built on reclaimed land, the West Kowloon Expressway opened to traffic in 1997. This four kilometre highway runs from Kwai Chung Viaduct to the Western Harbour Crossing toll plaza, carrying traffic out to Hong Kong International Airport.

Whilst the southern section is at ground level, the northern section is carried on a viaduct which is constructed from precast concrete segments. During construction, low cover was detected on a number of segments, requiring an innovative engineering solution.

THE SOLUTION ▶

In a pioneering move which followed similar use on the Channel Tunnel, **Cementitious Coating 851** was approved as an economic and practical solution to enhance effective cover to reinforcing steel. The contractor cleverly blended white and grey grades of **Cementitious Coating 851** to provide a colour matched solution which could be used in discreet patches. Applied directly to concrete in two coats in a thickness of 2mm, **Cementitious Coating 851** confers an additional 100mm of effective cover. This application has led to the use of **851** on many major infrastructure projects.



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EMS 597350
OHS 597351

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