PC Deck Slab for Port using CFCC as Tendon and Reinforcement = 2016 Kushiro Port East Port Area Water depth -14m Quay Deck Slab Work =

Kushiro Port in Hokkaido was chosen as an international bulk strategy port in 2011, and the maintenance work of this international logistic terminal has started since 2014. In the east area of this port, a construction work to build guays in the water depth of -14 started.

The jacket method quay structure was adopted for the quay, and RC deck slabs were partly used for superstructure in ordinary part. PC deck slabs in which CFCC was used as tendons and reinforcements were adopted for 41 places where maintenance/replacement work of slabs is difficult, because slabs are located under belt conveyors and building foundation. These manufacturing and installation works were done in 2016.

3 CFCC slabs were built into one piece by post-tensioning method at the yard near the construction site, and carried by a barge to the quay and installed.

CFCC was used for this project in consideration of durability in the severe environment in Hokkaido. Also, this project is larger in comparison with other projects in the past in Japan. By this project, a ripple effect to national harbor maintenance construction is expected in future.



Figure-1 Location of Pier' slab



Photo-2 Preteisioning



Photo-3 Terminal of Post-tensionig (Cut after grout strength development)

