

## APRIS SUCCESS STORY FROM HIENDT

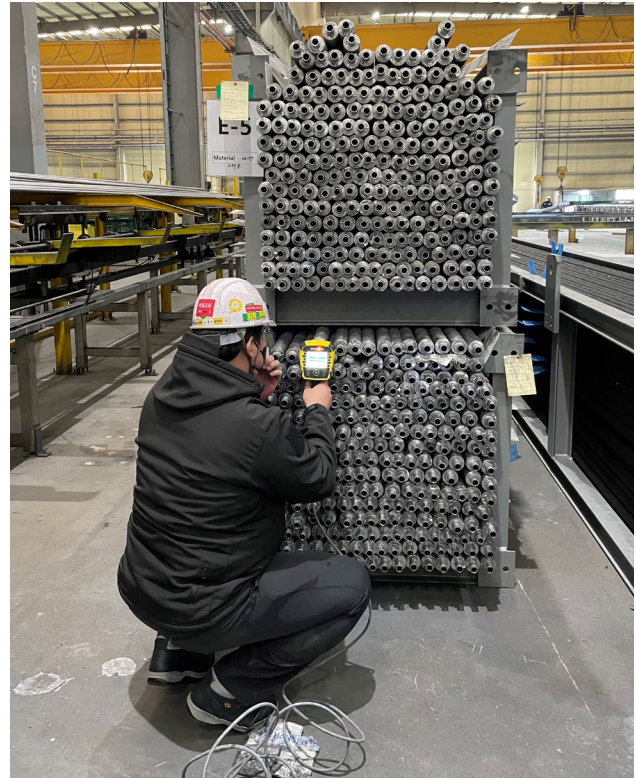


A finned tube is used for manufacturing an air fan cooler (AFC). The fin-tube is manufactured by uniformly attaching Al alloy material fins to the bare tube on the outer surface of the tube.

However, there was a situation where it was necessary to remove the defective tube before assembling the bundle, and there was a situation where it was necessary to check whether there were any defects in the 1,527 tubes of which finning had been completed.

The tube specifications are 25.4mm in outer diameter, 2.1mm in wall thickness, and 8,500mm in length.

Since the tube used for AFC has a fin wound on the outside, it is difficult to check the scale or thickness reduction from the outside of the tube, and the test had to be performed only with the inside of the tube.



Therefore, it was decided to proceed with the visual test using the bore-scope, but it took too much time and the production schedule was disrupted afterwards, so a quick and accurate inspection method was found.

At this time, it was determined that the APRIS method could find defects in the entire length of the inner tube in a short time using acoustic pulses to the inner surface of the tube, so the actual inspection was conducted.

As a result, 37 wall loss and 10 blockage were confirmed among 1,527 tubes, and the final AFC production was completed only with sound tubes excluding these tubes.

The customer also expressed satisfaction with the fact that AFC was manufactured only with tubes that passed APRIS.

