



# CORROSERV (M) SDN BHD

## CASE HISTORY ~ CH0203

### LEAK SEALING AND REHABILITATION OF 3” ELBOW PIPE

**THE CHALLENGE:** Currently, one of their 3” elbow pipe was leaking. Therefore, they requested us to propose a suitable repair system to rehabilitate the pipe to its design pressure and temperature.

|                       |                        |
|-----------------------|------------------------|
| OD Pipe Size          | : 3.5”                 |
| Design Pressure       | : 840 psig (57.92 Bar) |
| Operating Pressure    | : 672 psig (46.33 Bar) |
| Design Temperature    | : 260°C / 0°C          |
| Operating Temperature | : 20°C - 250°C         |
| Medium                | : Process Gas          |



Figure 1.0: Initial condition of 3” elbow pipe

**THE SOLUTION:** Corroserv (M) Sdn Bhd proposed composite wet layup system together with our solvent free Corro-Heat 206 as the resin system to solve this problem. Corro-Heat 206 has a high temperature resistance until up to 260°C, which makes it ideal for this case. The system was applied with surface preparation according to SSPC-SP1 using Bio Rust-Off and SSPC-SP11 standards using Ex-Certified Safety Tools. Details of the applied system are as follow:

|                                |   |
|--------------------------------|---|
| <b>Infill &amp; Rebuilding</b> | : Corro-Heat 206                              |
| <b>Interface</b>               | : Corro-Heat 206 at average thickness of 500µ |
| <b>Saturating Resin</b>        | : Corro-Heat 206                              |
| <b>Composite System</b>        | : CRBX 650 (0.55mm/layer, 10 layers)          |
| <b>Top Coat</b>                | : Corro-Heat 206 at average thickness of 400µ |

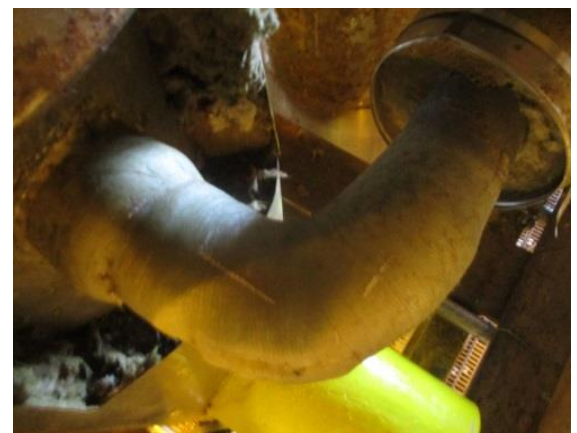


Figure 2.0: Visual of applied repair system on the 3” elbow pipe prior to top coat application

*APPLIED SYSTEM:*  
CORRO-WRAP™ WET LAY-UP

*YEAR:*  
2018

*LOCATION:*  
KELANTAN

*NO SEA TOO DEEP, NO JOB TOO TOUGH!*