

SOLUTION STORY

GCAS – GC High H.V
Uncertainty

MetSolv

METERING SOLUTIONS & VALIDATION

INTRODUCTION

MetSolv operate and utilise new IIoT (Industrial Internet of Things) products to provide the highest standard of support and service to our clients, one of these products is GCAS.

GCAS® (Gas Chromatography Analysis Software) is a software tool specifically designed for gas chromatographs (GC) conditional-based monitoring.

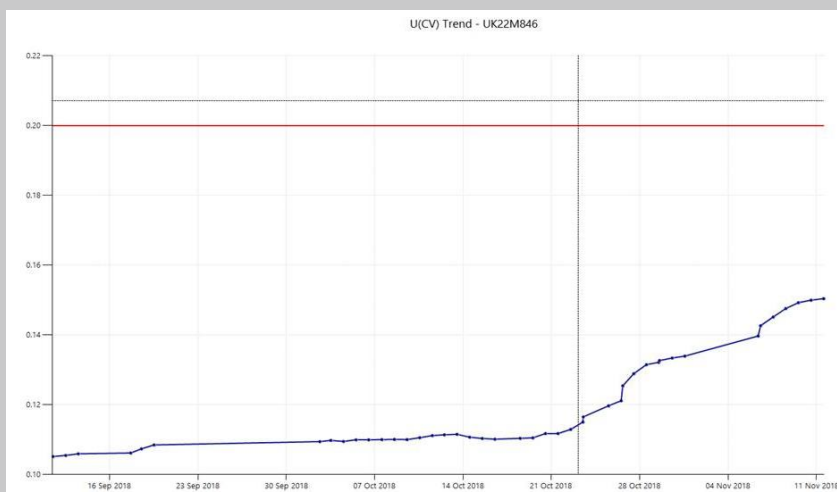


THE SITUATION

Through MetSolv's GCAS monitoring of the GC heating value uncertainty we were able to see the continual increase in GC uncertainty.

Through investigation MetSolv discovered a change in GC response factors from the performance footprint, these small changes in the response factors have gradually occurred over time. The changes in response factor can be attributed to a sticky or leaking GC valve.

No alarm was generated from the GC to indicate there was any issue.



THE SOLUTION

GC maintenance was scheduled with the client without causing any production interference and the GC valve spares were ordered. The GC valves were overhauled with new gaskets and the GC valve timing adjusted to fine tune the GC performance.

The new GC footprint was accepted into GCAS and the GC was diligently monitored for several days following the maintenance to ensure the GC performance was maintained.

THE RESULT

The GC heating value uncertainty reduced to the expected level as observed prior to the GC issue, providing confidence in the GC performance.

Without GCAS's ability to calculate reproducibility and to give live uncertainty calculations after every routine calibration the issue would not have been picked up at this early stage. GCAS allowed MetSolv to order the required parts and plan the changeout of the valves before the GC failed.

PROVIDING CONFIDENCE IN MEASUREMENT QUALITY

