



Fume Control Technology



MECHON

Enhanced Environments



Client: DUCO International
Technology: VOC Abatement System Upgrade

DUCO International are world leaders in the manufacture of offset printing blankets. The blankets are produced on a series of coating lines in which a solvent-rich rubber compound is added to a fabric carcass. The blankets are heated within the coatings lines, resulting in large amounts of solvents being emitted.

It is critical that the solvent vapours are extracted from the process and abated in a safe manner, reducing the risk of explosion within the process and minimising the impact on the environment.

The system upgrade involved two phases. The first phase was to improve the extraction rate of solvents from the process. The second phase was to limit damage to the stack, due to formation of hydrogen chloride within the abatement plant.

Under the first phase, MECHON undertook in-depth analysis and calculations of the coatings lines to determine possible ways in which to improve the capture of solvent vapours from the process: the rate of solvent removal directly influences the speed of the lines. MECHON carried out modifications to the machines and abatement systems. The modifications resulted in an increase in line speeds of up to 40%.

The second phase involved diverting damaging hydrogen chloride vapours from the abatement plant and undertaking a stack replacement to avoid any further deterioration of the system and emissions to atmosphere.

Shaping Your Environment