In this brochure we present a selection of our Health Safety & Environment (HSE) related products and services.

HEALTH

ADVANCE COAT™

ADVANCE COAT™ is a urea coating for prills, or pastilles, which enhances the shelf life and prevents caking, maintains product strength and protects urea from moisture. Our harmless coating can be an excellent replacement for formaldehyde and during handling hardly any dust is produced.

Stamicarbon offers products and services that can help improve the Health, Safety and Environmental conditions of your urea plant.
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SAFETY

Life Time Assessment (LTA)
for high pressure piping
Since regular inspections on high pressure piping is often neglected, a life time assessment by means of Risk based Inspection (RBI) is essential to help avoid catastrophic failures. All the components will be ranked criticality from both the process and the atmospheric point of view, using our in depth knowledge of corrosion and process knowledge in urea plants.

Urea design safety training
This training helps people to understand Stamicarbon’s approach to process safety and to broaden the understanding of the typical design solutions to safeguard the most relevant risk scenarios in urea plants. Herewith we improve your hazard recognition skills and capability of identifying and controlling potential hazards.

Process safety plant review
The process safety plant review will facilitate a technical field review to be considered as a spot-check, comparing the plant design against internationally recognized engineering practices to obtain a safe operation. Using a project specific checklist and field verifications, including interviews with key contractor and client personnel, we evaluate the presence and adequacy of mandatory safety provisions.

Radar Level Measurements
The Radar Measurement device (RMD) is a proven and improved substitute for the common used Radio-active level measurement. The RMD has many advantages compared to radioactive level measurements:

• Accurate measurement (+/- 10mm)
• Made of Safurex® material
• Absolutely safe in use/handling (no radioactive-sources)
• Replacement of existing radioactive device by radar is possible

Leak detection monitoring systems
To ensure safe operation of lined HP equipment in a urea plant, a reliable leak detection monitor system providing short response time between the start of a leak and its detection is of the utmost importance. It can be used for both new and existing HP equipment.

• Potential leaks are continuously monitored and leaks activates an alarm in the control room
• The location of the leak can be identified easily
• It accurately detects and measures in ppm range

Safurex material
Safurex® was initially developed by Stamicarbon in a partnership as a super duplex stainless steel that has superior corrosion resistance properties. The Safurex® brand has expanded into a family of long-lasting solutions, in not only materials, but also products and services, which have optimized urea production and safety because no active corrosion takes place.

Plant inspection HP vessels
Stamicarbon performs inspections on HP vessels to warn or predict corrosion problems and repair or avoidance of it. Based on the results measured, Stamicarbon can determine the remaining life time of the plant and recommend when equipment needs to be replaced.

Ammonia storage tank inspections
Stamicarbon is one of few companies who can assist you with ammonia storage tank inspection within a reasonable shutdown time. As an ammonia tank inspection is only required once every 15-20 years, special preparation and expertise is required to provide you with valuable advice based on the results of the inspection report. We offer the following benefits:

• Total inspection including de-commissioning and commissioning
• Short shutdown time because there is no need for scaffolding

Safety services
In addition to the presented safety services we have a long experience in the following:

• HAZOP support (management of change and/or projects)
• HSE management system assessment (OSHA/PSM)
• Major incident investigation
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ENVIRONMENT
Plant performance assessment/study
Assessment on safe working limits of each critical process equipment item and the actual performance of the plant related to maximize efficiency of:

- Safety - energy - effluents / emissions - product quality - bottlenecks / capacity

Thermal treatment technology
Stamicarbon's thermal treatment technology is designed to incinerate the ammonia enriched off-gasses from the atmospheric absorber (10 ~ 1 ppm), urea storage tank and ammonia water tank, while using the hydrogen rich off-gasses of the low pressure absorber as fuel for the incinerator.

- Guaranteed lowest NH₃ and NOx emission
- Independent of melt technology
- Low consumption of gas and reuse of heat for steam production

For additional information on any of the presented products and services, please feel free to contact Stamicarbon's Advance Sales & Solutions department:

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