REMONDIS wins the GreenTec Award 2016

TETRAPHOS PROCESS NAMED THE WINNER OF THE GREENTEC AWARD FOR 'RECYCLING & RESOURCES'

The highly coveted GreenTec awards – one of the most important environmental awards in Germany – have once again been presented to honour the best green innovations. The 9th awards ceremony was held in Munich on 29 May 2016. This year's winner of the 'Recycling & Resources' category was REMONDIS Aqua's innovative process: "REMONDIS TetraPhos® – Recovering phosphate from sewage sludge ash".

"It is a great honour to be given this award and it will spur us on to do even more to conserve natural resources in Germany — both in the water and in the recycling sectors." Dr Martin Lebek, CTO

Around 2 million tonnes of dewatered sewage sludge are generated in Germany every year which contain approx. 60,000 tonnes of phosphorus. A significant amount, therefore, which could be recovered and recycled – especially as natural reserves around the world are gradually being depleted and the quality of these reserves is deteriorating rapidly.

REMONDIS has been looking into this subject for many years now and has developed a number of processes that are creating the groundwork and setting standards for recovering phosphorus. Its intention here is to enable the phosphorus to be used as a fertiliser as well as for it to be supplied to industrial businesses as valuable phosphates.

The company's TetraPhos® process demonstrates REMONDIS' approach to this issue perfectly. Thanks to its patented system, high quality phosphoric acid can be produced from sewage sludge ash. This acid can be used to create phosphate compounds that, in turn, can be used to make fertiliser or



Dr Michael Beckereit, HamburgWasser, Dr Martin Lebek, REMONDIS Aqua CTO, Sabrina Lohmar, REMONDIS Aqua Managing Director, Peter Kurth, President of the BDE and Andreas Bankamp, Managing Director of REMONDIS Aqua, were proud to receive the GreenTec Award animal feed or be sent on to the chemicals and metal industry for manufacturing a whole range of different products. Besides the phosphoric acid, the TetraPhos® system also generates gypsum for the building supplies trade and iron and aluminium salts for treating wastewater. A further advantage: TetraPhos® can be operated on an industrial scale making it particularly cost effective.

This year's GreenTec Award for the 'Recycling & Resources' category was presented to REMONDIS during the awards ceremony, which was held in Munich on the eve of the IFAT exhibition. Dr Martin Lebek, CTO, expressed his pleasure at being presented with this award: "Receiving the GreenTec Award for our innovative process for recovering phosphates from sewage sludge clearly shows that REMONDIS and its research and development team are heading in the right direction. TetraPhos® is an important way to bridge the gap between recovering and recycling vital substances and running modern water management systems. It is a great honour to be given this award and it will spur us on to do even more to conserve natural resources in Germany — both in the water and in the recycling sectors."

Andreas Bankamp, managing director of REMONDIS Aqua, also thanked HamburgWasser for the support it has been giving REMONDIS to help it develop its TetraPhos® process so it can be deployed on an industrial scale — in particular thanks to the long and successful collaboration work between itself and REMONDIS Aqua at Vera Klärschlammverbrennung GmbH: "We would certainly not have been able to win this award like this without this public private partnership. REMONDIS may have been presented with this award this evening but for us this GreenTec Award 2016 is recognition of the efforts made by both HamburgWasser and REMONDIS."

According to the figures published by the BGR (Federal Institute for Natural Resources), supplies of natural phosphorus — a substance vital for plants, animals and humans — will have run out within just a few generations. The problem of availability is further aggravated by the fact that, for the most part,



David Mayer de Rothschild and Heike Schiffler held the laudatory speech for the 'Recycling & Resources' category



Dr Martin Lebek, CTO, accepted the green award on REMONDIS' behalf



Dr Heike Schiffer, Tetra Pak, and David Mayer de Rothschild presented the award for the 'Recycling & Resources' category to Dr Martin Lebek, REMONDIS Aqua GmbH

this raw material is found in regions or countries that lack political stability or security. 77% of all phosphorus reserves are in a region in Morocco where militant groups are fighting for independence. China owns the world's second-largest reserves (approx. 6%). Faced with this situation, the EU Commission decided to put phosphate rock on its list of 20 critical raw materials two years ago, especially as Europe has to import over 90% of its supplies from overseas.



Go to remondis-aktuell.com to see a film about the GreenTec Award 2016