**The dream team in the port of Constanta: SENNEBOGEN mobile 821 E series and crawler version of 640 duty cycle crane load and compact scrap**

**In April 2019, Romanian scrap specialist European Metal Services SA, based in the port at Constanta, welcomed a new team member to its green fleet. Adding the mobile 821 from SENNEBOGEN's E series gave the company completely new options in terms of scrap logistics, as the machine upgrade promised faster work cycles and even more power when loading trucks, sorting on site and restacking the daily onslaught of scrap piles. An "old hand" on site since 2013: the SENNEBOGEN 640 duty cycle crane special solution with 1.5 m pylon for compacting scrap on ships already loaded.**

It is the Romanian "gate to the sea" and is one of the most important locations for European transit traffic: the port of Constanta, situated on the shores of the Black Sea and the end point of the Rhine-Main-Danube Canal, is impressive with an operational capacity of around 120 million tons a year. European Metal Services SA's premises can be found in between the enormous port cranes, large-scale ships and jetties. The scrap processor and dealer is responsible, primarily, for the shipping of waste metal to other countries bordering the Black Sea. In April 2019, the company put a robust material handling solution from SENNEBOGEN into operation for the unloading of incoming trucks and for sorting work, the E series 821 Mobile.

**Safety is the top priority in scrap handling**

In the scrap yard, the agile mobile machine, equipped with a 104 kW diesel engine, maneuvers effortlessly back and forth between the scrap heaps and the docked ships. With its 8-fold solid rubber tyres it is well prepared for the rough ground conditions. Its wide support base means that it stays secure and stable whilst unloading trucks, which is also appreciated in the operator's cab - "During the unloading process I raise the cab to its fullest height so that I can see into the truck container. It is rare that I notice the machine judder, and so I can concentrate much better on my work," explains the operator. Furthermore, SENNEBOGEN's sensitive joystick controls enable the machine to navigate the work space accurately and perform its sorting work with precision. The 821 E series in Constanta is equipped with a robust 11 m long equipment, ideally suited to working with the huge scrap heaps. In addition, the boom is fitted with powerful LED spotlights to ensure good visibility even when working at night. Those in charge have also opted for even more operator safety with an additional protective guard on the windshield, to keep stray bits of scrap away from the cab.

**Experience pays off! Special 640 pylon solution reliably compacts scrap**

European Metal Services SA in Constanta can look back on a long-lasting partnership with SENNEBOGEN and sales and service partner Terra Romania. In 2013 the company commissioned a bespoke 640 duty cycle crane solution with a 1.5 m pylon extension that they still use to compact the scrap being loaded onto the ships, thereby increasing the transported scrap capacity. This demonstrates, once again, that the 40 t duty cycle crane, with its wide range of configuration options, is a multifunctional and reliable partner. In this case, the machine has a 2.5 t compacting plate on an 18 m long boom which is used in free fall to press the scrap into the ship’s hull.

This method increases transport capacity by 80-90 % compared with standard loading methods. Thanks to the variable, up to 2.7 m elevating cab the operator always has the best view of and into the ship - essential for efficient compacting. It also means that an additional person is not required to assist the operator to indicate the compacting zone in the vessel. This specially designed solution, equipped with a 186 kW engine and a 120 kN free fall winch, has long been part of the image of the port at Constanta.

A mobile SENNEBOGEN 850 is also used to load the ships. The mobile 821 is the perfect addition to the company’s scrapyard logistics. "We needed a solution that was available quickly to deal with the quantities of incoming scrap. SENNEBOGEN's 821 impressed us with its low consumption rate and fast work cycles," concludes the port manager for European Metal Services SA.

[Caption:]

* SENNEBOGEN 821 Mobile: optimal view into the trucks' containers thanks to the elevating Maxcab
* Restacking, sorting, loading: SENNEBOGEN's 821 E series carries out a range of tasks in the port at Constanta
* Special solution on 1.5 m pylon: by compacting scrap, the 40 t SENNEBOGEN duty cycle crane increases transport capacity on the ships by 80-90 %