

Get tough on wear and tear

Tiffany Holland looks at how abrasion-resistant steel applications can help to lengthen the life of recycling machinery

■ WITH TOUGHER LIMITS ON THEIR BUDGETS FOR NEW EQUIPMENT, RECYCLING COMPANIES

need equipment and components with a longer performance lifespan. This is increasingly leading to the use of better abrasion-resistant materials, which can be used in the manufacture of components to give better performance and increasing periods between maintenance.

Previously known as IMS UK, Abraservice UK offers a full range of hard-wearing solutions to materials handlers, including wear edges on buckets, wear-resistant components on yellow goods and liners for metal fragmentisers, shredders, aggregate crushers and for components on loading equipment.

The company changed its name to Abraservice UK at the start of this year following the merger of the IMS Group and Jacquet Metals, making it one of Europe's largest independent special steel stockholders and processors.

"Maintenance is a very important area of a business," says Abraservice divisional director Adrian Hance. "At the moment, companies are trying to drive down costs at all times. For companies with a lot of equipment, they get a win-win situation by using tougher steel on wearable parts, which reduces the amount of maintenance needed for the equipment and limits downtime on-site."

In the past, Abraservice provided steel plates for companies to profile and then fit on to their machines. But as businesses seek value for money and to waste less material, they are demanding component parts for their machines where the profiling has already been done.

"There is now more emphasis on final assembly," says Hance. "Businesses do not want to buy a steel plate, use some of it, and then see the remaining material go rusty. We are seeing more demand for finished components, so we are investing in more equipment for profiling and machining plates."

Abraservice has seen such a demand for profiled components that it now has equipment across the whole profiling range, including CAD/CAM profiling, perforating, plasma profiling, forming, laser profiling,

machining, oxy-gas profiling, bevelling and welded fabrications.

Abrasion-resistant materials are comprehensively used in the metals recycling industry, which tends to see excessive wear across machinery. Hance explains: "We are often approached by scrap yards because they should be selecting the appropriate abrasion-resistant materials on their equipment. It is particularly important in cyclones, which are highly abrasive areas where they separate materials from shredded cars."

The steel stocked and used by Abraservice covers the range 350-600HB and semi-stainless grades where corrosion is a factor; the individual composition of the various grades is tailored to meet requirements such as elevated temperature applications.

The company offers own-brand materials as well as those from other steel producers. It recently became UK distributor for Quard steel plate, produced by Duferco Clabecq, which claims to offer a wear-life of six to eight times that of mild steel.

"The choice of a grade of steel will depend on the life of the product and the application," says Hance. "It is very difficult to give figures for how much longer the product lasts compared with normal steel because it depends on the application and service conditions.

"But with our many years of experience, and support by the technical expertise of some of the leading steel producers, dialogue with customers to understand their needs is invaluable in giving a cost-effective solution to wear-related issues."

Hance sees the application of abrasion-resistant material on high-wear areas as a key investment to ensuring the longevity of expensive equipment: "If equipment is not looked after, companies cannot work efficiently. They need to maximise investment in maintaining their equipment because, in the end, they will see the return in terms of its increased operating life." ■

AT A GLANCE

With so much material to be recycled, the wear can take its toll on machinery. But using extra-strong steel in critical wear areas can make a difference

→ WWW.MRW.CO.UK/METALS

Comment online or by emailing mrw@emap.com



Cyclone made in Creusabro 4800 wear-resistant steel