



Love Linen Longer

*A new innovation in cleaning, to maximise
the life cycle of commercial linen.*



*Finalist in two LADA awards categories in 2019:
Green Impact and Best New Product
Nominated for Tomorrow's Care Award 2020*



Saving precious resources, stain by stain

A couple of years ago, Regenex was a start-up idea in embryo. We knew we had a great idea that could make a real difference for the laundry industry.

With nearly 100 years of experience in textile dyeing, we realised we had technologies to hand that could be harnessed in fresh ways as a stain removal process. We tested and refined our methods, and the rest is history.

We're proud to say we have now successfully processed 500 tonnes of linen that would otherwise have been condemned – and we're looking forward to the next 5,000.

The idea of restoring dazzling whites to the astonishment of our customers might sound like a 1960s detergent commercial but it truly happens like that – in a flash!

Yes, it seems unlikely that grey sheets or orange streaks of fake tan can be returned to pristine, hotel-grade condition, via our gentle cleaning processes, but they can.

This is why we offer free trials – so that customers can see for themselves what we can do. We're a small – though growing – company, but our ideas and ambitions are big.

For any business, the processes involved in lowering a carbon footprint are difficult and complex. Enlisting Regenex to treat commercial linen that would otherwise be condemned to rag or landfill is one, easy, win-win action that any laundry, healthcare or hospitality organisation can take.

This White Paper reads a little like a passionate manifesto for change – and we make no apology for it. We're committed to making a real difference, stain by stain.

*David Midgley, managing director
Paul Hamilton, technical director*

Regenex

Textiles and the hierarchy of waste management

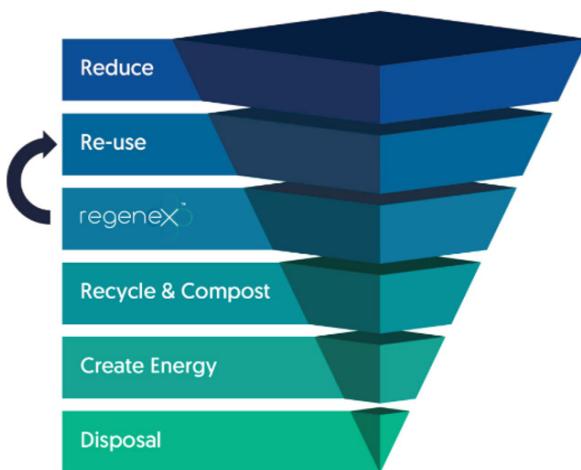
Our society is in a new era of environmental awareness that was long overdue. We know there is no Planet B and our intentions to change the way we live and work are good. Our actions, however, continue to lag behind.

An impressive 88% of respondents in one recent survey by Waitrose & Partners said they had changed their behaviour as a result of BBC's Blue Planet. But remembering to take our bags for life to the shops, shunning single-use plastics, and putting things in the right bins is just one part of the picture.

Developing good habits with domestic waste is easy when compared with disposing of whatever is no longer needed at work, while managers are busy with other concerns.

For too many businesses, an 'environmental policy' has been something extremely short, suitably over-arching, but very vague – existing as a web page and little else.

In 2019/20 that's simply not good enough. It's time for environmental policies to be every company's top priority – with detailed, time-specific actions and targets, reviewed and updated regularly.



As the hierarchy of waste – a concept enshrined in statute by the EU – points out, if items are not manufactured in the first place, they don't then have to be reused or recycled to avoid the dreaded landfill, a monstrous legacy of our carelessness.

The Waste Framework Directive of 2008 puts prevention or reuse as the best possible option. We know that when we throw something 'away', there is really no such place. We know our carbon footprints are heavier than they should be.

Sometimes matters are confusing or conflicting, and the least damaging options are not always obvious. For example, when considered over their entire life, did you know that paper and cardboard packaging embody far more greenhouse gases than their plastic equivalents?

Being more Millennial

We are only just starting to truly wake up to these tricky issues, and the need to take meaningful action – yet time is running out, and the environmental devastation to our planet is already irreversible.

We know that Millennials – those in their 20s and 30s, emerging as industry bosses and public policy makers – as a generation, are greener-minded than the older population.

But our current problems need all of us to pull together, now.

As businesspeople, we should all be more Millennial and do the right thing. We need to make it a priority to research and choose the more eco-friendly option, think hard about the resources we have to use – and which of those we can reduce or omit altogether.

Textile waste and the media

The environmental toll of 'fast fashion' has been well documented in the media – notably in BBC journalist Stacey Dooley's groundbreaking documentary *Fashion's Dirty Secrets*.

We're now seeing powerful forces for change, such as Oxfam's Second Hand September – in which participants were encouraged to say 'no to new' clothes. But, as we know, it's not just clothes shoppers buying vast amounts of textiles and discarding them too soon.

To operate day to day, laundry, healthcare and hospitality organisations need huge volumes of linen – all of which have required multiple gallons of water to produce, and have travelled thousands of miles to reach us.

Often there is needless waste – including tonne upon tonne of stained or discarded textiles, which could be treated by Regenex and returned to stock.

The dustbins of commercial laundries have avoided the limelight so far – but it is only a matter of time before they too come under greater scrutiny.

And savvy players in our sector are getting on board with this shift in attitude – to really begin to make a meaningful difference.

The responsibility of the laundry and linen sector

The matter of environmental standards, targets and ambitions for the UK laundry, hospitality and healthcare sectors fall to several different organisations that offer recommendations and accreditations, as well as upholding regulations.

This can make it hard for our industries to define a vision to which they can and should adhere.

The **UK Government's** over-arching 25-year ambition, launched in 2018, puts great emphasis on minimising what we throw 'away' – working towards zero avoidable waste by 2050 and ambitious future targets on landfill, reuse and recycling.

The **Textile Services Association**, which represents commercial laundries, has also pledged that the sector will do its bit within this strategy – by carrying on reducing energy consumption and carbon emissions, striving to meet climate change agreement targets, and considering the environment in everything it does.

Meanwhile, in the hospitality and leisure sector, a report on environmental credentials by sustainable business website **edie.net** in 2018 revealed 63% of respondents claimed they were more committed to reducing their carbon footprint than 12 months previously – but 42% found changing organisational behaviour difficult.

Initiatives such as **UK Hospitality** and **Green Tourism's** partnership – aimed at helping businesses achieve sustainability goals – are driving forward fresh thinking and making improvements happen.

The **NHS** has its own goals, and a major report in 2016 announced a reduction in carbon emissions of 11% in the eight years up to 2015, exceeding its 10% target. The wider sector, including public health and social care, saw a 13% decrease over the same period, and efforts to further advance continue.

In all industries requiring commercial linens, there are a myriad of ways to make improvements – through supply chains, fuel efficiency, reuse and recycling. But perhaps one of the easiest, and most often overlooked, is the simple business of making textiles last longer.

Shame of the early exit

So, what would the BBC investigative journalist Stacey Dooley find if she took a film crew into our nation's laundry houses, to see for herself some of those 743,651 tonnes of washing processed annually, at 134 sites, according to the Carbon Trust?

Stacey would also learn that, on average, 10% of laundry companies' turnover currently goes on new stock to replace

what's been thrown away. Some of that cotton and poly/cotton is truly worn out – but a significant proportion is of items that have simply been condemned too soon.

And this is where the investigative journalist would start to sit up and take notice. "So, that's stock that would be absolutely fine for many washes to come, were it not for the stains?" she would ask.

The simple answer is "Yes." And the environmental cost of this 'early exit' – textiles ragged or sent to landfill, long before the end of their potentially serviceable life – is staggering.

Particularly so, when it's considered that 70% of the carbon footprint of an item of linen is taken up in its manufacture. All the washing, ironing and transportation that comes after is only 30%.

This sorry situation becomes a full-on scandal, in Stacey's eyes, when it's revealed that 75% to 80% of such items could be cleaned – or re-dyed – and returned to stock to carry on clothing beds, medics and chefs for many months or even years to come.

The future for laundry waste

In summary, the need for launderers to be able to demonstrate a robust environmental policy will only grow in importance.

The sheer scale of the industry – worth £1bn annually in the UK, and employing more than 31,700 people across 3,700 businesses – means that any development to further this agenda, however subtle, has the potential to reap significant rewards.

In hospitality, particularly, forward-thinking brands are increasingly realising that doing the right thing by the environment is not only sound ethical practice but good for business, too.

One recent survey by global measurement and analytics company Nielsen said that 66% of consumers are willing to pay more for sustainable brands – up from 50% in 2013 – and this extends to hotels and holidays as well as consumer goods.

Suddenly, hotels that go no further than putting a 'please consider the environment' notice regarding towels in the ensuite bathroom, seem very behind our times.

Our six areas of service

- Stain removal of white linen pieces for hospitality and healthcare laundries
- Stain removal and re-whitening for workwear garments
- Topping up of shade for coloured tableware pieces
- Re-dyeing of tableware to new shades
- Dyeing of white pieces to new shades
- Expert solutions to individual, laundry-specific problems.



The Regenex offer

Regenex, based in Bradford, West Yorkshire, has devised a gentle, multi-bath cleaning system, using chemistry and technology, and sharing hot water on site with other textile processes.

Our treatment has a 75% success rate for the dirtiest linens. Fake tan, grease, oil, mildew, and concrete stains are no problem to us.

Our results are proven by independent testing, including with Leeds University. We started out in 2015 as a research and development arm of Bulmer & Lumb Group, established in 1920.

We have processed 500 tonnes of linen so far. Currently we have capacity to handle at least 15 tonnes of linen per week, but wish to grow our customer base and production capacity.

We are working with ever-increasing numbers of commercial laundries serving the healthcare and hospitality sectors, as well as NHS trusts directly.

**Would you like to test Regenex's services for yourself?
We are offering a FREE 400kg trial to any new customer. Get in touch today.**

During a recent trial of heavily iodine-stained items from a north of England city's teaching hospitals, 75.3% of items were successfully cleaned and returned to stock.

Significant numbers of lab coats and other workwear items have benefited from our treatment, extending their working life and saving them from an early exit to rag.

In addition to our cleaning service, as a dyer of fibres, we can re-bleach and re-colour items – restoring original shades.

This can be of particular interest for hospitality items such as tablecloths and napkins, which fade but don't wear out. We have also been able to apply our knowledge to rejuvenating tired-looking continuous roller towels – over-dyeing them blue to prolong their life – and the re-dyeing of polyester thermal blankets for healthcare.

Regenex customer case studies

Healthcare case study:

How Regenex rescued iodine-stained linens for hospital

Iodine stains in healthcare settings have long been as ubiquitous as the multi-purpose, germ killing agent itself.

Countless, crisp white sheets and medical uniforms have been ruined by drips and spills that leave deep, yellow-brown stains – often impossible to move, once set.

However, two centuries after iodine came into wide-ranging use, specialist cleaning company Regenex has devised a new solution to shift those stubborn marks in an impressive three quarters of cases.

Successful NHS trial

In a trial using discarded textiles from a major north-of-England NHS teaching trust, our technical team collaborated with chemical expert partners to achieve new levels of success.

The exact answer to a question that has long perplexed laundries – namely “How do you get iodine stains out of cottons and polycottons?” – cannot be revealed for commercial reasons.

However, we can say it is based on opening the fibres and using a chemically-engineered solution to lift the stain, followed by re-bleaching to render sheets the whiter than before.

The trial resulted in the effective removal of stains in more than 75% of previously rejected pieces – meaning perfectly-useable linens could be returned to stock, rather than condemned to landfill.

Involving careful treatment and rigorous testing, this operation was part of a much wider, ongoing programme of development at Regenex’s headquarters in Bradford, West Yorkshire – all aimed at refining new cleaning processes for all manner of stains.

Iodine treatment unveiled

The findings were revealed to much interest at the Society of Hospital Linen Services and Laundry Managers conference in Birmingham.

Now Regenex is ready to offer its expertise on iodine – as well as many other common marks, from fake tan to food, mould or rust – to new and established customers, all over the UK and beyond.

This will be good news for healthcare facilities managers, tasked with cutting costs and reducing the carbon footprint of their organisation.

This specialist cleaning system can reap wins on both counts, by reducing the need for replacement linen.

Money and resource-saving potential

Along with other applications – such as the tackling of pink stains on white linen, caused by red emergency blankets – our expertise has wide-ranging potential to save significant amounts of money and resources.

Some stained sheets and scrubs here and there may not seem like a big problem, but volumes add up. NHS laundry and linen cost a total of £188.7m in 2017 – and part of this figure was spent on the needless topping up of stock that could have been revived by us.

Medical professionals cannot keep iodine away from linens. The antiseptic, in liquid form, is essential in its purpose to clean wounds and skin before surgery or injections – and its tell-tale pigment is invariably left behind, wherever employed.

The big news is that those linens can be saved by Regenex, at a fraction of the price of buying new – with benefits for the environment, as well as hospital balance sheets.

Hospitality case study 1:

Bates of London saved 14 tonnes of linen and 38m gallons of water

A well-respected commercial laundry – serving London’s top hotels, health clubs and restaurants – is delighted with its first 12 months of results with Regenex.

Bates of London, established in 1886, sees its environmental credentials as a priority – an exemplary ethos, and a reason why the company was voted Independent Laundry of the Year.

Directors and management work hard to exceed regulatory requirements and minimise the firm’s carbon footprint – including reducing the use of materials and resources, and decreasing waste to the lowest practical level.

Spotless standards

Enlisting Regenex in 2018 has provided a real boost to this vision – resulting in the rescue of 14 tonnes of very heavily stained linen so far, which have been cleaned to the spotless standards demanded by high-end hospitality customers. Bates, the UK’s largest fully family-owned laundry, processes

Healthcare and hospitality successes

50 million pieces a year – a significant proportion of which will arrive at its Leyton base with heavy marks, be they fake tan, oil, rust, mould, food, or other spills and scuffs.

Historically, such items have been condemned to rag – and replaced with new stock. But Regenex has taken delivery of the seemingly ruined linen and used its gentle, multi-bath system to lift stains that were thought to be indelible.

Environmental gain

We have been so successful as to enable 14 tonnes of good linen, of a total of 18.5 tonnes sent to us, to be returned to stock. This is especially significant when it is considered that it would take 38 million gallons of water to grow crops for, and manufacture, an equivalent volume of new fabric.

John Kitchiner, General Manager at Bates of London, said: “We are very impressed with the service we’ve had from Regenex in our first 12 months of working together. Minimising waste, and making the most of resources, is very important to us. We are so pleased to see stained items, that would otherwise have gone to rag or landfill, revived and returned to stock.”

Regenex’s Technical Director, Paul Hamilton, said: “We are delighted with the results we have achieved with Bates of London. There is an obvious cost saving to making the most out of all textiles, so that they have as long a life as possible – but the greater gain is undoubtedly environmental.

“Fast fashion, and its toll on the earth’s resources, is firmly in the spotlight – and now the wider world is starting to demand more sustainable practices from the commercial linen sector, too.

“Bates of London is ahead of the curve and its very thoughtful and considerate environmental policy is setting it apart from its peers.”

Hospitality case study 2:

Saif Linen saw 70% return rate on heavily-soiled laundry

Many customers transport their dirtiest linens across the UK – and sometimes overseas – to benefit from the Regenex treatment, as our reputation in the commercial laundry industry grows.

In terms of carbon footprint, an occasional road trip is definitely worth it to achieve our reliable results that enable the majority of filthy, condemnable linens, revived and returned to stock.

One new client, however, is much closer to home. Saif Linen is

just three miles down the road from Regenex’s headquarters in Bradford, making our service even better environmental news.

Environmentally friendly operations

Saif, established in November 2012 by owner Ali Mohammed Arosh, works hard to ensure its operations are as environmentally friendly as possible.

The company, which serves the hospitality industry, has already become the first in Yorkshire to install Ozone to reduce the carbon footprint of its processing – and is making a conscious effort to minimise the use of plastic film, by packing clean linen directly into fabric bags.

Partnering with Regenex to get the longest possible life out of every item of stock – and therefore avoiding needless manufacture of new items, and the use of the world’s resources that entails – is the natural next step in this exemplary process.

Saif recently trialled 900kg of filthy items, that managers would have otherwise condemned to landfill or rag.

As these linens were free of holes or tears – simply heavily stained – most of it could be revived via Regenex’s unique multi-bath process, that enables the gentle opening of fibres and lifting of blemishes.

Of the 900kg sent to Regenex, an impressive 631kg was treated to meet high, hotel-grade standards of cleanliness – representing a total success rate of 70%.

In this trial, our processes were equally successful on table linen, bedding, napkins and pillowcases featuring a variety of marks and discolouration.

Though this would be impressive – and environmentally considerate – in itself, Regenex is now working with Saif to rescue as much as possible of the remaining 30% of items, by re-dyeing them to hide residual stains.

Regenex’s Technical Director, Paul Hamilton, said: “It is great to work with companies like Saif who are savvy in terms of their environmental impact, and are constantly looking for new ways to minimise their effect on our planet.

“Too much good linen with plenty of wear left goes to rag or landfill every day, simply because it is stained. This is a real waste – and absolutely needless, in the majority of cases.”

Paul continued: “Saif is not content with simply reviving 70% of this material, and is keen to explore other, re-dyeing options, for the remaining 30%. This makes the company a real leader in its field and a great example to others.”

Want to find out more?

Get in touch!



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