

Waste Silage Wrap in East Dartmoor: An Investigation Into its Source and Management

By

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For

Moretonhampstead Parish Council

In conjunction with

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Executive Summary

This research study gathered evidence from farmers and land managers who use plastic to make silage, in order to understand the challenges faced in managing waste silage wrap. The study also investigated the current regulatory framework for agricultural waste and its enforcement.

The study found that despite legislation in place to regulate the storage and disposal of agricultural plastics, there are significant problems of plastic pollution and challenges for farmers with the costs and logistics of managing the waste. It also found there were gaps in how agricultural waste regulation is enforced, and a lack of guidance on how to manage waste silage wrap effectively. In one example, a farmer who took over a farm faced significant cost removing plastic waste buried by the previous tenant(s).

Although this study was carried out in a small area of Dartmoor, it can be anticipated that similar problems may occur where silage wrap use is prevalent in farming.



Silage wrap litter discovered in horse manure.
(June 2021)

This investigation therefore makes the following recommendations.

To the Government and their regulators:

The lack of a national approach to waste silage wrap is causing the UK to fall behind other European countries in recycling rates. While it is possible to reduce waste silage wrap entering the environment by careful on-site management, there is a need for greater support to farmers to manage this waste:

- A supported nationwide recycling scheme for waste silage wrap, as it continues to be preferred by most farmers over silage clamps with a reusable heavy duty cover.
- An Accreditation scheme (such as Red Tractor) to provide incentives to farmers, for managing plastic waste well (eg through APE UK) or similar.
- Commissioning of research into alternative methods of silage to reduce or eliminate single-use plastic plastic, to include an assessment of whole life cost for farmers.
- Farm inspection schemes and guidelines which include the requirement to give advice and carry out compliance checks on the management and disposal of waste silage wrap.
- There needs to be greater understanding of the damage that waste plastic can do to farmland if not managed and disposed of properly, which can lead to considerable cost for landowners.
- It should be clearer to the public that waste silage wrap in the environment can be a type of pollution or fly-tipping and should be reported to the relevant authorities, so that incidents are recorded, and an assessment can be made of the extent of silage wrap pollution.

To the users and producers of the plastic wrap:

Farmers should follow advice on best practice when using and disposing of the waste wrap. Manufacturers and suppliers of silage wrap should be doing more to improve the sustainability of their products, and advise on its management and recycling.

To the general public:

If you are concerned about incidents of plastic pollution you should report it to the relevant authorities e.g the Environment Agency (as a pollution incident) or to local authorities if it has been fly-tipped.

Joining a local action group can also help with raising awareness of the issues with waste wrap, spreading good practice for its management, and carrying out clean-ups (litter-picking).

Acknowledgements

The aim of this report was to better understand some of the current issues faced with silage wrap waste in the countryside, helping to inform business owners of their obligations and incentivise them into making best practice decisions.

It is also hoped that it empowers individuals to feel confident in reporting waste they encounter in the countryside, and highlights the issues to those in positions of influence at the legislative level. If there is just one positive outcome from this report, it is hoped that it can help to make a difference to preserving and enhancing this beautiful and uniquely biodiverse county we live in.



Windswept silage wrap tangled into a hedgerow.
(February 2023)

On a personal note, I thank Teignbridge District Council and Tidy Teignbridge for funding this study, and to Moreton Action on Plastics for giving me the opportunity to undertake this work. I am grateful to everyone who offered advice and perspectives and took part in interviews towards the forming of this report, whether it be via email, in person, video or phone call.

This is by no means an exhaustive report, but is a fair assessment of the information gathered and opinions expressed. Once this document is available in the public domain I hope additional discussions will arise, be it in the boardroom, public bar or committee meeting.

Cover photo: Partially buried and loose plastics, together with other agricultural waste littering a hedgerow near Lustleigh, Dartmoor (February 2023).

Andrew Fletcher

May 2024

Introduction

The project originated when local volunteer group Moreton Action on Plastics (MAPs) found, while collecting litter around Moretonhampstead Parish, that the volume of silage wrap waste greatly exceeded all other types of litter. Yet little was known about why this litter was so prevalent and what could be done about it.

Teignbridge District Council introduced a scheme in 2021 called **Tidy Teignbridge** which was designed to help parish and town councils within Teignbridge district to tackle the problem of litter in their area. Moretonhampstead Parish Council applied to the scheme for funding to carry out a study of plastic silage-wrap waste in the countryside to investigate this aspect of rural litter further.

The project has been managed by Moretonhampstead Development Trust, who appointed an Environmental Researcher, Andrew Fletcher, to carry out the study, and this report is the result of his work.

This study aims to better understand its occurrence, how plastic silage wrap waste arises, the problems it causes, how it is managed, and how silage wrap waste is regulated.

This is a preliminary study which gathers together relevant information, including from the experience of farmers. It makes recommendations for further action to reduce the occurrence of this waste in rural areas.

Catherine Fileman-Wright

John Willis

Chair of Parish Council

Chair of Moretonhampstead Development Trust

May 2024

Methodology

The study began in June 2022, with desk-based research gathering information from multiple resources and data previously gathered by Moreton Action on Plastics (MAP). Team meetings, online seminars and discussions with members of the Environment Agency, Westcountry Rivers Trust and Natural England also gave invaluable insight into the processes described herein.

The study also included visits to a number of farms within the rural area surrounding Moretonhampstead, so that the viewpoints and experiences of a variety of farmers could be better understood. We prepared a short set of questions ahead of meeting with landowners, and inevitably the discussions ebbed and flowed across varying viewpoints. We found that those interviewed were very willing to discuss their processes, the merits and issues associated with handling and processing their waste plastic and we are very grateful to those who took part in the study.

The interviews are summarised and anonymously presented within this report.



Discarded wrap near bale pile on Dartmoor.
(June 2023)

In addition, many useful insights and leads were gained through talking to members of the community at events such as the Chagford Show in August 2022, Devon Wildlife Trust (DWT) local group events, Action on Climate in Teignbridge (ACT) events and the Bovey and Heathfield Climate Emergency group (BHCE).

Background and Context to the Problem

Moretonhampstead is a parish to the north east of Dartmoor, where the surrounding rural farmland is used mainly for the rearing of cattle and sheep.

Pressures of production have increased the head count of livestock on farms. English summers are not warm or consistent enough to produce sufficient quantities of hay to feed all of the livestock all year round. From the 1960s to 1980s, silage production became more commonly used than hay as the method of preserving any harvested grass for the winter months and beyond.

The first method of storing silage was the silage clamp in the form of a tip or pit. The cut grass was heaped there and compressed as tight as possible (usually by a tractor or other machine rolling over it) and then covered by tarpaulin to keep out the rain and air. This was generally topped off by plentiful old tyres or similar to keep the tarpaulin well anchored down.



Unsecured waste wrap at farm field entrance on Dartmoor.
(March 2023)

During the winter months when the stock needed feeding - the farmer would cut (initially by hand) a section of the silage to take to the livestock wherever they were at the farmyard. As time went on this method was generally discontinued in favour of creating bales of silage through a specialist machine. Cylindrical bales of approximately 200 kg each could then be placed in remote field locations closer to the livestock.

Silage bales had many advantages: using Linear Low Density Polyethylene (LLDPE) to wrap the product is an excellent product choice being strong, flexible and readily available. When applied correctly, it ensures that the fresh cut grass stays moist and free from contamination as given time it ferments into good quality animal fodder. And - just as important - it allows the farmer much easier handling than the old method.

But as with every manufacturing process, the forming of polyethylene does have disadvantages. It is a single-use plastic product manufactured from raw crude oil using energy intensive processes. It can be harmful if ingested by animals and can have detrimental effects to the environment by becoming an eyesore and inhibiting plant growth. If left to break down (or indeed if trampled down by the animals), it can contaminate the soils and pollute waterways.

Research conducted by APE UK¹ estimates up to 20,000 tons of new silage wrap is sold each year in the UK alone. Of this, it is estimated only up to 25% is recycled, with the rest ending up in landfill, incinerators or as litter. Recycling rates across mainland Europe are much higher, in each case supported by not-for-profit well established schemes operating on the principle of shared governance across the industries. For example in Sweden, up to 90% of agricultural plastic waste is recycled with support from the SvegRetur² scheme.

Any used wrap that is not stored securely will disperse across the countryside, becoming fragmented (via effects such as natural weathering or trampling by livestock) and therefore is increasingly difficult to collect over time. If left as litter it will break down into smaller components, releasing contaminants such as antioxidants, additives and stabilisers into the surrounding soil and waterways³.

Millions of tons of polyethylene are disposed of in landfill each year across Europe. Recent research shows that PE⁴ can take 10 years to even begin the degradation process in landfill conditions, only then to begin leaching the aforementioned contaminants into the land.

National media coverage and increased awareness of sustainable practices have seen a push to find alternatives to landfill, and there are now increasing numbers of commercial companies within the waste industry offering recycling services to agricultural businesses. New European research shows that recycling efficiencies are dependent on the state of the material and the volumes being processed⁵.



Waste silage wrap trailing in brambles on the River Teign.
(December 2022)

The agricultural industry has to become more sustainable as the UK pursues its net-zero commitments, and this is being enforced through legislation. The UK has drastically fallen behind its European neighbours in recycling rates as there is no centrally governed scheme in place to help spread awareness, support emerging recycling markets or to incentivise the farming community. For further detail on the current UK market for recycling agricultural plastics please see **Appendix D**.

The handling and disposal of agricultural waste plastics is a worldwide problem, being tackled with varying degrees of urgency with associated financial and environmental costs at every step of its use. The products are produced from crude oil, are increasingly more expensive to

manufacture and distribute, and through legislation introduced by the UK government now have associated costs, borne by farmers, rather than manufacturers, for the safe disposal and recycling.

Legal Framework in England

Allowing agricultural plastic waste to litter and contaminate the countryside is illegal.

Under the *Duty of Care and Waste Management (England and Wales) Regulations 2006* waste producers including farmers are required to⁶ :

- Keep waste to a minimum - prevent, reuse, recycle or recover waste (in that order)
- Sort and store waste safely and securely
- Complete a waste transfer note for each load of waste that leaves your premises
- Become registered for waste transfer or use a registered contractor
- Ensure that your waste carrier does not dispose of your waste illegally

Burying or burning waste plastic on agricultural land was made illegal when these regulations came into force, although we found evidence from our interviews with farmers that on some farms waste is still buried or burnt (see section Interviews with Farmers).



New tenant digging out a previous occupants buried waste in the Teign Valley.
(June 2021)

The 2006 regulations classed agricultural waste as business waste, and therefore it cannot be collected as part of curb-side household waste collection. Used silage wrap should be securely stored until it is ready to be disposed of in a permitted manner.

Farmers and landowners have a range of options for dealing with their plastic waste products, which include:

- Taking the waste material for processing off-farm at a licensed site, at a maximum of a 12-month interval. Farmers must be registered as a waste carrier with the Environment Agency to be able to do this⁷.
- Arrange for an authorised contractor to collect the waste material, at a maximum of a 12-month interval. The contractor must be registered with the Environment Agency⁸.
- Register for a licence exemption with the Environment Agency in order to recycle or dispose of waste on-farm.
- Apply to the Environment Agency for a waste management licence, or a landfill permit to recycle or dispose of their waste and others on-farm.

Waste transfer notes should be kept for at least 2 years by the farmer as evidence of each transaction - essentially a receipt confirming where the waste originated, where it is now, and what it is. The Environment Agency or other assessor may need to see these so they are important to keep.

BUSINESS LOGO HERE	Business Name 1 Waste Lane, Wasteville, W8 STE	Waste Transfer No. 00000
	Tel: 00000 000000 Fax: 00000 000000 Email: xxxxxx@xxxxxxxxxx.co.uk	DUTY OF CARE WASTE TRANSFER NOTE
Section A – Description of waste		
A1 Description of the waste being transferred: _____ List of Waste Regulations code(s): _____		A2 How is the waste contained? Loose <input type="checkbox"/> Sacks <input type="checkbox"/> Skip <input type="checkbox"/> Drum <input type="checkbox"/> Other <input type="checkbox"/> _____ A3 How much waste? For example, number of sacks, weight _____
Section B – Current holder of the waste – Transferor		
By signing in Section D below I confirm that I have fulfilled my duty to apply the waste hierarchy as required by Regulation 12 of the Waste (England and Wales) Regulations 2011 Yes <input type="checkbox"/>		
B1 Full name _____ Company name and address _____	B3 Are you: The producer of the waste? <input type="checkbox"/> The importer of the waste? <input type="checkbox"/> The local authority? <input type="checkbox"/>	

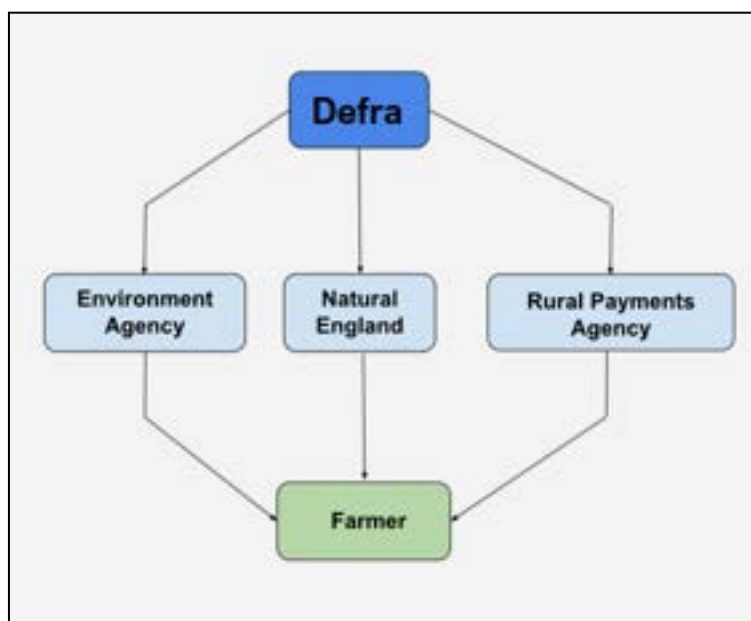
Example of a waste transfer note

Farmers and all other users of agricultural plastics have legal responsibilities under the Waste Duty of Care: Code Of Practice⁹. The code applies if you import, produce, carry, keep, treat or dispose of certain waste in England or Wales. Failure to comply with the duty of care is an offence which holds no upper limit in fines that could be imposed in court. Further information on managing waste and transfers can be found at the .gov website¹⁰.

The government department, the Department of Environment and Rural Affairs (DEFRA) is responsible for waste legislation and policy. There are a number of DEFRA agencies who are responsible for compliance and enforcement¹¹.

DEFRA's website states:

"We are responsible for improving and protecting the environment. We aim to grow a green economy and sustain thriving rural communities. We also support our world-leading food, farming and fishing industries."



Simplified framework flow diagram

The Environment Agency (**EA**) is the government agency that enforces waste legislation, implements DEFRA's policy and advises the public and business owners over environmental regulations and procedures¹². Working with the EA, farmers and business owners should ensure that the actions they are taking to comply with the appropriate legislature are correct and permitted.

Incidents of waste crime and any suspected pollution to water and land can be reported by anyone to the EA¹³ website, pollution hotline or via Crimestoppers (serious crimes) and local council bodies. The EA categorises suspected pollution events according to severity and impact on the landscape, and investigates them accordingly. All reports are maintained on a database and help to build an understanding of locations.

Agricultural Regulatory Officers employed by the EA aim to encourage recycling without penalising the industry in terms of costs or punitive legislation. They work alongside various Non-Governmental Organisations, for example the National Farmers Union (NFU). Legal enforcement is reserved for the higher category offences, whilst community engagement, education and encouragement is seen as garnering more positive results.

Like all regulators in England the EA must act in accordance with the statutory Regulators' Code and the EA's website sets out its approach to regulation.

The code requires regulators 'to carry out their activities in a way that supports those they regulate to comply and grow.' During a meeting with the Senior Agriculture Environment Officer, EA Devon, Cornwall and Isles of Scilly, they stated:

“As regulators we must ensure minimum legal requirements are met on farms. We will support farm business to ensure profitability and resilience to the changes facing the agricultural sector.”

Natural England

Natural England (**NE**) is sponsored by Defra as the government’s adviser for the natural environment in England¹⁴. Natural England employs teams of Catchment Sensitive Farming Officers who visit farms on notified Sites of Specific Scientific Interest (**SSSI**), National Parks and Areas of Outstanding Natural Beauty (**AONBs**). They offer advice on reducing pollution, increasing biodiversity and suggesting development opportunities.

Natural England employs advisors who are trained to help farmers implement practical solutions to reduce pollution events caused by their farms on the lands and waterways. If these advisors observe farms that are in breach of environmental laws then this information will be passed on to the RPA and the EA which could eventually lead to reductions and prosecutions.

Together with the Woodland Trust, Natural England locally manages the East Dartmoor National Nature Reserve which encompasses Trendlebere Down, Yarner Woods and parts of the River Bovey valley towards Lustleigh and Moretonhampstead.



Trampled wrap and twine, later cleared by landowner near Hennock.
(August 2023)

Rural Payments Agency

The Rural Payments Agency (**RPA**) is an executive agency of Defra, to which agricultural landowners are able to apply for business funding¹⁵. The baseline level of support currently offered by the RPA to landowners is known as the Basic Payment Scheme (**BPS**)¹⁶ and all farmers are eligible to apply.

The RPA inspects farms that have applied for BPS and any specific additional capital grants such as the Countryside Stewardship (**CS**) fund. The RPA employs teams of trained inspectors who carry out site based inspections. Checks are carried out by inspecting the farmland, animals and business practices to ensure that various criteria are being met. This inspection and validation is known as cross compliance.

After successfully demonstrating compliance to the RPA, agricultural land owners receive payments twice a year. These payments are based upon the types of land and farming practices that are conducted, and any other additional funds that have been applied for. For example, there are modified rates for farming moorland, and additional rates available if you are actively improving the biodiversity of the landscape around your farm.

Repeated breaches in cross-compliance that are ignored through warnings and fines will then lead to prosecutions if improvements are not observed on subsequent inspections. Depending upon the circumstances, there are other organisations that may be able to assist with tackling waste offences, including, such as Dartmoor National Park Authority and Trading Standards.

Dartmoor National Park Authority

The Dartmoor National Park Authority (**DNPA**) has a primary duty to conserve and enhance the natural beauty, wildlife and cultural heritage of Dartmoor¹⁷. It is the local planning authority for Dartmoor and it considers and decides on all planning applications with respect to its primary duty.



Winter wrap being buried by spring growth.

(March 2022)

The DNPA employs a team of rangers whose duties include the enforcing of the bylaws of Dartmoor. These bylaws encompass regulations on littering and illegal dumping of waste, which are enforceable through engagement, verbal and written warnings, cautions and potentially, eventually, prosecutions.

As part of this report we approached the DNPA through various channels for their comments on the current laws and enforcement, and how they felt about the situation across Dartmoor. Unfortunately no response was received.



Unsecured silage wrap and bailer twine in a farm yard near Moretonhampstead.
(December 2022)

Trading Standards

Trading Standards and their officers (**TSOs**) are employed by local authorities to enforce Trading Standards laws¹⁸. They offer a service to support and give guidance to legitimate businesses, and they also offer protection to consumers from businesses that may be trading unfairly or illegally. The agricultural support offered includes guidance on how to follow successfully the often complex legislative procedures that are in place.

Farm Payments and Environmental Legislation

At the time of preparing this report, the Basic Payment Scheme (**BPS**) was the largest rural payment scheme providing financial support to the farming industry. The amount paid was based on the number of hectares, with 5 hectares of eligible land as the minimum. By 2027 this scheme will be completely phased out and replaced by the Environmental Land Management Scheme (**ELMS**). Please see **Appendix B** for further details.



Waste wrap uncovered by new landowner, buried by previous occupant in the Teign Valley.
(June 2021)

Currently, when a farmer or landowner registers for grant money from the Rural Payments Agency under the Basic Payments Scheme they must adhere to specific criteria based upon the way they work their land. This list of criteria are known as cross compliance checks and must be satisfied in order for full payments to be received. Members of this scheme will be subject to visits from inspecting officers.

Farmers and landowners may receive a visit from:

- **The Rural Payments Agency**¹⁹ together with the Animal and Plant Health Agency (APHA) performs cross compliance checks according to the grants that have been applied for. Farmers may not receive advance warning of these visits and they may occur more than once in a year.
- **The Environment Agency** if a farm has faced complaints about the working standards, or if a farm wishes to change the permissible activities through a permit variation. If there is a risk of pollution to the environment from a business, then an Agricultural Regulatory Officer may visit.
- **Natural England** if the farm is situated on a Site of Special Scientific Interest (**SSSI**), sits within a National Park, an Area Of Outstanding Natural Beauty (**AONB**), or is undergoing an Environmental Impact Assessment²⁰.

- **Trading Standards** who are employed directly by the local council, in this case Devon County Council (**DCC**). They are able to send officers to inspect farms for matters of hygiene, animal welfare and cross-compliance criteria checks. Specifically for plastics, if a farm is found to not be storing and disposing of the waste in the correct manner then this could be escalated to DEFRA, leading to direct visits from them and reductions to the BPS income as described above.

As part of these checks, waste transfer notes may be requested and inspected. Farmers must keep copies of all waste transfer notes the farm receives, and must use a registered waste handler. Evidence of non-compliance through negligence can result in payment reductions and additional fines, which can escalate to intentional breaches and fines of up to 100% of BPS income²¹.

If the RPA receives a report from any of the above agencies or any other reporting body (such as via the Animal and Plant Health Agency, Forestry Commission or the Veterinary Medicines Directorate) that indicates a breach in cross-compliance, then the RPA will issue warnings and then escalate to payment reductions as necessary.



Bale pile with waste wrap trampled into the soil.
(March 2023)

The Environment Agency enforces permits for the transfer of waste, its safe disposal and the assessment of exemption applications. Across Devon and Cornwall, the EA now has a team of Agricultural Officers who will visit premises, which have been deemed slow to respond to improvement requests previously made by themselves and the RPA.

The RPA scheme relies heavily on farmers and business owners' willingness to support the natural environment, uphold excellent conditions for their livestock and to improve biodiversity in the surrounding ecosystems.

Research Findings

Over the period covering December 2022 and June 2023 we spoke to 8 farmers from the eastern region of Dartmoor concerning their use of silage wrap and their thoughts on the matter of its disposal. We are very grateful to them for generously giving us their time. The following table offers a brief summary of findings, with individual interview notes afterwards. All comments and data are presented anonymously.

Farm	Approx acreage*	Bales / yr	Quantity** and cost of wrap / yr	Disposal site and costs 2021-2022 / t	Red Tractor member	Support schemes identified
1	300	1,100	Contractor	B.G.Pearce 1t, minimum charge***	Yes	BPS FiPL
2	450	1,200	£4,000	B.G Pearce 2 x 2t loads	No	BPS
3	1,200 for own use	None	See notes	Formerly Greenaway, every other year	No	BPS
4	Currently none	See notes below	Contractor	B.G Pearce < 1t minimum charge	unknown	unknown
5	80	400	Contractor	B.G Pearce \approx 0.3t, minimum charge	Yes	BPS
6	250	300 silage / 400 hay	Contractor	Unnamed site in Cornwall £200 / t	Yes	BPS
7	600	2,000	No	B. G Pearce	Yes	BPS
8	See notes below					

* Quoted total acreage includes rented land

** 1 roll of wrap will cover 16 to 30 bales depending on how many layers are used. Many farmers use a contractor for this process, and due to volatile pricing, increasing numbers of these contractors now require the farmer to purchase the wrap in advance..

*** The minimum charge at time of interview was £150.00 plus VAT.

Note: Red Tractor quality assurance scheme, see **Appendix A** for further details.

BPS = Basic Payment Scheme, FiPL = Farming in Protected Landscapes

Individual Farm Interview Notes

Farm 1

Farmer 1 told us that wrapped bales are kept in stacked piles out in the fields. As each bale is used the discarded wrap is pushed into a corner of the enclosure. The problem here is the wind and when it comes to Spring they 'have to walk around the field collecting it'.

“No doubt about it – plastic waste is an eyesore”

Farm 2

Farmer 2 told us that when the weather is good they make more hay – using a hay baler with a wrapper attached behind. In the winter months, after opening the bale to feed the stock it is easy to roll up the waste into a bundle and store it in the tractor cab to take back to the yard. With silage “we roll up the wrap and collect in a pile in the field. Of course it gets wet and in the summer we have to pull it all out with the digger and spread it out to dry as far as possible”.

This farmer is also a farming contractor. He makes 1,200 bales for his own use which costs around £4,000 pa but including the wrap for his clients the annual silage wrap bill is around £9,000 pa. Because of the cost of wrap he is thinking about reverting to the old silage clamp method.

With regards to supporting the Red Tractor Scheme – his impression is that farmers are leaving the scheme as there are not enough benefits compared to the costs of being in the scheme.

Farm 3

Farmer 3 says that in Europe farmers are paid for taking their waste plastic to the disposal site. Here in England “a lot of farmers just burn their silage wrap and other plastic rubbish”.

On the Red Tractor Scheme, he is not impressed by their inspections. They only require to see one ticket of waste disposal / transfer and don't insist on the most up-to-date ticket.

Recently, Farmer 3 has reverted to using a silage clamp. This so far has proved very successful. There is no wastage of fodder at all if the edges are sealed properly. The heavy duty plastic cover can be reused. This year (2022) he made and wrapped no bales at all. When it comes to feeding in the winter “I use a shear-grab which cuts and grabs at the same time so it comes away almost like a bale. This is the way forward”

Farm 4

Farmer 4 is the farmyard manager and did not deal with the financial aspects of the business. All bales (silage, haylage and hay) are stored in a barn.

When dealing with wrapped bales, he slits the wrap with a penknife, removes and rolls up tight and puts in a builder's dumpy bag which takes about 40 wraps. Once a year he takes it to B.G Pearce's where they put it through a washing cycle then recycling.

Farmer 4 disapproves of other farms where plastic waste is allowed to blow around or get into the soil.

Farm 5

Farmer 5 says on dealing with used plastic: “wrap is rolled up and stuffed in a dumpy bag. We try to keep it clean and dry”. Once a year they take approximately one third of a ton to B.G Pearce’s and have to pay the minimum charge of £150.

“The best practical alternative to bales is the silage clamp. The effluent can be mixed into dung before spreading”.

Farm 6

Farmer 6 says that as they use the bales they “put the plastic wrap into a big plastic bin and weigh it down to prevent the wind from taking it”. He and a neighbour share the annual job (and charge) of taking their waste silage wrap to a disposal site in Cornwall.

“I see some people burning it – the problem is the money”.

Farm 7

The largest of the farms, with approximately half of it rented out.

The farmer was not actually aware that it was against the law to burn, bury or simply keep plastic waste on the farm. But he himself does not do any of these things and strongly condemns it as bad practice. He felt that there should be stronger measures to police farm standards. “You need something already in place and Red Tractor fits the bill”.

He described farm inspections on his farm:

- Trading Standards: Recently visited out of the blue – no notice. They checked animal welfare records, drug records, stock movements, ear-tags, barns and boxes. They did not ask to see waste transfer tickets.
- Rural Payment Agency: Has only had one visit (unannounced) to check on BPS compliance in 50 years of farming. This check did not include looking into the waste plastics on site.
- Higher Stewardship: A recent visit limited to check on standard and lengths for walling and hedging done. Also checked invoices and bank statements to check payments had been made before the grant could be released.
- Red Tractor: The only organisation that does require to see waste transfer tickets.

Disposal of plastic wrap: All plastic sheet and net is collected in separate heaps beside the farm buildings and taken to B.G Pearce at the end of winter feeding. Usually about 2 tons which costs around £300.

Alternatives to plastic: For several good reasons the clamp method would not suit his farming operation. But it could perhaps be practical to dairy farms where cows are kept inside and the clamp can be sited immediately nearby.

His solution to waste plastic litter on farms:

“Better inspection and follow-up ...this should be built on an inspection system that already mainly works well – ie Red Tractor.....no-one else investigates or has any interest in this problem.”

Farm 8

This farmer recently purchased several fields which had previously been used for rearing cattle.

“At first I just saw a little bit of plastic here and there. Then started pulling it out by hand – it was only the tip of the iceberg. Both netting and wrap were everywhere inside the soil, tangled in roots of the grass and bushes, incorporated into the land. Digging it out by hand was not going to be an option.

“So the machines came and scraped the surface, leaving mounds where we had to pull the smaller pieces of plastic out by hand. It took 3 years to do the bulk of it and around £20,000 in contractors and recycling which I could ill afford.

Now I still always carry a rubbish bag with me when I am on the farm and I keep picking big sheets and shreds that have broken up. There is still a lot buried. Every time I fill a household bag with the plastic I find. And that’s just by picking it casually as I go, not dedicating allocated time to it.”

This farmer discovered from neighbours that the previous owners/farmers would dump a silage bale, slit the top and sides open, and simply leave it to the cattle to pull out the silage. The plastic wrapping would be trodden into the field with lots of torn off sheets blown into surrounding hedges. This went on for many years.

The current owner, who inherited this pollution problem, feels angry about the lack of interest shown by the Environment Agency and other authorities when this evidence was presented to them.

Other Sources Consulted

As part of this study we also visited the 120th Chagford Agricultural and Horticultural Show²², just outside of Chagford and bordering the Moretonhampstead Parish. The event took place on Thursday 18th August 2022, and was a very upbeat day showcasing much of what the locality had to offer. Many local farmers were in attendance to show their stock and produce whilst mingling with traders and most importantly having the chance to chat to other farmers.

There were many local craft and food producers using locally sourced materials, and the event day prided itself on hosting only ‘plastic free’ food traders. We found no stands offering support to make the industry more sustainable. Perhaps the cost of paying for a trade stand does not yet reap sufficient benefit for these fledgling trades.

One farmer we spoke to suggested that someone collects their dirty waste plastic, and they are not sure what is done with it then. They said “they probably burn it”.

We visited the Young Farmers Association (YFA) tent, and asked if there were any modules on sustainable practices or reducing plastics use in farms. They were not aware of any - and nor can we find anything on the YFA website.

There were however many positive interactions with show attendees and traders, including Trading Standards, Devon CPRE, Devon CLA and the River Teign Restoration Project (see **Appendix A** for further details on these organisations).



Assumed 2022-23 waste in foreground, with 2021-22 waste partially buried in background. Field near Lustleigh.

(March 2024)

A Virtual Meeting with the Environment Agency (EA)

We initially contacted the Environment Agency with a freedom of information request (FOI) on tackling agricultural plastic waste. This led to an email dialogue with the compliance and recycling in the Devon, Cornwall & Isles of Scilly team, which provided useful guidance towards this report.

In June 2023, an online meeting was held alongside multiple Environment Agency staff, plus representatives from Clean Devon and the Country Land and Business Association (CLA).

The valuable meeting was useful in that we heard first hand from a senior Environment Agency agricultural enforcement officer, explaining how they conduct farm visits through advice-led encouragement towards compliance. This method of engagement with farmers is focussed on priority areas i.e. where watercourses are failing to meet water standards, with an emphasis on guiding farmers towards where they need to be in order to meet their duties. The meeting also highlighted how the EA prioritise and categorise pollution events, and a summary of these response categories are outlined in the following table.

Environment Agency response	Outline of criteria
Category 1	Major damage to nature conservation or protected species, particularly in a protected landscape or area of scientific interest.
Category 2	Significant but localised or temporary deterioration in ecological status to nature conservation or protected species.
Category 3	Minor damage to nature conservation. Reversible small-scale, short-term damage.
Category 4	Substantiated incident but with no impact to nature conservation.

It was communicated that Environment Agency inspectors do request to see waste transfer notes to check where waste is going, and that discrepancies in paperwork can lead to uncovering wider problems.

We did not learn of enforcement action resulting from an inspector not being able to trace plastic waste at a farm, or for poor practice handling and managing the waste. The Senior Agriculture Environment Officer reported that:

Our aim is to encourage recycling without penalising the industry in terms of costs or punitive legislation, and work with NGO's to promote this

The EA explained that they were increasing the number of farm advisors but they would be prioritising the Tamar river catchment which has been highlighted as a problem area for water quality in accordance with government guidance to the EA prioritises tackling diffuse pollution²³.

Study Summary

This study found one example of an enforcement case from January 2023, which saw a Devonshire farmer ordered to pay almost £74,000 in fines and receive a suspended jail sentence for illegally grazing cattle on a SSSI and failing to comply with the warnings. During one site visit, Natural England staff observed approximately 80 empty plastic silage wraps littering the site²⁴. In this case, the silage wrap was a secondary compliance issue but it was documented in the case.

The study found that only Red Tractor assessors had asked to see waste transfer notes confirming where used silage waste wrap had been disposed of, and of the farmers we interviewed, none reported that either Rural Payments Agency or Environment Agency assessors had ever requested to see such information. Whilst our interviews were by no means exhaustive of the local farming population, it does help to enforce the idea that farmers may not expect to be assessed on this management of waste silage wrap when such a visit arises.

From these interviews with farmers the four following practical suggestions emerged.

- Provide financial assistance to buy purpose-built bins or shelters that are rain-proof and wind-proof.
- Pay farmers to take clean dry silage wrap to disposal sites, or include costs at point of purchase where used wrap can be returned.
- Silage clamps – use as an alternative. Investigate and provide financial assistance to build silage clamps to high environmental standards.
- The Red Tractor scheme employs assessors interested in seeing waste transfer notes for the correct disposal of agricultural plastic waste. This is a voluntary scheme that not every farm is required to be part of, and there are currently mixed feelings about the effectiveness of the scheme.
- Consideration be given to including training on managing plastic waste sustainably and other sustainability training at agricultural colleges.

Discussion

What Could Farmers do?

Users of silage wrap are under legal obligation to store the waste products safely and securely. In line with other best practice methods encouraged by the Preventing Plastic Pollution project (reference), this report recommends to:

- **Shake** off loose materials from the used wrap before storing. The cost of recycling to the user is calculated on gross weight, therefore keeping the material as dry and clean as possible means you will be charged less. It also increases the likelihood of the waste being repurposed as a useful material.
- **Separate** different materials according to your chosen waste handlers requirements, otherwise the collection may be faced with a surcharge or even rejected.
- **Store** the materials in a waterproof environment until they are ready to be processed. This will stop waste plastics escaping to the countryside and also prevent contaminated water from leaking out onto your land.
- **Send** the material via a registered waste handler or register to do this yourself.

By following these recommendations, plastics users should see an improvement in the future sustainability of the business, a tidier and more efficient farm and a positive attitude (ticked boxes?) at their next cross-compliance inspection.



Plastics waste littering the bed of the Bovey Stream.
(July 2022)

For further practical advice with meeting the Duty of Care obligations under Section 34 of the Environment Protection Act 1990 visit the **Right Waste, Right Place** website²⁵.

Farmers and landowners of Dartmoor are able to recycle agricultural plastic waste locally. To meet the national net-zero targets, the recycling process is being supported by a growing network of private businesses across Devon, the southwest and nationwide. Examples of some local businesses can be found in **Appendix A**. However, at the time of writing this report there are no council run recycling facilities for processing waste agricultural wrap and other such business plastics.

Agricultural waste materials need to be transported to a specialist facility, sorted and cleaned before they can be recycled. Polyethylene that has previously undergone the recycling process offers reduced mechanical properties and therefore fewer ongoing uses, so is often blended with virgin materials to ensure compatibility and compliance when forming a new product. For example, silage wrap needs to maintain a certain level of elasticity otherwise it will not adequately seal a bale from external weather effects.

Following a 2021 campaign headed by the NFU²⁶, Silage wrap was made exempt from the UK Plastics Packaging Tax of 2022, which dictated that all qualifying plastic packaging requires a minimum of 30% recycled content or be subject to additional taxation of £200 per tonne. The NFU advertised this as a win for the farming community, thereby avoiding this new tax, but many saw it as a backwards step in combating an already unsustainable problem for the industry.

It is preferable to store any used wrap in a waterproof environment, such as a barn or a sealed container. If you can stop rain getting in and leaving as contaminated fluid there is a huge potential to reduce pollution in the soil and waterways around your farm. This also makes it cheaper (and lighter) to recycle. Farmers told us that they:

“Store the used silage wrap in 1 tonne bulk bags that can be lifted and drained of water in the summer months. ”

and also:

“Rake the waste wrap flat when the sun shines for quick drying, then bag it back up ready for recycling.”

The key point here is not to allow it to litter the yard and countryside. Loose wrap will get trampled in by cattle and machinery, become dirtier, and ultimately break up into smaller pieces. It will contaminate soil, waterways and foods, and will be costly to clear up when picked up by an inspector. Ultimately it is an unsightly mess and could easily be reported by anybody passing by.

Keeping the used wrap clean and dry helps the recycling company, as the materials need to be sanitised as part of the processing. Reducing their costs as well helps to streamline the entire process for everyone involved. Many waste handlers and recyclers will ask you to store different types of waste separately in order to:

- Avoid cross contamination of waste types.
- Ensure the products can be reused as efficiently as possible.
- Help you complete the waste transfer note correctly.
- Conform to your cross-compliance checks at assessment.



Agricultural plastic waste discarded near Lustleigh.
(February 2023)

There is in place a national scheme organised by FWAG²⁷ that runs annually from April to May, and for the past 20 years has organised drop-off locations for Farmers to weigh-in their plastic recycling. This is particularly useful in the remote areas of Devon where access and haulage costs may be a prohibitive factor, but it still comes at a cost.

FWAG currently have registered collection points across Devon at Coryton Farm, Kilmington, Axminster, Newcott Farm, Yarcombe, Devon Grain, Cullompton and Blackmoor Gate Market. They looked at expanding this to within Dartmoor National Park but were unable to find a willing host site with suitable access and with a weighbridge.

In a final note, FWAG mentioned that particular challenges for getting farmers to commit and arrive on the day of waste transfer include broken down vehicles and TB testing. For the past 2 years the group has not been able to advertise to expand on this initiative. Any funding and government level support would be most welcome here to improve participating numbers.

And so the main alternative to baling silage is by using the clamp method - compressing the grass into a dedicated area and sealing it from the elements. This would ideally be a purpose built concrete bay in yard with a weighted heavy duty plastic cover, far away from water courses with its own catchment for effluent run-off. One interviewed farmer told us:

“If you have a proper farmyard it would be sensible to have a clamp and feed all the animals from it, but if you operate a spread out farm it would be more efficient to use bales.”

The *Cut To Clamp* incentive offers best practice advice on preparing your land and clamp for silage production²⁸, and thoughts on the many considerations you need to take into account in order to conform to the legislation that is in place. Another farmer told us:

“Maybe we can make hay now?
The summers are getting warmer and longer thanks to global warming!”

Southern England has a (growing) trend of longer and warmer summers, and so the chances of producing useful quantities of hay will be a genuine consideration for some. We know that

extreme weather events are also increasing in chance, but the Summer of 2022 and resulting drought period across the region indicated that a generally warmer climate is most likely here to stay. To support this, one farmer we interviewed said that they made and used no bails at all across the Summer of 2022.

Where possible, using grass and hay will reduce the amount of single use plastic the farm has to purchase, handle and recycle. If grazing cattle can feed from the land for longer, less wrap will be required across the season.

Keeping a tidy yard can initially be time consuming and perhaps daunting, but once on top of it can become just another part of the daily routine with the end result of improving your efficiency of working. Assessors (and in fact any visitors to a farm) do of course like to see a tidy yard!

Across the country there are now voluntary groups who could offer assistance with clearing up difficult sites that may have gotten out of hand. Contact your local Plastics Free Action or similar voluntary group. Please see **Appendix A** under **Plastic Free Communities** for further details.

How Could the Wider Industry Support Farmers?

The Red Tractor farm assurance scheme is presently aiming to launch a sustainable module to support a less harmful farming industry²⁹. Whilst initially set to be a voluntary scheme this has faced some opposition by concerns over it becoming compulsory then potentially adding an additional burden to an already stretched industry. Best practice should be embraced by all if we are to reach our national net-zero commitments and clean up the farming industry, and waste farm plastics need better management at point of use if we really want to reduce the litter that we find.

Environmental membership groups such as Linking Environment And Farming (**LEAF**) are embracing sustainable methods and empowering their members to make changes. In some cases this means returning to traditional methods of farming and looking towards nature based solutions. LEAF is another voluntary group, and whilst it is excellent to see participating businesses reducing their waste, the scheme will not be able to support the worst offenders.



Mixed agricultural plastic waste on boundary wall near Lustleigh.
(February 2023)

How Could the Public Support Farmers?

If you find a small quantity of waste silage wrap in the countryside, and it is safe to do so, you can bag it up and bin it and dispose of it at home. Depending upon your local authority, this could either go to landfill or an Energy From Waste processing facility. In doing so you may help protect any unsuspecting wildlife that may have encountered it. Individuals could also contact or join your local Plastic Free Action group who can organise volunteer litter pickers to help tackle local problem areas.

If you discover a larger quantity of waste or are aware of a location where you persistently discover unsecured silage wrap, there are options on how best to proceed.



Moretonhampstead volunteer group collecting plastic tree guards.
(September 2021)

- Fly-tipping can be reported directly to Teignbridge District Council or your relevant local authority³⁰. Fly tipped waste on private land is the landowner's responsibility; however if the offender is caught costs may be recoverable and the landowner reimbursed. Whilst the local authority will not collect the waste without charge, reporting will assist with intelligence gathering (including National level reporting) and potentially lead to enforcement and prosecution.
- Large scale or regular dumping of waste of any sort can be reported anonymously to Crimestoppers³¹:
- Breaches of business waste duty of care obligations can be reported directly at the Environment Agency incident hotline on (0800) 80 70 60 or via their website³².



Waste wrap in a lay-by near Postbridge.
(September 2023*)

Calls to the Environment Agency help to track pollution events across the countryside, regardless of their severity and lasting impact. Depending upon the evidence provided by each statement, the incident is given a classification rating as noted in the previous section of the report. Agricultural plastic waste is generally considered to be a low category 3 pollution as it has a perceived lesser impact on the environment than for example a sewage spill into a water body that is home to protected species.

Further information on categorisation and criteria, together with the Environment Agency customer service commitments can be found online³³.

It is important to note that every call to the Environment Agency with regards to a pollution event is logged on their internal database, and farmers and landowners should be more aware of this.

Whilst individual occurrences of waste plastic pollution are considered a low category pollution, they do all add up. If multiple complaints are registered in an area then this could be highlighted by the Environment Agency and lead to further investigation.

Lower category pollution events can be seen as a red flag indicator that other underlying issues may exist at a premises. On initial inspection, a messy farmyard or surrounding hedgerows may lead to the discovery of other higher impact issues, and so it is important that all instances are logged.

Conclusions

The study found that despite legislation in place to regulate the storage and disposal of agricultural plastics, and good practice guidance available, there are significant challenges for farmers with the costs and logistics of managing waste silage wrap. It also found the management of this type of waste is not routinely assessed in farm inspections.

Although this study was carried out in a small area of Dartmoor, it can be anticipated that similar problems of waste silage wrap in the environment may occur wherever silage is used. In the worst example we saw, a farmer who took over a farm faced significant cost removing plastic waste due to the amount of waste that had been buried on-site by the previous tenant(s).



Plastic wrap on farm track near Postbridge.
(September 2023)*

This study also found that whilst the government, regulators and NGOs are supporting and advising the agricultural industry, there is no government strategy for managing this waste stream., and the UK is significantly behind Europe in the recycling rates achieved for this waste stream.

While many of the issues associated with tackling silage wrap waste can be improved by following good practice on the farm, further support is needed to enable good practice to be met from financial support, advice, guidance and in the worst cases, appropriate enforcement action.

As the use of silage wrap is likely to continue for the foreseeable future, we make the following recommendations:

To the Government and their regulators:

The lack of a national approach to so waste silage wrap is causing the UK to fall behind other

European countries in recycling rates. While it is possible to reduce waste silage wrap entering the environment by careful on-site management, there is a need for greater support to farmers to manage this waste:

- A supported nationwide recycling scheme for waste silage wrap, as it continues to be preferred by most farmers over silage clamps with a reusable heavy duty cover.
- Accreditation schemes (such as Red Tractor) provide incentives to farmers, for managing plastic waste well (e.g. through APE UK) or similar.
- Carry out research into alternative methods of silage to reduce or eliminate single-use plastic plastic, to include an assessment of whole life cost for farmers.
- Farm inspection schemes and guidelines should include the requirement to give advice and carry out compliance checks on the management and disposal of waste silage wrap.
- There needs to be greater understanding of the damage waste plastic can do to farmland if not managed and disposed of properly, which can lead to considerable cost for landowners.
- It should be clearer to the public that waste silage wrap in the environment can be a type of pollution or fly-tipping and should be reported to the relevant authorities so that incidents are recorded, and an assessment can be made of the extent of silage wrap pollution.

To the users and producers of the plastic wrap:

Farmers should follow advice on best practice when using and disposing of the waste wrap.

Manufacturers and suppliers of silage wrap should be doing more to improve the sustainability of their products, and advise on its management and recycling.

To the general public:

If members of the public are concerned about incidents of plastic pollution they should be encouraged to report to the relevant authorities e.g the Environment Agency (as a pollution incident) or to local authorities if it has been fly-tipped.

Joining a local action group can also help with raising awareness of the issues with waste wrap, good practice for its management, and with clean-ups (litter-picking).

Appendix A: Organisations and Contact Details

As part of this study, the following directory of organisations and contacts was created. Every entry herein was approached, consulted and referenced throughout the creation of this study.

The list is by no means an exhaustive reference of all of the available resources to farmers, and helps to highlight that there is a wealth of local and national support out there when it comes to dealing with these issues. The following are presented in alphabetical order.

Action on Climate in Teignbridge (ACT)

<https://actionclimateteignbridge.org/newsite/default.html>

ACT aims to help people and organisations across Teignbridge cut their carbon emissions and improve or restore ecosystems. They provide support and information to councils, individuals, community groups and other organisations working to become carbon neutral and help wildlife flourish. They have volunteer Wildlife Wardens operating in many parishes and our Carbon Cutters engage with community groups across the district. ACT also supports Teignbridge District Council to ensure its climate and ecological emergency declarations are reflected in all its policies, decisions and activities.

AGBag

AB Systems Ltd, Coursebeer House, Whiddon Down, Okehampton, Devon, EX20 2QZ.

<https://www.agbag.co.uk/silage-sheet/>

Contact: Doug Wynne (07966) 795066

A UK-wide but locally based contractor, offering supplies of recyclable multi-layer silage clamp sheeting, protective covers and innovative “sausage” style heavy duty wrapping for processing large volumes of silage. They also offer a complete package of on-site services for processing.

Agriculture Plastics & Environment UK Ltd

<https://ape-uk.com/>

65 St. Paul's Churchyard, London, EC4M 8AB.

A national collective based on the successful European model which aims to coordinate collection and recycling schemes for the benefit of all. See **Appendix D** for a full market report prepared specifically for this project. APE UK aim:

“To provide farmers with a sustainable solution to the environmentally responsible management of non-packaging agricultural plastics and to increase the quantity and quality of plastics collected.”

They go on;

“It is estimated that only up to 25% of used non-packaging agricultural plastics are being collected in the UK, with landfill or incineration remain the only other options for farmers. The objective of the scheme is to increase the quantity collected to around 75% within the next 5 years, as has been achieved in other countries where similar schemes operate, thereby reducing the amount going to landfill or being burned.

The APE scheme is a non-profit, industry led, collective initiative of all stakeholders designed to help farmers and at the lowest cost through the shared responsibility of producers, distributors and farmers. The scheme exempts agri-plastics from new Government taxes on plastic packaging introduced from April 2022.

Farmers will have universal access to the scheme throughout all regions of the UK and a cost-effective solution to the environmentally responsible end-of-life management of their used plastics.

Farmers will be provided with best practice guidance on how to sort, store and prepare their used plastics for collection, thereby increasing the technical and cost efficiency of the scheme. The success of the scheme will reduce the need for the Government to introduce new legislation, red tape and unnecessary extra taxes.”

BG Pearce Ltd

<https://www.bgpearce.co.uk/> (01647) 24472

Tellams Yard, Cheriton Bishop, Exeter, Devon, EX6 6HH

E-mail bgpearceltd@gmail.com

Independent waste collectors and processing services.

“Once the plastic is collected, we sort, bale and then send off to be made into all sorts of furniture, decking, building materials and so on. We take silage wrap/sheet, net wrap, string, plastic cans/buckets as well as fertiliser bags, all of these must be kept separate from each other or in separate bags.

The material is sorted and cleaned here on site before processing. Different colours (of silage wrap) are fine as long as it's the same material, for example green, black and white wrap can go in together as well as different coloured strings.”

Campaign To Protect Rural England (CPRE)

Devon Branch - <https://www.cpredevon.org.uk/>

A regional charity organisation dedicated to protecting the countryside and green spaces, campaigning for litter picking and plastic waste reduction across various industries. At the Chagford show, they were very helpful in pointing us towards the newly formed Clean Devon campaign, noted below.

Clean Devon

<https://cleandevon.org/>

is a partnership between numerous local bodies and organised by Devon County Council, working together to tackle litter and fly tipping across the county. The group share expertise and intelligence and work with local and national businesses, local town and parish councils and the Devon public to reduce litter and fly tipping. The website provides resources for individuals and businesses to better manage their waste with further details on duty of care, as well as links to local councils for reporting littering and fly tipping.

Country Land and Business Association

<https://www.cla.org.uk/> 16 Belgrave Square, London, SW1X 8PQ.

E-mail southwest@cla.org.uk

CLA is the membership organisation for owners of land, property and businesses in rural England and Wales, helping to champion rural business at a national level.

“We aspire to unlock the potential of the rural economy by promoting innovative ideas to a national audience and providing practical support to members. We do this so our members can feed the nation, create jobs and prosperity, invest in communities and protect the environment for future generations.”

Regional offices offer more local support - CLA Southwest is based in Chippenham, Wiltshire.

Dartmoor National Park Authority

<https://www.dartmoor.gov.uk/> (01626) 832093

Dartmoor National Park Authority, Parke, Bovey Tracey, Newton Abbot, Devon TQ13 9JQ

E-mail hq@dartmoor.gov.uk

The Dartmoor National Park Authority (DNPA) has a primary duty to conserve and enhance the natural beauty, wildlife and cultural heritage of Dartmoor.

The Department for Environment, Food and Rural Affairs

<https://www.gov.uk/guidance/funding-for-farmers>

DEFRA set the national environmental policy on behalf of the UK central government. In England, they offer additional direct funding for farmers and land managers (such as the Sustainable Farming Incentive detailed elsewhere), as well as one-off payments for equipment and infrastructure (such as silage clamps and slurry stores). The funding is always changing so please visit the following website for up to date guidance.

Devon Contract Waste

Enviro Hub, Marsh Barton Road, Exeter, Devon, EX2 8NU

<https://www.dcw.co.uk/facilities/polymers-processing-centre/>

E-mail sales@dcw.co.uk

Collectors and processors of waste plastic collected across the South West region. They also manufacture and sell a large range of products using this material, including garden furniture, railings and plywood alternative storm boarding. Creating a second life for an otherwise single-use product and working to boost the circular economy.

Devon Wildlife Trust

<https://www.devonwildlifetrust.org/working-landowners-and-farmers>

The local wildlife trust are ambassadors for supporting landowners and farmers across Devon, offering advice on nature based solutions and specific schemes such as Saving Devon's Treescapes and Working Wetlands. Many local working groups of staff and volunteers support

the network of nature reserves across the county, helping to maintain the often fragile and fractured ecosystems that remain in their care.

Following a discussion with the Environment Agency, it was found that the Devon Wildlife Trust farm advisors have been issued with copies of the Preventing Plastic Pollution Farm Plastics Advice Sheet, which is a concise summary of many of the themes covered in this report. Online copies can be found here -

<https://preventingplasticpollution.com/resources/farm-plastics-advice-sheet/>

DWT are currently heading up the Wilder East Dartmoor scheme, funded via DEFRA ELMS which hopes to support nature recovery in an area of up to 5000 hectares. Further information can be found here -

<https://www.devonwildlifetrust.org/wilder-east-dartmoor>

Environment Agency

<https://www.gov.uk/government/organisations/environment-agency> (03708) 506506

E-mail enquiries@environment-agency.gov.uk

24-hour environment incident helpline: (0800) 807060

The Environment Agency regulates the environmental policy set by DEFRA and is specifically responsible for enforcing laws such as Duty of Care and Waste Management (England and Wales) Regulations 2006. You can contact them for advice, to report severe breaches and to clarify current legislation.

Farming and Wildlife Advisory Group

<https://www.fwagsw.org.uk/farm-plastics> (01823) 660684

E-mail info@fwagsw.org.uk

FWAG supports farmers across the UK with advice on becoming a sustainable and profitable concern, and making the most of the currently available financial support. This help includes applying for Countryside Stewardship status and the Sustainable Farming Incentive. FWAG also organises regional farm plastic recycling days²⁶ to encourage farmers to recycle. The following types of agricultural plastics are currently collected by this scheme:

- Silage wrap
- Clamp sheet
- Fertiliser outer bags and dumpy bags
- Fertiliser inner bags and 25kg feed bags
- String, netting and tree guards
- Chemical containers and mineral buckets

Farming Help

<https://www.farminghelp.co.uk/> (03000) 111 999

A collaborative support point for the farming community. Offering free, impartial and confidential advice courtesy of The Addington Fund (finance focused), The Farming Community Network (personal, family and business focused) and Forage Aid (animal welfare).

Green Tractor Scheme

<https://www.thegreentractorscheme.co.uk/#members> (0800) 246 5171

The Green Tractor Scheme was founded in 2020 and holds the ambition to provide UK agriculture with the ability to recycle **all** farm plastic packaging by 2030. It operates through a membership scheme, supporting a national network of affiliated recycling collectors who in turn support the farming industry and the circular waste economy.

Grassroots Recycling (and Farm Xcess)

The Old Dairy, North Farm, Norton Bavant, Wiltshire, BA12 0EP.

<https://www.grassrootsrecycling.com/> and <https://farmxs.com/>

E-mail: enquiry@grassrootsrecycling.com

Waste collectors and re-processing of excess materials. Based in Wiltshire, Grassroots now also own Kernow Farm Plastics and cover Devon, Cornwall and Somerset collections.

Greenaway Recycling Limited

Marley Head, Webland Lane, South Brent, Devon, TQ10 9LT.

<https://www.greenawayrecycling.co.uk/>

Greenaway receives sorted and unsorted agricultural plastic waste and also offers a collection service.

“Greenaway Recycling Limited was set up in response to the introduction of EU legislation regarding the handling and disposal of Agricultural Waste. Many services for correctly getting rid of waste plastic are expensive, and require a fair bit of work on your part.

Here at Greenaway we collect your waste plastic in bulk (one heap) which can be unsorted. Meaning no hassle or time is spent sorting your waste plastic to be taken away. Our system means that you only pay for the waste plastic that you get rid of, saving you money. At the point of transfer of your waste you will be provided with the paperwork you require to comply with the Agricultural Waste Legislation.”

Linking Environment and Farming (LEAF)

<https://leaf.eco/>

LEAF is a membership based group that aims to deliver climate positive action through resilient sustainable farming through a healthy environment and humanity. They support crucial education work at schools as well as providing sustainability guidance through their Integrated Farm Management system. Their guide on “Simply Sustainable Plastics” in farms can be found here:

<https://s3-eu-west-1.amazonaws.com/leaf-website/LEAF-Simply-Sustainable-Plastics-small.pdf>

National Farmers Union (NFU)

<https://www.nfuonline.com> (01392) 440700

E-mail south.west@nfu.org.uk

The NFU is a member based organisation pushing for stable and sustainable farming practices across the UK. The following information was provided by Andrew Butler, Devon County Advisor of the NFU:

“The domestic (as opposed to international) options to recycle some agricultural plastics are more limited because they are difficult to recycle due to contamination. The NFU would like to see improvement in the availability of domestic facilities and action to minimise costs for recycling plastics used on farms.

Much research and development is underway to support an emerging market for alternatives to conventional plastics used in agriculture, and agriculture has a role to play in the supply of raw materials for bioplastics, including corn and potato starch.

The NFU would like to see the plastics industry move towards a bioplastic alternative, particularly for plastic silage films, or at least silage films made from more recycled plastic content. At the moment, films with recycled content are more expensive to produce given the technical specification of the product.”

<https://www.nfuonline.com/updates-and-information/environment-agency-advice-for-good-waste-management-on-farm/>

Plastic Free Communities

<https://plasticfreeco-vd89694.slack.com/>

In the last 6 or so years people all over the country concerned about the level of plastic waste in the environment have been mobilising and forming action groups. Many of these have affiliated themselves to the national campaign charity Surfers Against Sewage (**SAS**), including Moretonhampstead. This charity started by being solely concerned with pollution from sewage in our rivers and coastal waters, but realised the even greater threat is now from waste plastic.

SAS started a scheme called Plastic Free Communities. The local groups in this scheme take practical steps to reduce use of single use plastics and plastic waste in their area. They organise litter picks and most members would be keen to help any farmer where silage wrap waste has built up.

To find contact details for your nearest group look at the Plastic Free Communities website. There is a map showing all groups.

Two such local groups are Moreton Action on Plastics (contact elizzyprince@aol.com and Plastic Free Chagford (contact sue@roundash.com)

Preventing Plastic Pollution

<https://preventingplasticpollution.com/>

The Plastics & Sustainability Team of the Environment Agency based in Exeter secured funding from InterReg, working alongside Defra and the West Country Rivers Trust to develop the Preventing Plastics Pollution website. Here you can find downloadable factsheets and information on reducing dependency on plastics in agricultural business.

Red Tractor Scheme

<https://redtractor.org.uk/> (02076) 303320

E-mail enquiries@redtractor.org.uk

The Red Tractor Scheme is a not-for-profit company that is the UK's biggest farm and food assurance scheme. They have developed standards based on science, evidence, best practice and legislation that cover animal welfare, food safety, traceability and environmental protection. The Red Tractor standards form the basis of buying and sourcing specifications for major supermarkets, household brands and restaurant chains, through annual inspections and membership. The scheme was formerly known as FABBL (Farm Assured British Beef and Lamb).

Current membership costs are approximately £250 to £300 pa plus additional costs for individual specialist inspections. These costs are partially recovered by higher prices sold at the market and abattoir for stock. Red Tractor inspectors aim to visit members every 2 years. They inspect many aspects of the farm – the stock, ear tags, health and safety issues, drug records, vet's annual animal health review, condition of soil, and – significant for this Report – waste transfer tickets from the licensed disposal facility confirming what has happened to plastic waste on the farm.

Whilst this study could not find written evidence that this was a requirement of a completed Red Tractor assessment - a number of our interviewed farmers independently confirmed this.

River Teign Restoration Project

<https://riverteignrestorationproject.co.uk/>

A local group working on supporting the Teign river catchment and its ancillary water bodies. Together with local angling groups and the West Country Rivers Trust, they run volunteer parties that concentrate on improving the quality of the river and its banks for the animals and plants that depend on it to survive. Work includes water quality surveys as well as monitoring for pollution - this does include plastic! The project is scheduled to conclude March 2025.

Teignbridge District Council

<https://www.teignbridge.gov.uk/recycling-and-waste/>

Environment Health, Forde House, Brunel Road, Newton Abbot, Devon, TQ12 4XX.

Contact: Environmental Protection Manager

E-mail envc@teignbridge.gov.uk

Littering and fly tipping can be directly reported by anyone to Teignbridge District Council, who are able to issue fines if there is sufficient evidence of ownership of the waste.

Trading Standards

<https://www.devonsomersettradingstandards.gov.uk/agriculture/> (01392) 383000

E-mail tradingstandards@devon.gov.uk

Trading Standards are a local government run service that offer support and guidance to legitimate businesses. They also offer protection to consumers from businesses that may be trading unfairly or illegally. Trading Standards are able to investigate, amongst other things:

- significant breaches of animal health and welfare legislation with a risk of disease outbreak or affecting farm animals (for example where an animal could be ingesting waste plastics), and
- failures to comply with a statutory notice, written advice or other formal commitment to comply with the law.

Waste carrier registration check

<https://environment.data.gov.uk/public-register/view/index>

If you are required to employ a handler to transport your business waste, this free to use website enables you to check that they are registered with the Environment Agency for handling your type of waste, and that they will dispose of it at the correct facility.

Waste and Resources Action Programme (WRAP)

<https://wrap.org.uk/>

WRAP is a climate action NGO working around the globe to tackle the causes of the climate crisis and give the planet a sustainable future. They were established in the UK in 2000 and now work in 40+ countries across the globe. They recently published the 2022 Plastics Market Situation Report which highlights the increased restrictions on exporting plastics waste from the UK and the need for an improved UK based infrastructure in order to deal with our recycling needs³⁴.

Appendix B: Financial Support Schemes

Please note: Payment schemes are kept under constant review in order to best support the needs of farmers. The following information is correct at the time of writing (February 2024) and eligibility should be verified through the support provider.

Basic Payments Scheme (BPS)

The BPS is the largest rural payment scheme providing financial support to the farming industry. The amount payable is per hectare with a minimum of 5 hectares of land. Farmers can apply once a year between March and May and are then paid in 2 instalments. The BPS is now being phased out by RPA between 2021 and 2027, after which the ELMS scheme will take over.

Environmental Land Management Scheme (ELMS)

ELMS is the new overarching post-Brexit financial support scheme for farmers and country land owners, and is split into 3 streams:

Sustainable Farming Incentive (SFI)

<https://www.gov.uk/government/publications/sustainable-farming-incentive-full-guidance>

The SFI is available for farmers who already claim under the Basic Payment Scheme for actions on hedgerows, grassland, arable and horticultural land, pest management and nutrient management. It enhances existing standards, which nearly 1,900 farmers already have in agreements. It aims to improve sustainability of farming practices by offering financial incentives for the work.

Farming Investment Fund (FIF)

<https://www.gov.uk/guidance/farming-investment-fund>

The FIF is available to farmers who are looking to invest in new equipment, systems and infrastructure. There are 2 levels of funding, Farming Equipment and Technology Fund (for grants between £1,000 and £25,000), and the Farming Transformation Fund (for grants between £25,000 and £500,000 where major investment is required to update a business). There are additional technology grants also available.

Landscape Recovery Scheme

<https://www.gov.uk/government/publications/landscape-recovery-more-information-on-how-the-scheme-will-work>

The scheme runs from competitive applications which are assessed and awarded.. It is designed to help farmers & landowners develop alternative sources of income that will

also “ensure nature’s future resilience and recovery”. 22 areas so far have been selected in England and one is East Dartmoor which will be managed by Devon Wildlife Trust from 2023. For further information on this specific project please see:

<https://www.devonwildlifetrust.org/wilder-east-dartmoor>

Countryside Stewardship (CS) scheme.

This scheme replaces the former Higher Level Stewardship (HLS) program. Mel Stride, MP for Central Devon, recently said that:

“This scheme has been enhanced to include 30 additional actions available to farmers by the end of 2024, additional to the existing 250 actions farmers can take at present. The scheme has had a 94% increase since 2020 and is now part of thousands of farm businesses”.

The funding is available over and above the BPS, and is aimed at encouraging farmers with projects to improve biodiversity on their land and eliminate harmful agricultural effects on the environment. For example, a CS award may be a capital grant to remove a fence barrier and create a natural hedgerow at field boundaries.

<https://www.gov.uk/government/publications/facilitation-fund-2023-countryside-stewardship>

<https://www.gov.uk/guidance/countryside-stewardship-get-funding-to-protect-and-improve-the-land-you-manage>

Farming in Protected Landscapes (FiPL)

fipl@dartmoor.gov.uk (01626) 832093

This grant only applies within National Parks and AONBs. Up to £1 million is available, funded by Defra. Successful grants are awarded for nature friendly projects that take steps to tackle climate change. The current scheme is available from July 2021 to March 2024.

<https://www.dartmoor.gov.uk/living-and-working/farming/farming-in-protected-landscapes>

Dartmoor Hill Farm Project (DHFP)

<https://www.dartmoorhillfarmproject.co.uk/> (01822) 890913

The Old Duchy Hotel, Princetown, Yelverton, Devon, PL20 6QF.

Contact: Hazel Kendall, Dartmoor Farming Officer

E-mail hfp@dartmoor.gov.uk

The Dartmoor Hill Farm Project was set up to try to ensure a viable future for Dartmoor farmers. Since 2003 the Dartmoor Hill Farm Project has supported farmers on Dartmoor to establish and run a wide range of free projects to add value to their businesses and to increase vocational skills. They offer workshops and events such as Q&A sessions with the Rural Payments Agency, and dry stone walling taster sessions. In conjunction with the Prince’s Countryside Fund, they have been operational since 2003.

The Forestry Commission (FC)

<https://www.gov.uk/guidance/tree-planting-and-woodland-creation-overview>

The Forestry Commission currently offers funding for converting appropriate agricultural land into woodland. This is part of the Government's Nature For Climate (NCF) fund.

Nature for Climate Peatland Grant Scheme (NCPGS)

<https://www.gov.uk/guidance/nature-for-climate-peatland-grant-scheme>

The NCPGS offer funding to restore and analyse peatland across England until March 2025. Specifically on Dartmoor, this scheme has helped provide funds for the South West Peatland Partnership - <https://southwestpeatlandpartnership.co.uk/>



SWPP restoration work at Ockerton Court, Dartmoor.

(August 2023)

Appendix C: Additional Information on Materials

Silage wrap in the UK is available commonly in black, green and white colour options. Traditionally black silage wrap is the most common product on the market because it is the cheapest to produce. It can lead to an increased core temperature within the bale by absorbing the most sunlight - this may be beneficial in some cooler parts of the UK or in spring / autumn months.

Here in the south of England, especially during the summer months, Farmers should consider using Green or even White silage wrap. Initial purchase costs of the wrap may be slightly more expensive, but the bales will reflect a proportion of the sunlight (White more so than Green), leading to a more uniform core temperature and a better overall food product. Excessive heating of the product can lead to the absorption of more Oxygen and the spoiling of the outer parts of the bale. One farmer we spoke to who had conducted his own research into the different colours of silage wrap, and told us that:

“the black bales could get too hot, with the white bales yielding the best silage overall, and the green somewhere in between”.

Example Cost Analysis

Silage wrap was deemed as being exempt from the Plastic Packaging Tax which was introduced by the UK Government in April 2022. It is seen as a specialist packaging which uses the material properties to protect the product inside and accelerate the fermentation process. This tax would have seen a £200 per ton increase to the cost of the wrap, however the rising costs of crude oil, manufacturing shortages and transportation costs have led to a wholesale price increase of around 40% across 2022 alone.

It is however hoped that introducing a tax on plastics will drive growth in the recycling sector currently seen in other materials such as steel.

At the time of writing (November 2022), online research suggests that costs are around £85 per standard 750mm roll x 1500m (up from around £55 per roll in 2021) when purchased at “by the pallet” quantity.

Many online wholesalers are currently priced on application due to the ongoing market instability.

As a broad example of annual costs provided to us by an interviewed farmer in December 2022;

Approximate cost per roll of Polyethylene = £90

Approximate number of bales wrapped per roll = 22 (assuming 6 layers as advised)

Approximate number of bales required per year = 1200

*Total cost of wrap = 54 rolls x £90 = **£4,860 + VAT***

In addition, there may be labour or contracting costs required to make the bales, as well as the seed and any other consumables required such as additives.

*Each roll is 25kg, therefore total weight = **1,350 kg of virgin silage wrap.***

*Approximate cost of recycling this through a local contractor = **£243 + VAT***

In addition, transportation and “gate fees” may be levied by the waste handler depending on energy costs and material demands at the time.

The costs associated with recycling may be small compared to the initial wrap purchase cost, but it should be a major factor in considering your business plan for dealing with the whole life of the product.

To put this into perspective against the BPS payments, incremental fines for negligence can lead to a 15% reduction in the annual BPS payment. Intentional non-compliance can result in a 100% fine and also impact on payments received in subsequent years.

“Green” silage wrap (by manufacturing process, not product colour) is produced through a minimum 30% recycled material content but is currently only produced in Austria³⁴ and is only available in the UK at a premium alongside the associated shipping costs. It is therefore not yet a widespread consideration for many users.

At the time of writing this report, there are no commercially available 100% biodegradable or sustainably produced silage wraps. There are however some products being produced for agriculture which are signalling a shift towards sustainable practices. For example, natural fibre baling twine existed long before plastics were introduced and can be formed from materials such as Sisal, Hemp and sheeps wool.

There are however biodegradable tree guards, and Dartmoor based charity *Moortrees*³⁵ have conducted research into the many different available products and their various merits. .

Appendix D: Current Market Review

An independent review provided by APE UK and republished in full with permission.



AGRICULTURAL PLASTICS

UK MARKET REVIEW – March 2023

Information for Andrew Fletcher Services from APE UK.

LEGAL CONTEXT

Agricultural waste is classed as business waste that requires specific management under the legal duty of care and Waste Management Regulations (WMR)¹. Agricultural waste must have been produced on a 'farm' in the course of 'farming', it can be both natural and non-natural waste. According to UK legislation, farmers (the users) are responsible for waste generated by their activities. Waste management is a devolved matter.

Some of the previously common practices for disposal of agricultural waste, which are no longer allowed, include:

- Burning waste in the open;
- Using unlicensed farm tips or burying waste;
- Putting farm waste in the household dustbin.

The regulations mean that farmers and growers have to dispose or recycle agricultural waste in a way that will protect the environment and human health, meaning that farmers have to:

- Send or take their waste for disposal off-farm at licensed sites;
- Register a licensing exemption with the appropriate regulatory body to recycle waste on-farm; or
- Apply to the appropriate regulatory body for a licence to continue on-farm disposal.

In all instances, all relevant legislation also needs to be met, including waste meeting storage requirements, the waste carrier possessing a licence, and completion of a waste transfer note.

1. SIZE OF MARKET.

Used Plastics Product Available for Recovery off Farms:

The volume of new plastic product sold into UK farms is estimated to be between 36,000 T to 40,000 T annually (around half of it is silage bale wrap). This does not include spray / oil canisters, fertiliser / seed bags etc. Products are single polymers, all recyclable materials.

To dimensionalise this, a single roll of silage bale wrap weighs 25Kg and will wrap 22 bales assuming 6 layers.

Due to heavy soilage of farm plastics, 36-40,000 T of new product sold into the market translates in approximately 65-70,000 T of used product available for collection. Soilage rates vary widely across product, from 20% for bale twine and string to plus 150% for crop

¹ Environmental management: Waste - detailed information - GOV.UK. (2022). Gov.Uk. <https://www.gov.uk/topic/environmental-management/waste>



cover and mulch films that contain a lot of soil, water and organic debris once removed from the field. In addition, many farmers keep waste plastic products on farm for two years before disposing of it, which inevitably increases the volume of moisture and dirt unless stored correctly. Whilst appropriate removal and storage practices can dramatically improve the cleanliness of used plastics and reduce the weight of the product taken for recycling, those practices require increased farmer awareness and education.

2. AGRICULTURAL PLASTICS WASTE RECYCLING.

A. Context:

The UK lags significantly behind its counterparts across Europe in terms of recycling rates:

- UK: 20-25% recycling rate of new agri-plastics material sold into farms
- France: 80%
- Germany: 65%
- Ireland: 90%
- Sweden: 90%

Current collection and recycling operations in the UK are concentrated on **on farm** collection. Compare this to Europe where the majority of waste plastic on farms is delivered by farmers to established **bring centres**. This is lower cost and more efficient for farmers.

In addition, in all successful European markets, a single, centrally managed, not for profit scheme has been established, operating on the principle of shared governance across the industry:

- France: Adivalor
- Germany: ERDE
- Ireland: IFFPG
- Sweden: SvegRetur

B. UK Market in Contrast:

There is currently no central structure / organisation operating a collection scheme nationally. Whilst individual, regional on-farm collectors have operated in the UK for the past 20 + years, collection rates have not exceeded 20% of the total recycling opportunity. There is no national collection scheme in place and only a limited number of local bring centres in operation. Some local schemes exist in UK, but they are local and small: Eg FWAG: 13 sites, 1 day / year, Cornwall & Devon; Solway: 20 sites, N West.

In addition, these recycling rates vary year on year depending on plastics recycling market conditions:

- When payment (gate fees) are required by recyclers to take in certain categories of agricultural plastics (Silage bale wrap, mulch films etc), the additional costs to farmers results in volumes delivered to recycling falling significantly.
- When recyclers pay to take on certain categories of plastics, collections of those plastics increase.

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C. Costs:

The following factors impact costs:

- Recovery:

Farms are spread out over the whole country, including remote and hard to access regions, which has a collection cost impact. Importantly, these are more often livestock farms where use of plastics to produce silage for winter is a key part of the farming process.

- Soilage:

Farm plastics, by nature of use, are invariably dirty and need washing before they can be recycled. This is a significant additional step & therefore cost in the recycling process

- Sorting:

Plastics need to be aggregated in sufficient tonnage for recyclers to process.

Current UK cost structure:

- On-farm collection: Vary widely from 100/T to £250/T depending on region / farm location.
- Membership schemes: Membership fee usually based on size of farm: Annual fee between £185 to £500 plus an additional collection fee.
- Washing: Some collectors also charge additional washing costs and transport costs that can add up to £150/T for some particularly dirty product (mulch films).
- Recycling: Recyclers usually charge a *gate fee*, depending on the product and its state of cleanliness, to cover the costs of pre-treatment to clean and dry the waste plastic. Gate fees vary depending on demand and energy costs, ranging from £10-£45/ T For better quality/more easily recycled plastics, principally tunnel films, Recyclers pay a positive value for the materials.

3. SOLVING THE UK FARM PLASTICS RECYCLING PROBLEM.

Based on APE learning, discussions within the UK industry and learning from similar, successful agri-plastics recycling markets across Europe.

- There needs to be a centrally managed scheme that unites all aspects of the agricultural industry under common goals.
- The scheme needs to be national in scope, accessible to all farmers.
- The scheme needs to bring together and work with the whole industry in a cohesive, collective way with shared responsibility and governance. This includes:
 - Farmers / Farming Representatives (NFU in each devolved market)
 - Distributors, Merchants, Contractors, OEM's
 - Plastics Manufacturers
- Government support and input is essential to establish compliance across all sectors and all operators within these sectors. In effect, create a level playing field for all.

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- Recognise that it will take time to build and establish the scheme to be fully operational on a national scale.
- Continuous, effective, clear communications across the industry. Clarity in purpose and action.
- The scheme is not for profit.

Without an effective industry solution to agricultural plastics recycling, it is likely that government will step in and mandate change. This is likely to result in:

- Significant additional costs in addition to recycling costs ... Extended Producer Responsibility
- Pressure to reduce agri plastics use / increase recycled content ... financial impact on distributors / manufacturers resulting in higher costs for farmers, already under financial pressure.
- Negative image of agriculture on back of public awareness ... the use of plastics in agriculture is highly visible in the countryside (black bales etc).
- Food retailers will also likely act to align their plastics recycling / environmental policies through their supply chains.

To avoid significant extra costs and legislation for farmers, it is essential that an industry led solution is developed in partnership with government. To deliver solutions both from an environmental perspective, and also to increase food sustainability in the UK ... both key government objectives.

The agricultural industry wants to solve this problem and manufacturers and distributors support APE as the industry body and scheme managers to deliver against the requirements above. APE has strong support from the manufacturers selling into the UK, the leading agricultural distributors, and is in discussion with the NFU to build on this and create a common approach and shared responsibility.

APE Purpose and Objectives:

- APE, backed by a group of responsible manufacturers and distributors, is the UK agri-industry body that's helping farmers maximise crop and livestock management by spearheading the responsible use of Agri Plastics through cost effective recycling.
- To increase the rate of recycling of used agri-plastics from the current 15-25% to 75% in 5 years. Achieve this by:
 - Working with the NFU's (NFU England & Wales, NFU Scotland, UFU) to build consensus regarding both the issues and limitations facing farmers in recycling agricultural plastics, and solutions to increase plastics recycling.
 - Build agreement regarding the necessary intervention required of governments (devolved) to drive this recycling agenda forward without adversely impacting the agricultural industry as a whole.
 - Work directly with Government and its agencies. Build consensus between stakeholders to deliver effective government intervention to support the increase

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in agri-plastics recycling without penalising the industry in terms of costs (Tax) or punitive legislation, which would adversely affect recycling.

- Developing the structure, operational model, and funding requirements to establish and manage an industry and government backed national, agricultural plastics recovery and recycling scheme in the UK.
This will include working with and augmenting the existing schemes operating in the UK.
- Manage the national scheme through a not-for-profit structure of shared responsibility and governance, working collaboratively across key stakeholder groups: Producers, Distributors/Merchants, Co-Ops and Farmers / Representative Organisations.

In summary, a proactive body working across the industry and with the support and input from government to establish a national, cost-effective agricultural plastics recycling scheme across the UK.

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About The Author

Andrew Fletcher grew up in rural Oxfordshire around the family steel fabrication business, gaining first hand experience of the urgent needs from farmers to get broken machinery back up and running at all times of the year. After gaining a Master's Degree in Mechanical Engineering from The University of Warwick in 2004, he joined a research test facility before specialising in fabrication and design work to support the natural environment.

Moving to Devon in 2021 offered him the opportunity to volunteer for many local groups including Devon Wildlife Trust, Westcountry Rivers Trust and the Bovey Tracey Repair Cafe. He now works for South West Water as a waste water data technician. He enjoys exploring Dartmoor with his wife and 2 children whilst juggling the challenge of working on this particular research project!

The photographs contained within this report were taken mainly from across the Teignbridge district but also the surrounding districts of Devon. Many of the pollution instances were chanced upon whilst out on family walks - such is the prevalence of the issue. His youngest son Edward is now quite good at spotting silage wrap in hedges.

These photos should be evidence enough that the existing enforcement is not fit for purpose.

<https://www.linkedin.com/in/fletchinbovey/>



Twine and wrap at East Dartmoor field entrance

(February 2024)

