Written evidence submitted by Anglian Water Services Ltd (FR0072)

Environment, Food and Rural Affairs Committee: Farming Rules for Water

Anglian Water Services Ltd.

Anglian Water is the water and water recycling provider for over 6 million customers in the east of England, encompassing nearly a quarter of England's landmass between the Humber and Thames estuaries. Our operational region is critical to the UK's food supply, with around half of England's grade 1 and 2 agricultural land, and a flourishing and sustainable agri-sector is vital to the rural regional economy

We treat sewage sludge from over 1,100 water recycling centres at centralised sludge treatment centres (STC). The STCs are designed to treat sludge and deliver high quality products for use in agriculture as soil conditioners. In 2018, we published our Bioresources Strategy for 2020 to 2045. The strategy was based on the recycling of biosolids to land as the most sustainable management approach and identified maintaining our outlet to agriculture as critical.

We have improved the product quality supplied to farmers by use of technology capable of treating to enhanced standards, and we have minimised the tonnage of product produced by maximising the amount of organic matter that is converted to biogas.

The Environment Agency's new interpretation of Farming Rules for Water (FRfW) has a serious impact on our ability to manage sewage sludge in the most environmentally and economically sustainable way.

In this submission, we focus on the direct impact to our business operations. We fully support the submissions made to the EFRA Committee by Water UK and Assured Biosolids Limited.

Summary

EA's new interpretation of Rule 1 is having a significant impact on our business and the whole water sector, as well as on farmers and land managers. It means that the Best Practicable Environmental Option for sludge in most cases – treatment and recycling to land as biosolids – is effectively being partially banned. The result is that water companies are having to store large quantities of biosolids under Regulatory Position 253, with attendant impacts on traffic movements and eventually odour and pollution risk management. We are close to using all our permitted storage capacity and only have limited space to store additional material off sealed surfaces under RPS253, meaning there will be a serious challenge to store biosolids material later in the winter and spring. In the longer term, if the recycling to land route continues to be blocked, the water industry will have to invest in incineration capacity, at high cost to customers and with significant carbon and other

environmental impacts. This is clearly an inferior environmental outcome than that of the well-managed and properly assured approach to recycling biosolids to land.

What impact, if any, are the EAs implementation of Farming Rules for Water Regulation prevents farmers from spreading organic fertiliser?

There has been a significant fall in the quantity of biosolids being recycled to land.

Anglian Water produces around 360,000 tonnes of biosolids per year. Normally, 85% of this material would be recycled by being applied to land in the autumn, ahead of crops such as winter cereals, which now falls outside the EA's new interpretation of Farming Rules for Water Rule 1. Whereas farms in the north and west of England can apply biosolids to grassland, our region is predominantly arable, which means that biosolids are applied as a soil conditioner/organic manure in autumn before winter cereal crops are planted, providing a sustainable and slow-release form of nutrients to the crop throughout the following crop season. Autumn applications of biosolids ahead of winter cereal crops will be prevented under the new interpretation of Rule 1 and it is not possible to move all biosolids applications to the spring, due to the implications detailed in the impact assessment funded by the AHDB. This has resulted in a 50% reduction in the amount of material delivered to land during October and November 2021 compared to previous years. In addition, we are having to transport the material further to find suitable outlets. To give a snapshot, in 2018 – 2020, biosolids were transported an average of 0.62 km per m3 in October – November. In the same period this year, the figure is 0.94 km per m3. So, in the last two months, we have seen a 50% decrease in material delivered to land with a 50% increase in the average distance travelled for those deliveries.

A significant biosolids storage challenge is inevitable under the current interpretation.

While we can still deliver a proportion of our biosolids production to farmers for application ahead of spring crops, the area of spring cropping is much less than winter cropping in our region. There is also a limited opportunity to apply in the autumn ahead of winter oilseed rape, but the combination of this and spring crops only accounts for c.15% of our biosolids production. Whereas we would normally deliver biosolids to farmer customers throughout the year these restrictions mean we will have to store much larger quantities of biosolids on our own sites, with no current outlet for this surplus material.

We have permitted capacity to store 103,000 tonnes of biosolids material. This storage is on hard surfaces to prevent ingress and allow odour and pollution risks to be well-managed. We are currently storing 80,000 tonnes of material, compared to less than half this quantity at this point in previous years. The demands for storage will increase through the winter and we anticipate a significant capacity challenge by spring 2022.

We need to retain some headroom capacity in our permitted storage to be able to react to adverse weather over the winter. Therefore, within the next few weeks, we will need to start storing biosolids on grassed areas on our sites, under a Regulatory Position recently published by the Environment Agency (RPS253). This will result in an increase in traffic movements as well as odour nuisance, both of which are serious concerns for our customers and for anyone living and working close to our sites. In addition, we believe that the pollution risks, for example of ammonia emissions to air, and risk of surface water run-off, that are posed by biosolids stored over the medium/long term in this manner are greater than those posed by well-managed agricultural use.

We cannot store biosolids material indefinitely. The only practical alternative to agricultural use is incineration. However, there is insufficient capacity within existing incineration plants for biosolids, particularly as other organic wastes will now compete for the same capacity. If the current interpretation of Rule 1 remains in force, water companies will have to invest in incineration capacity, with the associated impact to customer bills. This will not only take 8-10 years to bring on line, but it will have much greater climate and environmental costs than recycling biosolids to land, as well as encounter local opposition to new incinerators being built.

Are there changes that should be made to the rules or how they are applied?

No changes are required to the legislation, but the EA needs to urgently reverse their change in interpretation of Rule 1 and how it is being applied.

We think that the EA's interpretation of Rule 1 is inconsistent with the Farming Rules for Water's objectives to reduce diffuse pollution through good practice and managing risk. The current interpretation is more restrictive than even the controls in the Nitrate Vulnerable Zones regulations (NVZ), which are targeted at areas of the country at risk from nitrate pollution and include most of our operational area.

It appears that the EA's interpretation of Rule 1 is based on a misreading the Nutrient Management Guide (RB209). This guidance itself notes that it can be amended by properly qualified advisors (e.g., Fertiliser Advisers Certification and Training Scheme (FACTS) qualified advisors) provided they have a good reason to do so. Moreover, in the "Final set of rules and changes from consultation proposals" regarding concern about the complexity of a fertiliser recommendation system (a proposed new rule), the government concluded "*We have adapted the rule to make it more outcome focussed and less prescriptive in the action required. Rather than requiring a fertiliser recommendation system, farmers need to test their soils periodically and apply nutrients to meet soil and crop needs. The revised rule puts the onus on the farmer to decide when conditions are unsuitable for applying fertilisers or manures. Risk criteria are provided to help inform this decision.*" It appears clear that the use of a fertiliser recommendation system (e.g., RB209) is not a requirement of the regulations.

We do not believe that a well-managed autumn application of biosolids poses a significant diffuse pollution risk and in fact, it offers important environmental benefits. Any alternative

management approach such as incineration would cause significantly more environmental harm as well as deny farmers an important source of organic matter.

We would like to see an evidence- and risk-based approach to managing the application of organic manures and biosolids in particular. Complying with the FRfW requirement that "*the application is planned so that it does not give rise to a significant risk of agricultural diffuse pollution*" can be achieved by complying with the Codes of Good Agricultural Practice for the protection of water, soil and air, the measures stated in the Farming Rules for Water to avoid "significant risk", in addition to the requirements outlined in the Biosolids Assurance Scheme.

What are the best ways methods of preventing agricultural diffuse pollution?

We absolutely support the Farming Rules for Water's goals of preventing agricultural diffuse pollution, and the underlying ambitions of the Water Framework Directive to return rivers to good health. We think that standards of nutrient management on farm should be high and that this can be best supported through:

- Clearer messaging and communication to farmers on the Farming Rules for Water. The CLA reports from a survey of their members that "just half of farmers were aware of the Farming Rules for Water and most had had no contact with the EA on water quality rules and regulations" (A CLA Water Strategy 2021, *A vision for the water environment to 2030* (p23)).
- Working with assurance schemes, including both food assurance schemes such as the Red Tractor mark, and the Biosolids Assurance Scheme, to promote compliance through Earned Recognition, allowing third party certification bodies associated with these schemes to check that high standards are being achieved on a much larger number of farms. Biosolids to agricultural land is carefully controlled through the relevant regulations and codes of practice, which are brought together under the UKAS-accredited Biosolids Assurance Scheme (BAS). The scheme includes limits on the application rate and return frequency of applications, as well as requirements on where and how biosolids can be applied. Compliance is checked annually, via audits by a third-party certification body.
- By working closely with assurance schemes, the EA will be able to concentrate its limited enforcement resource more effectively, to enforce the Farming Rules for Water, as previously interpreted, on farms which do not currently comply, providing an effective method of reducing diffuse pollution from agricultural land.

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