

Subject: Glyphosate - Letter of Concern

To: East Sussex County Council

Sent: On behalf of Withyham Parish Council

We are writing to express our concerns regarding the ongoing use of Glyphosate for weed control within East Sussex. Withyham Parish Council has been increasingly alarmed by the negative impacts of Glyphosate on local wildlife and possibly people, which have been substantiated by a growing body of research.

We feel the following information is relevant to acute, chronic and environmental toxicity and have provided alternatives at the end of this document.

Glyphosate Concerns. These are the reasons we believe Glyphosate may cause a concern in our Parish, in the UK and the planet in general:

- **Acute and Chronic Toxicity:** Glyphosate has been revealed as probably carcinogenic (*International Agency for Research [IARC], 2015*). Further independent studies are revealing that Glyphosate can cause numerous acute and chronic conditions.
- **Environmental Concerns:** The existence of such chemicals as Glyphosate in the environment in general is a cause for concern. We point out that DDT (DDE), Malathion, Nicotinoids/Neonicotinoids and many more pesticides were all said to be environmentally safe by the manufacturers yet turned out to be environmentally damaging. Environmental processes including Bio-Magnification (BM, concentration to acute toxicity levels) and Persistent Organic Pollutants (POPs, transport over long periods into several ecosystems, including humans^[1]) are causing the damage to the ecosystems that support all life, including humans. Subsequent to this there are proven reductions in diversity health for flora and fauna, including humans.
- **Biodiversity:** Studies have demonstrated that glyphosate, the active ingredient in many herbicides, poses significant risks to biodiversity. Research published in the journal *Science* highlights how Glyphosate can harm pollinators, such as bees and butterflies, by disrupting their food sources and habitats. Furthermore, evidence suggests that Glyphosate affects soil health by killing beneficial microorganisms, thereby impacting the wider ecosystem.
- **Wider Damage to the Environment.** The consequences of Glyphosate use extend beyond immediate wildlife concerns. The chemical has been linked to the decline of amphibian populations, as detailed in a study by the University

^[1] Exposure-Response Observed for Urine Glyphosate Concentrations, Markers of Oxidative Stress.
<https://dceg.cancer.gov/news-events/news/2023/glyphosate-oxidative-stress-biomarkers>

of Pittsburgh, which found that Glyphosate exposure led to developmental abnormalities and increased mortality rates in tadpoles. Such disruptions in the food chain can have cascading effects, ultimately reducing the resilience of our natural environments.

Alternatives. In light of these findings, we urge East Sussex County Council to reconsider its use of glyphosate-based herbicides. We believe it is imperative to adopt more environmentally friendly alternatives that have been successfully implemented by other county councils across the UK. For example:

- **Mechanical Weeding:** Councils such as Glastonbury and Hammersmith & Fulham have employed mechanical weed removal techniques. These methods, which include hand weeding and the use of specialised machinery, eliminate the need for chemical herbicides and are effective in managing weed growth. Bear in mind that this technique has been used for many centuries with success.
- **Hot Foam Systems:** Several councils, including Bristol and Lewes District, have adopted hot foam systems. This technique uses a combination of hot water and biodegradable foam to kill weeds, providing an effective and non-toxic solution.^[2]
- **Vinegar-Based Herbicides:** The use of acetic acid (vinegar) as a natural herbicide has been explored by councils like Edinburgh. Vinegar-based solutions offer a less harmful alternative to glyphosate, proving effective in controlling weed populations without the associated ecological risks.
- **Mulching and Ground Cover:** Implementing mulching practices and ground cover plants can suppress weed growth while enhancing soil health. This approach has been used successfully by several councils to reduce reliance on chemical herbicides.
- **“Do nothing” or “do less”.** “Not using anything to replace the use of herbicides costs nothing – in fact it saves money which can be used to support other activities. This might seem like quite a radical approach, and of course if nothing at all was done to control all unwanted vegetation then there would be problems. But doing nothing is not really doing nothing! In reality, it’s looking strategically at where vegetation can be left alone or where expectations can be adjusted for those both maintaining and using public spaces.”^[3]
- **Controlling invasive species without herbicides.** One of the main concerns raised by councils and other land managers when moving away from herbicides is how to effectively control invasive species such as Japanese Knotweed and

^[2] *Source Alternatives to Herbicides A Guide for the Amenity Sector*
<https://powys.moderngov.co.uk/documents/s73800/Alternatives-to-herbicides-a-guide-for-the-amenity-sector.pdf>

Giant Hogweed. All of the methods mentioned above can be used to control invasive species.²

- **Others.** These include Flora Rotation, biological control, flame guns.

We acknowledge that transitioning to these alternatives may require initial investments and adjustments. However, the long-term benefits to our environment and public health will undoubtedly outweigh the costs. Withyham Parish Council is committed to supporting this transition and would like to be made aware of any pilot projects or opportunities to evaluate the feasibility and effectiveness of these alternatives within our community.

We trust that East Sussex County Council will give due consideration to these concerns and suggestions. By adopting more sustainable weed management practices, we can collectively contribute to preserving the rich biodiversity of our region and ensuring a healthier environment for future generations.

Yours faithfully,

Stephanie Chapman, Clerk for the Climate and Ecology Advisory Group

On behalf Withyham Parish Council

Case Studies

Case studies can be found from the following authorities in the document *Source Alternatives to Herbicides, A Guide for the Amenity Sector*

<https://powys.moderngov.co.uk/documents/s73800/Alternatives-to-herbicides-a-guide-for-the-amenity-sector.pdf>:

- **Hackney Council.** “Since the summer of 2018, Hackney Council in London has been looking at ways to stop and reduce the use of Glyphosate and other herbicides in areas under its control.”
- **Glastonbury Council.** Glastonbury Council decided to undertake a trial of several alternative approaches and compared hand weeding, hot water and the *Foamstream* system. See [Glastonbury Council](#) case study below.
- **Brighton’s Level Park.** The park’s complete restoration using Heritage Lottery, Big Lottery Fund and other funding sources in 2013 provided the catalyst to create and develop this important community and destination park as an environmental and conservation centre of excellence - aiming to provide pollinators and other wildlife with a home in the city.

- **Hammersmith & Fulham.** The London Borough of Hammersmith & Fulham banned the use of products containing Glyphosate in June 2016. This was a response to both public concern and their ambition to make the borough the greenest in the country.
- **Reading Council**². 09/05/22, “Reading Council today launched a year-long trial of weed control alternatives, in a bid to reduce the use of the chemical herbicide glyphosate.”
- **High Peak Borough Council**^[4]. Council seeking weed control alternatives for parks and open spaces. “High Peak Borough Council is actively exploring alternative ways to control weeds in its parks and open spaces following public concerns about the use of herbicides containing glyphosate.”
- **Cambridge City Council.** Reduced use of herbicides. “Since 2019 we have restricted our use of herbicides in the parks and open spaces that we manage. We have only used specific herbicides in special circumstances where alternatives are not available, such as to control the invasive Japanese knotweed.”
- **Glastonbury Council**^[5]. Results of Glastonbury Council's cost analysis of weed control options. The cost using *Foamstream* was £0.07 per linear metre, compared with hand weeding (£0.32), hot water (£0.26) and Glyphosate (£0.23).

Citations

1 Exposure-Response Observed for Urine Glyphosate Concentrations, Markers of Oxidative Stress. <https://dceg.cancer.gov/news-events/news/2023/glyphosate-oxidative-stress-biomarkers>

2 Source Alternatives to Herbicides A Guide for the Amenity Sector <https://powys.moderngov.co.uk/documents/s73800/Alternatives-to-herbicides-a-guide-for-the-amenity-sector.pdf>

3 Council Trials Weed Control Alternatives: <https://media.reading.gov.uk/news/council-trials-weed-control-alternatives>

4 Council seeking weed control alternatives for parks and open spaces <https://www.highpeak.gov.uk/article/4496/Council-seeking-weed-control-alternatives-for-parks-and-open-spaces>

² Council Trials Weed Control Alternatives: <https://media.reading.gov.uk/news/council-trials-weed-control-alternatives>

^[4] Council seeking weed control alternatives for parks and open spaces <https://www.highpeak.gov.uk/article/4496/Council-seeking-weed-control-alternatives-for-parks-and-open-spaces>

^[5] Alternatives to Herbicides - A guide for the Amenity Sector – Green Flag Award. <https://www.greenflagaward.org/resources/guidance/alternatives-to-herbicides-a-guide-for-the-amenity-sector/>

5 Alternatives to Herbicides - A guide for the Amenity Sector – Green Flag Award.
<https://www.greenflagaward.org/resources/guidance/alternatives-to-herbicides-a-guide-for-the-amenity-sector/>