

BEFORE THE HON'BLE NATIONAL GREEN TRIBUNAL

PRINCIPAL BENCH, NEW DELHI

Original Application No. 621 of 2025

IN THE MATTER OF:

IN RE: NEWS ITEM TITLED "CLIMATE CHANGE IMBALANCE IN FERTILIZER USE IMPACTS SOIL'S ORGANIC CARBON: ICAR STUDY" APPEARING IN THE HINDU DATED 10.11.2025Applicant

Versus

MINISTRY OF AGRICULTURE AND FARMERS' WELFARE AND ORS

.....Respondent(S)

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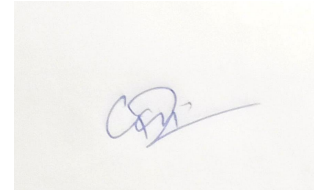
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Respondent No. 1

Filed by

Through

New Delhi
Dated



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NATIONAL GREEN TRIBUNAL

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**BEFORE THE HON'BLE NATIONAL GREEN TRIBUNAL,
PRINCIPAL BENCH, NEW DELHI**

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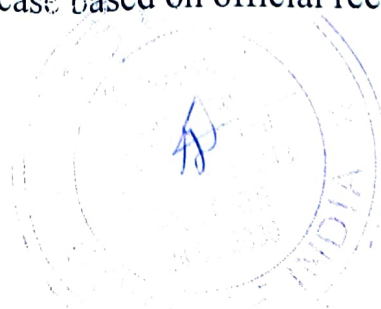
MINISTRY OF AGRICULTURE AND FARMERS' WELFARE NAD ORS

.....RESPONDENTS

**REPLY ON BEHALF OF RESPONDENT NO. 1, MINISTRY OF
AGRICULTURE AND FARMERS WELFARE, GOVERNMENT OF
INDIA**

I, Chandra Shekhar Prasad, aged about 45 years, S/o Shri Madan Mohan Prasad working as Under Secretary having Office at Krishi Bhawan, New Delhi do hereby solemnly affirm and state on oath as under:-

1. That I am duly authorised to swear and file the reply affidavit on behalf of the Respondent No. 1 herein. I am fully conversant with the facts and circumstances of the present case based on official records.



Chandra Shekhar Prasad
श्री श्री कृष्ण प्रसाद / CHANDRA SHEKHAR PRASAD
Under Secretary / Under Secretary
कृषि एवं किसान कल्याण विभाग / Ministry of Agriculture & Farmers Welfare
कृषि भवन, नई दिल्ली / Krishi Bhawan, New Delhi-110001

5. That it is submitted that the issues of soil degradation and the impact of imbalanced fertiliser use are complex, multifaceted challenges that require a coordinated, multi-pronged approach involving the Central Government, State Governments, research institutions, and the farming community. The Respondent No. 1 is actively engaged in fostering this collaborative framework.

REPLY ON MERIT

6. That with respect to the issue of the impact of climate change and imbalanced fertilizer use on Soil Organic Carbon (SOC), it is submitted that the Respondent No. 1 is fully cognizant of the scientific principles involved. It is an established fact that rising temperatures can accelerate the decomposition of soil organic matter, and the imbalanced application of chemical fertilizers, particularly the overuse of nitrogenous fertilizers like urea in proportion to phosphatic (P) and potassic (K) fertilizers, can exacerbate the decline in SOC levels.
7. That it is submitted that long-term experiments conducted by ICAR across various agro-ecological regions of the country have consistently demonstrated that the adoption of balanced nutrient management (application of fertilizers based on soil test results) and integrated nutrient management (conjunctive use of chemical fertilizers and organic sources like farmyard manure, compost, green manure, etc.) are crucial for maintaining and improving SOC content.



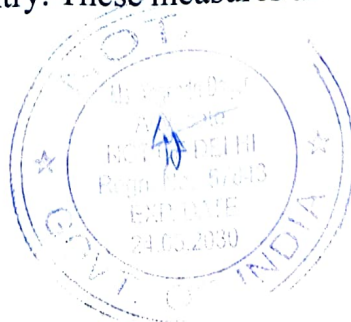
Handwritten signature and official stamp of the Respondent No. 1, including the name 'श्री श्री कृष्ण भवन' and the address 'Kirti Bhawan, New Delhi-110001'.

8. That in furtherance of this understanding, the Respondent No. 1, through its various divisions and associated bodies like ICAR, continuously disseminates advisories and recommendations to all stakeholders, including State Governments and farming communities, for the widespread adoption of these sustainable practices.

9. That with respect to the ICAR study mentioned in the news report, it is submitted that this comprehensive study, based on over 2,54,236 soil samples from 620 districts, was commissioned to create a detailed spatial distribution map of SOC across the country. This map is a critical policy-making tool that enables the government to identify vulnerable regions and devise targeted interventions. The SOC varied from 0.01% to 5.25% (mean \pm SD 0.64 \pm 0.42) with the coefficient of variation value of 65.6%. The ordinary kriging-based interpolation map had varied patterns of SOC distribution in different states, agro-ecological regions, and crop-growing areas of India. Around 7.50%, 25.5%, and 43.5% of the area had SOC content of $\leq 0.25\%$, $> 0.25\%$ to $\leq 0.50\%$, and $> 0.50\%$ to $\leq 0.75\%$, respectively. The content of SOC in 10.8% and 12.7% of the area was $> 0.75\%$ to $\leq 1.00\%$, and $> 1.0\%$, respectively. The findings, which show a negative correlation between SOC and temperature and a positive correlation with balanced nutrient management, reinforce the policy direction already being pursued by the Respondent No. 1. The study is an instrument of proactive governance, not an indictment of inaction.

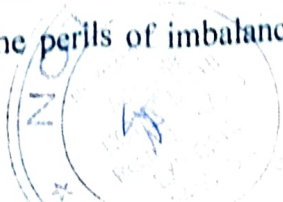
10. That the Respondent No. 1 is actively promoting a wide array of scientifically-backed practices to enhance and maintain Soil Organic Carbon levels across the country. These measures are being integrated into

चंद्र शेखर प्रसाद/CHANDRA SHEKHAR PRASAD
 जबर सचिव/Under Secretary
 भारत सरकार/Ministry of Agriculture
 कृषि एवं किसान कल्याण विभाग/Department of Agriculture
 कृषि एवं किसान कल्याण विभाग/Department of Agriculture
 कृषि विभाग, नई दिल्ली/Gisshu Bhawan, New Delhi-110071



11. That the Government of India is implementing a dedicated National Mission for Sustainable Agriculture (NMSA), which is one of the eight missions under the National Action Plan on Climate Change (NAPCC). NMSA, through its various components like the Soil Health Management (SHM) scheme, promotes location-specific integrated/composite farming systems and soil conservation measures. The flagship Soil Health Card scheme provides every farmer with soil nutrient status for their holding and advises them on the dosage of fertilisers and necessary soil amendments, directly addressing the issue of imbalanced fertiliser application.
12. That the Respondent No. 1 is actively promoting the production and use of alternative and nano-fertilisers. The promotion of Nano Urea and Nano DAP is a strategic step to improve nutrient use efficiency, reduce the overall consumption of chemical fertilisers, and minimise the adverse environmental impact associated with their overuse. This is a forward-looking policy intervention aimed at fundamentally altering fertilizer application patterns in the country.
13. That the Respondent No. 1 is implementing various schemes to promote the use of organic and bio-fertilisers. Schemes like the Paramparagat Krishi Vikas Yojana (PKVY) and Mission Organic Value Chain Development for North Eastern Region (MOVCDNER) are specifically designed to encourage organic farming, which is inherently beneficial for improving soil organic carbon. Financial assistance is provided to farmers to adopt organic practices and reduce dependence on chemical inputs.
14. That the Respondent No. 1 is spearheading a massive awareness and capacity-building campaign among farmers. Through a network of Krishi Vigyan Kendras (KVKs), agricultural universities, and extension services, the Ministry continuously educates farmers about the long-term benefits of soil health management, the perils of imbalanced fertiliser use, and the

कृषि क्षेत्र प्रसार/CIAT/ICAR
आर. वि. वि. (इंटर) सेक्रेटरी /
भारत सरकार / Government of India
कृषि एवं किसान कल्याण विभाग / Ministry of Agriculture & Farmers Welfare
कृषि एवं किसान कल्याण विभाग/Ministry of Agriculture & Farmers Welfare
कृषि भवन, नई दिल्ली / Krishi Bhawan, New Delhi-110001



techniques for implementing sustainable agricultural practices. This involves demonstrations, training programs, and the use of digital media to ensure wide outreach.

- 15. That the Respondent No. 1 submits that it has taken all necessary and proactive steps to address the issues highlighted in the news report. The policies and programmes in place are robust, scientifically grounded, and aimed at achieving the dual goals of food security and environmental sustainability. The Respondent No.1 is committed to continuously strengthening these efforts in collaboration with all stakeholders.
- 16. In view of the foregoing facts and circumstances, it is most respectfully prayed that this Hon'ble Tribunal may be pleased to take the submissions made herein on record and accept the same, Note the comprehensive and proactive measures being undertaken by the Respondent No. 1 to address the issues of soil health and balanced fertilizer use.

Deponent

CHANDRA SHEKHAR PRASAD
 Under Secretary
 Government of India
 Ministry of Agriculture
 Government of India
 Koshi, Bihar, New Delhi-110001

Verification

Verified at New Delhi on _____ March 2026 that the contents of the above reply affidavit is correct and true to the best of my knowledge and belief and derived from the official records maintained by the answering respondent.

17 APR 2026

Deponent

ATTESTED
 NOTARY PUBLIC
 NCT OF DELHI



CHANDRA SHEKHAR PRASAD
 Under Secretary
 Government of India
 Ministry of Agriculture
 Government of India
 Koshi, Bihar, New Delhi-110001