



AGRICULTURAL ECONOMICS



Come Join Us!
November 18, 2022
210 Filley Hall
Online and In-Person
Time: 3:00pm - 4:30pm

To join us via zoom, please follow the link below:

Meeting ID: 655 024 91 17

<https://unl.zoom.us/j/6550249117>



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Title: Power Plants, Air Pollution and Regulatory Rebound

Abstract:

Interactions between overlapping regulations can have unintended impacts on polluting activities. We document one such potentially important interaction. Local regulators in areas constrained by one type of air quality regulation—threshold-based local air quality standards—are incentivized to permit more local pollution in response to a decline in emissions induced by another kind of regulation—rules targeting power plant emissions. We combine a state-of-the-art particle trajectory model, machine learning, and an econometric model of local air pollution exposure to quantify the relationship between sustained reductions in upwind power-plant emissions of pollution (PM_{2.5}) precursors and downwind pollution levels. We use this integrated air quality modeling framework to test whether pollution levels in constrained counties appear to "rebound" when emissions from upwind pollution sources decline. We document evidence that is consistent with a local emissions rebound.