
The Divide Between Wind Turbines and Noise Control Engineering – 16Jan2017

Noise control engineering has a history for being a learned profession connecting science with engineering for protecting the public's quality of life from excessive noise. The advent of wind turbines in the 1990's, brought about changes by devaluing public noise protections with favorable legislation and regulation to facilitate permitting. Now wind industry noise emissions and their consultants are protected by lawyers, thereby preventing public scrutiny and peer review.

Thought provoking articles often can provide a gentle nudge for one's consideration. *Neil Lock's* essay did: *'On Science and Nonsense'* (wattsupwiththat.org). Wind turbines and noise control are a contradiction in terms since noise can only be controlled by size (how loud) and distance (how close) to neighbors. Wind turbine NRO (noise reduction operation) is effective for about 5 dB and nearly 50% reduction in electric power output, thus install a smaller turbine without NRO.

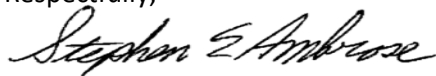
Neil made many a point about science being a source of knowledge, about revealing *truth* that can and should be openly shared. His *rules for good conduct of science* are worthy, especially number 10: *"Above all, the conduct of science must be honest and unbiased. In a nutshell: If it isn't honest, it isn't science. It's nonsense (rhymes with conscience)."*

This essay has a strong connection with wind turbines: *"In the world of scientific journals, there is a quality control mechanism known as peer review. The idea is that a number of independent experts scrutinize a proposed paper, check its correctness and its utility, and suggest changes where necessary. But peer review doesn't always catch issues with papers before they are published. This is a particular problem when the reviewers work or have worked closely with the authors, and share their conceptual framework. Indeed, where a group of experts on a subject have formed a clique, it's easy for groupthink to develop. In such a situation, only those ideas with which clique members are comfortable are likely to pass muster and get published."*

His conclusion is spot on: *"Science can be helpful in making decisions, even political ones. But any science to be used in such a context must be completely honest, accurate, unbiased and non-politicized. And the record of the politically powerful in matters of science is, historically, not a good one."*

Thank you.

Respectfully,



Stephen E. Ambrose, ASA, INCE, Board Certified Emeritus
Principal Consultant