

## Article Abstract

Title:	Short-term wind speed forecasting using feed-forward back-propagation neural network
Author(s):	K. G. Upadhyay <sup>1*</sup> , A. K. Choudhary <sup>2</sup> , M. M. Tripathi <sup>3</sup>
Address(es):	<sup>1*</sup> Department of Electrical Engineering, M. M. M. Engineering College, Gorakhpur, INDIA <sup>2</sup> Department of Electrical Engineering, M. M. M. Engineering College, Gorakhpur, INDIA <sup>3</sup> DOEACC Society, New Delhi, INDIA *Corresponding Author: e-mail: kgupadhyay@rediffmail.com, Tel +91-9235500541
Journal:	<i>International Journal of Engineering, Science and Technology</i> , Vol. 3, No. 5, 2011, pp. 107-112.
Abstract:	This paper deals with a neural network approach for Short term wind speed forecasting. Now a day, short-term wind speed forecasts have become gradually more important for the power system management or energy trading due to the large penetration of wind power technology and development of wind energy markets. In this new era, short-term wind speed forecasting is necessary for producers and consumers to become stable in the electricity market as in the electricity grid at any moment balance must be maintained between electricity consumption and generation. In this paper, a multi-layered feed-forward artificial neural network, trained by the resilient back propagation (Rprop) learning algorithm has been used for hourly forecasting of wind speed in the region of Canada.
Keywords:	Wind Speed Forecasting, ANN, Feed forward Back propagation, Resilient back propagation learning algorithm