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Abstract

In this study, 8 stations located in east Thrace in the northwest of Turkey have been taken into consideration. The wind speed data and the present power potential analysis of these stations have been calculated and the wind characteristics of the territory have been determined. Edirne, Lüleburgaz, and Kırklareli stations have been determined as the stations that are inefficient of the wind speed. The maximum wind speed value gained at these stations at 60 m high has been determined as 5.48 ms⁻¹ in 1979. The most efficient stations of wind speed potential have been determined as Çorlu and Malkara stations. It has been realized that maximum power up to 139.03 Wm⁻² values would be gained from these stations. The highest wind speed value has been derived as 10.01 ms⁻¹ at Çorlu in 1976. Also, it was discovered that the wind speed of four stations was reducing year after year and this decrementwas statistically significant. The dispersals have been introduced showing the relationship between the area's wind speeds with the percent frequency value. And it has been stabilized that the wind is dominantly blowing through the ways between geographical north-east and west-south.