

>>>>> NOTE <<<<<<

Always perform this check prior to connecting the LAKOTA's three phase wires at the top of the pole or mount or before closing the rear access panel on the head of the turbine if a wind optimization setting has been changed.

LAKOTA stators have a design resistance that relates directly to the four wind optimization settings. The resistance of the three phase wires gives a clear indication of which setting is in use (See Tech Bulletin 2) and health of the windings of the alternator. An improperly wired wind setting can destroy the LAKOTA windings and may VOID your warranty if not performed by a trained technician. Even though this check is performed at the factory, it is the installer's responsibility to ensure this check is again confirmed as part of the installation procedure.

Using a standard Multi-meter set for measuring ohms (resistance), alternatively measure the resistance between each phase wire as they exit the bottom of the LAKOTA mount. It does not matter which pairs are checked, or what order it is done in. The readings of all three pairs compared to the chart at right is what matters.

Select the chart appropriate to the voltage of the LAKOTA being tested. Note or write down the Ω reading measured from all three pair combinations of the phase wires. If you know the Wind Optimization Setting it should be obvious which MOD the LAKOTA is wired for. If it is not readily apparent from the readings there is likely a short, fault, or improper connection in the wiring harness. DO NOT install or operate the LAKOTA until this is corrected. Failure to do so can cause destruction of the alternator or a serious electrical fault in the system.

Contact your Dealer/Installer or TRUE-NORTH Power Systems service support at support@truenorthpower.com (519) 793-3290 for assistance.

Meter Negative Lead

MOD 3	MOD 2	MOD 1	MOD 0	
0.7	0.5	0.5	0.2	
0.7	0.5	0.5	0.2	
0.7	0.7	0.2	0.2	
(Unwired - All readings 0.5 Ohms)				
MOD 3	MOD 2	MOD 1	MOD 0	
1.7	1.1	1.1	0.5	
1.7	1.1	1.1	0.5	
1.7	1.7	0.5	0.5	
(Unwired - All readings 2.0 Ohms)				
MOD 3	MOD 2	MOD 1	MOD 0	
7.9	4.9	4.9	2.0	
7.9	4.9	4.9	2.0	
7.9	7.9	2.0	2.0	

Positive Lead

Measurement tolerance +- 0.2 ohms