



POWEROIL TO 335

POWEROIL TO 335 is an Uninhibited Transformer Oil meeting Bureau of Indian Standards: IS 335 -1993 Specification.

Sr No	Characteristics	Unit	Test Method	Guaranteed Data	
				Min	Max
1	Appearance		Representative sample of the oil shall be examined in a 100 mm thick layer at 27°C	Oil shall be clear, transparent and free from suspended matter or sediment	
2	Density at 29.5 °C	g / ml	IS 1448 P 16 - 1997		0.89
3	Kinematic Viscosity at 27 °C	cSt	IS 1448 P 25 - 1996		27
4	Flash Point, PMCC	°C	IS 1448 P 21- 1970	140	
5	Pour Point	°C	IS 1448 P10 - 1970		- 6
6	Inter Facial Tension	N / m	IS 6104 - 1971	0.04	
7	Neutralization Value	mg KOH/ gm	IS 1448 P 2 - 1967		
	a) Total Acidity				0.03
	b) Inorganic Acidity/Alkalinity				NIL
8	Water Content	ppm	IS 13567 - 1992		50
9	Specific Resistance		IS 6103 - 1971		
	a) at 90° C	ohm - cm		35x10 ¹²	
	b) at 27° C	ohm - cm		1500x10 ¹²	
10	Breakdown Voltage		IS 6792 - 1972		
	New Unfiltered / After Filtration	kV		30 / 60	
11	Dielectric Dissipation Factor (Tan δ) at 90 °C		IS 6262 - 1971		0.002
12	Corrosive Sulphur Copper Strip, 140 °C, 19 Hrs		IS 335 Annexure B	Non-corrosive	
13	Presence of Oxidation Inhibitor	%	IS 13631 - 1982	The oil shall not contain antioxidant additive. Value of 0.05 % max shall be treated as absence of DBPC	
14	Oxidation Stability at 100 °C, 164 Hrs		IS 335 Annexure C		
	a) Total Acidity	mg KOH /gm			0.4
	b) Sludge	%			0.1
15	Ageing characteristics after accelerated ageing (open beaker method with copper catalyst)		IS 12177 – 1987 Method A		
	Specific Resistance at 27 °C	ohm - cm		2.5 x 10 ¹²	
	(Resistivity) at 90 °C	ohm - cm		0.2 x 10 ¹²	
	Dielectric Dissipation Factor (Tan δ) at 90 °C				0.20
	Total Acidity	mg KOH/ gm			0.05
	Total Sludge	%			0.05