

## COMPARISON TABLE

### COVEN FP4001 vs 3M FC-3284

	3M Fluorinert FC 3284	COVEN FP4001
Appearance	clear	clear
Boiling point	50 °C	49 °C
Freeze Point	-73 °C	-108°C
Density (g/ml)	1.71	1.6
Surface Tension (dynes/cm)	13	10.8
Vapor Pressure (Pa)	35700	40000
abs Viscosity (cps)/ kinetic viscosity cSt	0.71/ 0.42	0.64 / 0.4
Heat of Vaporization (kJ/kg)	105	88
Calculated critical temperature, °C	161	169
Calculated critical pressure, MPa	1.94	1.88
liquid thermal conductivity, W/mK	0.062	0.059
Coefficient of Expansion (K <sup>-1</sup> )	0.0016	0.0018
Dielectric Strength/constant	40 kV/ 1.86@1KHz	>60 kV/ 1.8 @1KHz
Volume resistivity	7 x 10 <sup>15</sup> Ohm-cm	10 <sup>12</sup> Ohm-cm
Temperature Range	-60 ~ 60°C	2 phases: 49°C
ODP	0	0
GWP	high	<1
Flash Point	no	no