

Date:

Aim: Quantitate resistivity of PS-PANI at multiple concentrations of PANI

Sample	Timepoint	PANI	Resistance	Sample SA	Sample Length	Resistivity	Conductivity	Sample	Timepoint	PANI	Resistance	Sample SA	Sample Length	Resistivity	Conductivity	Sample	Timepoint	PANI	Resistance	Sample SA	Sample Length	Resistivity	Conductivity	Mean Conductivity
	(s)	(%)	(Ohms)	(cm2)	(cm)	(Ohm cm)	(S/cm)		(s)	(%)	(Ohms)	(cm2)	(cm)	(Ohm cm)	(S/cm)		(s)	(%)	(Ohms)	(cm2)	(cm)	(Ohm cm)	(S/cm)	(S/cm)
1	10	+ Control (pads)	0					2	10	+ Control (Al)	0					3	10	+ Control (Al)	0					
1	20	+ Control (pads)	0					2	20	+ Control (Al)	0					3	20	+ Control (Al)	0					
1	30	+ Control (pads)	0					2	30	+ Control (Al)	0					3	30	+ Control (Al)	0					
1	Mean	+ Control (pads)	0	2.8274334	0.02	0	#DIV/0!	2	Mean	+ Control (Al)	0	2.8274334	0.02	0	#DIV/0!	3	Mean	+ Control (Al)	0	2.8274334	0.02	0	#DIV/0!	0
1	10	- Control (acrylate)	1.00E+99					2	10	- Control (acrylate)	1.00E+99					3	10	- Control (acrylate)	1.00E+99					
1	20	- Control (acrylate)	1.00E+99					2	20	- Control (acrylate)	1.00E+99					3	20	- Control (acrylate)	1.00E+99					
1	30	- Control (acrylate)	1.00E+99					2	30	- Control (acrylate)	1.00E+99					3	30	- Control (acrylate)	1.00E+99					
1	Mean	- Control (acrylate)	1E+99	2.8274334	0.02	1.41E+101	7.07E-102	2	Mean	- Control (acrylate)	1E+99	2.8274334	0.02	1.41E+101	7.07E-102	3	Mean	- Control (acrylate)	1E+99	2.8274334	0.02	1.41E+101	7.07E-102	7.07E-102
1	10	30	10000					2	10	30	10000					3	10	30	10000					
1	20	30	10000					2	20	30	10000					3	20	30	10000					
1	30	30	20000					2	30	30	20000					3	30	30	20000					
1	Mean	30	13333.333	2.8274334	0.06	628318.53	1.592E-06	2	Mean	30	13333.333	2.8274334	0.06	628318.53	1.592E-06	3	Mean	30	13333.333	2.8274334	0.06	628318.53	1.592E-06	1.592E-06
1	10	10	3210000					2	10	10	ND					3	10	10	ND					
1	20	10	3650000					2	20	10	ND					3	20	10	ND					
1	30	10	4010000					2	30	10	ND					3	30	10	ND					
1	Mean	10	3623333.3	2.8274334	0.05	204894673	4.881E-09	2	Mean	10		2.8274334	0.05	0	#DIV/0!	3	Mean	10		2.8274334	0.05	0	#DIV/0!	#DIV/0!
1	10	3	80200000					2	10	3	ND					3	10	3	103500000					
1	20	3	104300000					2	20	3	ND					3	20	3	150000000					
1	30	3	120600000					2	30	3	ND					3	30	3	162000000					
1	Mean	3	101700000	2.8274334	0.03	9.585E+09	1.043E-10	2	Mean	3		2.8274334	0.03	0		3	Mean	3	138500000	2.8274334	0.03	1.305E+10	7.661E-11	9.047E-11
1	10	0	1.00E+99					2	10	0	1.00E+99					3	10	0	1.00E+99					
1	20	0	1.00E+99					2	20	0	1.00E+99					3	20	0	1.00E+99					
1	30	0	1.00E+99					2	30	0	1.00E+99					3	30	0	1.00E+99					
1	Mean	0	1E+99	2.8274334	0.02	1.41E+101	7.07E-102	2	Mean	0	1E+99	2.8274334	0.02	1.41E+101	7.07E-102	3	Mean	0	1E+99	2.8274334	0.02	1.41E+101	7.07E-102	7.07E-102