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Evaluating BRANOfol film

Background: Sanders Tool/ Caterpillar wanted the BRANOfol film evaluated for

corrosion inhibiting properties.

Purpose: Evaluate submitted BRANOfol film that was manufactured in Germany.

Materials: Carbon Steel Panels

Copper Panels

Submitted BRANOfol film, 3 mil

Uncoated Polyethylene film, 3 mil (control film)

Perkin Elmer FT-IR 1000 Spectrometer

Razor Blade test kit

VIA test kit FT-IR test kit

Method: Razor Blade test

VIA test FT-IR test

Procedure: The above tests were performed according to standard procedures

for each.

Results: Razor Blade Test Performed on Carbon Steel Panels

Film	Panel 1	Panel 2	Panel 3
BRANOfol	Fail	Fail	Fail
Control	Fail	Fail	Fail

Razor Blade Test Performed on Copper Panels

Film	Panel 1	Panel 2	Panel 3
BRANOfol	Fail	Fail	Fail
Control	Fail	Fail	Fail





VIA Test

Film	Plug #1	Plug #2	Plug #3
BRANOfol	0	1	2
Control	0	0	0

FT-IR results are attached at the end of the report.

Conclusion:

The tests determined that BRANOfol failed the razor blade test and does not provide contact corrosion protection for copper or carbon steel. The BRANOfol film didn't pass the VIA test as well. The FT-IR results show that the film contains some amount of corrosion inhibitors, probably sodium benzoate.

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VIA Test Grades (Grade 2 or 3 are passing)



Grade 0: Blind test

No corrosion inhibiting effect

Grade 1: Blind test

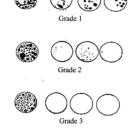
Minute corrosion inhibiting effect

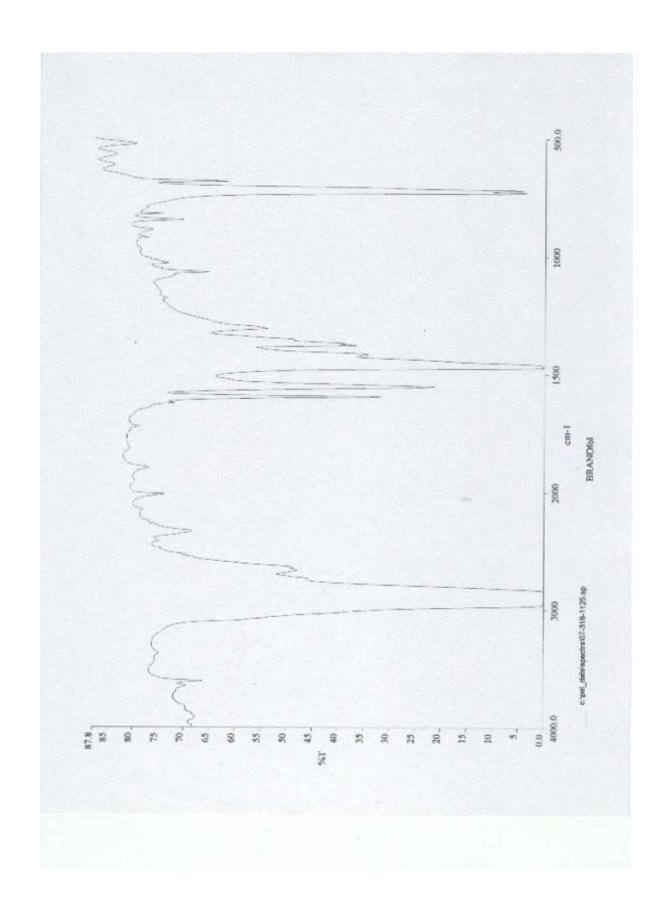
Grade 2: Blind test

Medium corrosion inhibiting effect

Grade 3: Blind test

Good corrosion inhibiting effect





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