

January 14, 1992

QA-1-92-618

Document Control Desk  
United States Nuclear Regulatory Commission  
Washington, DC 20555

Subject: Potential Deviation of Design Safety Function  
Elmwood/Fasco Contactors.

Nutherm International Inc., was informed on 10/2/91 by Georgia Power Company (GPC) Plant Vogtle that they were experiencing problems with Elmwood/Fasco contactor carriers breaking in contactor model# 30-FO-30 (now Fasco Model # 3M40-B) in their Engineered Safety Feature Heater Control Panels (1/2-1531-N7-001/002-H01; 1/2-1561-N7-001/002-H01; and A-1542-N7-001/002-H01), manufactured by Nutherm. GPC has identified the primary root cause as distortion/shrinkage of the molded phenolic contactor carrier such that the designed clearance fit with the laminated steel armature becomes an interference fit ultimately resulting in fracture of the phenolic part due to induced tensile stress. Subsequent testing by Nutherm has revealed that shrinkage of the contactor carriers does occur as a function of time and temperature. Further testing by Nutherm is required to determine the maximum shrinkage of the contactor carrier and to identify the extent of design changes required by the contactor manufacturer (Fasco).

Nutherm will respond within the required time frame as identified in paragraph 21.21 of 10CFR Part 21, dated July 31, 1991. In the interim GPC has installed replacement contactors Fasco Model No. 3M40B, which may also require replacement when the investigation of the carrier problem has been concluded. These replacements from Fasco were selected by Nutherm as those manufactured to the highest manufacturer design range for clearance/tolerances for contact carriers.

Nutherm as the manufacturer of the heaters and associated control panels has notified its customer, American Air Filter of Louisville, Kentucky, who is the original equipment supplier to GPC of the potential problem.

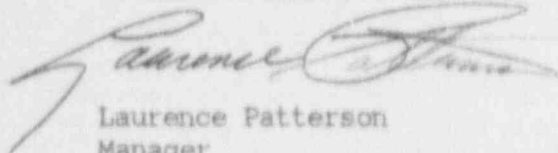
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If you should have any questions regarding this matter please contact me at  
(618) 244-6000

Sincerely,

NUTHERM INTERNATIONAL, INC.



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Manager  
Quality Assurance

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