



Failure Analysis of Space Shuttle Orbiter Valve Poppet

By Rick Russell

BiblioGov. Paperback. Book Condition: New. This item is printed on demand. Paperback. 24 pages. Dimensions: 9.7in. x 7.4in. x 0.1in. The poppet failed during STS-126 due to fatigue cracking that most likely was initiated during MDC ground-testing. This failure ultimately led to the discovery that the cracking problem was a generic issue effecting numerous poppets throughout the Shuttle programs history. This presentation has focused on the laboratory analysis of the failed hardware, but this analysis was only one aspect of a comprehensive failure investigation. One critical aspect of the overall investigation was modeling of the fluid flow through this valve to determine the possible sources of cyclic loading. This work has led to the conclusion that the poppets are failing due to flow-induced vibration. This item ships from La Vergne, TN. Paperback.



READ ONLINE
[4.57 MB]

Reviews

It is great and fantastic. Yes, it really is engage in, nevertheless an amazing and interesting literature. You can expect to like how the author write this pdf.

-- **Roma Prohaska MD**

This book can be worthy of a read, and much better than other. It usually fails to charge a lot of. I realized this publication from my dad and i encouraged this pdf to understand.

-- **Prof. Flo Cruickshank DDS**