

Materials Technology Center

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INGERSOLL - RAND

It would appear that the technical advantages claimed for Simsite®, at our meeting of 11/3/98 , are in fact true. Most recipients of this memo were at the meeting, hence it is not necessary to include, at this point, a detailed discussion of technical characteristics of composite impellers vis-a-vis cast ferrous, or non-ferrous impellers. For those who did not attend, or require additional information , the writer will gladly provide mor detailed technical data.

The potential market for Simsite® impellers is enormous. It encompasses, to begin with , fresh, brackish, and salt water applications. Nor are they limited to small sizes; SIMS has made impeller to 45 inches in diameter. In my view, advanced compoiste materials, like Simsite®, will compete with, and gradually take market share from more traditional materials. The discussions reported herein clearly indicate that this is so with pump impellers.

DPD – Harrison must now consider whether potential business opportunities justify pursuit of this new technology and further dialogue with John A. Kozel.

CONCLUSIONS :

- 1. Simsite® has a long documented history of successful service in seawater and other applications.**
- 2. Simsite® has technical advantages, in some applications over impeller materials which we supply and is, in fact, preferred by some of our customers.**
- 3. Should DPD-Harrison conclude that an option for a composite impeller represents a business opportunity worth pursuing, reasearch, development and extensive testing would not be necessary. This is so because the Simsite® material and products have already been proven in service.**

RECOMMENDATION :

Compelling evidence exists that Simsite® impellers are technologically superior in some applications. A business arrangement with the SIMS Pump Valve Company, Inc. Represents an opportunity to participate in this new technology. It is my firm conviction, based on review of the technical data, and the discussions summarized herein, that justification exists for more in-depth discussion with John Kozel. The ultimate objective of these discussions would be to establish SIMS as a supplier to DPD-Harrison, with whatever legal assurances are deemed necessary to protect our interests.

The alternative may be to see a continued erosion of the replacement parts business and the eventual association of SIMS, or a similar firm, with one of our competitors.

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