



Harry F. Bader

# Condoms also cause allergic reactions

*Mr. Harry F. Bader, Vice-President, Latex Services, Akron Rubber Development Laboratory in Akron, USA, and a world authority on latex, answers the questions and doubts of readers on latex and latex products.*

- **A**RE latex condoms showing the same allergic problems as latex medical gloves?
  - ▲ In those instances where there is a repeated use of condoms similar to the repeated use of medical gloves, complaints of allergic reaction have been reported. Data are likely to be available from the Centre for Disease Control in Atlanta, Georgia, USA or equivalent organisations in other countries.

Since the latex compound and the manufacturing processes used for condoms and for gloves are quite similar, potential protein content and residual chemical content are similar. For the same reason, the potential number of persons allergic to condoms would be expected to be the same as for gloves. However, since sensitisation is increased with more frequent use, we hear much less about condom allergies. Depending upon the source of the data I've encountered estimates that from 0.5% to 4.0% of the world population react to the allergens in natural rubber.

As with medical gloves the powder used on condoms can absorb allergens from the surface of the latex. Incidents of reactions to the allergens in the powder have been reported. This information should also be available from the Centre for Disease Control.
  - Can you suggest a method other than double centrifuging, to reduce the non-rubber constituents (NRC) to 1% or less?
- ▲ My only information on this is from testing of "creamed centrifuged" natural latex. Results are generally 0.4 - 0.6% NRC. I don't know if this resulted from the centrifuging of creamed latex or from the creaming of centrifuged latex. Creaming materials and procedures are readily available, so I would suggest you attempt to achieve a low % NRC by creaming your centrifuged latex.
- What compounding agent will reduce the ZHST of centrifuged latex without compromising other properties?
- ▲ Neither I or my associates are familiar with the acronym ZHST. However, I assume you are referring to a test which records the viscosity change after addition of zinc oxide dispersion to the latex. (ZOV-H and ZOV-L).

If that is a correct assumption, there are numerous additives which can reduce the ZOV. Addition of 0.25 parts KOH along with 0.25 - 1.0 parts of Vanderbilt products Darvan NS, WAQ or 31 should give the desired results along with improved dipping characteristics.

Send your questions to:

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