

High Impact

A Project from the first 10 Years of NORA



Preventing Occupational Latex Allergy in Health Care Workers

The Challenge:

Occupational latex allergy has been a prevalent condition, particularly among health care workers, and has led to disability and rarely death. Although estimates vary, between 8 and 12% of the 7 million health care workers showed evidence of sensitization. Over 22 billion pairs of medical gloves were sold in 1997, with enormous potential for reducing exposures. The reduction in use of powdered latex gloves had been associated with a reduced risk for developing latex allergies, but the costs, benefits, and practicality of this approach needed further documentation. 🍎

Approach:

NIOSH recently funded a prospective intervention study in two health care facilities to evaluate whether the key recommendation in the NIOSH Latex Allergy Alert (exclusive use of powder-free gloves) can reduce or eliminate the risk of sensitization. NIOSH researchers collaborated with the study investigators in planning, implementing, and evaluating results of the study.

Results:

After the glove interventions at the study hospitals, no HCW developed latex sensitization during 32 months of observation. Before the interventions, no HCWs reverted from skin test positive to negative; afterward four reverted. The study demonstrated that development of LS in hospital workers can be virtually eliminated by exclusive use of powder-free latex or synthetic gloves.

Impact:

The NIOSH publication was widely distributed, and the recommendations were widely adopted. According to industry figures, there has been a surge in demand for powder-free examination gloves, and by the first quarter of 2001, powder-free examination glove sales accounted for 80 percent of the total unit sales of examination gloves to U.S. hospitals. The reduction in use of powdered latex gloves has been associated with a reduced risk for developing latex allergies. Several recent studies have documented a decline in reports of latex allergy among health care workers in relation to the adoption of recommended control measures, which translates into reductions in workers with symptoms and disability. ■

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For complete description of this project and others see the CD Rom "A Compendium of NORA Research Projects and Impacts, 1996-2005" located at www.cdc.gov/niosh.

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