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Herbert E. Scarf* (herbert.scarf@yale.edu), Cowles Foundation, Yale University, 30 Hillhouse Ave., New Haven, CT 06511. *My Favorite Simplicial Complex and Applications to the Frobenius Problem.*

The Frobenius Problem for the integers $a = (a_1, \dots, a_n)$ is closely related to the simplicial complex of Maximal Lattice Free Bodies based on an $n \times (n - 1)$ integral matrix A , whose columns generate the lattice $\{ah = 0 : h \in \mathbb{Z}^n\}$. The talk will discuss some structural properties of this complex which may be useful in the computation of its $n - 1$ dimensional simplicies and consequently the Frobenius number for the vector a . (Received September 17, 2007)