

Table III: Thermodynamic Parameters for Burying a Solvent-Accessible Phenyl Group^a

method	ΔG	ΔH	ΔS	ΔC_p
V _L -Y92 ^b	-1.6	-2.4	-2.8	-140
V _H -Y100a ^c	-4.3	-2.1	+7.0	-130
solid ^d	-1.1	-1.6	+0.5	-31
liquid ^e	-3.9	-0.5	+13	-53

^a Units of ΔG and ΔH are kcal mol⁻¹; ΔS and ΔC_p are in cal mol⁻¹ K⁻¹. ^b Observed difference in antigen binding thermodynamics between V_L-Y92F and V_L-Y92A mutants. ^c Observed difference in antigen binding thermodynamics between V_H-Y100aF and V_H-Y100aA mutants. For the ΔG calculation the binding constant obtained for V_H-Y100aA from calorimetry was used. ^d Calculated from thermodynamic data on the dissolution of solid compounds in water (Murphy & Gill, 1991). ^e Calculated from thermodynamic data on the transfer of liquid hydrocarbons to water (Gill et al., 1976).