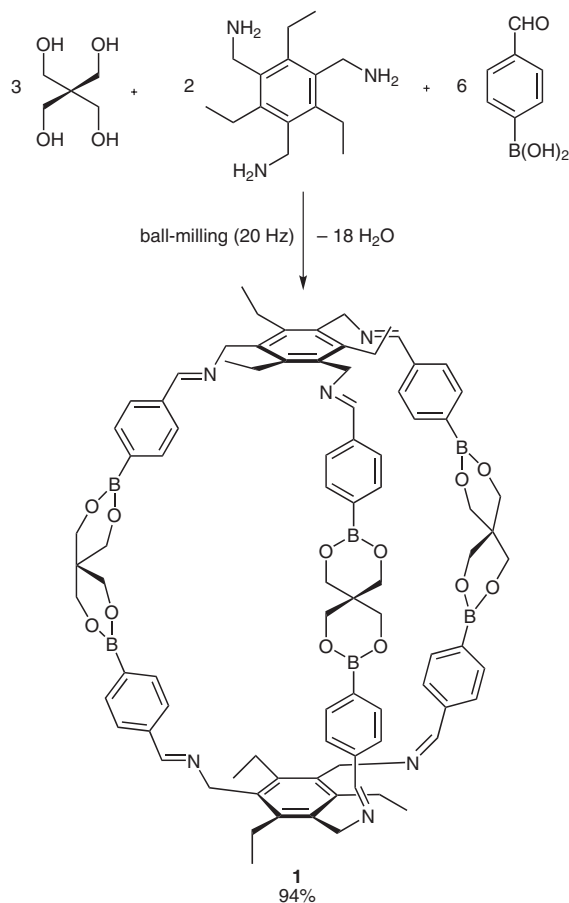


Syntheses in a Ball Mill



Significance: The authors report the syntheses of cage-like molecules represented by **1** in the scheme above to demonstrate the utility of solid-state reactions in a ball mill. The synthesis of **1** involves the formation of 18 new covalent bonds and proceeds very efficiently in a ball mill.

Comment: The authors report that the solvent-free synthesis of **1** proceeds in 94% yield in a ball mill while the same reaction in ethanol and tetrahydrofuran gives only 56% and 24% yield, respectively.