

**Figure S3.** Steered molecular dynamics (SMD) simulations results for the complexes of 3-NPBA and  $\beta$ -lactamases which belong to the A, C, and D classes, respectively. The distance between the boron atom of 3-NPBA and the oxygen atom of Ser OG was gradually reduced. Atomic distances (upper

subplots) and the QM subsystem reaction (lower subplots).	energy	of th	e residues	and	the	inhibitor	directly	involved	in	the