

Definition (Lower bounds in a poset). The *lower bounds* of a subset **A** of a poset **P** are, if they exist, the elements which are dominated by all elements in **A**. The *greatest lower bound*, if it exists, is the greatest among the lower bounds of **A**. This is denoted $\bigwedge \mathbf{A}$ or $\text{Inf } \mathbf{A}$ and also called the *meet* or *infimum* of **A**.