

# Visualizing Mordell-Weil groups of elliptic curves using Shafarevich-Tate groups

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**Abstract.** Let  $E$  be an elliptic curve over  $Q$  and  $n$  be a positive integer. I will discuss a method that can frequently be used to embed  $E(Q)/nE(Q)$  in  $\text{Sha}(A/Q)$ , for some Abelian variety  $A$ . One fun application of this method is to constructing Shafarevich-Tate groups of (conjecturally) surprising orders.

