Let $P$ be a $d$-generated $p$-group and $Q$ be a $d$-generated $q$-group for distinct primes $p$ and $q$. It has been conjectured that for any finite group $G=\langle P, Q\rangle, G$ is $(d+1)$-generated. Lucchini determined that any minimal counterexample to this conjecture embeds into $L^{t}$ where $L$ has a unique minimal normal subgroup $M=S^{n}$ with $S$ nonabelian simple. Up to information on finite simple groups, we prove that $L / M$ is $(d+1)$-generated or nonsolvable. (Received August 26, 2008)

