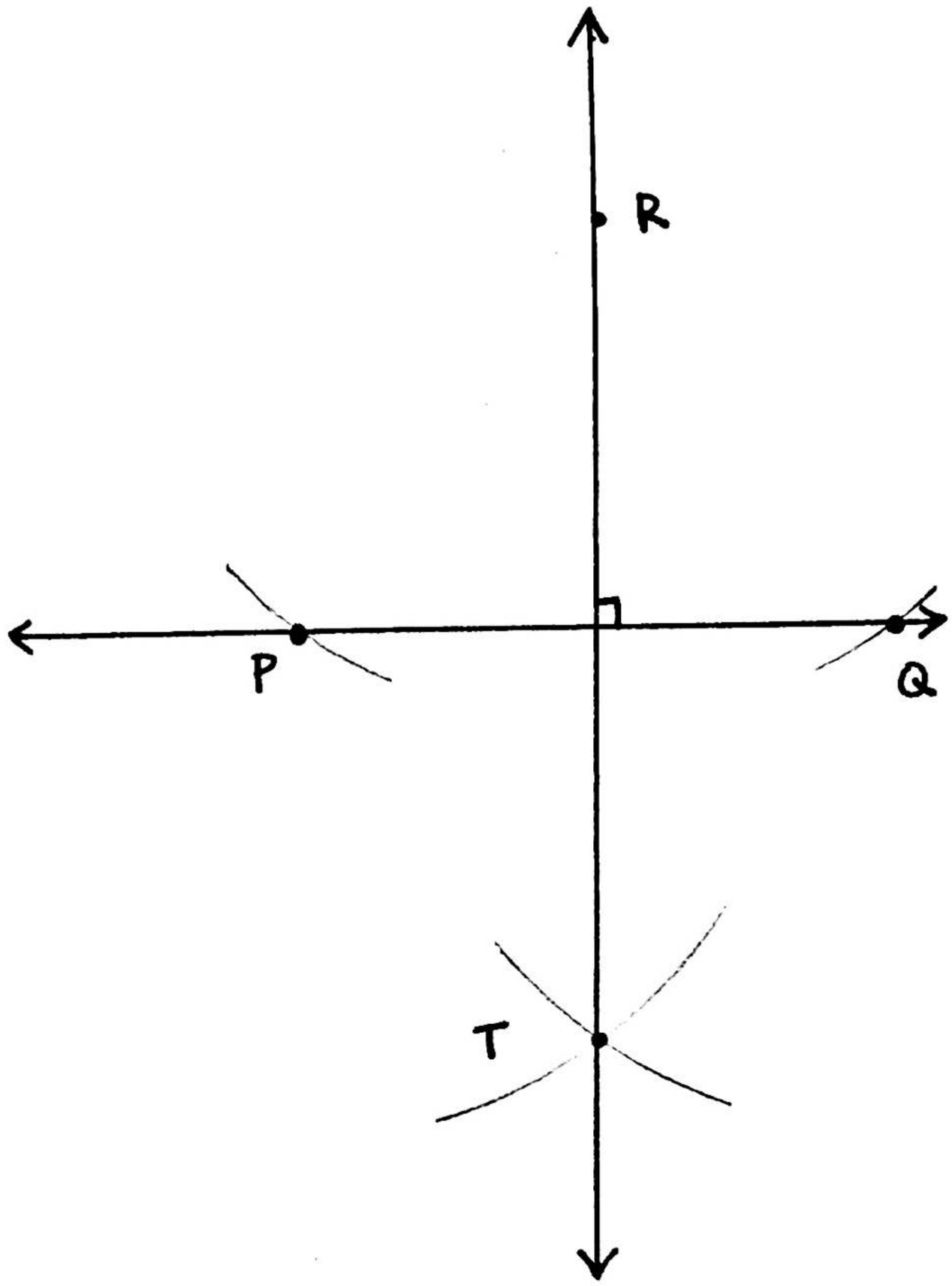
Constructing Perpendicular Line through a Point

① Start with a line and a point R not on that line

② Draw an arc which is about 50% longer than the distance from the point to the line, intersecting the line on each side of R, label these •P and •Q

③ From each point (P & Q), draw an arc below the line so the arcs cross, label this T

④ Draw $\overleftrightarrow{RT}$, which is perpendicular to $\overleftrightarrow{PQ}$ and passes through R