

Focus of an ellipse

If A and B are two points, then the locus of points P such that $AP + BP = c$ for a constant $c > 2AB$ is an *ellipse*. A and B are the *foci* (plural of focus) of this ellipse.

If an ellipse has centre $(0, 0)$, **eccentricity** e and **semi-major axis** a in the x -direction, then its foci are at $(\pm ae, 0)$ and its directrices are $x = \pm a/e$.

