What is the angle of rotation and how is it related to angular velocity and angular acceleration.

$Angle\,of\,rotation(\theta)$ is defined as the angle between the $rotational\,motion\,axis$ (i.e is the axis upon which a rotational body rotates) and the axis which is perpendicular to it.

Here Θ represents the $angle\,of\,rotation$, which is measured in **radians** alongside the $x-axis$ (which is the $rotational\,motion\,axis$).

Suppose if $1\,revolution$ equals to 360° then we can represent the $angle\,of\,rotation$ for $1\,revolution$ in radians as:

$$1\,revolution = 360^\circ = 2\pi\,radians$$

The relationship between $angle\,of\,rotation\,(\theta)$ and $arc\_length(s)$ and $radius\,(r)$ is given as:

$$\theta = \frac{s}{r}$$