~~Main Notations~~ Main notations

Dimensions of the autogiro

R = Radius
~~N~~ b = Number of blades (b)
c = Chord of same
θ = Pitch angle of the blades (from no lift incidence)
S = Total area of the blades (when rectangular)
σ = Solidity = In case of rectangular blades $\sigma = \frac{S}{\pi R^2}$

Movement of the Autogiro

V = Speed ~~through the air~~ of displacement
Ω = ~~Peripherical~~ Peripherical speed at tips.
ω = Angular speed = $\frac{\Omega}{R}$
~~W = Speed through the air~~ v = speed of flow through the disc.
n = Revolutions per minute
i = Angle of incidence, measured as the angle that the axis of rotation forms with the vertical, considered positive when the axis is inclined backwards.
ε = Angle between the average plane of rotation of the articulated blades with that perpendicular to the axis of rotation
ψ = Angular position of a blade, ~~reckoned~~ measured from the forward position [rotation ~~anti-clock-wise~~ and in the sense of the rotation].

~~Ψ = Value of ψ~~

β = Angle between the longitudinal axis of a blade and the perpendicular plane to the axis of rotation