7. $\left(\dfrac{\partial w}{\partial x}\right)^2 + \left(\dfrac{\partial w}{\partial y}\right)^2 = f(w).$

Complete integral in implicit form:

$$\int \frac{dw}{\sqrt{f(w)}} = \pm\sqrt{(x+C_1)^2+(y+C_2)^2},$$

where C_1 and C_2 are arbitrary constants.

Reference

Polyanin, A. D., Zaitsev, V. F., and Moussiaux, A., *Handbook of First Order Partial Differential Equations*, Taylor & Francis, London, 2002.

