6 **(a)** Show that the expression $7\cos x\tan x+\dfrac{4\cos x}{\tan x}$ can be expressed as $3\sin x+\dfrac{4}{\sin x}$. **[3]**

(b) Hence determine the solutions of the equation

$$7\cos 2\theta\tan 2\theta+\frac{4\cos 2\theta}{\tan 2\theta}=-13$$

in the interval $0°<\theta<180°$. Give your solutions correct to **1** decimal place. **[4]**