**6B Breaking Down Angled Projections**

1. A ball is thrown horizontally, with speed 20ms-1, from the top of a building of height 30m.

Find:

1. The time the ball takes to reach the ground
2. Write the initial velocity in vector form
3. A particle is projected with velocity $U=\left(3i+5j\right) ms^{-1}$, where $i$ and $j$ are the unit vectors in the horizontal and vertical directions respectively.

Find the initial speed of the particle and its angle of projection.