

## How does eBeam work?

eBeam works by means of a combination of Infra-red and ultrasonic technology embedded into the pens, and an eBeam receiver to translate the movements of these signals and convert them into mouse strokes on a PC or Mac.

When an eBeam pen first touches the board it emits a flash of infra-red which is picked up on a sensor in the centre of the eBeam receiver. The pen when being used then emits a series of ultrasonic signals which can be heard as a slight 'buzzing sound'; this signal is received on the poles of the receiver. The eBeam unit then calculates the difference in time between the two signals and triangulates the position of the stylus or marker sleeve on the pre-calibrated area. The principle is not too dissimilar to that of a child counting the difference in time between lightening and thunder to locate the centre of a storm.

