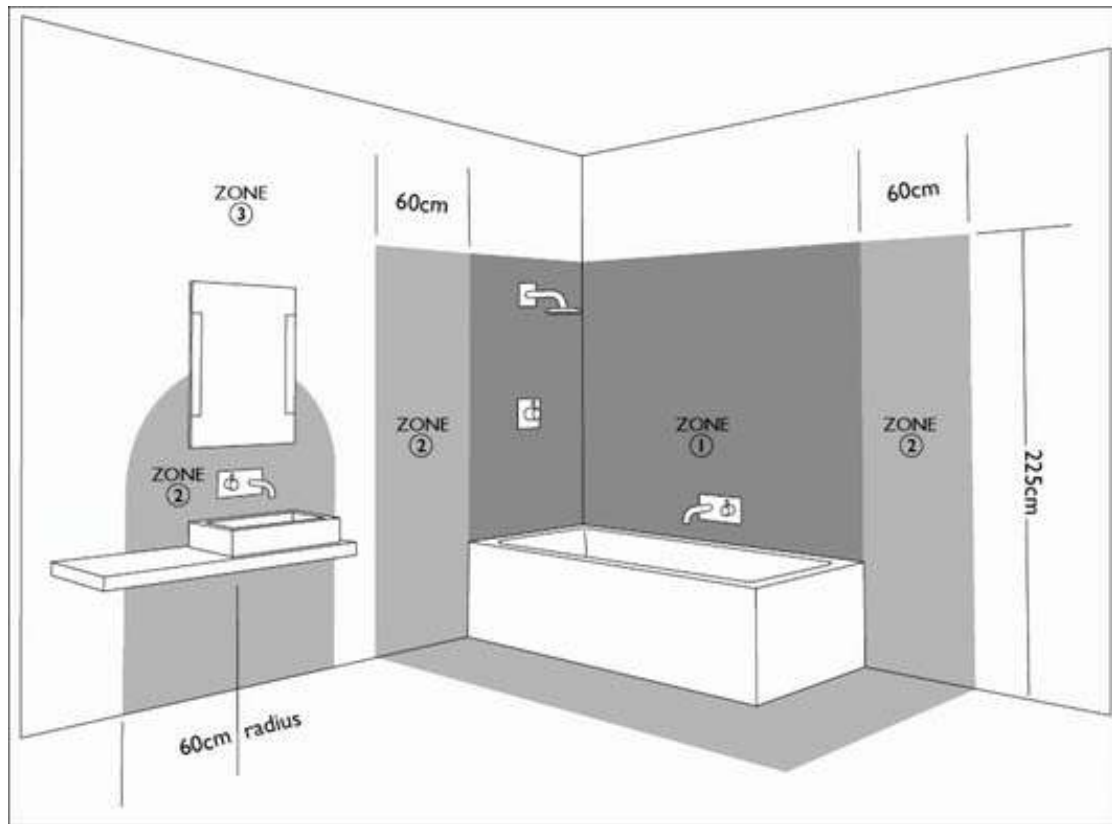


BATHROOM LIGHTING SAFETY

The Zones



Electrical equipment may be identified as having a certain level of mechanical and moisture protection, these are quoted as 'Ingress Protection' (or IP) numbers - such as 'IPXY', where X and Y are numbers, the X showing the level of mechanical protection and Y showing the level of moisture protection - in both cases, the higher the number, the better the protection. If a piece of equipment does not have an IP number, it must not be used in zones 0, 1 or 2 (or elsewhere having a wet/damp environment).

The most common IP Codes are: IP67, IP65, IP44, IP20. For bathroom products you will find them clearly marked with its IP rating and the zone in which it can be installed, on some of the new fitting it will have a drawing on the box showing you where it can and can't be fitted in the wetroom.

Safety Zones for a Bathroom

Zone 0 - Inside the bath or shower. Any fittings used here must be SELV (Separated Extra Low Voltage – max. 12Volts) and have a minimum rating of IP67 (protected against immersion in water – total immersion proof)

Zone 1 - Above the bath or shower to a height of 2.25m. A minimum rating of IP44 is required. In this zone, if there is likelihood of water jets being used for cleaning purposes, a minimum of IPX5 is required. Also, subject to IP rating, SELV or 240V

luminaries may be used in this zone; if the fitting is 240 volts, a 30mA residual current device (RCD) must also be used to protect the circuit in this zone.

Zone 2 - The area stretching to 0.6m outside the bath or shower and above the bath or shower if over 2.25m. An IP rating of at least IP44 is required. In this zone, if there is likelihood of water jets being used for cleaning purposes, a minimum of IPX5 is required. Also, subject to IP rating, SELV or 240V luminaries may be used in this zone. In addition, it is a good practice to also consider the area around a wash basin (within a 60cm radius of any tap) as Zone 2.

Outside the zones – anywhere outside zones 0, 1, and 2. Where water jets are not to be used for cleaning purposes, the general rules of BS7671 apply. Here, there is no requirement for any lighting solutions to be protected against particles or solid objects, e.g. IPX4 – no IP rating required.