What Does an AED's "IP" Rating Mean?

Every AED has an "IP Code" which can usually be found in the AED brochure or user's manual. The "IP Code" stands for "Ingress Protection Rating" which classifies the level of protection that electrical appliances (like AEDs) provide against the intrusion of solid objects or dust, accidental contact, and water. To be clear it has NOTHING to do with how well a particular device can withstand a drop or shock.

The code is expressed as IPXX with "X" being numbers. For example, you may find an AED that has an "IP" Rating of 55.

The first numerical digit indicates the level of protection against solid particles such as dust, dirt or other matter. The second numerical digit indicates the level of protection from harmful ingress of water. The higher the value of each number the higher the resistance to these contaminants. AEDs with lower values are more likely intended for use in offices, schools, churches and similar "carpeted areas." AEDs with higher numerical "IP" ratings are designed for use anywhere, but especially in environments where dust and moisture could be prevalent. You can use an AED's "IP" number to determine if it's built for the environment you intend to use it or store it in.

IP First number - Protection against solid objects

0	No special protection
1	Protected against solid objects up to 50mm, e.g. accidental touch by hands.
2	Protected against solid objects up to 12mm, e.g. fingers.
3	Protected against solid objects over 2.5mm (tools and wires).
4	Protected against solid objects over 1mm (tools, wire, and small wires).
5	Protected against dust limited ingress (no harmful deposit).
6	Totally protected against dust.

IP Second number - Protection against liquids

0	No protection.
1	Protection against vertically falling drops of water e.g. condensation.
2	Protection against direct sprays of water up to 15^{o} from the vertical.
3	Protected against direct sprays of water up to 60^{o} from the vertical.
4	Protection against water sprayed from all directions ^{o} limited ingress permitted.
5	Protected against low pressure jets of water from all directions ^{o} limited ingress.
6	Protected against low pressure jets of water, e.g. for use on ship decks - limited ingress permitted.
7	Protected against the effect of immersion between 15cm and 1m.
8	Protects against long periods of immersion under pressure.