

Lesson 1: Wearable Technology

Wearable technology: smart electronic devices that are worn close to and/or on the body that provide a particular function

Advantages:

Most wearable technology devices are hands free and portable, eliminating the need to take our devices out of our pockets, they are also connected to our smart devices, transmitting information instantly.

Disadvantages:

However, more advanced wearables, like the Apple watch, have limited battery capabilities, whilst others have been reported to measure data inaccurately on occasion.

Lesson 2: Compression

Compression is used to reduce file sizes and change various attributes of an image.

Compression can be either lossy or lossless. **Lossy compression**, permanently removes data from the file, for example pixels, to make the file smaller. Once compressed, the changes cannot be reversed. The quality is affected but the file size is reduced.

Lossless compression shrinks the whole file, without removing any data, meaning that the quality of the file remains the same - it does not get worse and retains its original characteristics. The file can then be decompressed to its original quality in the future.

Lesson 3: File Types

A **JPG** file is a bitmap-based image predominantly meant for web and print use. JPG format is the standard file format of digital cameras and is the most common image format used on the web because of its compression and universal support. JPGs use lossy Compression.

A **PNG** file is similarly pixel-based and cannot be scaled up without pixelation. PNG files support transparent backgrounds and retain overall higher quality images than JPGs for graphics, but not photographs, due to lossless compression. It's much better to use PNGs for graphics with fewer colours.

Lesson 4: House Style

The expression house style refers to the specific use of layouts, typography, colours and graphics followed by creators to ensure stylistic consistency across a range of related products. A media products house style is increasingly seen as an important part of its image and as a marketable commodity in its own right. The argument for consistency is very simple, variation that has no purpose is distracting and leads to products, created by the same company with the same purpose, that are not well balanced. By keeping a consistent style across publications, this enables audiences to link products together and to actively engage with them across a variety of platforms, therefore increasing the exposure of the brand and the messages embedded within its content.

Lesson 6: Data Protection

The **General Data Protection Regulation**, also known as GDPR, is the toughest privacy and security law in the world which imposes obligations onto companies anywhere, so long as they target or collect data related to people in the European Union. The GDPR will levy harsh fines against those who violate its privacy and security standards, with penalties reaching into the tens of millions of pounds.

Personal data is any information that relates to an individual who can be directly or indirectly identified, including:

- Names
- Email addresses
- Addresses
- Ethnicity
- Gender
- Biometric data
- Religious beliefs
- Sexual orientation
- Political opinions