

Embossing and Blind Embossing

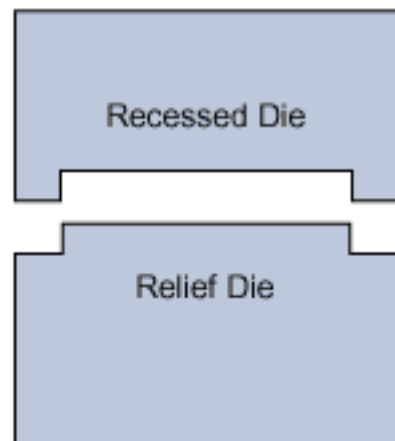
Embossing and **debossing** are the processes of creating either raised or recessed relief images and designs in **paper** and other materials.

An **embossed** pattern is raised against the background,

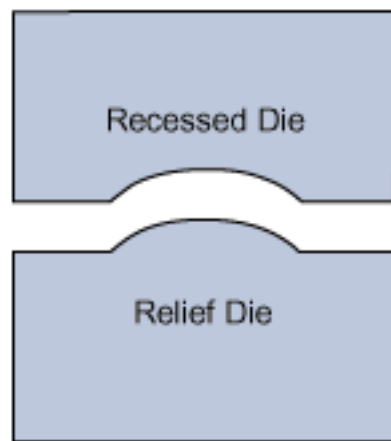
A **debossed** pattern is sunken into the surface of the material (but might protrude somewhat on the reverse, back side).

Three factors that need to be controlled during the process:

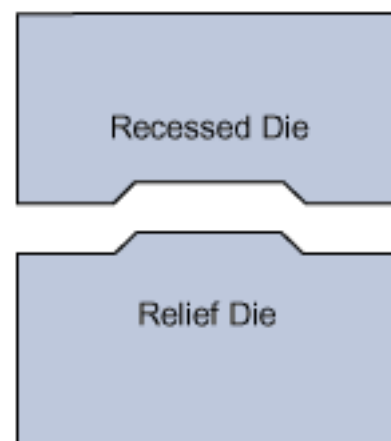
1. Pressure: the intensity of the impact on the weight of the stock being embossed.
2. Heat: the ability to maintain a consistent heat level for the best impression.
3. Type of Die and Die Depth:



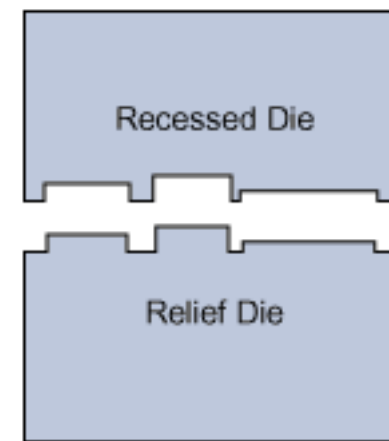
Single Level:
The die is straight and level, it contains only one depth.



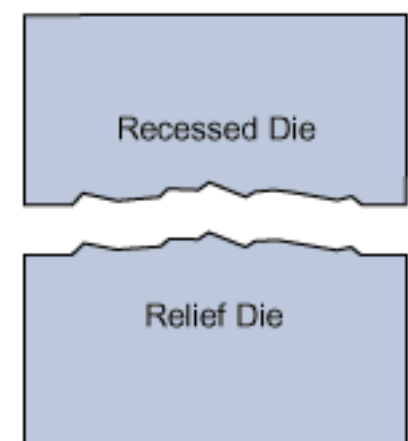
Round Edge:
Provides a soft edge in contrast to a hard ruled edge.



Beveled Edge:
Combines the softness of a round edge with the well defines lines of a distinct edge



Multilevel Edge:
Also known as a dimensional die. It has several distinct levels of depth.



Sculptured Edge:
A hand-tooled brass die that has a variety of depth, it gives dimension and appearance for the embossed image.

Magnesium Dies

- Least expensive of all dies
- Photomechanically etched
- Best for short runs up to 5,000 impressions
- For use on smooth stocks
- Due to softness of die metal, a slight rounding effect may occur

Copper Dies

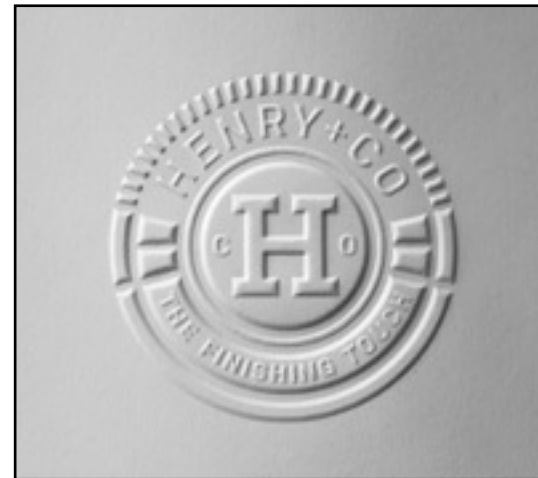
- Mid range cost
- Used for runs up to 100,000 impressions
- Provides better detail and reproduction of fine lined copy and images

Brass Dies

- Most expensive type of die
- Created with a manual drawing machine called a pantograph or created entirely by hand
- Used for very long runs, some in excess of 1,000,000 impressions
- Provides the highest quality reproduction, giving sharp detail and clean bevels

Blind Embossing

Blind embossing is embossing without ink, so that the image is raised but not coloured.



Typical uses for embossing

- Embossing is often used for company logos or as accents surrounding logos.
- It can be used for borders or highlights surrounding images.
- Another common use is to create elegant accents for distinctive symbols, images, graphics, or lines.
- If a multi level die is used, it gives the image a distinctive 3-D effect.
- Embossing is occasionally used for security. Embossed seals or symbols of authenticity add security to government forms, legal documents, and corporate papers, however, embossing is considered an older form of document security, as more alternatives in print technology continue to be developed, such as watermarking and UV marking.