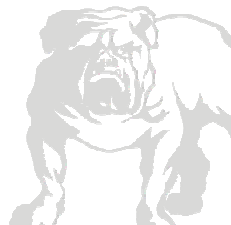
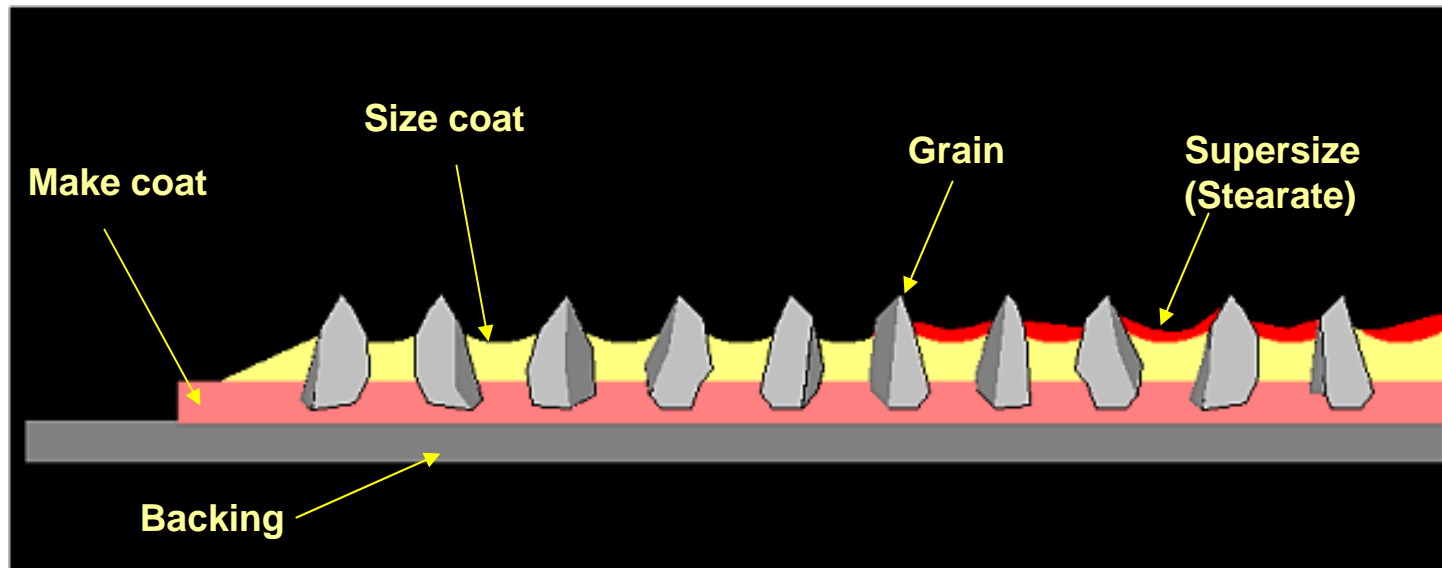


Construction of Coated Abrasives



Quality from start to finish

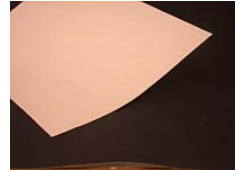
Coated Abrasive - Construction



Backing Materials

A and B papers are used for fine grits and in products for hand and light hand sanders.

(E.g Fineflex, Royal P600-P220, Gold P 500-220)



C paper is used in more demanding products and medium coarse grits. C paper endures higher load than B paper.

(E.g Gold P180, Royal Plus P180)



D paper is used for coarser grit abrasives for oscillating hand sanders.

(E.g Gold P150-80, Royal Plus P150-80)



E paper is used in narrow belt products as well as for discs and sheets in coarse grits.



F paper is used in demanding belt products, especially in wide belts, where demands on form, stability and tensile strength are high.

(E.g Jepuflex, Avomax)



T paper is used for coarse grits and for extreme heavy wide belts.

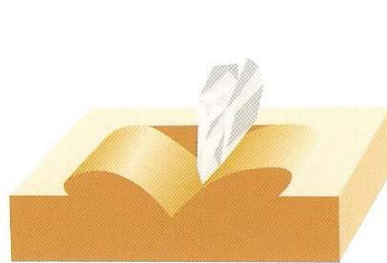
(E.g Jepuflex, Avomax P40-P60)



Choice of grains

For all types of sanding material, the best results will be achieved if the grains are hard and sharp enough. In most cases it is also good if the grains are not brittle. Since all these qualities cannot be combined in all the materials, it is important to find the optimal combination for the intended purpose. The minerals used for making grains today are synthetic, making them harder and more durable compared to the sand used traditionally.

The grains are seldom worn out when wood sanding. Mostly, the problems are due to clogging. The right amount of sand on the material and the right glue height will prevent clogging, and are therefore more important qualities than hardness. Hard grains can be needed for hard wood types, for example oak, as well as MDF that can contain hard impurities. A grain type producing a clean finish is preferable when denibbing. Silicon carbide grain fulfils both the need for hardness and a clean finish.



Silicon Carbide



Aluminum Oxide



Sanding material coating

The density of the sanding material decides the sanding result. The basic rule is that a denser coating provides a better sanding surface. However, in order to prolong the lifetime of the sanding material, a more open coating can be optimal when sanding soft clogging materials and wood types. A half-open coating can be used for various purposes when sanding many different material types.

Coating density



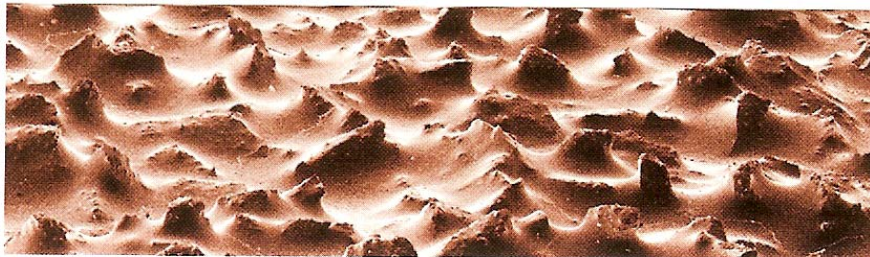
Closed coating



Semi open coating



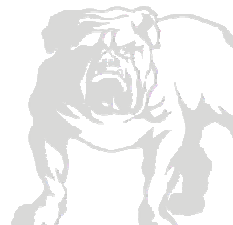
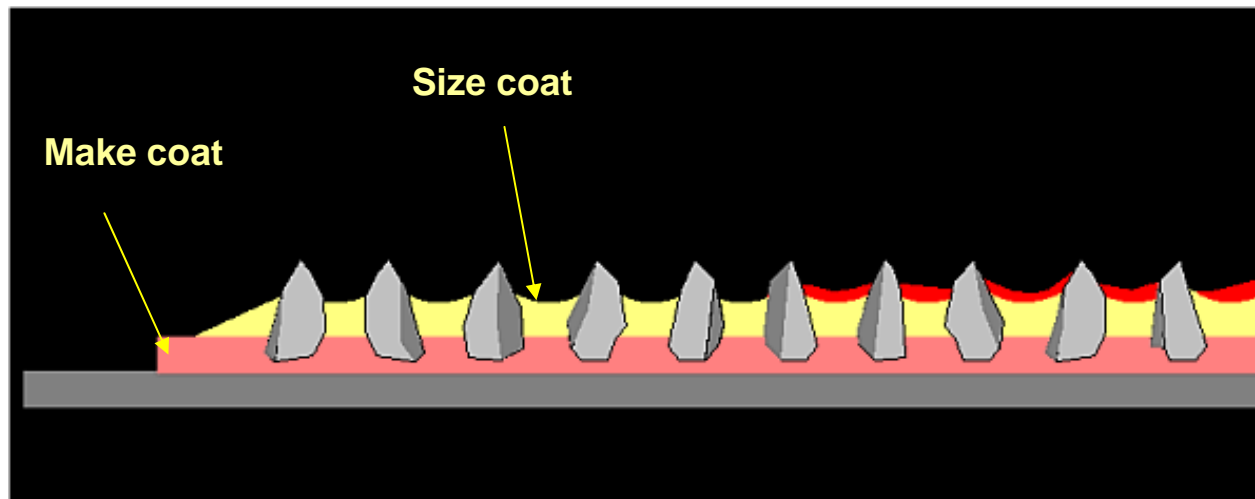
Open coating



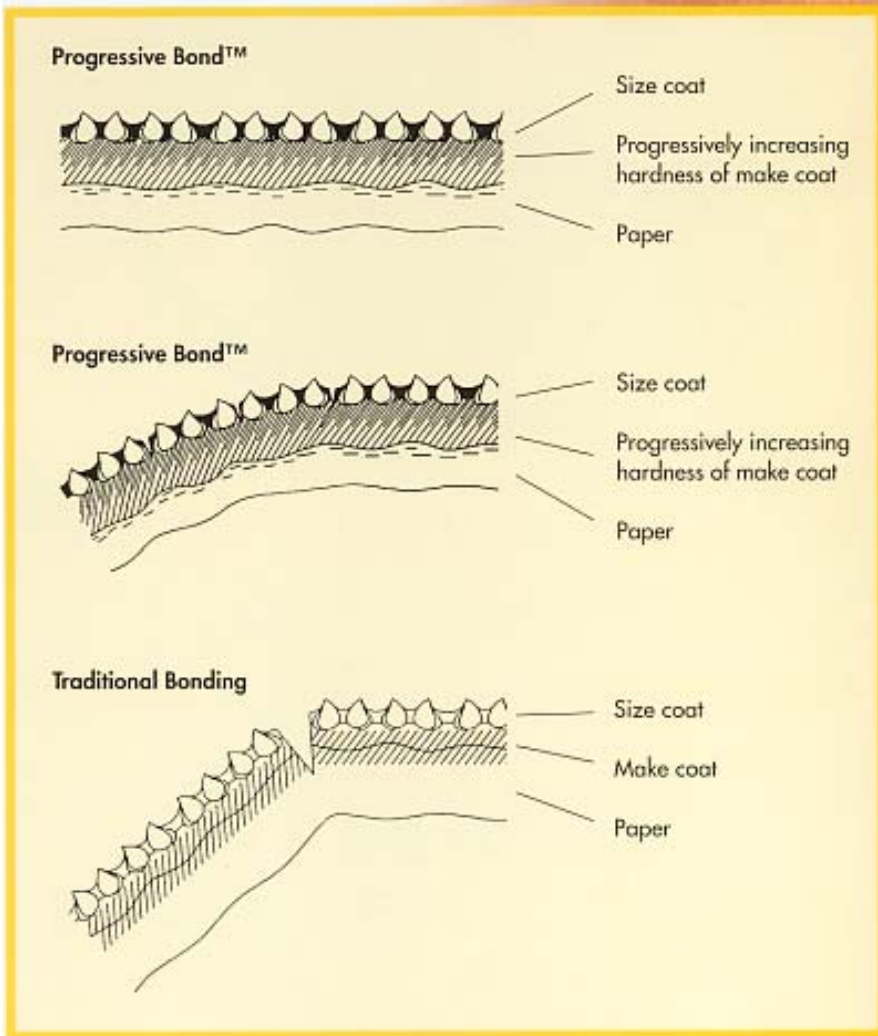
Bondings

Bonding materials and their combinations

- Natural glue products
- Resin over glue products
- Resin over resin (full resin) products
- Waterproof products
- Resin over latex
- Progressive Bond™



Progressive Bond™



Construction:

Paper

- Optimised paper weight
- Good internal bond
- Very smooth surface for coating

Make coat

- Progressively increasing hardness of resin from bottom to top.

Grain

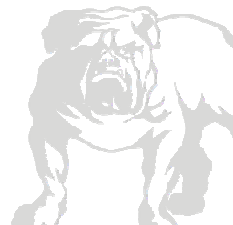
- Precise grain distribution because of the smooth backing
- Better surface finish



Resin size coat

- Good adhesion
- Hard surface layer
- Smooth surface

The difference in behavior between an abrasive paper with Progressive Bond™ and traditional coating.



Stearate Coating

The main purpose with stearate coating, is to minimize clogging (Stearate=supersize)

1. The stearate makes the abrasive surface dirt and dust repellent.
2. The stearate has a lubricating and cooling effect on the sanding, i.e. it minimizes the friction.
3. The stearate fills the structure and cavities where the dust sticks.
4. This results in a more consistent surface finish over the life time of the product as the stearate gradually gets worn off, meanwhile the abrading grains worn.
5. The stearate enables the change in color for the material.

