

**SPECIAL EFFECT PRODUCTS
METALLICS , BONDED , SALT & PEPA / MIXCOLOR**

**DRY-BLEND METALLICS
SALT & PEPA / MIXCOLOR
PRODUCTS**

Most common metallic and salt & pepa products are obtained by the so-called "dry-blend" process, which consists in a simple mixing of different powders (salt & pepa / mixcolor) or of a base added with metallic or micaceous pigments (Metallics). Differences in terms of chemical nature, density, particle size distribution and dielectrical properties of the components, are typical for powder mixtures and often cause applicative problems which must not be underestimated in order to achieve the expected results.

Here below some suggestions helping to minimize the drawbacks typical for these products

- _ Application conditions (type of gun and setting parameters) influence the final result. Always test the products on your own line before processing an order.
- _ Not to spray powder directly from the box; put it into the fluidizing bed to allow fluidizing air to maintain it homogenous.
- _ Use only one single lot of powder for each single order; two different lots may show slight tone differences.
- _ The use of triboelectric devices is not suggested; use corona spraying guns.

The use of integral recycle is not recommended at all.

On dry-blend products an indicative ratio is 10%, but an improper management of the recycle may result in remarkable variations of the effect, therefore it must be evaluated in each single case; please contact arsonsisi s.p.a.

BONDED PRODUCTS

To solve the main part of the problems related to dry-blend products arsonsisi offers to its customers a wide range of metallic products obtained by the so-called "bonding" process.

Bonding is a complex, sophisticated process allowing the base powder to incorporate the metallic pigment injected into the mixing chamber in critical temperature conditions and under nitrogen inertized atmosphere, under high shear mixing. By this way powder becomes the "vehicle" for the pigment particles.

This process allows to have a homogenous electrostatic behaviour for binder and metallic pigments and makes easier the application of metallic effect coatings, largely reducing the problems of old generation "dry-blend" products, thanks to the absence of the undesired de-mixing phenomenon occurring during spraying operations.

This results in a better colour and finish homogeneity, in less metal particles accumulation on edges ("frame effect"), in reduced presence of halos and allows a regular recycle of the overpray.

In some case the bonding process also allows to obtain good applicative results even on tribo spraying lines, totally unfit for dry-blend products.

CHEMICAL NATURE

Selac metallics, bonded or salt & pepa / mixcolor may be required in the following versions

- _ epoxy
- _ epoxypolyester
- _ industrial polyester
- _ homologated polyester for architectural
- _ polyurethanes for indoor and outdoor

**SURFACE FINISHES
AND COLOUR RANGE**

Selac metallics, bonded or salt & pepa / mixcolor may be required without any colour restriction in the following surface finishes

- _ glossy to matt smooth surface
- _ fine textured
- _ glossy to semimatt orange peel
- _ arabesque
- _ wrinkle

**SPECIAL EFFECT PRODUCTS
METALLICS , BONDED , SALT & PEPA / MIXCOLOR****CLEANING ,
MAINTENANCE AND
PROTECTION
OF COATED ITEMS**

Cleaning and maintenance are operation which - if well done - could extend the operating life of goods ; viceversa , their unproper execution may result in irreversible damaging of the coated surface .

To obtain a good result and to avoid any problem we recommend to ALWAYS use soft clothes (better if cotton-made) soaked with non aggressive liquids .

It is possible to succesfully use

- _ warm or cold soap solutions
- _ solvent-free cleansing agents
- _ mixtures of ethanol and water

Newspaper or any dry cleaning actions must be avoided .

Aggressive solvents such as MEK , acetone , aromatics , mixtures of acetates and nitro diluent are absolutely not to be used .

Some metallics effecte are attainable only by the use of particular metallic pigments showing sensitivity to oxidization (not post-treated or leafing aluminium pigments) .

Oxidization of such these pigments causes a loss of brilliance and metallic effect and it could be generated by exposure to wheathering , by extended or unproper manipulation , as well as by substances of common daily use (among them unappropriate cleansing agents)

This consideration is valid not only for conventional dry-blend metallics , but for bonded versions too .

On metallic products it is absolutely necessary to avoid the use of alkaline (e.g. ammonia or sodium hydroxide) or acid (e.g. hydrochloric acid) substances , even if diluted , because the may attack the metallic pigments end deteriorate the surface finish .

Independently from coating product and with any detergent it might be used , it is necessary to avoid any extended contact by stagnation .

Any excess must be immediately removed by dabbing with a soft and clean cloth .

It is always a good practice to previously test the cleaning in a hidden corner of the article . An alternative system ensuring a good protection to the metallic finish is the application of a powder coating clearcoat layer .

This protects the metallic coating from the action of aggressive agents and avoids the removal of metallic particles from the surface because of the mechanical action done during the cleaning operations .

This precaution allows to maintain for a long time an aspect with no alterations . In this case too is mandatory to adopt soft clothes and to apply very light mechanical sollicitation during the clearcoat cleaning .

Selac clearcoats are available in different chemical natures (Polyester , epoxypolyester , polyurethane) and with different brilliance levels , from glossy to semi-matt .

We remind also the possibility of an antigraffiti version , which has outstanding chemical properties and improved surface hardness .

Except for particular cases the overcoating must be done on a first layer completely cured , in order to avoid any possible interferences between the metallic and the clearcoat layer .

Application of the clear can be done with the standard spraying procedures , by corona or tribo guns .

Usually a reduction of spraying voltage to 40 - 50 KV is recommended in case of corona systems .

The layer of clear may slightly influence the aspect of the metallic finish .

With outdoor product the application of the clearcoat is usually not necessary , because are used metallic and non metallic powders (typically micas and stainless steel) which are not sensitive to oxidization thanks to chemical nature and to surface treatments received to have better outdoor performances .

We suggest to contact our laboratory in order to define the most suitable coating cycle , taking into consideration the final destination of the finished good .

For further informations about cleaning conditions and techniques , it is possible to refer to some brochures edited by AITAL (Italy) or by national coaters associations .

RECOMMENDATIONS

These informations are given on the base of our best experience as well as the one of specialized laboratories and they are continuously updated , nevertheless the user has the complete responsibility to apply and to experiment the products according its own specific necessities .

This document has the intention to describe and summarize the main properties of arsonsisi products , but in no case it can be considered as a warranty for them .

