QUALITY POLICY

To protect the trusted and respected identity of our company, to increase its preference and to be a leading manufacturer of powder coating;

Understand the expectations and demands of our customers, to satisfy the needs and expectations,

Provide the products and services to our customers on time,

Continuous support of our after-sales services to ensure customer satisfaction,

Provide high-quality and affordable products to our customers manufactured

with advanced technology,

Improve our level of knowledge with emphasis on research and education and share the information with employees and customers,

Improve existing our products and services by following the new technologies Add innovative new products and services to our company portfolio,

Sense of team spirit and team work as one of the basic elements of our corporate culture vision,

Contribute to the goals and strategies of our company and to adopt,

are the basic principles of our organization quality. Obey these principles, use a quality system complying with the provisions of the National and International standards, in order to constantly improve and maintain the quality is the duty of all our employees.

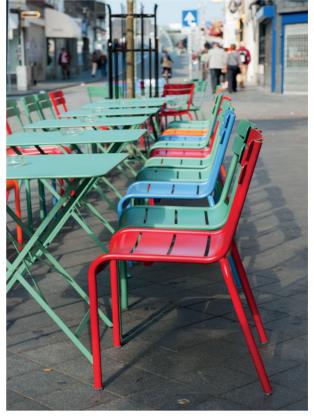


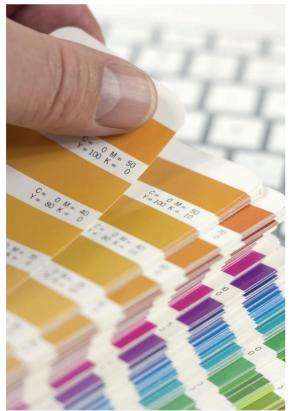
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company profile

Element was founded in 2004 in Istanbul, Turkey. All we have extensive backgrounds in the powder coatings industry and a common philosophy to offer quality products, on time, at a reasonable price in the powder coatings market. In 2007 Element Powder Coatings started production at Tuzla İstanbul. Element Powder Coatings facility is on 5,000 square meters. Flexible, modern batch automated manufacturing facility suited for the production of high quality powder coating. Element have also modern, well equipped Quality and R&D laboratories. To ensure quality and consistency, Element has been ISO 9001 certified since 2008. Element is a customer focused, leading supplier of powder coating. We are principally engaged in the research, design, development, marketing and manufacturing of powder coatings. Element offers a wide range of products and services for the powder coating industries. We supply powder coating to construction



and building industries, automotive industries, general industries, electronics, chemical pipetank industries. We also assist in developing innovative product, production systems, with our team of scientists, engineers and support personel. Our Vision is to continue growing Element's presence as a global brand in powder coating industry. Our Mission is to be the innovator, solution provider and guide for each customer by having the technology and knowledge about products, services, process methods and production facilities.

element mile stones

Since its foundation in 2004, Element has continuously set new standards in powder coating industry and created intelligent solutions in response to changing client needs.

- 2004 Establishment of Element Boya in İstanbul Turkey
- 2004 Sales of powder coating
- 2007 Powder coating production in Tuzla İstanbul
- 2008 Production 1300 ton/year
- 2008 Element has been ISO 9001:2000 certified
- 2009 First export
- 2010 New modern production facility
- 2011 Qualicoat approval for Element Polyester serie
- 2012 New logo and new box design
- 2012 Production 3000 tons/year



how powder coating works

Powder coatings are based on polymer resin systems, combined with hardeners, pigments, leveling agents, flow modifiers, and other additives. These ingredients are melt mixed, cooled, and ground into a uniform powder. A process called electrostatic spray deposition (ESD) is typically used to achieve the application of the powder coating to a metal substrate. This application method uses a spray gun, which applies an electrostatic charge to the powder particles, which are then attracted to the grounded part. After application of the powder coating, the parts enter a curing oven where, with the addition of heat, the coating chemically reacts to produce long molecular chains, resulting in high cross-link density. These molecular chains are very resistant to breakdown. This type of application is the most common method of applying powders. Powder coatings can also be applied to non-metallic substrates such as plastics and medium density fiberboard (MDF).

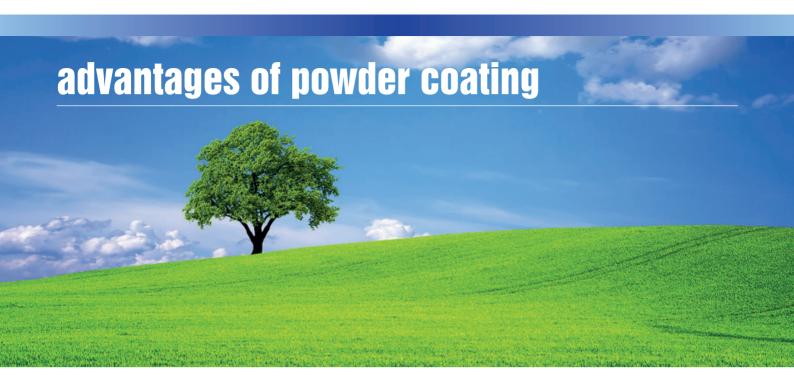
Sometimes a powder coating is applied during a fluidized bed application. Preheated parts are dipped in a hopper of fluidizing powder and the coating melts, and flows out on the part. Post cure may be needed depending on the mass and temperature of the part and the type of powder used. No matter which application process is utilized, powder coatings are easy to use, environmentally friendly, cost effective, and tough!











There are several advantages of powder coating over conventional liquid coatings:

1. Environmental aspects

VOC: Powder coatings emit zero or near zero volatile organic compounds. Environmentally friendly and energy and material efficient. Powder coating production lines produce less hazardous waste than conventional liquid coatings. No paint sludge is produced, as arises from water-wash booths used to trap over-sprayed liquid paint. As Powder Coatings are solvent-free, no oven is required for the flash-off of solvents before curing.

2. Application aspect:

Powder coatings can produce much thicker coatings than conventional liquid coatings without running or sagging. Reduction in the fire risk as no solvent required Reduced health hazard to operators One-coat application: a thicker, more uniform coating can be obtained by a single coating than can be achieved with wet paint. A wide range of specialty effects is easily accomplished which would be impossible to achieve with other coating processes. The electrostatic powder process ensures complete coverage, even on complex shapes. Choice of finishes - clear, opac color, metallic or textured. Exceptional gloss and color retention.

3. Technical aspects:

Corrosion resistance. Robust mechanical and chemical performance - good at resisting abrasion, acids, solvents, etc. Good electrical insulation capabilities. Applicable to steel, zinc, brass and aluminum.

4. Productivity and Costs:

Powder coating overspray can be recycled and thus it is possible to achieve nearly 100% use of the coating. Cost-efficient on small batches or single items, thus ideal for job coaters. Quick turnaround times. Ready to use: no stirring, mixing or thinning is required as it may be with liquid paints. Some application equipment enables the powder to be fed directly from the box

Fewer rejects: The ease of use of powder, both manually and with automatic application plant, gives a lower reject rate compared with wet paint. Rejects caused by damage after coating are also reduced due to the toughness of powder coatings

5. Capital equipment and operating costs

Capex for a powder line is generally lower than for conventional liquid lines.

Space requirement: less space is required than for liquid coatings equipments. Ease of use: powder is far easier to apply than wet paint and less operator training is necessary

durability of powder coating

Powder coating is a high-quality finish found on thousands of products you come in contact with each day. Powder coating protects the roughest, toughest machinery as well as the household items you depend on daily. It provides a more durable finish than liquid paints can offer, while still providing an attractive finish. Powder coated products are more resistant to diminished coating quality as a result of impact, moisture, chemicals, utraviolet light, and other extreme weather conditions. In turn, this reduces the risk of scratches, chipping, abrasions, corrosion, fading, and other wear issues. It's tough. It looks great. And it lasts a long, long time. In addition to being durable, powder coating is an attractive choice due to environmental advantages.



Powder coating is used on an increasing variety of products. In 2010, the global demand for powder coatings amounts to approximately US\$5.8 billion. Due to the significant advances in formulating, manufacturing and application Technologies over the past 10 years powder coating is used in many areas previously not thought possible. The powder coating market presents a rapid annual growth of around 6% from 2012 to 2018. Currently, the industrial uses are the largest application market of powder coatings. Automotive industry experiences the most dynamic growth. Steady and strong growth is also expected by furniture and appliance markets. Furthermore, the application of powder coatings in IT & Telecommunication is also being widely explored.



products

Powder coatings are an environmentally friendly coating solution offering superior performance for applications which require maximum abrasion resistance and hardness. Automobiles, major appliances, tool boxes, motorcycle frames, heavy duty equipment, computer chassis, office furniture, car parts and barbeques all benefit from the unique properties and cost efficiency of powder coatings.

Element's outstanding range of powder coating technologies provide answers to just about any application challenge. All Element powder coating formulas are economical and backed by experience, technology and technical service. Element is committed to developing world-class quality and environmentally friendly products.



the powder types

lyurethan

How do I choose the Correct Product?

Depending on the application, it is very important to choose the correct product. Powder coatings are available in a broad range of types and qualities. One has to know exactly what the added value of the coating should be. Do we expect only a decorative aspect or should the coating increase the corrosion resistance?



Ероху

What colour do we need? The most common colour standard is the Ral standard, but powder coating can also be developed according to NCS, Pantone

or up to the customer wishes.

What kind of gloss is desired? The gloss can range from dead matt 2 % to high gloss 100%. Does your product require an approved coating? Qualicoat, GSB, or other?

Will the coated part be in contact with food? Do you have to coat porous substrates? So you might need a primer or a degassing powder coating. It is obvious that the coater should have a good idea of what type of powder coating is needed. The selection of the correct powder coating should therefore be discussed between the user and the supplier.

New way in Powder Coating

epoxy



Epoxy powder coatings are an ideal choice for applications requiring ultimate corrosion resistance, excellent chemical and mechanical properties, exceptional adhesion and the ability to meet demanding specifications.





epoxy polyester



Hybrid powder coatings are a blend of epoxy and polyester resins used primarily for indoor applications. They offer improved penetration into corners and recesses (Faraday Cage areas) and are less sensitive to overbake on curing than many other chemistries, making them suitable for use on appliances, radiators and other temperature-sensitive applications.





polyester



Polyester powder coatings are available in TGIC, TGIC-free and superdurable formulations. They are tough, attractive and demonstrate outstanding physical properties enabling them to withstand prolonged outdoor exposure, which makes them the coating of choice for lawn and garden furniture as well as other types of outdoor equipment.





polyurethane



Polyurethane Powder Coatings Polyurethane powders are based on the thermosetting polyester resin and urethane hardeners for the application of decorative exterior and interior application where high smoothness, flow and durability are required. They demonstrate superior chip, mar and scuff resistance and they are highly resistant to humidity and salt spray.



Resin Type	Applications	Properties
Ероху	Corrosion protection	No outdoor resistance Good chemical resistance Good mechanical qualiites Excellent adhesion
Epoxy-polyester	White goods, metal furniture, electronic devices	Indoor only Lower price Moderate chemical resistance Moderate mechanical qualiites
Polyester	Architectural market Industrial market	Normal outdoor resistance 10 year warranty on colour and gloss Increased outdoor durability (superdurable) 25 year warranty on colour and gloss
Polyurethane	Anti-graffiti coating	Good chemical resistance Less good mechanical qualities Outdoor resistance
Acrylic	Transparent topcoat	Good resistance to scratches Outdoor resistance Excellent flow out