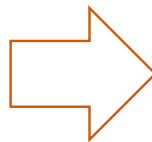
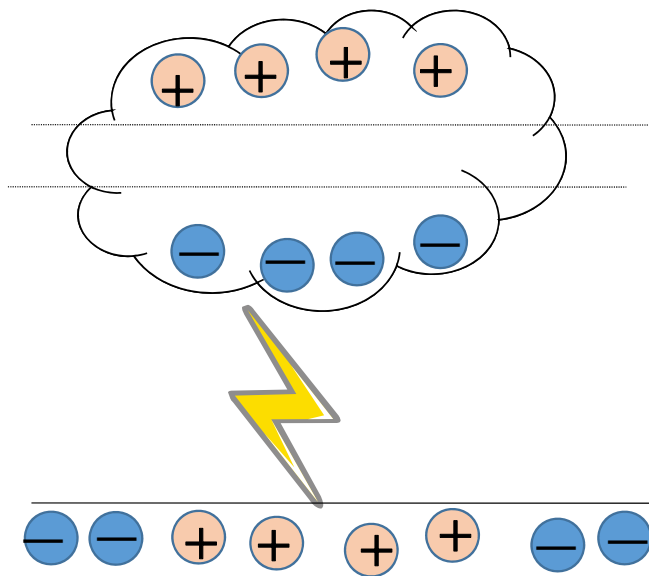




L'électricité statique et les solutions antistatiques VESSEL

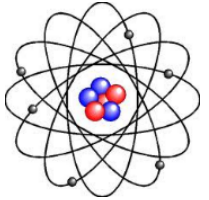


Théorie

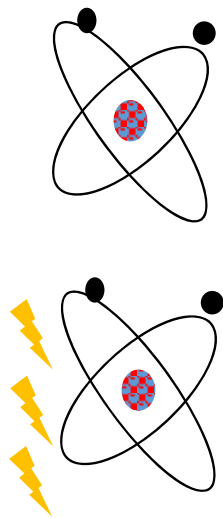


Comment l'électricité statique se crée t-elle: L'Atome

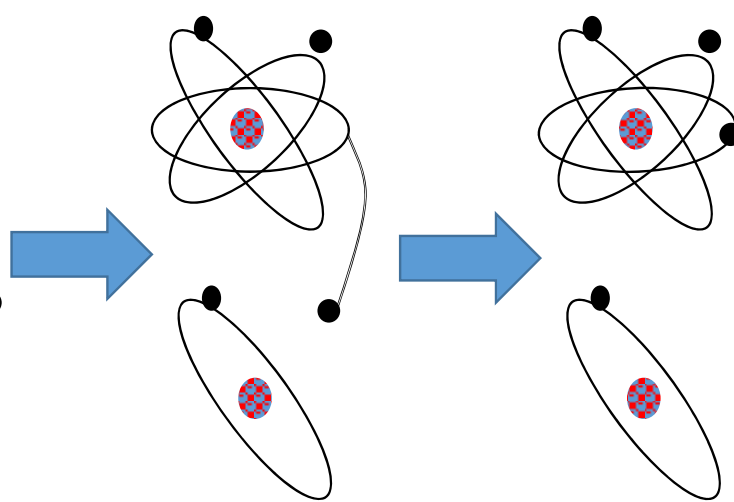
- L'électricité statique provient d'un transfert d'électrons entre deux ou plusieurs atomes causant le déséquilibre de ceux-ci.



Atomes stables



Transfert d'électrons

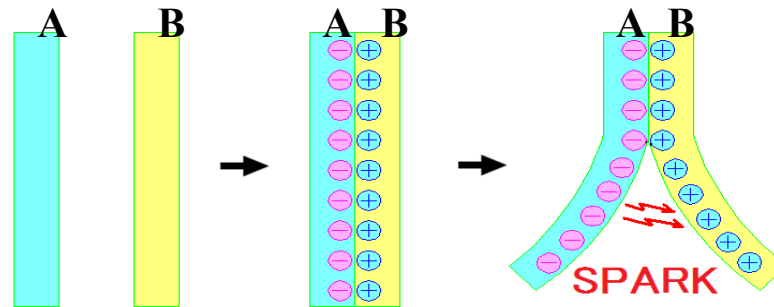


Ion négatif
(atome avec un excédent d'électrons)

Ion positif
(atome avec un déficit d'électrons)

Les conséquences de l'électricité statique : 1-Les arcs électriques

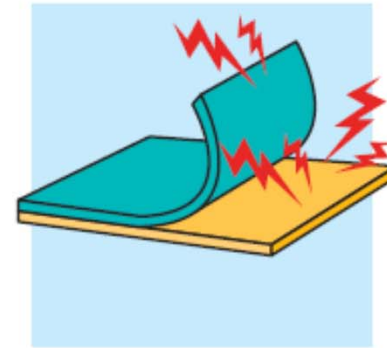
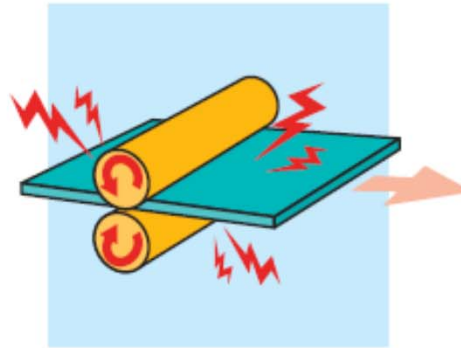
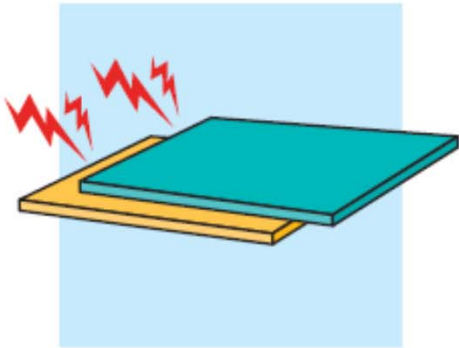
Au moins un des matériaux A et B est un isolant



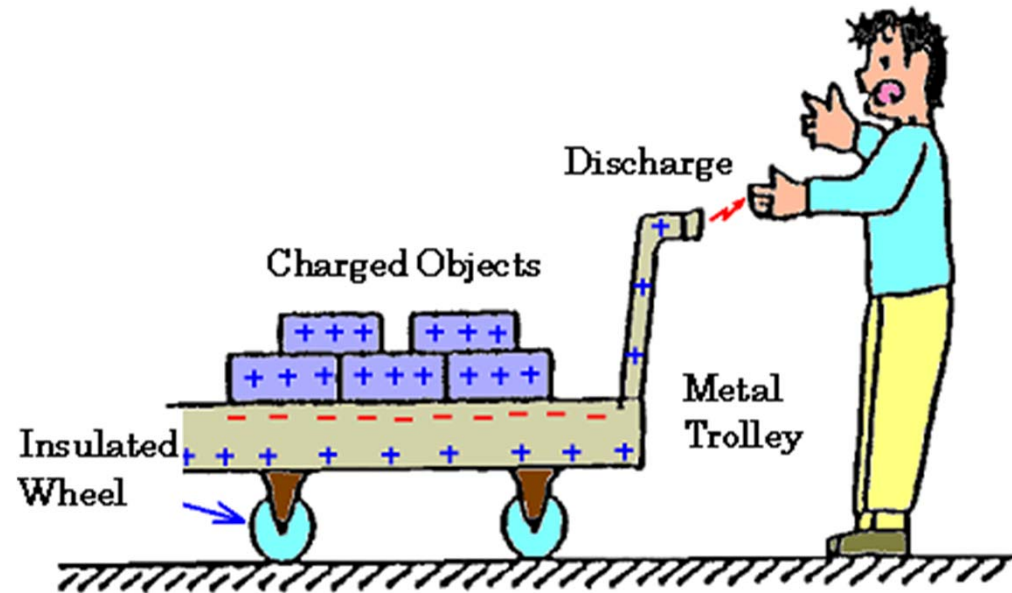
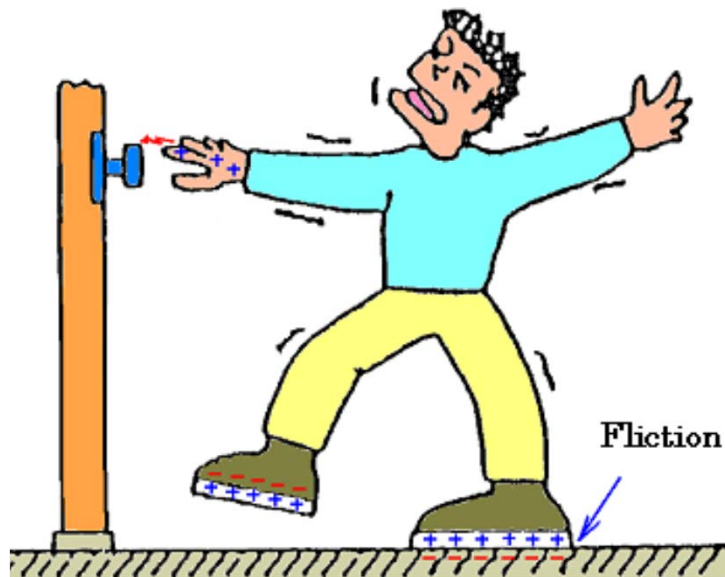
Les facteurs influent sur le niveau de l'électricité statique sont:

- Matériau
- Humidité
- La pression de contact
- La surface de contact
- La durée de contact

Exemples : Arcs électriques



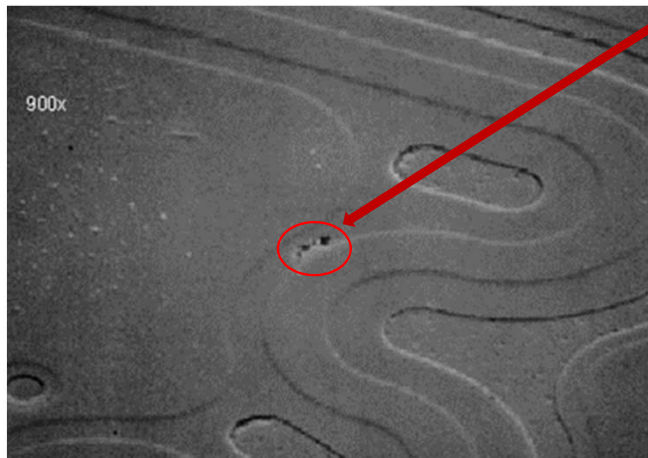
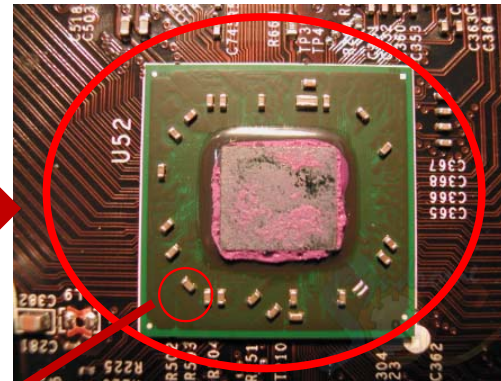
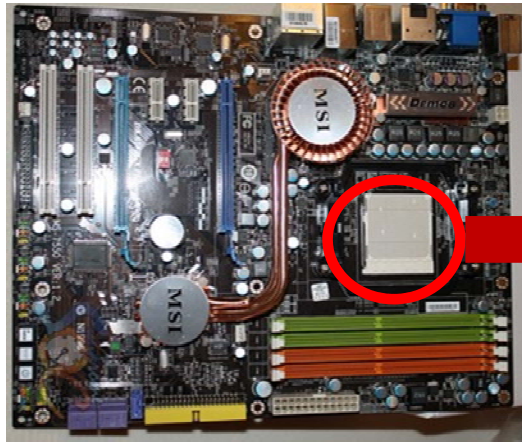
Autres exemples:



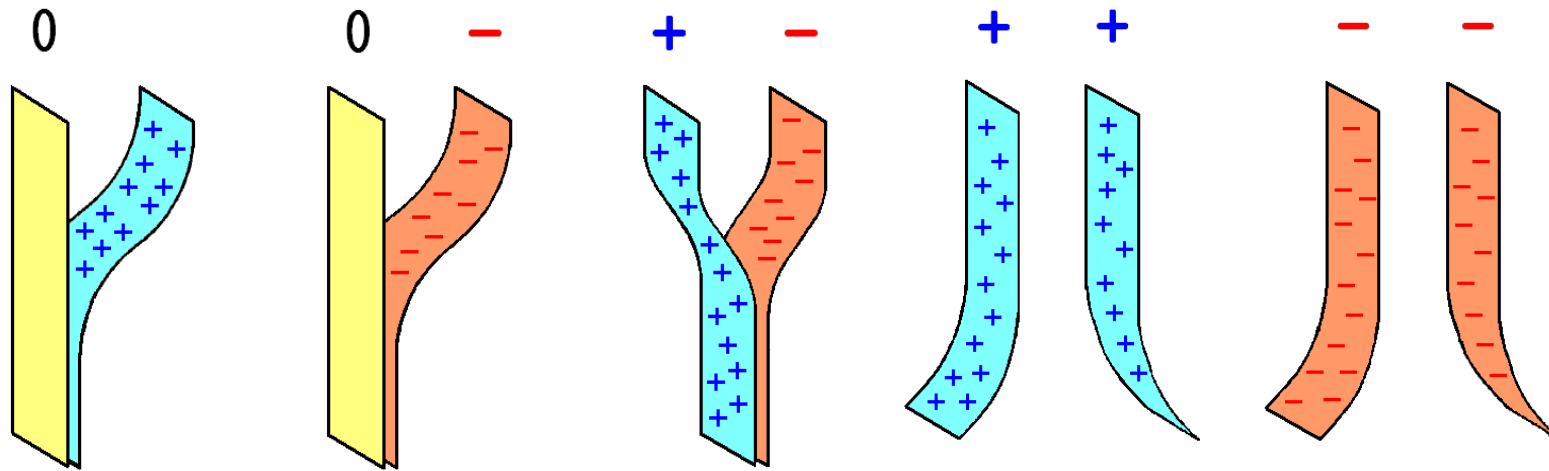
Sol	Chaussures Synthétiques	Chaussures en cuire
Acrylic	7 000V	4 000V
Nylon	9 000V	12 000V
Polypropylene	10 000V	3 000V
Wool	3 000V	12 000V

Dommages dus aux décharges électriques

PCB et composants électroniques

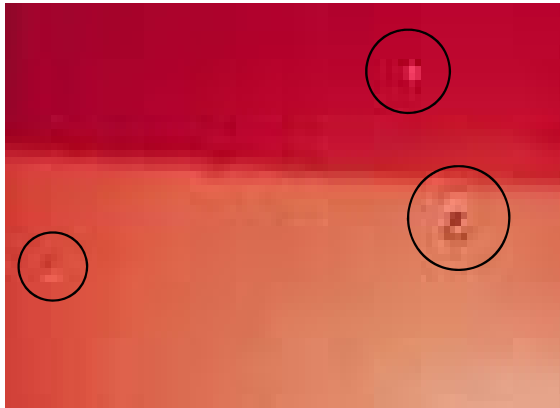


Les conséquences de l'électricité statique: 2-Répulsion et Attraction



Exemples : Poussières et autres particules

Peinture sur pièces
plastiques



Ecran de téléphone



L'électricité statique influe sur la qualité des produits.

Solutions Antistatiques

Mesure de l'électricité statique



NG
(Too Far)

+

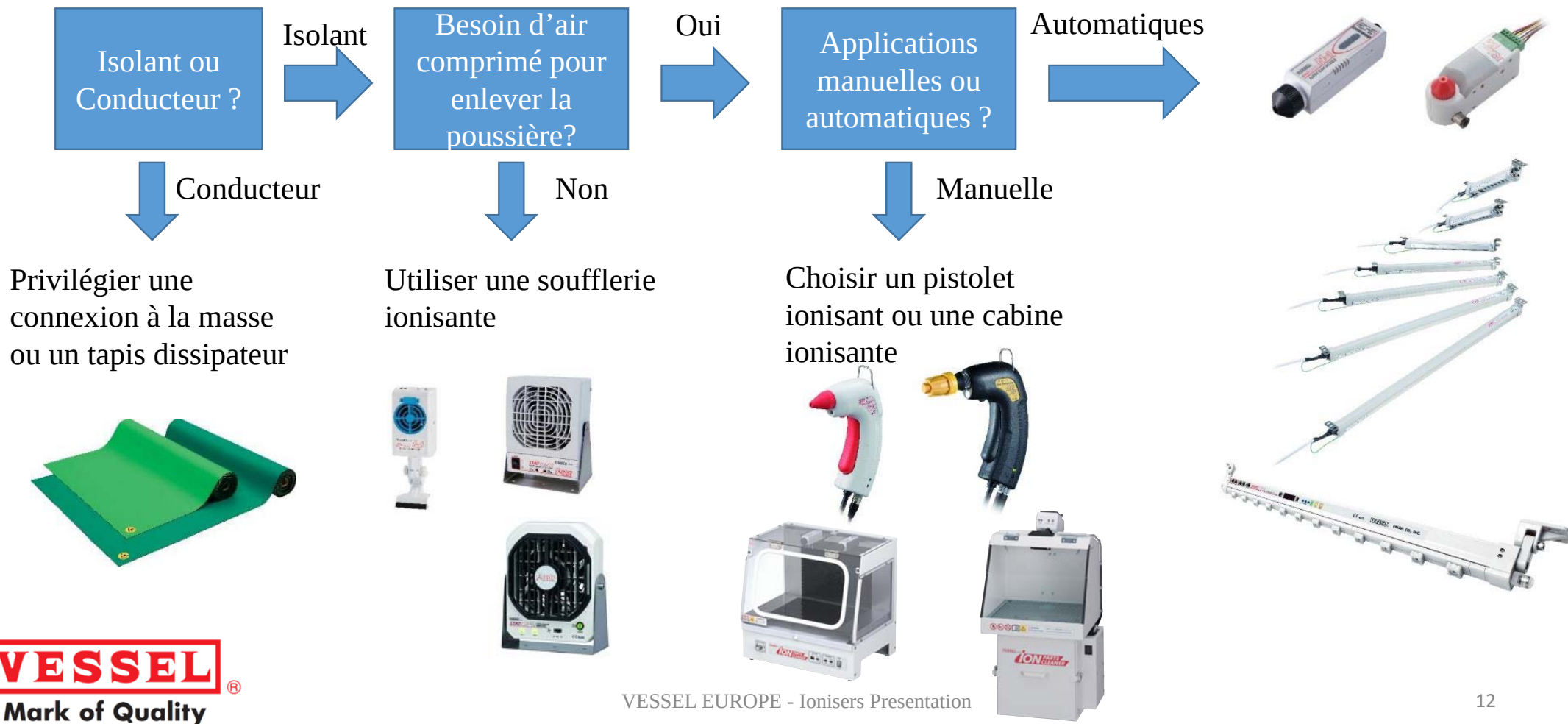
GOOD

+

NG
(Too Close)



Choix des solutions antistatiques



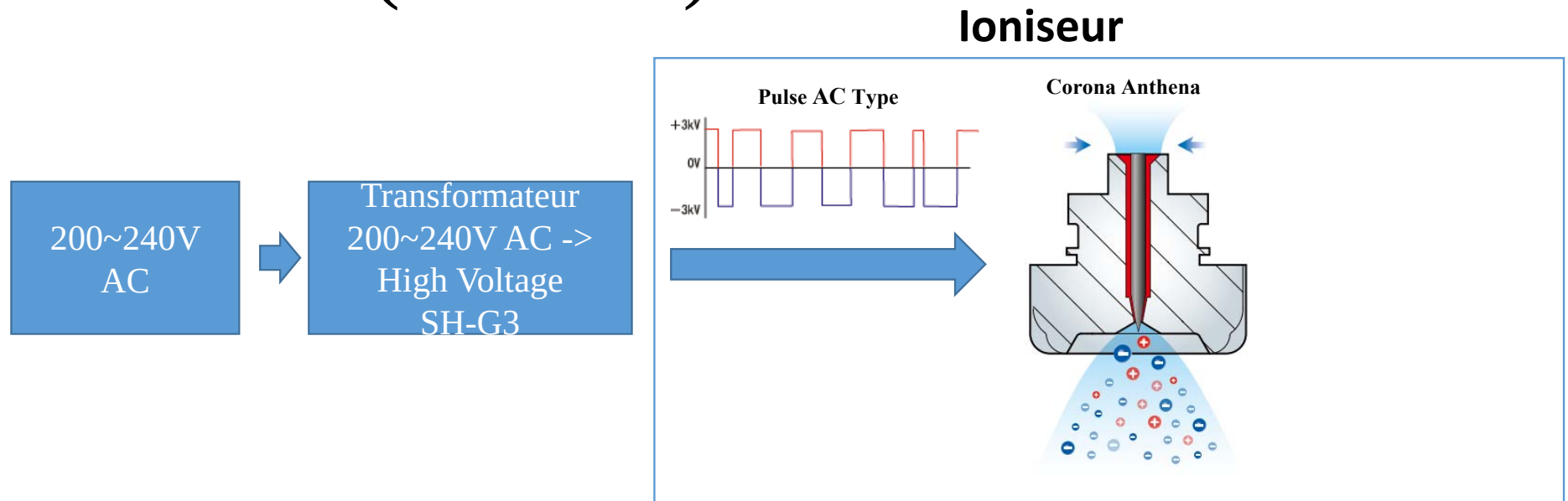
La technologie de décharge corona par pulsation AC

Ioniseur



Remarque: Très facile à intégrer dans des systèmes automatisés

Autre technologie de décharge corona par pulsation AC (SH-bars)

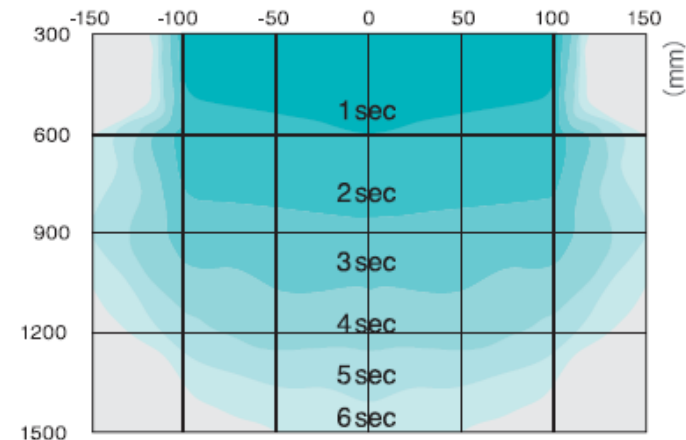
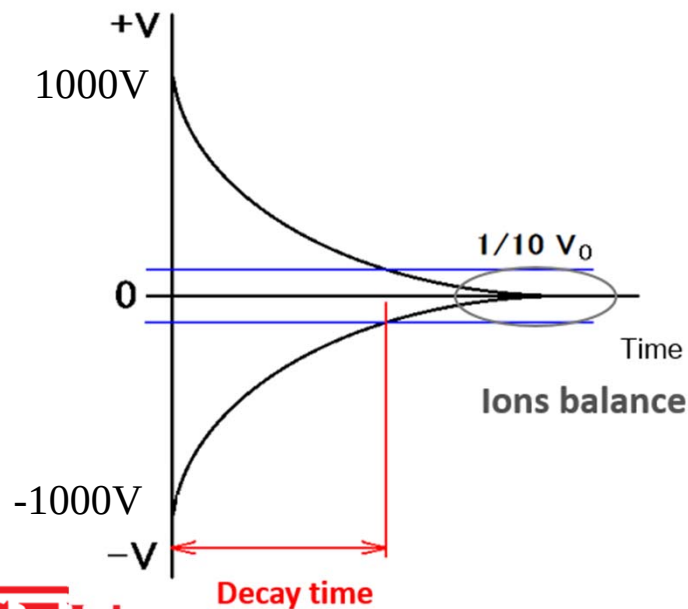


Remarques:

- Système moins complexe, mais offre moins de flexibilité.
- Plus dangereux et plus de bruit électrique car haute tension dans les câbles.

Caractéristiques des ioniseurs

- Balance ionique (Ion balance)
- Temps de décharge (Decay time)



*Mesures effectuées à 300mm du ioniseur à une pression d'air maximale

Autres fonctions

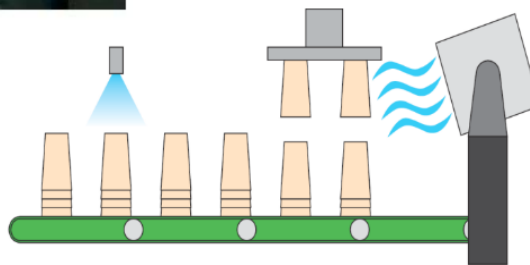
- Voyant LEDs
- Minuteur pour le nettoyage des électrodes
- Capteur
- Ion balance ajustable
- Réglage par télécommande
- Contrôle d'air (pulsé ou continu)
- Alarme externe

Applications

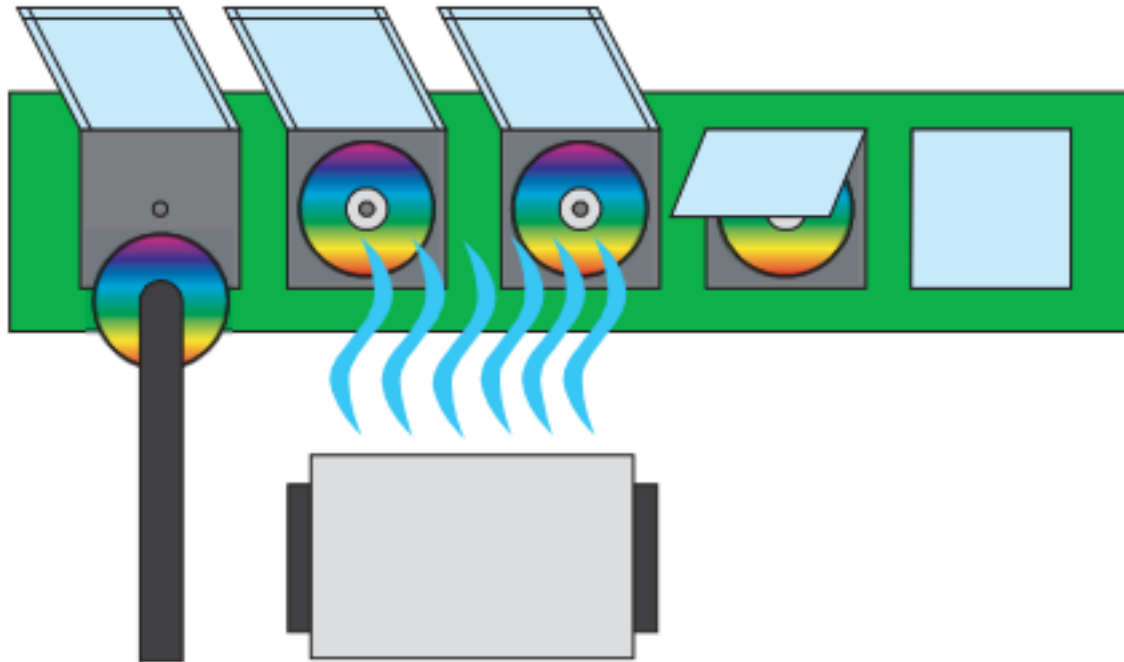
Static Control Products „Fan Type“



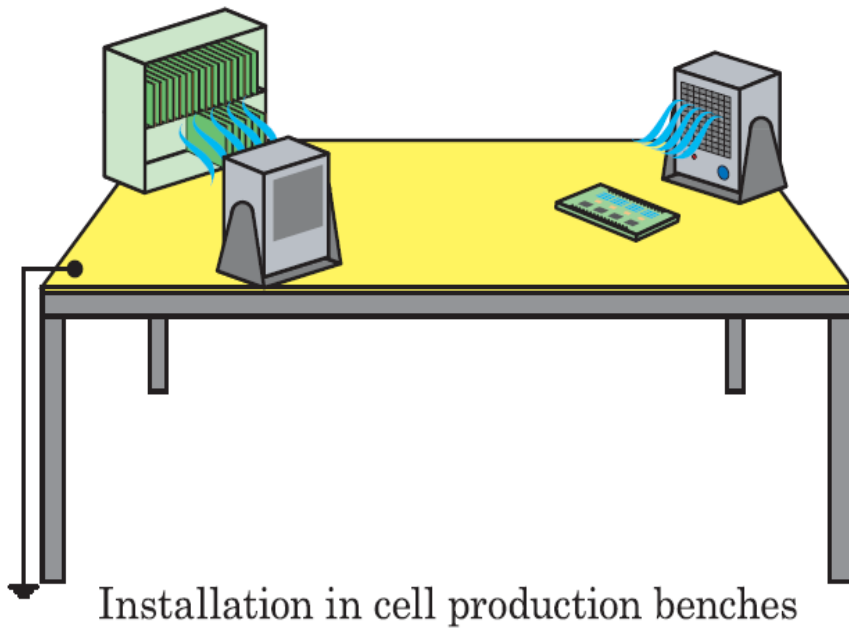
Fan type



Static Control Products „Fan Type“

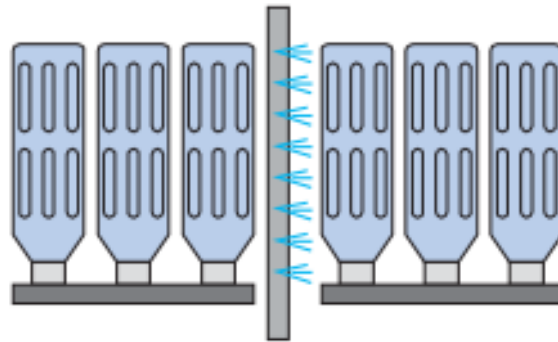


Static Control Products „Fan Type“

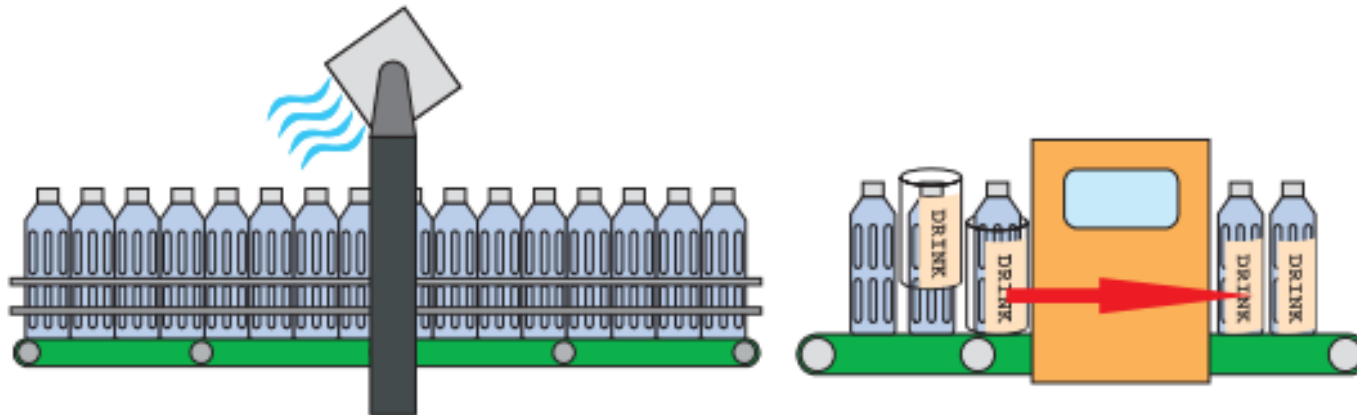


Fan type

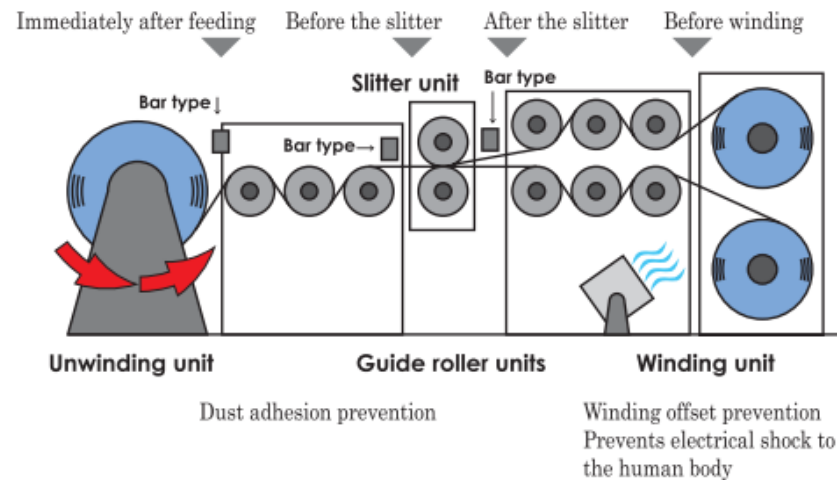
Static Control Products „Fan Type“ and „Bar Type“



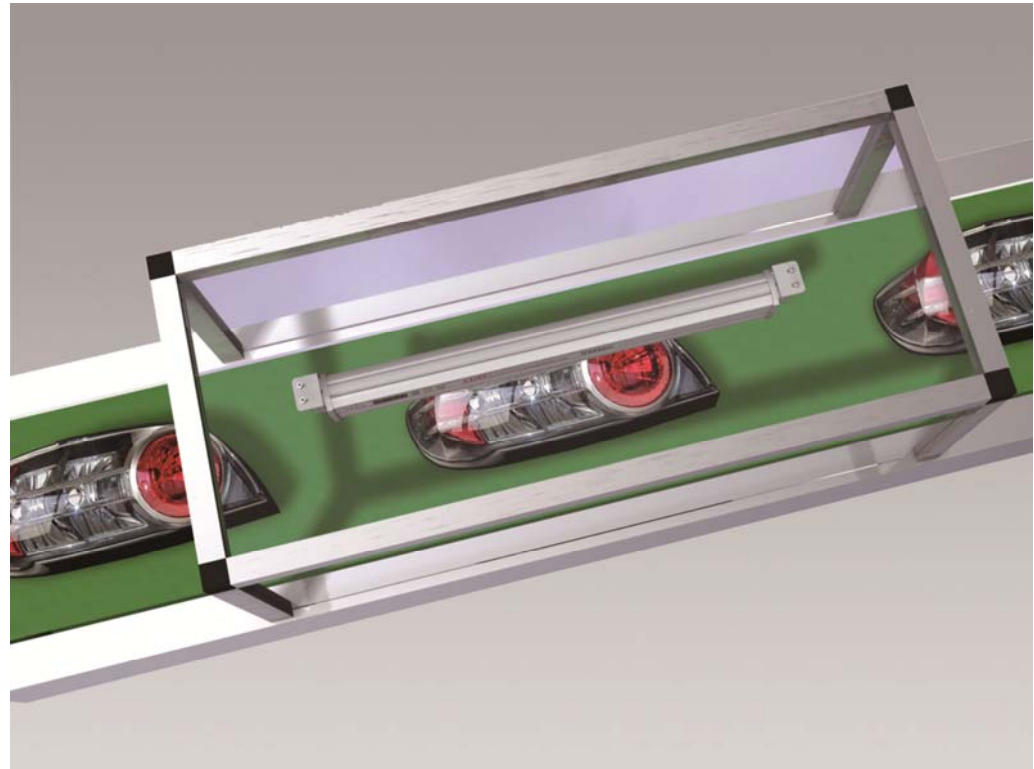
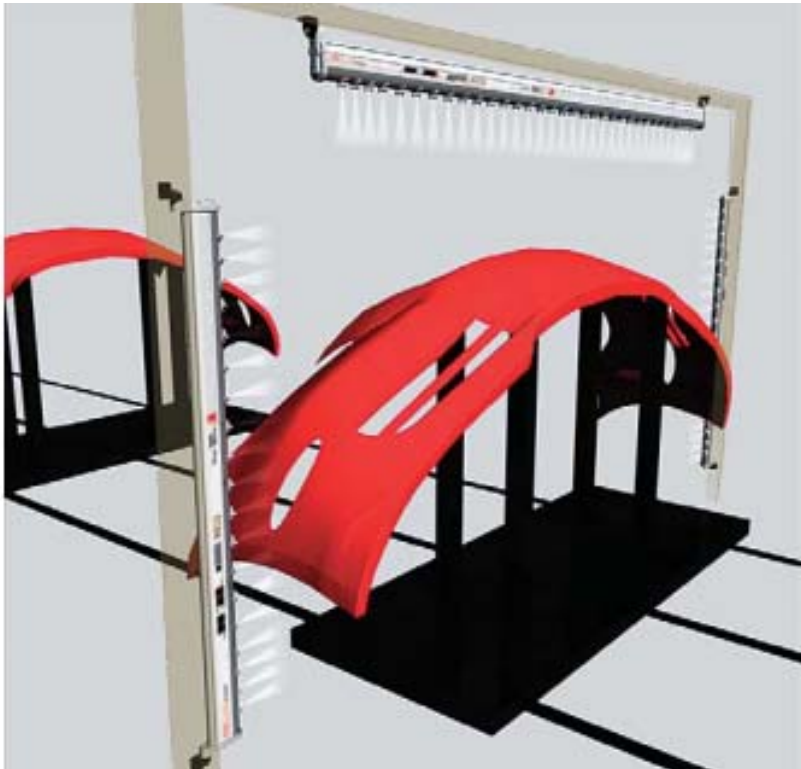
De-electrifying using a bar type static eraser after heating blow molding.



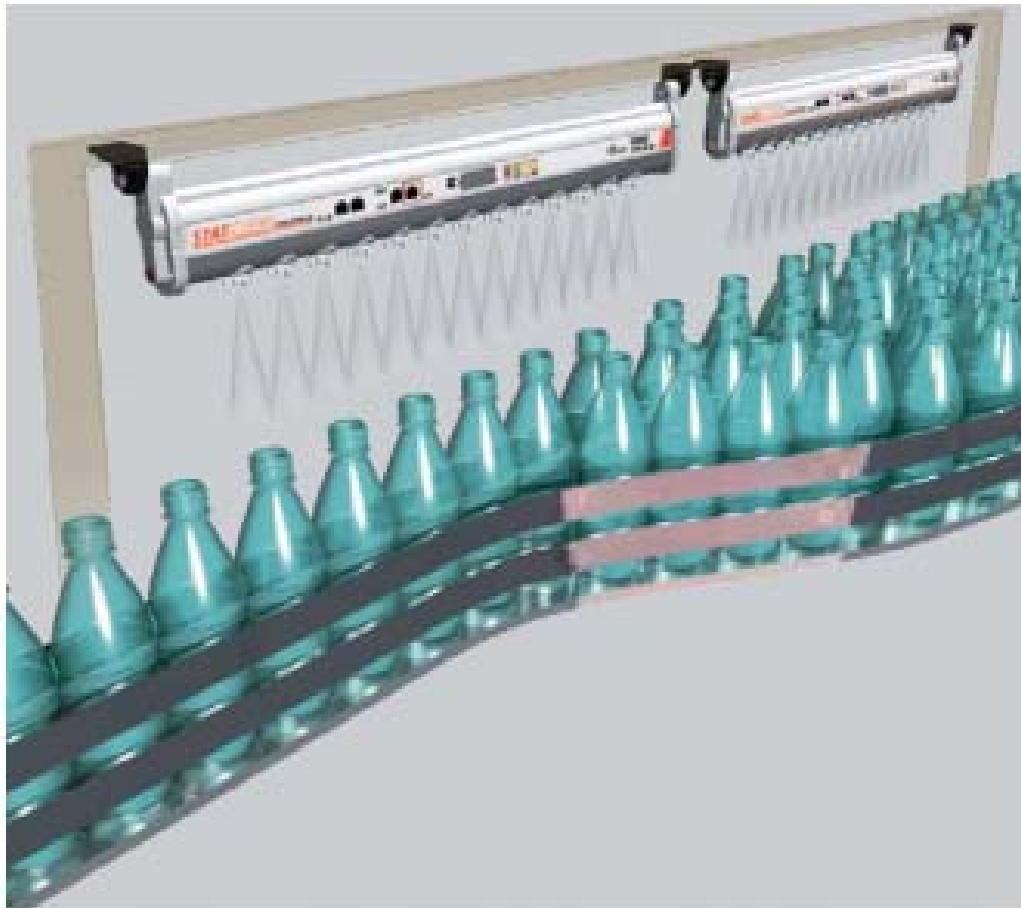
Static Control Products „Fan Type“ and „Bar Type“



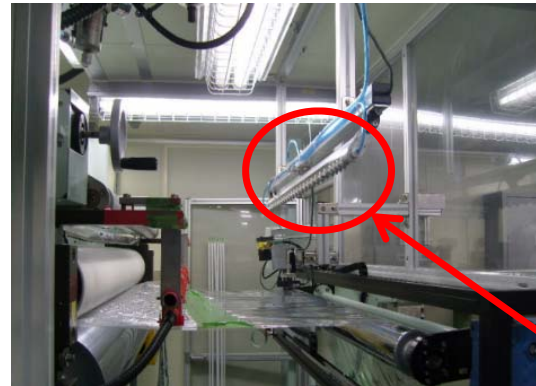
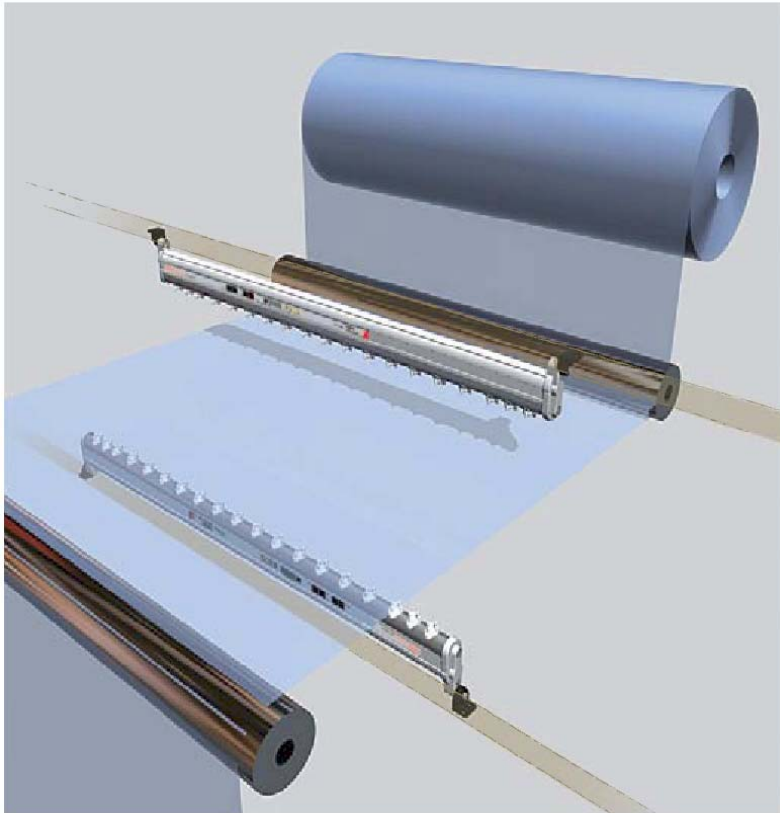
Static Control Products „Bar Type“



Static Control Products „Bar Type“

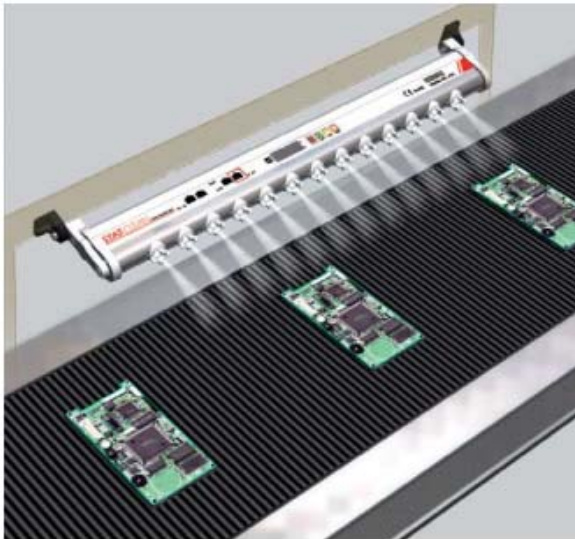


Static Control Products „Bar Type“

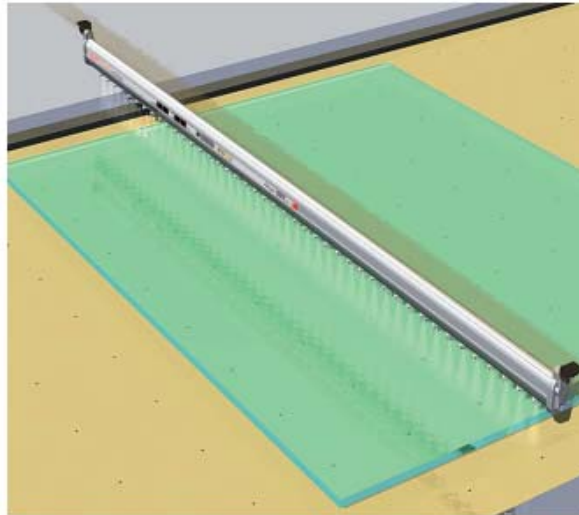


Bar type

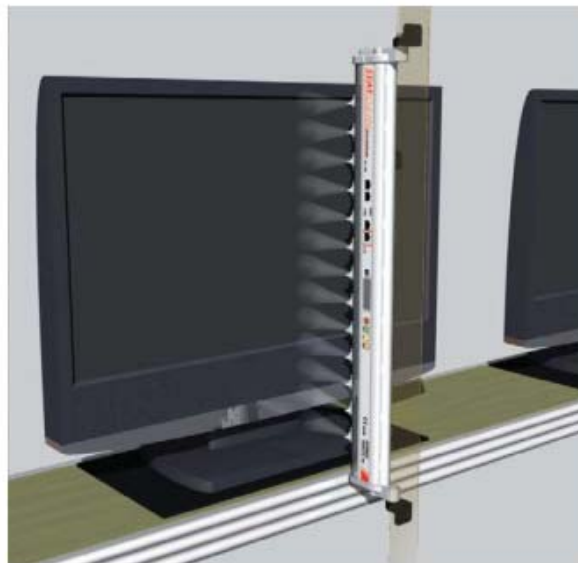
Static Control Products „Bar Type“



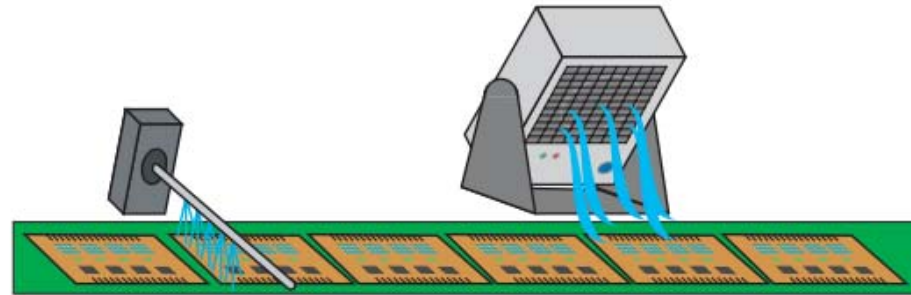
Static Control Products „Bar Type“



Static Control Products „Bar Type“

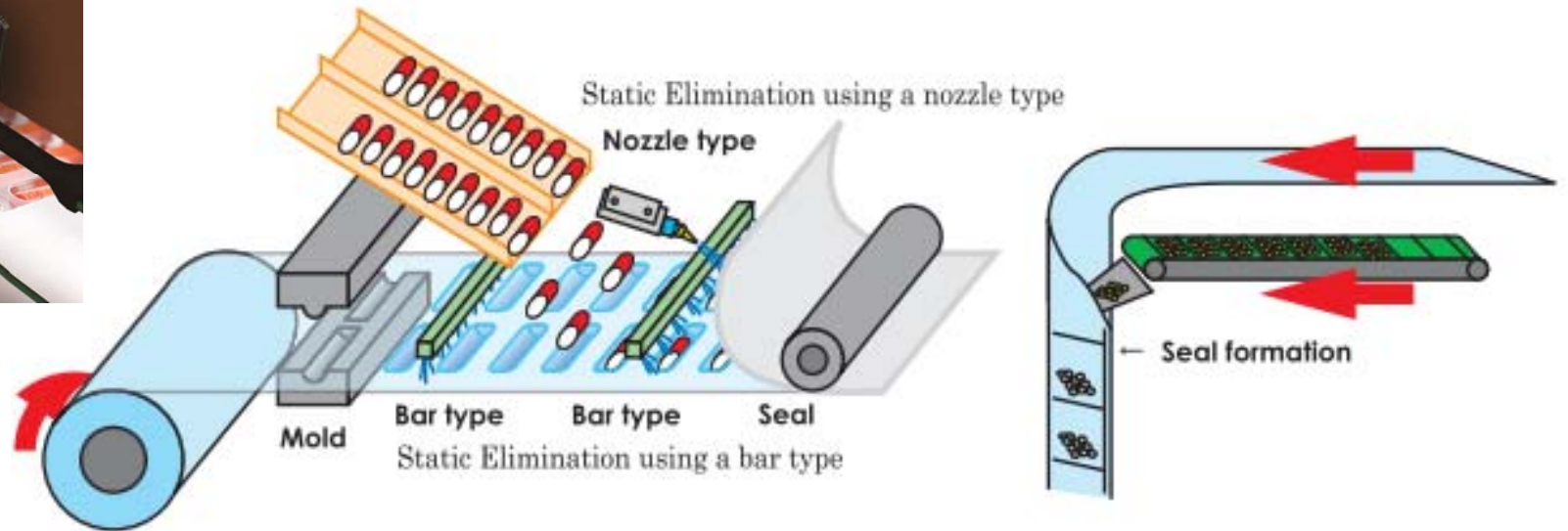


Static Control Products „Fan Type“ and „Nozzle Type“

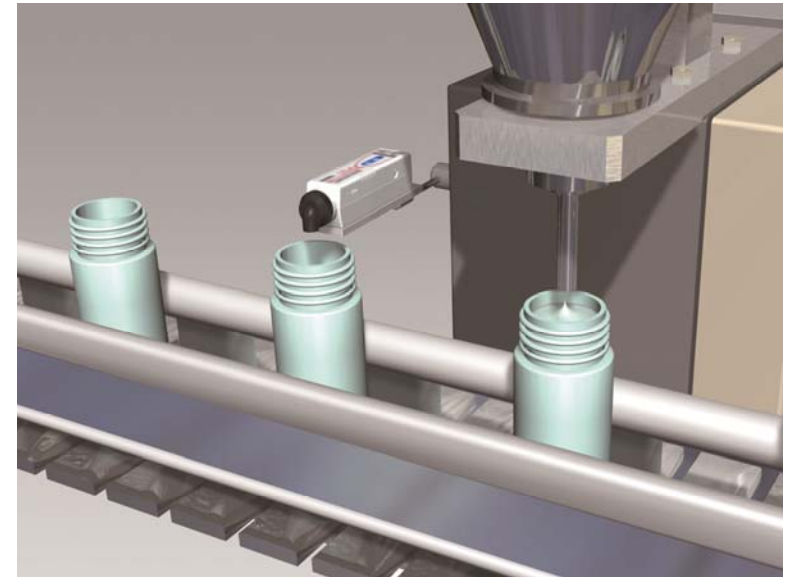
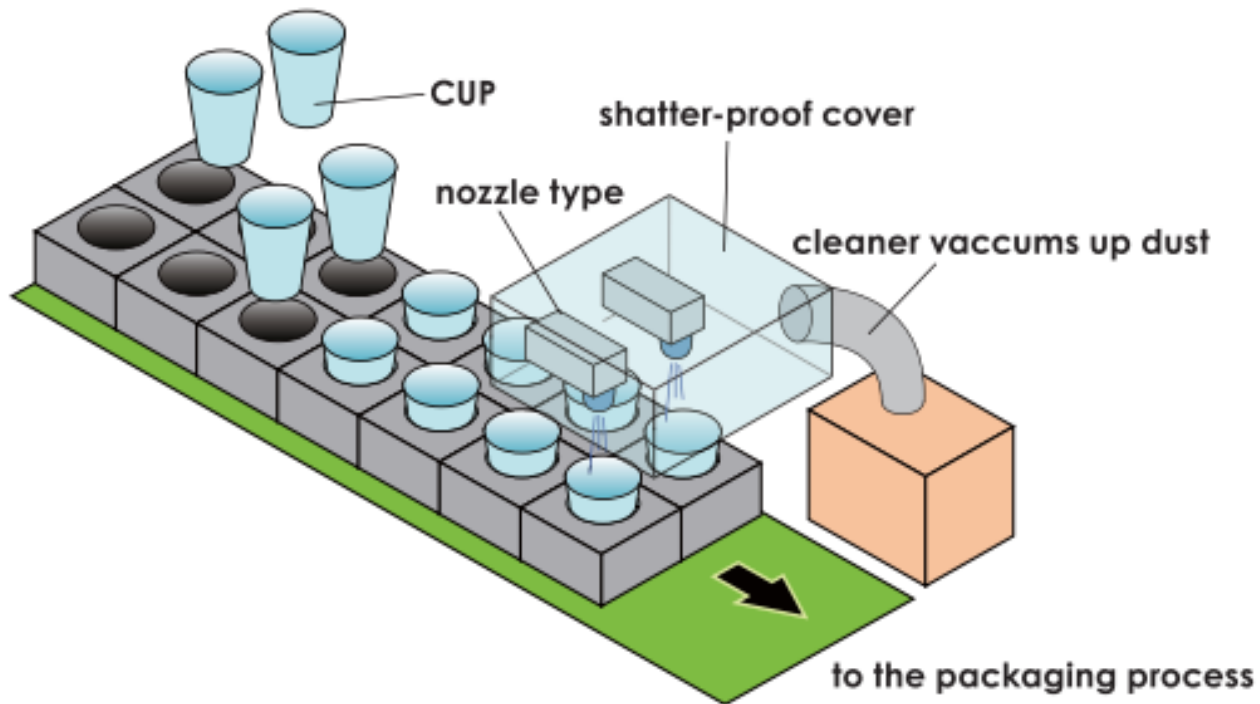


Air bar type: The supplied air is free of moisture and oil.

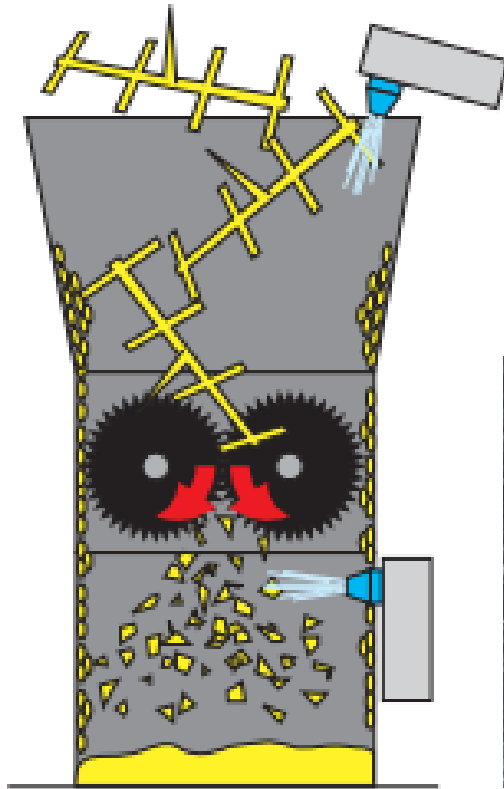
Static Control Products „Nozzle Type“



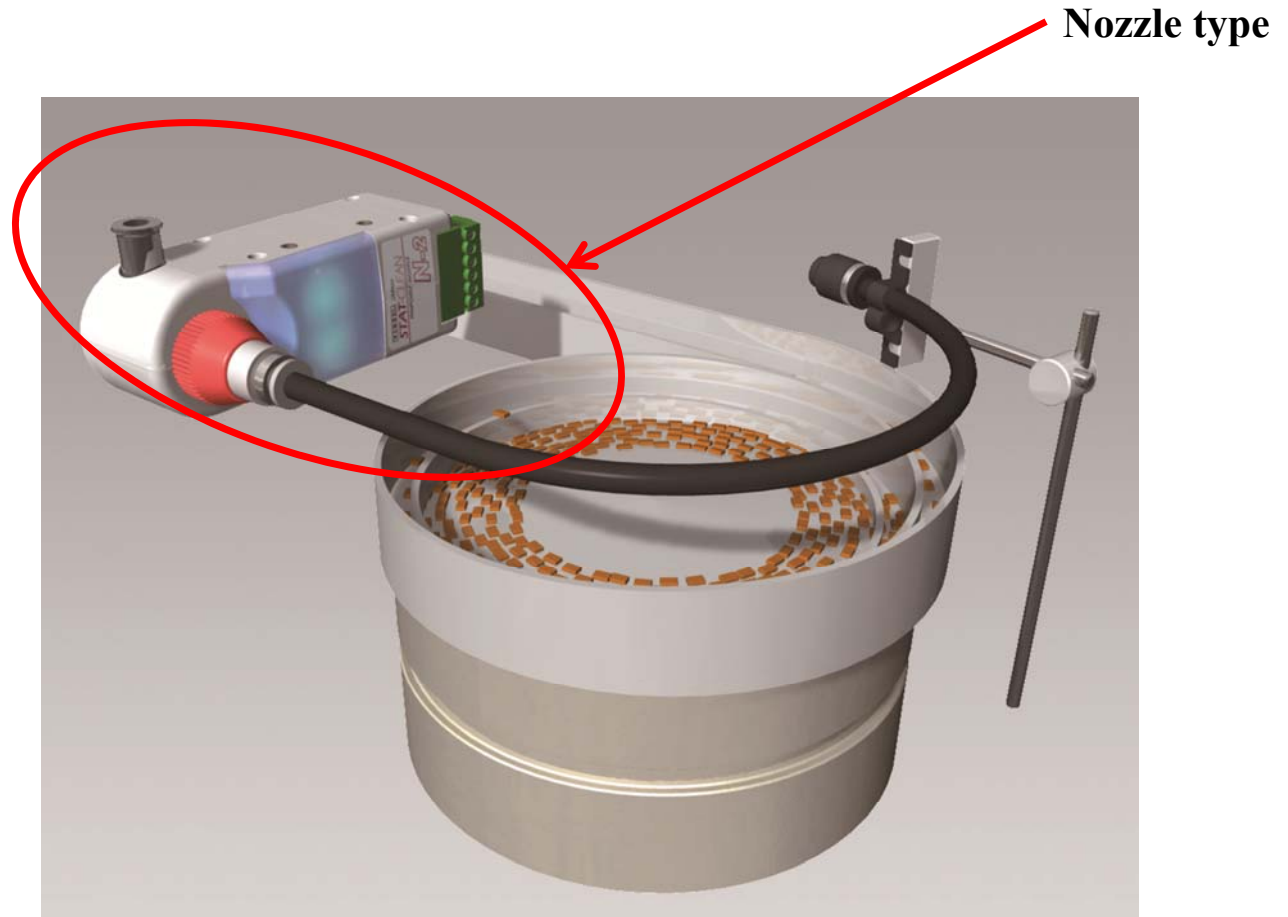
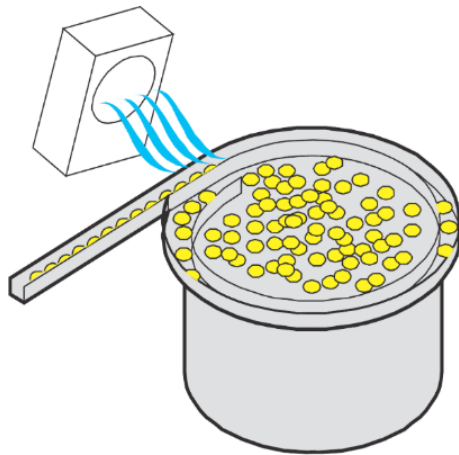
Static Control Products „Nozzle Type“



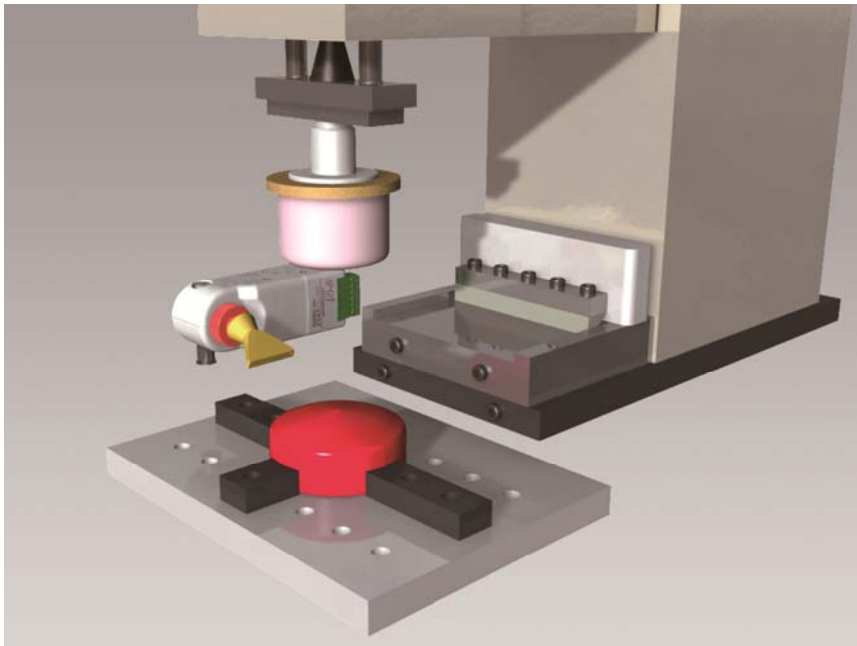
Static Control Products „Nozzle Type“



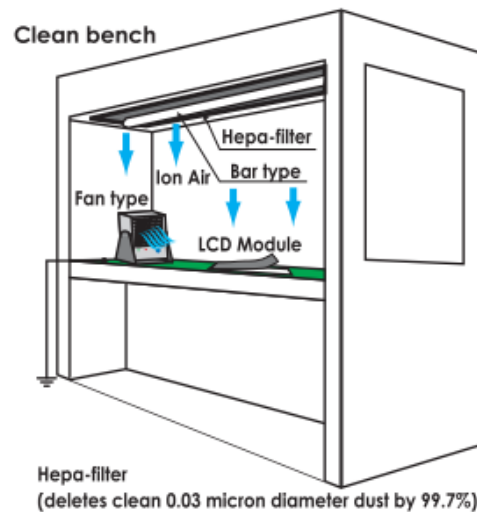
Static Control Products „Nozzle Type“



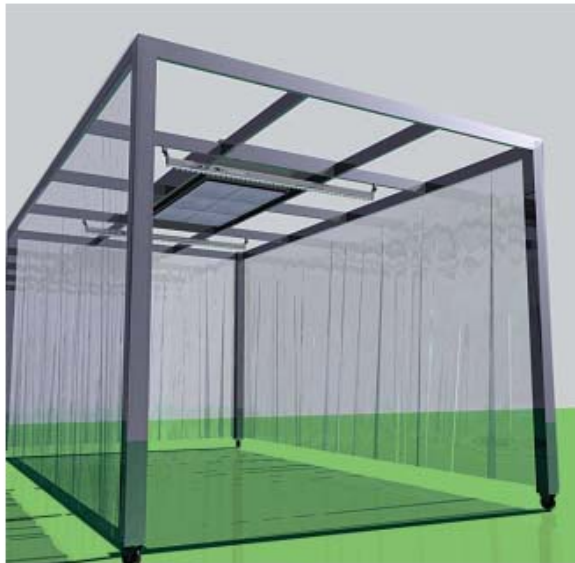
Static Control Products „Nozzle Type“



Static Control Products „Fan Type“ and „Bar Type“



Static Control Products „Bar Type“



Merci pour votre attention.

Avez-vous des questions ?