



Evolution No-smoke ATEX suction arms are designed for the suction of particles generated in the environment in potentially explosive atmospheres, where special filtration and odor absorption are required. The use of special materials to guarantee proper ground connection of electrical components makes the Evolution ATEX arm suitable for application in zone 21.1 and with dust classification.

Evolution no-smoke ATEX arms are designed in accordance with Directive 98/37/EC and ATEX Directive (94/9/EC). The classification of the arm is as above according to ATEX rules.

Optional;

For the food, pharmaceutical and chemical industries, the entire ATEX evolution arm can be produced from AISI 316 stainless steel upon request.

Antistatic flexible hose ( $R < 108 \text{ OHM}$ ,  $-20 < T < 90^\circ$ )

Copper ground wire for metal pipe parts and arm mounting foot.

## Kst Values for Some Industrial Powders

| Powders      | P max, Bar | Kst, bar.m.s-1 |
|--------------|------------|----------------|
| PVC          | 6,7-8,5    | 27-98          |
| Polyethylene | 7,4-8,8    | 54-131         |
| Lignite      | 8,1-10,0   | 93-176         |
| Cellulose    | 8,0-9,8    | 56-229         |
| Pigment      | 6,5-10,7   | 28-344         |
| Aluminum     | 5,4-12,9   | 16-750         |

## The Relationship Between Kst Values and Explosive Dust Classes

| Explosion Class | Kst, bar.m.s-1   | Explosion Type |
|-----------------|------------------|----------------|
|                 | Explosive, 10 KJ |                |
| St0             | he               | No             |
| St1             | 200<             | Slim           |
| St2             | >200-300         | Strong         |
| St3             | 300>             | Very Strong    |

| Code              | 50301021 | 50301022 | 50301230 | 50301530 | 50301540 | 50301830 | 50301840 | 50302030 | 50302040 | 50302530 | 50302540 |
|-------------------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|
| Arm Diameter (mm) | Ø 100    | Ø 100    | Ø 125    | Ø 150    | Ø 150    | Ø 180    | Ø 180    | Ø 200    | Ø 200    | Ø 250    | Ø 250    |
| Arm Length (m)    | 2,1      | 2,7      | 3,0      | 3,0      | 4,0      | 3,0      | 4,0      | 3,0      | 4,0      | 3,0      | 4,0      |