

## Ecological electrical contact from Ag-ZnO AND Ag-SnO<sub>2</sub>

### DESCRIPTION:

Electrical contacts is obtained by techniques of powders metallurgy



Fixed electrical contacts



Moving electrical contacts

### TECHNICAL CHARACTERISTICS:

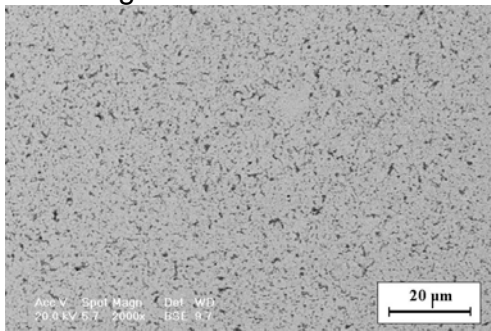
#### 1.1. Physical-mechanical characteristics:

- compacting level: min. 96 %;
- hardness in soft state: min. 85 HV;
- resistivity: max. 2,4 Wm.cm;
- microstructure: matrix of Ag with very fine and uniform dispersed oxide particles.

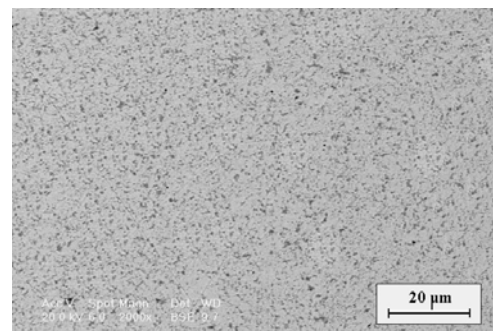
#### 1.2. Functional characteristics:

- high welding capacity in electrical arc;
- high electrical wear resistance;
- high quenching arc ability;
- normal heating.

(testing according to IEC 947-4-1:1992 norm)



a)



b)

SEM microstructures of electrical contacts from powder composites: a) Ag-ZnO, b) Ag-SnO<sub>2</sub>.

### ADVANTAGES:

- new electrical contact materials with high performance in exploitation;
- new ecological products without Cd;
- replacement of Ag-CdO electrical contacts from air low voltage switching devices.

**USERS:** Companies manufacturing of electrical contacts.