

**Association for the Control  
of Emissions in Products  
for Flooring Installation,  
Adhesives and Building Materials**



**Awarding of licence for the use of EMICODE**

Licence Number: 2191/24.02.97

For the product ARDEX X 77 S

Of company Ardex GmbH

Due to application dated 05.08.2009

With reference to the classification in accordance with the directives as stipulated in § 10 of the GEV trademark constitution on behalf of the GEV for the above mentioned product as per § 5, section 4 of the GEV trademark constitution is awarded the licence for the use of the GEV trademark



This product meets with the guidelines for the criteria of use listed reverse.  
The company is ordinary member of the GEV.  
GEV membership number OM 001

A handwritten signature in blue ink, appearing to read "J. Müller".

**The Secretary General**

Association for the Control of Emissions in Products  
for Flooring Installation, Adhesives and Building Materials (GEV)  
Völklinger Straße 4 · D-40219 Düsseldorf

**06.08.2009**

# Requirement guidelines for the awarding of the EMICODE licence

The flooring installation material mentioned in the front side licence has to meet with the following criteria in accordance with the constitution and guidelines of the Technical Advisory Board of the GEV and others:

- The flooring installation product meets all the legal requirements, especially the chemical law and its specifications.
- The flooring installation product is solvent free due to occupational health.
- A safety data sheet (MSDS) as per Regulation No.1907/2006 in its respectively valid version is to be established for the flooring installation product.
- Carcinogenic, mutagenic, reprotoxic substances as well as those substances under suspicion to cause such defects are not permitted to be used in the manufacturing of this flooring installation product.
- The testing of the flooring installation product is in accordance with the defined GEV test methods. Afterwards the definition of VOC's is conducted in a test chamber according to the VOC regulations tests using the Tenax thermodesorption procedures with GC/MS analysis.
- The classification into the EMICODE classes is performed according to the following listed and described criteria and TVOC concentration groups. For product labelling the matching EMICODE class is to be used.

| GEV Product Groups  | EMICODE emission class   |                                |                          |
|---|--------------------------|--------------------------------|--------------------------|
|   | EC 1<br>TVOC<br>in µg/m³ | EC 2<br>TVOC<br>in µg/m³       | EC 3<br>TVOC<br>in µg/m³ |
| <b>1. Liquid Products</b>   | ≤ 100                    | > 100 ≤ 300                    | > 300                    |
| 1.1 Primers   |                          |                                |                          |
| 1.2 Anti-slip coatings for self laying floor coverings                                  |                          |                                |                          |
| 1.3 Damp proof membranes (coatings and primers)   |                          |                                |                          |
| <b>2. Powder based products with mainly inorganic binder</b>                            | ≤ 200                    | > 200 ≤ 600                    | > 600                    |
| 2.1 Levelling compound based on cement or plaster                                       |                          |                                |                          |
| 2.2 Tile mortars and joint fillers  |                          |                                |                          |
| 2.3 Waterproofing slurries  |                          |                                |                          |
| <b>3. Pasty products with high content of organic binder</b>                            | ≤ 500                    | > 500 ≤ 1500                   | > 1500                   |
| 3.1 Adhesives for floor coverings, parquet and ceramic tiles                            |                          |                                |                          |
| 3.2 Fixations for floor coverings   |                          |                                |                          |
| 3.3 Waterproofing coatings / sealants   |                          |                                |                          |
| 3.4 Levelling compounds (water based or reactive)                                       |                          |                                |                          |
| 3.5 Powder based products with high content of organic binder                           |                          |                                |                          |
| <b>4. Ready-to-use products which do not require chemical curing or physical drying</b> | ≤ 500<br>after 1 day     | > 500<br>≤ 1500<br>after 1 day | > 1500<br>after 1 day    |
| 4.1 Underlays for flooring installation   |                          |                                |                          |
| 4.2 Sound absorbing underlays   |                          |                                |                          |
| 4.3 Self adhesive tapes and membranes   |                          |                                |                          |
| 4.4 Installation boards   |                          |                                |                          |
| <b>5. Joint sealants (water based or reactive)</b>                                      | ≤ 300                    | 300 ≤ 600                      | > 600                    |
| <b>6. Surface coatings for wood floorings</b>   | < 150                    | 150 ≤ 450                      | > 450                    |
| 6.1 Waterborne wood floor coating   |                          |                                |                          |

\* TVOC = Total Volatile Organic Compounds