



021



9001:2009



## SPE «IMVO»

One profile movement joints for bridge construction



021



9001:2009



SPE “IMVO” implements  
**one profile movement joints WSF80, WSF100**  
own production

## Appointment of movement joints

Movement joints are used for the perception of the maximum displacement of 80 mm and 100 mm. They provide a smooth passage of vehicles. They also protect the bridge structure from premature destruction.

## Manufacture and supply of products

Movement joints are supplied in full operational availability. They are convenient for installation and can be replaced or repaired after the useful life.

The product is manufactured under license and in accordance with the technology of the Austrian company REISNER & WOLF Engineering Ges.mbH "(Wales, Austria).



021



9001:2009



## Scope:

Expansion joints are used in construction, repairing, reconstruction of bridges, roads and other constructions of different destinations. They meet the requirements of water resistance, strength and durability. Also they are recommended for widespread usage in all transport facilities.

### **Geological and geophysical conditions:**

- usual conditions;
- building in seismic regions with participation of research organization, which specialises in earthquake engineering.
- with the in the design of specialized in earthquake-resistant construction;
- construction on subsiding soils under the condition of the same values of vertical and horizontal displacements of connected particles.

### **Natural and climatic conditions:**

- The degree of aggressiveness of the environment: not aggressive, slightly aggressive, middle aggressive, highly aggressive;
- Humid areas: dry, normal, wet.



021



9001:2009



## Construction features

The edges of movement joint are formed by the extreme bearing beams that provide a secure connection (anchoring) with purlin construction or bridge support. Connection is available to the reinforced concrete and steel constructions. The distance between the outer beams varies depending on the longitudinal displacements.

Elastic compensator (EPDM material) has tensile strength 11 MPa and is situated 30 mm below the road surface. It is protected from the impact of wheels, snow plow attached implements and other equipment.

Clamping connection of the joint edges and elastic compensator are hermetic and don't hinder the movement of purlin constructions with its own deformations. It is resistant to the dynamic loads and doesn't require service throughout the warranty period. When solid objects up to 30 mm get stuck in an elastic compensator, it will not be damaged. When the temperature changes objects are pushed out.





021



9001:2009



## Specifications Package

Tab. 1 Physical and mechanical properties of materials and components used for the production of movement joints

№	Item name	Material	Normative document
1	Extreme load beam	steel S235JRG2	DIN EN 10058
2	Elastic compensator	Elastomer (SF), ethylene propylene rubber (EPDM)	DIN ISO 1629
3	Anchor plates and hinges	S355J2G2	DIN EN 10058/ DIN EN 10060



## ANTICORROSIVE PROTECTION SYSTEM

Surface preparation	Blast cleaning Sa 2,5
Primer coating	Two-component epoxy, pigment (zinc powder)
First intermediate layer	Two-component epoxy, pigment (iron mica)
Second intermediate layer	Two-component epoxy, pigment (iron mica)
The third intermediate layer	Two-component epoxy, pigment (iron mica)
The outer layer	Two-component epoxy, pigment (iron mica)



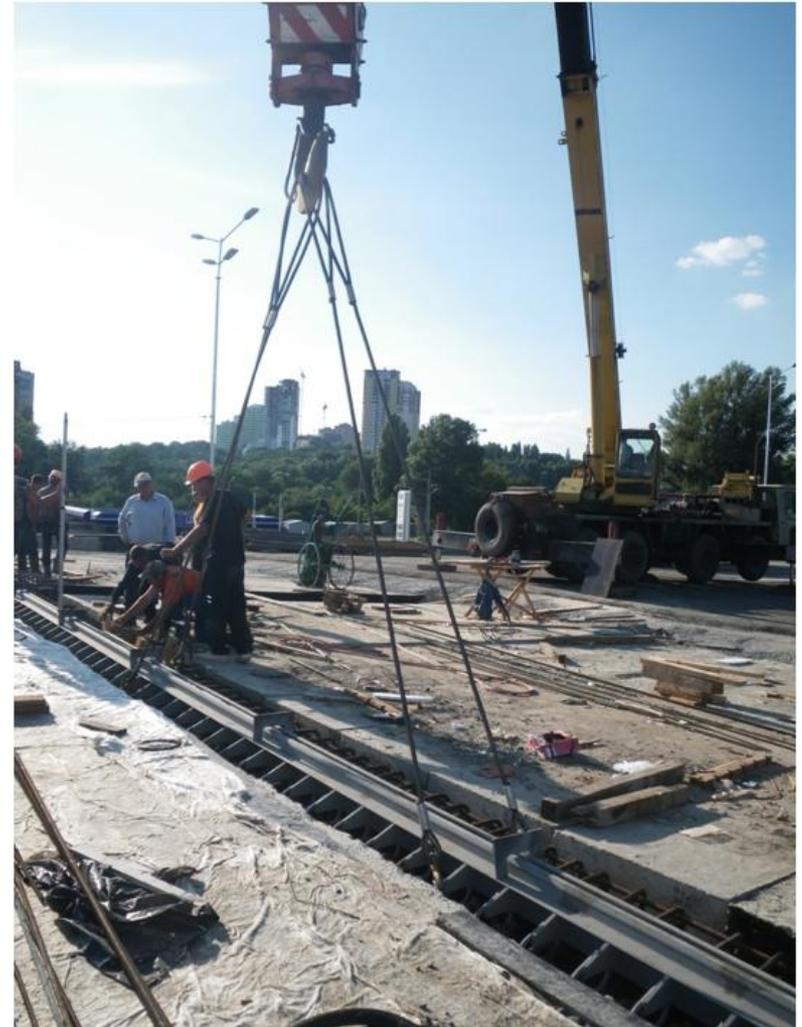
021



9001:2009



## Installation of movement joints





021



9001:2009



## Installation of movement joints





021



## Contact us right now



### **SPE “IMVO” main office**

79069, Ukraine, Lviv, Shevchenka str., 313

<http://www.imvoracking.com/>

#### **Secretary :**

Tel/Fax: +38 032 297-14-44

E-mail: [pryjm@imvo.lviv.ua](mailto:pryjm@imvo.lviv.ua)

#### **Department of Construction and Design:**

Phone/fax: +38 032 297-14-44

E-mail: [budiv@imvo.lviv.ua](mailto:budiv@imvo.lviv.ua)