



### Introduction

# Market Leaders In Expansion Joint Technology.

We are a world class, multi-disciplined engineering solution provider, with core competencies in structural protection and movement control.

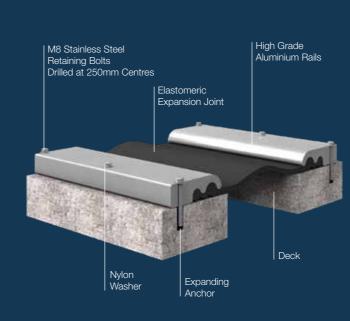
We offer an unrivalled range of specialist services including spray applied bridge deck membranes, bridge deck expansion joints, structural bearings, bridge deck drainage as well as bespoke structural fabrications.

Through early project engagement with stakeholders, we are able to provide high quality engineering solutions by way of consultancy support or the delivery of a complete project management service.

From design, manufacture and installation, to inspection, site maintenance and replacement work, our single point of responsibility offering, leaves USL Ekspan uniquely placed t solve complex challenges on a truly global scale.









### PRODUCT IN BRIEF

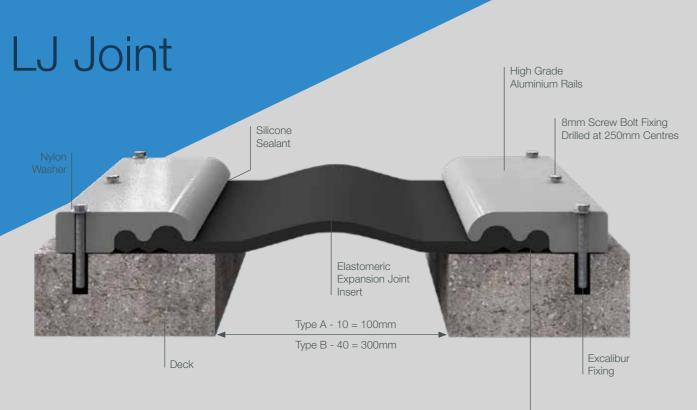
The LJ Expansion Joint system has been specifically developed to provide an effective method of sealing soffit and longitudinal expansion gaps.

Designed to accommodate both longitudinal and vertical movement the LJ Joint provides a continuous watertight seal to non-trafficked areas between structures and is available in a range of sizes to suit individual requirements.

The LJ Expansion Joint system has the flexibility to be used as a waterproof cover joint or as a waterproof drainage under joint with the facility to install drainage outlets into the system when required.

### ADVANTAGES

- Rapid installation
- Watertight seal
- Cost effective
- Low maintenance
- Long term solution
- Can be applied to concrete,
  block, brick and stone substrates



### **MOVEMENT CAPACITY**

	LJ	Horizontal	Vertical
	А	<u>+</u> 50	<u>+</u> 40
	В	<u>+</u> 100	<u>+</u> 75
(All dimensions in mm)			

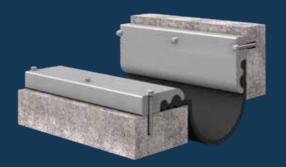
Uniseal 120 One Part Poly sulphide Sealant

(USL)

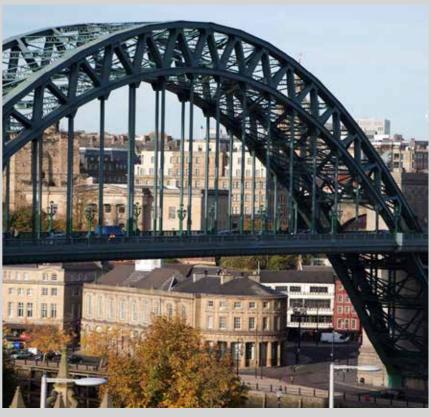
### THE PRODUCT IN BRIEF

The applications for the LJ joint are widespread and include longitudinal joints between parallel structures, as a secondary joint system fixed to the soffit of structures where problems are usually experienced, or anticipated with ineffective mechanical expansion joints.









### **INSTALLATION**

The LJ system is quick and easy to install consisting of a specially designed i. Carrier Rails flexible elastomeric insert.

The system is housed between high grade aluminum mounting rails which are anchored to the structures with M8 stainless steel retaining bolts drilled at 250mm centres, providing a safe, efficient and economical method of sealing expansion gaps.

### **SPECIFICATION**

### **Materials**

The extruded high grade aluminum rails are supplied in 4 metre lengths and are pre-drilled in our Washington factory prior to delivery to site.

#### ii. Elastomeric Insert

The extruded EPDM insert is available in two sizes, each capable of accommodating a different range of movement. The inserts are supplied in manageable coils of 18 metres in length and jointed on site.

### iii. Drainage Outlets

When the LJ Joint is used as a secondary joint system fixed to the deck soffit, flexible 20mm diameter outlet tubes can be provided to drain the EPDM insert; these can be directed to discharge into the structural drainage system.

### **ADDITIONAL INFORMATION**

### Notes

The colours used in the illustrations may not be indicative of the finished product.

USL Ekspan reserve the right to update and improve the LJ Expansion Joint and its specification without notice and Engineers and Contractors should satisfy themselves that they have full and up to date information. Britflex is a registered trade mark of USL Ekspan.

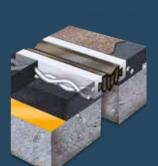
### **Technical & Advisory Service**

Further technical information may be obtained on request and consultation is encouraged to ensure choice of materials selected and detailing are optimised to suit in-service performance requirements and give economic solutions.

### **Health & Safety**

USL Ekspan operate a strict policy on health and safety and details are available on request.

## USL EKSPAN **PRODUCT RANGE**



### **EXPANSION JOINTS - CD 357**

**Uniflex -** Buried

**BP1** - Buried

FEBA - Flexible Plug

Britflex NJ - Nosing

EC & EW - Joint Seal

Transflex & Transflex HM - Mat

T-MAT - Mat

Britflex BEJ - Modular

Britflex MEJS - Modular

LJ - Longitudinal Joint

ES - Joint Seal

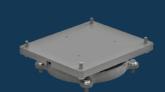
Aqueduct/Immersed Joint

Open Type Joint - Rail Joint

Britflex UCP - Footbridge Joint

Finger Joint

**Roller Shutter Joint** 



### STRUCTURAL BEARINGS

**EKE** - Elastomeric (EN1337-3)

**KE** - Pot (EN1337-5)

**DE** - Line Rocker (EN1337-6)

GE - Spherical (EN1337-7)

**FE** - Restraint & Guide (EN1337-8) **K** - Pot (BS5400-9)

D - Line Rocker (BS5400-9)

**F** - Restraint & Guide (BS5400-9) **EA** - Sliding Bearing

**G** - Spherical (BS5400-9)

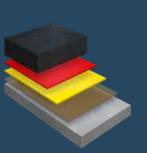
**J** - Roller (BS5400-9)

EKR - Rubber Pad & Strip

EQF - Sliding Bearing

Link Bearing (BS5400-9)

Bespoke Bearings



### **STRUCTURAL WATERPROOFING - CD 358**

### Pitchmastic PmB

Polyurethane (Pu) Waterproofing

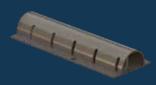
Methyl Methacrylate (MMA) Waterproofing System

### **Britdex CPM Tredseal**

Combined Waterproofing and Anti Skid Surfacing (MMA)

### Uradeck BC

Combined Waterproofing and Anti Skid Surfacing (Pu)

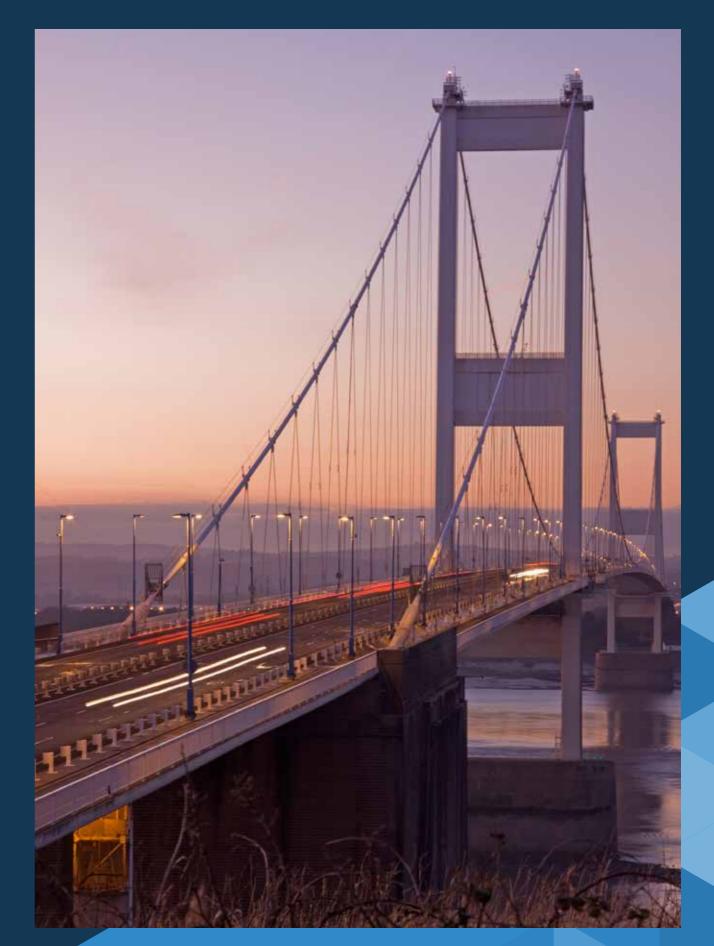


### SUB-SURFACE BRIDGE DRAINAGE

**Ekspan 325 Channel** Ekspan 302 System ES Seal System

### SURFACE BRIDGE DRAINAGE

Envirodeck





### **Contact Us**

### **Head Office**

Kingston House, 3 Walton Road, Pattinson North, Washington, Tyne & Wear, NE38 8QA, UK

t: +44 (0) 191 416 1530 e: info@uslekspan.com

### Sales & Manufacturing

Cavendish House, Unit 1, Enterprise 36, Tankersley, Barnsley, S75 3DZ, UK

<u>t:</u> +44 (0) 114 261 1126 <u>e</u>: info@uslekspan.com

www.uslekspan.com

