

**Weyn-Lauwers** N.V.

Industriepark-Noord 12  
B - 9100 SINT-NIKLAAS

Tel. : 00 32 (0)3 776.34.13  
Fax : 00 32 (0)3 778.09.52  
weynlauwers@weynlauwers.be  
www.weynlauwers.be

## VLAKKE DICHTINGEN DIN 2690 GRAFILIT SP



### OMSCHRIJVING

#### GRAFILIT STOOMDICHTINGEN

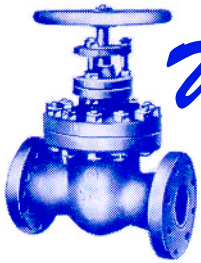
DIN 2690  
2 mm DIK

### codenr.

### DN

### afmetingen (mm)

600762	DN 10	46 x 18
600763	DN 15	51 x 21
600764	DN 20	61 x 27
600765	DN 25	71 x 34
600766	DN 32	82 x 43
600767	DN 40	92 x 49
600768	DN 50	107 x 61
600769	DN 65	127 x 77
600770	DN 80	149 x 90
600771	DN 100	162 x 115
600772	DN 125	192 x 141
600773	DN 150	218 x 169
600774	DN 200	273 x 220
600775	DN 250	328 x 274
600776	DN 300	378 x 325
600777	DN 350	438 x 368
600778	DN 400	490 x 420
600779	DN 450	
600780	DN 500	
	DN 600	695 x 610



# Weyn-Lauwers N.V.

Industriepark-Noord 12  
B - 9100 SINT-NIKLAAS

Tel. : 00 32 (0)3 776.34.13  
Fax : 00 32 (0)3 778.09.52  
weynlauwers@weynlauwers.be  
www.weynlauwers.be

## VLAKKE DICHTINGEN DIN 2690 GRAFILIT SP

GRAFILIT® SP is an expanded graphite based material with tanged stainless steel insert, thus enhances the surface load and blowout safety. GRAFILIT® SP has excellent chemical, thermal, and mechanical resistance. GRAFILIT® SP is gasket material used in wide range of industries, as gas and steam supply, chemical and petrochemical industry.

### PROPERTIES

	MECHANICAL RESISTANCE	THERMAL RESISTANCE	SEALABILITY PERFORMANCE	CHEMICAL RESISTANCE
SUPERIOR				
EXCELENT				
VERY GOOD				
GOOD				
MODERATE				

### APPROPRIATE INDUSTRIES & APPLICATIONS

- |                              |   |
|------------------------------|---|
| GENERAL PURPOSE              | AUTOMOTIVE AND ENGINE BUILDING INDUSTRY |
| WATER SUPPLY                 | SHIPBUILDING                            |
| POTABLE WATER SUPPLY         | POWER PLANT                             |
| STEAM SUPPLY                 | REFRIGERATION AND COOLING               |
| GAS SUPPLY                   | HEATING SYSTEMS                         |
| CHEMICAL INDUSTRY            | HIGH TEMP. APPLICATIONS                 |
| PETROCHEMICAL INDUSTRY       | COMPRESSORS AND PUMPS                   |
| PAPER AND CELLULOSE INDUSTRY | VALVES                                  |

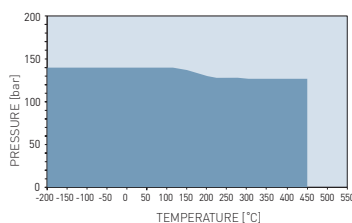
Composition	Expanded natural graphite, tanged stainless steel sheet insert (AISI 316; 0.1 mm).
Colour	Black
Approvals	DIN-DVGW DIN 3535-6, DVGW KTW, DVGW VP 401, API 607, BAM (Oxygen), Germanischer Lloyd

### TECHNICAL DATA Typical values for a thickness of 1.5 mm

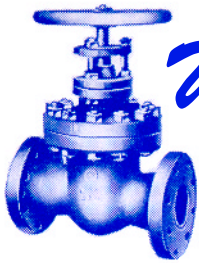
<b>Density</b>	DIN 28090-2	g/cm <sup>3</sup>	1.5
<b>Compressibility</b>	ASTM F36A	%	35
<b>Recovery</b>	ASTM F36A	%	17
<b>Stress resistance</b>	DIN 52913		
16 h, 50 MPa, 300 °C		MPa	49
<b>Specific leak rate</b>	DIN 3535-6	mg/(s·m)	0.05
<b>Leachable chloride content</b>	FSA NMG 202	ppm	20
<b>Leachable fluoride content</b>	FSA NMG 203	ppm	20
<b>Ash content of graphite</b>	DIN 51903	%	<1
<b>Compression modulus</b>	DIN 28090-2		
At room temperature: $\epsilon_{KSW}$		%	34
At elevated temperature: $\epsilon_{WSW/300\text{ °C}}$		%	1.2
<b>Percentage creep relaxation</b>	DIN 28090-2		
At room temperature: $\epsilon_{KRW}$		%	4.2
At elevated temperature: $\epsilon_{WRW/300\text{ °C}}$		%	3.3
<b>Operating conditions</b>			
Minimum temperature		°C/°F	-200/-328
Continuous temperature			
- oxidizing atmosphere		°C/°F	550/1022
- reducing or inert atmosphere		°C/°F	700/1292
Pressure		bar/psi	200/1450

### P-T DIAGRAM

EN 1514-1, Type IBC, PN 40, DIN 28091-2 / 3.8, 1.5 mm



- General suitability - Appropriate measures ensure maximum performance for joint design and gasket installation.
- Limited suitability - Technical consultation is mandatory.



# Weyn-Lauwers N.V.

Industriepark-Noord 12  
B - 9100 SINT-NIKLAAS

Tel. : 00 32 (0)3 776.34.13  
Fax : 00 32 (0)3 778.09.52  
weynlauwers@weynlauwers.be  
www.weynlauwers.be

## VLAKKE DICHTINGEN DIN 2690 GRAFILIT SP

Acetamide		Dioxane	+	Oleic acid	+
Acetic acid, 10%	+	Diphyl (Dowtherm A)	+	Oleum (Sulfuric acid, fuming)	-
Acetic acid, 100% (Glacial)	?	Esters	+	Oxalic acid	?
Acetone	+	Ethane (gas)	+	Oxygen (gas)	+
Acetonitrile	+	Ethers	+	Palmitic acid	+
Acetylene (gas)	+	Ethyl acetate	+	Paraffin oil	+
Acid chlorides	?	Ethyl alcohol (Ethanol)	+	Pentane	+
Acrylic acid	+	Ethyl cellulose	+	Perchloroethylene	+
Acrylonitrile	+	Ethyl chloride (gas)	+	Petroleum (Crude oil)	+
Adipic acid	+	Ethylene (gas)	+	Phenol (Carbolic acid)	+
Air (gas)	+	Ethylene glycol	+	Phosphoric acid, 40%	?
Alcohols	+	Formaldehyde (Formalin)	+	Phosphoric acid, 85%	?
Aldehydes	+	Formamide	+	Phthalic acid	+
Alum	?	Formic acid, 10%		Potassium acetate	+
Aluminium acetate	?	Formic acid, 85%	?	Potassium bicarbonate	+
Aluminium chlorate	?	Formic acid, 100%	?	Potassium carbonate	+
Aluminium chloride	-	Freon-12 (R-12)	+	Potassium chloride	+
Aluminium sulfate	+	Freon-134a (R-134a)	+	Potassium cyanide	+
Amines	+	Freon-22 (R-22)	+	Potassium dichromate	?
Ammonia (gas)	+	Fruit juices	+	Potassium hydroxide	+
Ammonium bicarbonate	+	Fuel oil	+	Potassium iodide	+
Ammonium chloride	?	Gasoline	+	Potassium nitrate	+
Ammonium hydroxide	+	Gelatin	+	Potassium permanganate	?
Amyl acetate	+	Glycerine (Glycerol)	+	Propane (gas)	+
Anhydrides	+	Glycols	+	Propylene (gas)	+
Aniline	+	Helium (gas)	+	Pyridine	+
Anisole	+	Heptane	+	Salicylic acid	+
Argon (gas)	+	Hydraulic oil (Glycol based)	+	Seawater/brine	?
Asphalt	+	Hydraulic oil (Mineral type)	+	Silicones (oil/grease)	+
Barium chloride	?	Hydraulic oil (Phosphate ester based)	+	Soaps	+
Benzaldehyde	+	Hydrazine	+	Sodium aluminate	+
Benzene	+	Hydrocarbons	+	Sodium bicarbonate	+
Benzoic acid	+	Hydrochloric acid, 10%	-	Sodium bisulfite	+
Bio-diesel	+	Hydrochloric acid, 37%	-	Sodium carbonate	+
Bio-ethanol	+	Hydrofluoric acid, 10%	-	Sodium chloride	+
Black liquor	?	Hydrofluoric acid, 48%	-	Sodium cyanide	+
Borax	+	Hydrogen (gas)	+	Sodium hydroxide	+
Boric acid	+	Iron sulfate	+	Sodium hypochlorite (Bleach)	-
Butadiene (gas)	+	Isobutane (gas)	+	Sodium silicate (Water glass)	+
Butane (gas)	+	Isooctane	+	Sodium sulfate	+
Butyl alcohol (Butanol)	+	Isoprene	+	Sodium sulfide	?
Butyric acid	+	Isopropyl alcohol (Isopropanol)	+	Starch	+
Calcium chloride	?	Kerosene	+	Steam	+
Calcium hydroxide	+	Ketones	+	Stearic acid	+
Carbon dioxide (gas)	+	Lactic acid	?	Styrene	+
Carbon monoxide (gas)	+	Lead acetate	+	Sugars	+
Cellulose	+	Lead arsenate	+	Sulfur	+
Chlorine (gas)	?	Magnesium sulfate	+	Sulfur dioxide (gas)	+
Chlorine (in water)		Maleic acid	+	Sulfuric acid, 20%	-
Chlorobenzene	+	Malic acid	?	Sulfuric acid, 98%	-
Chloroform	+	Methane (gas)	+	Sulfuryl chloride	-
Chloroprene	+	Methyl alcohol (Methanol)	+	Tar	+
Chlorosilanes	?	Methyl chloride (gas)	+	Tartaric acid	?
Chromic acid	-	Methylene dichloride	+	Tetrahydrofuran (THF)	+
Citric acid	?	Methyl ethyl ketone (MEK)	+	Titanium tetrachloride	-
Copper acetate	+	N-Methyl-pyrrolidone (NMP)	+	Toluene	+
Copper sulfate	+	Milk	+	2,4-Toluenediisocyanate	+
Creosote	+	Mineral oil (ASTM no.1)	+	Transformer oil (Mineral type)	+
Cresols (Cresylic acid)	+	Motor oil	+	Trichloroethylene	+
Cyclohexane	+	Naphtha	+	Vinegar	+
Cyclohexanol	+	Nitric acid, 10%	?	Vinyl chloride (gas)	+
Cyclohexanone	+	Nitric acid, 65%	?	Vinylidene chloride	+
Decalin	+	Nitrobenzene	+	Water	+
Dextrin	+	Nitrogen (gas)	+	White spirits	+
Dibenzyl ether	+	Nitrous gases (NOx)	?	Xylenes	+
Dibutyl phthalate	+	Octane	+	Xylenol	+
Dimethylacetamide (DMA)	+	Oils (Essential)	+	Zinc sulfate	+
Dimethylformamide (DMF)	+	Oils (Vegetable)	+		

### CHEMICAL RESISTANCE CHART

The recommendations made here are intended to be a guideline for the selection of the suitable gasket quality. Because the function and durability of the products depend upon a number of factors, the data may not be used to support any warranty claims.

- +
  - ?
  -
- Recommended  
Recommendation depends on operating conditions  
Not recommended