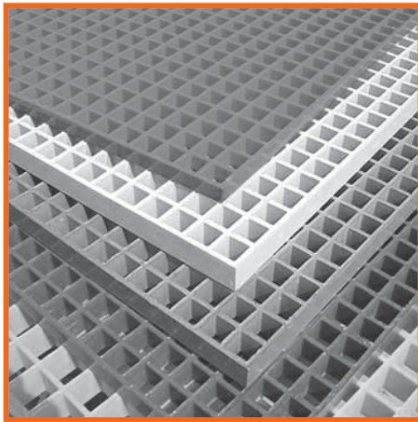


Fabco grate FRP Grating



Features:

- Will not rust.
- Corrosion resistant.
- Non-sparking.
- Fire retardant.
- Non-conductive.
- Maintenance free.
- Molded-in color.
- Light weight.
- Easy to install.
- Impact resistant.
- Quality appearance.

Square Mesh Panel

- Three Heights 1", 1.5" and 2"
- 1.5" Weight: 3.75 lb/ft. sq.
- 1" Weight: 2.5 lb/ft. sq.
- Tolerances: ±1/16"
- Bar Spacing: 1.5" X 1.5"
- Most popular pattern
- 70% open area
- Load bearing bars in both directions
- Easy to fabricate
- Can be used without continuous side support
- Labour savings
- High material utilization, low waste
- Uniform appearance

THICKNESS	BAR SPACING (IN)	PANEL SIZE (FT)	WT (LBS)
1"	1.5 x 1.5	4 X 12	120
1"	1.5 x 1.5	4 X 10	100
1"	1.5 x 1.5	4 X 8	80
1"	1.5 x 1.5	3 X 12	90
1"	1.5 x 1.5	3 X 10	75
1"	1.5 x 1.5	5 X 10	125
1.5"	1.5 x 1.5	4 X 12	180
1.5"	1.5 x 1.5	4 X 10	150
1.5"	1.5 x 1.5	4 X 8	120
1.5"	1.5 x 1.5	3 X 12	135
1.5"	1.5 x 1.5	3 X 10	113
1.5"	1.5 x 1.5	5 X 10	187
1"	1 x 4	3 X 10	75
1"	1 x 4	44" X 8	75
1"	1 x 4	4 X 8	80
1"	1 x 4	4 X 12	120
2"	2 x 2	4 X 12	192

Rectangular Mesh Panel

- 1" HIGH
- Bar Spacing: 1" X 4"
- 1" Weight: 2.50 lb/ft. sq.
- Tolerances: ±1/16"
- Economical
- Original pattern
- 69% open area
- Widely used for light traffic and shorter spans

RESIN CODE	DESCRIPTION	BASE RESIN	CORROSION RESISTANCE	FLAME SPREAD RATING	COLOR
CF	CHEMICAL PROOF FIRE RETARDANT	VINYL ESTER	EXCELLENT	CLASS 1: 25 OR LESS	DARK GRAY or ORANGE
CR+	CHEMICAL PROOF FIRE RETARDANT PLUS	VINYL ESTER	EXCELLENT	CLASS 1: 10 OR LESS	BLACK
IF	INDUSTRIAL GRADE FIRE RETARDANT	ISOPHTHALIC	VERY GOOD	CLASS 1: 25 OR LESS	GREEN or GRAY
FF	FOOD GRADE FIRE RETARDANT	ISOPHTHALIC	VERY GOOD	CLASS 2: 30 OR LESS	LIGHT GRAY
AF	ARCHITECTURAL GRADE	ORTHOPHTHALIC	GOOD	CLASS 1: 25 OR LESS	GREEN
AN	ARCHITECTURAL GRADE NON-FIRE RETARDANT	ORTHOPHTHALIC	GOOD	NOT RATED	YELLOW or GREEN

Note : All grating types available with or without grit top for slip resistance.

CF: CHEMICAL PROOF (standard colour is dark gray) is a vinyl ester system specifically engineered to provide premium service in highly corrosive environments. It utilizes an advanced resin system which delivers outstanding resistance to a wide range of harsh corrosive environments ranging from acidic to caustic, plus a high degree of solvent resistance. It has a Class I flame spread rating of 25 or less according to the ASTM E-84 Tunnel Test Method.

CR+: CHEMICAL PROOF PLUS (standard colour is black). This is our only EF.R.P™ Grating to offer a flame spread rating of 10 or less on ASTM E-84 Tunnel Test. It has excellent acid and caustic resistance.

IF: INDUSTRIAL GRADE (standard colour is light gray). This is a premium corrosion resistant isophthalic resin system selected for outstanding acid resistance. It has moderate resistance to caustic and solvent environments. It has a Class I ASTM E-84 Tunnel Test flame spread rating of 25 or less. It is more economical than types CF and CR+.

FF: FOOD GRADE (standard colour is safety yellow). Agriculture Canada approved (all ingredients have been USDA approved) to meet corrosive conditions commonly found in meat production, food processing, bottling and brewing applications. Made with isophthalic polyester. Flame spread rating is 30 or less.

AF: ARCHITECTURAL GRADE FIRE RETARDANT (standard colour is light gray). This is a resin system designed for mildly corrosive environments. Best suited to replace metal gratings that require maintenance to maintain an aesthetically pleasing appearance. It has a Class 1, ASTM E-84 Tunnel Test flame spread rating of 25 or less for indoor use. It is more economical than type IF.

AN: ARCHITECTURAL GRADE (standard colour is green). Similar resin system as type AF but is not fire retardant or flame spread rated. More economical than AF.



Grating Selection Process

1. Select the proper bar spacing and height to meet your load requirements.
2. Select the proper resin to meet your environmental requirements.
3. Select the proper panel size to meet your requirement.
4. Determine if you want grit top or plain top.

Load Deflection Tables

Deflection to Span Ratios

- For a resilient, non-fatiguing, comfortable feel use the STANDARD deflection to span ratio of 1:120.
- For an elevated installation, where a solid feeling is desired, use a deflection to span ratio of 1:180 (NBC-85).
A deflection to span ratio greater than 1:100 (1%) is not recommended. Do not exceed .5" (13mm).

Panel Selection

- Determine the type of loading: concentrated or uniform.
- Estimate the load and determine the span.
- Decide what maximum deflection is appropriate: solid, standard or 1%.
- Enter the appropriate 1" (25mm) table. If the deflection is less than the maximum selected, choose the 1" thickness. It is more economical than 1.5" thick panels.
- If the deflection or span is too great for 1" thick panels, select 1.5" thick FRP Grating and design your support system for the appropriate span.
- Select the resin system.

Panel Installation

- Panels are designed to be supported on all sides.
- Use end clips if panel ends cannot be supported.
- Use hold down clips to prevent panel drift.

CONCENTRATED LOAD: FULL PANEL

2" HEIGHT, 2" X 2" MESH

SPAN (IN)	LOAD (POUNDS)							MAXIMUM LOADS		
	100	250	500	750	1000	1500	2000	SOLID ²	STD ³	1% DEF ⁴
18	.004	.012	.025	.037	.049	.074	.098	2040	3063	3672
24	.007	.018	.036	.054	.072	.107	.143	1860	2793	3352
36 ¹	.015	.037	.073	.110	.146	.219	.293	1290	1938	2326
48 ¹	.030	.074	.149	.223	.298	.447		858	1286	1554

1-1/2" HEIGHT, 1-1/2" X 1-1/2" MESH

18	.007	.016	.032	.048	.064	.096	.128	1560	2340	2808
24	.012	.029	.058	.086	.115	.173	.230	1156	1733	2080
36 ¹	.026	.064	.128	.192	.255	.383		738	1108	1330
48 ¹	.055	.138	.276	.414				463	693	832
60 ¹	.083	.208	.417					386	579	695

1" HEIGHT, 1-1/2" X 1-1/2" MESH

18	.014	.034	.068	.102	.136	.203	.271	738	1105	1325
24	.026	.066	.132	.198	.265	.397		503	755	906
36 ¹	.068	.171	.342					276	414	497
48 ¹	.141	.353						181	272	326

1" HEIGHT, 1" X 4" MESH

18	.011	.028	.056	.084	.113	.169	.225	887	1330	1596
24	.025	.061	.123	.184	.245	.368	.491	543	813	976
36 ¹	.059	.147	.294	.441				321	482	578
44 ¹	.120	.300						213	320	384
48 ¹	.131	.327						196	294	353

UNIFORM LOAD: FULL PANEL

2" HEIGHT, 2" X 2" MESH

SPAN (IN)	LOAD (LB/FT ²)							MAXIMUM LOADS		
	40	65	75	100	150	200	250	SOLID ²	STD ³	1% DEF ⁴
12	.00	.00	.00	.00	.00	.00	.00	4867	5800	5800
18	.003	.004	.005	.007	.010	.014	.017	1439	2158	2590
24	.009	.014	.016	.022	.033	.044	.055	607	910	1092
36 ¹	.044	.072	.083	.111	.167	.222	.278	180	269	323
48 ¹	.141	.228	.264	.351				76	111	133
60 ¹	.343							32	46	55

1-1/2" HEIGHT, 1-1/2" X 1-1/2" MESH

12	.002	.003	.004	.005	.008	.010	.013	2664	5918	7102
18	.005	.008	.010	.013	.019	.025	.032	787	2358	2830
24	.016	.026	.030	.040	.060	.080	.101	331	745	894
36 ¹	.081	.132	.153	.204	.305	.407		98	145	174
48 ¹	.258	.419	.484					41	60	72

1" HEIGHT, 1-1/2" X 1-1/2" MESH

12	.003	.006	.008	.010	.016	.021	.026	633	950	1140
18	.021	.035	.040	.053	.080	.107	.133	187	281	337
24	.067	.110	.126	.169	.253	.337	.422	78	118	142
36 ¹	.342							23	35	42

1" HEIGHT, 1" X 4" MESH

12	.002	.004	.005	.006	.009	.012	.014	1158	1737	2084
18	.010	.016	.018	.024	.036	.048	.060	416	625	750
24	.022	.036	.042	.056	.084	.112	.140	238	356	427
36 ¹	.110	.180	.207	.276	.414			72	108	130
44 ¹	.31							34	50	60
48 ¹	.339							31	46	55

Notes:

- ¹ - Clear Span is 2" less than width of grating
- ² - Solid Deflection to Span ratio is 1:180
- ³ - Standard Deflection to Span ratio is 1:120
- ⁴ - 1% Deflection to Span ratio is 1:100