



AutoGrate®

**The Ultimate
GRP Grating.**

SPANS

66% FURTHER

THAN OTHER GRP GRATING*

**BARCLAY &
MATHIESON**

IMPROVED STRENGTH. LONGER SPANS.

AutoGrate®

IMPROVED STRENGTH. LONGER SPANS.

More Efficient Walkway Designs.

AutoGrate offers specifiers and users enhanced strength over other moulded GRP gratings. This performance improvement enables more efficient and economical walkway designs, either by utilising longer unsupported spans to reduce substructures and installation time, or reducing the panel depth used.

- ✓ Longer Unsupported Spans
- ✓ Reduced Substructure Requirements
- ✓ Slimmer, Lighter Panel Selections
- ✓ Material, Time & Carbon Savings

Powered by Automation.

AutoGrate is made from high strength glass fibres, accurately positioned and set in a high performance isophthalic polyester resin, using advanced automated manufacturing. This delivers a moulded GRP Grating with unrivalled load-bearing performance.

Independently Tested in the UK.

Independent testing by Lancaster University has confirmed that the superior quality of AutoGrate translates into a significant strength advantage.



Suitable for a Wide Range of Applications & Environments.

AutoGrate is suitable for use in safety walkways and access structures across a wide range of aggressive industrial environments, including construction, rail, energy, utilities, marine, manufacturing, agricultural, chemical processing and more.

AutoGrate Range.

Panel Depth (mm)	Panel Length (mm)	Panel Width (mm)	Panel Weight (kg)	Weight (kg/sqm)	Colours	Surface/Slip Resistance [†]
25	3000	1000	37.8	12.6	Yellow (RAL 1003)	Gritted/ Low Slip Risk in Wet & Dry (PTV 70+)
25	3660	1220	56.3	12.6	Red (RAL 3020)	
38	3000	1000	59.4	19.8	Green (RAL 6001)	
38	3660	1220	88.4	19.8	Dark Grey (RAL 7043)	
					Grey (RAL 7047)	

[†] Slip resistance for shod pedestrians has been independently evaluated according to the UK Slip Resistance Group Guidelines (Issue 6, 2024) and BS EN 16165: 2021. A Pendulum Test Value (PTV) of 36 or above indicates a low slip potential.

✓ Slimmer, Lighter Panel Selections.

AutoGrate 25mm can be used to replace standard 38mm moulded GRP grating. Illustrations show a 1.5kN point load and a 900mm unsupported span, with a maximum 1.0% allowable deflection (L/100).

AutoGrate is the first 25mm moulded GRP grating suitable for riser void flooring.

AutoGrate 25mm offers

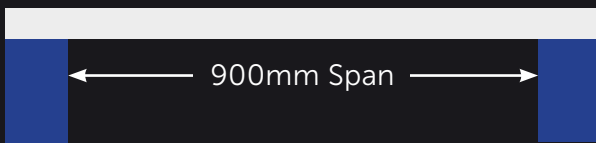
36%

MATERIAL SAVING

**OVER STANDARD
38MM GRP GRATINGS**

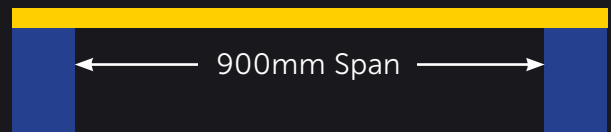
Standard 38mm Panel.

1.5kN Point Load



AutoGrate 25mm Panel.

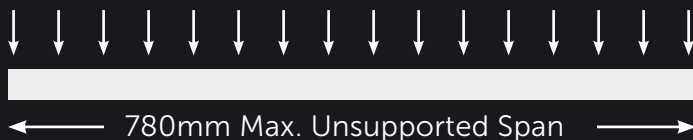
1.5kN Point Load



✓ Longer Unsupported Spans.

Alternative 38mm GRP Grating.

5kN/m² Uniformly Distributed Load



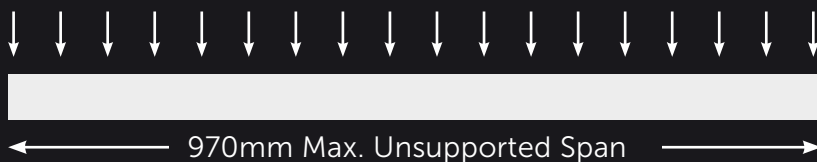
AutoGrate 38mm spans

66%

**FURTHER THAN OTHER
38MM GRATING***

Alternative 50mm GRP Grating.

5kN/m² Uniformly Distributed Load



AutoGrate 38mm spans

34%

**FURTHER THAN OTHER
50MM GRATING***

AutoGrate 38mm GRP Grating.

5kN/m² Uniformly Distributed Load



*Based on a comparison of the published performance data (August 2025) of the current best-selling 38mm and 50mm moulded open mesh GRP grating on the UK market, at a typical 5kN/m² load application and 0.5% maximum deflection criteria (L/200).

AutoGrate 25mm GRP Grating

Point Load Data - Deflection in Millimetres

Load (kN)	Span 300mm	Span 400mm	Span 500mm	Span 600mm	Span 700mm	Span 800mm	Span 900mm
0.5	0.19	0.33	0.54	0.92	1.26	1.77	2.28
1.0	0.34	0.63	1.06	1.69	2.38	3.55	4.61
1.5	0.49	0.97	1.57	2.52	3.50	5.22	6.80
2.0	0.63	1.29	2.04	3.32	4.79	6.85	8.95
2.5	0.78	1.57	2.59	4.18	5.83	8.26	11.08
3.0	0.87	1.84	3.14	5.00	6.97		
3.5	1.02	2.13	3.62	5.78	8.06		
4.0	1.17	2.37	4.23	6.54	9.23		
4.5	1.29	2.67	4.66	7.36	10.38		
5.0	1.41	3.01	5.10	8.11	11.47		

Uniformly Distributed Load Data - Deflection in Millimetres

Load (kN/m²)	Span 300mm	Span 400mm	Span 500mm	Span 600mm	Span 700mm	Span 800mm	Span 900mm
1.0	0.05	0.10	0.24	0.49	0.63	1.17	1.99
2.0	0.05	0.24	0.54	0.92	1.12	2.22	3.55
3.0	0.10	0.39	0.80	1.36	1.65	3.16	5.05
4.0	0.15	0.53	0.97	1.80	2.19	4.30	6.61
5.0	0.19	0.63	1.17	2.14	2.72	5.35	8.30

AutoGrate 38mm GRP Grating

Point Load Data - Deflection in Millimetres

Load (kN)	Span 300mm	Span 400mm	Span 500mm	Span 600mm	Span 700mm	Span 800mm	Span 900mm	Span 1000mm	Span 1100mm	Span 1200mm	Span 1300mm	Span 1400mm
1.0	0.15	0.24	0.34	0.53	0.83	1.17	1.36	1.80	2.26	3.06	3.64	4.40
2.0	0.24	0.49	0.69	1.07	1.55	2.17	2.70	3.72	4.63	5.91	7.39	8.78
3.0	0.37	0.70	1.07	1.60	2.28	3.21	4.18	5.55	6.94	8.89	10.93	13.33
4.0	0.49	0.92	1.41	2.14	3.02	4.16	5.54	7.27	9.30	11.89	14.57	17.20
5.0	0.58	1.12	1.75	2.62	3.74	5.25	6.89	9.12	11.67			
6.0	0.73	1.36	2.04	3.16	4.51	6.28	8.25	10.90				
7.0	0.83	1.51	2.38	3.64	5.22	7.34	9.69					
8.0	0.97	1.70	2.72	4.16	5.98	8.24						
9.0	1.07	1.90	3.06	4.67	6.67							
10.0	1.17	2.11	3.39	5.24	7.43							

Uniformly Distributed Load Data - Deflection in Millimetres

Load (kN/m²)	Span 300mm	Span 400mm	Span 500mm	Span 600mm	Span 700mm	Span 800mm	Span 900mm	Span 1000mm	Span 1100mm	Span 1200mm	Span 1300mm	Span 1400mm
1.0	0.02	0.05	0.13	0.24	0.39	0.58	0.78	0.93	1.12	1.65	1.79	1.90
2.0	0.05	0.10	0.25	0.44	0.68	1.07	1.20	1.56	1.85	2.36	2.46	2.82
3.0	0.05	0.15	0.37	0.62	0.97	1.51	1.60	2.29	2.65	3.28	3.59	4.12
4.0	0.10	0.19	0.47	0.74	1.26	1.90	2.23	3.09	3.40	4.21	4.86	5.63
5.0	0.10	0.24	0.57	0.90	1.46	2.25	2.82	3.79	4.13	5.31	5.97	7.04
6.0	0.15	0.25	0.65	1.07	1.70	2.72	3.40	4.40	4.76	6.27	6.99	8.50
7.0	0.15	0.29	0.71	1.22	1.92	3.06	4.03	5.15	5.58	7.09	8.05	10.15
8.0	0.19	0.34	0.81	1.36	2.18	3.50	4.57	5.79	5.93	7.92	9.13	11.36
9.0	0.19	0.44	0.86	1.55	2.45	3.93	5.21	6.51	6.66	8.79	10.35	12.72
10.0	0.19	0.49	0.91	1.70	2.65	4.37	5.64	7.05	7.14	9.67	11.48	14.05

- WALKWAYS & ACCESS STRUCTURES
- STAIRS, TREADS & HANDRAILS
- FABRICATIONS & BESPOKE SOLUTIONS



With over 145 years' experience, Barclay & Mathieson is a name you can trust.

We are a specialist supplier of access and safety solutions in a range of materials, including glass-reinforced polymer (GRP), steel, aluminium and recycled plastic.

Whatever your industry, our products combine to provide safe pedestrian access routes that are strong and reliable, with a high resistance to slip.

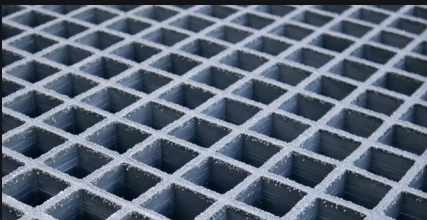
From technical support for a bespoke fabricated structure to volume orders of standard anti-slip components at wholesale prices, the Barclay & Mathieson team are here to help.

Part of BM Group, we operate from 15 depots located throughout the UK from Aberdeen to Sittingbourne.

We carry large stocks of grid flooring, perforated planks, grating, anti-slip plates and treads, handrails and clamps, DDA Assist products, and more! You can also buy a selection of products quickly and easily from us online via bmsteel.co.uk.

Tel: 0114 254 3220 | Email: sales@barclayandmathieson.com | Web: barclayandmathieson.com

GRP Products & Services.



Open Mesh & Solid Top Grating



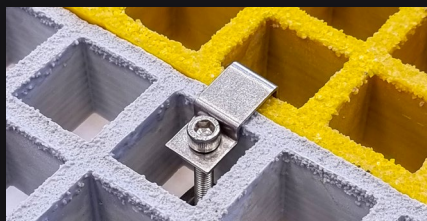
Handrail Clamps & Tubes



Profiles e.g. Beam, Box, Channel etc.



Stair Tread Covers & Nosing



Stainless Steel Fixings



Cutting & Fabrication Services

AutoGrate®

The ultimate moulded grating with all the standard benefits of GRP walkways:

- Light in Weight 
- Low Carbon 
- Non-Conductive 
- Non-Magnetic 
- Non-Corrosive 
- Impact Resistant 
- Slip Resistant 
- Low Maintenance 

**BARCLAY &
MATHIESON**

YOUR TRUSTED PARTNER FOR
ACCESS & SAFETY SOLUTIONS

Contact us today to discuss how you can use this revolutionary new product on your next project.

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