



Supporting loads up to 80 tons, LibertyMatTM is the ultimate heavy duty man-handleable mat for temporary roadways and work areas. LibertyMatTM is essential for the construction, civil engineering and ground work industries.

Incredibly Tough & Flexible

Made from tough 100% recycled or virgin high density Polyethylene (HDPE), LibertyMat™ is the market leader for temporary access and ground protection over soft or sensitive ground.

LibertyMat[™] significantly reduces damage to heritage and eco-sensitive areas, avoiding the need for reinstatement once the project is complete.

Fast & Efficient Installation

Weighing just 77lbs (35kg) LibertyMa[™] is ideal for both short and long term projects. Incorporating strategically positioned handholds, LibertyMat[™] is man-handleable and easy to off load and deploy by a two man team.

Chevron Traction® Surface

LibertyMat™'s chevron traction® surface comprises of a broken pattern of rugged nubs which substantially improves the grip and forward motion of heavy equipment or vehicles and reduces side way slippage, even in the most challenging weather or ground conditions. Optional hi-vis markings and cats eyes can be incorporated into LibertyMat™ for additional safety at night

Logistics

Lighter in weight than conventional wood or steel alternatives, LibertyMat™ also offers the environmental benefit of more mats being loaded per wagon and in turn reducing transportation costs and carbon emissions.

Connection Systems

Standard 2 way / 4 way Urethane Connectors

Made from 100% Urethane, 2 and 4 way connectors are inserted from below and attached via M10 bolts. Connectors can be strengthened with a metal strap for projects where heavy vehicles or equipment are used, or on inclines or slopes

Fast Fit Connectors

Used on short term projects where speed of installation is of the essence. The connector is simply pushed through the holes and then underneath the mats

Flex Connectors

Installed in the same way as 2 or 4 way connectors the 'flex' connectors should be used where there is highly undulating ground.

Metal U-pin

Metal U-pin connectors should be used in conjunction with other connectors when LibertyMat™s are installed on inclines or slopes







Applications

- >> Construction, civil engineering and ground work
- >> Pedestrian walkways
- >> Emergency access routes
- >> Temporary roadways and car parks
- >> Utilities and infrastructure maintenance
- >> Landscaping and protection of heritage or eco-sensitive areas
- >> Golf course and sports field maintenance
- >> Sports and leisure events





Technical Product Information

LibertyMat[™] Heavy Duty Temporary Access Mat

Material: 100% recycled or virgin High Density Polyethylene (HDPE)

Size: 7' 11" (2410mm) x 3'11" (1200mm) x 0.5" (12mm)

Weight 77lbs (35kg)

	Unit	HDPE
Mechanical Properties		
Tensile strength	MPa	23 - 26
Flexural strength	MPa	25 - 28
Flexural modulus	MPa	1936 - 1967
Charpy Notched Impact Strength	kJ/m²	5 - 6
Poisson's ratio	(theoretical)	0.35 - 0.38
Compression testing (max value before test terminated)	Tons	250
General Properties		
Density	kg/m³	940 - 965
Shrinkage	%	2 - 4
Water absorption	%	0.01
Thermal expansion	e-6/K	110 - 130
Thermal conductivity	W/m.K	0.46 - 0.52
Specific heat	J/kg.K	1800 - 2700
Melting temperature	°F	226 - 273
Glass temperature	°F	-230230
Service temperature	°F	-86 - +185
Resistivity	Ohm.mm²/m	5e+17 - 1e+21
Breakdown potential	kV/mm	17.7 - 19.7
Dielectric loss factor		0.0005 - 0.0008
Friction coefficient		0.25 - 0.30
Refraction index		1.52 - 1.53

Health and Safety Information

General

Critical hazards to man and environment	None
Environment	The disposal of the material presents no danger regarding toxicological or ecological considerations. Due to low water solubility, bio-availability unlikely.
Solubility in water	Insoluble
Regulatory	Not classified as hazardous under transport regulations.
Safety Properties	
Melting point	Crystalline Melt Temperature 226- 273°F
Ignition temperature	> 680°F
Thermal decomposition	> 734°F
Stability and reactivity	No possibility of degradation under normal circumstances. Degradation will only occur above the decomposition temperature.
Toxicology	Not harmful to health under normal conditions.



The fast and safe way forward

LibertyMat™ is available for worldwide sale or hire through our official distributors and agents - please contact us for further details.

UK Head Office: Tel: +44 (0) 8456 435 388

Unit 11, M11 Business Link, Parsonage Lane, Stansted, Essex CM24 8GF. UK

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*Load performance depends on ground conditions as well as the weight and type of vehicles and plant. Zigma" Ground Solutions Ltd, its agents or employees are not liable for any damage to existing ground or property through use of LibertyMat™. The sale or hire of all temporary access mats are subject to Zigma" Ground Solutions' standard Terms and Conditions. These are available from our website www.zigmagroundsolutions.com or by telephoning our sales office.