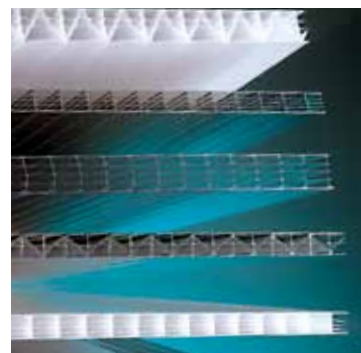




A Wide Variety of Wall Configurations and Thickness

MACROLUX

Polycarbonate Multi-Wall Panels



Macrolux Multi-Wall Polycarbonate Panels



CO-EXTRUDED THERMOGLAZING

Multi-wall (Twin, Triple, Five, X-Strong and M-wall) polycarbonate panels from CO-EX Corporation are assuming a more and more important role in the transparent building materials market. To meet your growing requirements and to serve you more efficiently, we have a fully staffed customer service department. Let us show you what an enjoyable experience it can be to work with CO-EX Corporation!

APPLICATIONS

Macrolux® is perfect for applications requiring a material which offers; high light transmission, thermal insulation, lightness of weight with strength, high shock resistance, flame retardance, great economy, vandal resistance and design flexibility. Consider using Macrolux® panels in your next project.

HORTICULTURAL: for greenhouse coverings where good thermal insulation is necessary together with high light transmission.

INDUSTRIAL BUILDING: for various glazing applications, skylights, walkways, windows, shelters, and insulated roofing.

ARCHITECTURAL GLAZING: with the ability to be cold-formed into arches, Macrolux® offers architects true design freedom. Consider the possibilities of using Macrolux® for walkways, indoor shopping centers, swimming pool coverings, skylights, and other enclosures.

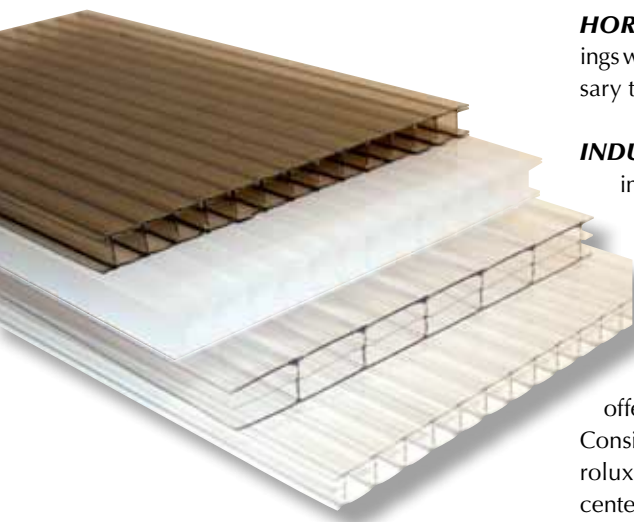
HOME IMPROVEMENT: for easy do-it-yourself projects like window replacements,

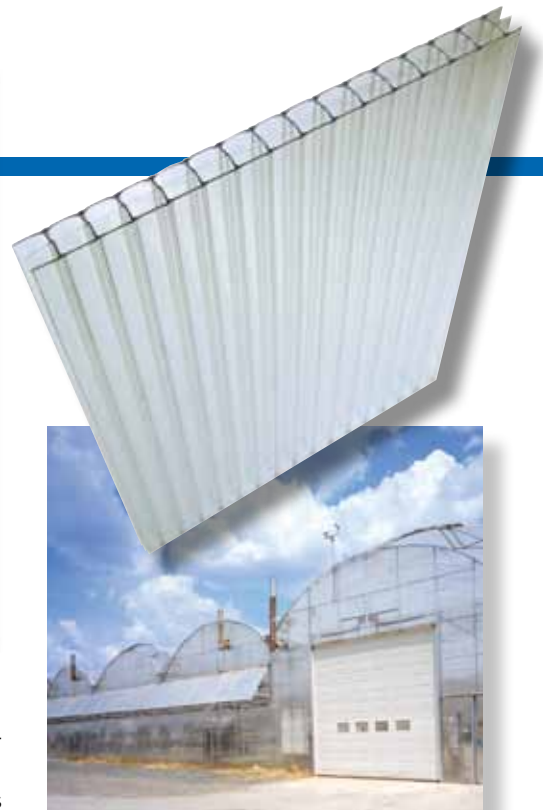
shower enclosures, hobby greenhouses, partitions, light covers, patio covers, carports and more.

Macrolux® sheeting has been designed as a glazing product. It is the sole responsibility of the customer to confirm with their own architect, engineer or other professional consultants that the goods offered by CO-EX meet the requirements and specifications of the particular project and use for which they are being purchased.

VIRTUALLY UNBREAKABLE

You can be assured that from transport to installation, Macrolux® will maintain its durability. Even when exposed to elevated outdoor temperatures over a long period of time, it will maintain its structural integrity. It resists cracking and splintering during fabrication, assuring you a high degree of safety and it can be cold formed on site.





IMPACT RESISTANCE

Among the thermoplastic products used in the building industry, Macrolux® co-extruded thermoglaizing has a high impact resistance - 200 times greater than glass and 10 times greater than acrylic.

A Macrolux® 8mm panel is so strong it can withstand the impact of a 16 lb. weight, falling 25 feet onto the panel, with no breakage. It will maintain its impact strength over a wide temperature range from - 40°F to 250°F.

SAVES ENERGY

The multi-walled construction of the Macrolux® sheet offers high thermal resistance, giving excellent thermal insulating values while blocking UV transmission.

CONDENSATION CONTROL

A factory applied condensation control is available on Macrolux® panels. Reducing surface tension, the condensation control allows water to spread into a thin sheet rather than form into droplets. It is available for all applications from greenhouses to backyard patio covers.

Technical Data

Immediate delivery of sheets in 4 and 6 foot widths. Other widths are available by special order. Sheets may be supplied cut to your exact size specifications. Length tolerance for custom produced materials is -0 +30mm. (Sheets over 236.25" (6m) have a tolerance of -0 +30mm)

SHEET THICKNESS	MM	4*	6	6*	8	8	10	10*	16	16*	25	32*	35*
	INCH	5/32	1/4	1/4	5/16	5/16	3/8	3/8	5/8	5/8	1	1-1/4	1-3/8"
WALL TYPE	0	Twin	Twin	Triple	Twin	Triple	Twin	Triple	Five	X-Strong	Five	Five/M	Five/M
RIB SPACING	INCH	0.236	0.236	0.315	0.354	0.315	0.354	0.315	0.787	0.551	0.787	1.26	1.26
STRUCTURE TYPE	<i>Twin Wall Version</i>		<i>Triple Wall Version</i>				<i>Five Wall Version</i>			<i>X-Strong Version</i>		<i>Five M-Wall Version</i>	
LIGHT TRANSMISSION	Clear	82%	80%	75%	80%	75%	80%	75%	62%	62%	60%	60%	60%
	Bronze	25%	25%	23%	25%	23%	25%	23%	25%	20%	20%	15%	15%
	Opal	60%	60%	60%	60%	60%	55%	55%	40%	40%	25%	20%	15%
U FACTOR (Btu/ft² h°F)		0.634	0.616	0.600	0.560	0.528	0.528	0.475	0.335	0.350	0.264	0.250	0.229
R-VALUE R=1/U		1.58	1.62	1.67	1.79	1.89	1.89	2.10	2.98	2.84	3.79	4.05	4.36
MIN. BENDING RADIUS	INCH	24	36	36	48	48	60	60	95	95	148	189	207

Tolerances: Thickness ± 5% , Length ± 1/4", Width ± 1/8", Weight ± 5%
*SPECIAL ORDER ITEM



EASY TO INSTALL

Macrolux® panels resist cracking and splitting during cutting and drilling.

EXTRA WIDE PANELS

Standard widths of 4 feet and 6 feet are available with lengths up to 39'.

TRANSPARENT

Offering up to 82% light transmission in clear. Also available in bronze, opal, and custom colors by special order.

LIGHTWEIGHT

Weighing just one-eighth the weight of glass, polycarbonate panels do not need the extensive structural support that a heavier glass wall or glazing material requires.

WARRANTY

Macrolux® is backed by a 10 year warranty on light transmission and breakage caused by hail.

UV CO-EXTRUSION

Macrolux® co-extruded thermoglazing incorporates new technology which results in exceptional resistance to aging. Macrolux® multi-wall is a high performance polycarbonate sheet. During manufacturing, a layer of UV absorber is co-extruded onto the surface of the sheet, forming a barrier against UV radiation. This gives Macrolux® multi-wall exceptional resistance to aging without affecting the mechanical properties and impact strength.

FLAMMABILITY

Macrolux® polycarbonate sheets are classified in accordance with ASTM standards.

Compared with other plastic products used in the building industry, Macrolux® multi-wall sheets have an exceptional fire performance and most importantly, do not give off toxic gasses.

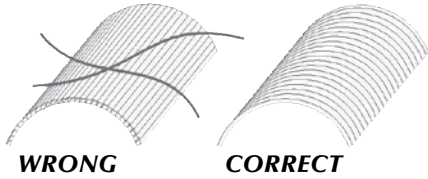
BENDING RADII

Macrolux® multi-wall sheets can be cold formed and used in many curved applications, for example, arched walkways. Sheets must always be bent longitudinally, never across the width of the sheet.

In applications of this nature it is important to avoid over tensioning of the sheet.



Therefore, when Macrolux® multi-wall is cold formed, the minimum radius should not be less than 150 times the thickness of the sheet.



LIGHT TRANSMISSION

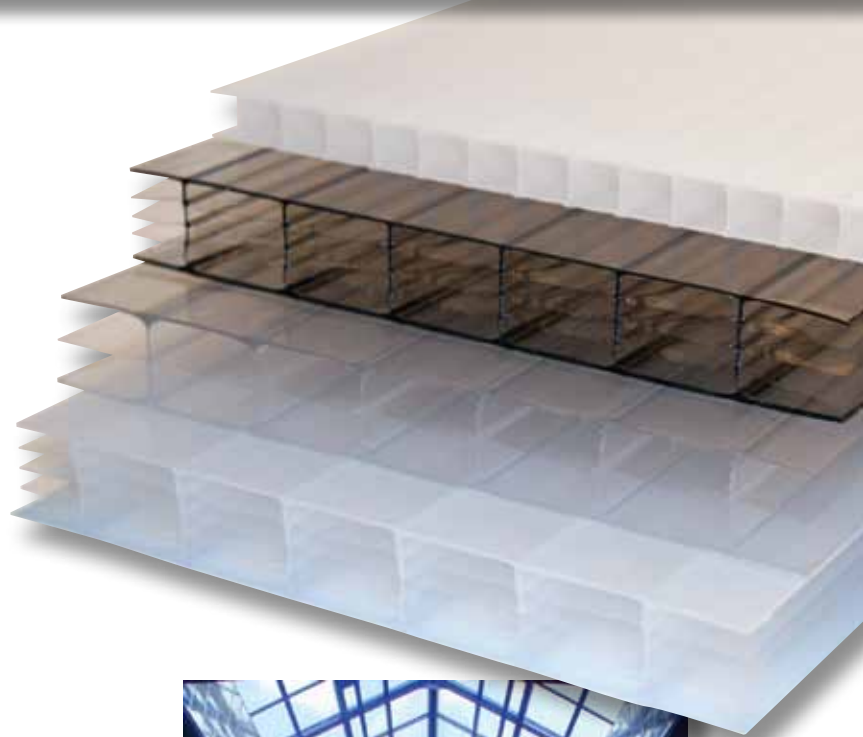
Macrolux® multi-wall sheets are available in a wide variety of thicknesses and colors providing up to 82% visible light transmission.

Macrolux® multi-wall sheets are essentially opaque at all wavelengths below 385 nanometers limiting the damaging effects of UV light. They have a clear co-extruded outer surface which provides high stability against the effects of UV radiation and gives excellent durability to outdoor weathering. This unique protection insures long term optimal quality under intensive UV exposure.

PROPER INSTALLATION

Macrolux® is supplied with a protective PE film which should be kept on until the sheet is installed. The UV protected side is to be faced towards the sun and is marked with a white printed film, light blue film or a sticker saying Macrolux® multi-wall polycarbonate sheet. Macrolux® crates or sheets should be stored in an area not exposed to the sun, or indirect heat from the sun, which could make the removal of protective film difficult.

Stiff fixing by means of adhesive or putty is to be avoided. Top and bottom ends of a sheet must always be sealed by means of aluminum tape to prevent dust or dirt penetrating the inside of the ribs. Aluminum tape must be protected with proper polycarbonate "U" profiles.



Chemical Resistance

The compatibility tests are carried out by immersing the polycarbonate sample piece for 180 days in the substance to be tested at a constant temperature of 20°C. The esthetical aspect (dulling, fissures) is then evaluated and the mechanical characteristics are compared with the original values of the polycarbonate.

CHART KEY: **Resistant**, **Partially resistant**, **NOT resistant**

CHEMICALS

Acetaldehyde
Acetic acid 5%
Acetic acid 30%
Acetic acid
Acetone
Acetylene
Acrylic nitrile
Acrylonitrile
Allylic alcohol
Alum
Aluminium alum
Aluminium chloride
Aluminium oxalate
Aluminium sulphate
Amilacetate
Ammonia
Ammonia water
Ammonium chloride
Ammonium fluoride
Ammonium hydrate
Ammonium nitrate
Ammonium sulphate
Ammonium sulphide
Ammonium trichloride
Aniline
Antimony pentachloride
Arsenic acid 20%
Arsenous acid 20%
Benzene
Benzoic acid
Benzoic aldehyde
Benzole
Benzyl acid
Benzyl alcohol
Borax
Boric acid
Bromine
Bromobenzene
Bromobenzol
Butane
Butanol
Butilic alcohol
Butyl acetate
Butylenic glycol
Butylstearate
Butyric acid
Calcium chloride
Calcium hydrate
Calcium hypo chloride
Calcium nitrate
Calcium soap
Carbonic acid
Carbon oxide
Carbon sulphide
Carbon tetrachloride
Caustic potash 5%
Caustic soda 5%
Chloride of lime
Chlorine gas
Chlorobenzol
Chloroform
Chrome alum
Chromic acid 20%
Citric acid 10%
Concrete
Copper chloride
Coppers sulphate
Copper chloride

Cresol
Cyclohexane
Cyclohexanon
Cyclohexanol
Cyclohexane
Decalin
Dimethyl Fluorinamide
Diamphthalate
Diethyl ether
Dimethylformaldehyde
Dinonilphthalate
Dioxane
Diethyl adipate
Diethyl phtalate
Diphyl
Dyburlyphthalate
Ether
Ethilenchloride
Ethilenglycol
Ethyl alcohol 96%
Ethyl bromide
Ethyl chloridrine
Ethyl ether
Ethylamine
Ethylene chloride
Ethylenic glycol
Etilencloridrina
Fluosilicic acid 30%
Formalin
Formic Acid 30%
Glycerine
Glycol
Glycolic acid
Heptane
Hexane
Hydrochloric acid 10%
Hydrochloric acid 35%
Hydrofluoric acid
Hydrogen sulphide
Industrial petrol
Iodine
Iron chloride
Iron sulphate
Isoamyl alcohol
Isopropyl alcohol
Kerosene
Lactic acid 5%
Ligroin
Lime wash
Magnesium chloride
Magnesium sulphate
Manganese sulphate
Mercury
Mercury chloride
Methanol
Methyl alcohol
Methyl metacrylate
Methylamine
Methylene chloride
Methylic ester
Methylisobutylketone
Methylketone
Naphtha
n-butyl alcohol
Nickel sulphate
Nitric acid 10%
Nitrobenzene
Nitrobenzole
Nitrous gases

Oleic acid
Oxalic acid
Oxygen
Ozone
Pentane
Perchlorethylene
Perchloric acid
Perchloric acid 10%
Petroleum
Petroleum ether
Phenic acid
Pheniletlylic alcohol
Phenol
Phosphoric acid
Phosphor trichloride
Phosphorus chloride
Phosphotic Oxychloride
Potassium alum
Potassium bromide
Potassium carbonate
Potassium chloride
Potassium cyanide
Potassium dichromate
Potassium-
metabisulphite 4%
Potassium nitrate
Potassium-
perchlorate 10%
Potassium-
permanganate 10%
Potassium persulphate
Potassium Rhodanate
Potassium sulphate
Potassium sulphocyanide
Propane
Propargylic alcohol
Propionic acid
Propyl alcohol
Pyridine
Soda
Sodium bicarbonate
Sodium bisulphate
Sodium bisulphite
Sodium carbonate
Sodium chlorate
Sodium chloride 10%
Sodium hydrate 1%
Sodium hydrate 10%
Sodium hypo chloride
Sodium sulphate
Sodium sulphide
Sulphoral chloride
Sulphur dioxide
Sulphuric acid at 50%
Sulphuric acid 70%
Sulphurous acid 10%
Styrol
Sulphur
Synthetic saliva
Synthetic sweat
Tartaric acid
Tetrachlorethane
Tetrahydrofuran
Tetralin
Thricloroacetic acid
Thrimetilic acid
Tiophen
Toluol
Tri cresyl phosphate

Trichlorethylamine
Trichlorethylphosphate
Trichloro-ethylene
Triethanolamine
Turpentine
Urea
Vinyl acetate
Water
Xylene
Zinc chloride
Zinc oxide
Zinc sulphate

DETERGENTS

Ajax
Bleach
Calgonit
Dor
Fewa
Horoliht M
Impact
Into-Fensterklar
Laundry soap
Natril
Omo
P3 Aseptol
Parifex 2%
Persil
Pril
Rapdosept
Rei
Riseptin
Sidolin
Somat
Suwa
Tiba
Trisilin F
WK 60

DISINFECTANTS

Baktol
Carboxylic Acid
Chloramine
DDT
Delegol
Dimamin
Hydrogen peroxide 10%
Lysoform 2%
Maktol
Menfen
Oktozon 1%
Perhydrol
Pure alcohol
Resorcina 1%
Sagrotan 5%
Sublimate
TB-Lysoform
Tincture of iodine
Trosilin G extra 1,5%
Zephinol

FOODS

Apple juice
Beer
Beet
Bovine tallow
Butter
Castor oil
Chocolate
Cinnamon
Clove
Coffee

Cognac
Cucumbers
Fish
Fruit juice
Gin
Glucose
Grapefruit juice
Lard
Linseed oil
Liquors
Liver oil
Maggi
Margarine
Meat
Mustard
Nutmeg
Olive oil
Onions
Orange juice
Pimento
Raspberry syrup
Rum
Salt
Tea
Tobacco
Tomato sauce
Vanilla
Vegetable juices
Vegetable oils
Vinegar
Vodka
Wine

OILS AND FATS

Aral BG
Baysolin
BP Energol
Brake liquid
Brunofix
Camphor oil
Combustible oil
Darina
Diesel oil
Drill oil
Esso Estic
Machine oil
Mobil DTE
Molikote
Oily paint
Paraffin oil
Polyran
Rhenocalor N
Shell Spirax 90
Shell Tellus 11-33
Silicone oil
Skydrol
Texano Regal
Turpentine oil

PHARMACEUTICALS

Ambra solare
Blood plasma
Conditioner
Hydroplex
Lanoline
Methanol 90%
Nailpolish solvent
Odol mouthwash
Periston
Vaseline
Wick-Vaporuf



Recommended Loading

Thickness	Wall Structure	Length (inch)	Maximum Deflection 1"											
			Load (lb./ft ²)											
			15	30	45	60	15	30	45	60	15	30	45	60
			2' Width				4' Width				6' Width			
6mm, 1/4"	Twin, Triple		25	21	20	15	18	16	-	-	18	-	-	-
8mm, 5/16"	Twin, Triple		31	22	18	16	21	17	-	-	20	-	-	-
10mm, 3/8"	Twin, Triple		98	34	26	23	27	21	19	17	24	21	18	-
16mm, 5/8"	Five		118	66	36	30	32	24	21	18	29	23	20	18
25mm, 1"	Five		465	150	126	120	44	32	29	26	37	29	26	19
32mm, 1-1/4"	Five M		465	197	146	110	50	37	31	28	40	32	29	25
35mm, 1-3/8"	Five M		465	236	157	118	58	42	34	31	44	33	30	26

Thickness	Wall Structure	Length (inch)	Maximum Deflection 2"											
			Load (lb./ft ²)											
			15	30	45	60	15	30	45	60	15	30	45	60
			2' Width				4' Width				6' Width			
6mm, 1/4"	Twin, Triple		66	27	23	16	22	17	-	-	20	-	-	-
8mm, 5/16"	Twin, Triple		65	33	24	18	25	19	-	-	22	-	-	-
10mm, 3/8"	Twin, Triple		132	67	45	36	34	26	23	21	26	23	20	-
16mm, 5/8"	Five		177	98	54	41	41	30	26	23	35	27	23	19
25mm, 1"	Five		465	164	146	133	70	43	37	32	44	35	31	20
32mm, 1-1/4"	Five M		465	217	162	134	88	50	40	36	49	39	34	27
35mm, 1-3/8"	Five M		465	297	189	148	108	62	47	41	55	42	37	28

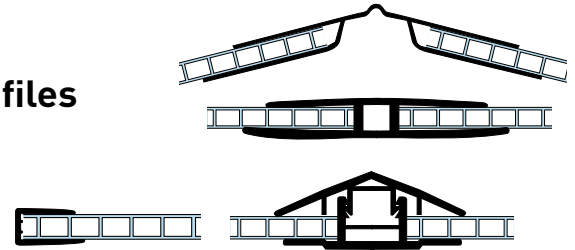
Thickness	Wall Structure	Length (inch)	Maximum Deflection 3"											
			Load (lb./ft ²)											
			15	30	45	60	15	30	45	60	15	30	45	60
			2' Width				4' Width				6' Width			
6mm, 1/4"	Twin, Triple		106	32	26	17	26	18	-	-	21	14	-	-
8mm, 5/16"	Twin, Triple		98	44	30	19	29	21	-	-	23	16	12	-
10mm, 3/8"	Twin, Triple		165	100	63	49	40	31	27	25	28	25	21	14
16mm, 5/8"	Five		236	130	71	51	50	36	31	28	40	31	25	20
25mm, 1"	Five		465	177	165	146	96	54	44	38	51	41	36	21
32mm, 1-1/4"	Five M		465	236	177	157	126	62	48	44	58	45	39	28
35mm, 1-3/8"	Five M		465	357	221	177	157	82	60	50	65	50	44	29

The information contained in these charts has been drafted on the basis of our best knowledge. CO-EX reserves the right to change specifications and data, without notice, if deemed necessary in the evolution of its products. It is the sole responsibility of the customer to confirm with their own architect, engineer or other professional consultants that the materials offered for sale meet the requirements and specifications of the particular project and use for which they are being purchased.



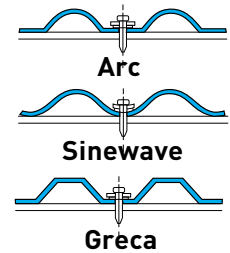
Macrolux Polycarbonate Profiles

CO-EX Macrolux Profiles are available to get the best performance from Macrolux sheeting. The U-profile closes the cut edge of the multi-wall sheet while the H, Snap-H and Ridge Profiles make joining simple and efficient.



Rooflite Corrugated Polycarbonate

Rooflite® polycarbonate corrugated sheet provides design professionals, greenhouse growers, and do-it-yourselfers with an easily fabricated and installed building product. Unique physical, mechanical, thermal and optical properties combine to make Rooflite flexible and strong yet light in weight.



Rooflite MB Corrugated Skylight

The Rooflite MB® panel is designed to match typical metal building profiles in both 9" and 12" patterns, so it easily creates skylights and sidelights. Rooflite MB features all the benefits of our standard Rooflite corrugated panels.



BDL Translucent Polycarbonate Multi-Wall Panel Systems

CO-EX's BDL® is a system of standing seam modular panels used to create vertical and sloped glazing. It is suited for a range of applications from curved skylights to interiors. Thanks to its variety of accessories, the system is complete, versatile, lightweight and easy to install.



Modulit 500 LP Wall System

CO-EX MODULIT 500 LP® system is suitable for any translucent glazing application such as clerestory glazing, external translucent walls and internal translucent partitions.



The data shown here is subject to change without notice at the discretion of CO-EX Corporation. It is the sole responsibility of the customer to confirm with their own architect, engineer or other professional consultants that the goods offered for sale by CO-EX Corporation meet the requirements and specifications of the particular project and use for which they are being purchased.

Call today for more information! (800) 888-5364