



PVC CONSTRUCTION GRANULES

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PVC GRANULES FOR CONSTRUCTION INDUSTRY

PVC granules are widely used in the construction. Various kinds of Rigid PVC granules are used to produce pipes and fittings, door and window profiles, electrical ducts, PVC shutters, etc. On the other hand, soft PVC granules are used to produce waterstop, door & window gaskets, PVC injection parts that are used to decorate cabinets, etc.

With the benefit of the highly creative R&D team, at PlasticKar, we have produced and offered various products for use in the construction industry as follows:

- PVC pipes
- PVC pipe fittings
- PVC door and window profiles
- Door and window gaskets
- Electrical ducts
- PVC shutters
- Injection cabinet parts (PVC flower)
- Waterstop



PVC PIPE (POLICA PIPE)



PVC pipes are used in many projects of water supply, electricity, sewage and fluid transfer. Important features of these pipes are resistance against impact, corrosion, chemicals and environmental erosion and recyclability.

To produce PVC pipes, rigid granules or UPVC compounds and special additives are used to increase the desired properties.

Product Name	PVC pipe granules
Other Names	Polica pipe granules – UPVC pipe compounds
Product Code	GBPIP-N (Natural)
Application	PVC Pipe Production
Features	<ul style="list-style-type: none"> ▪ Production based on Global Standards ▪ Production based on customer requested mechanical properties
Color	Milky Production capability in diverse colors according to customer request.
Packaging	In 25 kg bags of transparent polyethylene and finally bags are packed on wooden pallets. The weight of the pallets is approximately 1250 kg. The package can be changed according to customer request.

Technical Data sheet

Product Code: GBPIP-N

Application: Building – PVC Pipe

Color: Milky (Colorless/Natural)

Form: Granule

Packaging: 25 KG PE Bag / Palletized

Storage: Dry place, away from sun shine and temperature lower than 30°C

Properties	Test Method	Units	Typical Value
Tensile strength	ASTM-D638	N/mm ²	27±0.5
Elongation at break	ASTM-D638	%	22±10
Gravity	ASTM-D1895	G/CM ³	1.67±0.03
Hardness	ASTM-D2240	Shore D	75±2
Thermal stability at 200°C	ASTM-D749	MIN	50

Processing Conditions:

The following temperature profile is recommended as a guide line.

Barrel Temperature: (±10 °C)			
Zone 1	Zone 2	Zone 3	Zone 4
180	190	200	210

These data, which are based on test results of major sample lots, are believed to be reliable. However, due to variation in ways of handling by consumers, recommendations are made without guarantee. These data are to be served only as a guide. The user must, by test or otherwise, determine suitability for this purpose. Our standard term and conditions of sale apply exclusively to all orders. No one is authorized by us to make oral warranties. We reserve the right to make changes without notice or obligation in our products and publications.

UPVC PIPE FITTING



One of the most widely used granules in the construction industry is UPVC or rigid granules for the production of PVC pipe fittings.

These compounds have to be highly resistant to impact, corrosion, chemicals and environmental erosion.

Product Name	PVC Pipe fitting granules
Other Names	UPVC pipe fitting
Product Code	GBFIT-W (White)
Application	UPVC Pipe Fittings Production
Features	<ul style="list-style-type: none"> ▪ Production based on Global Standards ▪ Production based on customer requested mechanical properties
Color	White Production capability in diverse colors according to customer request.
Packaging	In 25 kg bags of transparent polyethylene and finally bags are packed on wooden pallets. The weight of the pallets is approximately 1250 kg. The package can be changed according to customer request.

Technical Data sheet

Product Code: GBFIT-W

Application: Building – UPVC Pipe Fitting

Color: White

Form: Granule

Packaging: 25 KG PE Bag / Palletized

Storage: Dry place, away from sun shine and temperature lower than 30°C

Properties	Test Method	Units	Typical Value
Tensile strength	ASTM-D638	N/mm ²	26.8±0.5
Elongation at break	ASTM-D638	%	42±10
Gravity	ASTM-D1895	G/CM ³	1.45±0.03
Hardness	ASTM-D2240	Shore D	76±2
Thermal stability at 200°C	ASTM-D749	MIN	50

Processing Conditions:

The following temperature profile is recommended as a guide line.

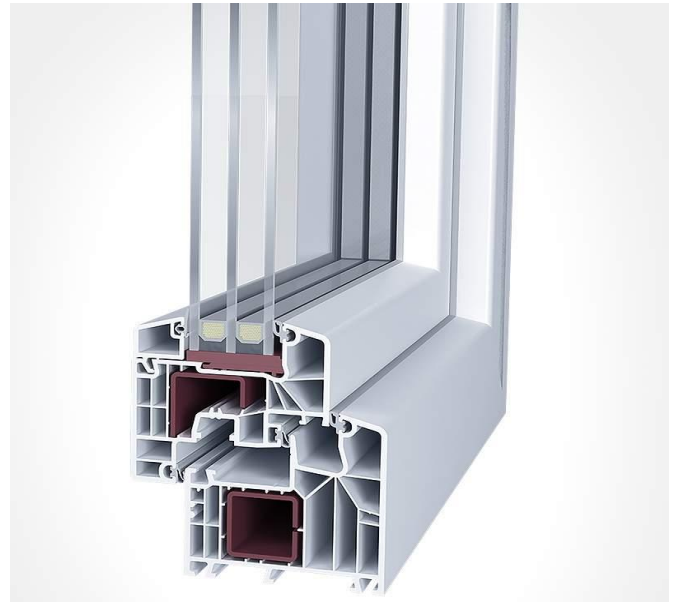
Barrel Temperature: (±10 °C)			
Zone 1	Zone 2	Zone 3	Zone 4
180	190	200	210

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UPVC DOOR & WINDOW PROFILES

UPVC door and window profiles are building products that are very common nowadays.

Important features of door and window profiles include resistance against UV rays, impact and abrasion.



Product Name	UPVC door & window profiles
Other Names	UPVC compounds for profiles
Product Code	GBPRF-W (White)
Application	UPVC door & window profile Production
Features	<ul style="list-style-type: none"> ▪ Production based on Global Standards ▪ Production based on customer requested mechanical properties
Color	White Production capability in diverse colors according to customer request.
Packaging	In 25 kg bags of transparent polyethylene and finally bags are packed on wooden pallets. The weight of the pallets is approximately 1250 kg. The package can be changed according to customer request.

Technical Data sheet

Product Code: GBPRF-W

Application: Building – UPVC Door and Window Profile

Color: White

Form: Granule

Packaging: 25 KG PE Bag / Palletized

Storage: Dry place, away from sun shine and temperature lower than 30°C

Properties	Test Method	Units	Typical Value
Tensile strength	ASTM-D638	N/mm ²	34±0.5
Elongation at break	ASTM-D638	%	20±10
Gravity	ASTM-D1895	G/CM ³	1.62±0.03
Hardness	ASTM-D2240	Shore D	75±2
Thermal stability at 200°C	ASTM-D749	MIN	50

Processing Conditions:

The following temperature profile is recommended as a guide line.

Barrel Temperature: (±10 °C)			
Zone 1	Zone 2	Zone 3	Zone 4
180	190	200	210

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PVC DOOR & WINDOW GASKETS

Gaskets have different cross sections according to the shape of the door and window profiles, whose task is to hold and fasten the glass on the door and window profiles.

Gaskets are usually black in color and have a high degree of flexibility.



Product Name	PVC door & window gaskets
Other Names	PVC compound for gasket
Product Code	GBGAS-B (Black)
Application	PVC door & window gaskets Production
Features	<ul style="list-style-type: none"> ▪ Production based on Global Standards ▪ Production based on customer requested mechanical properties
Color	Black Production capability in diverse colors according to customer request.
Packaging	In 25 kg bags of transparent polyethylene and finally bags are packed on wooden pallets. The weight of the pallets is approximately 1250 kg. The package can be changed according to customer request.

Technical Data sheet

Product Code: GBGAS-B

Application: Building – Door and Window Gasket

Color: Black

Form: Granule

Packaging: 25 KG PE Bag / Palletized

Storage: Dry place, away from sun shine and temperature lower than 30°C

Properties	Test Method	Units	Typical Value
Tensile strength	ASTM-D638	N/mm ²	12.5±0.5
Elongation at break	ASTM-D638	%	360±10
Gravity	ASTM-D1895	G/CM ³	1.32±0.03
Hardness	ASTM-D2240	Shore A	72±2
Thermal stability at 200°C	ASTM-D749	MIN	120
Operating Temperature	---	°C	120
Properties after aging 7 days at 100°C			
Tensile strength	ASTM-D638	N/mm ²	11±0.5
Elongation at break	ASTM-D638	%	320±10

Processing Conditions:

The following temperature profile is recommended as a guide line.

Barrel Temperature: (±10 °C)			
Zone 1	Zone 2	Zone 3	Zone 4
160	170	175	180

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PVC SHUTTERS

Rigid PVC granules (UPVC) are used to produce PVC shutters. This product is one of the emerging products of the plastic industry, which is a suitable alternative to its metal type due to its high resistance to impact and UV rays, ease of production, installation and transportation, as well as economic advantage.



Product Name	PVC shutter
Other Names	UPVC compound for roller shutter
Product Code	GEDU-E (White)
Application	PVC roller shutter Production
Features	<ul style="list-style-type: none"> ▪ Production based on Global Standards ▪ Production based on customer requested mechanical properties
Color	White Production capability in diverse colors according to customer request.
Packaging	In 25 kg bags of transparent polyethylene and finally bags are packed on wooden pallets. The weight of the pallets is approximately 1250 kg. The package can be changed according to customer request.

Technical Data sheet

Product Code: GEDU-W

Application: Building – UPVC roller Shutter

Color: White

Form: Granule

Packaging: 25 KG PE Bag / Palletized

Storage: Dry place, away from sun shine and temperature lower than 30°C

Properties	Test Method	Units	Typical Value
Tensile strength	ASTM-D638	N/mm ²	32±0.5
Elongation at break	ASTM-D638	%	25±10
Gravity	ASTM-D1895	G/CM ³	1.61±0.03
Hardness	ASTM-D2240	Shore D	79±2
Thermal stability at 200°C	ASTM-D749	MIN	50

Processing Conditions:

The following temperature profile is recommended as a guide line.

Barrel Temperature: (±10 °C)			
Zone 1	Zone 2	Zone 3	Zone 4
180	190	200	210

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PVC DECORATIVE INLAYS



Nowadays, PVC inlays are very popular.

These PVC inlays are used to decorate cabinets.

Proper flexibility, water resistance, easy and low cost production, make it a good alternative for woodcarving.

Product Name	PVC Inlays
Other Names	PVC granules for decorative inlays
Product Code	GBGOL-N (Milky)
Application	PVC Inlays Production
Features	<ul style="list-style-type: none"> ▪ Production based on Global Standards ▪ Production based on customer requested mechanical properties
Color	Milky Production capability in diverse colors according to customer request.
Packaging	In 25 kg bags of transparent polyethylene and finally bags are packed on wooden pallets. The weight of the pallets is approximately 1250 kg. The package can be changed according to customer request.

Technical Data sheet

Product Code: GBGOL-N

Application: Building – PVC Decorative Flowers

Color: Milky (Colorless/Natural)

Form: Granule

Packaging: 25 KG PE Bag / Palletized

Storage: Dry place, away from sun shine and temperature lower than 30°C

Properties	Test Method	Units	Typical Value
Tensile strength	ASTM-D638	N/mm ²	4.5±0.5
Elongation at break	ASTM-D638	%	190±10
Gravity	ASTM-D1895	G/CM ³	1.75±0.03
Hardness	ASTM-D2240	Shore A	74±2
Thermal stability at 200°C	ASTM-D749	MIN	90
Operating Temperature	---	°C	90
Properties after aging 7 days at 100°C			
Tensile strength	ASTM-D638	N/mm ²	4±0.5
Elongation at break	ASTM-D638	%	170±10

Processing Conditions:

The following temperature profile is recommended as a guide line.

Barrel Temperature: (±10 °C)			
Zone 1	Zone 2	Zone 3	Zone 4
165	170	180	185

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PVC WATERSTOP

Waterstop is an element used in concrete structures that is installed to prevent the penetration of liquids in its. Waterstops work in such a way that they lengthen the flow path and movement of water or other liquids so that water cannot penetrate.

Among the most important quality features of PVC waterstop are high elongation, tensile strength and also high durability in various conditions, including alkaline environments, which must comply with standard requirements.

PVC waterstop prevents any liquids from entering the concrete by being placed in concrete joints as a waterproof sealant.



Product Name	PVC waterstop
Other Names	PVC granules for waterstop
Product Code	GBWS-N (Milky)
Application	PVC Waterstop Production
Features	<ul style="list-style-type: none"> ▪ Production based on Global Standards ▪ Production based on customer requested mechanical properties
Color	Milky Production capability in diverse colors according to customer request.
Packaging	In 25 kg bags of transparent polyethylene and finally bags are packed on wooden pallets. The weight of the pallets is approximately 1250 kg. The package can be changed according to customer request.

Technical Data sheet

Product Code: GBWS-N

Application: Building – PVC Waterstop

Color: Milky (Colorless/Natural)

Form: Granule

Packaging: 25 KG PE Bag / Palletized

Storage: Dry place, away from sun shine and temperature lower than 30°C

Properties	Test Method	Units	Typical Value
Tensile strength	ASTM-D638	N/mm ²	12.5±0.5
Elongation at break	ASTM-D638	%	420±10
Gravity	ASTM-D1895	G/CM ³	1.19±0.03
Hardness	ASTM-D2240	Shore A	64±2
Thermal stability at 200°C	ASTM-D749	MIN	100
Operating Temperature	---	°C	100
Properties after aging 7 days at 100°C			
Tensile strength	ASTM-D638	N/mm ²	11±0.5
Elongation at break	ASTM-D638	%	390±10

Processing Conditions:

The following temperature profile is recommended as a guide line.

Barrel Temperature: (±10 °C)			
Zone 1	Zone 2	Zone 3	Zone 4
165	170	180	185

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