



1. V-BELTS

Gates Predator V-belts are the markets leading heavy duty V-belts. Unique in their extreme robustness and high load carrying capability they are unrivalled. They are excellent problem solvers that perform well in harsh environments and in extremely demanding applications where standard V-belts have performance issues. The Predator belt difference is in the construction: they have the highest power density of any V-belt and virtually zero stretch because of the use of high strength, high modulus aramid tensile cords.

CONSTRUCTION

- Aramid tensile cords provide extraordinary strength, durability and virtually zero stretch.
- Double fabric cover offers extreme abrasion and wear resistance.
- Specially treated extra tough cover withstands slip and shear forces at peak loads without generating excessive heat and resists penetration by foreign materials.
- Improved rubber compounds provide superbe oil and heat resistance.
- Non-rubber Bare back surfaced cover allows momentary slippage due to excessive overloads without damaging the belt.

BENEFITS

- At least 40% higher power ratings than standard construction V-belts.
- No need for constant belt re-tensioning: less maintenance, less downtime.
- Excellent problem solver.
- Static conductive (ISO 1813 - with the exception of 8VP) and can as such be used in the conditions described in the Directive 2014/34/EU- ATEX.
- Available on demand in Matched sets. Contact Customer Service for details.
- REACH and RoHS 2 compliant.
- Temperature range: -30 °C to +60 °C.

Please refer to p. 63 for size list.

Sections and nominal dimensions

Section	Width (mm)	Height (mm)	Length range (datum length - mm)
SPBP/5VP	16	13	1500 - 8000
SPCP	22	18	2000 - 10600
8VP	26	23	4064 - 9017

PREDATOR™ SPBP & SPCP also available in PowerBand™ version p. 14.

Ordering code

SPBP3350
SPB - Section
P - Predator version
3350 - Datum length (mm)

NOTE: For correct design and tensioning of the belt please use Gates DesignFlex™ Pro™ Drive design software, available on www.Gates.com.

Identification

Durable silver marking indicating the belt type and white marking indicating the belt dimensions.



By using innovative minimal-stretch cord technology, Gates Quad-Power™ 4 bandless V-belts are free of maintenance. Unlike conventional belts, the Quad-Power™ 4 V-belt does not suffer from severe tension decay in the first hours after installation. So no run-in period nor any re-tensioning are required. This new generation of **SERVICE FREE EPDM** belts are designed to extend product life time eliminating costly downtime for re-tensioning, repair and replacement.

CONSTRUCTION

- Minimal-elongation polyester tensile cords allow for stable tension over the entire lifetime.
- Blue adhesion layer for an extra strong bonding of the tensile cords and the rubber compound.
- Optimized notch form for reduced bending stress and improved efficiency.
- New generation EPDM rubber compound to ensure a long service life and a wear-resistant belt under extreme temperatures.

BENEFITS

- Energy efficiencies up to 98%.
- Less downtime.
- Fewer replacements.
- Higher performance.
- Wider temperature range.
- Halogen-free belt.
- A clear branding for ease of identification.
- Perfect fit on standard ISO/DIN V-pulleys and 3VX/5VX for RMA pulley grooves.
- REACH and RoHS 2 compliant.
- Static conductive (ISO 1813) and can as such be used in the conditions described in the Directive 2014/34/EU- ATEX.
- **Match** system: all sizes meet Gates **UNISET** tolerances, they can be installed without matching.
- Temperature range: -50 °C to +130 °C.

Please refer to p. 66 for size list.

Ordering code

XPZ600
XPZ - Section
600 - Datum length (mm)

3VX238
3VX - Section
238 - Effective length (inch 23.8)

NOTE: For correct design and tensioning of the belt please use Gates DesignFlex™ Pro™ Drive design software, available on www.Gates.com.

Identification

Durable blue marking indicating the belt type and white marking indicating the belt dimensions.

Sections and nominal dimensions

Section	Width (mm)	Height (mm)	Length range (datum length - mm)
XPZ/3VX	10	8	600 - 3550
XPA	13	10	690 - 4000
XPB/5VX	16	13	1000 - 5070
XPC	22	18	1900 - 5000

Quad-Power™ 4 XPZ, XPA & XPB also available in PowerBand™ version p. 15.

The Gates Super HC™ V-belt combines the strength of a wrapped belt construction with the economies of a narrow section V-belt. It transmits more power in a given space and allows more compact drive design than classical section V-belts. In short, it offers you more power and considerably reduces the space needed. This significantly cuts the overall drive cost. Super HC™ V-belts also have exclusive Gates construction features for longer life on your drives!

CONSTRUCTION

- Arched top, concave sidewalls and rounded corners provide uniform tensile loading and uniform pulley sidewall contact for excellent belt service and reduced pulley wear.
- The Flex-Weave oil and heat resistant cover protects the belt.
- The vulcanised Flex-bonded tensile cords provide superior resistance to tensile and flexing forces, fatigue and shock loads.
- The belt will not catch fire from heat buildup, even with severe slippage.
- Static conductive (ISO 1813) and can as such be used in the conditions described in the Directive 2014/34/EU- ATEX.

BENEFITS

- Excellent performance/cost ratio.
- More compact design compared to classical section V-belts.
- Cost and space savings by reducing size of pulleys, bearings, guards and mounts.
- Improved belt life reducing expensive maintenance time.
- **Match** system: all sizes meet Gates **UNISSET** tolerances, they can be installed without matching.
- REACH and RoHS 2 compliant.
- Temperature range: -30 °C to +60 °C.

Please refer to p. 75 for size list.

Sections and nominal dimensions

Section	Width (mm)	Height (mm)	Length range (datum length - mm)
SPZ/3V	10	8	487 – 3750
SPA	13	10	732 – 5000
SPB/5V	16	13	1250 – 8000
SPC	22	18	2000 – 16500
8V	26	23	2540 – 14225

SPB, SPC also available in PowerBand™ version p. 16 or aramid cord construction p. 6.

Ordering code

SPZ1060/3V420
 SPZ - Section
 1060 - Datum length (mm)
 3V - Section
 420 - Effective length (42.0 inch)

NOTE: For correct design and tensioning of the belt please use Gates DesignFlex™Pro™ Drive design software, available on www.Gates.com.

Identification

Durable yellow marking indicating the belt type and white marking indicating the belt dimensions.

04 SUPER HC™ MN

RAW EDGE, MOULDED NOTCH NARROW SECTION V-BELT



Super HC™ MN V-belts put more power where high speeds, high speed ratios or small pulley diameters are required, offering significant benefits over classical section V-belts. Developed through specialised research, Super HC™ MN is highly recommended for use on all industrial heavy-duty, narrow section V-belt drives. With an increased transmission efficiency this belt allows for a more compact and highly economical drive design. Super HC™ MN belts are available up to 4750mm ISO datum lengths.

CONSTRUCTION

- MN = Moulded Notches reduce and evenly distribute thermal and bending stresses. The moulded notch pattern also reduces noise.
- Precision-ground straight sidewalls give a uniform wedging action and ensure the belt fits correctly in the pulley grooves.
- Back idlers can be used.
- Flex-bonded tensile cords are vulcanised as one solid unit making the belt highly resistant to tensile and flexing forces, fatigue and shock loads.
- Elastomeric compound protects the belt against heat, ozone and sunlight.
- Even with severe slippage, the belt will not catch fire from heat build-up.
- Static conductive (ISO 1813) and can as such be used in the conditions described in the Directive 2014/34/EU- ATEX.

BENEFITS

- Excellent performance/cost ratio.
- More compact design compared to classical section V-belts.
- Cost and space savings by reducing size of pulleys, bearings, guards and mounts.
- Improved belt life reducing expensive maintenance time.
- **Match** system: all sizes meet Gates **UNISSET** tolerances, they can be installed without matching.
- REACH and RoHS 2 compliant.
- Temperature range: -30 °C to +60 °C.



Please refer to p. 85 for size list.

Ordering code

SPZ560MN
SPZ - Section
560 - Datum length (mm)
MN - Moulded notch

NOTE: For correct design and tensioning of the belt please use Gates DesignFlex™ Pro™ Drive design software, available on www.Gates.com.

Identification

Durable yellow marking indicating the belt type and white marking indicating the belt dimensions.

Sections and nominal dimensions

Section	Width (mm)	Height (mm)	Length range (datum length - mm)
SPZ-MN	10	8	560 – 3550
SPA-MN	13	10	732 – 4000
SPB-MN	16	13	1250 – 4750
SPC-MN	22	18	2000 – 4750



Gates Tri-Power™ V-belt is built for superior performance on heavy duty drives of classical crosssection. The raw edge construction and special notch design makes the Tri-Power™ belt especially suited for drives requiring small diameter pulleys and back idlers. The ethylene EPDM compound allows the belt to handle extreme temperatures up to +120 °C.

CONSTRUCTION

- This is a classical section/profile construction.
- Static conductive to ISO and RMA standards for use in explosive environments.
- Flex Bonded tensile cords for resistance to bending stress and separation.
- Cross oriented fiber loaded rubber compound for flexibility and stability.
- Static conductive (ISO 1813) and can as such be used in the conditions described in the Directive 2014/34/EU- ATEX.
- EPDM rubber compound to ensure a long service life and a wear-resistant belt under extreme temperatures.

BENEFITS

- Notched construction to allow bending around small pulley diameters.
- **Match** system: all sizes meet Gates **UNISSET** tolerances, they can be installed without matching.
- Raw edge, molded notch construction saves up to 3% on energy costs over wrapped belts.
- Improved flexibility for increased performance on small pulley diameters.
- REACH and RoHS 2 compliant.
- Temperature range: -50 °C to +120 °C.



Please refer to p. 93 for size list.

Ordering code

AX39
AX - Section
39 - Inside length (inch)

NOTE: For correct design and tensioning of the belt please use Gates DesignFlex™ Pro™ Drive design software, available on www.Gates.com.

Identification

Durable red marking indicating the belt type and white marking indicating the belt dimensions.

Sections and nominal dimensions

Section	Width (mm)	Height (mm)	Length range (effective length - mm)
AX	13	8	585 - 4445
BX	17	11	610 - 9221
CX	22	14	1397 - 9246

The wrapped classical section Hi-Power™ V-belt has a long reputation for reliability on agricultural and industrial applications. The arched top of the Hi-Power™ belt provides superior strength to prevent “dishing” and distortion of the tensile section. The cords are properly aligned, each of them carrying its full share of the load.

CONSTRUCTION

- Arched top, concave sidewalls and rounded corners provide uniform tensile loading and uniform pulley sidewall contact for excellent belt service life and reduced pulley wear.
- The Flex Weave oil and heat resistant cover protects the belt core from the toughest environments.
- The vulcanized Flex-bonded tensile cords provide superior resistance to tensile and flexing forces, fatigue and shock loads.
- High-quality rubber compound protects the belt against heat, ozone and sunlight.
- The belt will not catch fire from heat buildup, even with severe slippage.
- Static conductive (ISO 1813) and can as such be used in the conditions described in the Directive 2014/34/EU- ATEX.

Sections and nominal dimensions

Section	Width (mm)	Height (mm)	Length range (datum length - mm)
Z	10	6	425 - 2500
A	13	8	457 - 5000
B	17	11	650 - 11960
C	22	14	1080 - 10795
D	32	19	2500 - 16850
E	38	25	4650 - 15330

B, C & D sections also available in PowerBand™ version p. 16.

BENEFITS

- Excellent performance/cost ratio.
- Reliability and efficiency.
- Long belt life reducing replacement and maintenance costs.
- **Match** system: all sizes meet Gates **UNISET** tolerances, they can be installed without matching.
- REACH and RoHS 2 compliant.
- Temperature range: -30 °C to +60 °C.

Please refer to p. 99 for size list.

Ordering code

Z19
Z - Section
19 - Inside length (inch)

NOTE: For correct design and tensioning of the belt please use Gates DesignFlex™ Pro™ Drive design software, available on www.Gates.com.

Identification

Durable red marking indicating the belt type and white marking indicating the belt dimensions.

With Gates you are fully equipped to run strong, whatever you need. Besides our wide range of premium belts, we now also offer you Gates Delta standard V-belts. These standard V-belts stand for a sharp price and performance in combination with trusted Gates quality. They provide the cost-effective solution for all your standard industry drives. Gates Delta belts are made to run.

CONSTRUCTION

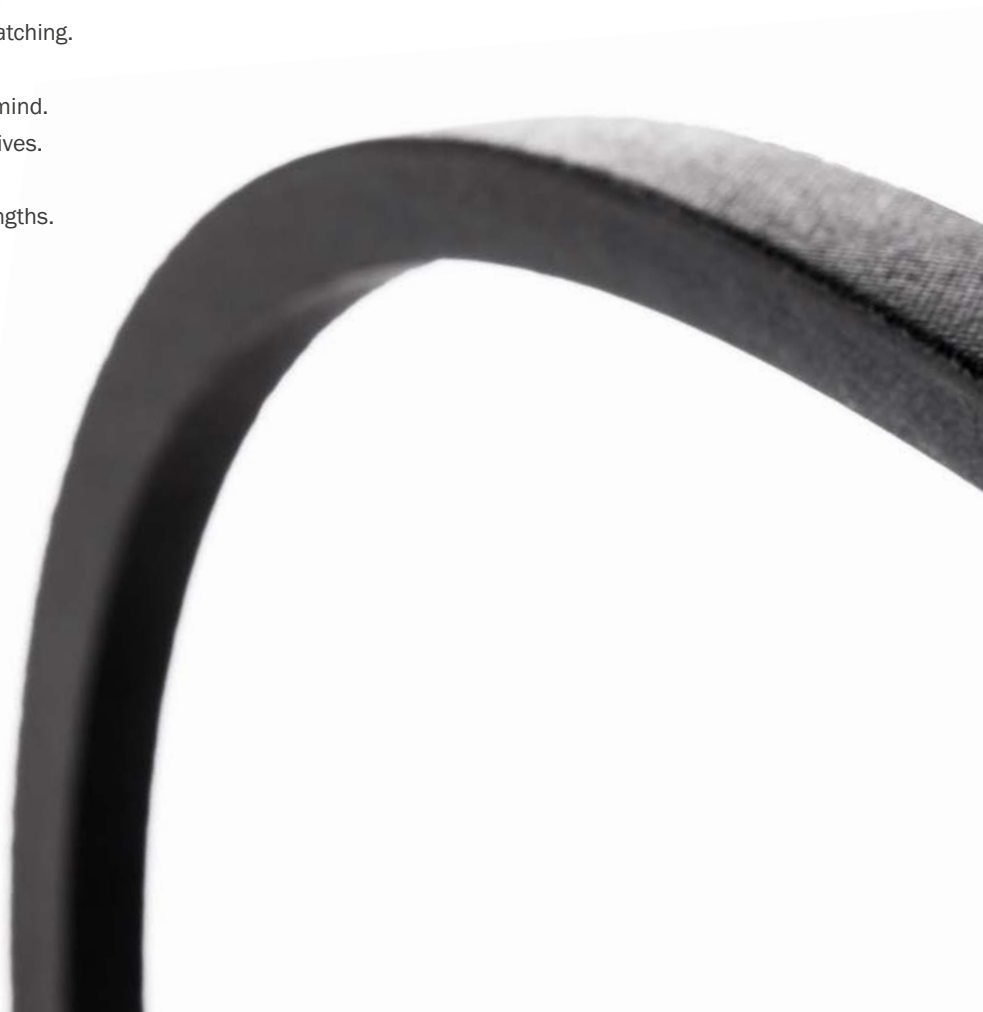
- Quality rubber belt body.
- High-strength polyester tensile cords providing resistance to flexing forces, fatigue and shock loads.
- Oil-resistant flip band offering good grip and protection against abrasion.
- Good belt flexibility, stability and smooth running operation guaranteed.
- Static conductive (ISO 1813) and can as such be used in the conditions described in the Directive 2014/34/EU- ATEX.

BENEFITS

- Made by Gates.
Delta is a 100% Gates brand.
- Made in Europe.
Trusted quality, 100% made in our own Gates European factories.
- Made to deliver.
Two V-belt profiles in a complete size range available at sharp prices.

PRODUCT FEATURES

- **Match** system: all sizes meet Gates **UNISET** tolerances, they can be installed without matching.
- Excellent price/performance ratio.
- Trusted Gates quality that equals peace of mind.
- Made to run in all your standard industry drives.
- REACH and RoHS 2 compliant.
- Available in all popular sections and belt lengths.
- Specified to operate in a temperature range from -30 °C to +70 °C.



07 DELTA RANGE



DELTA CLASSIC™

Delta Classic™ V-belts have a classical V-shaped profile and are built for a reliable and durable performance on all industry standard classical section drives used in compressors, pumps, aggregates, alternators, saw, milling, and processing machines. Just to name a few.

Ordering code
C62DELTA C - Section 62 - Inside length (inch) DELTA - Product name
Identification
Durable green marking indicating the belt type and white marking indicating the belt dimensions.

Please refer to p. 112 for size list.

Sections and nominal dimensions			
Section	Width (mm)	Height (mm)	Length range (inside length - mm)
Z	10	6	400 – 1803
A	13	8	425 – 5000
B	17	11	660 – 7110
C	22	14	1092 – 8532
D	32	19	2000 – 15240
E	38	25	3748 – 13918

DELTA NARROW™

Delta Narrow™ V-belts have a narrow section profile, making them the perfect option for all industry standard drives commonly referred to as narrow or deep wedge.

Ordering code
SPA732DELTA SPA - Section 732 - Datum length (mm) DELTA - Product name
Identification
Durable orange marking indicating the belt type and white marking indicating the belt dimensions.

Please refer to p. 125 for size list.

Sections and nominal dimensions			
Section	Width (mm)	Height (mm)	Length range (datum length - mm)
SPZ	10	8	562 – 3550
SPA	13	10	732 – 4500
SPB	16	13	1250 – 8000
SPC	22	18	2000 – 11200

Gates' Predator™ PowerBand™ belt design offers a solution for drives where single belts vibrate, turn over or jump off the pulleys. It consists of several V-belts joined together by a permanent, high-strength tie band allowing the belts to work together as one unit. The Predator™ Powerband™ belt is especially designed for demanding applications and harsh environments and offers a high resistance to vibration. Predator™ Powerband™ are available in SPBP, SPCP, 5VP/15JP and 8VP section.

CONSTRUCTION

- Narrow cross-sections.
- Strong tie band joins the back of all belts.
- Flex bonded aramid tensile cords.
- Double layer bare back fabric cover.
- Fibre-loaded compound for improved belt stability.
- Gates curves provide full contact with pulley grooves for uniform loading of cords, uniform wear and increased belt life.
- The belt will not catch fire from heat build-up, even with severe slippage.

BENEFITS

- At least 40% higher power ratings than standard construction V-belts.
- No need for constant belt re-tensioning.
- Aramid tensile cords easily handle shock loads.
- Less maintenance, less downtime.
- Excellent problem solver.
- Feature a multiple layer tie band that provides excellent lateral rigidity to prevent belts from turning over or from coming off the drive.
- Predator™ PowerBand™ belts are static conductive (ISO 1813) (except for 8VP) and can as such be used in the conditions described in the Directive 2014/34/EU- ATEX.
- Available on demand in matched sets. Contact Customer Service for details.
- REACH and RoHS 2 compliant
- Temperature range: -30 °C to +60 °C.

Please refer to p. 134 for size list.

Ordering code

SPBP3350/3
 SPB - Section
 P – Predator version
 3350 - Datum length (mm)
 3 - Number of ribs

NOTE: For correct design and tensioning of the belt please use Gates DesignFlex™ Pro™ Drive design software, available on www.Gates.com.

Identification

Durable silver marking indicating the belt type and white marking indicating the belt dimensions.

Sections and nominal dimensions

Section	Width (mm)	Height (mm)	Rib spacing/ Pitch (mm)	Available number of ribs	Length range (datum length - mm)
SPBP	16	13	19.0	2 ÷ 16	2120 – 8000
SPCP	22	18	25.5	2 ÷ 12	3000 – 11200
5VP/15JP	16	13	17.5	2 ÷ 16	1400 – 9000 effective length - mm
8VP/25JP	26	23	28.6	2 ÷ 12	2540 - 15240 effective length - mm

Gates PowerBand™ belts are engineered for drives that are subject to pulsating loads, shock loads or extreme vibrations. By joining several Quad-Power™ 4 V-belts together the Quad-Power™ 4 PowerBand™ offers a maintenance-free solution for drives where single belts vibrate, turn over or jump off the pulleys. It comes with all of the advantages of the single belt: this **SERVICE FREE EPDM** belts are designed to extend product life time eliminating costly downtime for re-tensioning, repair and replacement. Furthermore these belts offer a broad temperature operating range.

CONSTRUCTION

- Minimal-elongation polyester tensile cords allow for stable tension over the entire lifetime.
- PowerBand™ construction is built as one solid unit, controlling the belt-to-belt distance and preventing sideways bending. This provides excellent resistance against vibrations and shock loads.
- Flat back construction reduces noise when used with a back side idler or tensioner.
- EPDM rubber compound to ensure a long service life and a wear-resistant belt under extreme temperatures.

Please refer to p. 138 for size list.

Ordering code

XPB2500/2
XPB - Section
2500 - Datum length (mm)
2 - Number of ribs

NOTE: For correct design and tensioning of the belt please use Gates DesignFlex™ Pro™ Drive design software, available on www.Gates.com.

Identification

Durable blue marking indicating the belt type and white marking indicating the belt dimensions.

BENEFITS

- Service-free PowerBand™ V-belt with high stability on the toughest drives.
- Halogen-free belt.
- Perfect fit on standard ISO/DIN (for XPZ/XPA/XPB) or RMA (for 3VX/5VX) V-pulleys.
- Manufactured to DIN7753, ISO4184, RMA IP-22.
- Savings in drive space and weight thanks to high transmission efficiency.
- High stability and smooth running on the toughest drives.
- Important design economies possible.
- Static conductive (ISO 1813) and can as such be used in the conditions described in the Directive 2014/34/EU- ATEX.
- RoHS 2 and REACH compliant.
- **Match** system: all sizes meet Gates **UNISSET** tolerances, they can be installed without matching.
- Temperature range: -50 °C to +130 °C.

Sections and nominal dimensions

Section	Standard numbers of ribs				Rib spacing/ Pitch (mm)	Width (mm)	Height (mm)	Length range (datum length - mm)
	2	3	4	5				
XPZ	x	x	x		12.0	10	8	800 – 3550
XPA	x	x			15.0	13	10	800 – 4000
XPB	x	x			19.0	16	13	1250 – 4750
3VX*	x	x	x	x	10.3	10	8	635 – 3555 effective length – mm
5VX*	x	x	x	x	17.5	16	13	1270 – 5080 effective length – mm

*Branded as Super HC™ PowerBand™.

Gates Super HC™ PowerBand™ and Hi-Power™ PowerBand™ offer a solution for drives where single belts vibrate, turn over or jump off the pulleys. They consist of several V-belts joined together by a permanent, highstrength tie band offering a tougher more stable solution compared to a single belt.

CONSTRUCTION

- Strong band controls belt-to-belt distance and prevents sideways bending.
- Flex-bonded tensile cords are vulcanized as one solid unit making the belt highly resistant to tensile and flexing forces, fatigue and shock loads.
- Hi-Power™ PowerBand™ B, C and D sections are available on request.
- Concave sides and arched top.
- Flex-Weave™ cover protects the belt core from the toughest environments.
- Elastomeric compound protects the belt against heat, ozone and sunlight.
- Static conductive (ISO 1813) and can as such be used in the conditions described in the Directive 2014/34/EU-ATEX.
- Super HC™ PowerBand™ is available in SPB, SPC, 3V(9J), 5V(15J) and 8V(25J) sections.

BENEFITS

- Better resistance to vibrations.
- High stability and smooth running on the toughest drives.
- Important design economies possible.
- Savings in drive space and weight due to high transmission efficiency.
- Available on demand in Matched sets. Contact Customer Service for details.
- REACH and RoHS 2 compliant.
- Temperature range: -30 °C to +60 °C.

Sections and nominal dimensions

Section	Width (mm)	Height (mm)	Rib spacing/ Pitch mm	Available number of ribs	Length range (datum length - mm)
Super HC™ PowerBand™					
SPB	16	13	19.00	2 ÷ 16	2120 – 8000
SPC	22	18	25.50	2 ÷ 12	3000 – 11200
3V/9J	10	8	10.30	2 ÷ 30	1400 – 3550 effective length - mm
5V/15J	16	13	17.50	2 ÷ 16	1400 – 9000 effective length - mm
8V/25J	26	23	28.60	2 ÷ 12	2540 – 15240 effective length - mm
Hi-Power™ PowerBand™					
B	17	10	19.05	2 ÷ 12	935 – 8009 effective length - mm
C	22	12	25.40	2 ÷ 12	1598 – 10688 effective length - mm
D	32	19	36.53	2 ÷ 8	3132 – 16784 effective length - mm

Please refer to p. 143 for size list.

Ordering code

SPB2500/3
SPB - Section
2500 - Datum length (mm)
3 - Number of ribs

NOTE: For correct design and tensioning of the belt please use Gates DesignFlex™ Pro™ Drive design software, available on www.Gates.com.

Identification

Durable yellow marking (Super HC)/
Durable red marking (Hi Power) indicating.

Gates' Hi-Power™ Dubl-V belt is characterised by a double-V profile. It uses flex-bonded tensile cords, which are highly resistant to flexing forces, and a protective Flex-Weave™ cover. It is the ideal solution for “serpentine” drives (drives with counter rotating shafts) where power is transmitted from both the top and the bottom of the belts. This belt is designed with a unique recessed top and bottom to maintain sidewall contact, while remaining flexible for drives that require power transmission from both sides of the belt. Suitable for all industrial serpentine applications requiring rotation reversal on some driven shafts.

CONSTRUCTION

- Gates curves provide proper cord support and full contact with the sheave-groove for uniform loading, uniform wear, and increased belt life.
- Flex-Bonded cords are strongly bonded to the body of the belt resulting in equal load distribution and the absorption of bending stress without cord deterioration.
- The Flex-Weave™ cover is a patented construction for longer cover life, providing extended protection to the core of the belt from oil, dirt, and heat.
- Classical cross-section.

BENEFITS

- Power transmission from both sides of the belt.
- Premium performance.
- Suitable for dirty/dusty environments.
- Static conductive (ISO 1813) and can as such be used in the conditions described in the Directive 2014/34/EU- ATEX.
- **Match** system: all sizes meet Gates **UNISET** tolerances, they can be installed without matching. (Hi-Power™ Dubl-V DD not included in UNISET tolerances).
- Temperature range: -30 °C to +60 °C.

Please refer to p. 152 for size list.

Ordering code

AA51
AA - Section (double)
51 - Inside length (inch)

NOTE: For correct design and tensioning of the belt please consult with our application engineering team.

Identification

Durable white marking indicating the belt type and white marking indicating the belt dimensions.

Sections and nominal dimensions

Section	Width (mm)	Height (mm)	Length range (effective length - mm)
AA	13	10	1350 - 3290
BB	17	14	940 - 7635
CC	22	18	1980 - 10690
DD	32	25	6875 - 9160

Gates Multi-Speed™ belt provides top performance on variable speed drives. It adjusts itself to the pulley groove without difficulty, providing a wide range of speeds and speed ratios. In addition to the standard Multi-Speed™ belt line, special sizes (top width, thickness and angle) are available on request.

CONSTRUCTION

- Engineered notch contour increases flexibility. The notches ensure maximum heat dispersion, considerably decreasing running temperatures.
- Strong transverse rigidity offers high resistance to distortion of the belt in the pulley. This results in even load distribution and wear reduction.
- Uniform composition and thickness of the undercord ensure smooth and silent running.
- Combination of these construction features gives maximum speed adjustment.

BENEFITS

- Maximum range of speed changes.
- High load-carrying capacity.
- Smooth machine operation.
- Exceptionally long belt life.
- Temperature range: -30 °C up to +60 °C.

Sections and nominal dimensions

	Reference	Top width (mm)	Thickness (mm)	Angle (°)	Length range (inside length - mm)
Gates special size	13	13	6	26	600 – 900
	23	23	8	26	525 – 1500
	28	28	9	26	650 – 1600
	37	37	10	28	800 – 2240
	47	47	13	28	1000 – 2240
	Reference	Top width (mm)	Thickness (mm)	Angle (°)	Length range (datum length - mm)
ISO R1604 sizes	W16	17	6	24	630 – 1000
	W20	21	7	26	630 – 1250
	W25	26	8	26	710 – 1600
	W31.5	33	10	26	900 – 2000
	W40	42	13	28	1120 – 2500
	W50	52	16	28	1400 – 3150
	W63	65	20	30	1800 – 3150

Please refer to p. 157 for size list.

Ordering code

W16-630
 W16 - Section
 630 - Datum length (mm)

23X8-600
 23 - Section
 8 - Thickness (mm)
 600 - Inside length (mm)

NOTE: For correct design and tensioning of the belt please consult with our application engineering team.

Identification

Durable white marking indicating the belt type and white marking indicating the belt dimensions.

Powerated™ V-belt is recommended for heavy-duty drives and clutching applications. It meets the requirements of high power, clutching ability, heavy shock load absorption and back idler driven lawn and garden equipment.

CONSTRUCTION

- Aramid tensile cords combine limited stretch with extraordinary strength and durability.
- Low cord positioning in thin profile gives extreme flexibility.
- Distinct green color bareback low friction wrapping provide smooth clutching operation.
- Fabric reinforcement on the bottom ensures high crack resistance if back idler is used.

BENEFITS

- Smooth clutching and disengaging.
- Length stability.
- Special shock resistance.
- Special bending and crack resist.
- Temperature range: -30 °C up to +60 °C.



Please refer to p. 158 for size list.

Sections and nominal dimensions			
Section	Width (inch)	Height (inch)	Length range (outside length - mm)
3L	3/8	7/32	406 – 1549
4L	1/2	5/16	432 – 2972
5L	21/32	3/8	635 – 2515

Ordering code

3L16
 3L - Section
 16 - Outside length (inch)

NOTE: For correct design and tensioning of the belt please consult with our application engineering team.

Identification

Durable black marking indicating the belt type and black marking indicating the belt dimensions.

This compact and strong belt with nominal top width from 3mm to 11mm transmits more power and allows high speed ratios. Polyflex™ is suited for extremely small diameter pulleys and very compact drives with high rotational speeds. Ideal for use on machines and machine tools requiring high performance and smooth operation in limited space such as bench type milling machines, lathe drives, woodworking and metalworking machine spindle drives, computer peripheral equipment, small blowers, etc.

CONSTRUCTION

- High modulus, new formulated polyurethane compound, superior to conventional belt materials, offers high fatigue and wear resistance and a high friction coefficient. It also improves adhesion to the tensile cords.
- Polyurethane is extremely resistant to heat, chemicals and oil.
- Uniformity throughout Polyflex™ is ensured because the polyurethane compound is not layered but cast without overlaps for smooth running and low vibration.
- Ribbed top provides lateral rigidity without increasing bending stresses.
- The 60° angle results in better support of the tensile section, and provides a more even load distribution.

BENEFITS

- Design freedom and space savings which are not possible with conventional rubber construction belts.
- Low maintenance cost as belt needs less re-tensioning.
- Long belt life on compact drives.
- Available on demand as Matched sets. Contact Customer Service for details.
- Temperature range: -54 °C up to +85 °C.

Please refer to p. 163 for size list.

Ordering code

5M1250
 5M - Section
 1250 - Effective length (mm)

NOTE: For correct design and tensioning of the belt please use Gates DesignFlex™ Pro™ Drive design software, available on www.Gates.com.

Identification

Durable white marking indicating the belt type and white marking indicating the belt dimensions.

Sections and nominal dimensions

Section	Width (mm)	Height (mm)	Length range (effective length - mm)
3M	3	2.28	180 - 750
5M	5	3.30	280 - 1850
7M	7	5.33	500 - 2300
11M	11	6.85	710 - 2300

Polyflex™ JB™ is synonymous with high power density in small spaces. Developed by Gates and produced to patented manufacturing processes, these belts provide more load-carrying capacity at higher speeds to small multiple V-belt precision drives. This results in significant cost savings and improved design freedom. Polyflex™ JB™ belts are recommended for use on bench type milling machines, lathe drives, woodworking and metalworking machine spindle drives, computer peripheral equipment, small blowers, etc. They are available in 3M-JB, 5M-JB, 7M-JB and 11M-JB sections.

CONSTRUCTION

- JB = Joined Belt construction improves stability.
- Ribs relieve bending stress on small pulleys and provide lateral rigidity.
- The 60° angle provides more undercord support to the tensile section and distributes the load more evenly.
- Small cross-section meets special application needs such as high shaft speeds, small drive package size and smooth running requirements.
- High modulus polyurethane compound with a high friction coefficient.
- The precise casting method eliminates overlaps and layers.
- Excellent adhesion of tensile cords and polyurethane compound leads to high fatigue resistance and long belt life.
- Extra toughness. The polyurethane compound resists fatigue, wear and ozone.

BENEFITS

- Long belt life on small pulleys and compact drives.
- Greater shaft speeds, up to 30,000 rpm.
- High performance and smooth running for precision applications.
- Cost savings and design freedom.
- Avoids vibrations when subjected to shock loads.
- Available on demand in Matched sets. Contact Customer Service for details.
- Available on demand in MTQ (MTQ=Machine Tool Quality) execution (Except on 3M-JB). Contact Customer Service for details.
- Temperature range: -54 °C up to +85 °C.

**Please refer to p. 168
for size list.**

Sections and nominal dimensions

Section	Standard numbers of ribs				Width (mm)	Height (mm)	Rib spacing/ Pitch (mm)	Length range (effective length - mm)
	2	3	4	5				
3M-JB	x	x			3	2.28	3.35	175 – 750
5M-JB	x	x	x	x	5	3.30	5.30	280 – 1500
7M-JB	x	x	x	x	7	5.33	8.50	490 – 2293
11M-JB	x	x			11	7.06	13.20	692 – 2282

Other number of ribs available on request. For detailed info, please contact your Gates representative.

Ordering code

5M280/3
 5M - Section
 280 - Effective length (mm)
 3 - Number of ribs (joined belt)

NOTE: For correct design and tensioning of the belt please use Gates DesignFlex™ Pro™ Drive design software, available on www.Gates.com.

Identification

Durable white marking indicating the belt type and white marking indicating the belt dimensions.

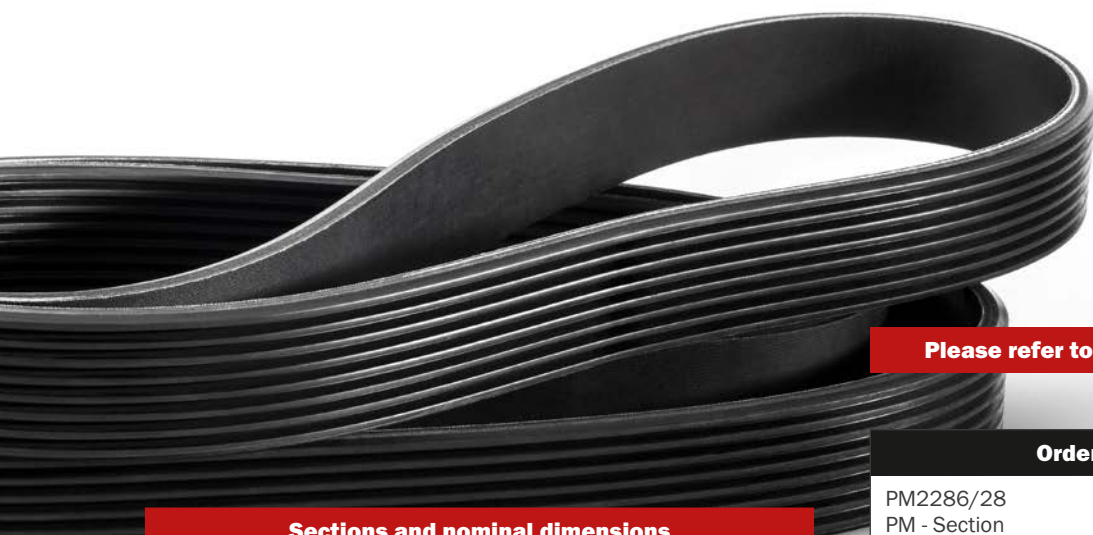
Gates Micro-V® belts ensure outstanding performance on any industrial multi-ribbed drive. They cover a multitude of industrial applications and are suitable for industrial drives in washing machines, textile machines, vacuum cleaners, lawn mowers, machine tools, medical equipment and many more. The full line of Micro-V® belt products includes slabs in several widths as well as single belts in PJ, PK, PL and PM sections in order to perfectly match customer requirements. Both slabs and belts can be manufactured in a great variety of number of ribs.

CONSTRUCTION

- Truncated ribs ensure flexibility, reduce heat build-up and improve rib crack resistance. They also enhance load-carrying capacity on small diameter pulleys.
- Can be installed on grooved DriveR and flat DriveN pulley.
- High modulus, low stretch polyester tensile member provides superior resistance to fatigue and shock loads.
- All elastomeric rubber compound provides oil and heat resistance.
- Belts will operate in standard pulleys provided the pulleys are manufactured to the DIN 7867 or ISO 9982 standard for the specific cross-section.
- Specially formulated fibre reinforced undercord that improves belt stability.

BENEFITS

- Extremely smooth and cool running.
- Very high power capacity per rib.
- Long life due to extra load-carrying capacity.
- Improved performance on back idlers.
- Smaller drive package.
- Tolerant of pulley groove debris.
- Static conductive (ISO 1813) and can as such be used in the conditions described in the Directive 2014/34/EU- ATEX (except PK profile).
- Temperature range:
 - 30 °C to +60 °C (PJ, PL, PM).
 - 50 °C to +120 °C (PK) (EPDM compound).



Please refer to p. 174 for size list.

Sections and nominal dimensions

Section	Height (mm)	Rib spacing (mm)
PJ	3.5	2.34
PK	4.45	3.56
PL	6.4	4.70
PM	12.7	9.40

Ordering code

PM2286/28
 PM - Section
 2286 - Effective length (mm)
 28 - number of ribs

NOTE: For correct design and tensioning of the belt please use Gates DesignFlex™ Pro™ Drive design software, available on www.Gates.com.

Identification

Durable yellow marking indicating the belt type and white marking indicating the belt dimensions.