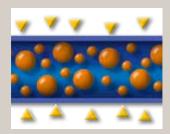
# Hoses and tubing range



# Always ideally connected.

#### Media

All liquid or gaseous media which flow through the hose or influence it from outside must be taken into account when choosing the hose. Chemicals can have detrimental effects (swelling, stress-cracking, etc.) on the hose materials. A prior test is therefore important. Your technical advisor will be happy to help you. For non-standard requirements, we advise you to test the hoses under operating conditions. In this way you can ensure that there are no adverse effects on the hose strength arising from extreme temperatures or chemical mixtures and the concentration thereof.



#### **Flexibility**

All thermoplastic materials are flexible up to a certain degree. Depending on the type, our hoses can therefore be used for a wide range of tasks. Ultraflexible hoses are suitable for applications with small bend radii and a high degree of movement. For example, relatively rigid or stronger tubing is the better choice for static applications with little movement but higher working pressures are required.



#### Flow

The flow quantity required by the attached consumer is an important criterion for hose selection. The appropriate choice of hose cross-section for the medium and flow volume is dependent on this.

As a rule of thumb: the flow rate of the hose must always be greater than the flow rate of all consumers in the circuit.



### **Working Pressure**

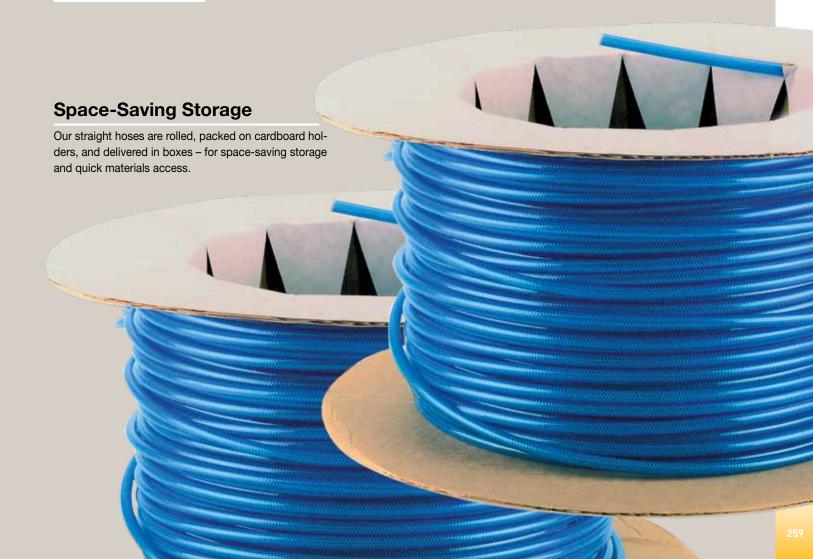
From the established bursting pressure at room temperature (20°C), integration of a working pressure design factor can be calculated. For the max. working pressure, all criteria affecting the hose when in use must be observed. The most important criteria include overload through bending and stretching, and hose fatigue caused by use, as well as maintenance of extruder tolerances and production variables. Nycoil works with the highest grade polymer materials and to the latest production standards. In order to guarantee the high standard of quality, all relevant parameters and hose characteristics are checked both during and after the production process.





### **Working temperature**

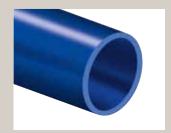
The working temperature, i.e. the temperature range in which the hose is used, is also a major factor in hose selection. A point to note is that the burst pressure – and therefore also the safe working pressure – falls significantly as temperatures rise.



# Our hose qualities at a glance.

#### **RECTULASTIC** made of Nylon 12 (Polyamid)

Straight hoses or coiled hoses; multicolored dual and quadruple; unprecedented return force; small twists and therefore requires minimum space; light weight; resistant to organic and inorganic materials.





#### **RECTUFLEX** made of Polyurethan

Straight hoses or coiled hoses; multicolored dual and quadruple; extremely flexible; resistant to buckling; no change in cross-section; max. working length equal to 80% of stretch length; coiled hoses are supplied with swivel fittings and buckling protection on both ends.

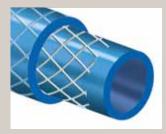




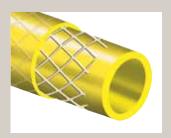
#### **SUPERBRAID®**

#### **Polyurethan Inner Braided Hose**

Straight hoses or coiled hoses; as flexible as the conventional PU hose – from -40°C to +75°C – even with fabric inlay; extremely small twist diameter; coiled hoses are supplied with pre-assembled swivel fittings and buckling protection.





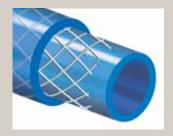




### **ULTRA-LITE SUPERBRAID®**

#### **Polyurethane Inner Braided Hose**

Straight hoses; fittings for easy self-assembly; much lighter than the SUPERBRAID® hose and therefore even more flexible and easy to use; highly resistant to temperature (-40°C to +75°C); extremely small twist diameter.





# RECTUSOFT made of highly flexible PVC, with Polyester Fibre Reinforcement (TÜV-tested)

Straight hoses or coiled hoses; extremely flexible, even at ultra-low temperatures; highly resistant to tears and pressure; light weight and easy operation makes this hose ideal for operating compressed air tools.

### **Fittings**

Many hoses are available completely assembled with different fittings. Please check article description.

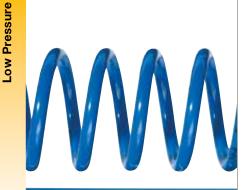








# RECTULASTIC



#### **Technical Description**

RECTULASTIC hoses from Nycoil for safer, more efficient air power transmission.

#### **Special Physical Features**

- · Light weight (specific weight 9x lower as copper)
- Wide temperature range
- High resistance against moisture
- Saltwater insensitive
- Long service time
- Highly elasticity

#### **Mechanical Features**

- High vibration prevention
- Perfect abrasion resistance High compression characteristics
- · Low flow reduction for all kind of media
- Precise tolerances
- Constant solidity
- Resists kinking

#### **Applications**

- Compressed air
- Lubrication grease/oil
- Gasoline
- Hydraulic
- Vacuum
- Chemicals (on request)

#### **Advantages**

- Quick assembly possible
- Straight hoses ideal for Push-In-System
- · Light weight
- Low pressure drop
- Different colors for identification
- Good storage possibility due to box packing (straight hoses)
- High abrasion resistance
- Self-retracting. Coiled Hose automatically recoils to a fraction of its working length
- Small bending diameter
- Resistant to oil, gasoline, grease and abrasion

#### Temperature range:

-40°C up to +90°C

#### Maximum operating pressure:

see chart

#### **Tubing assembled:**

-20°C up to +70°C

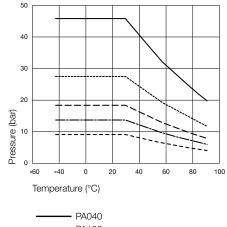
All technical data refers to air applications. We will gladly assistant you for other media.

#### Flow diagrams

#### Relation Working Pressure / Temperature

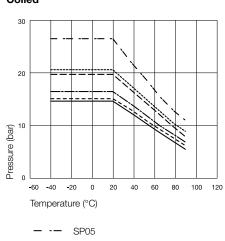
The pressure specifications apply only for the hose and not for the connection fittings.

#### Straight



PA047, PA060 ---- PA120, PA140

#### Coiled





### Straight Hoses RECTULASTIC

Inside x Outside ø mm	Working Length in m	Part Number Blue*
2,0 x 4,0	25	PA040/025/03
4,0 x 6,0	25	PA060/025/03
6,0 x 8,0	25	PA080/025/03
8,0 x 10,0	25	PA100/025/03

<sup>\*</sup> Hoses in black or transparent available on request.

#### **Coiled Hoses without Fittings RECTULASTIC** Coil Outside Diameter Inside x Outside Max. Working Length Approx. Coils Part Number ø mm 38 10 144 SP05/100 3,1 x 4,7 4,8 x 6,3 75 2,5 15 SP06/025 4,8 x 6,3 75 7,5 45 SP06/075 4,8 x 6,3 75 22,5 140 SP06/225 SP08/025 6,3 x 7,9 75 2,5 15 6,3 x 7,9 75 5 SP08/050 30 6,3 x 7,9 75 7,5 SP08/075 6,3 x 7,9 10 SP08/100 75 60 15 90 SP08/150 6,3 x 7,9 75 75 22,5 135 SP08/225 6,3 x 7,9



### **Completely assembled with Swivel Fittings**

### RECTULASTIC

	Inside x Outside ø mm	Coil Outside Diameter mm	Max. Working Length m	Approx. Coils	Part Number
	3,1 x 4,7 R1/8	38	2,5	36	SP05/025/DV
SHITHIHIM TO THE PARTY OF THE P	3,1 x 4,7 R1/8	38	5	72	SP05/050/DV
	6,3 x 7,9 R 1/4	75	2,5	15	SP08/025/DV
	6,3 x 7,9 R 1/4	75	5	30	SP08/050/DV
	6,3 x 7,9 R 1/4	75	7,5	45	SP08/075/DV
	6,3 x 7,9 R 1/4	75	10	60	SP08/100/DV
	6,3 x 7,9 R 1/4	75	15	90	SP08/150/DV
	6,3 x 7,9 R 1/4	75	22,5	135	SP08/225/DV
	7,9 x 9,5 R 1/4	115	2,5	10	SP10/025/DV
	7,9 x 9,5 R 1/4	115	5	20	SP10/050/DV
	9,5 x 11,8 R 3/8	140	5	15	SP12/050/DV
	12,7 x 15,8 R 1/2	220	5	10	SP16/050/DV
with swivel fittings and spring guards (Type DV)					

### Completely assembled with Coupling and Plug

### **RECTULASTIC**

	Inside x Outside ø mm	Coil Outside Diameter mm	Max. Working Length m	Approx. Coils	Part Number
Pro-	6,3 x 7,9	75	2,5	15	SP08/025/K+S
OTT TO	6,3 x 7,9	75	5	30	SP08/050/K+S
	6,3 x 7,9	75	7,5	45	SP08/075/K+S
	6,3 x 7,9	75	10	60	SP08/100/K+S
	6,3 x 7,9	75	15	90	SP08/150/K+S
	7,9 x 9,5	115	5	20	SP10/050/K+S
	9,5 x 11,8	140	5	15	SP12/050/K+S
with 26 series coupling and plug with spring guards					







## RECTUFLEX



#### **Technical Description**

Nycoil polyurethane hose was developed to eliminate the two most common limitations of nylon self-storing hoses, kinking and abrasion resistance. This lightweight, yet extremely durable hose is ideal for use in tough work areas or highly mobile applications.

#### **Special Physical Features**

- Light weight (specific weight 9x lower as copper)
- Wide temperature range
- High resistance against moisture
- Saltwater insensitive
- Long service

#### **Mechanical Features**

- High vibration prevention
- Perfect abrasion resistance
- High compression characteristics
- · Low flow reduction for all kind of media
- Constant solidity

#### **Applications**

- Compressed Air Lubrication grease/oil Gasoline
- Hydraulics
- Vacuum
- Chemicals (on request) Food and beverage (on request)

#### **Advantages**

- Quick assembly possible
- Light weight
- Low pressure drop
- Different colors for identification
- Good storage possibility due to box packing (straight hoses)
- High abrasion resistance
- Very small bending radius and tight coil diameter economizes on work and storage space
- Working length is 80% of total hose length
- •25 % lighter than rubber
- Specially developed swivel fittings offer lowest possible air flow restrictions
- Superior elasticity and coil memory

#### **Working Temperature Hose:**

-40°C up to +75°C

#### **Working Temperature Hose Assembled:**

-20°C up to +70°C

Maximum operating pressure: see chart

#### **Durometer:**

95 Shore A

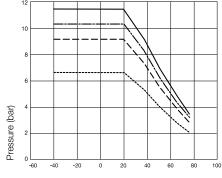
All technical data refers to air applications. We will gladly assistant you for other media.

#### Flow diagrams

#### Relation Working Pressure / Temperature

The pressure specifications apply only for the hose and not for the connection fittings.

#### Straight



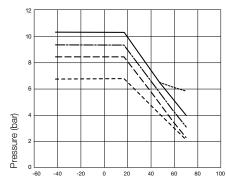
Temperature (°C)

- PU040 ----- PU100

--- PU060, MPS/06

----- PU080, PU120, MPS/08

#### Coiled



Temperature (°C)

- PU10, PU19 ----- PU15, MPC06 **---** PU12 ----- PU08



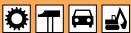
	Inside x Outside ø mm	Coil Outside Diameter mm	Working Length m	Connection	Part Number
	5,0 x 8,0	40	3	G 1/4	PU08/030/DV
à	5,0 x 8,0	40	6	G 1/4	PU08/060/DV
<b>E</b>	5,0 x 8,0	40	7,5	G 1/4	PU08/075/DV
•	6,3 x 9,5	60	3	G 1/4	PU10/030/DV
	6,3 x 9,5	60	6	G 1/4	PU10/060/DV
	6,3 x 9,5	60	7,5	G 1/4	PU10/075/DV
	8,0 x 12,0	80	3	G 3/8	PU12/030/DV
	8,0 x 12,0	80	6	G 3/8	PU12/060/DV
	8,0 x 12,0	80	7,5	G 3/8	PU12/075/DV
MANAN TO THE PARTY OF THE PARTY					
with straight extensions 508 mm and 127mm					



Low Pressure





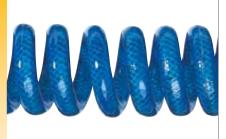






#### **Polyurethane Inner Braided Hose**

# **SUPERBRAID**



#### **Technical Description**

Superbraid polyurethane recoil hose is extruded with an inner braid for additional strength. This "integral piece" process eliminates the need of bonding individual layers of hoses, braiding and cover which tend toseparate overtime due to bending, flexing and pulsating. Superbraid combines the durability of bulkier hoses with the kink resistance and elasti-city of polyurethane to make

a tough, long lasting hose that is user friendly. Superbraid can be used with either our barb and sleeve fittings or reusable polyurethane fittings.

#### **Advantages**

- Same flexibility as a polyurethane hose
- Usable at 15 bar (design factor of 4 to 1)
- Flexible even at -40°C
- Highly kinking resistant; virtually undamaged by twisting or crushing
- Extremely flexible and easy to use; minimizes worker fatigue
- Superior elasticity and coil memory
- Excellent abrasion resistance;
- 6 to 10 times better than rubber or nylon
- Factory applied thread sealant supplied on male
- Very small bending radius and tight coil diameter economizes on work and storage space
- Both fittings nickel plated

#### Working Temperature:

-40°C up to +75°C

#### **Maximum Operating Pressure:**

see chart

#### **Durometer:**

85 Shore A

#### Color:

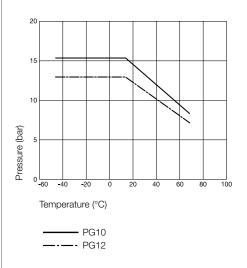
light blue -transparent-

All technical data refers to air applications. We will gladly assist you for other media.

#### Flow diagrams

#### Relation Working Pressure / Temperature

The pressure specifications apply only for the hose and not for the connection fittings.





### Coiled Hoses SUPERBRAID

	Inside x Outside ø mm	Coil Outside Diameter mm	Working Length m	Connection	Part Number
	6,3 x 9,5	42	3	G 1/4	PG10/030/DV
	6,3 x 9,5	42	6	G 1/4	PG10/060/DV
	6,3 x 9,5	42	7,5	G 1/4	PG10/075/DV
111111111111	7,9 x 11,7	55	3	G 3/8	PG12/030/DV
	7,9 x 11,7	55	6	G 3/8	PG12/060/DV
	7,9 x 11,7	55	7,5	G 3/8	PG12/075/DV
with fabric lining					
		fully assembled wit	h 2x nickel-plated, swive	I screw connections	



**Low Pressure** 









# □ □ □ ULTRA-LITE SUPERBRAID



#### **Technical Description**

Thanks to the special production techniques, this hose keeps what it promises, even after frequent use and under extreme conditions. Ultra-Lite is made of polyurethane which is rein-forced by a hose braid made of Dacron Polyester. Unlike conventional 3-layer textile hoses where the indi-vidual layers are not perma- nently bonded to each other, our Nycoil Ultra-Lite is specially made. The hose is heated and the different layers, textile and PU, melt to form a permanent bond with each other. Thanks to this process, the Ultra-Lite is extremely flexible and, above all, extremely durable. Its high level of flexibility and low weight make for easy handling. The Ultra-Lite retains it properties down to temperatures as low as

#### **Advantages**

- Approx. 20% lighter than comparable hoses
- Further weight reduction through production of threaded couplings and hose nuts in light aluminium
- This allows us to reduce the total weight of the hose system, with all advantages of easy hose handling
- Extremely flexible even down to -40°C
- Anti-kink
- Highly temperature-resistant
- Easy do-it-yourself assembly
- of couplings, plugs or fixed screw connections from various Rectus series (available with protective sleeve on request)

#### Working Temperature:

-40°C up to +75°C

#### **Maximum Operating Pressure:**

see chart

#### Color:

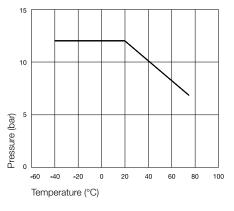
yellow

All technical data refers to air applications. We will gladly assistant you for other media.

#### Flow diagrams

#### Relation Working Pressure / Temperature

The pressure specifications apply only for the hose and not for the connection fittings.



- SU13, SU17



### **ULTRA-LITE SUPERBRAID**

	Inside x Outside ø mm	Working Length m	Weight g/m	Part Number
SUPERIOR DE LA COMPANION DE LA	9,5 x 13,0	25	75	SU13/025/05
	12,7 x 17,4	25	127	SU17/025/05



Straight Hose

Low Pressure



# **RECTUSOFT**





#### **Technical Description**

The new generation of highly flexible Rectus hoses consists of a textile-reinforced, 3-ply PVC hose with a smooth inner tube, polyester thread insert and abrasion-proof outer covering.

### Advantages • Low weight

- Very high flexibility
- Highly resistant
- High resistance to pressure
- UV-resistant
- Long service life
- shock and tread- resistant, non-buckling
- mani- facturer's imprint with technical specifications

#### **Working Temperature:**

-15°C up to +60°C

Maximum Operating Pressure at +23°C:

#### Bursting Pressure at +23°C:

63 bar

#### Color:

light blue



Straight Hoses	<b>RECTUSOFT</b>
----------------	------------------

06/050/03
09/050/03
2/050/03



# **Hose Accessories**

Hose Cutter			
	L	L1	Part Number
	79	25	RP71-00
(up to outside Diameter 14 mm)			

#### **Swivelling Spring Guard** Connection ${\sf HEX}$ Length Version Part Number mm R 1/8 3,1 x 4,7 Brass DV10/05 R 1/4 4,8 x 6,3 14 Brass DV13/06 R 1/4 6,3 x 7,9 14 Brass DV13/08 R 1/4 7,9 x 9,5 DV13/10 15 Brass

Fixed Spring Guard					
	Connection mm	HEX	Length	Version	Part Number
	G 1/8 4,0 x 6,0	12	103	Brass	SV10/06
	G 1/8 6,0 x 8,0	12	106	Brass	SV10/08
	G 1/4 4,0 x 6,0	17	103	Brass	SV13/06
	G 1/4 6,0 x 8,0	17	106	Brass	SV13/08
	G 1/4 8,0 x 10,0	17	119	Brass	SV13/10
with spring guard * with inner cone 45°	G 1/4 9,0 x 12,0	17	123	Brass	SV13/12
	G 3/8 9,0 x 12,0 *	19	123	Brass	SV17/12



### **Worm Drive Hose Clips**

	Spread mm	Height mm	Part Number
	10-16	8	KA1016
file .	12 - 22	8	KA1222
	16 - 27	8	KA1627
	23 - 35	9	KA2335

### ,O'-Clips

	Spread mm	Height mm	Part Number
	7 - 9	7	KB0709
	9 - 11	7	KB0911
	11 - 13	7	KB1113
	13 - 15	7,5	KB1315
	15 - 18	8	KB1518
	17 - 20	8,5	KB1720
	20 - 23	9	KB2023

