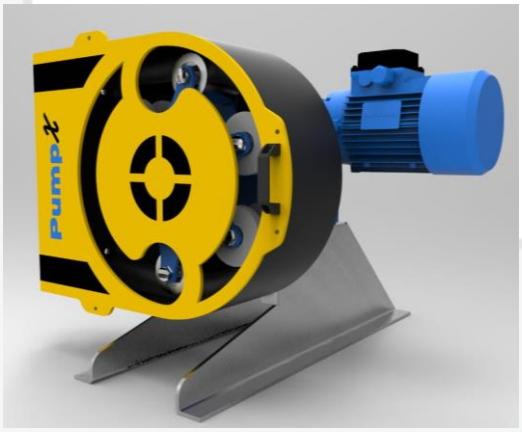
PumpX

The Latest Most Innovative Peristaltic Pump

RollX

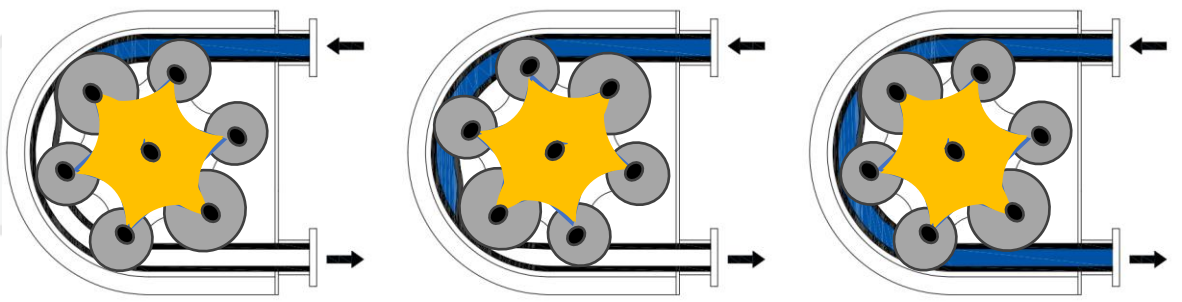
Principle of Operation



PumpX adopts the roller principle in it's peristaltic pump **RollX** which pumps by the compression of an arched loop of rubber hose with two diametrically opposed rollers. With this rotational motion fluid is pushed ahead inside a hose which is compressed and relaxed by the rollers mounted on a rotor.

When each roller reaches the end of the loop, the reinforced hose immediately returns to its original shape creating a strong vacuum pulling more fluid inside thus enabling suction. This enables the pump in handling of the toughest pumping challenges, including extremely abrasive and aggressive fluids, solid loaded liquids, as well as shear sensitive and very viscous materials in a wide variety of industries.

Peristaltic Pump Explained



Two stainless steel rollers mounted at 180° on a rotor compress alternatively and consequently a specially designed hose in a concentric guide pushing the pumped liquid from the suction to the discharge side. Roller movement compresses the hose along the casing wall creating a constant vacuum at the suction side of the pump. In this way, liquids are displaced within the hose and do not get in contact with any metal part.

FEATURES & BENEFITS

Seal-less design
No mechanical seal that can cause leakage.

Lowest operational cost with fast and easy maintenance
RollX pumps displace the medium in a hose, requiring only one component to be changed, which means that maintenance costs are considerably lower than other pump types.

Bi-directional flow
Reversible flow, suction and discharge

No mixing of the medium
Due to the peristaltic effect

Self-priming with excellent suction lift
PumpX RollX pumps can self-prime with a suction lift reaching 9.8 meters

Long service intervals
Wear resistant hose is the only part that is in contact with the medium.

Long life and greater durability
The **RollX** range is designed and manufactured for heavy duty industrial use.

Low sound level
Below < 70 dB at 1 meter.

Dry Run
PumpX pumps have the ability to run dry continuously

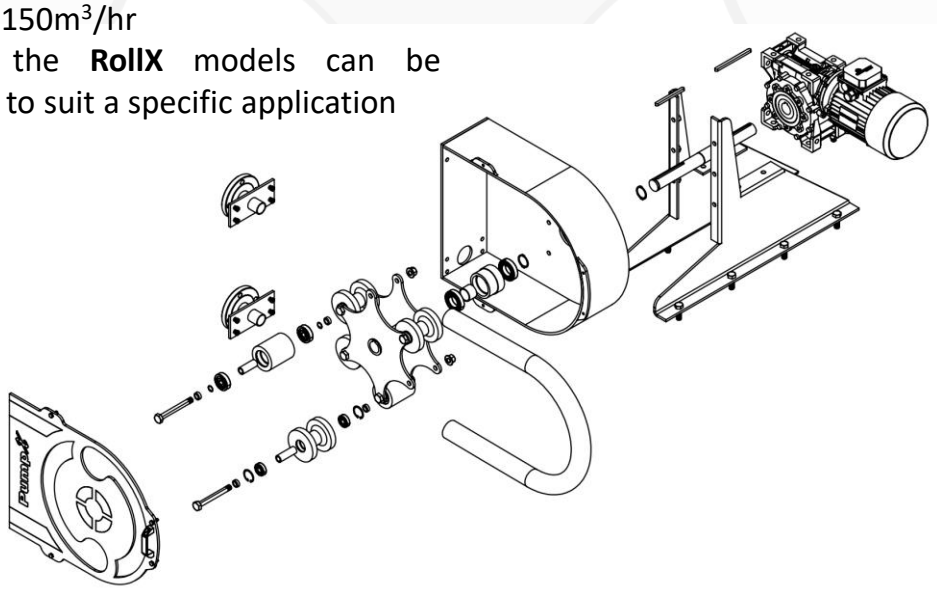
APPLICATIONS

- **Cosmetics:** shampoo, liquid soap, shower gel, lotion and cream
- **Ceramic & Porcelain:** ceramic slips
- **Water Treatment:** sodium hypochlorite, ferric chloride, sodium bisulfite, fluoride, polymers, aqueous ammonia, potassium permanganate, caustic soda, sewage, sludge and slurries
- **Mining:** quartz slurry, sludge, clay slurry, lead sulfate, pyrite slurry,
- **Paper Industry:** pigments, ink, wall coating, latex, slurries, kaolin
- **Building Industry:** foam concrete, liquid or fibrous mortar, liquid plaster, light concrete
- **Chemical Industry:** chemicals in general, acids, alcohol, detergents and corrosives
- **Pharmaceutical Industry:** chemical dosing, liquid protein, vaccines, serum, plasma, syrups,
- **Paint & Coatings:** water base and acrylic paint, pigments, wall coating
- **Food Industry:** egg white & yolk, edible fat, cream natural flavoring, milk and yogurt tomato sauce, mashed potatoes, gelatin, sugar, chocolate sauce and chocolate with nuts, peanut butter, honey and yeast
- **Other Applications:** fertilizers, molasses, glue

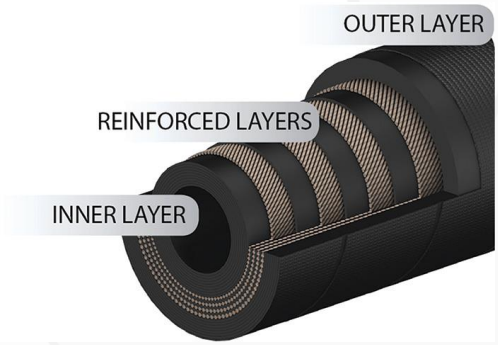
RollX Series

RollX pumps are the result of extensive research and development adopting the rollers mechanism but with a new energy and cost-efficient design.
RollX pumps can run at higher rpms and still produce a longer hose lifetime.
Due to the almost frictionless operation and design **RollX** doesn't generate heat which increases the overall pump and hose life.
RollX pumps need lower power to transfer the same quantity of fluid compared to other pump types so it is extremely economic in operation.
RollX pumps are available in many sizes and capacities covering a wide range flow rates and applications for many industries.
RollX pumps are oil-free.
RollX hoses have proven an excellent performance with the carefully designed stainless steel rollers.
Special **RollX** large sizes available such as **RX125** & **RX150** with flow rates reaching 150m^3/hr
Any of the **RollX** models can be modified to suit a specific application

MODEL	HID	Q (L/h)	P bar
RX 10	10	45	6
RX10 B	10	80	6
RX 15	15.5	205	6
RX 15 B	15.5	335	6
RX 20	20	410	6
RX 25	25	810	15
RX 25 B	25	1300	15
RX 32	32	1680	15
RX 32 B	32	2510	12
RX 38	38	1800	15
RX 38 B	38	2500	15
RX 40	40	2900	15
RX 50	50	5300	11
RX 50 B	50	6800	12
RX 60	60	8250	10
RX 65	65	14000	8
RX 65 B	65	19250	8
RX 80	80	20000	10
RX 80 B	80	25000	10
RX 80'	80	27500	10
RX 100	100	40000	6.5
RX 100 B	100	51300	5



PumpX Hoses



Model	Hose Length mm (in)	Inner D mm (in)	Outer D mm (in)
RX10	510 (20.08)	10 (0.39)	32 (1.26)
RX15	755 (29.72)	15.5 (0.59)	37 (1.46)
RX20	755 (29.72)	20 (0.79)	37 (1.46)
RX25	1,000 (39.37)	25 (0.98)	54 (2.13)
RX32	1,250 (49.21)	32 (1.26)	63 (2.48)
RX40	1,250 (49.21)	38 (1.5)	63 (2.48)
RX50	1,820 (71.65)	50 (1.97)	80 (3.15)
RX65	1,820 (71.65)	60 (2.36)	87 (3.42)
RX80	2,780 (109.45)	80 (3.15)	123 (4.84)
RX100	3,275 (128.94)	100 (3.94)	144 (5.67)
RX125	1,850 (151.57)	125 (4.92)	168 (6.61)

The hose of a the **RollX** pump is the only component that comes in contact with the pumped medium. Our hoses are manufactured from high quality compounded rubber, reinforced by layers of nylon. The hose designed with precision for efficiency, accuracy, longevity, and optimal compression.

PumpX hoses are available in different materials of construction, all of which have been chosen for their high levels of fatigue resistance:

- **Natural Rubber:** Highly durable with excellent abrasion resistance and strength.
- **Natural Rubber (ATEX):** For hazards area applications
- **Buna (NBR):** Highly wear resistant to oily products.
- **Buna (NBR) FDA:** For food and hygienic applications (FDA approved)
- **EPDM:** High chemical resistance, to concentrated acids and aggressive fluids
- **Hypalon®/CSM:** very High resistance to oxidants, highly corrosive products and very high concentrated acids as well as concentrated bases.

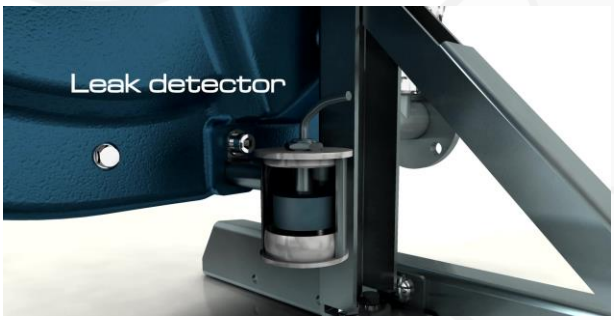
Operating Data

Capacity:	up to 150 m^3/h
Viscosity:	up to 100000 cps
Temperature of pumped medium:	up to 110°C
Discharge pressure:	up to 15 bar
Self priming:	up to 9.8 m

Accessories

The following accessories could be supplied upon request:

1. Suction line pulsation dampener
2. Discharge line pulsation dampener
3. Hose leak detector
4. Flanges, TRICLAMP, DIN 11851, SMS, NPT, PP, PVDF connections
5. ATEX motor, hoses and control panel if required in hazardous zones
6. Special application gun for mortar, cement and plaster
7. Wheels and transportable chassis



PumpX

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