

## WP140 series

**PRODUCT MANUAL**  
SUPPORT CUSTOMIZATION

Thank you for choosing pump head supporting related products. Please read this manual carefully before installation and use. Please follow the warnings and precautions marked in the product manual.

V1.0

## Important information

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Please read this product instruction manual carefully before using the product!

The contents of this product instruction manual are for reference only.

Chuangrui Pump Industry reserves the right to change the product (design or specification) without prior notice.

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### Safety warning

- Before any cleaning or maintenance work, be sure to cut off the power supply.



- \* This instruction manual is applicable to pump head supporting related products. All pump head supporting related products derived from this series can also be implemented with reference.

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## Product description

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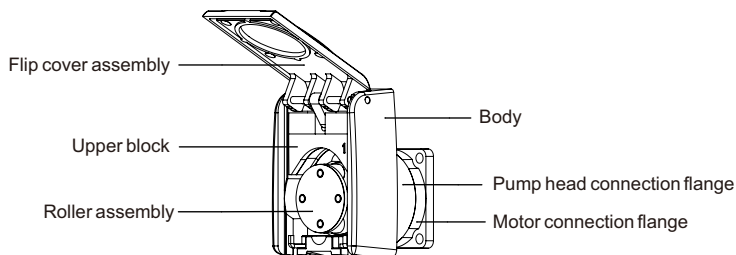
## Product description

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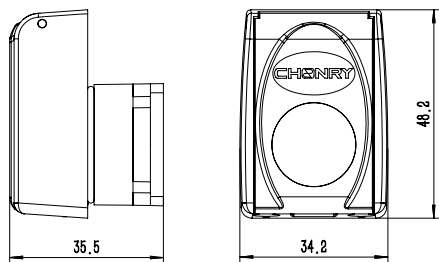
The WP140 series which is small in size, compact in structure, simple to operate, easy to load and unload hoses, compatible with continuous hoses or hose units, and has smooth transmission. The elastic pressure block can improve accuracy and extend the life of the hose. The pump head can be equipped with different motors to meet different working requirements, and the maximum flow rate can reach 30 mL/min.

The WP140 series pump heads are divided into two types: WP140 and WP140-1. The internal spring structure is different. The pressure block on the WP140-1 pump head is marked with "1". Select the appropriate pump head according to the hardness and outer diameter of the hose.

#### • WP140/WP140-1 Pump head structure

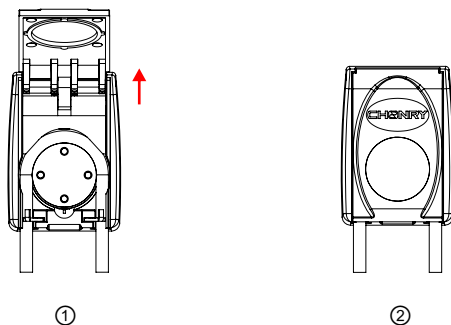


#### • WP140/WP140-1 Pump head size



WP140 size: 35.5x34.2x48.2mm

• WP140/WP140-1 Pump tube installation



1. As shown in Figure ①, open the pump head cover.
2. Place the hose on the roller, and clamp the hose on both sides at the pipe clamps
3. As shown in Figure ②, close the pump head cover and the installation is complete.

**UCP323 adapt stepper motor parameters**

• Product parameters

Pump head	WP140/WP140-1
Channels	1
Rollers	4
Roller Material	PET
Pump head material	POM/PET/PC/304
Max flow	30mL/min
Max speed	300rpm
Matching motor	28 Stepper Motor
Outlet pressure	0.10 MPa
Vacuum degree	-0.05 MPa
Applicable hose	Silicone tube, PVC, pharmed

**• Hose selection and flow reference**

Pump head	ID(mm)	Wall thickness(mm)	Max flow(mL/min)	Max speed(rpm)
WP140 WP140-1	0.25	0.85	0.73	300
	0.51	0.85	2.8	300
	0.76	0.85	5.8	300
	1.02	0.85	9.9	300
	1.22	0.85	13	300
	1.52	0.85	20	300
	2.06	0.85	30	300

**Test conditions:**

1. Flow data testing environment for room temperature 20-25 °C, relative humidity is not greater than 80%, altitude is not greater than 1500 metres above sea level
2. The test is measured using a straight-through pipe with a suction range of 0.5 m, a head of no more than 0.5 m, and a total pipe length of no more than 1.5 m (inlet end + outlet end + test end)
3. All flow data are nominal values with an error of  $\pm 10\%$ ; when the inner diameter of the hose exceeds 1.65mm, the life of the hose will be reduced.

The above data test environment for normal temperature and pressure, the test fluid is water, the data is for reference only, please refer to the actual standard.

**PVC/Silicone Hose Adapter Pump Head**

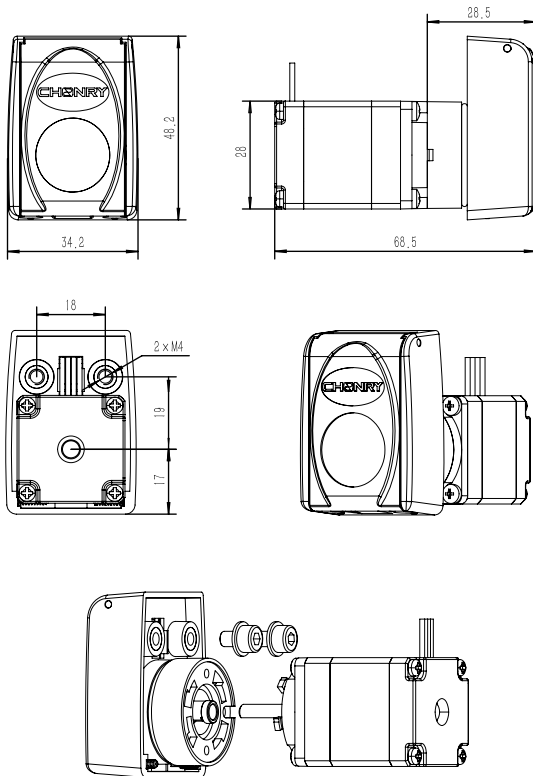
Serial number	PVC Hose Specifications	Connection		Applicable pump head
		Continuous hose	Tube Assemblies	
1	0.25×0.85	Be applicable	Not applicable	WP140-1
2	0.51×0.85	Be applicable	Not applicable	WP140-1
3	0.76×0.85	Be applicable	Not applicable	WP140-1
4	1.02×0.85	Be applicable	Be applicable	WP140-1
5	1.22×0.85	Be applicable	Be applicable	WP140-1
6	1.52×0.85	Be applicable	Be applicable	WP140-1
7	2.06×0.85	Be applicable	Be applicable	WP140-1

Serial number	Silicone tube specifications	Connection		Applicable pump head
		Continuous hose	Tube Assemblies	
1	0.51×0.85	Be applicable	Not applicable	WP140
2	0.76×0.85	Be applicable	Not applicable	WP140
3	1.02×0.85	Be applicable	Be applicable	WP140
4	1.22×0.85	Be applicable	Be applicable	WP140
5	1.52×0.85	Be applicable	Be applicable	WP140-1
6	2.06×0.85	Be applicable	Be applicable	WP140-1

**Note:** The hardness and outer diameter of the tube determine whether it is suitable for WP140 pump head or WP140-1 pump head (WP140-1 pump head is marked with "1" on the upper pressure block)

• Dimensions/structure diagram

Stepper Motor



## OEM223 adapt DC motor parameters

### • Product parameters

Pump head	WP140/WP140-1	
Channels	1	
Rollers	4	
Roller Material	PET	
Pump head material	POM/PET/PC/304	
Max flow	30mL/min	
Max speed	300rpm	
Matching motor	28 DC motor 12V	25 DC motor 12V
Outlet pressure	0.10 MPa	
Vacuum degree	-0.05 MPa	
Applicable hose	Silicone tube, PVC, pharmed	

### • Hose selection and flow reference

Pump head	ID(mm)	Wall thickness(mm)	Max flow(mL/min)	Max speed(rpm)
WP140 WP140-1	0.25	0.85	0.73	300
	0.51	0.85	2.8	300
	0.76	0.85	5.8	300
	1.02	0.85	9.9	300
	1.22	0.85	13	300
	1.52	0.85	20	300
	2.06	0.85	30	300

#### Test conditions:

1. Flow data testing environment for room temperature 20-25 °C, relative humidity is not greater than 80%, altitude is not greater than 1500 metres above sea level
2. The test is measured using a straight-through pipe with a suction range of 0.5 m, a head of no more than 0.5 m, and a total pipe length of no more than 1.5 m (inlet end + outlet end + test end)
3. All flow data are nominal values with an error of  $\pm 10\%$ ; when the inner diameter of the hose exceeds 1.65mm, the life of the hose will be reduced.

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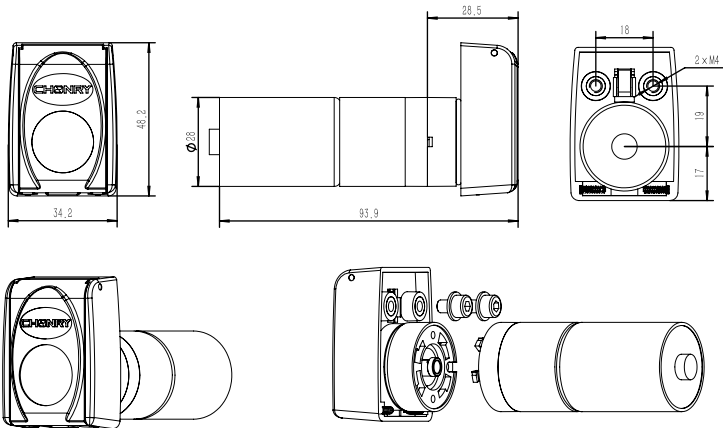
**PVC/Silicone Hose Adapter Pump Head**

Serial number	PVC Hose Specifications	Connection		Applicable pump head
		Continuous hose	Tube Assemblies	
1	0.25×0.85	Be applicable	Not applicable	WP140-1
2	0.51×0.85	Be applicable	Not applicable	WP140-1
3	0.76×0.85	Be applicable	Not applicable	WP140-1
4	1.02×0.85	Be applicable	Be applicable	WP140-1
5	1.22×0.85	Be applicable	Be applicable	WP140-1
6	1.52×0.85	Be applicable	Be applicable	WP140-1
7	2.06×0.85	Be applicable	Be applicable	WP140-1

Serial number	Silicone tube specifications	Connection		Applicable pump head
		Continuous hose	Tube Assemblies	
1	0.51×0.85	Be applicable	Not applicable	WP140
2	0.76×0.85	Be applicable	Not applicable	WP140
3	1.02×0.85	Be applicable	Be applicable	WP140
4	1.22×0.85	Be applicable	Be applicable	WP140
5	1.52×0.85	Be applicable	Be applicable	WP140-1
6	2.06×0.85	Be applicable	Be applicable	WP140-1

**Note:** The hardness and outer diameter of the tube determine whether it is suitable for WP140 pump head or WP140-1 pump head (WP140-1 pump head is marked with "1" on the upper pressure block)

• **Dimensions/structure diagram**



## Product maintenance and after sales

### Product maintenance and after sales

#### Warranty information

##### ·Warranty commitment

- ① The product has a one-year warranty period. If there is a failure during the warranty period, you can enjoy free maintenance and replacement of parts; if it is damaged by humans, it will not be included in the warranty scope.
- ② If the warranty period is exceeded, only cost will be charged for repairs.

**Note:** Any employee or distributor has no right to change or violate the above warranty terms. Chuangrui is only responsible for repairing, replacing or refunding the product in accordance with the actual use of the product and the reasonable compliance requirements of the customer.

##### ·Relevant details

- ① Chuangrui will not be responsible for any direct or indirect losses caused by external reasons such as operating errors or human negligence that are not the product's own quality problems.
- ② Chuangrui will not be responsible for the transportation damage caused by the returned products and accessories during the return journey.
- ③ In any case, the compensation cost received by the customer shall not exceed the actual payment price.

##### · Non-warranty scope

The following conditions are not included in the free maintenance of the warranty:

- ① The product has exceeded the warranty period.
- ② Product failure caused by abuse, misuse or accidental damage by Chuangrui's judgment.
- ③ Product problems caused by ultraviolet rays or direct light.
- ④ It is not the damage caused by after-sales personnel in the repair or disassembly process.
- ⑤ Damage caused by chemical erosion or long-term improper maintenance.
- ⑥ Product failure caused by force majeure factors such as natural disasters.
- ⑦ The operator fails to follow the corresponding operation suggestions and requirements, improper loading and unloading, improper maintenance, and improper operation.
- ⑧ Failures or damages that are not caused by the quality of the product itself.

**Note:** Chuang Rui reserves the right to modify the above terms at any time.

## Repair information

- ① If there is a product that needs to be returned/repaired, please contact the sales, distributor or Chuangrui official according to the delivery related process to quickly solve the after-sales problems such as return, replacement, and repair;
- ② If there is no special agreement or written instructions, please return and exchange the goods within the specified time;
- ③ When applying for after-sales service, please provide a clear reason for the return, specific information about the contacted substances, and responsible for the cleaning of the product (especially products that have been exposed to toxic chemical substances or harmful substances to the human body)
- ④ When returning the product to the factory, please pay attention to the packaging specifications to prevent damage to the pump during transportation; Chuang Rui will not be responsible for product damage caused by improper packaging and will not be included in the warranty.

## Technical support & After-sales

For official technical support and after-sales questions, please consult:

**Address: NO.369 of HuiYang Street , Baoding 071000 , Hebei , China**

**Telephone: +86 15633705132**

**Website : [www.crpump.com](http://www.crpump.com)**

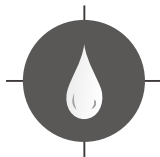
### \*Disclaimer

- The content of this operation manual is for reference only.
- Chuang Rui reserves the right to change the product (Design or specification) without prior notice.
  - We formulate the information in this document from a correct perspective, but Chuangrui will not be responsible for any errors.
  - If you need the latest version of the operation manual, please contact Chuang Rui official.
  - Chuangrui will not be responsible for any loss caused by non-product quality problems or human errors.

### Warning:

This product is not suitable for equipment with its own problems.  
Do not place this product in hazardous work areas, flammable and explosive environments.

BAODING CHUANG RUI PRECISION PUMP CO. , LTD.



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