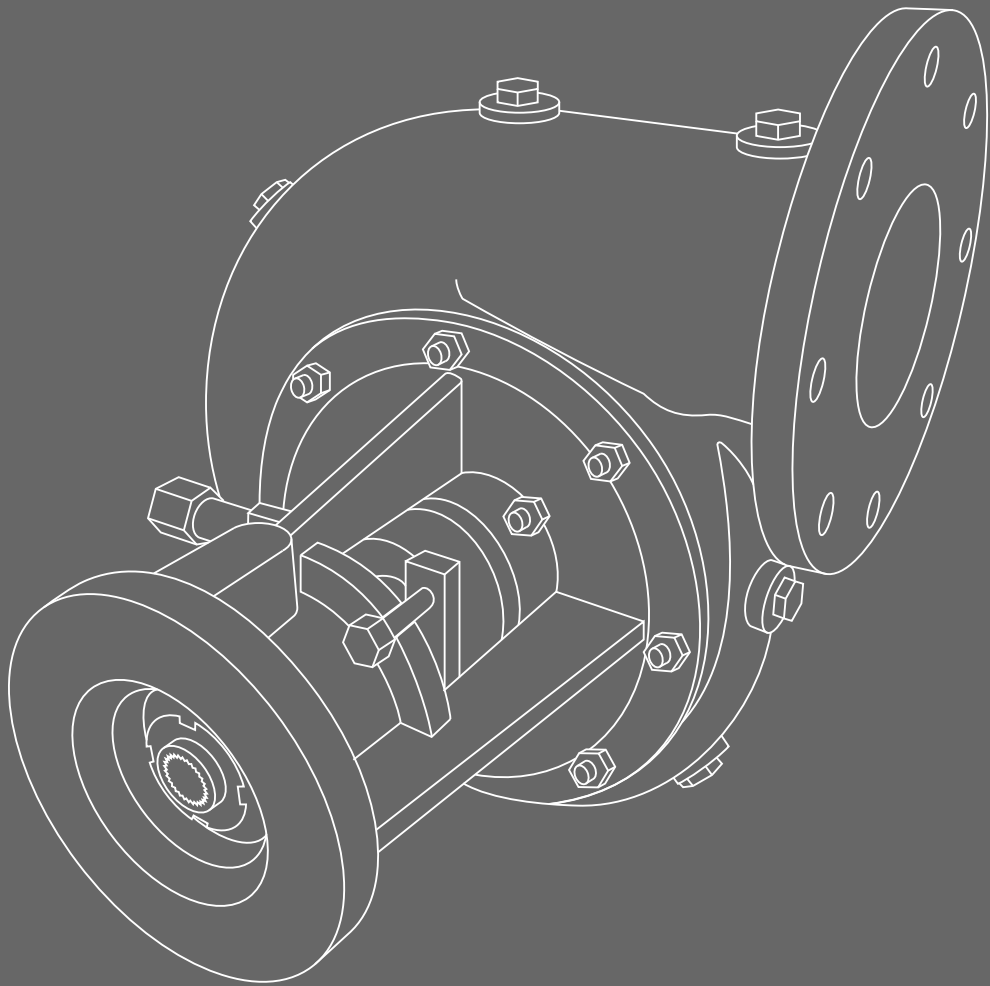




RNGI



Centrifugal pump

NC-100R1

NC-100R1 SERIES CENTRIFUGAL PUMP

Centrifugal pumps of **NC-100R1** series is intended to pump various liquids:

- abrasive hydraulic fluids (clay and gravel mortars, mixtures of water and sand, ore, etc.);
- flushing liquid used in the course of well drilling;
- household and industrial waste waters;
- spent flushing liquid (into cyclone plant to clean it of drilled solids);
- cement mortars.

Advantages of centrifugal pump NC-100R1:

- simple maintenance;
- light weight;
- compact size;
- extreme durability;
- minimal installation space requirements;
- all parts are steel casted;
- stainless steel impeller;
- increased wearing resistance of pump components;
- horizontal or vertical layout;
- versatile, modular design that allows customers to purchase only the parts necessary for repairs;
- ability to alter rotation direction, which is possible because it is simple to install an impeller suitable for the necessary rotation and volute direction (only the impeller is to be replaced, while all other parts remain the same);
- exposed impeller.

Pumped fluid properties:

hydraulic fluid density, kg/m³

temperature, °C

solid particle content

solid particle maximal size, mm

up to 2500

+5 ... +55

up to 60%

at most 13

Technical specifications:

Pump overall dimensions (LxWxH), mm

Inlet port diameter, mm

Outlet port diameter, mm

Impeller diameter, mm

Maximal speed, rpm

Weight, kg, ±3%

Maximal head, m

Maximal flow, m³/h (lps)

Component materials:

Impeller

Other components (castings)

Other components (except castings)

440x450x400

123 (5") ASME/ANSI B 16.5 Class 150

100 (4") ASME/ANSI B 16.5 Class 150

210 (8")

2400

70

40

250 (69)

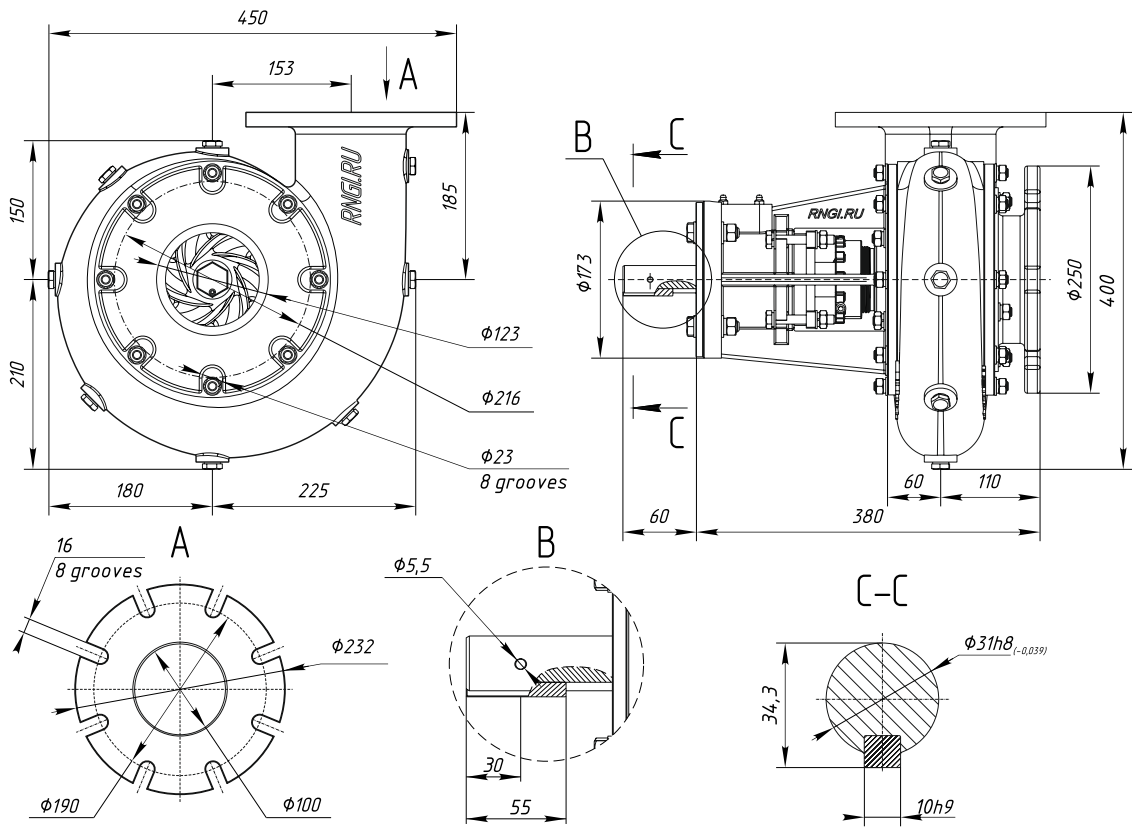
20H13L

40HL

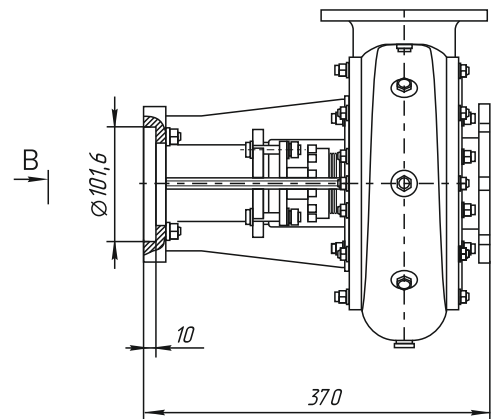
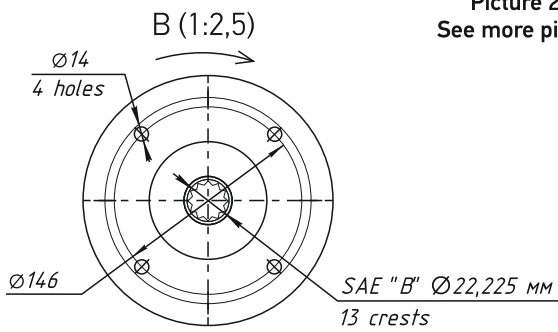
40H

Centrifugal pump NC-100P1 (5" x 4" x 8"). Dimensions.

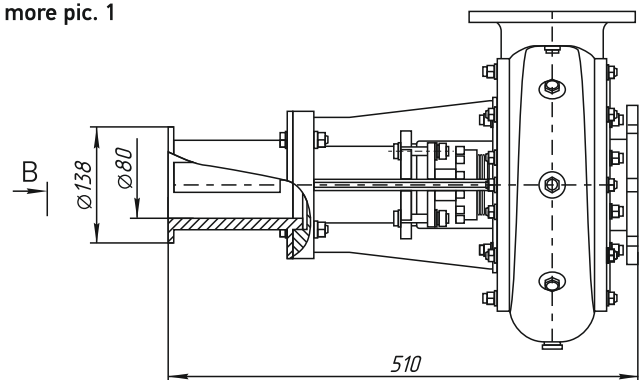
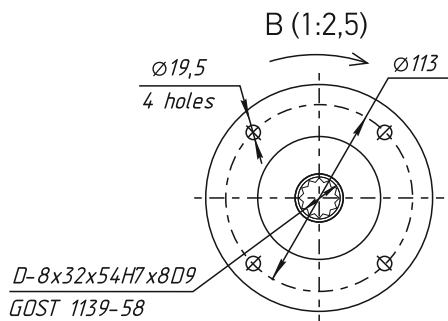
Picture 1



Picture 2
See more pic. 1



Picture 3
See more pic. 1

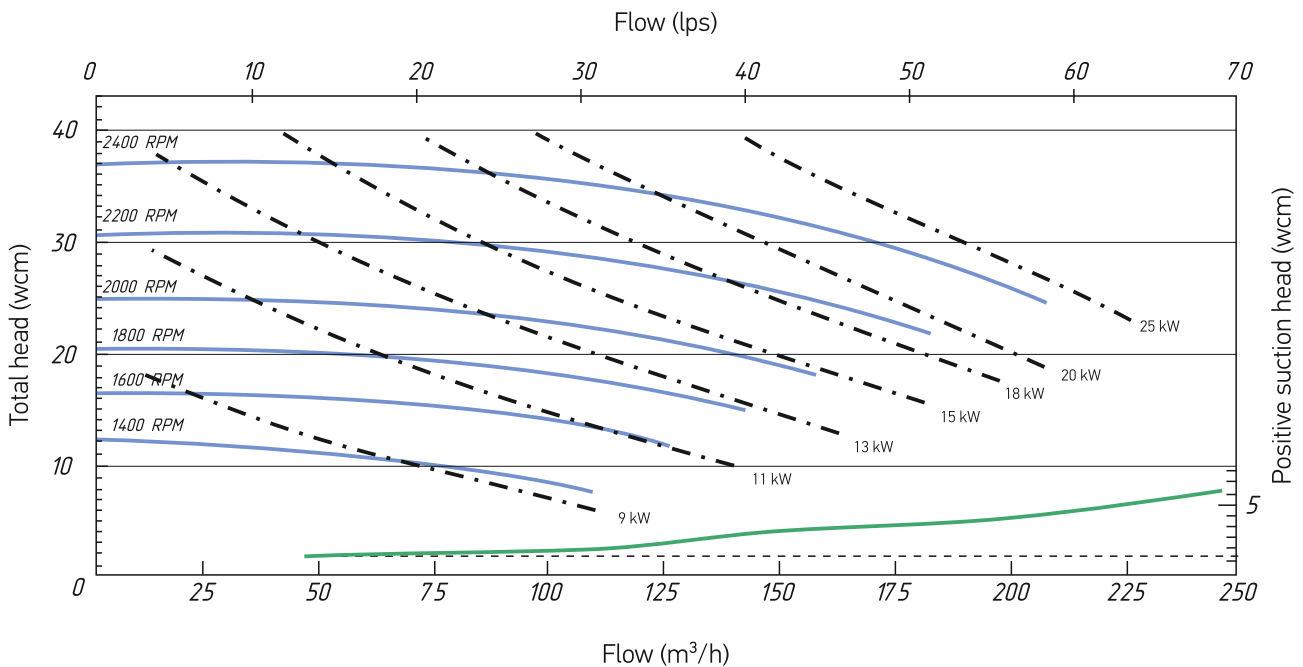


Pump modifications

Typesize	Pic.	Connection	Rotation
NC-100R1	1	Coupling	C.W./C.C.W.
NC-100R1-01	2	Connection to hydraulic motor with SAE "B" flange with 2 holes	C.W./C.C.W.
NC-100R1-02	3	Connection to hydraulic motor HDS-34	C.W./C.C.W.

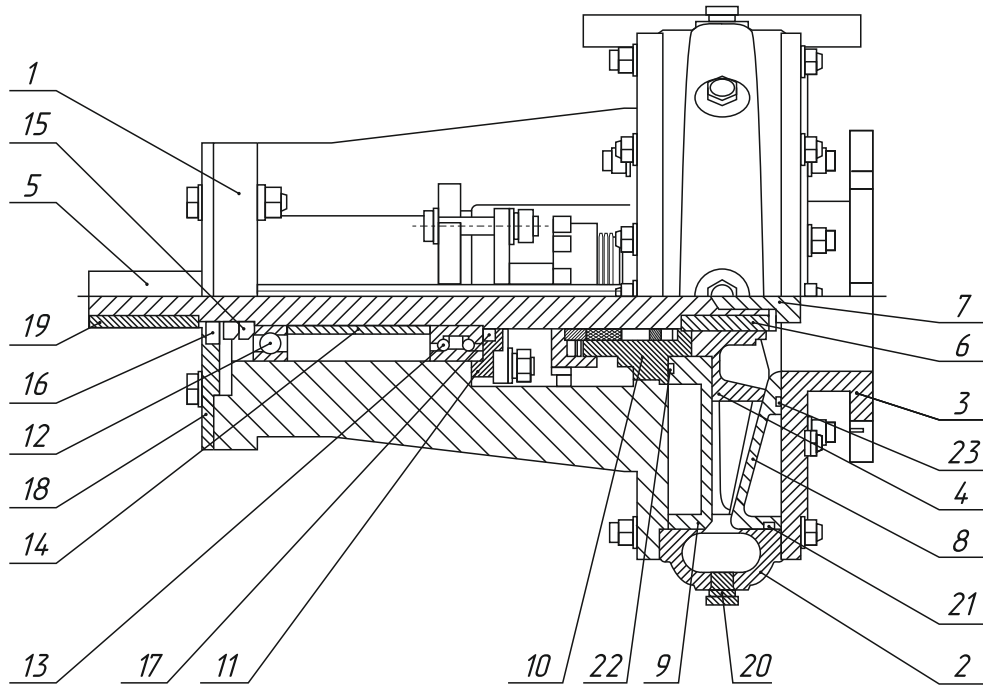
Additional parameters

Name	The option of the performance
Shaft seal type	Gland seal
	Mechanical seal



Pump card

Centrifugal pump NC-100R1 manufactured by Rosneftgazinstrument is a small and compact device intended for high pressure feeding of three-cylinder piston pumps involved in wells operation. It is specially designed to pump abrasive mixtures (sludge) and cement mortars. The pumps are manufactured by means of contemporary CNC equipment. Our centrifugal pumps are suitable for various industries.

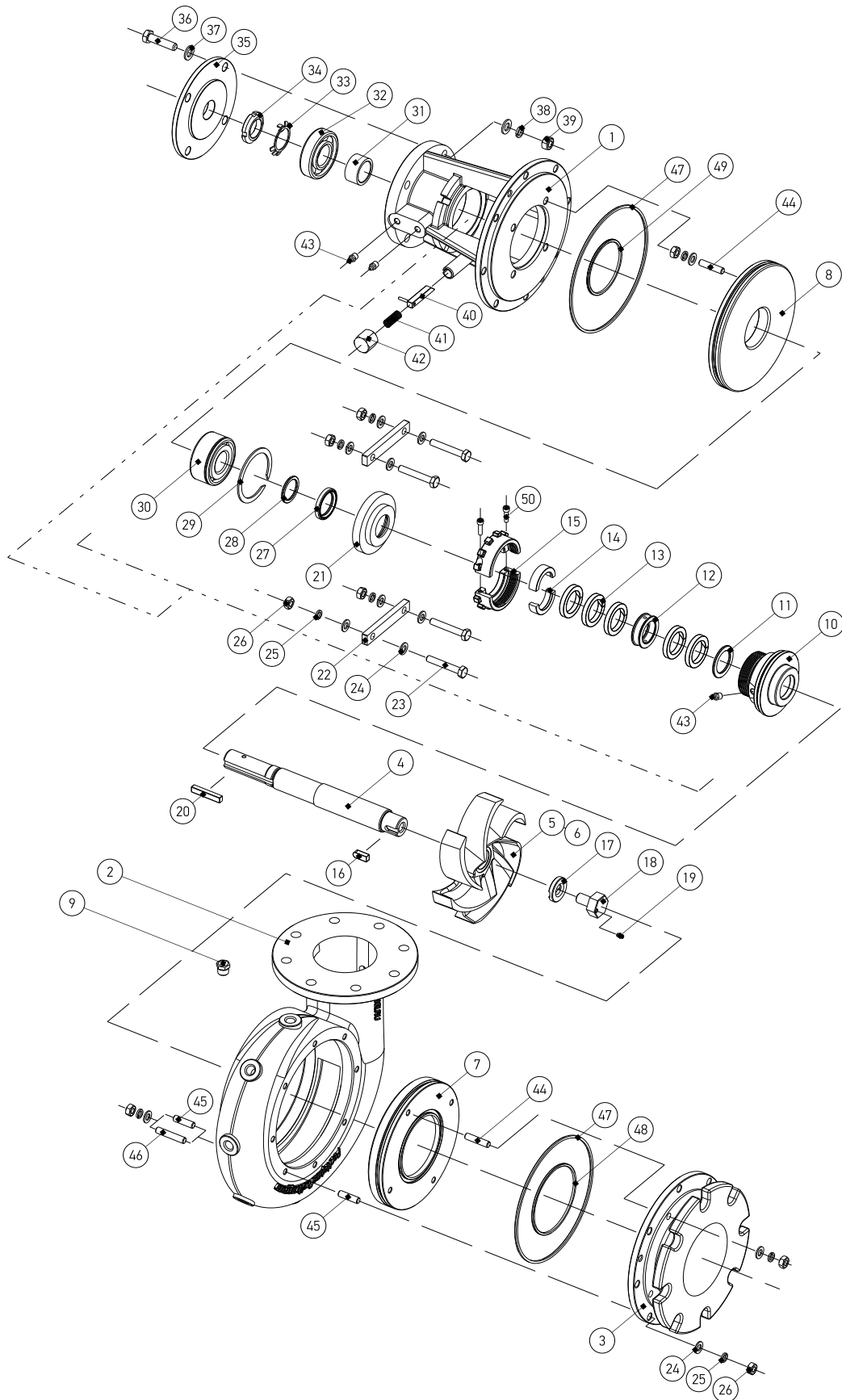


Centrifugal pump NC-100R1 (5"x4"x8"). Structure.

1	body
2	volute diffuser with outlet fitting 4"
3	inlet fitting 5"
4	full opening impeller 8"
5	shaft
6	impeller keystone
7	bolt for locking the impeller to the spindle
8, 9	front and rear wear-related shrouds
10	seal assembly
11	cap
12, 13	bearings
14	spacing sleeve
15	clamping nut
16*, 17	oil seal
18*	shield
19*	shaft key
20	plug K3/8" GOST 6111-52
21, 22, 23	o-rings GOST 9833-73

* - for centrifugal pump NC-100R1 using a shaft for a key

Centrifugal pump NC-100R1 (5"x4"x8"). Part list.



Centrifugal pump NC-100R1 (5"x4"x8"). Part list.

Name	Position	Quantity
NC-100R1.01.00 – Body	1	1 pc.
NC-100R1.00.01 – Volute	2	1 pc.
NC-100R1.00.02 – Cap	3	1 pc.
NC-100R1.00.17-01 - Shaft	4	1 pc.
NC-100R1.00.16- Impeller (for a pump with right rotation)	5	1 pc.
NC-100R1.00.16-01 - Impeller (for a pump with left rotation)	6	1 pc.
NC-100R1.00.03 - Front wear-related shroud	7	1 pc.
NC-100R1.00.04 - Backward wear-related shroud	8	1 pc.
NC-100R1.00.20 – Plug	9	8 pcs.
NC-100R1.00.05 - Sleeve	10	1 pc.
NC-100R1.00.06 - Lower mouth ring	11	1 pc.
NC-100R1.00.07 - Drain ring	12	1 pc.
Gasket 8 x 8 mm GOST 5152-84	13	700 mm
NC-100R1.00.08 - Compression D-ring	14	2 pcs.
NC-100R1.02.00 – Nut	15	1 pc.
NC-100R1.00.18 – Shaft key	16	1 pc.
NC-100R1.00.14 – Washer	17	1 pc.
NC-100R1.00.15 – Bolt	18	1 pc.
Lock screw M6x12 GOST 8878-93	19	1 pc.
NC-100R1.00.20 – Shaft key	20	1 pc.
NC-100R1.00.10 - Through cover	21	1 pc.
NC-100R1.00.11 – Strip	22	2 pcs.
Bolt M10x65 GOST 7805-70	23	4 pcs.
Washer C.10 GOST 11371-78	24	28 pcs.
Washer 10 GOST 6402-70	25	32 pcs.
Nut M10 GOST 5915-70	26	28 pcs.
Oil seal 1.1-38 x52-1 GOST 8752-79	27	1 pc.
NC-100R1-01.00.34 - Thrust washer	28	1 pc.
Snap ring A80.65 GOST 13940-86	29	1 pc.
NC-100R1.00.13 - Double row angular contact ball bearing with snap ring groove (3056307 GOST 4252-75)	30	1 pc.
NC-100R1.00.09 – Bushing	31	1 pc.
Single row radial ball bearing 307 GOST 8338-75	32	1 pc.
Washer 36 GOST 11872-89	33	1 pc.
Nut M33x1,5 GOST 11871-88	34	1 pc.
NC-100R1-01.00.33 - Shield	35	1 pc.
Bolt M12x50 GOST 7805-70	36	4 pcs.
Washer C.12 GOST 11371-78	37	8 pcs.
Washer 12 GOST 6402-70	38	4 pcs.
Nut M12 GOST 5915-70	39	4 pcs.
NC-100R1.03.00 – Latch	40	1 pc.
NC-100R1.00.21 – Spring	41	1 pc.
NC-100R1.00.12 – Bonnet	42	1 pc.
Oil cup 1. 2. C6.chrome GOST 19853-74	43	3 pcs.
NC-100R1.00.19 – Studbolt	44	8 pcs.
NC-100R1.00.19-01 – Studbolt	45	16 pcs.
NC-100R1.00.19-03 - Studbolt (for installation together with a bracket)	46	5 pcs.
O-ring 205-215-46-2-2 GOST 9833-73	47	2 pcs.
O-ring 115-122-46-1-1 GOST 9833-73	48	1 pc.
O-ring 088-095-46-1-1 GOST 9833-73	49	1 pc.
Screw M6x25 GOST 11738-84	50	2 pcs.



RNGI

phone:
+1 (512) 861-19-64

e-mail: manager@rngi.net
www.rngi.net

