

B2618 4-JAW SELF-CENTERING CHUCK

Owner's Manual



Packing List

1 a.	4-Jaw self -Cleaning Chuck	.1pc
1 b.	Wooden Screw	.1pc
1 c.	T-Bar Allen Key	.2pcs
1 d.	Insert	.1pc
1 e.	Lever	.1pc
1 f.	Spare Jaws	.1set

- 2. Optional Accessories
- 3 a. Pin Jaws (Model Number B2619)
- **3 b.** Dovetail Jaws (Model Number B2620)
- 3 c. Sleeves (Model Number B261818)

Description

This chuck is 4-Jaw Self-Centering chuck that features precision, simplicity and reliability of the engineering chuck. This Chuck grips internally and externally. It holds round and square work and has a hollow center so through boring can be done from either end and it can be run clockwise or counterclockwise.

Safety Precautions

- Read and understand instruction manual before operating your chuck.
- Always wear eye protection.
- Do not wear gloves, neckties, jewelry or loose clothing while operating the lathe.
- Do not operate without guards in place.
- Rough out work-piece before installing face plate. Do not mount a split work-piece or one containing a knot.
- Tighten all locks before operating.
- Rotate work-piece by hand before applying power.
- Use the slowest speed when starting a new work-piece.
- Disconnect machine from power source before making repairs or adjustments.
- Do not operate while under influence of drugs, alcohol or medication.
- Remove the tool rest before sanding or polishing.

It is beyond the scope of this manual to describe all the turning techniques that are possible with B2618 4-Jaw Chuck. It is recommended that beginner turners attend a reputable course of instructions or refer to one of the many available books on turning techniques.

Mounting on Lathe

The B2618 4-Jaw Chuck fits a wide range of lathe spindle sizes. This is done by changing the threaded insert. Your local Busy Bee Tools will advise on the insert required for your lathe. Check that the insert is firmly screwed into the chuck body and then screw the assembled chuck onto the lathe spindle. Insert must be firmly seated against the lathe spindle shoulder.

The Screw Point

The screw chuck is used to mount small, cross-grained pieces.

Operation

The B2618 4-Jaw Chuck provides one-hand tightening along with tremendous griping power provided by the 6 to 1 ratio of scroll. The totally enclosed back assures consistent, smooth action by preventing dust and debris from getting into scroll of the chuck.

Its compact size makes it ideal for use on 300mm (12") capacity lathes or smaller.

Clamp Mode

With this application the work-piece is held by the jaws. To achieve a good hold, press the bowl end hard against the jaws. When pre-turning bowls from green timber it is possible to do this between centers with a pivot chuck. Turn a 5mm to 10mm deep dovetail recess first.

Expansion Mode

For this application a recess is turned into the work-piece. The depth of the recess depends on the actual size of the work-piece as well as the type of timber used. The minimum depth should be 5mm to 10mm.

Maintenance

The chuck is engineered to close tolerances and may initially be stiff to operate. With use movement will be easier. To maintain easy jaw action, regularly spray oil into the scroll and work lever through full range of movement. Inspect chuck regularly for build-up of dust in the scroll and jaws. Clean as required.

Beginner's Hints

Prepare the work-piece the following way: 200-250mm diameter. 40-50mm thick, RPM 80-100

- **1.** Drill a 25mm deep and 7-8mm diameter hole in the center of work-piece (avoid drilling the end grain, less grip).
- **2.** Make sure the work-piece is as round as possible.
- **3.** Choose the appropriate speed before you start the lathe.
- **4.** Screw the work-piece hard against the jaws.
- **5.** Heavy or unbalanced work-pieces should not be fastened directly to the screw chuck. Use the faceplate rings instead.

OPTIONAL ACCESSORIES

25mm Pin Jaws (Figure-1)

These jaws are used for expansion into small recesses and for firm holding of fine spindle work, such as earrings, chess pieces, etc. They are ideal for turning salt and peppers as well. To turn very small articles, the jaws can be unscrewed and the backing jaws only can be used.

Dovetail Jaws (Figure-2)

Dovetail jaws are designed for mounting bowls by expanding into a recess or clamping onto a spigot. The size indicated is the outside measurement of the jaw face when fully closed. Dovetail jaws provide approximately 25mm of expansion beyond their specified size.

Sleeves (Figure-3)

A wide range of sleeves are available for most spindle sizes and thread configurations.



Fig-1 B2619



Fig-2 B2620



Fig-3 B261818