

Wet Abrasion Scrub Tester

BEVS 2805

User Manual



Original instruction

Version 201412

This manual shall be read carefully before starting. Directions included in this operation manual shall be strictly followed.

Content

1 Company Profile

EC Declaration of Conformity

2 Product Introduction

2.1 Introduction

2.2 Safety Instructions

2.3 Application

2.4 Features

2.5 Technical Specification

2.6 Standards

2.7 Carriage Assemblies

2.8 Clamping Frame

2.9 Container setup

3 Operation Introduction

3.1 Component Introduction

3.2 Operating Steps

3.3 Touch Screen Use

4 Maintenance

5 Attention

6 Order Information of Accessories

7 Packing List

1 Company Profile

BEVS Industrial Co., Ltd. is a leading manufacturer that specializes in coatings, ink, painting, resin testing instruments and laboratory whole solution.

We offer the complete and unique products in this field to meet customer's challenging demands of today and tomorrow, the products are complied with the standards of ISO, ASTM, DIN, BS, EN etc.

With strong supports and hard work by lots of end-users and worldwide agents, BEVS become more and more famous in the world and provides more competitive values for our customers.

2 Product Introduction

2.1 Introduction

This BEVS2805/2 (other model BEVS2805, BEVS2805/1, BEVS2805/3) machine, also called a double headed washability tester, is designed to provide an accelerated method of determining abrasive wear resistance of surface coatings/ materials, and also to test the performance and abrasive effect of cleaning compounds.

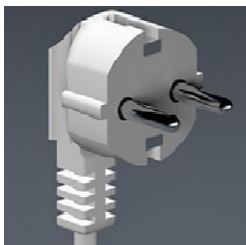
The abrasion tester provides a means of carrying out such a test under accurately controlled conditions, resulting in repeatability of results and close comparability of performance between the two test heads which operate side by side.

2.2 Safety Instructions

1. Read this instruction manual carefully before switching on the instrument.






2. Keep this instruction manual for future reference.
3. Observe all safety and warning markings on the instrument.
4. Avoid splashing water/fluids over machine when dosing brushes. Keep fluids to a minimum, taking care not to flood drip tray. Check that drain pipe is always clear.
5. This instrument must only be used in areas electrically classified as NON HAZARDOUS.
6. Ensure that voltage label on the instrument matches your local supply.



7. This equipment must be earthed any interruption to the mains earth conductor will make the instrument dangerous.

8.Ensure the unit is placed on a solid level surface.

9.Moving parts for processing are not protected with guard, because the movement is limited and speed is not high. After risk assessment, we verified the risk from moving parts is low and warning about the residual risk as below:

		
<p>Moving parts</p>	<p>impact/crushing</p>	<p>impact</p>

2.3 Intended use

Paint,coating, leather, wood, plastic, printing materials and fiber etc.

2.4 Features

- Big LCD design, touch-screen operation.
- Operating Menu: Chinese or English.
- Testing fluid flow is controlled by peristaltic pump.
- Twin scrubbing heads, mounted on two different carrier assemblies.
- Brush with nylon bristle - plus weight to achieve correct load.
- Quick release test panel clamping frame.
-

2.5 Technical Specification

- Scrub Rate: 37 ±1 cycles/min
- Maximum Setting of Abrasion Times: 9999
- Test Panel height variable: 0-25 mm (Adjustable)
- Net weight: 35Kg
- Dimension: 622 x 509 x 320

2.6 Standards

ASTM 2486, D3450, D4213, D4828

DIN EN 53778*, 13 300

ISO 11998

2.7 Carriage Assemblies

1. The Brush Carriage Assembly consists of a beam which spans across the width of the machine from which are suspended two double cantilever arms. Attached to the cantilever arms are brush holders into which the scrub brushes are placed.
2. The Brush Carriage Assembly is mounted on the machine by clamping the carriage assembly beam at its ends to pillars which are reciprocated in unison backwards and forwards through the set stroke length at a set scrub rate of 37 ± 1 cycles per minute.
3. The height of the beam has been set for carrying brush holders, and brushes, and ensures that each brush applies a total mass of 454 grams ± 10 g onto the test samples.
4. When placing rubber mats and brushes into holders, ensure that they sit level on the surface of test piece. Before any test is carried out we recommend that the brushes are leveled as per the specification.

2.8 Clamping Frame

1. Ensure machine is switched off.
2. To lift clamp frame, lift both small levers (A) together.
3. To lower clamp frame, push down both sides of frame whilst holding both small levers (A) up.
4. To clamp test panel when frame has been lowered, push large levers (B) down. Only light pressure is required.

2.9 Container setup

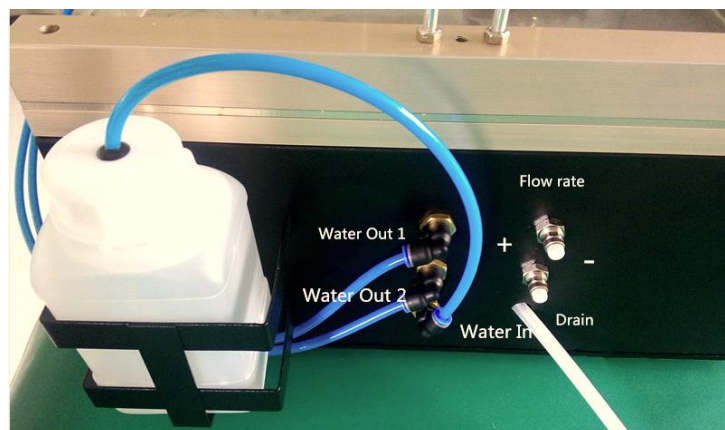
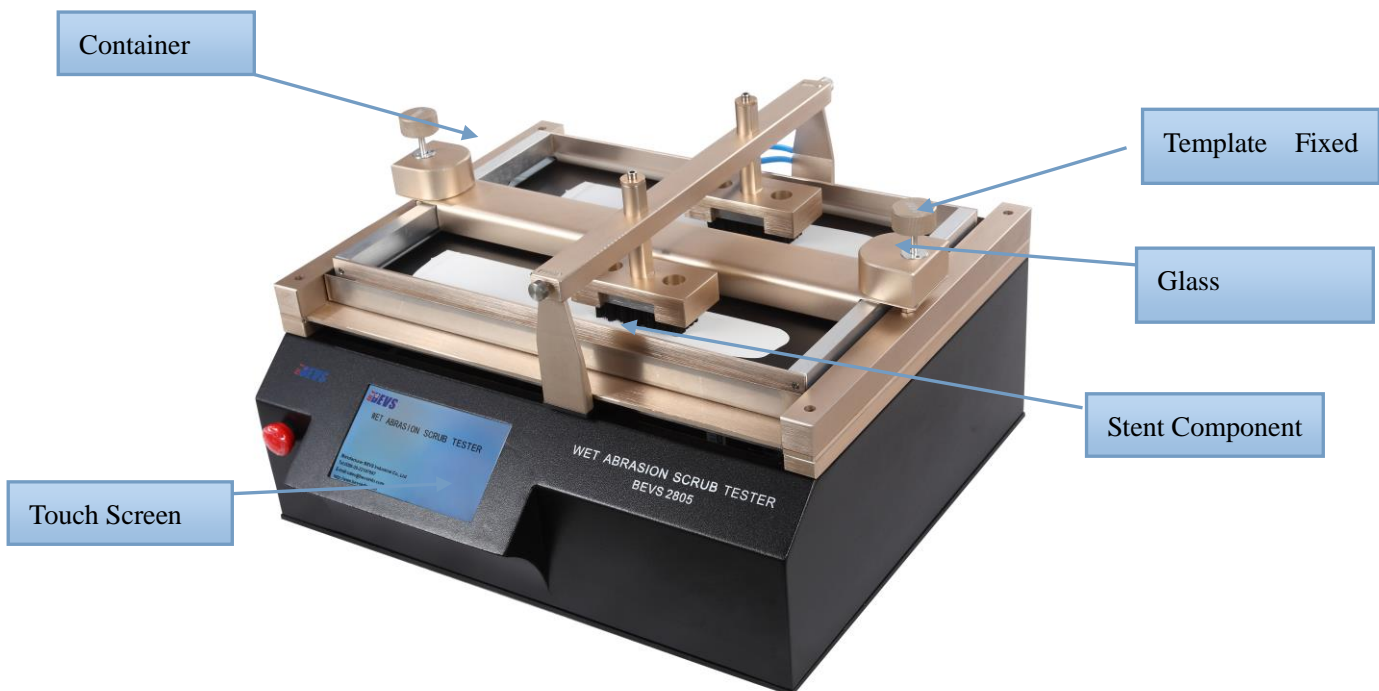


FIGURE 6

1. Place the water or other liquid into the container and switch on the pump via touch screen.
2. Adjust the water flow rate through the two flow rate adjustable nut,+ increase, -reduce
3. The waste water can directly drain it to tank or outside

3 Operation Introduction

3.1 Component Introduction



3.2 Operation

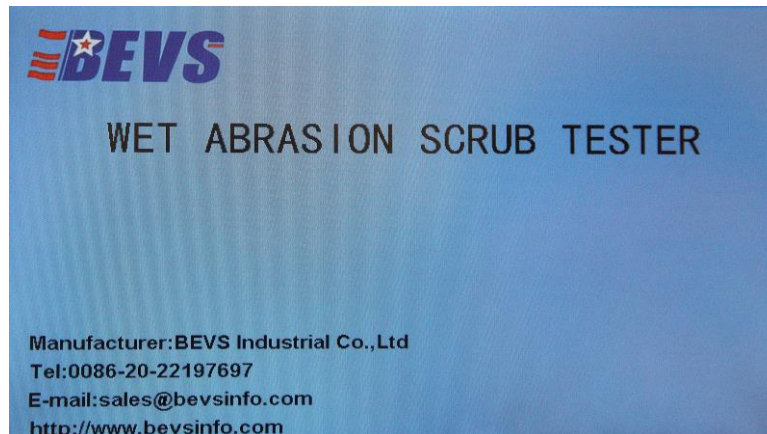
1. Place the instrument on the horizontal table
2. Settle the glass plate in the middle of light stainless steel trough plate
3. Install and clamp the test panel well
4. Connect circuit and power on
5. Refer to 3.3 Touch Screen Use
6. Open the injection pump if need (See the relevant test specification)
7. Press the start button on the screen to start the test

3.3 Touch Screen Use

3.3.1 Connect up mains supply to machine (220V 50Hz)

3.3.2 Power On

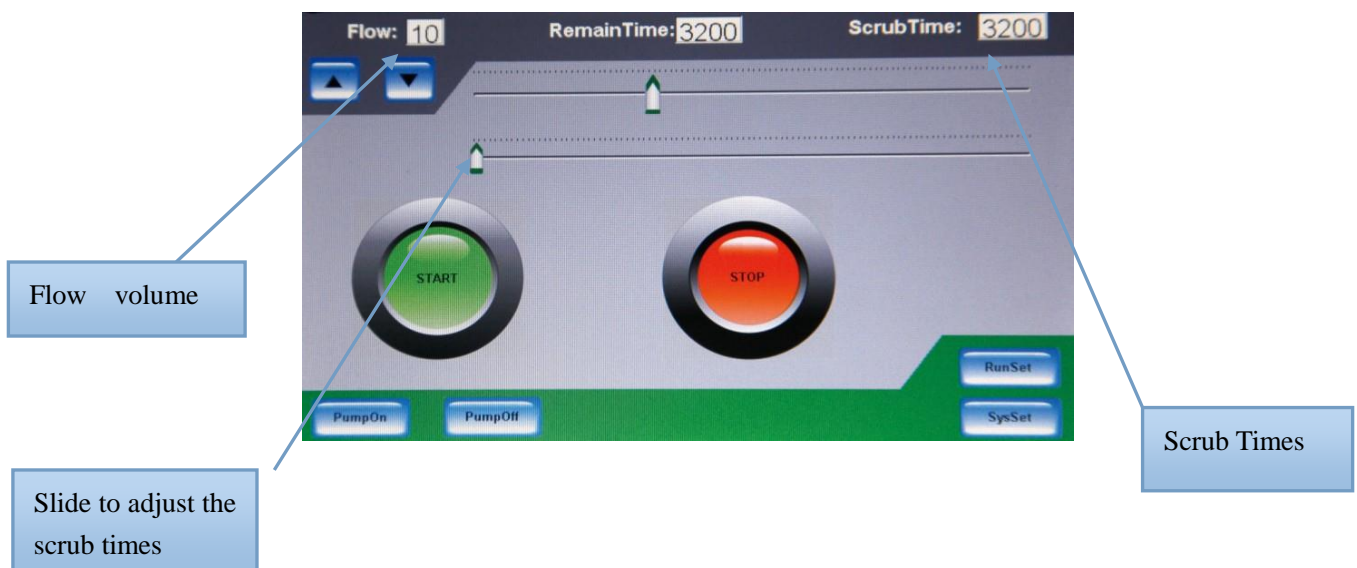
3.3.3 Enter the welcome screen and select the language



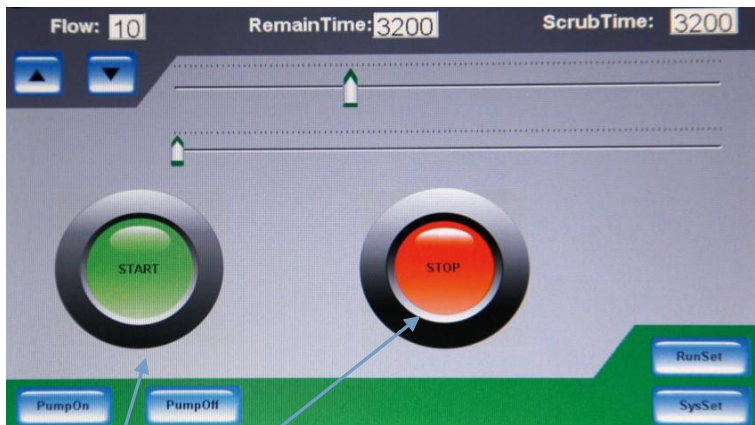
3.3.4 Pre-set the flow and scrub times

1) Reagent Flow Setting: press button to increase flow volume, press button to decrease flow

2) Scrub Times Setting: slide to right to increase the scrub times, slide to left to decrease the scrub times



3.3.5 Press the start button to test after all the test conditions is ready



Start and Stop Button

3.3.6 Press stop button to end the test and the machine will be stop automatically when getting reach the preset measuring times

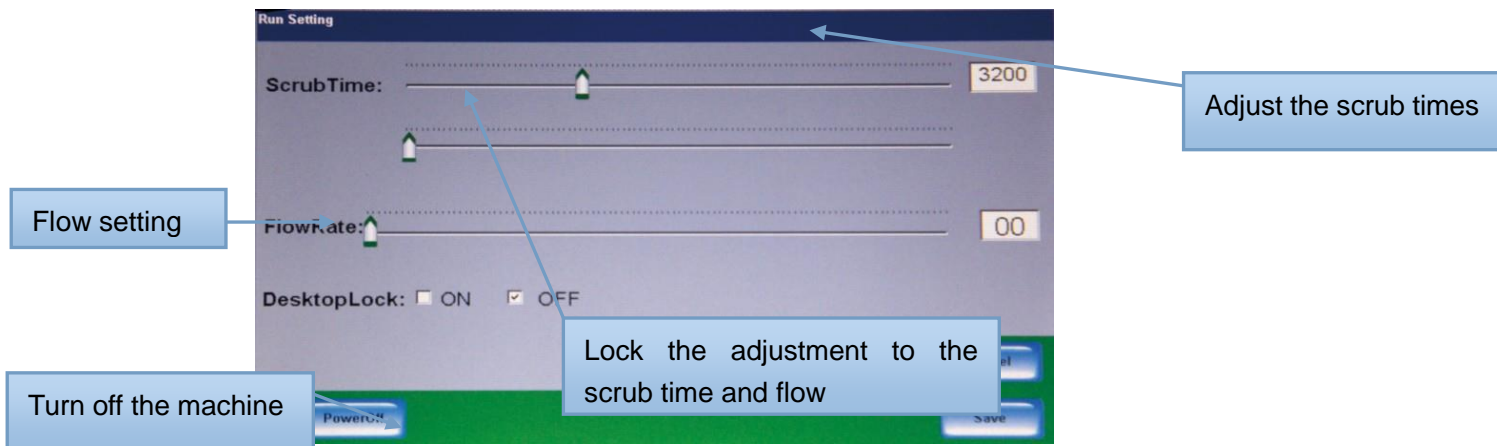


3.4 Touch Screen Parameter Setting

3.4.1“Run Set” is able to set the run parameter:

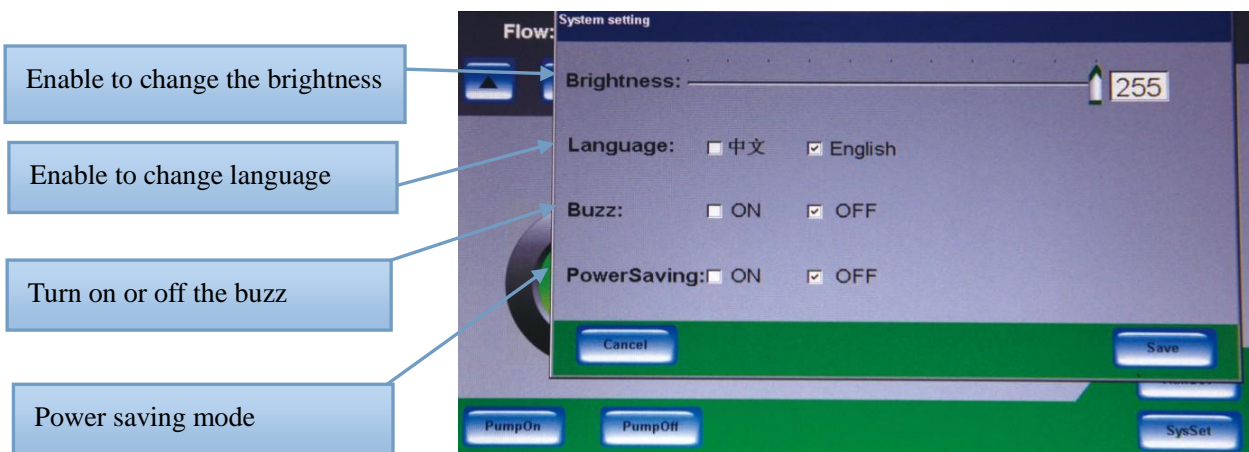
- 1) Open this setting screen, enable to quick set the scrub times and flow
- 2) It is not able to adjust the scrub times and scrub speed on the desk when opening the desktop

lock



3.4.2 System Setting

- 1) Screen brightness is adjustable
- 2) Language (Chinese or English)
- 3) Turn on or off the buzz
- 4) When opening the power saving mode, the machine will go into the standby mode and close the brightness if long time no being pressed by user



3.4.3 All the settings must be saved before being effective, if return to last menu directly without saving, then all the settings will be ineffective.

4 Maintenance

1. Before carrying out any maintenance, ensure machine is disconnected from mains

supply

2. At least one time clean for the component on the trough frame every week
3. At least one time check for the friction head connecting every month, ensure the correct installation of friction head and run in free movement
4. Check the pump condition every month
5. Once a year, disconnect from mains. Tilt machine on its back, remove base, and undo screws located in each corner. Clean two slide rods and regress using Lithium grease. Replace base and lay machine on a level surface.

5 Attention

- 5.1 Make sure that the machine is under using in the dry environment without corrosivity
- 5.2 Putting on the firm working surface
- 5.3 There must have the reliable ground wire in the outlet
- 5.4 Operation Condition: Using this machine in the room with the temperature in between 15 to 35 degrees
- 5.5 The A-weighted emission sound pressure level at workstations does not exceed 70 dB(A).

6 Order Information of Accessories

Wriggle Stick	2805/2/S1
Fuse 3.15A (230V)	2805/2/S2
Brush	2805/2/S3
Copper Sheet	2805/2/S4
Silicone Tube	2805/2/S5
Black Plastic Test panels	2805/2/S6
Glass Plate	2805/2/S7

7 Packing List

BEVS2805:

1.Pig Fur Brush 2 pcs 2.Plastic Bottle 1 pc 3.User Manual 1pc 4.Touch Pen 1pc
5.Power Lead 1pc 6. Certificate of Conformity 1pc 7.Glass 1pc
(Weight of Brush 500g)

BEVS2805/1:

1.Pig Fur Brush 2 pcs 2.Plastic Bottle 1 pc 3.User Manual 1pc 4.Touch Pen 1pc
5.Power Lead 1pc 6. Certificate of Conformity 1pc 7.Glass 1pc
(Weight of Brush 250g)

BEVS2805/2:

1.Nylon Brush 2 pcs 2.Plastic Bottle 1 pc 3.User Manual 1pc 4.Touch Pen 1pc
5.Power Lead 1pc 6. Certificate of Conformity 1pc 7.Glass 1pc 8.Rubber Pad 2 pcs
9.Brass Pad 2 pcs
(Weight of Brush 454g)

BEVS2805/3:

1.Sponge 2 pcs 2.Plastic Bottle 1 pc 3.User Manual 1pc 4.Touch Pen 1pc
5.Power Lead 1pc 6. Certificate of Conformity 1pc 7.Glass 1pc
(Weight of Brush 1500g)

BEVS2805/4:

1.Sponge 2 pcs 2.Plastic Bottle 1 pc 3.User Manual 1p 4.Touch Pen 1pc
5.Power Lead 1pc 6. Certificate of Conformity 1pc 7.Glass 1pc 8.Pad 2 pcs
(Weight of Brush 470g)

BEVS2805/5:

1.Sponge 2 pcs 2.Plastic Bottle 1 pc 3.User Manual 1pc 4.Touch Pen 1pc
5.Power Lead 1pc 6. Certificate of Conformity 1pc 7.Glass 1pc
(Weight of Brush 1000g)

BEVS2805/7:

Non wove pad 2 pcs 2.Plastic Bottle 1 pc 3.User Manual 1pc 4.Touch Pen 1pc
5.Power Lead 1pc 6. Certificate of Conformity 1pc 7.Glass 1pc
(Weight of Brush 130g)

BEVS2805/8:

1.Non woven abrasive pad 2 pcs 2.Plastic Bottle 1 pc 3.User Manual 1pc
4.Touch Pen 1pc 5.Power Lead 1pc 6. Certificate of Conformity 1pc 7.Glass
1pc

(Weight of Brush135g)

Remark:If the model is not marked, it will be configured according to the model

BEVS2805/2