MEASURING BENCHES **E**

BANCS DE MESURE **F**

MESSBÄNKE **D**





INSTRUCTIONS

MODE D'EMPLOI

BEDIENUNGSANLEITUNG

Description

E

1. Base
2. Fixed headstock for integrated probe (depending on version)
3. Integrated probe (depending on version)
4. Measurement system (probe or comparator) clamp screw
5. Release lever
6. Measurement position adjustment knob
7. Adjustment knob friction lever
8. Pressure spring access screw
9. Moving measurement spindle for Sylvac Ø1.5 probe and Cary compatible probe
10. Fixed measurement spindle for Sylvac Ø1.5 probe and Cary compatible probe
11. Anvils locking screw
12. Fixed height tailstock (depending on version)
13. Tailstock position locking lever
14. Headstock for comparator (depending on version)
15. Reducing bush for comparator
16. Measurement comparator (sold separately)
17. Adjustable height tailstock (depending on version)
18. Tailstock height adjustment vernier
19. Tailstock height locking screw (4x)
20. Adjustable height tailstock with comparator (depending on version)
21. Tailstock height adjustment comparator

E

1. General usage remarks (factory assembly)

- The original anvils assembled on both measurement axes are lapped in position to guarantee an optimum measurement. Any disassembly of these anvils can lead to a reduction in the accuracy of the instrument.
- The tailstock was positioned to have 0.5mm prestress in the probe zero posi-tion.
- Using the release lever allows a measurement range of about 3.5mm. Releasing the release lever too sharply can have a harmful influence on the probes and the measurement accuracy.
- It is advisable to check the reference (origin) during use.
- Monitor the cleanliness of the moving spindle. If necessary clean with light ben
- Certain components, notably the headstock clamp screws are sealed after assembly and consequently must not be removed. Any work on these components by a third party can lead to loss of the guarantee.

2. Operating features of the instrument

Whether it is a version with probe or version with dial gauge, the instrument has a measurement range of about 3.5mm for a measurement scale of 10mm. This measurement capacity can be extended to 37mm.

The moving tailstock is available in three variants :

- fixed tailstock
- tailstock with fine height adjustment
- tailstock with fine height adjustment and checking comparator

The instrument can be equipped with several standard accessories. Their

descriptions with explanations and use are found in chapter 7.

3. Specifications

Measurement capacity :	0-37mm
Measurement scale :	0-10mm
Measurement range :	3,5mm
Measurement force	1,0 N
Weight :	1,4 kg
Probe system :	Ø1,5 and compatible Cary
Working temperature (storage) :	+5 à +40°C (-10 à +60°C)

4. Use in standard mode (0-10mm)

- The instrument is factory adjusted for a measurement range of about 3.5mm,visible by opening the probes using the release lever.
- To increase or decrease the measurement range, simply unscrew, or screw in, respectively, the adjustment knob (6) whilst simultaneously pressing the friction lever (7). The measurement scale can be increased up to a maximum of 10 mm: in this case the measurement range between 7 and 10mm reduces proportionately.
- It is advisable to reset the measurement device (probe or dial gauge) to zeroto make the

5. Use in extended mode (10-37mm)

- The measurement capacity can be extended to 37mm by moving the moveable tailstock. To do this, unlock the eccentric locking lever (13) and slide the tailstock on the base. In certain cases, moving the tailstock can lead to a reduction in measurement accuracy.
- In this operating mode instrument calibration is done with blocks, suitable gauges
- Measurement range adjustments are done in the same way for the standard operating

6. Using the adjustable tailstock (with or without comparator)

- The tailstock height is adjusted with the adjustment vernier (18) always moving down (clockwise rotation for compliance with the play). First, it is essential to loosen the 4 locking screws (19) and moderately retighten them after adjustment.
- For the tailstock with comparator, the use of a specific comparator (sold separately) that has been configured to comply with a maximum measurement error of 0.02mm is essential. For more information on its use see its instruction manual.
- It is advisable not to switch off the comparator completely as this risks losing the set height difference between the two probes (in standby mode the value is retained).

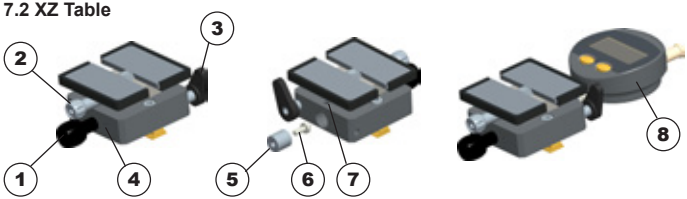
E

7. Accessories

7.1 Measurement probes

- Several standard anvils types are available. See the general catalogue. (measuring benches catalogue)
- Other specific anvils can be supplied on customer request.

7.2 XZ Table



Description

1. Fine height adjustment screw
2. Plate locking screw
3. Horizontal locking lever
4. Height locking screw
5. Closure plug
6. Comparator probe
7. Plug / comparator retaining screw
8. Vertical movement indication comparator (sold separately)

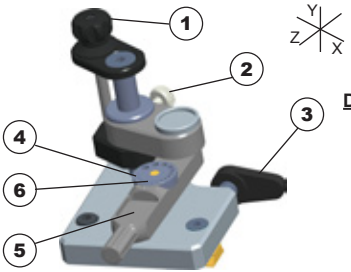
Use :

- After positioning it horizontally in the desired location it lock the table using the locking lever (3)
- Unlock the plate using the locking screw (2) and move it manually close to the
- Adjust the desired height accurately using the fine adjustment screw (1). Lock as needed using the locking screw (4)

Fitting the comparator: (option)

- Unlock the locking screw (7) and remove the closure plug (5) with the assistance of an M2.5 screw if necessary.
- Remove the special conical contact point (6) behind the plug and screw on the comparator measurement plunger.
- Raise the table as far as it will go using the fine adjustment screw (1) before inserting the comparator until it stops.
- Moderately tighten the locking screws (7)

7.3 Floating table



Description

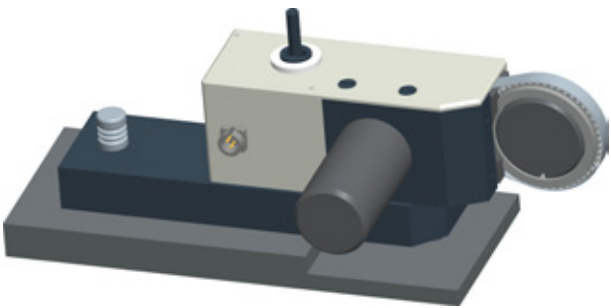
1. Height adjustment knob (0.5mm/turn)
2. Y axis locking screw
3. Locking lever
4. Indexed hole disc
5. Floating arm
6. Location for part to be measured

Use:

- Position the hole in the disc (4) corresponding to the part to be measured oppositethe mark on the floating arm (5)
- Move the table on the base so that the floating arm (5) is located approximately perpendicular to the instrument measurement axes before locking it using the locking lever (3)
- Move the part to be measured vertically towards the measurement probes using the
- The part to be measured can easily be positioned between the measurement probes. The degree of freedom of movement can be reduced by moderate tightening of the locking screw (2)

7.4 Grinding tool

- See general catalogue. (measuring benches catalogue)



CERTIFICATE OF CONFORMITY
We certify that this instrument has been manufactured in accordance with our Quality Standard and tested with reference to masters of certified traceability by the National Office of Metrology.

CALIBRATION CERTIFICATE
Because we make our instruments in batches, you may find that the date on your calibration certificate is not current. Please be assured that your instruments are certified at point of production and then held in stock in our warehouse in accordance with our Quality Management System ISO 9001. Re-calibration cycle should start from date of receipt.

CERTIFICAT DE CONFORMITE
Nous certifions que cet instrument a été fabriqué et contrôlé selon nos normes de qualité et en référence avec des étalons dont la traçabilité est reconnue par l'office national de métrologie.

CERTIFICAT D'ÉTALONNAGE
En raison de la fabrication de nos instruments par lots de production, il est possible que la date de votre certificat d'étalonnage ne soit pas actuelle. Nous garantissons que nos instruments sont certifiés au moment de leur fabrication puis stockés conformément à notre système de gestion de la qualité ISO 9001. Le cycle de réétalonnage peut commencer à partir de la date de réception.

QUALITÄTSZEUGNIS
Wir bestätigen, dass dieses Gerät gemäss unseren internen Qualitätsnormen hergestellt wurde und mittels Normalen mit anerkannter Rückverfolgbarkeit, kalibriert durch das Nationalamt für Metrologie, geprüft worden ist.

ZERTIFICAT
Da wir unsere Instrumente in Serien herstellen, kann es sein, dass das Datum auf dem Zertifikat nicht aktuell ist. Die Instrumente sind jedoch ab der Herstellung zertifiziert und werden dann gemäß unserem Qualitätsmanagementsystem ISO 9001 in unserem Lager aufbewahrt. Der Nachkalibrierungszyklus kann ab dem Empfangsdatum beginnen.

SYLVAC SA
Avenue des Sciences 19
CH-1400 Yverdon

Tel +41 21 637 67 57
Fax +41 21 637 67 40
Email admin@sylvac.ch
www.sylvac.ch

EU DECLARATION OF CONFORMITY (DoC)

We, Sylvac SA, hereby declare under our sole responsibility that the product

Name	PS15 & PS17
Description	Bench table mecanics only
Part Numbers	

has been submitted to a conformity assessment and fulfils the essential requirements of the following European directives/re.

2023/988 (EU)	General product safety Regulation
2011/65/EU & 2015/863/EU	RoHS

and complies with the following harmonized standards or other normative documents

EN 61326-1:2021	Electrical equipment for measurement, control and laboratory use – EMC requirements
EN IEC 63000:2018	Technical documentation for the assessment of electrical and electronic, products with respect to the restriction of hazardous substances

Person authorized to compile the technical file and issue the declaration of conformity: Eric Schnyder

Place and date of issue	Yverdon-Les-Bains, August 12, 2024
Name (position)	Eric Schnyder (CEO)
Signature	