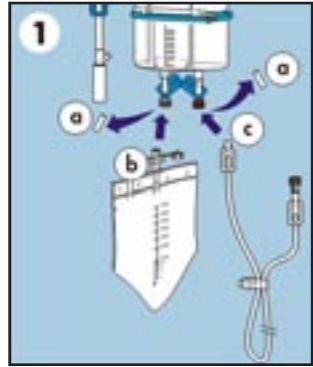


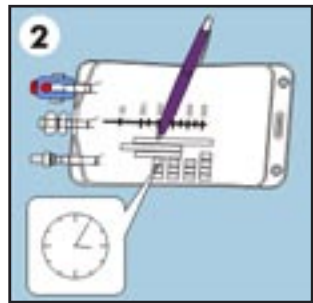
SET UP

Open the Sangvia™ package ensuring that the contents do not become contaminated

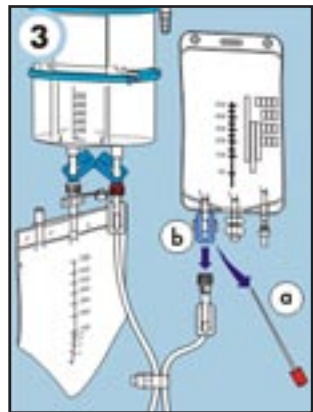
1. a) Remove the protective covers from the outlets of the collection unit.
- b) Connect the waste bag to the waste outlet (white connector).
- c) Connect the autotransfusion tubing to the autotransfusion outlet (red connector).



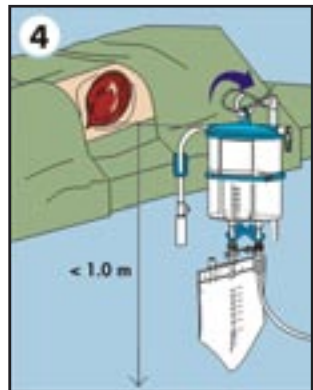
2. Mark the autotransfusion bag with the patient's name, date of birth, gender and hospital number. Mark also the date and time that blood collection started.



3. a) Remove the protective cover from the autotransfusion bag.
- b) Connect the autotransfusion bag to the autotransfusion tubing.

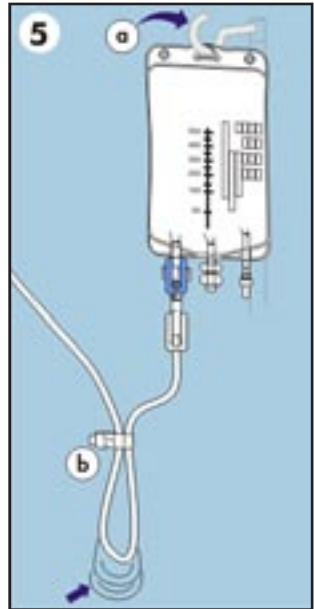


4. Place the collection unit in an upright position no higher than the operation site – approximately 1 m above the floor. Ideally, keep the suction line as horizontal as possible.

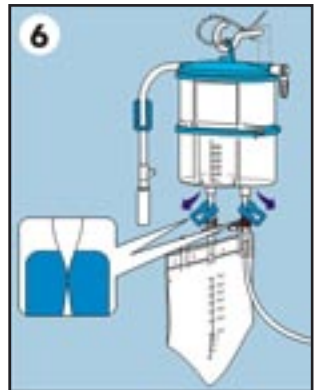


SET UP

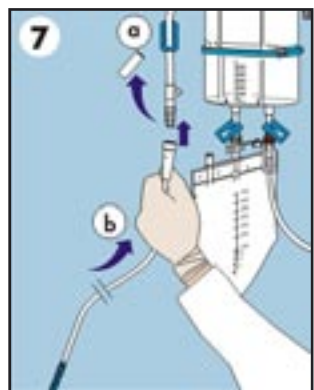
5. a) Suspend the autotransfusion bag from a suitable place, for example on an IV pole.
b) If necessary, adjust the length of the tubing by the tube clip.



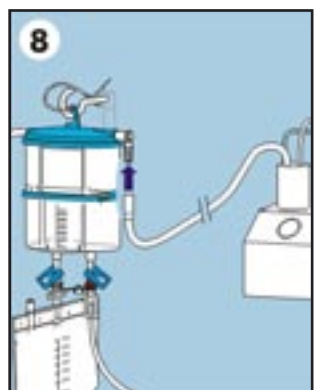
6. a) Close the slide clamps at the outlets of the collection unit.



7. a) Remove the protective cover from the inlet tubing.
b) Connect the suction tubing to the inlet tubing.



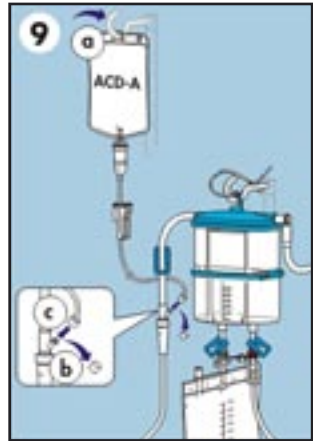
8. Connect the vacuum port of the collection unit to an external suction source.



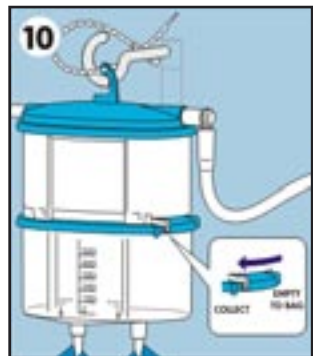
SET UP

9. a) Prepare the anticoagulant solution, insert an infusion set and suspend from an IV pole.
- b) Remove the protective cover from the injection port.
- c) Connect the infusion set from the anticoagulant solution to the injection port on the inlet tubing.

Note: The recommended anticoagulant is ACD-A. If ACD-A is not available, sodium citrate or CPD may be used instead.



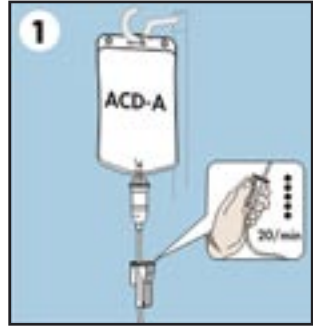
10. Ensure that the slider is in the COLLECT position.



BLOOD COLLECTION

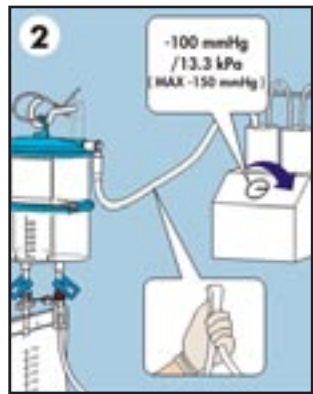
1. Set the anticoagulant drip to the appropriate rate.

Note: The recommended ratio is 1:7 which corresponds to a drip rate of 20 drips per minute (14 ml ACD-A for each 100 ml of blood collected). The same ratio is recommended also if sodium citrate or CPD is used.



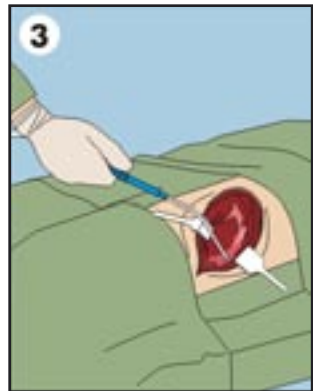
2. Set the vacuum regulator to the recommended negative pressure of 100 mmHg / 13.3 kPa.

Note: The maximum permitted negative pressure is 150 mmHg / 20 kPa. To ensure that the vacuum level does not exceed the set level, flex the tubing while the regulator is adjusted.



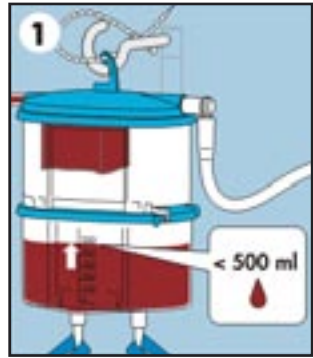
3. Start aspirating pooled, free-flowing blood into the system.

Note: A separate aspirator must be used whilst cleaning the wound area with saline or whilst anchoring or removing a cemented prosthesis. A separate aspirator should also be used when a higher vacuum than -150 mmHg / 20 kPa is required.



REINFUSION

1. Start the reinfusion phase before the blood has passed the 500 ml level in the lower chamber of the collection unit, or at the end of the operation.

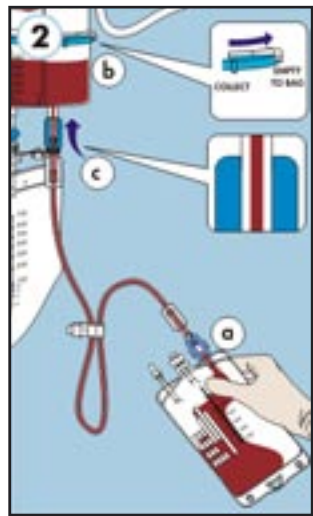


2. a) Make sure that the autotransfusion bag is positioned lower than the collection unit.

b) Move the slider to **EMPTY TO BAG** position.

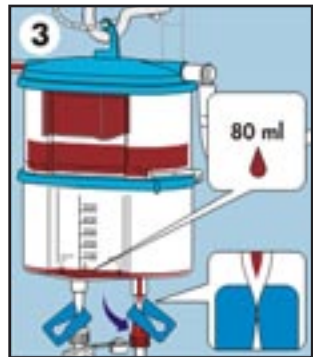
c) Open the slide clamp between the collection unit and the autotransfusion tubing.

The blood in the lower chamber will be emptied in to the autotransfusion bag. Any blood that is aspirated during emptying of the lower chamber will stay in the upper chamber.



3. When the blood has emptied in to the autotransfusion bag, close the clamp.

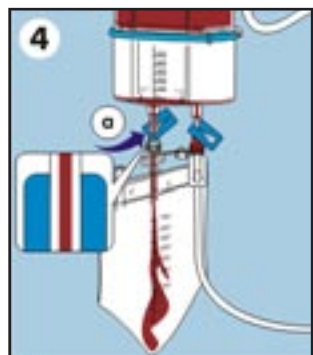
Note: There will always be approximately 80 ml fat-concentrated blood left at the bottom of the lower chamber that can only be emptied in the waste bag.



4. Empty the fat-concentrated blood in to the waste bag:

a) Open the slide clamp to the waste bag. The contents in the lower chamber will be emptied in to the waste bag.

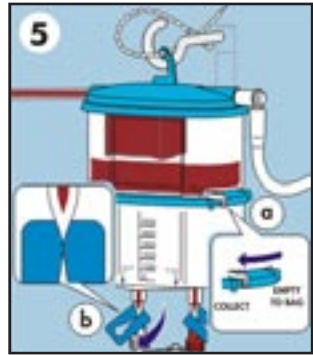
*Note: If the slider is not in the **EMPTY TO BAG** position - move it to this position.*



REINFUSION

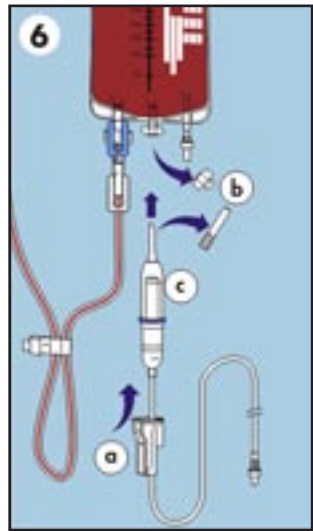
5. When emptying has finished:

- a) Move the slider back to COLLECT position.
- b) Close the slide clamp. The blood in the upper chamber will flow down to the lower chamber.



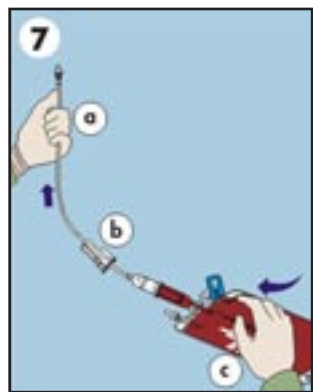
Open the transfusion set without contaminating the connections

- 6. a)** Position the roller clamp on the transfusion tubing adjacent to the drip chamber. Close off the roller clamp.
- b)** Remove the protective caps from the piercing spike and the spike port of the autotransfusion bag.
- c)** Insert the piercing spike into the spike port.

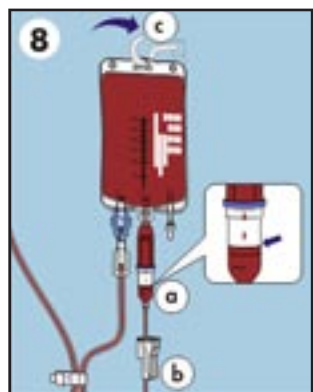


7. To expel any air from the autotransfusion bag and to prime the filter and drip chamber:

- a) Invert the transfusion set and the autotransfusion bag.
- b) Open the roller clamp.
- c) Gently squeeze the autotransfusion bag (retrograde priming).



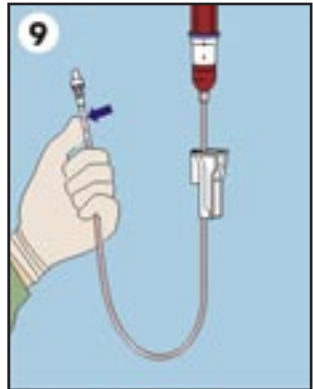
- 8. a)** Fill up to the mark on the drip chamber.
- b)** Close the roller clamp ensuring that the level is maintained in the drip chamber.
- c)** Suspend the autotransfusion bag on the IV pole.



REINFUSION

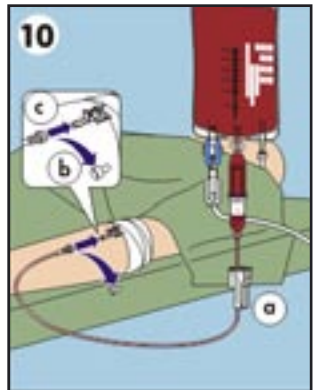
9. Carefully open the roller clamp and expel all the air from the transfusion tubing.

Note! The transfusion tubing must not be connected to the patient's IV cannula while air is being expelled.



10. a) Close the roller clamp.
b) Remove the protective cap from the end of the transfusion tubing.
c) Connect the transfusion tubing to the patient's IV cannula.

Adjust the roller clamp to start reinfusion



Steps 1-10, excluding steps 6, may be repeated.

Note: Blood collection must be completed within 6 hours from the start of the intraoperative collection.

SET UP (POST-OPERATIVE USE)

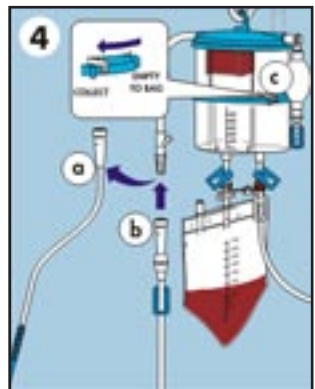
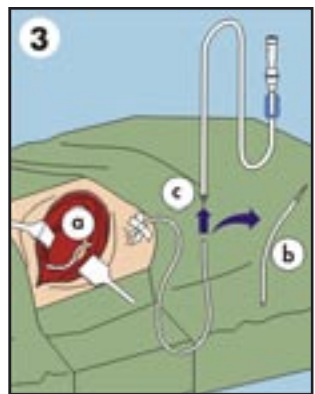
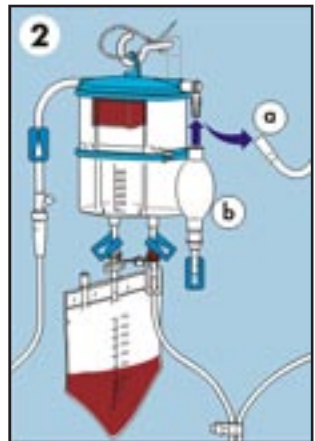
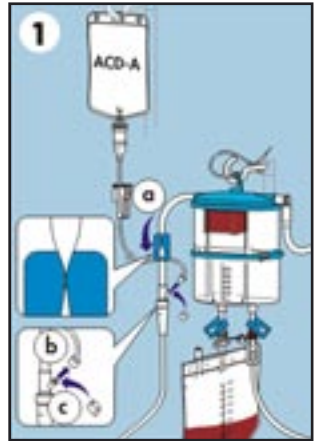
Open the Sangvia™ set ensuring that the contents do not become contaminated

1. a) Close the slide clamp on the inlet tubing.
b) If no more anticoagulant is going to be used, disconnect the tubing from the injection port.
c) Secure the luer lock cap tightly on the injection port.

2. a) Disconnect the collection unit from the external suction source and dispose of the vacuum tube.
b) Connect the suction bulb to the vacuum port.

3. a) Insert the drainage catheter into the wound using the usual surgical technique.
b) Remove the trocar and secure the drainage catheter.
c) Connect the drainage catheter to the drainage tubing.

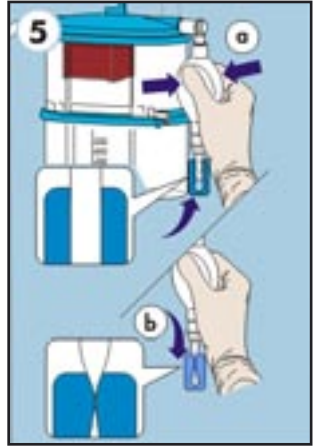
4. a) Remove the suction set from the collection unit.
b) Connect the drainage tubing to the inlet tubing.
c) Ensure that the slider is in COLLECT position.



SET UP (POST-OPERATIVE USE)

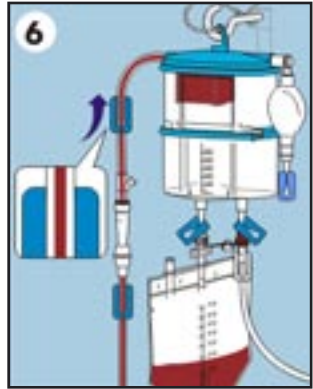
5. a) Activate suction by squeezing the suction bulb several times until it is fully compressed.
- b) Close the slide clamp on the suction bulb.

Note: Initial maximum negative pressure in the collection unit is approx. 80 mmHg / 10 kPa. Even if the suction bulb is expanded, negative pressure at a lower level will still be present. If a maximum negative pressure (= 80 mmHg / 10 kPa) is required, this is achieved when the bulb is fully compressed.



6. To start blood collection, open the slide clamp on the inlet tubing.

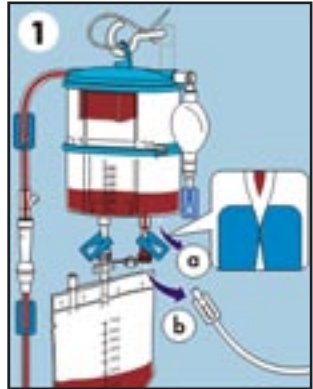
Note! For further routines regarding reinfusion, see previous instructions. Blood collection must be completed within 6 hours from the start of the postoperative collection.



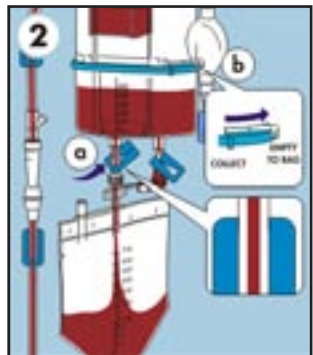
CONTINUATION OF DRAINAGE

After conducted reinfusion, the system can be used as a standard drain. Remove the autotransfusion tubing, the autotransfusion bag and transfusion set to make the system more compact.

1. a) Close the slide clamp at the autotransfusion outlet.
- b) Disconnect the autotransfusion tubing. Discard tubing, bag and transfusion set following the hospital procedures for contaminated waste.

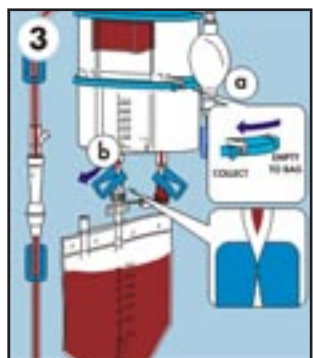


2. The contents of the collection unit can be emptied in to the waste bag:
 - a) Open the slide clamp to the waste bag.
 - b) Move the slider to EMPTY TO BAG position. The contents in the lower chamber will be emptied in to the waste bag.



3. When emptying has finished:
 - a) Move the slider back to COLLECT position, to continue the collection of drainage fluid.
 - b) Close the slide clamp.

Note! If the waste bag is full, it can be replaced by a new one.





With Autotransfusion tubing

Product range Sangvia™

- 68430 Sangvia™ Blood Salvage System, intra-operative set
- 68434 Sangvia™ Post-operative Set FG 10
- 68435 Sangvia™ Post-operative Set FG 14
- 68436 Sangvia™ Post-operative Set FG 18
- 68437 Sangvia™ Vacuum tubing
- 68438 Sangvia™ Suction set
- 68379 Companion set
- 68337 Exchange Waste bag
- 68381 Transfusion set
- 68376 Y-connector and catheter FG 10
- 68385 Y-connector, catheter and trocar FG 10
- 68377 Y-connector and catheter FG 14
- 68386 Y-connector, catheter and trocar FG 14
- 68378 Y-connector and catheter FG 18
- 68387 Y-connector, catheter and trocar FG 18

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