



TOULOUSE UNIVERSITY HOSPITAL

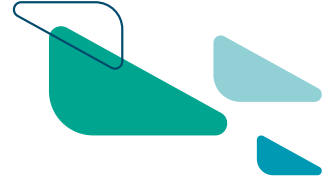
PÔLE I3LM (Inflammation, Infection, Immunology, Locomotor)

Ambulatory Surgery Unit

Department of Orthopedic Surgery, traumatologic and reconstructive

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Reconstruction of the anterior cruciate ligament



**Information
BOOKLET**

Hôpital Pierre-Paul Riquet

Place du Dr Baylac

TSA 40031

31059 Toulouse Cedex 9



Reconstruction of the anterior cruciate ligament

What do I need to know about the operation and its aftermath?

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Ambulatory hospitalization

You will find all the information you need to ensure your stay runs smoothly in the Ambulatory Passport, with the link below:

https://www.chu-toulouse.fr/IMG/pdf/403325_livret_ambulatoire_ppr.pdf

You can visualize the places where you have to go by watching a slide show about the patient path, with the link : <https://www.chu-toulouse.fr/-reconstruction-du-ligament-croise-anterieur-du-#art7893>

Ambulatory surgery unit

Open from 6.45 am to 8 pm, monday to friday

Patient reception from 6.45 am

- **Secretariat:** (+33)5 61 77 97 17
- **Nurses:** (+33)5 61 77 97 27
- **Fax:** (+33)5 61 77 20 51
- **E-mail :** chirambulatoire.sec@chu-toulouse.fr

Comment s'y rendre

Arrival by tramway :

- Access lobby **Hall D**
 - Take the elevators on your right.
 - Climb to the 3rd level
- Follow the long glass corridor to **Hall A** (green color)
- Take the elevators on your left.
 - Go down to **level 1**.

Arrival by car:

Entrance required at Place Baylac

- Follow signs for Parking P3 bis.
 - Park in parking lot P3 bis.
- Payment: 1st hour free, then €1.80 per stay.



A patient badge will be given to you when you leave the department to enable you to benefit from this rate. people with reduced mobility can park temporarily at the drop-off point. Payment : 30 min. free then 1 € every 10 min.

- **Enter hall A (green), take the elevators on your left and go to level 1.**

Recommendations

Follow the recommendations given during your anesthesia consultation.

If, since the anaesthesia consultation, you have experienced a change in your health (cold, cough, temperature, injury, etc.), including the possibility of pregnancy, please contact us on 05 61 77 97 17 to assess whether your operation can be continued.

The day before

Always observe hygiene rules.

Good personal hygiene helps prevent the risk of infection during your operation.

Depilate the area to be operated on using a trimmer only, as instructed by the surgeon. If you don't have a trimmer, hair will be removed in hospital.

Do not use a razor.

Remove all jewelry (earrings, wedding rings, etc.) **and piercings left at home**; remove **nail polish** (hands and feet) and **make-up**.

At home, you are required to:

- **Shower** with liquid soap and **shampoo**, and use a washcloth and clean towels.
- Dress in clean pyjamas and sleep on clean sheets
- Brush your teeth thoroughly.

The day of surgery

In the morning, at home:

- **In accordance with hygiene rules, shower and shampoo again.**
- **Remove all jewelry and piercings**
- **Brush your teeth thoroughly**

Dress in loose-fitting, comfortable clothing and shoes without heels.

Do not eat, drink or smoke (including electronic cigarettes, chewing gum or candy), as recommended by your anesthesiologist.

Don't forget:

- your usual medical treatment + prescription
- any treatment prescribed during the anaesthesia consultation
- your social security card
- your health insurance card
- proof of identity
- any medical equipment prescribed: splints, crutches, etc.
- imaging (X-rays; MRI; CT scans related to the operated limb)
- any documents provided during the surgical or anesthesia consultation.

Do not bring valuables or money with you, as the hospital accepts no responsibility for them.

You are responsible for all your belongings in your room.

The presence of a companion is compulsory as soon as you return home, but is not essential in hospital for the duration of your stay.

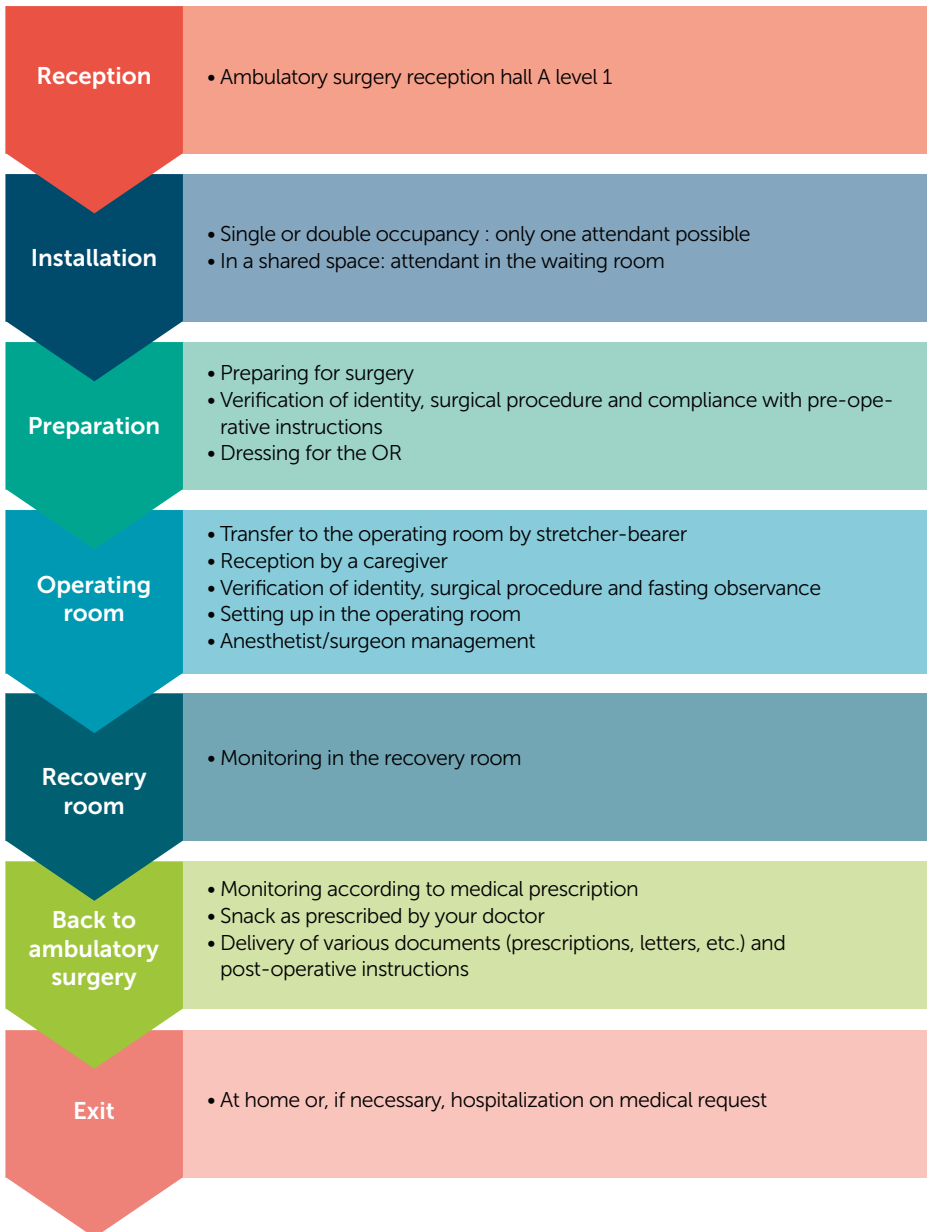
For admission formalities, please go directly to the Ambulatory Unit reception desk (Hall A, 1st floor).

Before you leave for the operating room, the nurse will check that this cleansing has been carried out correctly.

Remove glasses, contact lenses, hearing aids and dental prostheses.

Report any skin lesions to the nursing team.

How your stay unfolds



Orthense, to stay in constant contact with your surgeon

Orthense is a medical app that will support you throughout your stay, from the pre-operative phase through to post-op. It provides a continuous link with your surgeon and personalized support to help you resume your daily activities.

This site can be accessed via different devices (smartphone, tablet, computer). By answering several questionnaires sent by your surgeon on key dates, the app will answer your questions and assess your progress.

It can be consulted by your surgeon, who will have real-time access to your results and progress. In the event of a negative evolution, the surgeon will be directly informed and will be able to communicate with you via the application.



ORTHOPEDIC FOLLOW-UP CONNECTED TO YOUR SURGEON

ORTHENSE



Your surgeon and his medical team offer you a digital follow-up system that extends their discourse and increases their ability to monitor your state of health.

Dedicated to you, it will accompany you in **your preparation and during your recovery**, making it easier for you to resume your daily activities.

A simple e-mail

An e-mail will invite you to validate your account. Use your login and password to access <https://suivi.orthense.com>. Your participation improves the outcome of your treatment, and is part of ongoing medical progress.

If you have a question, send an e-mail to contact@orthense.com

A splint at home

Thanks to your surgeon's follow-up, you can receive your splint at home, with no advance payment (tiers-payant).

- Time-saving assurance of the right product

It couldn't be simpler:

- An e-mail will be sent to you to confirm your choice.
- Enter your contact details
- Wait patiently for your brace to be delivered

www.orthense.com for more information on our product
www.digikare.com for more information on our company

Image par laTula de Nobbay

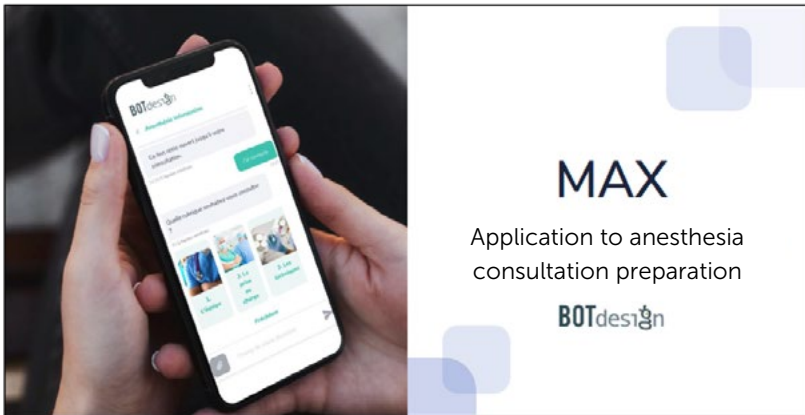
▲ MAX: preparing for your anesthesia consultation

The anesthesia team at Toulouse University Hospital has developed MAX Anesthesia, a digital solution to help you prepare for your anesthesia consultation «MAX Anesthesia».

As soon as the operation is scheduled, logging on to this medical application gives you access to comprehensive documentation on anesthesia, including videos and frequently asked questions. This documentation will help you to better understand and familiarize yourself with your care. You will also be asked to complete a detailed medical questionnaire. This is a mandatory step in preparing for your anesthesia consultation.

The link to the application will be made via the ORTHENSE software.

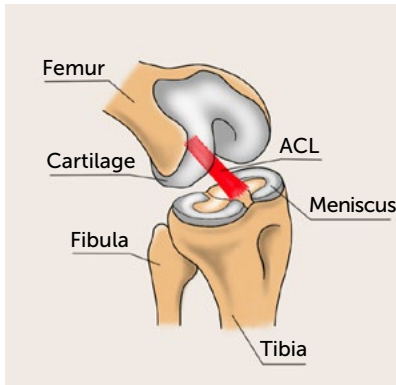
If you have any questions or problems, please contact our support team at support@botdesign.net.



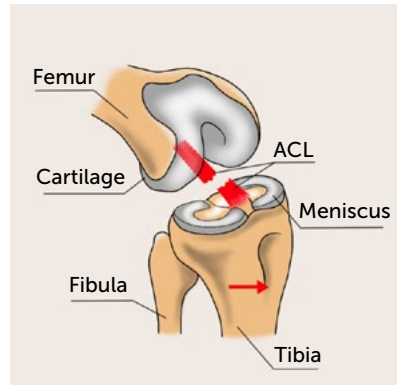
The operation and its post-operative care

▲ Rupture of the anterior cruciate ligament

The anterior cruciate ligament (ACL), located inside the knee joint, prevents the tibia from moving forward and stabilizes the knee.



The ACL in a normal knee.



ACL rupture with increased forward translation of the tibia, source of instability and slippage in a traumatized knee.

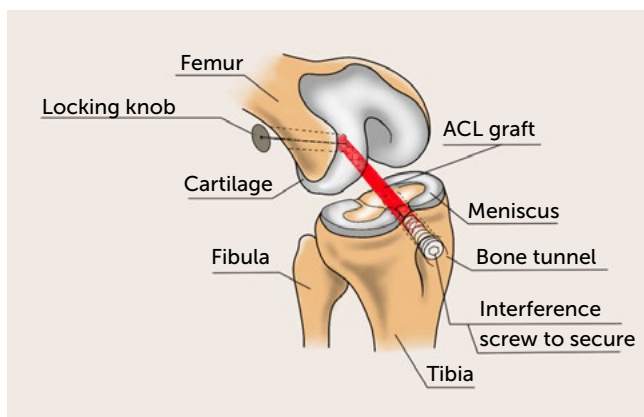
A rupture of the ACL leads to laxity. Depending on your physical activity, this laxity can lead to instability, which in turn can cause the knee to slip. These **shifts** or «instability accidents» **can interfere** with your daily activities (work and/or sports). In the short to medium term, they can cause damage to the **cartilage, meniscus** and other ligaments. In the long term, the main risk is the onset of **osteoarthritis**.

A rupture of the anterior cruciate ligament does not heal on its own. **The aim of anterior cruciate ligament surgery** is to restore **good joint stability**, enabling the patient to resume physical activity under the best possible conditions, while avoiding damage to the cartilage and menisci.

Anterior cruciate ligamentoplasty: the procedure

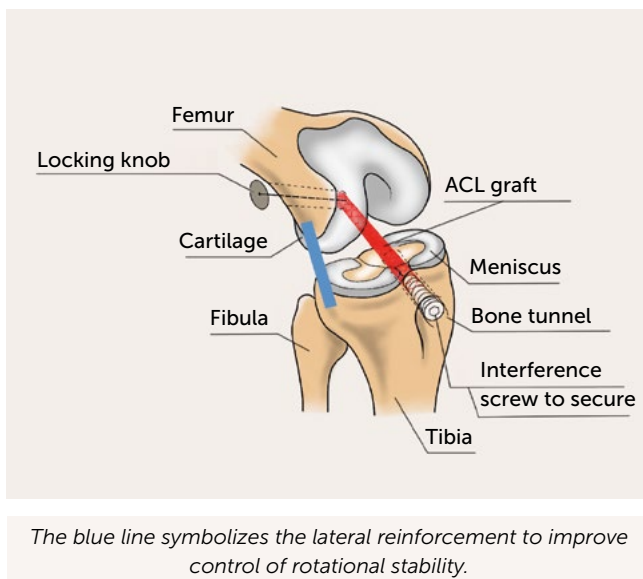
The procedure replaces the ruptured anterior cruciate ligament with a new one, reconstituted from one of your tendons. This tendon or tendons are harvested from the leg on the same side as the ligamentoplasty. The tendons used may be hamstring tendons (semitendinosus and/or rectus femoris tendons), on the inside of the knee, or extensor tendons (quadriceps or patellar tendons, on the front of the thigh) or fascia lata (especially in the case of reconstruction).

The procedure is performed under arthroscopy: a camera and instruments are introduced into the knee through small incisions. Any damage to the meniscus is treated at the same time. Bone tunnels are dug in the femur and tibia to accommodate the tendon graft. The graft is then fixed to the bone, usually using resorbable screws or cortical supports.



*ACL ligamentoplasty:
the graft replaces the ruptured ligament.
Bone tunnels in the tibia and femur receive the graft.
the graft, which is secured by screw and/or button systems.*

Your surgeon will perform an ultrasound scan immediately prior to the operation, to take into account the variability of individuals and their lesions, and to ensure that treatment is tailored to the individual. If necessary, an additional lateral reinforcement procedure will be performed. This will be guided by ultrasound, to ensure that it is as close as possible to your anatomy.



Anesthesia

Anesthesia is a set of techniques that enable a surgical procedure to be carried out by eliminating or reducing pain during and after the operation in optimum safety conditions.

There are 2 main types of anesthesia: **general anesthesia** and **local anesthesia**. General anesthesia is a state comparable to sleep. With locoregional anesthesia, only a part of the body is put to sleep, and the operation is performed on that part.

General anesthesia may be combined with locoregional anesthesia, either as a matter of principle, or if locoregional anesthesia is insufficient or fails.

All anesthesia procedure requires a **consultation with an anesthesiologist**. During this consultation, you will be informed of the different possible techniques adapted to your case. The choice of anaesthetic will depend on the surgical procedure and your state of health. The doctor who performs the anaesthesia will not necessarily be the one you saw during your consultation.

Any medical procedure, even when carried out with the utmost skill and in accordance with the latest scientific findings, involves a risk. Today's anaesthesia and recovery monitoring procedures enable us to detect and treat abnormalities at an early stage. The main risks associated with general anaesthesia are: nausea and vomiting, sore throat (due to the introduction of a tube into the trachea), dental trauma and impaired concentration, which can occur in the hours following anaesthesia. Life-threatening complications are extremely rare. **There are risks specific** to locoregional anesthesia: after spinal anesthesia, difficulty in urinating may necessitate the temporary insertion of a urinary catheter. Headaches may also occur, sometimes requiring specific treatment. Locam anesthesia can give rise to potentially serious complications (temporary or permanent numbness, cardiovascular accident, convulsions), but these are extremely rare with current techniques.

In all cases, we will choose the most appropriate anesthetic strategy for your operation.

Your return home

- **You are not allowed to drive home alone. You may not return home by public transport, except in exceptional cases and with medical authorization.**
- You must be accompanied by an able-bodied, responsible person. This person **must collect you from the ambulatory surgery department** (hall A, level 1) **before 7 p.m.**
- You can't stay home alone until the next morning. A companion (adult) must stay with you and have access to a telephone.
- We can't give you a specific discharge time in advance, so don't make any commitments for the evening (meals, appointments, etc.), and remember that you won't be able to pick up your children from daycare or school.
- **During the 24 hours following anesthesia**, do not drive a vehicle, use any potentially dangerous equipment or make any important decisions, as **your alertness may be impaired without your realizing it.**
- Don't drink alcohol. Don't smoke, rest.

The next day

- You will be contacted by phone.
- For Friday surgeries, this call will be postponed until Monday.
- We remain at your disposal for any further information. **Please do not hesitate to contact us.**

Postoperative care

Nursing care

Carried out at your home by a nurse of your choice, this consists of the re-dressing of dressings every 5 days until complete healing (Cf. postoperative prescription).

Rehabilitation protocol with your physiotherapist

A detailed rehabilitation protocol for your physiotherapist is provided. We advise you to make an appointment with your physiotherapist as soon as possible, in order to begin preoperative rehabilitation and to schedule postoperative sessions.

Unless your surgeon advises otherwise, **here are the key dates for your rehabilitation:**

- resumption of weight-bearing and walking: from the day after surgery.
- drainage of the knee, locking of the quadriceps muscle, gradual recovery of flexion, obtaining full knee extension: until the end of the first month.
- English walking sticks should be used until you are able to walk properly again; your physiotherapist will help you at this stage.
- resumption of gentle activities like exercise bike, swimming: 3 weeks - 1 month.
- return to running on flat ground: 1.5 months.
- Resumption of pivotal sports: depending on your recovery.

The surgical team is at the disposal of the attending physician and the rehabilitation specialist for any further information or in the event of an incident.

Cold splint

The use of a cryotherapy splint is particularly recommended in the immediate post-operative period. By activating your Orthense account, you will receive a cryotherapy splint directly at home.

Return to work

Your surgeon will give you time off work during your hospital stay. Its duration will depend on your professional activity. However, it should last at least 15 days after the operation. In all cases, your surgeon will determine with you the date on which you can return to work.

Between appointments

Appointments will be made by the surgical team and the sports medicine team.

Post-operative appointments

Your surgeon will suggest a series of follow-up appointments to ensure that your rehabilitation is progressing well, and to allow you to gradually resume your activities. These appointments will be attended by both the surgical team and the sports medicine team. In between these appointments, don't hesitate to contact him if you have any questions or encounter any problems during your rehabilitation.

▲ Possible complications

They are rare, but you should be aware of them:

- An **hematoma** may form in the knee.
- **Infection** of the joint is possible, requiring surgical cleaning and antibiotics.
- **Phlebitis** is caused by the formation of a venous clot, and may be complicated by a pulmonary embolism. Except in special cases (see your surgeon's prescription), no anticoagulant treatment is necessary.
- **Knee joint stiffness** is observed in the aftermath of poorly-performed rehabilitation.
- **Algodystrophy** is an unpredictable complication linked to disruption of the systems that regulate pain. It manifests itself mainly as pain, evolves slowly, but always heals.

Here is a non-exhaustive list of the main **symptoms that should alert you and lead you to contact us and/or consult us urgently on 05 61 77 56 19:**

- **Unusual» pain** in the knee or calf, not relieved by medication.
- **Fever**, sometimes accompanied by chills and sweating.
- **Scarring problems**, often detected by your nurse: delayed healing, persistent bleeding, discharge, inflammation.

▲ Pain control

Several «pain-relieving» or analgesic drugs will be prescribed to you during your anesthesia consultation. The type of medication and the length of time it is prescribed will depend on the surgical procedure and your state of health.

Hygienic and dietetic rules

Certains médicaments peuvent donner des constipations. C'est pourquoi avant même que ces symptômes arrivent, il faut :

- Drink at least a liter and a half of water a day (magnesium-rich Hépar[®] water).
- Eat a high-fiber diet: fresh fruit, dried fruit (prunes), green vegetables, wholegrainw cereals; avoid starchy foods (potatoes, rice, corn, etc.).

Do not drink alcohol or drive during treatment.

The «lifting» of local anesthesia

What does it mean?

This is the "awakening" of your operated limb, in other words it's the end of anesthesia for that region.

When you leave the hospital, your limb is "numb, heavy, cardboard-like" and no longer responds well to motor commands, and sensitivity may be altered.

It's not until the following day (the timing varies from one individual to another) that your lower limb will have fully recovered its sensitivity and motricity.

You'll need to use crutches until the next day to avoid the risk of falling.

This "lifting" is a gradual process, and you may experience tingling, pins and needles, and sometimes cramps.

Useful numbers

Monday to Friday, 8am to 4pm :

Programming Nurses - Tel. 05 61 77 24 10 / 05 61 77 23 80

Monday to Friday 7am to 7pm :

Ambulatory department - Tel. 05 61 77 97 27

Weekends, holidays and after 7pm :

Emergency recovery room - Tel. 05 61 77 22 70

Or

Surgical intern on call - Tel. 05 61 77 56 19

Your questions/our answers

1. If I'm no longer in pain, can I reduce or stop one of the treatments?

Follow the recommendations on the prescription you have been given. If in doubt, please contact your GP.

2. Can I take my usual treatment in combination with the prescribed painkillers?

Yes, as long as you have indicated all your usual treatments during the anaesthesia consultation. No other painkillers should be taken in combination.

3. Despite analgesic treatment, I'm in a lot of pain. Who can I call?

You'll find the numbers in the booklet on page 22.

4. I have a lot of "pins and needles" in my thigh and it scares me. Is this normal?

Yes, this corresponds to the lifting of your anaesthetic.

5. Despite anti-nausea treatment, I'm vomiting. What should I do?

You should call and speak to an anaesthetist, who will decide what to do.

Appointments not to be missed

The Date of your Anesthesia Consultation

- In Visio-Consultation
- In person: Site de Purpan, Hopital Pierre Paul Riquet, Hall B , 3 Etage, color red in the anesthesia consultation department

Documents you must have in your possession for the anaesthesia consultation:

- Last prescription for current medical treatment
- Last blood test (less than 6 months old), if you have one, or results of the test prescribed by your surgeon
- Your blood grouping card, if you have one
- Last letter or report if you are under the care of a specialist (cardiologist, pulmonologist, etc.)
- Last electrocardiogram, if you have one
- Dated and signed confidentiality form
- Care authorization form for protected adults, completed, dated and signed by the father and mother or legal representative.

The date of your intervention

You will be contacted the day before to let you know your arrival time (for operations on Monday, you will be contacted the Friday before).

Site de Purpan, Hopital Pierre-Paul Riquet, **hall A (green), level 1**, Ambulatory surgery unit (cf plan Page 4)



PLEASE NOTE

Don't forget to fill in the MAX and ORTHENSE online questionnaires!