



Gallbladder Surgery

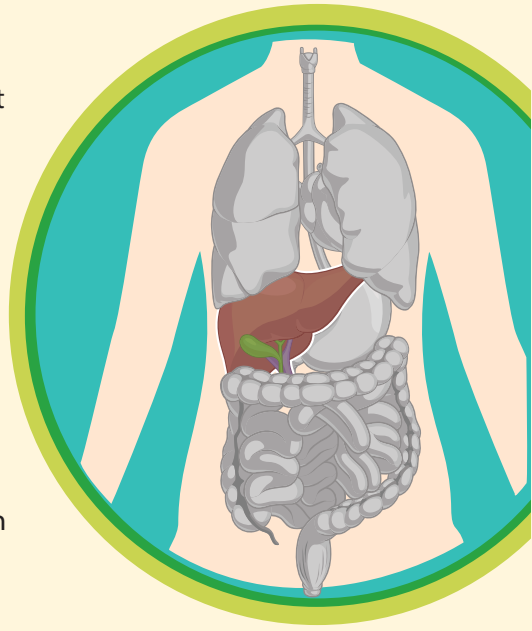
胆囊手术



Changi
General Hospital
SingHealth

What is the gallbladder?

The gallbladder is a pear-shaped sac about the size of a golf ball, that lies beneath the right side of the liver. Its main purpose is to collect and concentrate bile, which is a natural agent for digesting fats in the food we eat. Bile is a clear golden yellow liquid produced in the liver and stored temporarily in the gallbladder. As part of the digestion process, the gallbladder releases bile, which travels through ducts (known as the cystic and the common bile ducts) to the small intestines where digestion of fatty food takes place.



Who are more prone to gallbladder problems?

There are many possible factors which can cause people to develop gallbladder problems. It is believed to be either related to how our bodies process cholesterol in food or due to gallbladder infection.

Studies show that the following groups of people have a higher likelihood to develop gallbladder problems:

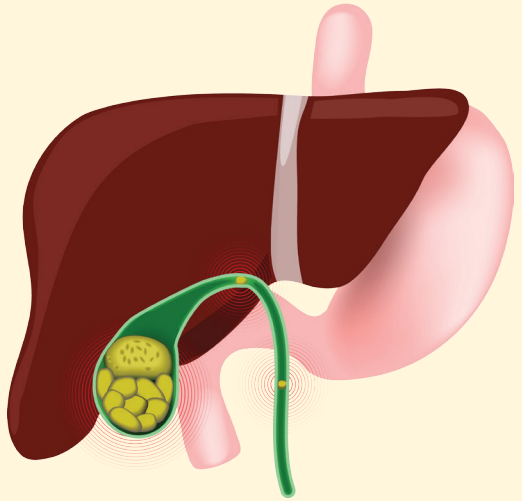
- Women in their 40s
- Women after pregnancy
- Men and women who are overweight
- People who eat large amounts of dairy products, animal fats and fried foods
- Parents, siblings, and children of people with gallbladder problems



What causes gallbladder problems?

Gallbladder problems are usually caused by the presence of gallstones. Gallstones form when bile and other liquid chemicals inside gallbladder go out of balance, causing the chemical mixture to turn into solid form or sediments.

Over time, some of these sediments begin to grow larger in size and become what is known as gallstones.



If the gallstone is large and travels into the cystic duct, it may block the flow of bile out of the gallbladder. With its outlet blocked, the gallbladder begins to swell. When the gallbladder becomes over filled with bile, back flow of bile may occur. As a result, the gallbladder may become infected. Symptoms include sharp right sided or central abdominal pain, usually after meals, especially after oily food such as deep fried food, curry etc. The pain may radiate to the back or shoulder tip. Nausea, vomiting, fever or jaundice may also be present.

How does the doctor diagnose gallstones?

After learning your medical history, your doctor may examine you to find out about signs, health problems, risk factors that point to gallbladder disease. Diagnostic investigations such as blood tests, ultrasound and CT scan may be used to confirm the problem.



How are the problems treated?

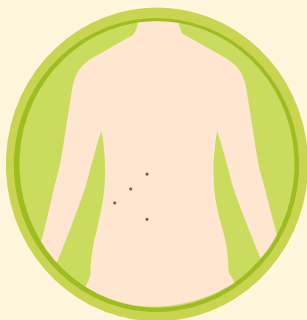
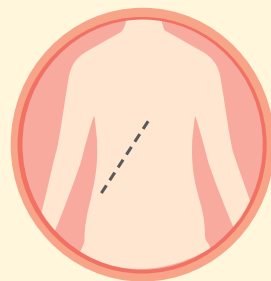
Treatment options include medications or surgery.

Medications to dissolve gallstone

Previously, medications were used to dissolve gallstones. However, these medications are expensive and have to be taken for 18 months, and gallstones tend to recur. This treatment is only suitable for pure cholesterol stones. Therefore, this form of treatment is not recommended.

Open cholecystectomy

This is the traditional way of removing the gallbladder through a large abdominal incision (8 - 12cm). Risks and complications include excessive bleeding or infection.



Laparoscopic cholecystectomy

This latest technique allows for the removal to be accomplished through only four tiny openings, each less than one centimetre in diameter. A laparoscope (a telescope with a camera attached) will be inserted through a tiny incision to give a magnified view of the gallbladder. Instruments are then inserted through other tiny incisions. After the cystic duct and artery (blood supply to the gallbladder) are identified, tied off with clips and cut, the gallbladder is then detached from the liver bed and removed through an opening in the navel.

Following the procedure, the small incisions are closed with a stitch or two. Within a few months, the incisions are hardly visible.

What are the advantages of laparoscopic gallbladder removal?

By operating through four tiny openings instead of the traditional long incision, most patients have significantly less postoperative pain. They also heal faster, have smaller scars and return to normal activities sooner than patients who have undergone the traditional way.

The procedure

- Carbon dioxide gas is introduced into the body to lift the outer layer of tissue from the internal organs.
- A cholangiogram catheter is then inserted to take an X-ray of the bile duct.
- Clips are used to close off the duct and blood vessel at the base of the gallbladder. These harmless clips will be left inside the body. Cautery (electric current) will then be applied to detach the gallbladder from the liver.
- The contents of the gallbladder will be emptied. It resembles a deflated balloon and can be removed through one of the tiny incisions.

Is this technique safe?

Numerous medical studies have shown that the complication rate for laparoscopic gallbladder surgery is low, and comparable to that of the traditional open operation. While there are risks associated with any kind of surgery, the vast majority of patients who have undergone laparoscopic cholecystectomy, experience no complications and quickly return to normal activities.

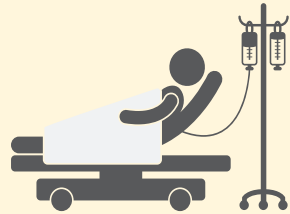
Since the widespread acceptance of this new procedure, surgeons are applying the laparoscopic technique to a broad range of surgical procedures including appendectomy, lung and bowel surgery.

Is the procedure right for me?

Although there are many advantages to laparoscopy, this procedure may not be suitable for some patients who have had previous lower abdominal operations or other pre-existing medical conditions. A thorough medical evaluation by a doctor can determine if laparoscopic gallbladder removal is the appropriate procedure for you.

Recovering after surgery

After your surgery, you may be required to stay in the hospital for a short period. Follow your doctor's advice and rebuild your strength gradually. You may be asked to breathe deeply and cough to clear your lungs. Doing walking exercises as soon as possible after your surgery, helps to keep your blood circulating.



As your digestive system adjusts, you may begin to eat normally. Inform your doctor immediately if you discover any unexpected side effects such as:

- Fever (over 38°C) or chills, and jaundice
- An incision that drains for longer than a day
- Increasing pain or redness at an incision site

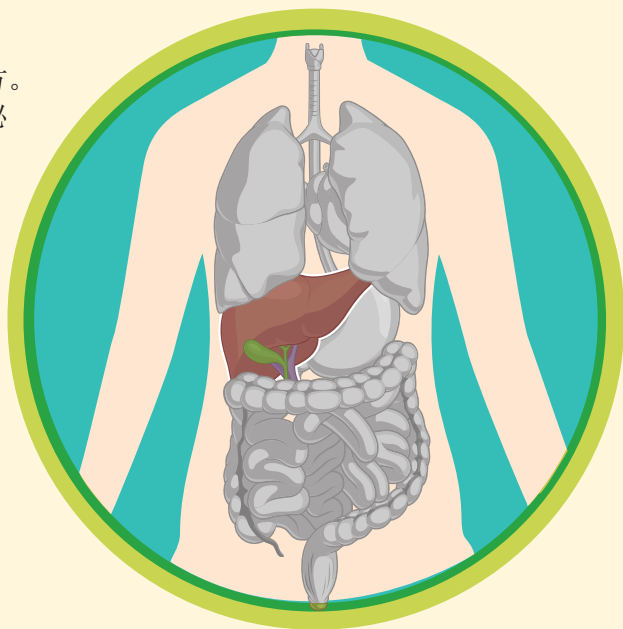
Some patients may have loose stools from eating oily food too soon after surgery. Give your body some time to slowly adjust to oily food after some time, by cutting down on the amount of oil or fat intake.

Gallbladder surgery is one of the most successful kinds of surgery. Most patients go on to live a healthy and normal lifestyle even without their gallbladder.

什么是胆囊？

胆囊是个袋子、如高尔夫球一般大小，位于肝脏的右下方。主要的功能是储存由肝脏分泌的胆汁，和浓缩胆汁，帮助我们消化食物中的脂肪。胆汁是清撒的金黄色液体。

当我们吃含有脂肪的食物时，胆囊会通过胆囊管和胆管把胆汁输送到小肠以帮助消化。



哪些人谁较容易患上胆囊的毛病？

有很多因素可能造成胆囊发生问题。患病原因之一、可能与身体化解食物中的胆固醇血脂有关，其他原因可能是胆囊受到细菌感染。

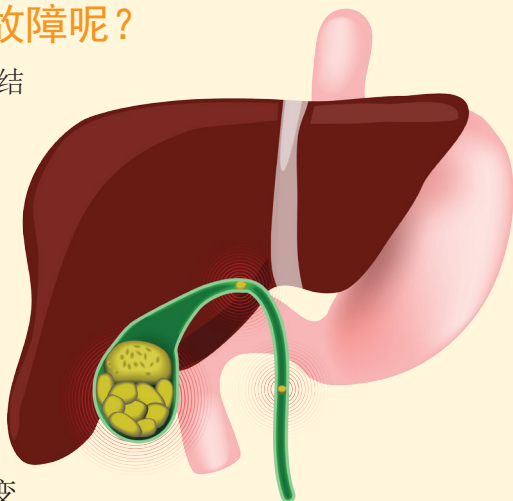
研究显示以下的人、比较容易引起胆囊发生问题，例如：

- 年龄超过40岁以上的妇女
- 生产过后的妇女
- 超重的人
- 经常大量进食脂肪(动物脂肪)或乳类产品，以及爱吃油炸食品的人
- 家族成员(包括父母、兄弟及孩子)中有胆囊问题的病史，其他的成员患病率也较高



什么因素会造成胆囊发生故障呢？

胆囊发生问题的原因通常是因胆囊结石。胆石的形成是由于胆囊内的胆汁与其他化学元素的比率不平衡所造成。结果、这些化学混合物结晶累积在胆囊内，经过时间不断累积，结晶体的体积越来越大，那便是胆石。



如果胆石的体积太大、造成胆囊管阻塞，这样胆汁就无法从胆囊管输送出去。当胆囊过于饱满时，时间久了，可能会造成胆囊遭受到细菌感染变成胆囊炎。症状包括：腹部的右边或中间有尖锐的疼痛。通常是吃饱后，尤其是吃了油腻的食物，如：煎炸的食物，咖喱等。有时、疼痛可能扩散而延续到背部或肩膀。同时、有反胃、呕吐、发烧或身体及眼白发黄，如：黄疸病等症状。较小的胆石有时会经胆囊管，进入胆管，造成阻塞。症状包括黄疸病，深黄色或棕色的尿，皮肤发痒，这会引起胆管炎。

医生怎样诊断病情？

当医生了解病人的病情之后，医生可能会安排一些检验、诊断影响身体健康的病症，患胆囊疾病的可能性等等。其他诊断的方法包括血液检验，超声波扫描和电脑扫描都有助于医生确定病情与诊断。



治疗方式

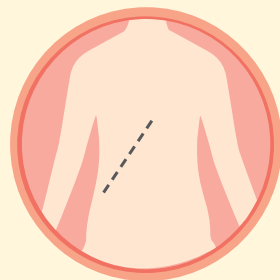
治疗的方法包括药物治疗或做外科手术。

用药物治疗来溶解胆石

过去，胆石是用药物治疗来溶解的。但是、药物治疗需要18个月的时间，每个月的医药花费高，而且不能根治，复发的可能性很大。这种治疗方式只适合纯胆固醇的胆石。因此这种治疗方式不受欢迎而不被推荐。

传统的胆囊切除术

传统的胆囊切除方法是在腹部开一个长的切口(8-12厘米)，再把胆囊切除。这种做法不但造成较大的伤口而且复原的时间也会更长。风险与治疗并发症包括出血过多或受感染。



腹腔镜胆囊切除术

今日的医疗科技发达，用腹腔镜切除胆囊、需要在腹部开四个直径约一厘米长的切口即可切除胆囊。

所谓腹腔镜检查是用镜口上附有照相机的内窥镜，通过一个其中切门插入腹腔内，可以清楚地看见放大的胆囊构造。手术仪器材通过其他切口插入腹腔内。当确定胆囊管和供应胆囊血液的劲脉的位置之后，用夹子夹牢胆囊管与血管，胆囊切除后是通过在肚脐上的切口、取出体外。经过手术后的几个月，切口的痕迹会看起来不明显。

利用腹腔镜来切除胆囊有哪些好处？

通过四个小切口来代替切口较长的传统开刀手术，最好效应是病人减少受手术后的痛楚。伤口复原得比较快、比起传统的开刀方法、利用腹腔镜来切除胆囊的病人较早回复正常的活动。手术后的伤口留下的疤痕比起传统手术来得小而且较不明显。

程序

- 利用二氧化碳输入体内帮助澎起腹腔外层的组织，方便医生观察体内层的各器官。
- 医生会插入胆管造影导管，拍下胆管的‘X’光照片。
- 夹子是用来夹紧胆囊管血管的进口处。这些特制的夹子会被留在身体里而且是不会对身体有任何伤害的。电动的烧灼器是用来切除胆囊。
- 胆囊内的胆液会被抽空，它像一个放了气的气球，可以从另一个小切口取出。

这种手术技术安全吗？

很多医学研究报告说明了利用腹腔镜胆囊切除手术，比起传统的开刀手术，感染并发症的机会比较低。进行任何的手术其危险性总是有的，大多数的病人经历过手术后的经验是：没有感染并发症和迅速复原，回复正常生活。

既然这种新治疗技术广泛被接受，外科医生部广泛的采用腹腔镜技术在其他的外科手术上，包括：阑尾炎(腹腔镜阑尾切除术)，肺和肠手术。

这种医疗程序适合我吗？

虽然，动外科手术采用腹腔镜技术有很多好处，不过、这种手术方式，并不适合每个人。比如病人腹部曾经动过外科手术或有其他先前存在的病历。您的医生必需做一个彻底的医药检查，重新评估、再决定您是否适合采用腹腔镜切除胆囊。

手术后的复原期

手术后，您可能需留院休息几天。听从医生的指示，逐渐地回复体能实力。您可以做深呼吸或咳嗽清除肺部的痰。手术后，尽快下床走动，这样可以帮助您的血液循环顺畅。



当您的消化系统问纠正正常后，您可以正常饮食。如果您发现有下列不正常的病状出现，请马上通知您的医生。这些症状包括：

- 体温高过38°C或身体一直感觉寒冷和患黄疸病(眼白发黄)
- 手术的切口处排水持续超过一天的时间
- 手术的切口处红肿不退，疼痛加剧

刚动过手术，需要限制饮食。一些病人因吃了太多油腻食物而造成腹泻的现象。您需要减少进食油脂或含高量脂肪的食物。过一段时间，您的身体会自然的慢慢调整 and 适应身体的改变。

几乎每一位切除胆囊后的病人，仍然健康而且愉快的过着正常的生活。胆囊切除手术在所有外科手术中算是比较成功的一项外科手术。



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Information is correct at the time of printing (February 2020) and subject to revision without prior notice.

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Please do not disregard the professional advice of your doctor.