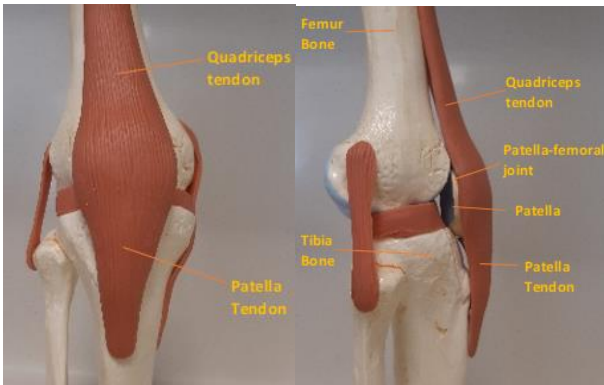


## ANTERIOR KNEE PAIN

Anterior knee pain is the pain that occurs at the front or at the centre of your knee. Although it may be difficult for you to be specific about the exact location of pain, the location of your knee pain provides an important clue to the healthcare professional who is helping you to manage your knee pain.

### ANATOMY

The anterior part of the knee consists of structures around the knee-cap (also known as 'patella'). The patella is a bone located at the front of the knee joint. Structures around it include quadriceps tendon, patella tendon, fat pad and bursa.



### BACKGROUND

Development of anterior knee pain can be multifactorial.

The onset can be gradual and may not be related to an acute injury. The pain can be primarily due to excessive stress to the front part of the knee, which is commonly caused by muscle weakness around the hip and knee, poor biomechanics, or over-doing certain activities. However, it may also present secondary to acute trauma (e.g. falling on your knee) or following a knee surgery.

Some common conditions that can be related to anterior knee pain include:

- Patella femoral pain
- Patella tendinopathy
- Fat-pad syndrome.



### SIGNS AND SYMPTOMS

The area and level of pain experienced can differ in each individual. You may experience the following:

- Diffuse ache or pain in the front or at the centre of your knee
- Pain/difficulty when doing daily tasks such as squatting, climbing stairs, running, hopping or jumping.
- Painful crepitus/clicking with knee movement
- Pain when touching the front part of your knee
- Swelling around the front part of your knee

### AGGRAVATING ACTIVITIES

You may experience pain when you perform some of the following activities:

- Squatting
- Kneeling
- Climbing up/down stairs
- Going up/down a slope
- Running
- Hopping/jumping
- Straightening your knee after prolonged sitting

*Disclaimer: The material contained in these information sheet is intended as a guide only and does not constitute advice or treatment. For further information please see your qualified healthcare professional.*

## CAN PHYSIOTHERAPY HELP?

Yes! There is strong evidence to suggest that therapeutic exercises can help to relieve pain and improve physical function in people with knee pain.

Your physiotherapist will devise a treatment plan based on your personal needs and goals.




## PHYSIOTHERAPY MANAGEMENT & TREATMENT

Rehabilitation for anterior knee pain may require time. However, the overall outlook is positive. The majority of individuals will be able to return to the activity or sports that they enjoy.

Physiotherapists can help by:

- Educating you on factors that may contribute to your pain
- Providing suggestions to modify your activities
- Prescribing an individualised exercise programme

### Here are some exercises which you can get started on:

	<p>Tighten the muscles in the front of your thigh and lift your leg straight up. Try to hold for 5-10 seconds.</p>	<p>Perform until your muscles get tired.</p>
	<p>Tighten the muscles in your thigh and buttocks, then lift your leg straight up to the side. Slowly lower your leg again.</p>	<p>It is normal to experience mild muscle soreness after exercising.</p>
	<p>Stand up and sit back down in a slow, controlled manner. Tighten the muscle in your thighs when you stand up.</p>	<p>STOP exercising if you feel severe pain. Seek physiotherapist advice if your pain persists or worsens.</p>

## TIPS TO HELP YOURSELF

Below are some things that you can do to help reduce or prevent anterior knee pain:

Activity modification to reduce excessive loading across your front knee:

- Reduce activities that trigger your pain most – this may involve taking a temporary break from activities such as squatting, kneeling or running.
- Take regular breaks when doing housework
- Wear supportive and comfortable footwear when exercising
- Avoid excessive high impact activities such as jumping if they cause discomfort

Balance between activity and inactivity:

- Avoid sudden increase in activity or vigorous activities that you have not done before or have not done for a prolonged period of time
- If you are not used to exercising, start with low impact activities such as walking or swimming
- Make sure to warm up and cool down before and after exercising

Weight Management:

- If you are overweight, losing 5-10% of your body weight can help to reduce the load on your knee and reduce your pain

*Disclaimer: The material contained in these information sheet is intended as a guide only and does not constitute advice or treatment. For further information please see your qualified healthcare professional.*