Muscles and Joint Pain during Pregnancy
Healthshare Information for Guided Patient Management
Index

Introduction .................................................................................................................................................. 2
Muscles and Joint Pain during Pregnancy .................................................................................................. 2
Why do I get muscles and joint pain during Pregnancy? .............................................................................. 2
What are the common pregnancy related to the muscles and joint problems ............................................. 3
  • Lower Back Pain ..................................................................................................................................... 3
  • Pelvic girdle pain (PGP) .......................................................................................................................... 4
  • Labour and delivery guidance .................................................................................................................. 5
  • Leg cramps .............................................................................................................................................. 5
  • Carpal tunnel syndrome ............................................................................................................................ 5
  • De Quervain tenosynovitis ......................................................................................................................... 7
How do I avoid muscles and joint pain during pregnancy .......................................................................... 8
Contact Us .................................................................................................................................................. 12
Introduction
HealthshareHull is committed to improving your health and wellbeing. This information leaflet is produced by health professionals who are expert in improving musculoskeletal conditions. The information is based on the latest available evidence from research in the field. If you are not sure of any of the given information, please contact our physiotherapy helpline for further information.

Muscles and joint pain during pregnancy
Most women develop some degree of muscle and joint pain during pregnancy. Some causes are unique to pregnancy, while others are conditions that occur in the general population but with greater frequency in pregnancy. Any pre-existing muscle and joint problems, such as previous back pain or rheumatoid arthritis, may be increased by pregnancy.

Why do I get muscle and joint pain during pregnancy?

<table>
<thead>
<tr>
<th>Hormone</th>
<th>During pregnancy there is an increase in the production of the hormone progesterone and relaxin. This causes joint laxity by increasing elasticity in the tissues that help to support joints, in preparation for delivery.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Posture</td>
<td>Mechanical factors such as postural changes (lumbar hyperextension) may also cause pain. As your bump gets bigger, your posture changes and this further increases the pressure on joints and other tissues. The way we may sit and stand during pregnancy can make this worse.</td>
</tr>
<tr>
<td>Muscle weakness</td>
<td>With changing posture, increased bump size and increased elasticity in tissues, some muscles may become stretched and weaker, in particular your pelvic floor and the deeper stomach muscles. Other muscles, for example, hip muscles may start to work harder to compensate, and because they are not used to this, start to become sore.</td>
</tr>
<tr>
<td>Increasing bump</td>
<td>Later in pregnancy the more superficial stomach muscle, the rectus abdominis (the “six pack” muscle) can start to separate as your stomach gets bigger. As a result certain movements, such as getting out of the bath/bed, can cause increased stretch and doming in the front of your stomach. This may contribute to increased back and pelvic pain.</td>
</tr>
</tbody>
</table>
What are the common pregnancy related to the muscles and joint problems?

**Lower back pain**

Non-specific low back pain occurs in 50% to 70% of pregnant women. It occurs more commonly in women with previous history of back pain. Low back pain is not related to body weight or foetal size during pregnancy. During pregnancy you may suffer with sciatic type pain and this is not unusual.

**How do I manage this?**

- Pre-pregnancy fitness and continuation of a core-strengthening program throughout pregnancy reduce the likelihood of low back pain in pregnancy.
- Try to achieve a “straight spine” in sitting and when standing (avoid being too arched and too slumped) to reduce the pressure in your lower back. This may take a lot of practice. A physiotherapist may be able to help with modifying your posture and further advice.
- Avoiding movements that increases your back pain or adapting movements which eases your pain as well as regular deep abdominal muscle exercises (abdominal hollowing) could help to ease the pain.
- Use adequate back support in sitting and try to use pillows between/under your knees while lying down to reduce excessive arching of your spine.
- Support your lower back in sitting. Keep your feet flat on the floor. Make sure your chair is not too high or low with knees lower than your hips.
- In bed lie on your side with a pillow between your knees and under your bump (if required) to reduce excessive arching in back

**Foot wear**

Try to wear a low shoe with a good cushioned sole rather than high heels. Wearing high heel can result in your pelvis being tipped forwards which can continue to spine and pelvic pain. Avoid using shoes with flat sole, like ‘ballet type’ or ‘flip flops’. Shoes with some heel and good arch support will help to absorb the shock and may take the pressure of the irritated joints.

- For further advice regarding this speak to your doctor, midwife or physiotherapist.

---

![Correct and Incorrect Sitting Posture](image-url)
Pelvic girdle pain (PGP)

Pelvic girdle pain describes pain in the joints that make up your pelvis and is a common condition that can affect about 1 in 5 pregnant women. There is a wide range of symptoms and some women have worse pain than others.

How do I manage this?

- The earlier the PGP can be identified and assessed the better the symptoms can be managed. If diagnosed with PGP, your midwife or GP may advise you to see the physiotherapist under Healthshare MSK services or your hospital physiotherapist.

- Your midwife may have given you the leaflet “Pregnancy-Related Pelvic Girdle Pain” which includes lots of useful advice. If not, you can access it online via this link:
Activity modifications

Think about your daily routine, often repeated movements or prolonged positions throughout the day can aggravate your symptoms. By identifying these and modifying them it can help to settle your symptoms.

<table>
<thead>
<tr>
<th>Activity</th>
<th>Modified Activity</th>
</tr>
</thead>
<tbody>
<tr>
<td>Standing</td>
<td>Avoid standing on one leg, standing for long periods and sit down to get dressed/undressed.</td>
</tr>
<tr>
<td>Sleeping:</td>
<td>Try to sleep/lie on your side with a pillow between your knees and a smaller one under your abdomen for good support. When turning in bed, keep your knees together and tighten your bottom muscles.</td>
</tr>
<tr>
<td>Sitting</td>
<td>Try to sit with a small pillow to support your lower back with your feet flat on the floor, avoid crossing your legs or sitting with your feet tucked under you. Have your workstation assessed by your employers if your job involves prolonged sitting. (See also our workstation assessment section)</td>
</tr>
<tr>
<td>Walking</td>
<td>Avoid pushing a heavy supermarket trolley or carrying heavy shopping, especially on one side, perhaps try internet shopping. Avoid carrying lots in your handbag and use a small rucksack instead. Try not to push through the pain when walking. Slow your walking down, take smaller steps and allow yourself longer time to get to places. Ask for help from friends, family, and partner with housework, heavy shopping and the school run.</td>
</tr>
<tr>
<td>Stairs</td>
<td>Take one step at a time, lead with your least painful side up the stairs, and lead with the painful side as you go downstairs. Use the bannisters for support. Plan your day to bring what you need downstairs. Avoid vacuuming the stairs.</td>
</tr>
<tr>
<td>Lifting</td>
<td>Try to avoid heavy lifting, such as wet washing loads, shopping bags, and older children. Avoid carrying a toddler or baby on one hip.</td>
</tr>
<tr>
<td>Driving</td>
<td>Adjust the car seat to optimise good posture, use a cushion to support your lower back if required. Use a plastic bag to sit on in the car to help you to swivel out. Keep your knees together if this is more comfortable. Try to get help if younger children and car seats need to be lifted in and out of the car.</td>
</tr>
</tbody>
</table>

You can also attend the antenatal pelvic girdle pain/low back pain exercise class.

Please contact the Healthshare physiotherapy for one to one assessment prior to the class if you would like to attend. You can also learn more from HELPFUL LIST from www.pelvicpartnership.org.uk
Labour and delivery guidance

• Most people with PGP have a normal vaginal birth. If you have been diagnosed with PGP and your delivery is at the Women's and children's hospital in Hull, take a red pillow case with a pillow to alert the midwife that you have PGP.

• Think about what positions are most comfortable for you and use these in your labour and delivery, e.g. on all fours, lying on your side with your upper leg supported, supported kneeling or standing. You may be able to lie on your side for internal examinations so ask your midwife/doctor to consider this. A water birth may be more comfortable as the water supports your joints. Discuss this with your midwife.

• If you can, avoid sitting propped up in bed or lying on your back, the squatting position or birthing stool could also be more uncomfortable. You should never be asked to put your feet on your midwives hips/shoulders when pushing as this can strain your pelvic joints further.

• If it is sore to have your legs apart measure the pain free gap between your knees. If you need to have your legs in stirrups the midwife or doctor should lift both legs together and keep to your pain free distance for legs apart.

• For further information see your pregnancy related pelvic girdle pain leaflet, the pelvic partnership website (http://www.pelvicpartnership.org.uk/pregnancy-and-birth-with-pgp/how-will-i-get-my-baby-out) or discuss with your midwife team/consultant and/or physiotherapist.

• If you have further problems after delivery you may be assessed by the hospital physiotherapist, especially if you have been under their care during pregnancy. After discharge from hospital/consultant care your GP or health visitor may advise you to self-refer to Healthshare clinical services.

Leg cramps
Leg cramps have been reported in up to 30% of pregnant women, most commonly in the second and third trimester. They usually affect the calf muscles and occur at night in 75% of cases. The reasons for this is unknown.

How do I manage this?
• Doing stretching exercises before going to bed and maintaining adequate hydration may be beneficial.

Carpal tunnel syndrome
Carpal tunnel syndrome refers to the irritation of the median nerve that passes through a tunnel in your wrist. Symptoms often start in the night with numbness and tingling in your hands, especially your dominant hand. Carpal tunnel syndrome in pregnant women has a reported incidence up to 20%.

It is thought to be associated with the fluid retention in pregnancy causing swelling in your hands and feet. This can settle in the carpal tunnel at the wrist and irritate the nerve that passes through it. It mostly occurs in the second and third trimesters, and usually resolves within 4 weeks of delivery.
How do I manage this?

- Avoid/reduce repetitive tasks such as typing on a keyboard that cause symptoms and take frequent breaks as able.
- Hold heavy objects with both hands and try bathing your hand in alternate bowls of warm and cold water to help reduce pain.
- Shake your hands when symptoms affect you in the middle of the night.
- Wearing firm wrist splints and elevating the forearm on a pillow at night can give symptomatic relief.
- After delivery as hormones and fluid levels settle back down, symptoms should resolve on their own, if not self-refer to physiotherapy for further assessment.
- Injections of corticosteroid are less likely to be effective and it is not recommended during pregnancy.

De Quervain tenosynovitis

This is soft tissue inflammation over the base of your thumb. De Quervain tenosynovitis occurs more commonly over the weeks following delivery rather than during pregnancy. This is probably caused by repeated movements of the wrist during gripping movements used for caring the baby.

- Resting the thumb, with or without splint/ thumb support, is effective. However, you may find this difficult at times.
- The use of anti-inflammatory (NSAID) or analgesic skin cream may provide temporary pain relief.
- Regular icing also helps with the pain.
- Corticosteroid injections are effective and this can be considered after delivery.
How do I avoid muscle and joint pain during pregnancy?

1. Relaxation techniques

Relaxation during pregnancy can reduce tiredness, stress, aches and pains. Different things may work for you, e.g. listening to music, low lighting, massage, watching TV or having a hot drink. Sometimes specific techniques may be helpful such as visualising a happy safe place, for example lying on a beach or a walk in the woods.

Gentle stretches and relaxing muscles throughout the body from head to toe can aid relaxation, reduce muscle tension and as a result reduce pain. If this helps try to practice regularly, it can also be a useful technique to use after the baby is born if you feel overtired or stressed and anxious.

One such technique is an adapted version of the Mitchell method of relaxation. Before you start make sure you are in a comfortable position. (Avoid lying on your back flat after 16 weeks). Take a rest for few minutes after each movement and let the muscles you have just contracted relax and go heavy.

<table>
<thead>
<tr>
<th>Eyes</th>
<th>Close your eyes and imagine a candle lit in front of you and as you gently breathe out through your mouth. Imagine this gently tipping the flame over.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Shoulders</td>
<td>Pull your shoulders towards your feet. Stop. Feel your shoulders moving further away from your ears and lengthen your neck.</td>
</tr>
<tr>
<td>Elbows</td>
<td>Move your elbows away from your sides. Stop. Relax your elbows back.</td>
</tr>
<tr>
<td>Hands</td>
<td>Keeping your wrists supported on your lap, or by your side, stretch your fingers out. Stop. Feel your fingers long and supported.</td>
</tr>
<tr>
<td>Hips</td>
<td>Tense your thighs and buttocks slightly. Stop. Feel your legs heavy and supported.</td>
</tr>
<tr>
<td>Feet</td>
<td>Pull your feet towards your face, bending at the ankle. Stop. Feel your feet heavy and hanging down, or supported on the floor.</td>
</tr>
<tr>
<td>Head</td>
<td>Push your head against the pillow or back of the chair. Stop. Feel the contact of your head against the support.</td>
</tr>
<tr>
<td>Jaw</td>
<td>Keeping your lips together drag your jaw downwards. Stop. Feel the gap between your teeth, you heavy jaw and loose lips. Feel your tongue resting lightly behind your teeth.</td>
</tr>
<tr>
<td>Forehead</td>
<td>Imagine that your hair is being smoothed back off your face up over the top of your head and down the back of your neck.</td>
</tr>
</tbody>
</table>
2. Pelvic tilting exercises

Gently rocking your pelvis forward and backwards could contract and relax the muscles around your pelvis. This helps to ease the tension and helps to relieve the pain.

**In Sitting**

- Sit up tall and arch your lower back
- Slump and push your lower back against the chair

Rock your pelvis slowly and gently with these movements in the pain free range up to 10 times.

**Pelvic tilts and stretch on all fours**

- Gently arch your back lifting your head up, lifting your tailbone
- Gently arch your back in the opposite direction tucking your tailbone down

Rock your pelvis gently up and down up to 5 times. Remember these movements should not cause any pain or dizziness.
3. **Other interventions**  
To help reduce aching you may try warmth e.g. a warm flannel/towel on your lower back, gentle massage. If attending a massage therapist make sure that they are qualified to treat pregnant clients.

4. **General exercises**  
Regular mild to moderate exercise, such as swimming and walking during pregnancy for most women can be very beneficial. Exercise can help to reduce stress, aches and pains and prepare your body for labour.

5. **Specific exercises**  
Exercises to strengthen your core muscles (abdominal hollowing and pelvic floor) can also reduce symptoms as well as improve bladder and bowel control. For further information about exercises to strengthen your core as well as general exercise please refer to the “fit for pregnancy” leaflet in your bounty pack or the following link: [http://pogp.csp.org.uk/publications/fit-pregnancy](http://pogp.csp.org.uk/publications/fit-pregnancy)

Please consult your doctor or midwife before starting or continuing any exercises during pregnancy.
Notes
How are we doing?

Please visit the following website links to complete the feedback form:

https://healthsharehull.org.uk/tell-us-what-you-think
https://healthsharelondon.org.uk/tell-us-what-you-think
http://www.healthshare.org.uk/survey.php