

BACK PAIN



PREVIOUS SESSIONS

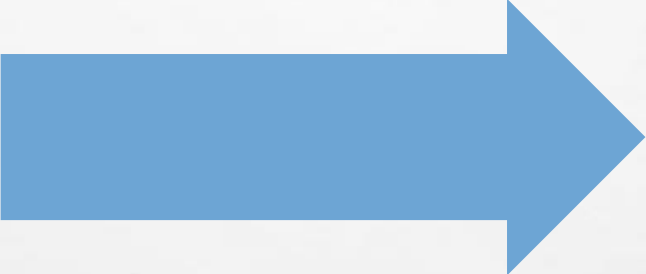
[Back Pain](#)

[Methods for Reducing Back Pain – Practical](#)

From

www.505qpwellness.ca/resources

RESOURCES



LANCET SERIES ON LOWER BACK PAIN

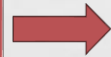
Lancet is a weekly peer reviewed general medical journal. It is among the world's oldest, most prestigious, and best known medical journals.

Quotes throughout presentation are from a team of 30 colleagues worldwide that looked at research and guidelines related to clinical practices for preventing and treating low back pain.

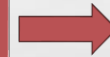
**LOWER BACK PAIN IS THE LEADING CAUSE
OF DISABILITY WORLDWIDE AND IS
BECOMING MORE COMMON AS OUR
POPULATION AGES.**

FINDINGS

Most people who have an episode of low back pain recover within 6 weeks



2/3 still have pain after three months



By 12 months, pain may linger but is usually less intense

CHRONIC BACK PAIN

Affects:

Wellbeing

**Daily
functioning**

Social life

**Most sufferers are
not getting the
most effective
treatment**

BED REST...

- **OFTEN USED BUT INCORRECT TREATMENT**

RISK FACTORS

Most causes are unknown

Physically demanding job that involves lifting

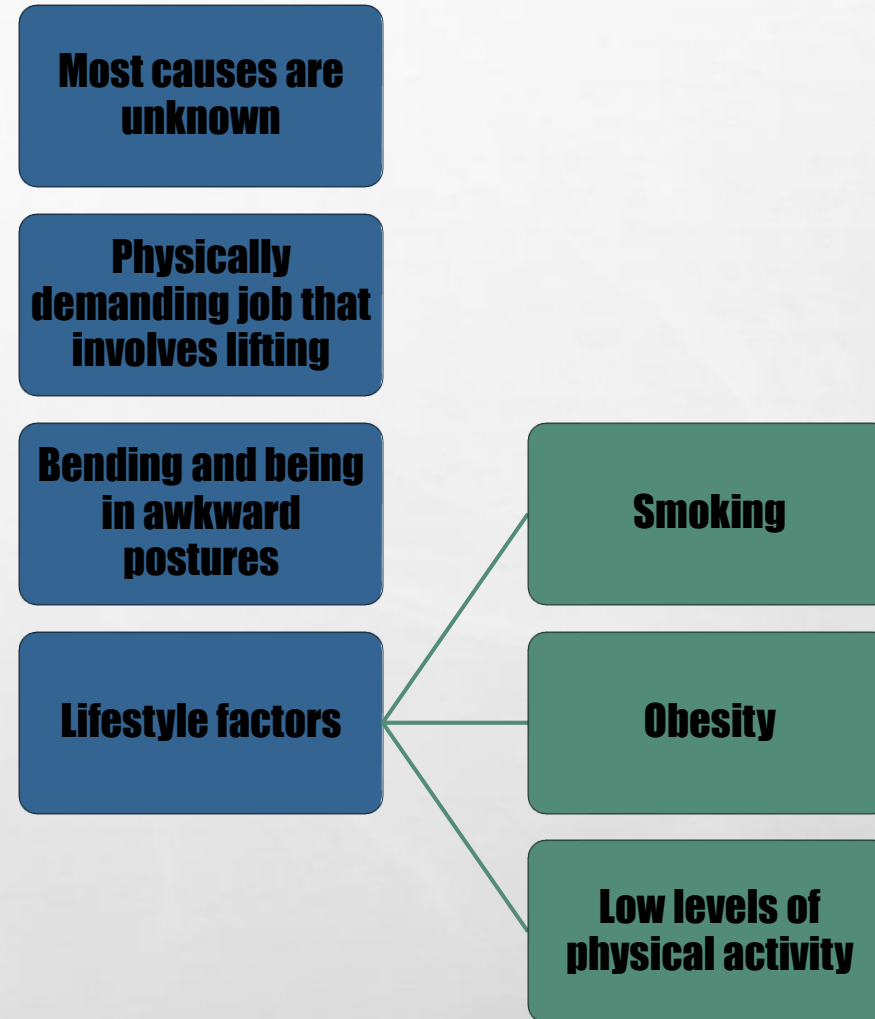
Bending and being in awkward postures

Lifestyle factors

Smoking

Obesity

Low levels of physical activity



**SHOULD SEE A
HEALTH CARE
PROFESSIONAL
TO RULE OUT**

Fracture

**Malignancy
(cancer)**

Infection

**Once
cleared by
doctor ...**

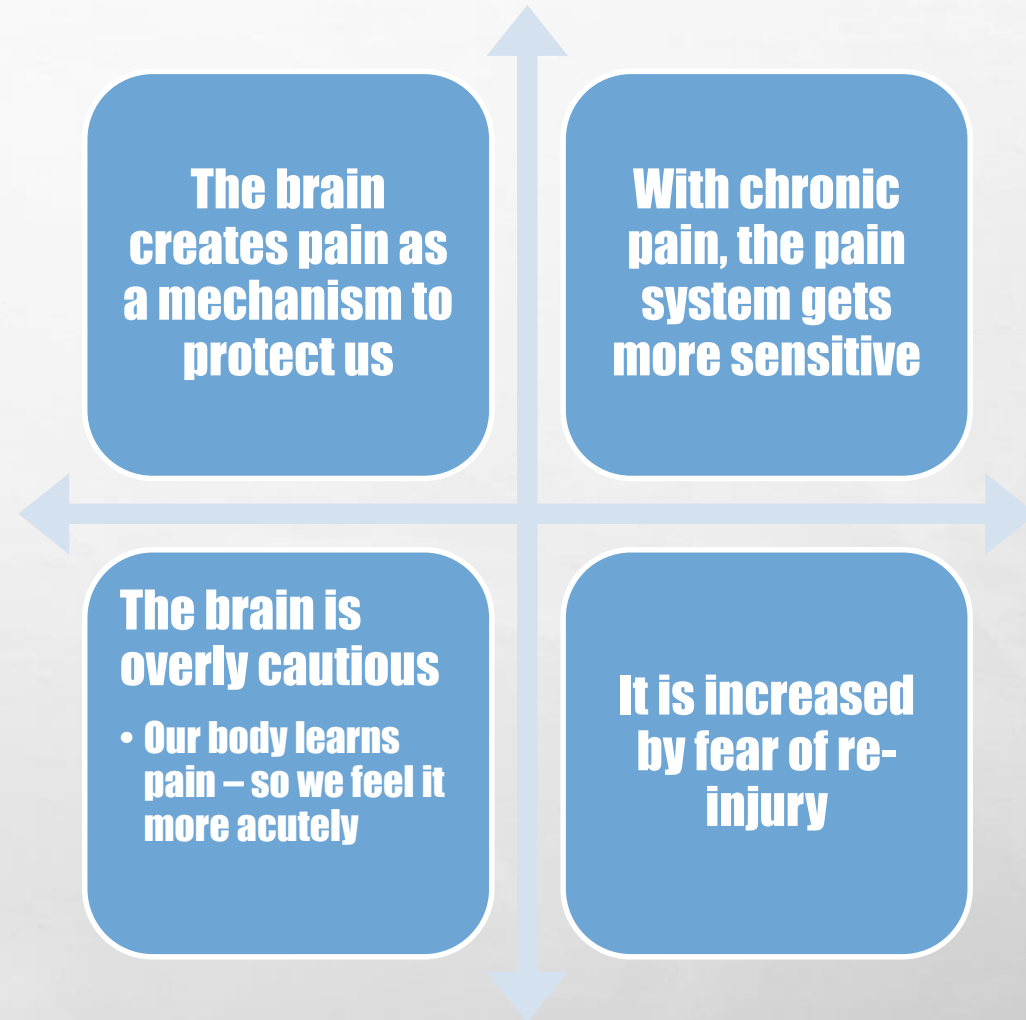
GET MOVING

Even if it hurts



**Once cleared by
Dr. or
physiotherapist,
you are safe to
move**

PAIN AND THE BRAIN



FEAR VS. MOVEMENT

**Move differently,
more guarded**

**Movement helps in
recovery because it
increases:**

**Circulation (more
blood and nutrients
to tissues)**

**Lymphatic system,
helping with
healing process**

**Synovial fluid
release, nourishes
the joints**

PROFESSOR LORIMER MOSELEY UNIVERSITY OF SOUTH AUSTRALIA

1

“You can still move – and exercise – within that pain buffer zone, without causing tissue damage”

2

“If we can appreciate that pain is a protective device, not a measure of tissue damage, if we can communicate that to people, then we change the game”

3

“When people realise they are safe to move, they can start to get better”

WHAT TYPE OF MOVEMENT?

No strong evidence that one type of exercise is superior to another, most are beneficial

Pick the one that works best for you

If you have an acute onset of back pain, and there is no improvement over two weeks, seek advice from a physiotherapist

“There’s evidence that exercise reduces the rate of recurrence by 50%. That’s a good reduction. Not a lot of medical treatments are that effective” Hancock

SCANS AND X-RAYS

**Overuse of imaging for
back pain**



**Two people can have the
exact same imaging
findings, but one of them
will feel no pain at all**



**Imaging is costing far
too much, with
questionable
usefulness**

CORTISONE INJECTIONS

Lancet researchers pulled together all the available literature on the injections – there was little justification for cortisone injections



Only 5 points reduction on a 100 point pain scale compared to placebo in the short term, with no long term benefit - Hancock

SURGERY

“You can never consider surgery as your best option for ordinary low back pain. An intact spine is always better than a surgically altered spine” - Mr. Ramin

There are exceptions – for trauma, tumour, or neurological deficit from instability or displacement of the vertebrae

“Only 3% returning to pre-injury duties and about 89% still taking major narcotics for pain relief at 24 months post-surgery” – Harris

STAY OFF THE DRUGS

Back pain is the main reason people use opioids over a long period of time

Addictive harm from opioids is well documented

Short stint of anti-inflammatories may be helpful

“Important thing is not taking meds for a long period” - Hancock

“With opioids we know that even very short periods of use increase the risk of dependence. Try to avoid them in almost all cases” - Hancock

RETHINK YOUR PAIN

Drug advertisers urge us to fight pain, attack it, and see it as an enemy



The Pain Revolution movement – people should understand that pain is a friend that protects our tissues when they need to heal. But it can get over-protective – Moseley



The change of outlook by letting go of fear, allows people to gradually increase what movements they can do. We need to retrain our pain system – Moseley

FINDING THE RIGHT CLINICIAN - HANCOCK

“If a clinician is recommending MRIs, investigations and injections, that should be a red flag to you”



“If a clinician says see me three to four times a week for hot packs and massage, that’s also not good evidence-based care. It’s passive. You’re not taking responsibility”



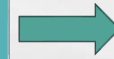
“The focus should be on you being given the skills and knowledge to self-manage in safe and simple ways”

KEY POINTS

Exercise, and view pain as a protective mechanism, not a measure of tissue damage



Some exceptions, but too many people are having back surgery needlessly



Scans, x-rays, cortisone injections and long-term opioid use are often unhelpful

DR. STU MCGILL

Should be able to find out what causes the pain

Use the appropriate exercises for that type of pain

Book “Back Mechanics – the secrets to a healthy spine your doctor is not telling you”

[Promo](#)

DR. STU MC GILL

**Abs stop motion, they do not
create motion**

**His book has self tests which
lead you to an appropriate
starting level of exercises
that will conserve the spine
while progressively
developing you athletically**

SELF ASSESSMENTS - CHAIR

**Sit in chair, neutral spine
– hands under sides of
chair and pull up - Pain?**

Slouch – Pain?

Neck up – Pain?

SELF ASSESSMENTS - STANDING



DR. STU MC GILL

One of the world's leading researchers on spinal mechanics and low back health.



In his decades of research, he's developed three exercises which are famously known as the McGill "Big 3" to relieve, prevent and fix your back pain.



After measuring a lot of different exercises, it was these 3 that best train muscles while minimizing stress on the spine

MC GILL “BIG 3”

**Everyone is different,
but these 3 exercises
can be done by
majority of the
population**

**Modifications of each
exercise is available**

**They work the entire
core (all sides)**

**If it does not help, it
should not hurt**

MODIFIED CURL UP

- [HTTPS://WWW.LIVESTRONG.COM/ARTICLE/392341-STUART-MCGILLS-BIG-THREE-BACK-EXERCISES/](https://www.livestrong.com/article/392341-stuart-mcgills-big-three-back-exercises/)

MODIFIED CURL UP

This exercise trains the abs without moving your lumbar (lower) spine or cervical (upper) spine.

Step 1

- **Lie down on your back with your legs out straight. Bend your right leg and plant that foot on the floor next to your left knee.**

Step 2

- **Put your hands under your lower back. They will prop your lower back up, which allows you to keep a natural curve in your spine.**

MODIFIED CURL UP

Step 3

- Lift your head, neck, and shoulders off of the ground. Try to keep your neck as still as possible while you lift your head up. Don't tuck your chin or let your head fall back.

Step 4

- Try to hold yourself up at the top for 7 or 8 seconds.

Step 5

- Lower yourself down. Do half of the repetitions with your right leg bent and half with your left leg bent.

THE SIDE BRIDGE



THE SIDE BRIDGE

This core endurance exercise strengthens the muscles on the side of your torso.

Step 1

Lie on your side, with your elbow underneath your shoulder. Curl your feet back so that your knees are at a 90-degree angle. To make this exercise harder, straighten out your legs instead of bending them.

Step 2

Lift your hips off of the ground, putting your weight on your elbow and knees.

THE SIDE BRIDGE

Step 3

- **Hold that position for as long as you can. Try to maintain a straight line from your head down to your feet. Make sure that your hips are in line with the rest of your body.**

Step 4

- **When you can no longer hold that position, drop and switch to the other side, once again holding for as long as you can.**

BIRD DOG

- [HTTPS://WWW.YOUTUBE.COM/WATCH?V=QAAGFUOGBUU&FEATURE=YOUTU.BE](https://www.youtube.com/watch?v=QAAGFUOGBUU&feature=youtu.be)

BIRD DOG

This exercise involves the core muscles, back muscles and even the glutes.

Step 1

Get on the floor on your hands and knees in a quadruped position. Make sure that your back is relatively flat.

Step 2

Raise your left arm forwards and at the same time extend your right leg straight back.

BIRD DOG

Step 3

Raise your arm and leg until they are in line with your torso. To increase activation of your back muscles even more during this exercise, you can clench the fist of the arm you're raising, according to an [article](#) by Dr. McGill on the National Strength and Conditioning Association's website.

Step 4

Lower your arm and leg. Once you complete the desired amount of repetitions on that side, switch to the other side and repeat.

RESOURCES

- **ANN ARNOLD. “TREATING LOWER BACK ACHES WITHOUT DRUGS AND SURGERY BY ‘RETHINKING PAIN’”.**
[HTTP://WWW.ABC.NET.AU/NEWS/HEALTH/2018-06-11/TREATING-LOWER-BACK-PAIN-WITHOUT-DRUGS-AND-SURGERY/9850798](http://www.abc.net.au/news/health/2018-06-11/treating-lower-back-pain-without-drugs-and-surgery/9850798)
- **BEV BETKOWSKI. “NEW RESEARCH SUGGESTS STAYING ACTIVE, WITHIN REASON, IS THE BEST MEDICINE FOR BACK PAIN.** [HTTPS://MEDICALXPRESS.COM/NEWS/2018-03-MEDICINE-PAIN.HTML](https://medicalxpress.com/news/2018-03-medicine-pain.html)
- **HENRY HALSE. “STUART MCGILL’S BIG THREE BACK EXERCISES”.**
[HTTPS://WWW.LIVESTRONG.COM/ARTICLE/392341-STUART-MCGILLS-BIG-THREE-BACK-EXERCISES/](https://www.livestrong.com/article/392341-stuart-mcgills-big-three-back-exercises/)