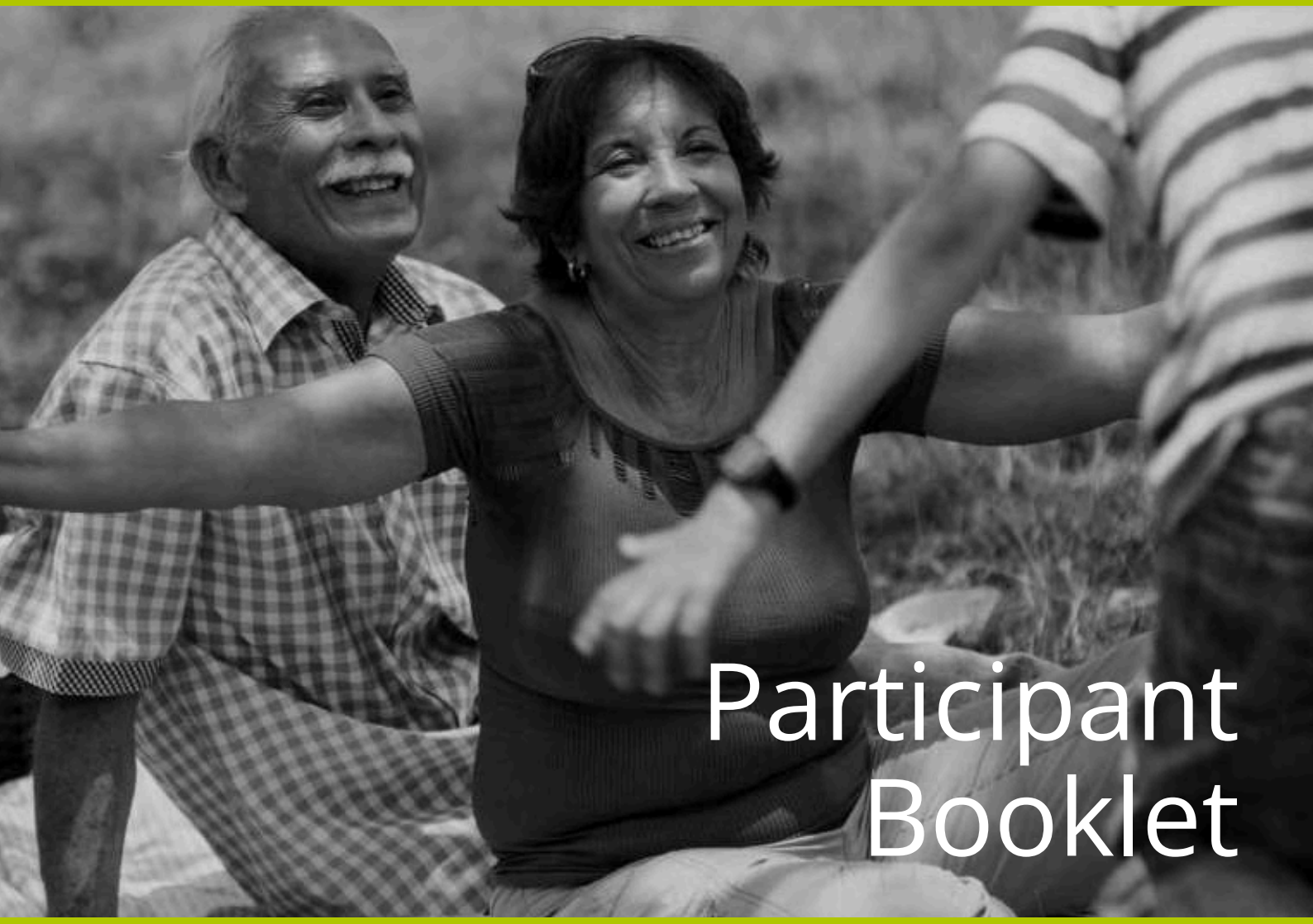
ESCAPE-pain Programme

Enabling Self-management and Coping with Arthritic Pain using Exercise



Participant Booklet

For chronic knee and/or hip pain

escape pain

Health Innovation Network South London

CITY ST GEORGE'S UNIVERSITY OF LONDON

Kingston University London

Orthopaedic Research UK

NHS

Contents

Introduction

Joint pain and stiffness are common, but they can be disabling and have a significant impact on the way people are able to lead day-to-day life.

As we get older our joints and the muscles and ligaments that surround them become more susceptible to degeneration, often as a result of the stresses and strains they have withstood throughout our lifetime. Previous injuries may also mean our joints no longer function as well as they used to. The joints commonly affected are the hips, knees, lower back and hands, and many people will experience symptoms in one or more of these areas as they get older.

People who experience joint pain and stiffness (sometimes associated with swelling and redness) will often be told they have osteoarthritis. This affects approximately 10 million people in the UK and is becoming more common as we live longer. Others, may be told they have 'chronic joint pain' which is very similar, treated the same as arthritis and frequently used medically to mean the same thing.

Many people think osteoarthritis/ joint pain is untreatable – this is not correct. Whilst getting rid of joint pain completely is not possible, there is a lot you can do to reduce pain and maximise your ability to do what you want.

It is very important that those people affected by joint pain and arthritis **keep moving**. When faced with changes in the joints, the body works hard to try and repair itself to maintain the function of the joint. We can assist this process by remaining active, keeping weight down and looking after our joints. This approach also helps us to feel in control of our condition and to manage our symptoms better in the long-term.

The information contained within this booklet, along with discussions you have throughout the programme, will help you manage your joint pain more effectively and allow you to lead a more active lifestyle.

Programme schedule

Session	Topic
One	Aims of the programme
Two	Joint pain and benefits of physical activity
Three	Goal setting and action plans
Four	Pacing activities
Five	Healthy lifestyle: diet, alcohol, smoking, sleep health
Six	Pain management options
Seven	Mid-way review and shared experiences
Eight	Pain, mood, and anxiety
Nine	Relaxation techniques
Ten	Managing flare-ups
Eleven	Long-term physical activity
Twelve	Celebrating progress and setting goals for the future

Session 1: programme aims

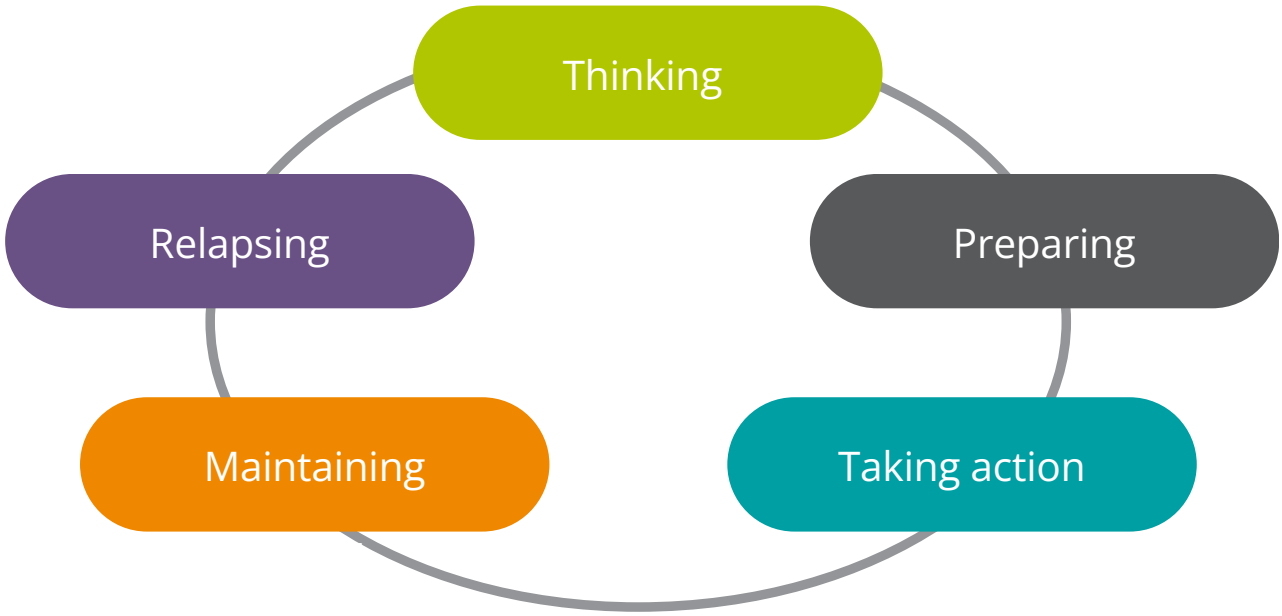
This programme will not 'cure' your arthritis or stop you from getting joint pain and stiffness, but it will help you manage your symptoms more effectively, enable you to be more active and to understand more about the condition and what you can do to help in the long-term.

The aims of this programme:

To help you in the long-term, it is important that you understand and appreciate the benefits of exercise. But how do you feel about exercise at the moment? Do you think it will help or not? What are your previous experiences?

There is often a 'cycle of change' related to how we feel about exercise. Read through the categories on the next page and see which part of the cycle represents your views the best. Then, over the next few weeks see if your position changes.

The change cycle – stages



Thinking
You recognise the need to be more active
You have yet to make any changes in your lifestyle
You are seriously considering a more active lifestyle

Preparing
You have thought about how you may change your lifestyle
You have taken small steps towards changing your lifestyle
You are open to advice and discussion about what to do

Taking action
You have made significant changes to your lifestyle
You are adapting to your new healthier, active life
You require some advice on how to progress your activity

Maintaining
You are exercising on a regular basis
You have overcome the initial difficulties of greater activity
You feel confident that you can continue in the long-term

Relapsing
You have stopped exercising
You have had difficulties continuing with an active lifestyle
You could not overcome the barriers to exercising

Exercise circuit

The maximum time you will spend on each of these exercises is two minutes. However, if this is too long for you, it is important that you stop when you feel as though you need a rest. You can make notes in the table below to help you remember what each exercise is e.g., starting position or direction of movement.

Exercise programme

Week	1	2	3	4	5	6	Time/ Reps
Exercise bike							
Quad bench							
Rocker board							
Wobble board							
Standing - one leg							
Theraband							
Sit to stand							
Step-ups							
Wall squats							
Step downs							
Heel slides							
Knee wedge							
Foot alphabet							
Shuttle walks							

Only do as many exercises as you feel comfortable with.

Session two: joint pain

People who are over 50 and have on-going joint pain are often diagnosed with osteoarthritis. This is a very common condition affecting approximately 10 million people in the UK. Whether the problem is in your arms, legs or spine, the joint changes and the ways in which the condition is managed are very similar.

Joint changes

In older people, the changes most seen in joints are; thinning and roughening of the cartilage that covers bone ends; bone thickening, especially at the edges of joints which can form into spurs or outgrowths; weakening of the muscles around the area; and sometimes swelling of the tissues that surround the joint. These changes lead to the pain and stiffness common in joint disease.

There is no cure for the degenerative changes seen in joints, but this does not mean there is nothing that can be done to help the problem. In fact, you can make a significant difference to your condition if you follow a healthy lifestyle, which includes remaining active and keeping your weight controlled.

- Thinning/ roughening of cartilage
- Bone thickening
- Swelling
- Stiffening of the joint
- Weakening of the muscles
- Progression

In response to the degenerative process, the body tries to repair the joint damage. For many people this is successful, and they only experience mild to moderate symptoms – few people with degenerative joint disease ever require surgery. However, for the body to carry out these repairs it relies on joints moving and being used normally. Without movement muscles will weaken, joints will become stiffer and the changes within the joint will worsen.

We know that remaining active can make a significant positive difference.

Benefits of exercise

Anybody can exercise! It doesn't matter how old you are, how long it has been since you last exercised, or that you have joint problems – exercise will help maintain your joints and make you fitter and healthier.

A lot of research has shown that people with joint pain and stiffness experience a reduction in their symptoms if they start to become more active. Other benefits of being active are reduced anxiety, a greater sense of well-being, better sleeping patterns, weight reduction and feeling more in control of your joint problems.

Exercise recommendations

Exercise is good for you, and you will notice positive changes in your health if you take part in regular activity. You are probably already doing some exercise without really knowing it. Exercise does not have to mean going to the gym, swimming, or cycling; activities such as walking, gardening, and climbing stairs all count towards your recommended daily levels.

The table below outlines what you should be aiming for.

How long?	You should aim for at least thirty minutes of activity. This can be in short bouts or in one go.
When?	On most days of the week, if not all days.
How hard?	You should feel slightly warm, and your heart should beat a little faster. You should still be able to talk at the same time as exercising.
What?	Anything that you enjoy! Walking, dancing, exercise classes, gardening, swimming are just some examples. It may be easier to try activities that can become part of a daily routine.

Think about your current levels of exercise and activity. Remember walking to the shops, climbing stairs or gardening (such as digging or mowing) all count to your recommended daily levels of activity.

Now, think back over the last three days and **fill out the table below making note of all the exercise you have taken**. You will probably be surprised how much you already do.

	Day 1	Day 2	Day 3
Activity?			
How long?			

Pain and exercise

You may sometimes experience discomfort when you're exercising or for a day or two afterwards, especially if it is a new activity or something you haven't done for some time. Don't worry, this does not mean you have harmed your joints or that you should stop the activity. It is almost inevitable that with long-term joint conditions you will sometimes experience aches and pains during exercise and activity, but what is important is that you recognise the need to keep your joints moving without overdoing it. This will come with experience, and you will gradually learn what level is right for you.

Remember, exercise related discomfort does not mean your joints are being harmed.

Session three: goal setting

It's much easier to become more active and do more exercise if you set yourself a goal. Setting a long-term goal however may feel daunting or off-putting, so consider the smaller steps that lead to what you want to ultimately achieve. For example, your eventual aim may be to walk to work or the local shops. The steppingstones to these goals may be to get off one bus stop before your destination, or to do regular shorter walking distances, slowly building up to your ultimate aim.

Planning is essential to achieving a goal. Think about how you are going to adjust your daily routine to include more exercise. This may seem like an inconvenience, but small adjustments will help you achieve your long-term goal.

Using action plans

An 'action plan' is a record of what you want to achieve, and how you will go about it. It will help you to reach your long-term goal by breaking your activity down into achievable, short-term aims. It will also allow you to monitor your progress and once you have achieved your goal, reward yourself to celebrate your success! Action plans also help you decide whether to set a new, slightly harder goal, or whether you want to remain at the same level to gain more confidence in your task. Goals and actions plans should be:

If you have difficulty achieving your goals and feel you are not progressing, your goal might be too difficult, and you may need to adjust your goal so that whilst challenging it is also achievable.

On the next page is an 'action plan'. Think about what you would like to achieve for the next week and fill in the prompts to help you plan how you will accomplish this.

Action plan

My goal for this week is to (e.g., walk more, take the stairs more often):

When will I do it (e.g., time of day)?:

Where will I do it (e.g., at home, on way to work)?:

How much/how long for?:

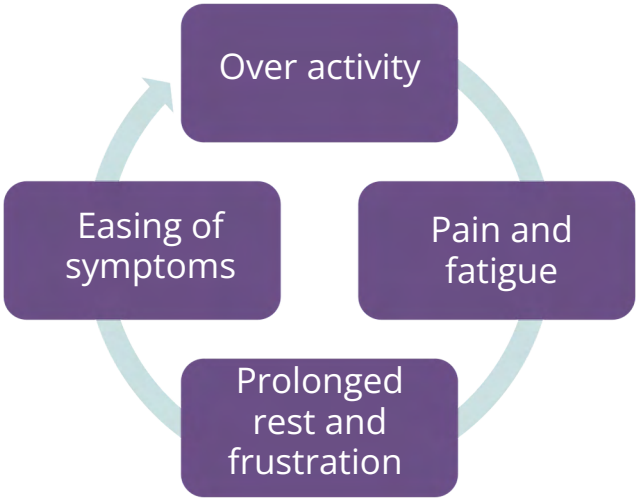
Fill this section out each day for the next week as a diary of your achievements;

Day	What I did	How my joints felt
Monday		
Tuesday		
Wednesday		
Thursday		
Friday		
Saturday		
Sunday		

Session four: pacing activities

Tired muscles, fatigue and reduced stamina are common symptoms of joint pain and arthritis, it is therefore important you adapt your activity to a level that is right for you. This will reduce the risk of pain and further joint damage.

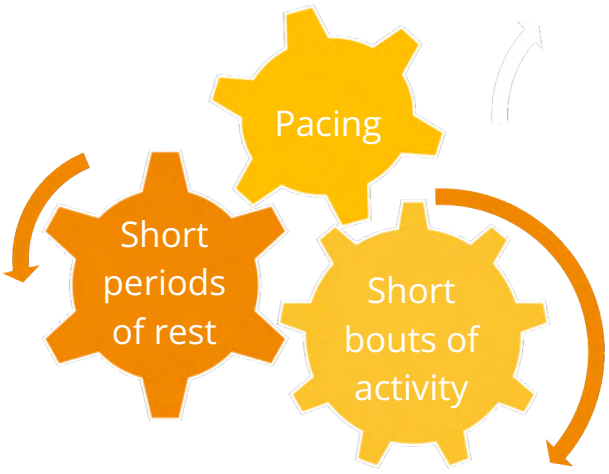
Many people experience pain and discomfort during common activities of daily living, such as walking, stair-climbing, or gardening. They mistakenly think this pain means they are causing more damage to their joints, so often avoid performing these activities. This is not a good way of dealing with the problem as you are associating a normal activity with joint damage, leading to avoidance and a less active lifestyle.



It is generally not the activity that causes pain, rather the intensity at which the activity is performed. Despite an increasing level of discomfort, people with arthritis generally perform an activity until pain gets so bad it prevents them from continuing. They are then forced into a prolonged period of rest or inactivity whilst the pain eases.

'Pacing' encourages you to adopt a different approach to activity by alternating periods of activity with rest to reduce pain and associated anxiety. This allows you to pursue your normal activities, but accounts for muscle and joint limitations associated with your joint condition.

Try to identify an activity that you do on a regular basis but find particularly uncomfortable – think about how you perform this task. Most people recognise a pattern of experiencing pain after a relatively short period of time but continue until the task is completed and then rest. Think about the time period when you start to feel slightly tired, prior to experiencing pain and discomfort, and have a short rest at this stage.

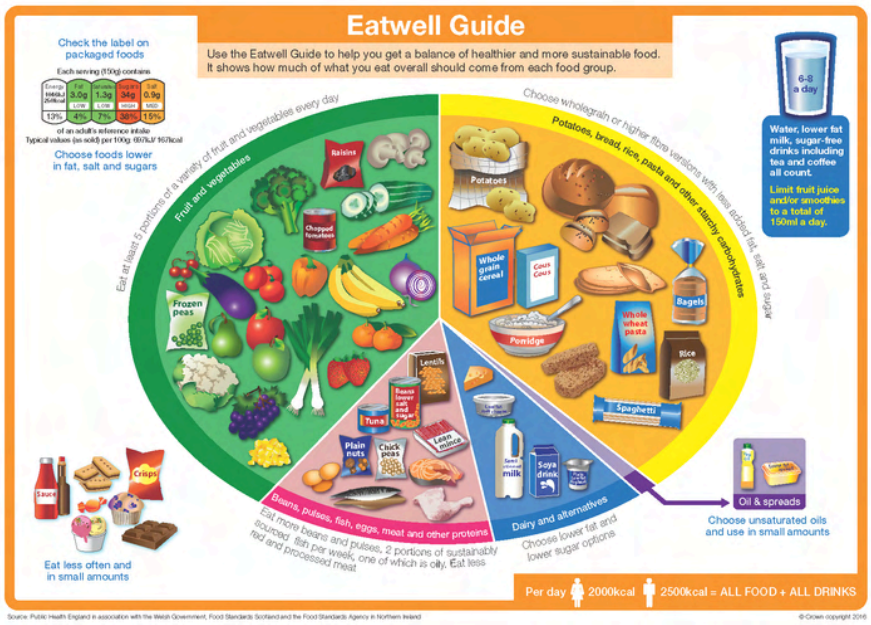


Session five: healthy lifestyle

A healthy lifestyle has both short and long-term health benefits. Long term, eating a balanced diet, taking regular exercise, moderating alcohol consumption, stopping smoking, getting enough sleep and maintaining a healthy weight can add years to your life and reduce the risk of certain diseases including cancer, diabetes, cardiovascular disease, osteoporosis and obesity, as well as help you manage your joint pain. In the short-term it can also make you feel and look your best, give you more energy and help you maintain a healthy weight. Improving your lifestyle with small steps in the right direction will have a big impact on your well-being and joint pain.

Healthy diet

The single most important link between diet and joint pain is that the heavier you are the greater strain you put on your joints, resulting in increased pain. So, it is very important to keep your weight at an appropriate level, eat healthily and take regular exercise. There is no good evidence that any particular food or drink can make your joint pain either better or worse. There is no 'special' diet to help joint health, and no diet will prevent you getting further joint pain. The best advice is to eat a healthy, well-balanced diet that has limited amounts of fats and sugars. It is also important that your diet contains Vitamins C, D and Calcium, which all contribute to joint health. Taking these as a supplement is unnecessary if you follow a healthy, balanced diet.



This picture gives you an idea of how your diet should be divided, according to the foods that you eat. Other tips include;

- Eating 5 portions of fruit or vegetables each day
- Reducing weekly amounts of alcohol
- Drinking more water
- Grilling food instead of frying
- Choosing fish or poultry as alternatives to red meat.

It can sometimes be surprising how much we eat in relation to the amount of physical activity taken. Very simply, if your calorific intake exceeds the amount of energy you use, then you will put on weight. **Fill out the food and exercise diary (below) over the next week to give you an idea of what your diet consists of, and how active you are.** If you are having difficulties with your weight, you should discuss this with your GP or practice dietician.

Food and exercise diary

Day	Food/drink intake	Exercise
Monday		
Tuesday		
Wednesday		
Thursday		
Friday		
Saturday		
Sunday		

Drinking in moderation

As part of a healthy lifestyle, it is important to think about the amount of alcohol you are consuming and modify it if necessary. The guidelines for protecting your health recommend drinking no more than 14 units of alcohol a week, which should be spread evenly over three or more days in the week.

Stopping smoking

There are several benefits to stopping smoking. Stopping smoking can reduce your risk of developing cancer, heart disease and strokes. Some studies have shown that smoking may also be linked to developing chronic back pain.

For more information about stopping smoking speak to your pharmacist or GP.

Sleep health

Sleep is essential for good mental and physical health. Research has shown regular poor sleep puts people at increased risk of obesity, heart disease, high blood pressure and diabetes. Most people need around 8 hours of good quality sleep a night, but it is individual, and some people will need more and some less.

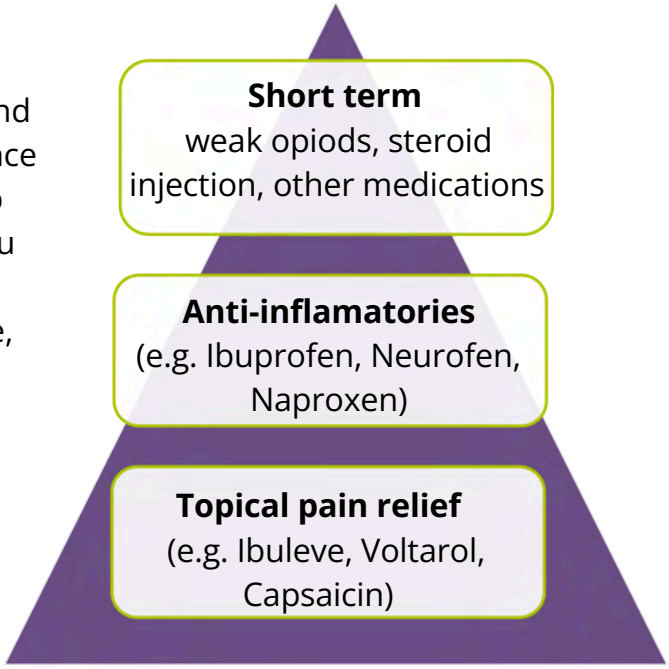
Tips for sleep health

- Routine – keeping regular sleeping hours can be very helpful.
- Limit blue light – electronic devices emit blue light which can disturb our internal body clock. It is recommended that you stop watching TV and using electronic devices such as smart phones and tablets two hours before going to bed.
- Caffeine – caffeine is a stimulant which effects the nervous system and makes you feel more awake. It is recommended that you do not drink large amounts of caffeine after 3 – 4pm.
- Having an optimal bedroom environment – try to optimise your bedroom environment by limiting noise and light and ensuring it isn't too warm.
- Regular exercise – evidence has shown regular exercise is one of the most beneficial ways to improve sleep. It can enhance all aspects of sleep and has been used to reduce symptoms of insomnia.

Session six: pain management options

There are many different types of drugs, injections, creams, gels, and sprays for joint problems that can be prescribed or bought over the counter, in addition to many alternative remedies that are available. Your GP should discuss the benefits and potential side-effects of drugs with you.

The following information will help you to understand the different medications and how they may influence your joint symptoms. It is recommended that a step wise approach to medication is taken, therefore, you should start at the bottom of the pyramid and if necessary work your way up when the pain is worse, and moving down when the pain is less.



Don't be disheartened if you are using stronger medications at the moment. This programme aims to help you reduce your reliance on medication by virtue of learning how to manage your symptoms.

Key reminders:

- Medication only targets a very small part of the pain experience, therefore, it is important to understand its effects, how it can help but also its limitations.
- Only use medication as it is prescribed.
- Regularly review your medications with your healthcare professional.

As per the National Institute for Health and Care Excellence (NICE) guidelines, medication recommendations start with:

Topical pain relief The cream or 'topical' varieties of NSAIDs such as Ibuleve and Voltarol are rubbed into the painful area to relieve symptoms. The action of rubbing or massaging the drug onto the skin is also likely to help in addition to the drug. Unlike the tablet version, NSAIDs creams and gels are less commonly associated with side-effects and therefore can be used for long periods of time. Some people may also find the chilli-based cream Capsaicin beneficial in relieving painful, non-inflamed joints.

Anti-inflammatories Non-steroidal anti-inflammatory drugs or NSAIDs can help relieve pain and reduce inflammation in your joints, and they come in both tablet and cream forms. Although most of your pain is probably due to degeneration, it is possible your joint can also become inflamed, making your joint feel hot and swollen. NSAIDs can either be prescribed or bought over the counter (ibuprofen). These drugs should only be taken for short periods. They do have side effects, that should be discussed with your healthcare professional, because of the damage that anti-inflammatories can do to the stomach lining.

Injections into joints contain steroids which have a pain relieving and anti-inflammatory effect. The injection may also contain a local anaesthetic which is likely to give almost immediate pain relief. However, injections only provide temporary relief and should not be repeated more than 2-3 times with a gap of 3-4 months between each injection.

Ice and heat

Using heat or ice is a safe, effective, easy, and cheap way to help relieve pain or swollen joints. Although there are a variety of heat and ice packs available to buy, a very simple option is a packet of frozen peas and a hot water bottle. For painful areas you can use either hot or cold to help symptoms. Some people use both alternately, whereas others prefer one or the other.

If you decide to try these, there are a couple of simple things to remember to ensure the treatment is safe and eases your symptoms:

- If you have any skin conditions, poor sensation, numbness or circulatory problems you should not use these methods unless you have discussed it with a healthcare professional.
- It is also important to remember that both heat and ice can burn the skin, so you should always use a towel to cover and protect the area. You should also check the area frequently for any skin changes.
- If your joint is inflamed you should use ice to settle the symptoms down. Apply the frozen peas wrapped in a damp towel to the area for about 10 minutes at a time. You can repeat this several times throughout the day. Always remember to mark the bag of peas you are using as these should not be eaten because they would have defrosted a number of times.
- For areas of pain, you can use either hot or cold, or both alternately to help the symptoms. Both the hot water bottle and ice pack can be applied to the area for about 20 minutes to relieve pain. Remember to cover the skin with a towel and check the area regularly. Make sure that if you are using ice, to dampen the towel to make the treatment more effective. This can be repeated several times a day.

Remember, inflamed areas should be treated with ice; painful areas can be treated with ice or heat.

Safety tips:

- Ice and heat can burn.
- If experiencing poor sensation, numbness, or circulatory problems, don’t use these methods.
- Do not eat the frozen peas that you have used.
- Check skin frequently.

Alternative management

Many people do not want to take drugs, or want to take as little medication as possible, and therefore try other ways to ease their pain. Although there are many 'alternative' therapies that are said to help joint pain, there is often very little research evidence to support their use. Below are some you may have heard of.

Before trying any alternative therapies including supplements you should check with a qualified healthcare provider that it is safe for you to do so.

- **TENS** (Transcutaneous Electrical Nerve Stimulation) is a small electronic device which sends tingling pulses through the skin via adhesive pads. It works by disrupting the perception of pain signals, thereby reducing sensation of pain. TENS may be beneficial for some people. Also, TENS are convenient as they can be worn throughout the day underneath clothes, and therefore do not significantly restrict normal daily activities. TENS machines can be bought from many high street pharmacies, but some physiotherapy departments lend machines to people to try for a short time, which allows you to see if it is something that helps you.
- **Acupuncture** is a traditional Chinese intervention that relieves pain through the insertion of needles into the skin. The mechanism of pain relief is likely to be similar to TENS via disruption of pain signals. Acupuncture is not available on the NHS as there is no evidence to suggest this treatment is beneficial for joint pain.
- **Glucosamine** is a naturally occurring substance in the body that helps produce certain joint tissues. Although it used to be prescribed by GPs, research shows little evidence that it helps people's joints and is therefore not prescribed now. However, as it is considered a food supplement, it is available to buy in high street pharmacies and health shops. If there is any benefit, glucosamine should be taken at a dose of 1500mg per day. It may take 3-4 months before you notice any benefit, but if there is no change in your symptoms after this then it may not be worth pursuing.
- **Orthotics** There are various orthotics (insoles, braces, tape, splints or supports) available privately or on the NHS that you may have tried and found to be beneficial, however; these are not routinely offered.

Session seven: midway review and shared experiences

You are now mid-way through the programme, and you may have already started to notice improvement in your symptoms and felt some benefits from the exercise or the amount of activity you are doing. Any improvements, no matter how small are very important in helping you to manage your joints in the long-term.

Joint changes develop over many years, so don't be disappointed if you haven't experienced spectacular changes in your symptoms yet. If you feel as though you understand your joint problems more and have more confidence in managing your pain this will help you and your joints in the future.

Think about the last three weeks and make a note below of any changes that have happened in such a short space of time.

How have my joint symptoms changed?	
What have I learnt about exercise?	
Have I changed the amount of exercise and activity I'm doing?	
What other changes would I like to see?	

On the next page is another 'action plan'. Think about what you achieved in your last 'action plan' and how you would like to take your achievements forward. Now complete the next page to give you a new goal for the coming week.

Action plan

My goal for this week is to (e.g., walk more, take the stairs more often):

When will I do it (e.g., time of day)?:

Where will I do it (e.g., at home, on way to work)?:

How much/ how long for?:

Fill this section out each day for the next week as a diary of your achievements;

Day	What I did	How my joints felt
Monday		
Tuesday		
Wednesday		
Thursday		
Friday		
Saturday		
Sunday		

Session eight: pain, mood, and anxiety

We cannot cure arthritis or reverse joint damage, so it is unlikely your pain will go completely. It can however be reduced, and importantly the way you feel about it and the impact pain has on your life can be altered.

Although changes to your joint are the main problem in joint conditions, the influence of other factors such as mood, previous experiences of pain and self-esteem will all affect how you cope with the problem. For people who experience pain over a long period of time, psychological factors (what you believe and how you feel) often become more influential than physical or mechanical changes, and can have a major impact on pain levels, your ability to cope with the pain and how well you function in daily life. People with long-standing joint problems can become anxious and depressed which often leads to a feeling of worsening symptoms.

Decreases in your ability to do the things you want may lead to frustration, anger, low mood, or anxiety. This in turn may lead to decreased motivation to remain active (e.g., exercise or work), resulting in further inactivity, weight-gain, pain and joint deterioration.

Positive thoughts can reduce pain and allow for better coping while negative thoughts increase pain and reduce function.

Remaining positive about your joint problems will help you to cope with your symptoms more effectively and feel less pain.

It is important for your joint health and your sense of well-being that you remain active and find things to distract you from thinking about your joint pain all the time.

Remaining positive about your joint problems, continuing to be active and retaining purpose will help you cope with your pain more effectively. Contact with other people is important and helps when we're feeling a bit down.

The key to successful long-term management of your joint symptoms is to carry on doing the things you enjoy, making small adjustments in the way you do things, but not to stop doing them altogether.

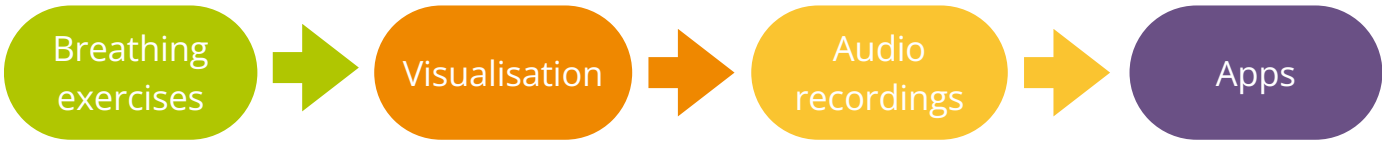
Session nine: relaxation techniques

Becoming more aware of the changes that occur in your muscles when you are tense encourages a calmer reaction to pain and can provide you with an alternative way of controlling your symptoms, relieving stress and assisting with sleeping difficulties.

There are many different techniques that encourage this awareness and promote relaxation. The most common requires you to experience the feeling of relaxation and reduced muscle tension, through recognition of how your muscles feel when they are tense, and the pain associated with that tension.

Another common technique is to visualise a picture, a photograph, or a place you have visited and found relaxing. Concentrate on this scene and use all your senses to immerse yourself in the place and feel as if you are there. Think about what you can see; the sounds that you can hear; the smells around you; and the things that you can touch.

Try different techniques until you find something that is useful for you. Whichever technique you choose requires practice before it becomes very helpful, or you feel entirely comfortable or confident in what you are doing. If you are particularly interested in relaxation techniques, there are a variety of classes, audio recordings and examples available to help develop your skills.



On the next page is a set of instructions on one of the relaxation techniques available. Find a comfortable, quiet place and give relaxation a try.

Progressive muscle relaxation

Take a long, slow, deep breath in through your nose. Hold the breath for a moment, then breathe out through your mouth. Take another slow breath in through your nose. Fill your lungs completely. Hold it for a moment...and release the breath through your mouth.

Throughout the session you will tense various muscles throughout your body. This should not be vigorous, just tighten each muscle firmly but gently as you breathe in. If you feel uncomfortable at any time, you can simply relax and breathe normally.

When you're relaxed and ready to start, shift your attention to your feet. Take a moment to focus on how they feel.

Slowly tense the muscles in your feet and calves, squeezing as tightly as you can. Hold for a count of 10...and relax.

Slowly tense the muscles in thighs, squeezing as tightly as you can. Hold for a count of 10... and relax.

Slowly tense the muscles in your buttocks, squeezing as tightly as you can. Hold for a count of 10... and relax.

Slowly tense the muscles in your tummy, squeezing as tightly as you can. Hold for a count of 10...and relax.

Slowly tense the muscles in your back, squeezing as tightly as you can. Hold for a count of 10...and relax.

Slowly make a fist, squeezing as tightly as you can. Hold for a count of 10...and relax.
Slowly tense the muscles in your shoulders, lifting towards your ears, squeezing as tightly as you can. Hold for a count of 10...and relax.

Slowly tense the muscles in your face, squeezing as tightly as you can. Hold for a count of 10...and relax.

Take a long slow deep breath in through your nose. Hold the breath for a moment, then breathe out through your mouth, and continue breathing normally.

Feel the heaviness in your body as you feel completely relaxed.

Session ten: managing flare-ups

The course of degenerative joint problems and arthritis is variable from person to person. Most people will have ups-and-downs as the pain comes and goes, although occasionally there may be short periods when your pain seems worse. Few people progress to surgery.

These increases in pain are called exacerbations or 'flare-ups' and are sometimes a sign that you have overdone an activity. Sometimes, however, it may seem that there is no apparent reason for the change in pain, but this is often due to your joint tissues being irritated as part of the changes happening within the joints.

It is normal for joints and pain to occasionally flare-up. It does not mean your condition is worsening; it is just a temporary situation that probably doesn't mean you need to see your GP as it will generally settle down within a few days if you do the right things.

If you experience a flare-up, use the skills and knowledge you have learnt so far to manage problems yourself.

- Rest for a couple of days. This does not mean remaining in bed but avoiding unnecessary activity until your pain settles down.
- Use ice or heat to relieve the pain.
- If you are not already taking the maximum dose, you may need to increase your drugs for 2-3 days to help ease the symptoms. (check with a GP or pharmacist first).
- Do some simple exercises in a lying or sitting position to keep the area moving and reduce stiffness.
- If you feel anxious, use relaxation techniques to help keep yourself calm.
- As the pain eases gradually increase your activity levels again. This may take a week or so before you're back to your normal levels – don't rush if you don't feel ready.

Session eleven: long-term physical activity

Once you experience the benefits of exercise, you'll realise how important it is to keep going! Although you may be happy and have the motivation to exercise on your own there are many organisations that support group exercise and activities to help you remain active.

It is very important you find an activity you enjoy doing (e.g., walking, swimming, dancing, yoga) that you can do regularly, maybe with family or friends as a social event. Feeling supported is key in continuing to be active.

Your local sports and leisure centres will offer classes for people over-50, in addition to swimming and use of gym facilities.

If you would prefer to try other activities or environments, the list on our website may be of interest to you: https://escape-pain.org/support-tools/useful-links-physical-acitivity/

Please feel free to use this page to jot down opportunities to continue exercising discussed during your group session.

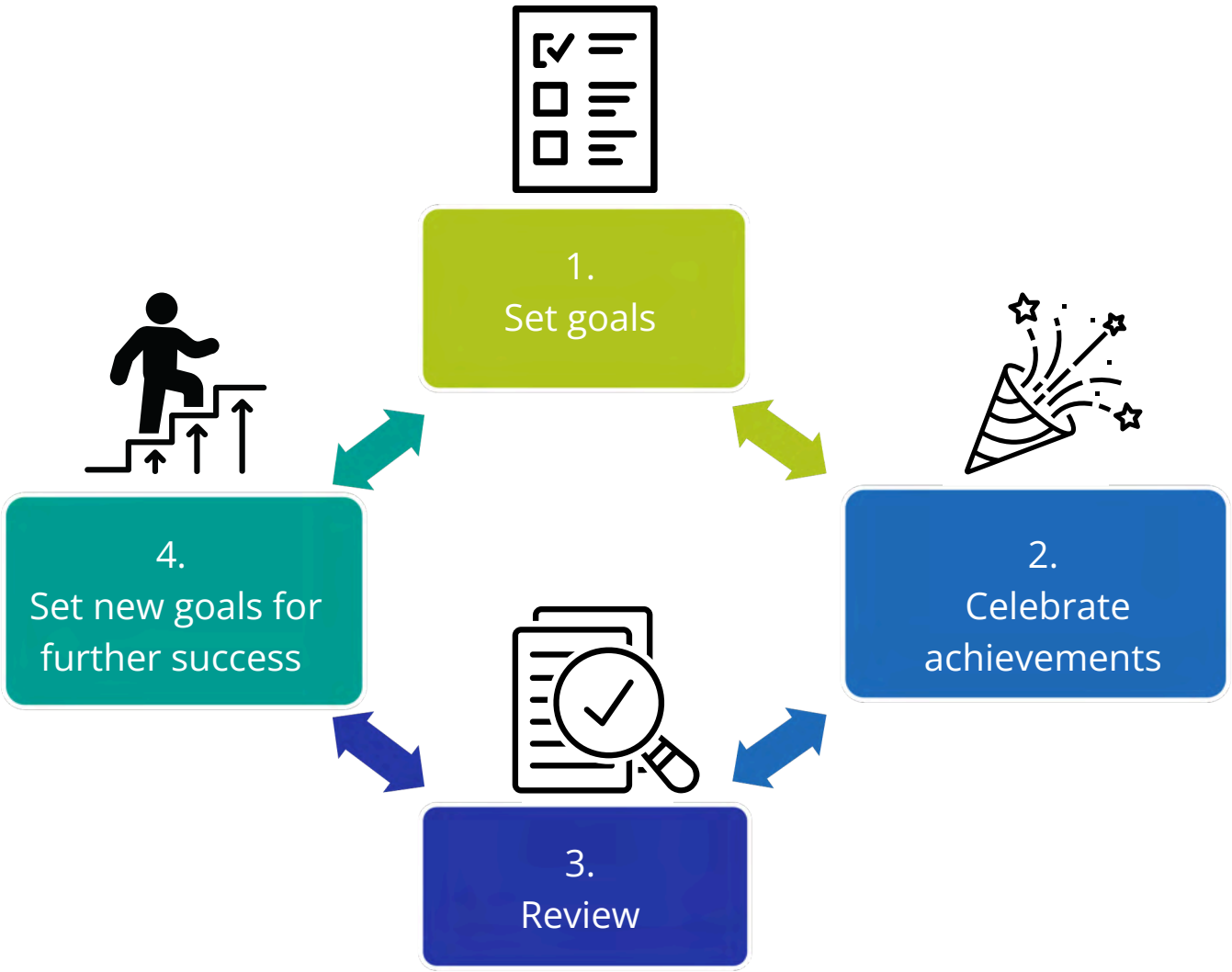
Session twelve: Celebrating progress

When you have achieved your goal, celebrate, tell your family and friends, reward yourself. When your goal becomes easy, you need to review your goals and set a new action plan for further success.

If you are not achieving your targets, you may have set your sights too high initially, over-estimated your current ability to affect change, or your plan to achieve the goal may not have been specific enough.

Modify your action plan and be more specific on how you will work towards change.

Have a go completing the additional personal action plans at home.



Action plan

My goal for this week is to (e.g., walk more, take the stairs more often):

When will I do it (e.g., time of day)?:

Where will I do it (e.g., at home, on way to work)?:

How much/ how long for?:

Fill this section out each day for the next week as a diary of your achievements;

Day	What I did	How my joints felt
Monday		
Tuesday		
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Useful organisations

Arthritis and pain

Versus Arthritis, https://www.versusarthritis.org/
NHS Choices – Osteoarthritis, https://www.nhs.uk/conditions/osteoarthritis/
The Pain Toolkit, https://www.paintoolkit.org/
Arthritis Action, https://www.arthritisaction.org.uk/
British Society for Rheumatology, http://www.rheumatology.org.uk/
Chartered Society of Physiotherapy – Rheumatology, https://www.csp.org.uk/tags/rheumatology

Physical activity

We are Undefeatable, https://weareundefeatable.co.uk/
10 Today, https://www.bbc.co.uk/sounds/brand/p087wddm

Healthy eating

The Eatwell Guide, https://www.nhs.uk/live-well/eat-well/the-eatwell-guide/
Healthline - Osteoarthritis Diet, https://www.healthline.com/health/osteoarthritis/osteoarthritis-diet

Relaxation techniques

Head Space, http://www.getsomeheadspace.com/
Calm, https://www.calm.com/
The Mindfulness App, https://www.themindfulnessapp.com/
Stop, Breathe and Think, https://www.stopbreathethink.org.uk/
Breathworks, https://www.breathworks-mindfulness.org.uk/
Mindfulness Works, https://mindfulnessworks.com/mp31.php

Online communities

Health Unlocked: Arthritis Action, https://healthunlocked.com/arthritis-action
Versus Arthritis Forum, https://www.versusarthritis.org/get-help/online-community

Free pedometers

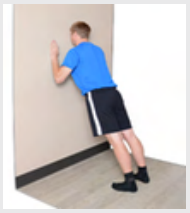
iPhone or iPad (from the App Store) – Stepz, https://apps.apple.com/us/app/stepz-pedometer-step-counter-for-tracking-steps/id839671656
Android (from Google Play) – Pedometer, https://play.google.com/store/apps/details?id=com.tayu.tau.pedometer&hl=en_GB

A selection of ESCAPE-pain exercise and education videos are free to access on the ESCAPE-pain website, to help participants safely exercise at home

Exercise, https://escape-pain.org/i-have-knee-hip-pain/exercise-videos/
Education, https://escape-pain.org/i-have-knee-hip-pain/educational-videos/

Participant exercises (examples)

General exercises

Exercise	Description	Demonstration
Shuttle walking	• Walk between the markers	
Cycling	• Pedal using a stationary bicycle or pedals • Progression: to make it harder, increase the resistance	
Step ups	• Stand in front of a step • Step up and down onto the step • Hold onto a rail if you feel unsteady • Remember to change legs halfway through	
Sit to stand	• Stand up from a chair then sit down slowly • Progression: to make it harder don't use your hands to push up	
Wall slides	• Back against the wall, feet shoulder width apart • Feet one stride from the wall • Bend your knees to no more than 45 degrees whilst sliding your back down the wall • Return to standing	
Wall press ups	• Hands on the wall shoulder width apart • Lean into the wall by bending your elbows and keeping your back straight • Return to the start position	
Hamstring stretches	• Standing, place foot on a step • Lean forward until you feel a stretch in the back of your leg • Hold stretches for 15 seconds	

Back exercises

Exercise	Description	Demonstration
Knee rolling	• Lie on your back with your knees bent • Gently rock your knees side to side	
Cat and camel	• Start on hands and knees • Gently arch and hollow your back • Keep your head down when you arch • Keep your head up when you hollow	 
Back extensions	• Lying on your front arch your back by pushing through your arms onto your elbows • Progression: push through your hands with your elbows straight	 
Knee hug	• Hug both knees towards your chest • Hold for up to 15 seconds then relax back to the start position • Only hug one knee to your chest, if it is too difficult to do both	

Hip exercises

Exercise	Description	Demonstration
Clam	• Lie on your side with your knees bent • Gently lift the upper knee whilst keeping hips still • Return to the starting position	 
Hip out	• Place foot in band • Hold onto a support • Feet shoulder width apart • Take leg out to the side then slowly return to start position • This exercise can be done without a band or with an ankle weight instead	
Hip back	• Place foot in band • Hold onto support • Take foot out behind and slowly return to start position • This exercise can be done without a band or with an ankle weight instead	
Hip stretch 1	• Holding a support • Grasp ankle and gently bring your heel towards your bottom • If you are unable to reach your ankle, use a towel looped around your ankle or • Lie on your front • Hold ankle or loop a towel around it • Bring heel towards your bottom • Hold stretches for 15 seconds	 
Hip stretch 2	• Step forward with the leg to be stretched at the back • Bend the front knee until you feel a stretch in the front of your hip • You may need to lift your back heel off the floor or • Lie on the couch/bed with the leg to be stretched over the side • Draw the other knee towards you until you feel a stretch • Hold stretches for 15 seconds	 

Exercise	Description	Demonstration
Hip stretch 3	• Step to the side • Hold onto something supportive if you feel unsteady • Bend your knee until you feel a stretch in the inner thigh of the straight leg Or • Lying on your back, knees bent • Let one knee fall out to the side until you feel a stretch in the inner thigh • Hold stretches for 15 seconds	 

Knee exercises

Exercise	Description	Demonstration
Knee straight	• Put foot into band in a figure of eight • Straighten knee against resistance of the band • Slowly lower to the start position • This exercise can be done without a band or with an ankle weight instead	
Knee wedge	• Place wedge under knee • Lift heel off bed until leg is straight then slowly lower start position • Progression: add an ankle weight	
Leg alphabet	• Sit on edge of bed or chair • Keep your leg straight and write the alphabet with your leg • Progression: add an ankle weight	
Knee slides	• Sit or lie on the couch • Slide your heel towards your buttock keeping your heel on the couch • Slowly straighten your leg	

Versus Arthritis

Versus Arthritis is the UK's largest charity dedicated to supporting people with arthritis. Their website, helpline and forums have a wealth of resources that may be helpful to you.

For more information visit https://versusarthritis.org/ or call their helpline for free information and advice: 0800 5200 520

Action plan

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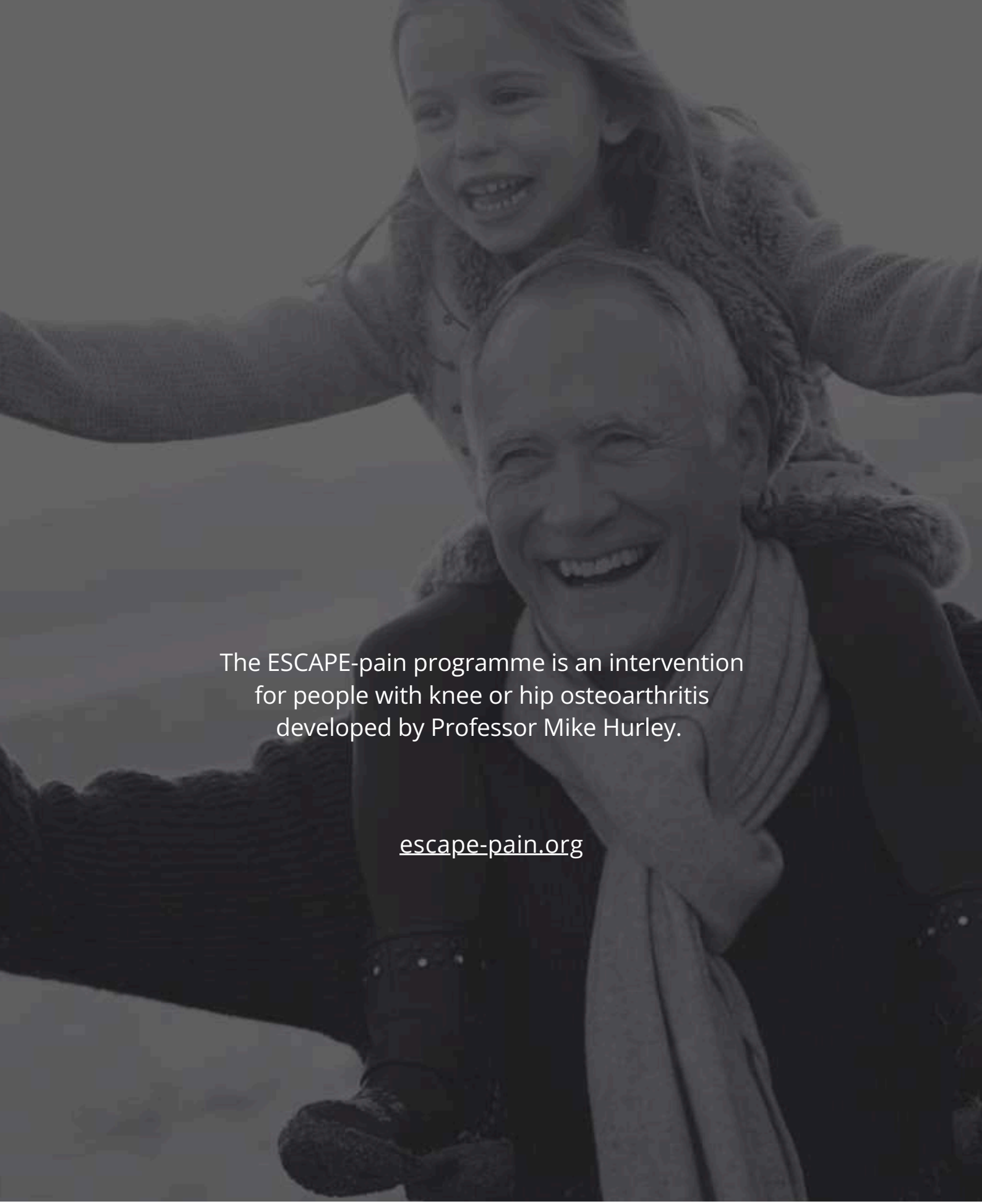

The ESCAPE-pain programme is an intervention for people with knee or hip osteoarthritis developed by Professor Mike Hurley.

escape-pain.org

Health Innovation Network South London

CITY ST GEORGE'S UNIVERSITY OF LONDON

Kingston University London

Orthopaedic Research UK

NHS