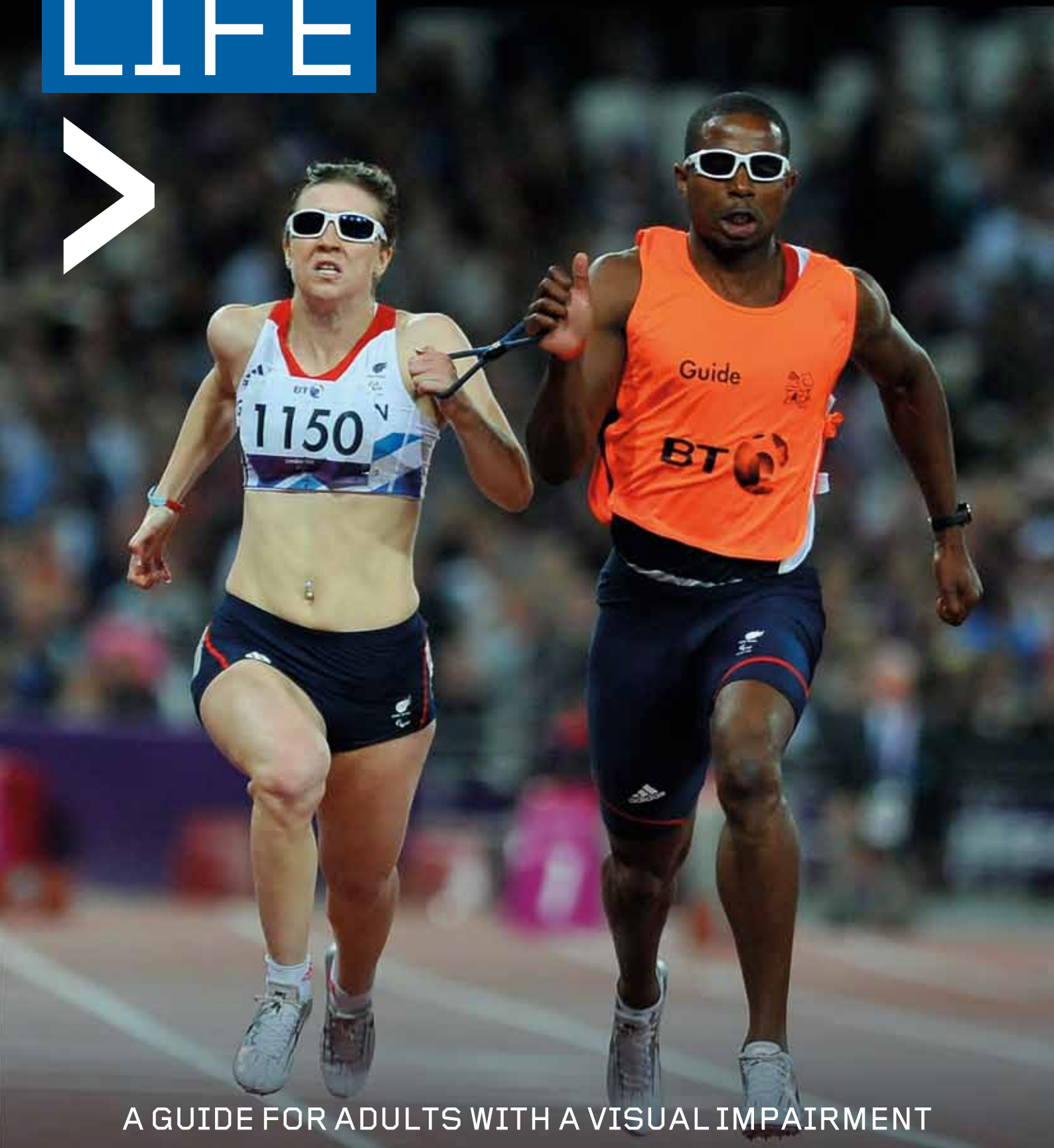
FIT FOR LIFE



A GUIDE FOR ADULTS WITH A VISUAL IMPAIRMENT

Exercise Nutrition Psychology

This guide is a great resource to help you get Fit for Life. It starts with the basics and teaches you how to lead a healthy, well-balanced and active lifestyle, and allows you to progress at your own pace. The resource includes specific topics, advice and adaptations for individuals with a visual impairment (VI) so that all the information you need is in one place. You can also pick and choose from the areas you are most interested in. If you then choose to take up a sport, you can download the Fit for Sport section which will help you understand how to adjust your training and nutrition, and how to use some psychological skills to improve your performance. No matter what level you are currently at, or even if you are just getting started, this guide can help you to achieve your own personal goals. Most importantly this guide will hopefully give you the confidence to lead a healthy, more active lifestyle and maybe try something new. **Good luck!**

GEORGIE BULLEN

ParalympicsGB Goalball athlete

London 2012 Paralympic Games – 6th place

2009 Women's European Championships – Gold

"Having an impairment can often limit peoples' outlook, but through sport I've led a happier and healthier life and achieved more than I ever thought I could. I've discovered a strength and determination in myself I would never have expected. Whatever your limitations, sport can help you to break down the social and physical barriers that can often come with the isolation of an impairment, helping you to meet new people and feel more confident in yourself. The key is to try anything and everything until you find what sport, and what level of sport suits you. Despite being visually impaired I have tried my hand at Hockey, Netball, Skiing, Ice-skating, the list goes on. Being fit and healthy has more benefits than simply physical, as it gives you a drive and a sense of fulfilment that is hard to beat."

IS THIS SECTION FOR ME?

FIT FOR LIFE

- ✔ Do you want to get fitter and healthier?
- ✔ Do you currently do little physical activity and exercise?
- ✔ Do you have limited nutrition knowledge?
- ✔ Do you want to learn and/or recap the basics?

THIS SECTION IS DOWNLOADED

FIT FOR SPORT

- ✔ Do you already regularly (at least three to four times per week) take part in exercise and/or sport?
- ✔ Do you want to improve your performance?
- ✔ Do you want to tailor your nutrition to your sport?
- ✔ Do you want to understand how to use some psychological skills to improve?

CLICK HERE TO VIEW SECTION AND DOWNLOAD SEPARATELY

FIT FOR LIFE

From a health perspective regular exercise can help make everyday living easier and also more enjoyable. Other benefits include:

- Improved well-being and decreased stress
- Improved health (lower cholesterol and blood pressure, reduced risk of obesity, diabetes and heart disease)
- Weight management
- Improved ability to perform activities of daily life
- Increased fitness (better breathing, increased strength and endurance)
- Improved balance and co-ordination
- Improved range of movement and joint mobility
- Injury prevention (over-use injuries, pressure sores and postural issues)

It is well-known that if you want to be healthy, then physical activity and/or exercise should form part of your lifestyle.

PHYSICAL ACTIVITY = Any action or movement that requires you to contract your muscles.

EXERCISE = A planned and purposeful action from which we aim to improve our fitness levels and our health.

You may sometimes face potential barriers to exercise but remember that many activities can be adapted to suit your needs. Most importantly, it can be fun!

HOW TO OVERCOME BARRIERS TO EXERCISE

Taking part in some form of activity or sport is necessary for you to become physically fit.

Additionally, physical activity can help you become mentally fit. Exercise can help improve health and well-being by improving mood, reducing stress and decreasing depression. It can also help boost your self-esteem and give you confidence in other areas of life. To gain these psychological benefits you must maintain a regular exercise routine but this isn't always easy. As a disabled person you may face a number of barriers to physical activity which can make becoming and staying active a real challenge.

Here are a few of the common barriers and how you can try to overcome them:

"I really don't know where to start"

The most important thing is to find an activity that you enjoy doing so that you will keep doing it. Join a friend at the gym, try an exercise class or head to the park with your family; adding a social element can make it much more fun. Don't be afraid of trying new and unfamiliar activities as these can often surprise you and leave you wanting more. Find some like-minded people to exercise with in your area, you will help motivate each other. Also visit www.parasport.org.uk for information on what sports are available for disabled people and to help you find local sports clubs.

"I just don't have the time"

Many people live hectic lifestyles that are busy with both work and family commitments. Not having sufficient time to exercise is a genuine concern. Difficulties with travel can make your trip to an exercise venue annoyingly long or expensive and so it is important to consider where else you might be able to exercise. A long commute to your local gym is no longer needed if you can do a workout at your local park or even in your own home/garden. The amount of exercise you need to do to gain benefits is often overestimated too. As little as 30 minutes of moderate intensity activity a day, five times a week is enough to help you feel physically and mentally fit. Multiple bouts of at least 10 minutes are also just as good; how about before or after work and a short session during your lunch hour?

"My local facility isn't accessible"

Accessibility or travel to and from facilities is a common issue faced by disabled people. However, you do not necessarily need a gym or leisure centre to become more active. You can do lots of exercises with minimal equipment in many different environments such as in your home or at the park. However, if you do fancy the gym the Inclusive Fitness Initiative (IFI) has an application where you can find a local club that has staff trained to help disabled people. Having a fitness instructor guide you through various exercises will help you become familiar with the environment and will hopefully help build your confidence. Visit www.efds.co.uk/inclusive_fitness/ifi_gyms for more information.

"I feel too tired to exercise"

If this sounds like you then consider when it is that you are most tired. If it's in the evening after work, then try to exercise in the early morning or during your lunch break. If you feel most fatigued first thing in the morning simply plan to do your exercise later in the day. These simple steps are common sense but will help you get started. It is also worth considering that regular exercise can actually reduce fatigue and help you sleep better. After a few weeks of regular physical activity you should notice your energy levels improve.

"Because I've always been rubbish at exercise and sport"

You may have disliked PE at school because of an emphasis on competitive sport, the group atmosphere, due to a lack of choice or that age-old classic of being picked last. It may be hard to forget these feelings but remember that as an adult you can choose exactly what type of exercise and/or sport you do, who you do it with, when and also whether you do it for leisure or competitively; you are in control! Finding a type of exercise that you enjoy will hopefully prolong your involvement.

PHYSICAL ACTIVITY AND EXERCISE

In order to keep fit and active and to achieve some of the benefits mentioned earlier, you should include physical activity and exercise in your daily routine. There are very few activities that an individual with a VI can't do and little adaptation is needed for most. The key to getting active is to find activities/sports that you enjoy and feel comfortable doing, which will hopefully ensure that you continue to do them in the long-term.

The general guidelines for getting fit do not differ from those for sighted individuals however; this guide discusses specific topics, adaptations and areas of emphasis for individuals with a VI.

The main goals of Fit for Life are to improve function for daily living and to stop the onset of a variety of problems associated with inactivity. Your individual goals may be large or small and may include getting to a healthy weight, being able to jog around the park, the ability to play games with your kids, or you may want to take up something new to help you get fit and meet new people. Whatever you wish to achieve, getting to grips with the basics is a great place to start.

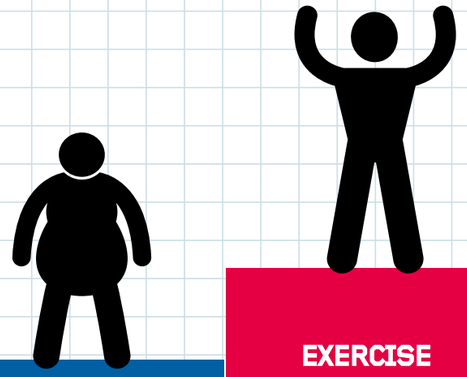


Figure 1. The effects of no exercise vs. the benefits of exercise.

General Guidelines

If you currently do very little physical activity or exercise, you should start by increasing everyday activities. This will help to improve your health, increase your energy output and therefore help weight management. Consider some of the following ideas:

- Gardening
- Cleaning and other household chores
- Washing the car
- DIY
- Wheel to the shops rather than getting in the car
- Pushing around a local park or trail
- Playing games with family members
- Dancing
- Consider volunteering for a local organisation, charity or sports club

Do what you can and take breaks when you need to. Once you feel ready you can consider progressing to some planned exercise sessions.

Organised Exercise

Warm-up

An effective warm-up is designed to prepare your body for exercise and is essential prior to any training.

- 5-10 minutes low to moderate intensity activity will raise your heart rate and increase your muscle temperature.
- You should gradually increase the intensity of activity to that of which you will be exercising.
- Try to involve the movements that you will use during the activity you are warming-up for.
- Movements that move through your full range of motion can be useful to prepare your body for the demands of exercise.

Main Workout

In the initial stages of your programme it is important that you choose an activity you find enjoyable. Do what you can and build on it until you can reach the recommended 30 minutes for moderate intensity exercise (you should be able to have a conversation) or 20 minutes for vigorous intensity exercise (you can't say more than a few words without pausing for breath).

The type of exercise you do may depend on the level of your VI but the duration and/or intensity should gradually increase as your fitness develops.

Cool-down

- 5-10 minutes gentle exercise/activities which gradually decrease large muscle group activity and help to aid the clearance of waste products.
- Stretching exercises for multiple joints/muscle groups.
- The cool-down is also a good time to reflect on your session.

The Main Components of Fitness

Fitness is comprised of many different elements but here we are going to focus on **Flexibility**, **Strength** and **Aerobic** fitness. As an individual with a VI you can gain the same health benefits and adaptations to exercise as sighted individuals through training. See page 13 for the recommendations on how long and hard your exercise session should be.

Flexibility

Flexibility is simply the range of motion you have around a joint. Take a gymnast for example, they are clearly very flexible because they are able to put their bodies into positions that many of us would not even attempt. The American College of Sports Medicine (ACSM, the largest sports medicine and exercise science organisation in the world, www.acsm.org) guidelines state that adults should try to do flexibility exercises at least two to three days per week to improve their range of motion.

Here are some tips to help with your flexibility:

- Stretching is most effective when the muscle is warm so always do some light to moderate aerobic activity.
- You should move into a stretch to the point of tightness or slight discomfort and then hold.
- During the warm-up, hold static stretches (once you are in the stretch position you do not move) for 10-30 seconds, or use dynamic stretches (stretching as you are moving without bouncing) that mimic the movements of the subsequent activity.
- During the cool-down, stretch all major muscle groups that were used in your workout and any smaller muscles that you may have targeted (20-30 seconds per stretch).
- If you struggle with your balance use the wall or a secure object to hold onto whilst stretching or alternatively, many stretches can be performed whilst sitting or lying on the floor.
- Regular stretching should also be performed on days you are not exercising to maintain a normal range of motion around your joints.
- To develop flexibility further it is worth holding stretches for at least 60 seconds or alternatively, repeat the stretch to accumulate this time.
- If you are unsure about the technique for any stretch, ask a qualified fitness professional for advice. Where necessary, if you feel comfortable, ask them to physically guide your limbs into the correct position whilst explaining the movement.

Strength Training

Strength training in the initial stages of a programme is defined as anything that challenges your body above its norm in terms of lifting or moving weight. Strength training does not have to take place in a gym; lifting a bag of sugar, tins, bottles or simply your own body weight can be classed as strength training and can be quite difficult depending on the weight, number of repetitions and exercise selection.

Strength exercises can be done in different ways:

- Some exercises can be performed using just your body weight such as squats, press-ups, the plank and tricep dips.
- Wrist or ankle weights increase the resistance during many exercises and they help to keep your exercising environment clear of clutter.
- Free weights such as dumbells, barbells, medicine balls, tins, bottles etc. come in various weights to allow you to perform a wide range of exercises.
- Elastic tubing (often called dyna bands, therabands or clini bands) are simply pieces of elastic which offer more resistance the greater you stretch them. These give you the freedom to mimic many of the movements that can be done in the gym and allow you to change the difficulty of the exercise by adjusting your hand position on the band rather than searching for different weights.

Perform exercises without any or with minimal weight when learning new techniques, or simply use your own body weight for exercises such as squats, lunges or press-ups. Once you have mastered the technique, choose an appropriate weight that allows you to complete a full set without stopping but you should also be able to maintain good technique throughout the entire set. In the gym, fixed resistance machines are safer if you are a beginner because the need to balance and stabilise your body during an unfamiliar movement pattern is reduced.

Visit www.efds.co.uk/inclusive_fitness to find a local inclusive fitness facility and take advantage of an induction and the knowledge of trained staff. A qualified fitness professional can provide feedback on your technique and help you to select the appropriate weight for each exercise.

Aerobic Training

Aerobic training is any activity that raises your heart rate and gets you out of breath for a sustained period of time. It trains the cardiovascular (heart, blood and blood vessels) and respiratory (lungs) systems to help reduce fatigue and improve endurance during activities of daily living. There are various forms of aerobic exercise such as walking, running, aerobics classes or playing a competitive sport that you can do either individually or with a guide/partner. See page 15 for more ideas.

> Not got enough time?

Evidence also suggests that you can accumulate the desired amount of cardiovascular training in multiple, smaller chunks of time such as 10 minute bouts of aerobic or resistance exercise. This is useful if you are starting to exercise for the first time or if you simply don't have big blocks of time to spare.

TABLE 1. Goals and Recommendations for Flexibility, Strength and Aerobic Training

Type of exercise	Goals	Intensity/frequency/duration
Flexibility • Stretching	• Prepare the body for exercise • Aid recovery • Help prevent injury	• Before and after aerobic or strength exercise or as a standalone session • At least two to three days per week
Strength • Weight machines/wrist weights/ dumbbells/therabands/medicine balls • Body weight exercises	• Improve strength • Ensure balance of all muscle groups	• Two to four sets of 8-12 repetitions for each exercise • At least two days per week
Aerobic • Aerobics • Cycling (tandem) • Sports e.g. Goalball, Football • Swimming • Walk/running	• Increase endurance • Maximise independence	• Three to five days per week • At least 30 minutes moderate (12-14 RPE *) or 20 minutes vigorous (15+ RPE *) per session

NOTE *RPE = Rating of Perceived exertion, which will be explained in more detail on page 28.

Safety Always Comes First

Please consider these safety points before starting your exercise programme:

1. Consult your doctor if you are considering starting an exercise programme for the very first time or if you experience any adverse consequences.
2. If possible consult a registered exercise professional and seek advice if you are unsure of the correct technique for any exercise or stretch.
3. If you are exercising in a new environment ask your coach, trainer, fitness instructor or training partner to verbally orient you to the training facilities and equipment. It is important that you ensure the area is safe and clear of any clutter to help prevent any potential accidents.

NOTE:
Quality is more important than quantity! More is not always better so exercise within your own limits and don't push yourself too soon if you are new to exercise.

What Type of Exercise Can I Do?

The most important thing is to find something that suits you and that you enjoy doing. There are always plenty of options and alternatives.

TABLE 2. Types of exercise suitable for Individuals with a VI.

Type of Exercise	Advantages	Disadvantages	Adaptations/Advice
Aerobics classes	Inexpensive. Can be performed at home or as part of an exercise class.		Therabands can be incorporated into the routine. Ask about public classes that can accommodate your needs.
Gym-based aerobic training equipment e.g. bike, cross trainer, step machine	Found in most gyms. No environmental influencers. Fixed machines require less balance.	You may have to pay to use these facilities.	You may need someone to help you set-up each piece of equipment to suit your body.
Circuit training	Can be divided into classic circuits and weight training. Can be performed almost anywhere. You can exercise with a partner so they can talk through the technique for each exercise.		Use a number of exercise stations and alternate between muscle groups. Use a set number of repetitions or a set time. Rest after each activity or when each circuit is complete. Ask the instructor to fully explain exercises prior to and during the class.
Rowing	Good all-round conditioning.	Back strain may result if technique is incorrect.	Ask an exercise professional to provide feedback on your technique and make corrections accordingly.
Running	Can be performed in a gym, on a track or outdoors.	You may prefer to run with a guide and you will therefore need to learn the technique.	If using a treadmill ensure you attach the emergency cord to your clothing. Handrails offer support for those with impaired balance. See section on guiding on page 29.
Sports e.g. Cricket, Goalball, Football	Good cross-training or specific training for a given sport. Competitive and social.	There are none, so give one a try and have some fun!	Use the Parasport website to find a local club to play your chosen sport. www.parasport.org.uk
Swimming	Good cross-training as the water supports your body weight.	It can be scary in the beginning but start slowly and you will soon gain confidence.	Use the lane barriers and/or a tapper to ensure you stay in lane and turn at the right time.
Tai Chi/yoga	Improves balance, posture, flexibility and breathing patterns. Inexpensive.		Ask the instructor to clearly describe movements. There are plenty of DVDs or books that you can buy so you can try some of these exercises in your own home first.

NUTRITION

Key Features of a Healthy Diet

Fruits and Vegetables...

Include plenty of colour and variety.

Carbohydrates...

Found in foods such as potatoes, pasta, rice, bread and breakfast cereals.

Fat...

Some unsaturated 'healthy' fat found in foods such as oily fish, olive oil and nuts should be included in your diet but try to avoid eating excess saturated fat in products such as cakes, pastries, fried and processed foods.

Protein...

Found in foods such as lean meat, fish, eggs or vegetarian alternatives.

Fluid...

Such as water, tea, squash, juice, milk and fruit will help maintain hydration, which is important for the day-to-day functioning of the body.

An important component of being Fit for Life is your nutrition. With such a wide variety of food products on the market and the increased availability of convenience foods, it is important to make sure we know how to eat a healthy, well-balanced diet.

Living as an individual with a VI does not change the guidelines on how to eat a healthy diet. You may simply need to think about a few extra issues from a practical point of view.

Calcium...

Rich food sources include milk, cheese and yoghurt.

The components of a healthy diet help provide the body with what it needs to fight infection, help prevent diseases such as heart disease, and to maintain your day-to-day health so you can get on with leading an active lifestyle. Now let's take a closer look at each component:

Carbohydrate foods are an important source of energy, vitamins and minerals, and should be included in any healthy diet. Quantities will vary according to how active you are e.g. more activity requires more energy and therefore more carbohydrate. Try opting for wholemeal versions where possible as they tend to have a filling effect and increase your fibre intake. Fibre is essential for a healthy bowel and to help prevent constipation or discomfort after eating. Other sources of fibre include vegetables, fresh (with the skin!) and dried fruit, beans, nuts and oats.

Fruits and Vegetables are good sources of fibre and provide a wide range of vitamins. They also contain "antioxidants," chemicals which will help fight infection and prevent disease. The ideal target is 5-a-day; one portion might be one medium fruit, one small plate of salad, one tablespoon of dried fruit, three tablespoons of cooked vegetables or a small glass of fruit juice. Include as wide a variety as possible and keep cooking time to a minimum to prevent vitamins being lost. Boil or microwave vegetables in minimal water or try steaming.

Protein is needed for growth and repair in the body. Opt for lean, low fat versions and use cooking methods that keep fat to a minimum such as grilling, poaching, boiling or steaming. Including some protein at each meal will help you meet the recommended two to three portions a day. Meat (red and white), fish, eggs, cheese, milk or vegetarian alternatives such as beans, lentils, tofu and Quorn are all good sources. Red meat can also help ensure an adequate iron intake but if you choose not to eat it, take care to eat other iron-rich foods.

Iron is important because it is used in the formation of haemoglobin, a part of the blood that carries oxygen around the body. Those at risk of low haemoglobin levels, also known as anaemia, include vegetarians, endurance athletes, teenagers and females. Foods containing iron include offal, fish such as pilchards, salmon and sardines, eggs, green leafy vegetables, nuts, pulses and breakfast cereals fortified with iron. The absorption of iron can be aided by eating foods containing vitamin C e.g. tomatoes, green leafy vegetables, peppers and citrus fruits at the same time as iron-rich foods, and can be hindered by drinking caffeinated drinks such as tea and coffee, so drink them after your meal instead.

Calcium is important for strong bones. In combination with weight-bearing exercise, avoiding smoking and excess alcohol consumption, calcium is vital in helping to prevent osteoporosis in later life. Taking enough calcium into the body from food is possible and aiming for three portions of calcium-rich foods a day will help ensure you meet your needs.

Table 3 highlights some calcium-rich foods. If you can't tolerate milk or dairy products, or have a family history of osteoporosis, you should take extra care to ensure your intake is sufficient and you may consider using a supplement if you struggle to meet your needs.

Vitamin D aids the absorption of calcium to support bone health. It is also an important vitamin to consider for immunity as it may enhance your ability to fight infection.

The main source of vitamin D is produced due to the action of the sun on your skin but small amounts can also be obtained from the diet from foods such as eggs, offal, oily fish and fortified margarines, juices or cereals. Supplementation is also an option during the winter months or for athletes that spend a lot of their time training indoors.

As a minimum aim to get 20 minutes sun exposure three times a week. Safe exposure to the sun is important so do not stay out long enough to get burnt.

Fat plays an important role in your diet, it provides you with essential fatty acids and the fat-soluble vitamins A, D, E and K. Aim to eat small amounts of unsaturated fat (polyunsaturated and monounsaturated) but reduce the amount of saturated fat in your diet.

- Saturated fat is found in foods of animal origin such as butter, lard, full fat milk, cream and the visible fat in meat. These can cause fatty deposits to build up in your arteries so opt for leaner or unsaturated versions if possible.
- Monounsaturated fat is found in olive and rapeseed oil, nuts, seeds and avocados. Olive oil can be used in cooking or as a salad dressing and is also used to make margarine.
- Polyunsaturated fat is further broken down into omega 6 and omega 3 varieties:

  i. Omega 6 fats (sunflower, corn and soya oils and margarines made from them) do not cause the arteries to clog up in the way that saturated fats do.

  ii. Omega 3 fats (oily fish such as sardines, pilchards, mackerel or kippers) do not produce fatty deposits in the arteries and are actually thought to protect the body from heart disease. The recommendation is that men, boys and women past child bearing age can eat up to four portions per week of oily fish. Women of child bearing age, including pregnant and breastfeeding women and girls can eat up to two portions per week.

- Don't forget that any high fat food is also high in calories and over-consumption will likely result in weight gain and potentially obesity, which in itself is a health risk, so keep an eye on your portion sizes.

Fluid intake is vital for health. All aspects of a healthy body rely on good hydration from brain function to good skin. Have a variety of drinks over the day such as fruit juices, squash, tea and coffee, but including some water is always a good idea. Don't forget that you get fluid from your food too. Most people need at least 1.5-2 litres of fluid a day, plus more to cope with exercise and heat.

Table 3. Calcium Content of Foods

Food	Quantity (one portion)	Amount of calcium (mg)
Semi skimmed milk	1/3 pt/200 ml	237
Skimmed milk	1/3 pt/200 ml	249
Soya milk	1/3 pt/200 ml	25
Calcium fortified soya milk	1/3 pt/200 ml	230
Yogurt	One pot/125 g	225
Cheddar cheese	30 g/1 oz matchbox sized piece	216
Cheese spread	25 g large triangle	105
Cottage cheese	One pot/110 g	82
Tinned salmon	100 g	95
Tinned sardines/pilchards with bones	100 g	460
Bread white or brown	Two slices/72 g	72
Baked beans	200 g – A small tin	100
Tofu steamed	100 g	500

> NOTE: Lower fat dairy foods contain the same amount of calcium as full fat versions.

Practical Tips

It is often suggested that when you start following a new, healthy diet you should try to cook homemade meals. Making your own meals and snacks means you know exactly what you are eating, with no hidden surprises and you can easily adjust the composition of your daily diet to suit your needs. However, as an individual with a VI you may find some preparation or cooking techniques difficult so follow some of the tips below to make cooking safer, simpler, healthier and more enjoyable:

- Consider buying talking devices such as timers and scales.
- Braille labels placed on equipment and canned/boxed foods may be useful.
- Being familiar with the kitchen layout and keeping it tidy will help prevent accidents.
- If you have some degree of vision ensure your kitchen is well lit and organised.
- Reduce knife use by using a food processor to chop, mix or blend ingredients.
- Dishes/chopping boards with suction cups that help prevent slipping can make the kitchen environment safer.
- Look out for quick and easy recipes e.g. stir-frys, salads, soups and pasta dishes.
- Cook meals in batches and freeze them in portions to reheat when you need a quick meal or if you don't have time to cook.
- A microwave can be useful for reheating meals and ready-made sauces, and for cooking vegetables or microwavable rice.
- Use pre-prepared foods e.g. chopped or frozen fruit/vegetables and ready-made sauces/meals. Be sure to consult the label (ask if necessary) as some ready-made meals can be high in fat, sugar and/or salt.

We understand that making changes to your diet can be challenging if you can't read food labels, recipes or menus easily. If you use a screen reader many of these can now be found online so make use of this facility where possible. Shopping for your groceries online can also be useful because you can compare ingredients and products at the click of a button rather than in store.

Weight Management

Maintaining a suitable weight is important for health and weight should be neither too high nor too low. Unfortunately the number of people who are overweight and obese is increasing worldwide. Both overall and abdominal obesity (round, apple-shaped figure) are associated with increased risk of adverse health outcomes, whereas having a greater fat-free mass/lean mass is associated with a lower risk of death due to all causes/diseases. Possible reductions in voluntary physical activity, a lack of structured exercise and the regular use of convenience foods can put some individuals at risk of overweight and obesity.

DO...
combine your healthy eating with physical activity/exercise.
This will help you to achieve and maintain your weight loss goals whilst also improving your health and reducing your risk of disease.

DON'T...
give in to the barriers
There are potential barriers to eating healthily or exercising but if you want to lose weight eating a good diet and exercising are the two key components you need to focus on.

DO...
follow a well-balanced diet.
The first step towards healthy eating is choosing real, fresh and unprocessed foods but you must also keep an eye on your portion sizes. Be realistic about your energy requirements, which will depend on your daily activity levels and the amount of exercise you do. In order to lose weight, it is suggested that you cause an energy deficit of ~500 calories a day to lose weight at a sensible rate of 0.5-1 kg (~1-2 lbs.) per week.

DO...
be patient. Consider weight loss in a sensible and measured way.

DON'T...
give up
If you run into problems, talk to a friend or relative. Check whether there are any local support sessions you can attend or you could try a slimming club, but check that it operates on the basis of healthy eating. Seek help from a registered dietitian or nutritionist if needed.

WEIGHT GAIN – When ENERGY IN is more than ENERGY OUT

WEIGHT BALANCE – When ENERGY OUT is the same as ENERGY IN

WEIGHT LOSS – When ENERGY IN is less than ENERGY OUT

DO...
consider portion sizes
if you are worried about your weight. Only cook/put on your plate/ask for the amount you need. Eat slowly and learn to listen to your body so that you know when you are full.

DON'T...
aim for quick losses
It may be encouraging to see the weight drop off but this is rarely maintained because it usually results in the body losing muscle rather than fat, and is not helpful to general health or activity.

What Else Might Help?

- Eat routinely (two to three meals per day). Try not to skip meals because this usually leads to overcompensation at the next meal.
- Nibbling between meals can add more calories to a day's food intake than you might think. Keep to low calorie drinks and snacks, with post-exercise snacks used as just that, whilst being realistic about the amount of energy you used during your session.
- Avoid putting too much on your plate. Be realistic about how much you need.
- Write a food diary to monitor your progress and find areas for improvement.
- Set goals and reward yourself when you achieve them. Try rewards such as a massage or a new item of clothing rather than calorie-laden treats like chocolate, cake or crisps.
- Weigh yourself about once a month to monitor progress. More frequent weigh-ins are not recommended due to daily fluctuations in weight.

Food Safety and Hygiene

If you travel or work abroad, or you are simply going on holiday, you can be exposed to a whole range of situations which could result in illness; poor food hygiene, sanitation problems, poor water quality, or inadequate hygiene standards of others in public places. No individual wants to miss their holiday, work or as an athlete, their training or a competition because of illness. It is therefore sensible to be aware of the risks and to take reasonable precautions to avoid problems.

Safety Tips

- Buy bottled water abroad if the tap water is suspect. Use this to clean your teeth and your fresh fruit and vegetables, and avoid ice cubes.
- When taking a shower, washing your face or having a shave do not let water enter your mouth. Take care in swimming pools.
- Keep your drinks bottle clean. Use water or squash bottles that can be thrown away and replaced frequently, or sterilise your drinks bottle regularly (using a sterilising solution) to prevent contamination.
- Salads, raw vegetables and fruit can be a source of food poisoning because the food is handled and not cooked. Peel fruit rather than eating the skin.
- High risk foods include seafood (e.g. prawns, cockle, mussels), rare meat, unpasteurised milk, soft-cooked eggs and barbequed meats, which can be undercooked in the middle.

Food Hygiene

Food hygiene is very important in the home and also when travelling abroad. Always try to follow some basic guidelines:

- Wash your hands before handling food and again after sneezing, coughing or using the toilet.
- Clean surfaces and floors regularly; food waste attracts insects and vermin.
- Cover any cuts with a waterproof plaster before handling food.
- Keep track of any food that you put in the fridge. Furry, mouldy food is unacceptable and it could contaminate other food.
- Keep raw meat at the bottom of the fridge so that it cannot drip blood onto other food.
- Check 'Best Before' or 'Use By' dates. Do not eat food that is past its date. Even if food is within its date do not eat it if it looks, smells or feels off.
- Transfer any left-over canned food into a covered container to be stored.

Diarrhoea and Sickness

This is most likely to happen as a result of food poisoning or an infection that has been picked up by touching communal objects such as door handles or toilet seats. Always wash your hands well after using the toilet. Alcohol-based gels can also be used after washing to reduce the risk of contamination. If you develop diarrhoea or sickness you must be careful not to become dehydrated.

VI and Diabetes

Individuals with diabetes are encouraged to follow a healthy, well-balanced diet containing plenty of variety. Being active is also important for well-being.

The information in this guide will help an individual with diabetes to do just this. However, diabetics will also need to apply some individual changes to their diet and treatment, particularly insulin users. It is vital to ensure the right balance of carbohydrate intake and insulin for each type of training. High-intensity exercise has a tendency to raise blood sugars and low-intensity exercise tends to lower blood sugars. The web site www.runsweet.com provides some excellent information but specialist help is usually needed from a medical team that is familiar with exercise as well as diabetes.

Those taking part in sports where a sports drink may be used will need to ensure that the use of such products is controlled and only used in a way that is compatible with blood sugar levels and treatment.

Any individual with impaired kidney function should take care when considering advice regarding protein intakes. Advice from the clinical care team should be sought.

This FIT FOR LIFE guide has hopefully taught you the basics about exercise and nutrition, and about how to lead a healthy, well-balanced and active lifestyle. If you have also chosen to take up a sport and you are now taking part in exercise at least three or four times per week, you may want to download our FIT FOR SPORT guide. This will help you tailor your training, nutrition and psychological skills to ultimately improve your performance. Good luck!

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About The Coca-Cola Foundation: Funder's of The Fit and Healthy Educational Resource

Since its inception, The Coca-Cola Foundation has awarded more than $500 million to support global sustainable community initiatives, including water stewardship, community recycling, active healthy living, and education. For more information about The Foundation, please go to **www.thecoca-colacompany.com/citizenship/foundation_coke.html**

email: phc@lboro.ac.uk
Find the online resources at: **www.lboro.ac.uk/phc-toolkit**

Useful links:

www.parasport.org.uk – Discover which sports you can play and where
www.paralympics.org.uk – Find out what's going on in the world of Paralympic sport
www.ukad.org.uk – Information on anti-doping issues for athletes
www.efds.co.uk/inclusive_fitness/ifi_gyms – Find your local accessible fitness facility
www.britishblindsport.org.uk – For more information on accessing British Blind and partially sighted sport

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