



MINISTRY OF
**HEALTH &
WELLNESS**

WELLNESS COORDINATORS CHECKLIST



**for Approved
Personal Trainers**



JAMAICA MOVES



PHYSICAL ACTIVITY GUIDE FOR WELLNESS COORDINATORS

First Edition



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Prepared by:
Charmaine Plummer

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Background

Jamaica's Vision 2030 National Development Plan for making "Jamaica, the place of choice to live, work, raise families and do business" is under threat from a public health crisis, the Non-Communicable Disease (NCD), epidemic. Seven (7) out of every ten (10) persons die from the four (4) major NCDs (cardiovascular disease, diabetes, chronic lower respiratory diseases).

Physical activity is body movement that allows the body to utilize energy. Regular physical activity plays a vital role as a protective and preventive factor for health and wellbeing and is critical in the management and reduction of non-communicable disease. It can reduce global mortality by at least 6%, reduce ischemic heart disease by 30%, diabetes by 27%, breast, and colon cancer 21-25% physical activity burns fat, helps to maintain a healthy weight and it reduces stress. Global Recommendation on Physical Activity for Health: World Health Organization (2010). It also contributes to the prevention of other health conditions such as overweight and obesity, improved mental health, delay in the onset of dementia (4) and improved overall quality of life.

According to Global Action Plan on Physical Activity 2018-2030, globally, physical inactivity was estimated to cost (USD) 54 billion in direct health care, in 2013, of which 57% was incurred by the public sector and an additional 14 billion was attributable to lost productivity (17). Worldwide, 23% of adults and 81% of adolescents (aged 11–17 years) do not meet the WHO global recommendations on physical activity for health¹ (6).

The Jamaica Health and Lifestyle, Survey III 2016-2017 showed eighty two percent (82%) of Jamaicans engaged in low physical activity, sixteen percent (16%) in

Background Cond..

moderate activity (minimum World Health Organization recommendations) and two (2%) high activity. This did not differ for age and sex. Fifty two (52%) had made no attempt to increase their physical activity level within the last year.

World Health Organization states that physical activity programme for staff lowers short term sick leave by 32%, lowers the cost of health care by 55% and improves productivity by 52%. A company, that provides the resources and programmes that promote increased physical activity will enable its staff to live healthier and longer. Investing in employees' health will help increase the wealth of the company as employees' health is directly related to the costs of sick leave and absenteeism. It is therefore a benefit to the company when employees are encouraged to live an active life while at work. A physical activity programme can also build positive rapport and enhances staff morale.

The workplace is an ideal setting to promote healthy lifestyle as the working population spend most of their waking hours at the work place. There are many opportunities in a workplace setting to encourage and facilitate healthy choices, provide treatment for those with health conditions, and tackle stigma and discrimination. The impact of these interventions have positive benefits throughout working life and beyond.

The Ministry of Health and Wellness (MoH&W) has always used health promotion to empower the public to be better able to do self-monitoring. It is done to ensure each person transfers the skills set and knowledge gained, into healthy lifestyle practices.

Physical inactivity and unhealthy eating are two of the causative risk factors that contribute to the rise of the NCDs.

Introduction

In April 2017, the Ministry of Health and Wellness launched its Jamaica Moves campaign, as part of a response to mitigate the growing NCDs epidemic. The campaign is a call to action for the Jamaican population to engage in healthy lifestyle behaviours with emphasis on healthy eating, physical activity and doing annual health checks. The campaign's creative and innovative repackaging of key messages and health initiatives has stimulated interest across the island in making healthier choices.

The overwhelmingly positive response to the campaign has resulted in a significant increase in the demand for resource persons, inclusive of personal trainers who have been highlighted in the Jamaica Moves events across the island.

Based on the numerous requests from various organizations to conduct physical activity presentations and workout sessions, the Ministry of Health and Wellness recognized the need to empower wellness coordinators to identify qualified personal trainers who can develop and implement successful physical activity programme for their organization.

As part of the Jamaica Moves Campaign, the Ministry of Health and Wellness will identify Personal Trainers, assess their competencies in exercise science and facilitate training in the areas of NCDs and Nutrition that will also empower the trainers with the Ministry's guidelines and policies.

GOAL



To promote increased physical activity in workplaces.

OBJECTIVE



To empower persons promoting workplace wellness to assess and facilitate the successful development and implementation of a physical activity programme as a resource guide.

PURPOSE



To outline key areas that are important for a personal trainer to adhere to at all times when developing physical activity programmes.

TARGET AUDIENCE



Managers, Wellness Coordinators and any other person in the organization promoting workplace wellness.

DESIGN OF MANUAL

The Guide is divided into three (3) main sections:

1. Physical Activity and Health
2. Physical Activity Assessments
3. Disease-Specific Exercise Considerations

SECTION I

PERSONAL TRAINERS

SCOPE OF WORK

Personal Trainers fall under the category of Exercise Science and have a general scope of practice that they must adhere to at all times. As Wellness Coordinators, it is critical that you employ personal trainers who stay in his/her specific scope of practice while employed to your organization. It is very important to note that Personal Trainers should work with a team of health care providers; they should always adhere to the guidelines of each discipline and not give advice or recommendations that contradict the client's healthcare provider. They should never provide services that are outside their scope of practice. Personal Trainers can help clients to develop and adhere to their fitness goals by encouraging and showing them how to utilize tools that are available and will help facilitate the process.

Example, they can show and encourage clients to incorporate the Jamaica's Food Based Dietary Guidelines in their daily meal planning. However, they must refer clients to nutritionist/dietitians for individualized meal plans.

The Ministry of Health and Wellness provides a basic guideline for personal trainer's core function in table 1 and their scope of work in table 2.

SECTION I



PHYSICAL ACTIVITY CHECK LIST

This checklist is to verify that the Personal Trainers employed to your organization adhere to the Ministry of Health and Wellness Guideline and Principles. Please provide feedback by filling out the form below and submit to the Ministry of Health and Wellness on a quarterly basis.

Please answer the questions below by indicating yes or no on the space provided.

Did the personal trainers do the following?

Yes / No

- | | | |
|---|--------------------------|--------------------------|
| 1. Conduct a Physical Activity Readiness Questionnaire (PARQ) for all employees who participate in the programme. | <input type="checkbox"/> | <input type="checkbox"/> |
| 2. Conduct a fitness assessment for all employees who participate in the programme. | <input type="checkbox"/> | <input type="checkbox"/> |
| 3. Demonstrate proper techniques when introducing new tasks. | <input type="checkbox"/> | <input type="checkbox"/> |
| 4. Communicate instructions clearly. | <input type="checkbox"/> | <input type="checkbox"/> |
| 5. Demonstrate simple routines participants can follow. | <input type="checkbox"/> | <input type="checkbox"/> |
| 6. Demonstrate simple activities that can be implemented in a variety of settings. | <input type="checkbox"/> | <input type="checkbox"/> |
| 7. Give instructions on how to incorporate physical activity in their daily routine. | <input type="checkbox"/> | <input type="checkbox"/> |
| 8. Discuss with clients their fitness status based on goals. | <input type="checkbox"/> | <input type="checkbox"/> |
| 9. Discuss with wellness coordinators the status of the programme. | <input type="checkbox"/> | <input type="checkbox"/> |
| 10. Record and store clients information in a safe location. | <input type="checkbox"/> | <input type="checkbox"/> |
| 11. Adhered to the Ministry of Health and Wellness Guidelines at all times. | <input type="checkbox"/> | <input type="checkbox"/> |

Table 1

Personal Trainers	Core Function
	Develop and implement safe and fun physical activity/exercise programmes that are appropriate for age, condition and fitness level.
	Conduct assessment history of clients before fitness test is done. This will help determine risk for Chronic Non-communicable Disease (NCDs) and identify contraindications for exercise.
	Conduct fitness assessment that appropriate based on clients health status/history, environment and lifestyle based on scientific research.
	Facilitate the process in developing, setting and achieving realistic lifestyle fitness goals.
	Develop physical activity/exercise programmes for individuals or groups.
	Teach and demonstrate correct techniques, methods and process of activities.
	Provide guidance and support that will empower individuals to participate lifelong fitness programme.
	Educate clients about the importance of physical activity and health and other health related topics that will aid in the facilitation of lifelong participation in recommended physical activity.
	Record and store client information in a safe and confidential location according to Ministry of Health and Wellness protocol.
	Conduct oneself in a professional manner at all times.
	Refer clients to relevant health care provider.
	Always be prepared to respond according to Ministry of Health and Wellness protocol in emergencies.

Table 2 cont.**Dos and Don'ts of Personal Trainers**

Personal Trainer Do Not	Personal Trainer Do	Appropriate Health Practitioners
Diagnose any medical condition	<ul style="list-style-type: none"> ● Liaise with other health care provider (a physician, physical therapist, registered dietitian, etc.) on clients condition on physical activity guidelines for planning and implementation of appropriate physical activity programme. ● Follow guidelines medical disorders to develop exercise programme. ● Assess for exercise limitations potential risk factors. ● Refer clients to appropriate health care provider. 	Doctor
Prescribe medication or supplement	<ul style="list-style-type: none"> ● Develop exercise programs based on guidelines. ● Refer clients to doctor or medical practitioner for an exercise prescription. 	Doctor, nurses practitioners
Prescribe diets	<ul style="list-style-type: none"> ● Provide clients with general information on healthy eating, according to the Jamaica Food Based Dietary Guidelines. ● Refer clients to dietitian or nutritionist for nutritional counseling and specific diet plan. 	Nutritionist/ Dietitians
Treat injury or disease	<ul style="list-style-type: none"> ● Refer clients to doctor, physiotherapist or medical practitioner for treatment. ● Develop exercise programme to help manage and control condition and improve overall health. ● Encourage clients follow physician or therapist advice. 	

Table 2 cont.

Dos and Don'ts of Personal Trainers

Personal Trainer Do Not	Personal Trainer Do	Appropriate Health Practitioners
Monitor progress of clients with medical condition	<ul style="list-style-type: none">● Document and report progress of clients to appropriate healthcare provider.● Adhere to all recommendations from health care provider (doctor/nurse practitioner, physio therapist, or dietitian/nutritionist).	Doctor, nurses practitioner, physio therapist, or dietitian/nutritionist
Rehabilitate	<ul style="list-style-type: none">● Develop exercise based on recommendation from health care provider (doctor/nurse practitioner, physio therapist, or dietitian/nutritionist).	Doctor, nurses, Physio Therapist
Counsel	<ul style="list-style-type: none">● Coach/facilitate and demonstrate according to needs of clients.● Provide clients with general information on healthy lifestyle.● Refer clients to relevant health care provider or qualified counselor/ therapist.	Doctor, nurses, Therapist
Work with patients	<ul style="list-style-type: none">● Work with clients.	Doctor, nurses



ETHICAL PRINCIPLES OF A PERSONAL TRAINER

Personal Trainers should be provide clients with the highest level of service that are guided by the following principles:

- Provide relevant safe and information according to needs of their clients.
- Provide clients with a safe environment that will accommodate safe and fun physical activity session.
- Treat all clients with respect and provide equal opportunity for all.
- Provide clients with relevant and practical information based on scientific research.
- Ensure that PR certification are current.
- Adhere to organization policies and protocol at all times.
- Ensure that clients information are stores in a safe location and maintain confidentiality of client information at all times.
- Always refer clients qualified health care professional based on needs identified/observed
- Establish and maintain clear professional boundaries

Relationship

between

Personal Trainer &

Healthcare Providers

Personal Trainer Main Goal is to help Client achieve desired fitness goal. In order for this to be achieved, they must work with a team of health care providers with the client at the centre of focus.

N.B

The goal of this diagram is to show the link how Personal Trainer work with a group of healthcare provider to provide the best service to the client that is why I included the arrows. I just need to be done in a more creative way than mine without losing the essence.

I noticed you used back the exact images I send you. You were supposed to identify ones that are similar but have a sharper look.



Personal Trainer



Nutritionist Dilatations



Doctor, Nurse Practitioners



Client



Psychologist Psychiatrist



Physio Therapist

**Alternative Healthcare Specialist
(licensed)**



SECTION II

PHYSICAL ACTIVITY AND HEALTH



For the health and safety of persons who will be participating in any structured physical activity programme, it is critical that the information outlined in this section is adhered to at all times.

The personal trainers must be able to clearly outline what is physical activity, its importance to health and demonstrate the proper techniques for maximum health benefits.



PHYSICAL

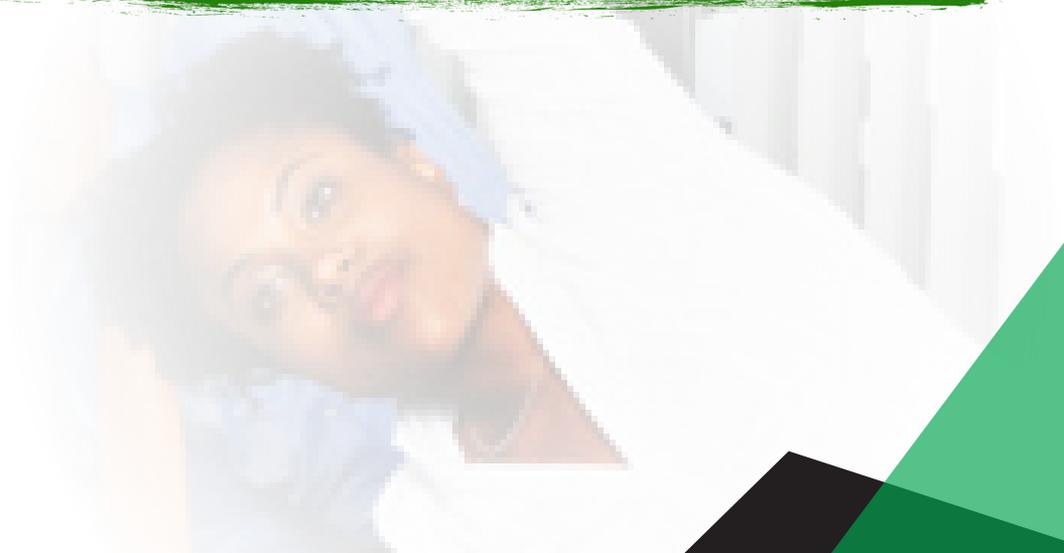
ACTIVITY

Physical Activity

Any movements that the skeletal muscles produce that result in energy expenditure. When referring to “Physical Activity” it is within the context of bodily movement that enhances health. There are two categories of bodily movement:

1. Baseline Physical Activity

2. Health-Enhancing Physical Activity.



Baseline PHYSICAL ACTIVITY

This is activity that is done on a daily basis to perform daily functions and referred to as low-intensity activities.

Some examples are: slow walking and lifting light objects (groceries).

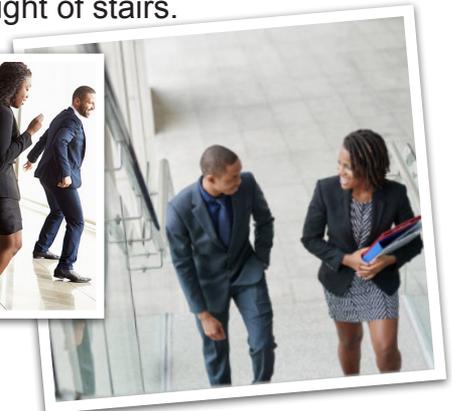
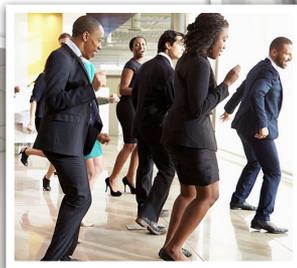


Persons who engage in this type of activity only, are categorized as inactive.

Health-Enhancing PHYSICAL ACTIVITY

This is moving beyond baseline activity and will result in health benefits.

Examples:
dancing, brisk walking, skipping,
lifting weights, climbing long flight of stairs.





EXERCISE

A set of activities that is planned, structured and done on a regular basis that allows the body to improve physical fitness.



FITNESS

The body's capacity to perform and adapt well to the stress and physical demands of life without becoming fatigued. The fitness level of a person is dependent on the following two factors:

- a) The genetic makeup of his/her body
- b) The ability to do activities that require flexibility, endurance and strength.

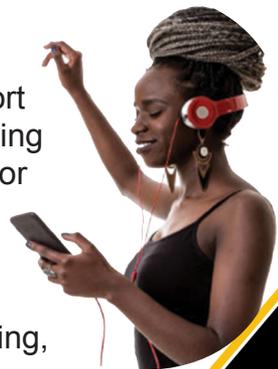
COMPONENTS OF FITNESS

Cardio-respiratory Endurance

The ability of the body's respiratory and circulatory systems to sustain and transport oxygen to skeletal muscles while undergoing prolonged physical activity at a moderate or vigorous pace.



Examples:
brisk walking, running,
dancing, aerobics,
swimming, etc.



Muscle Strength

The muscle's ability to generate and sustain maximum force in one effort.

Examples:

squats, push-ups, lunges, skipping, etc.



Muscular Endurance

The muscles' ability to constantly withstand pressure on a consistent basis over long periods of time.

Examples:

brisk walking, running, dancing, aerobics, swimming, gardening, heavy yard work, etc.



Flexibility

The ability of the joints to go through full range of motion exercises without becoming fatigued. e.g., stretching.



PHYSICAL ACTIVITY FOR MAXIMUM HEALTH BENEFITS



Exercising the FITTE WAY

FITTE =

Frequency, Intensity, Time, Type & Enjoyment

In order to get maximum health benefits from physical activity, it is very important they follow the FITTE Principles. It is also recommended that activities be done on an incline scale from: low to advance.



FREQUENCY



INTENSITY



TIME



TYPE



ENJOYMENT



FREQUENCY

This is the number of times physical activity is being done on a regular basis for the week:

- At least 3 days per week
- 5 or more days per week

It is recommended that physical activity be evenly spaced out throughout the week.

INTENSITY



This refers to the energy level at which the physical activity is carried out. There are three levels of intensity: light (daily routine activities), moderate (to brisk walking) and vigorous (running or jogging).

There are several methods an individual can use to measure physical activity intensity. The simplest example is the talk test.

Talk Test

This is a very simple method a person can use to determine the intensity level of his/her physical activity routine.



If a person is able to sing during physical activity, he/she is said to be doing light physical activity.



A person who is unable to sing during their physical activity routine is considered to be doing moderate intense activity.



If a person is out of breath and is too exhausted to carry on a conversation, he/she is said to be doing vigorous physical activity.



TIME

Physical Activity RECOMMENDATIONS



- 3-5 years at least 60 minutes of structured activities and several hours of free play daily
- 6-17 years at least 60 minutes of moderate to vigorous at least 5 days per week

This should do a combination of muscle and bone strengthening activities



Adults



At least 30 minutes, 5 days per week or an accumulation of 150 minutes at least 5 days per week to gain some health benefits.



At Least 60 minutes, 5 days per week or an accumulation of 300 minutes at least 5 days per week if you want to lose weight.



At least 60-90 minutes or an accumulation of 300-450 minutes at least 5 days per week if you are obese and want to lose and maintain weight

There are a number of ways one can accumulate the recommended amount of physical activity each day/week.

Example: A 30 minute physical activity session can be done in three, 10-minute bouts throughout the day. In order for this to be effective, each 10 minute bout, must be done continuously each time. Choose a method that best fits into your daily routine that you can achieve.

ADULTS 65 YEARS AND ABOVE:

➤ Should do at least 30 minutes of moderate-intensity aerobic activity five days per week or do at least 25 minutes of vigorous-intensity aerobic physical activity at least three days per week.

➤ Aerobic activity should be performed in bouts of at least 10 minutes duration.

➤ For additional health benefits, activity should be done at moderate- intensity at 60 minutes five days per week, or engage in 30 minutes of vigorous- intensity aerobic physical activity five days per week this can be a combination of moderate and vigorous intensity activity.



MUSCLE-STRENGTHENING

ACTIVITY

(resistant training)

Muscle strengthening is the muscle's ability to generate and sustain maximum force in one effort. Activities are usually done multiple times for specific muscle groups. This type of activity can only be maintained for a short period as they involve heavy objects.

For example:

weight lifting. This type of activity can also be done using the individual's body weight and resistance elastic bands.



BONE-STRENGTHENING

ACTIVITY

Activities that produce an impact or tautness force on the bones that support growth and strength.

Examples:

brisk walking, weight lifting, jumping jacks, bounding, etc.





TYPE

Physical Activity Recommendations for Health Benefits vs. Weight Loss

Exercise is categorized into two main areas: Aerobic and anaerobic exercises. They both provide health-related benefits and are both vital components of fitness.

Aerobic Exercise

Aerobic exercise is more efficient for the heart and lungs as it helps to control blood sugar and pressure levels as well as promote weight loss. During aerobic exercise, oxygen is retained in the tissues. This allows the body to burn calories that is stored in the form of fat to produce the energy that is needed to carry out the activity.

Examples: brisk walking, jogging, swimming, washing the car, gardening, dancing, skipping, football, aerobics, mowing the lawn etc.

Anaerobic Exercise

During anaerobic activity, the body is without oxygen, therefore the body fails to breakdown stored body fat for energy that is needed to carry out the activity. Anaerobic exercise is more effective at toning muscles, which will increase lean muscle tissue that will enhance the body's ability to burn more calories when resting. These are the more explosive activities such as power lifting, sprinting, tennis, basketball explosive jumping etc.





Choose Activities you enjoy

When designing a physical activity programme, one of the most important components is the enjoyment. In order to get full compliance, it is imperative that clients are engaged in activities they enjoy.



SECTION II



PHYSICAL

ACTIVITY

READINESS

QUESTIONNAIRE

Physical inactivity is listed as the fourth leading cause of global mortality. With this in mind, persons are encouraged to be more active in order to live more healthily. Whilst it is usually safe for persons to become more physically active, it is important that persons experiencing certain conditions check with their physicians before they start any form of physical activity programme.



PARQ TEST

(Physical Activity Readiness Questionnaire)

YES

NO

Has your doctor ever said that you have a heart condition and that you should only do physical activity recommended by a doctor?

Do you feel pain in your chest when you do physical activity?

In the past month, have you had chest pain when you were not doing physical activity?

Do you lose your balance because of dizziness or do you ever lose consciousness?

Do you have a bone or joint problem that could be made worse by a change in your physical activity?

Is your doctor currently prescribing drugs (for example, water pills) for your blood pressure or heart condition?

Do you know of any other reason why you should not do physical activity?

If you are planning to start a physical activity programme, here is a list of questions you should answer before you start and these questions will help to determine how safe it is for you.

The PAR-Q is for the age group, 15 to 69, and will determine if you should check with your doctor before you start exercising. If you are over 69 years of age, and you are not used to being very active, check with your doctor. Common sense is your best guide in answering these questions.

Read the questions carefully and answer each one honestly.

If you answered YES:

If you answered “yes” to one or more questions, talk with your doctor before you start becoming more active. Your doctor will advise you on what type of activity is best for you to participate in. It is very important that you follow his/her advice.

If you answered NO:

If you honestly answered no to all the questions, you can be reasonably sure that you can start becoming much more physically active. Make sure you start slowly and gradually increase your activity load.

Things Change:

Although you answered “no” to all questions, if you are feeling sick with a cold or fever or if you are pregnant, discuss with your doctor before becoming more active. You might need to alter your physical activity programme.

NOTE:

If the PAR-Q is being given to a person before he or she participates in a physical activity programme or a fitness appraisal, this section may be used for a legal or administrative purposes.

I have read, understood and completed this questionnaire. Any question I had was answered to my full satisfaction.

NAME _____

DATE _____

SIGNATURE OF PARENT _____

OR GUARDIAN (for participants under the age of minority)

WITNESS _____

Make sure you get approval from your doctor before starting an exercise program. Your doctor will determine the level at which one should start exercising. Discuss with your doctor what types of exercise might be appropriate for you.

Complications of diabetes such as severe eye disease and nerve damage may make some forms of exercise dangerous. Your doctor may also schedule a test to see how your heart responds to exercise.

References:
PAR-Q and You. Canadian Society for Exercise Physiology, Revised 1994. **Physical Activity Readiness Questionnaire**, British Columbia Ministry of Health Department of National Health and Welfare, Canada, revised 1992. (Promoting Physical Activity A Guide for Community Action pa 34)

SECTION III

ADMINISTRATION OF FITNESS TEST

All Personal Trainers must select and administer one of the several clinical fitness tests from an accredited institution before engaging anyone in a structured Physical Activity Programme.

An example of a simple fitness test is provided.

- 1 Body Composition:**
Body Mass Index (BMI).
- 2 Aerobic Capacity:**
One-Mile Run or Walk Test.
- 3 Abdominal Strength and Endurance:**
Sit-Up.
- 4 Upper Body Strength and Endurance:**
Curl-Up, Push-Up, Pull-Up.
- 5 Strength and Flexibility:**
Sit and Reach, Shoulder Stretch.



Fitness Test

Name: _____

Age _____ Height _____ Weight _____ lbs.

Sex: M F

Contact # _____

Fitness Area	1st Result	Goals	2nd Result	Goals	3rd Result	Goals achieved? Why not?
BMI test						
Resting H/R bpm						
Body fat test						
Push up Test (60 sec)						
Plank (60 sec)						
Squat (60 sec)						
Step-up (60 sec)						
Sit and Reach						
Twist & turn Test						
1 mile run						

This fitness test serves as a basic guide in testing cardiovascular endurance, muscular endurance, muscle strength and flexibility. The fitness is not limited to the above listed activities, and can be administered at various intervals to check your progress or effectiveness of your training programme. It is recommended that you take a fitness test before you start any training programme, in order to determine the area(s) of focus.

SECTION IV

PHYSICAL ACTIVITY AND SPECIAL CONDITIONS

It is very critical that persons with medical conditions be properly assessed so that the correct physical activities can be prescribed for them based on their specific condition. Physical activity can have positive or negative effects on the body based on how it is administered. Below are some ideas of physical activities for specific condition.



TABLE 1: Physical Activity and Arthritis and Osteoporosis



Dos	Don'ts
<p>Emphasis should be on improving functionality using cross-training example: sitting and standing and stair climbing, walking short distances.</p>	<p>Don't do morning exercise if joints are stiff, overstretching vigorous, repetitive exercises (joints are usually weak and unstable).</p>
<p>Start with low-intensity activity daily, gradually increase duration. Repeat activities in short bouts.</p>	<p>Exercise when joints flare-up.</p>
<p>Use pain free range of motion (flexibility) activities to exercise affected joints.</p>	<p>Clients should not exercise if they have display: unusual fatigue, increased weakness, swelling or pain one hour after exercise.</p>
<p>Progressive Resistant Training (PRT) should be done with patient's pain threshold as the guide. Start small amount (2-3) repetitions and work up to 10 to 12 repetitions based on client's ability.</p>	
<p>Aerobics activities should be brief 10 minutes segments, adding five minutes per session until 30 minutes is reached (walking, jogging, cycling, and swimming).</p>	<p>Clients should not be engaged in high intense anaerobic activities. Example: jumping, explosive weight training, sprinting).</p>

TABLE 2: Physical Activity and Peripheral Arterial Disease



Dos	Don'ts
<p>Ascertain client's medical record before they are engaged in any form of structured physical activity session or programme.</p> <p>Clients with peripheral arterial disease are at a high risk of cardiovascular disease.</p>	<p>Never engage clients in any workout session unless you know the result of their exercise stress test. Their muscles may be extremely deconditioned (underuse or weak).</p>

TABLE 3: Physical Activity and Obesity



Dos	Don'ts
<p>Clients should be encouraged to focus on daily activities that use large muscle groups.</p> <p>To prevent injuries and avoid demotivation, aerobic activities should be maintained at or below usual recommendations and the duration modified based on fitness level.</p>	<p>Clients should not participate in activities until they are over exhausted for extended periods. Do not allow clients to use equipment if they need modifications to facilitate weight. Example: treadmills have weight limits and cycle or rowing seats may be too small (free weights is recommended instead of weight machines).</p>

TABLE 3: Physical Activity and Obesity Cond...



<p>Patients should exercise at least 60 minutes, five to seven days per week.</p>	<p>Exercise when joints flare-up. Do not push clients beyond the recommendation if they are unable to meet it at the beginning of the programme.</p>
<p>Because risk of hyperthermia during exercise is increased in patients who are obese, hydration and proper attire should be emphasized at all times.</p>	<p>Never tell clients that sweating is an indication of how hard they are working. Avoid working out during the hottest time of the day.</p>
<p>Based on fitness level, clients should start out slowly and gradually increase intensity levels.</p>	<p>Clients do not need to be engaged in a vigorous programme if moderate activities such as walking are preferred and will promote compliance.</p>
<p>Aerobic activities and Progressive Resistive Training should be stressed.</p>	<p>Clients should not be engaged in explosive movements and high-impact activities (e.g., jumping, bounding, jogging) or dynamic abdominal exercise with excessive trunk flexion and twisting (e.g., sit-ups, pull-ups, bending while picking up objects).</p>
<p>A Physical exercise programme should be based on the client's fitness level status.</p>	<p>Do not engage clients who complain of severe pain. They should consult with their doctor before engraining or continuing with their exercise programme.</p>

TABLE 4: Physical Activity and Pulmonary Disease



Dos	Don'ts
<p>The recommendation should be adhered to, however clients with limited functional capacity may benefit most from daily exercise. Activities should be done intermittently in bouts of 10 minutes per session and gradually progress to 20 to 30 minutes continuously.</p>	<p>Do not push clients beyond what is recommended by their doctors.</p>
<p>Clients should be monitored throughout each initial workout session.</p>	<p>Trainers should always listen to their client and modifications should be made in response to symptoms experienced.</p>
<p>Walking is strongly recommended; stationary bicycling may be an alternative. Progressive Resistive Training should be focused on upper extremity muscles.</p>	<p>Clients should not be engaged in explosive movements and high-impact activities (e.g., jumping, bounding, sprinting, and explosive weights).</p>

TABLE 5: **Physical Activity and Hypertension**



Dos	Don'ts
Focus on aerobic activities that use large muscle groups.	Clients should not be engaged in anaerobic activities (e.g., jumping, bounding, sprinting, and explosive weights).
Ensure that clients follow proper form and breathing techniques to prevent Valsalva maneuver (this happens when one tries with force to exhale with the windpipe closed, impeding the return of venous blood to the heart).	Do not leave clients unattended when engaging them in an activity for the first time. Clients should be able to fully demonstrate correct techniques several times before they are left on their own with any supervision.
Always know your clients health condition. Beta blockers may attenuate heart rate response and reduce exercise capacity, and other medications may impair thermoregulation.	Do not end a physical activity routine without a cool down segment. This will help to prevent hypotension (abnormally low blood pressure).

TABLE 6: Physical Activity and Diabetes



The goal is to expend at least 3000 kcal per week (equivalent walking 10 miles). If clients intend to lose weight, aim for more than 2,000 kcal per week. Focus on aerobic activities at low to moderate intensity that use large muscle groups. Example brisk walking, swimming, and jogging.

Do not engage clients in intense activities this may cause an acute hyperglycemic effect; high intensity activities may cause postexercise hypoglycemia, especially in patients taking insulin or oral hypoglycemic agents.

The recommended intensity should include lower resistant activities that uses major muscle groups. Focus should be on proper form and breathing to prevent injury to the heart.

Do not engage clients with diabetes in an exercise programme unless they undergo a medical assessment, they may have various conditions that will reduce their exercise capacity.

Before beginning an exercise program, patients should undergo medical evaluation to assess cardiovascular, nervous, renal, and visual systems and the risk of diabetic complications.

Peripheral neuropathy may be associated with gait and balance abnormalities. Do not engage clients in excessive weight bearing activities. Do not allow clients to participate in activities without wearing the proper gear.

Stick to recommended intensity level

Do not leave clients unattended during workouts, monitor closely and assess their exertion. Monitor patient for heart rate and blood pressure response to exercise, thermoregulation, signs of silent ischemia, and postexercise plasma glucose levels.

Ensure that clients are properly hydrated throughout the workout sessions at all times.

Polyuria (excessive peeing) may contribute to dehydration and compromised thermoregulation. If you suspect dehydration stop workout session immediately.

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