

A Mindful Heart: Skills Based Stress Management for Primary Care



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Introduction to Group Manual

Hypertension (or high blood pressure) is a common and reversible condition that is a risk factor for cardiovascular disease (CVD) and affects approximately 30% of the general United States (U.S.) population (MacGregor & He, 2005; “Number of Americans,” 2004). Hypertension can also lead to myocardial infarctions (MIs) and ultimately the development of coronary heart disease (CHD), which is the number one cause of mortality of men and women in the United States (Center for Disease Control and Prevention, 2009). Because of the significant prevalence of this disease, it

is important to treat this condition in primary care, also because other medical conditions are related to CHD (e.g., diabetes, obesity; Haas, 2004). There are numerous causes of CHD (e.g., biological) and many of the causes are related to psychological and lifestyle factors. This introduction will provide the following: an overview of coronary heart disease, psychosocial and lifestyle (behavioral) risk factors that can be modified, evidenced-based group treatment approaches, and an overview of the group intervention for the primary care setting.

Coronary Heart Disease and Its Risk Factors

Coronary heart disease can be described as the development of atherosclerosis (the development of fatty deposits in the coronary arteries) over time (Schobitz, Bauer, & Schobitz, 2009). Throughout the lifespan, fatty deposits can progressively narrow the coronary arteries which decrease blood flow to the heart. When this occurs, a decreased amount of oxygen and nutrients reach the heart and can lead to mild chest pain (also known as angina). As the fatty deposits continue to progress, it can ultimately lead to severely decreased blood flow and oxygen to the heart muscle. When an MI occurs, an occlusion (complete blockage) of the artery is caused when a piece of the fatty deposit tears off and in order to heal itself, platelets accumulate in the lumen (space in the vessel wall), causing the occlusion to progress. As this process takes place, the heart is being deprived of blood and oxygen leading to an MI (tissue death). When heart damage is present, the following cardiac enzymes will be present in the blood and is evidence that an MI has

occurred: troponin, myoglobin, and creatinine (Schobitz, Bauer, & Schobitz).

There are many modifiable and unmodifiable risk factors associated with CHD (Schobitz, Bauer, & Schobitz, 2009). The unmodifiable risk factors include age, gender, and family history. The risk factors that can be altered through behavioral modification include: hypertension, high cholesterol, cigarette smoking, physical inactivity, and obesity. Several psychosocial risk factors have also been identified. These include: stress, experiencing negative emotions, anger, and hostility. Although there are behavioral interventions to increase factors such as physical activity and decrease factors such as cigarette smoking, the psychosocial interventions for heart patients aim for stress management. Discussed next will be research findings that serve as the rationale for implementing stress management approaches in the treatment of the psychosocial factors that contribute to CHD (Haas, 2004).

Intervention Approaches

Many behavioral interventions have been recommended to treat CHD (Haas, 2004). Although behavioral approaches are important, a discussion on these interventions will only be briefly discussed because it is beyond the scope of this paper. The treatment approaches that will be discussed concern psychosocial interventions, more specifically stress management. This type of psychosocial intervention has reduced the rate of cardiac events by over 40% (Haas). Group

interventions that have been found to be effective for managing stress and reducing hypertension in heart patients include patient education, arousal reduction (e.g., relaxation training), cognitive restructuring of maladaptive thought patterns, monitoring Type A behavior (hostility reduction interventions), and behavioral skills training (e.g., coping strategies, problem solving, communication training; Dusseldorp, van Elderen, Maes, Meulman, & Kraaij, 1999; as cited in Haas).

Group Format

The initial clinical trial for CVD interventions, Lifestyle Heart Trial, examined the short-term effectiveness of lifestyle changes on reducing the modifiable risk factors for CHD (Ornish et al., 1983; as cited in Billings, Scherwitz, Sullivan, Sparler, & Ornish, 1996). This trial (as well as other clinical trials) was more comprehensive and included components such as exercise, stress management techniques, nutrition, and group support. The results indicated that the heart patients were able to maintain the behavioral changes for four years after the completion of the program. Physiological changes were also observed in the patients and were more prominent after the first year of the completion of the intervention. The

frequency of angina decreased and a decrease in coronary atherosclerosis was observed as well. Of all the components examined in this trial, the group component was seen as critical. Patients were able to learn from the other group member's experiences as well as build communication skills that focus on the appropriate expression of feelings (CHD patients tend to use the emotions of anger, frustration, and hostility more often than "softer" feelings such as patience which could increase vulnerability). It is recommended that clinicians use a group format when conducting interventions for heart patients due to its ability to enrich patient experiences and aid in maintaining behavioral changes.

Patient Education

An additional goal in stress management interventions includes the development of knowledge. Cardiovascular disease is associated with well-known risk factors such as nutrition and physical inactivity but patients may be unaware of other factors such as emotional characteristics (e.g., depression, anger) and their influence on the

development of CVD (Burell, 1996). Before lifestyle and behavioral changes can be implemented, it is important for patients to be educated on the disease process, the course of the disease, and the risk factors involved. Patient education is important for treatment adherence so in order to help patients initiate and maintain behavior

change, combining education along with skills training can help patients adapt the new information to their daily lives.

An example of an intervention with the patient education component was the New Life Trial, a secondary prevention program with an aim of altering coronary-prone behavior in postcoronary artery bypass graft (CABG) patients (Burell, 1996). The program consisted of 17 sessions lasting three hours per session. Each session occurred every third week over the course of one year. Each treatment group had approximately 5-9 patients with both males and females in each group. The New Life Trial consisted of six components: developing knowledge about CHD, improving self-awareness, acquiring new

Relaxation Techniques

Because of the relationship between stress and CVD, it is important that stress management interventions have a relaxation component (Friedman, Myers, Krass, & Benson, 1996). These components include diaphragmatic breathing, progressive muscle relaxation, and meditation techniques. Incorporating education when presenting relaxation and meditation techniques can help patients recognize their (emotional and cognitive) triggers and cues of physical arousal and reduce sympathetic nervous system arousal (which is related cardiovascular reactivity and the development of CVD). Olivo, Dodson-Lavelle, Wren, Fang, and Oz (2009) examined the effectiveness of a brief meditation-based stress management program for patients diagnosed with or at risk for CHD in an acute care setting (commuter hospital). This pilot study adapted the 8-week Mindfulness-Based Stress Reduction (MBSR) program developed by Jon Kabat-Zinn. The MBSR

behavioral skills, identifying and altering rigid cognitive patterns, examining spiritual issues, and using group social support. The program relied heavily on the use of homework assignments and self-monitoring thoughts and behaviors. The results indicated that 5-6.5 years after CABG surgery, there was a significant difference in CVD mortality rates, the number of MIs, reoperation, and angioplasty between patients in the treatment group versus the control group. The treatment group also exhibited reductions in self-rated TAB patterns as well as Beck Depression Inventory scores. The project demonstrated effectiveness at reducing recurrent cardiac events and that these changes can be maintained over time.

program can provide "...systematic mindfulness meditation training to a population with a wide range of chronic medical and stress-related disorders" (p. 515). To date, there is only one other study that examined the effectiveness of improving psychosocial outcomes of MBSR in cardiac patients and significance was found in the reduction of anxiety (Tacon, McComb, Caldera, & Randolph, 2003; as cited in Olivo et al.). In the current study, the group format was converted to a 4-week program to increase the feasibility of implementing a brief program. In addition to receiving training in mindfulness meditation and applying it to daily living, the following three components were addressed in the program: guided sitting meditation, body scan meditation, and Hatha yoga.

At the completion of the intervention, the results found that the patients felt that the program was feasible and that the length of the program was sufficient. The post-test

results found reductions in perceived stress and depression scores. The results show that Meditation-Based Stress Management can impact psychosocial factors and the progression of CHD. Rainforth et al. (2007) found similar results in a systematic review and meta-analysis in stress reduction programs in patients with elevated blood pressure. The goals of the stress reduction programs addressed in the systematic review aimed to "...reduce the effects of stress by reducing physiologic arousal and restoring autonomic balance, thereby reducing blood pressure" (p. 521). A meta-analysis was completed comparing 17 randomized control trials with 23 treatment comparisons in order to assess blood pressure (BP) changes. The following treatment categories were assessed in the systematic review: simple

Cognitive Restructuring

One of the many important skills in stress management interventions is identifying and altering maladaptive thought patterns. Cognitive-behavioral therapy and the social learning theory can aid in changing thoughts and beliefs in order to decrease coronary-prone behavior (Powell, 1996). Although traditional cognitive restructuring exercises can be effective, an intervention that can facilitate this process is known as the "Hook," which targets "...chronic emotional reactivity to minor, unexpected stressors" (p. 314). Because emotional reactivity (e.g., anger, impatience) is a key factor in coronary-prone behavior, this intervention is geared towards heart patients. The beliefs that underlie this intervention include pure environmental determinism and the malleability of the environment. In pure environmental determinism, the patient believes that other people or external situations are the cause of the patient's stress. In the second belief, the patient believes that they can control all aspects of

biofeedback, relaxation-assisted biofeedback, progressive muscle relaxation, Transcendental Meditation (TM), and stress management combined with relaxation. It was found that most of the results for the interventions were not significant in lowering BP in hypertensive patients. The results did indicate that the TM program significantly reduced systolic and diastolic BP. Because of these results, it is important to note that stress reduction programs are not homogeneous in their results due to the differences in the techniques and approaches that are used. It is also recommended to add a TM component to stress management programs for heart patients due to its ability to promote homeostasis and modulate the neuroendocrine and physiological mechanisms associated with stress.

their external environment. In other words, when a stressor occurs, the patient first blames someone (or something else) for the stressor and in order to correct the situation, the patient attempts to change the external object or situation.

In order to alter this process, the Hook intervention aims to replace the patient's faulty belief or attitude with an alternative belief that is less prone to emotional reactive responses such as anger or irritability (Powell, 1996). In the intervention, the patient is presented with the following three components (progressively): understanding that they can remain in control of a situation by changing their cognitions, understanding what their "hook" is (i.e., a stressor that causes irritation), and providing patients with a cognitive strategy in order to alter their response to the stressor. In order to reinforce the hook metaphor, patients can be given an index with the figure on it in order to remind them watch for "hooks" in their

daily lives (e.g., the figure of a fish in water with hooks around it). In addition, the card can be used by other group members during the session and when they recognize that another member has been “hooked,” a card can be given to that member in order to serve as a reminder. An additional goal of

this intervention is to “...expand the coping repertoire of the patient” (p. 325). Once this takes place, patients will be able to reduce the frequency of experiencing negative emotions which in turn, can reduce the risk of future cardiac events.

Type A and Type D vs. Type B Behavior Change

In addition to the group format, providing knowledge to the patient, and engaging in cognitive restructuring, it is important to examine the role of the Type A Behavior Pattern (TABP) and the Type D Behavior Pattern (TDBP) recurrence (and occurrence) of cardiac events. The skills developed in cognitive restructuring can aid the patient in altering TABPs. Rosenman, Swan, and, Carmelli (1988; as cited in Bracke & Thoresen, 1996) describe the TABP as the following:

- Intense, sustained drive to achieve self-selected but often poorly defined goals;
- Profound eagerness to compete and need to “win;”
- Persistent desire for recognition and advancement;
- Continuous involvement in multiple and diverse activities under time constraints;
- Habitual tendency to increase the rate of doing most physical and mental activities;
- Extreme mental and physical alertness;
- Pervasive aggressive and hostile feelings (p. 257).

A significant early study was conducted by the Western Collaborative Group Study and the following risk factors were significantly elevated in both men and women: serum

cholesterol, BP, smoking, and diabetes. The TABP was also shown to be an independent risk factor for CHD.

In order to examine TABP, the Recurrent Coronary Prevention Project (RCPP) incorporated Type A counseling which took place over 28 sessions at 90 minutes per session over the course of a year and also used a small-group format (e.g., 10-12 participants; Bracke & Thoresen, 1996). Monthly sessions were then completed for approximately 3.5 years totally 62 sessions for the entire program. The primary goal of RCPP was to “...help post-MI participants gain a better understanding of how and why TABP may impact them physically, socially, and emotionally at work, at home, and in the community and, subsequently, to reduce TAB” (p. 265). When targeting TABP, the goal is to be less Type A through the use of relaxation and cognitive-behavioral exercises in order to gain Type B qualities (e.g., patience, empathy). The results of the study showed a 40% difference in the number of cardiac events between the Type A counseling group (7.2% recurrence rate) and the cardiac counseling group (control; 13% recurrence rate). After a four year follow-up, significant differences were found between both treatment groups as well as reduced levels of TABPs.

TDBP refers to the personality traits of negative affectivity and social inhibition (Mols & Denollet, 2010). Negative

affectivity is defined as a tendency to exhibit negative emotions and social inhibition is defined as refraining from the expression of emotion due to a fear of rejection. It has been found that between 27% and 31% of CVD patients exhibit TDBP and this behavior pattern is also an independent predictor of MIs, poor health status, and increased mortality in heart patients (Pederson, Theuns, Muskens-Heemskerk, Erdman, & Jordaens, 2007). To date, no intervention trial has targeted TDBP but smaller trials with CVD patients have found that in addition to cardiac rehabilitation, psychosocial interventions such as cognitive behavioral therapy are needed (Mols & Denollet, 2010; Pederson et al., 2007).

Summary

Although the group interventions discussed were found to be effective, the treatments were time intensive. Some interventions were short term (e.g., one month) but the time commitment was 2-3 hours daily. In addition, the interventions were conducted in cardiology departments in hospitals and medical centers rather than in ambulatory care settings (specifically primary care). It would be of importance for future studies to adapt effective stress management programs to primary care so outcome data can be collected to confirm effectiveness in this setting. The following stress management program that will be discussed in the next section applies the principles from evidenced-based stress management programs for patients with cardiovascular problems and adapts them to the primary care setting.

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The purpose of examining CVD risk factors are because currently, CVD is the leading cause of death in the United States and many of the risk factors are modifiable. The target audience for this program will be adults (18 years and older) who meet the following criteria: have had at least one MI or meet at least one of the risk factors for the development of CVD (as determined by their primary care physician and/or the behavioral health consultant). These risk factors include: endorsing “yes” to the following questions: Do you consider yourself an angry person? Do others consider yourself an angry person?; high cholesterol (total cholesterol above 240 mg/dL and low-density lipoprotein above 160 mg/dL); hypertension (higher than 140/90); cigarette smoking; diabetes (Type I or Type II); obesity (body mass index > 30 kg/m²); sedentary behavior; and metabolic

syndrome (at least three of the following: waist circumference >35 inches, triglyceride levels > 150 mg/dL, high-density lipoprotein < 50 mg/dL in women and < 40 mg/dL in men, hypertension and fasting glucose > 100 mg/dL). Patients can also rank their stress levels related to life and employment on a scale from 1 to 10 (with 10 being the most stressful). A score of 5 or higher would be considered a risk factor. Additional nonmodifiable risk factors include old age, male gender, family history, and a genetic predisposition (Dornelas, 2008).

The focus of the program will be to provide primary care patients with the appropriate skills to better manage stress. The stress management skills addressed in the program have been particularly developed for patients with cardiovascular problems. The group is designed to accommodate 8 to 10

patients per rotation. This group is also designed to be a closed group consisting of four weekly sessions lasting one hour and 15 minutes per session. In terms of outcomes, it is expected that patients will: gain a better understanding of terminology related to cardiovascular problems and how risk factors, health behaviors, and stress can affect the heart; learn various meditation and relaxation techniques in order to alter the stress response; build the skills necessary to

alter faulty cognitions and develop coping thoughts to better manage stress; and be educated about how coronary-prone behaviors can impact the course of CVD. A large amount of patient visits to primary care have a primary diagnosis of hypertension or diabetes so it is important to address these factors in order to reduce the chance of the development of this disease (Schappert & Rechtsteiner, 2008).

Module 1: Psychoeducation

Module Overview

During this module, patients will be presented with information regarding the definitions of hypertension, myocardial infarctions, and coronary heart disease. Patients will discuss the stress response, the relationship between heart disease and stress, and the effects of behavioral modification on health status.

Module Goal

The goal of this module is to develop a knowledge-base regarding heart disease and behavioral/psychological reactions to stress.

Module Overview

- Introductions
- Pre-group Assessment (if necessary)
- Definitions of hypertension, MIs, and CHD
- Stress and Heart Health
- **Homework:** Identifying physical cues of stress (Monitoring form)

Introductions

Have the patients briefly introduce themselves. Group facilitator(s) introduce themselves and their role at the clinic. An ice-breaker activity may be included if necessary (and if time permits).

Group Rules

- 1) Confidentiality: What we say in the group stays in the group. We may talk about our own experiences outside of the group, but it is unacceptable to talk about others' experiences outside of the group. The core principle is mutual respect amongst group participants.
- 2) Participation: Participation is voluntary. It is helpful to talk about our experiences. It gives us a way to get our feelings out, to share experiences, and to get ideas for others. Oftentimes, other members benefit when group members share their experiences.
- 3) Attendance: All sessions have been carefully planned, and each one is a building block for the next. Please make every effort to attend all sessions, and we ask that you let the clinic administrative staff know if you will be late or absent. If you have special considerations that will affect your attendance, please discuss this with one of the group facilitators.
- 5) Needing Special Assistance: If you find that you are having thoughts of harming yourself or other people, please tell a group facilitator or your medical provider in the so that we may be of assistance.
- 6) Feedback: Give us your opinions/ideas. We will have special times during the group which we will ask for positive/negative feedback. We hope to constantly improve the program as time goes on so that we can deliver the best of care and services to our patients.

Pre-Group Assessment (if necessary)

Have patients complete any pre-group assessments administered by your clinic/medical center.

Definitions of Hypertension, Myocardial Infarctions (Heart Attack), and Coronary Heart Disease

What is hypertension?

(Allow for feedback)

What are Myocardial Infarctions?

(Allow for feedback)

What is Coronary Heart Disease?

(Allow for feedback)

Review the following handouts (as time permits) with patients and answer questions patients may have:

*Your Guide to A Healthy Heart
Act in Time to Heart Attack Signs
Lowering your Blood Pressure with DASH*

Stress and Heart Health

How would you define “stress”? What does stress look like for you?

(Allow for answers)

Stress can be defined as “the non-specific response of the body to any demands made upon it” (Selye, 1974). It is a natural part of life that everyone has to endure. Not all the stress that individuals experience is bad. There are some stressors that are negative which can cause heart disease and hypertension, especially when left unattended for long periods of time. But, there are other stressors that can have a positive effect (when handled correctly) that can cause us to meet important deadlines. Rather than trying to avoid stress all together (which is quite impossible), there are techniques that individuals can learn to manage their stress more effectively.

Review the following handout with patients and answer questions patients may have:

Myths about Stress

Stress Handout: Constant stress puts your health at risk

Session Summary

What did you all think of the information presented today? Did anything surprise you?

(Allow for feedback)

Homework

Patients will complete the “Self-Monitoring Form: Stress Cues” and will discuss their experiences during the next module.

Module 2: Mindfulness-Based Stress Reduction and Relaxation Training

Module Overview

During this module, patients will be exposed to different mindfulness-based stress reduction and relaxation techniques.

Module Goal

The goal of this module is to familiarize the patients with different mindfulness-based stress reduction relaxation techniques

Module Overview

- Review homework
- Presentation of different stress reduction and relaxation techniques (***explain all techniques but choose one technique to practice during this session***)
 - Mindfulness Training
 - Progressive Muscle Relaxation and Deep Breathing
 - Visualization
- ***Homework:*** patients will choose one (or more) techniques to try at home and will discuss their experiences with the technique during the next session (Diary form will be provided)

Review homework: “Self-Monitoring Form: Stress Cues”

What did you all think of the homework exercise?

(Allow for feedback)

Did anything surprise you throughout the week?

(Allow for feedback)

Mindfulness Training

Has anyone heard of Mindfulness-Based Stress Reduction (MBSR)? Does anyone know what the purpose is?

(Allow for answers)

MBSR was developed by Jon Kabat-Zinn and was first used in 1979. The goal of this type of stress reduction is to add mindfulness meditation as a way to help manage stress.

What is “mindfulness”?

(Allow for answers)

“Mindfulness” is defined as purposefully focusing one’s attention the present moment in an accepting manner (Saur & Baer, 2010).

Mindful Eating Exercise – Eating One Raisin

In addition to a raisin, this exercise can be completed with a small fruit such as a grape or an apple/orange cut into a small piece (the size of a penny).

- *Holding: First, hold the raisin in the palm of your hand and then holding it between your fingers. Focus on the raisin (imagine that you are from another planet and have never seen a raisin before).*
- *Seeing: Take the time to gaze at the raisin and examine any unique features.*
- *Touching: Explore the texture of the raisin (you may even want to close your eyes as you do this).*
- *Smelling: Hold the raisin under your nose and notice its scent. Pay attention to any sensations in your stomach or mouth.*
- *Placing: Place the raisin up to your lips exploring the texture. Place the raisin in your mouth without eating it. Explore the sensations with your tongue.*
- *Tasting: When ready, chew the raisin and pay attention to the sensations in your mouth. Notice the change in texture moment-by-moment.*
- *Swallowing: When ready, swallow the raisin. Notice your body’s intention to swallow by it happens.*
- *Following: See what is left of the raisin as it moves to your stomach. Sense how your body feels after completing this exercise.*

*(Taken from Williams, M., Teasdale, J., Segal, Z., & Kabat-Zinn, J. (2007). *The mindful way through depression: Freeing yourself from chronic unhappiness*. New York: Guilford Press.)*

How was this exercise for you?

(Allow for feedback)

Progressive Muscle Relaxation

Stress not affects individuals psychologically, but physiologically as well. The intervention that we are going to use to manage stress is PMR. PMR is a “relaxation technique that involves slowly tensing and then releasing each muscle group individually, starting with the muscles in the toes and finishing with those in the head” (University of Maryland Medical Center [UMMC], n.d.). PMR helps relax the tension that develops in muscles due to an individual’s anxiety provoking thoughts and events. If the tension is not released, the feelings of anxiety can increase.

PMR Exercise

Before beginning this exercise, ask patients with back problems to refrain from this activity. Also, ask patients to be cautious when tensing the neck and back. Over tightening may cause muscle damage/cramping.

Step 1. Assume a comfortable position. You may lie down; loosen any tight clothing, close your eyes and be quiet.

Step 2. Assume a passive attitude. Focus on yourself and on achieving relaxation in specific body muscles. Tune out all other thoughts.

Step 3. Tense and relax each muscle group as follows:

- Forehead - Wrinkle your forehead, try to make your eyebrows touch your hairline for five seconds. Relax.
- Eyes and nose - Close your eyes as tightly as you can for five seconds. Relax.
- Lips, cheeks and jaw - Draw the centers of your mouth back and grimace for five seconds. Relax. Feel the warmth and calmness in your face.
- Hands - Extend your arms in front of you. Clench your fists tightly for five seconds. Relax. Feel the warmth and calmness in your hands.
- Forearms - Extend your arms out against an invisible wall and push forward with your hands for five seconds. Relax.
- Upper arms - Bend your elbows. Tense your biceps for five seconds. Relax. Feel the tension leave your arms.
- Shoulders - Shrug your shoulders up to your ears for five seconds. Relax.
- Back - Arch your back off the floor for five seconds. Relax. Feel the anxiety and tension disappearing.
- Stomach - Tighten your stomach muscles for five seconds. Relax.
- Hips and buttocks - Tighten your hip and buttock muscles for five seconds. Relax.
- Thighs - Tighten your thigh muscles by pressing your legs together as tightly as you can for five seconds. Relax.
- Feet - Bend your ankles toward your body as far as you can for five seconds. Relax.
- Toes - Curl your toes as tightly as you can for five seconds. Relax.

Step 4. Focus on any muscles which may still be tense. If any muscle remains tense, tighten and relax that specific muscle three or four times.

Step 5. Fix the feeling of relaxation in your mind. Resolve to repeat the process again.

(Taken from Progressive Muscle Relaxation, n.d.)

How was this exercise for you?

(Allow for feedback)

PMR takes lots of practice and you may not feel the calming effects immediately. Once you practice this technique on a regular basis, you may begin to notice more relaxation effects in the future.

Deep Breathing

Deep breathing is another way to lower stress in the body. When deep breathing, it sends a message to your brain to relax.

Deep Breathing Exercise

1. Sit in a comfortable chair, maintaining good posture. Your body should be as relaxed as possible. Close your eyes. Scan your body for tension.
2. Pay attention to your breathing. Place one hand on the part of your chest or abdomen that seems to rise and fall the most with each breath. If this spot is in your chest you are not utilizing the lower part of your lungs.
3. Place both hands on your abdomen and follow your breathing, noticing how your abdomen rises and falls.
4. Breathe through your nose.
5. Notice if your chest is moving in harmony with your abdomen.
6. Now place one hand on your abdomen and one on your chest.
7. Inhale deeply and slowly through your nose into your abdomen. You should feel your abdomen rise with this inhalation and your chest should move only a little.
8. Exhale through your mouth, keeping your mouth, tongue, and jaw relaxed.
9. Relax as you focus on the sound and feeling of long, slow, deep breaths.

Practice this exercise for ten minutes, twice a day.

(Taken from Davis, M., Eshelman, E., & McKay, M. (2008). *The Relaxation and Stress Reduction Workbook*, 6th ed. Oakland: CA: New Harbinger Publications.)

Visualization

Stress can be reduced by focusing on positive images. The purpose of this exercise is to help you create a relaxing image that you develop on your own. The image can be any scene as long as it is pleasant scene that you can visualize. For example, some people like a lake scene while others may imagine a fun scene from their childhood. This exercise requires practice and concentration in order for visualization to be effective (Otis, 2007).

Visualization Exercise

Introduction:

Make sure you are in a comfortable position in your chair. Shift your focus to the pleasant image of your choice. As we start, take several deep breaths.

Describing the Image:

- *Notice what you are hearing*
- *As you breathe, notice what you are smelling*
- *Reach out and touch things that are around you*

In the Image:

- *Notice what is before you*
- *How does it feel? Smell? Sounds?*
- *Be safe here*
- *Look around...feel the ground with your feet...what do you see?*
- *Sit or lie in your special place...notice smells, sights, sounds...this is your place and no one can harm you here*
- *Spend a few minutes in your relaxed place*

End of Exercise:

- *Memorize the place's smells, tastes, sights, sounds...you can come back and relax here whenever you want*
- *Leave by the same entrance...notice any smells, sounds, sights*
- *Remind yourself that you created this place...this is your special place and you can come whenever you'd like*

Now open your eyes and spend a few moments enjoying your relaxation.

*(Taken from Davis, M., Eshelman, E., & McKay, M. (2008). *The Relaxation and Stress Reduction Workbook*, 6th ed. Oakland: CA: New Harbinger Publications.)*

Session Summary

What did you all think of the exercises?

(Allow for feedback)

Is there one that you preferred? Why?

(Allow for feedback)

Homework

Patients will choose at least one technique to try at home and will discuss their experiences with the technique during the next module.

Module 3: Coping Behaviors and Coping Thoughts

Module Overview

During this module, patients will be presented with the ABC Model of thinking and emotions. Patients will learn coping thoughts in order to refute irrational beliefs. Patients will also identify coping behaviors discussed in Module 2 and apply them to deal with immediate stressors.

Module Goal

The goal of this module is to expand the coping options of the patient; responding and acting rather than reacting to daily stressors.

Module Overview

- Review homework
- Explanation of ABCs and cognitions (Activating Event, Beliefs, Consequences; *a dry-erase board may be useful to write out the ABC explanation for the patients*)
- Overview of the “Hook”
- Challenging Your “Hook”
- **Homework:** patients will be provided with a stress log and track stressors in order to identify their “hook” and their reaction to the hook

Review homework: Relaxation techniques

What did you all think of the relaxation techniques?

(Allow for feedback)

Which technique worked best for you? Why?

(Allow for feedback)

ABCs and Cognitions

In the acronym “ABC,” A stands for Activating Event, B stands for Beliefs, and C stands for Consequences. Here is an example: Molly is driving to work and there is an unexpected car accident on the highway which causes a traffic jam (Activating Event). Molly begins to have thoughts such as “Things like this always happen to me!” “I have the worst luck!” “I left home on time and I’m still going to be late for work!” (Beliefs). When Molly arrives to the office, she is in a bad mood and snaps at her co-workers during their morning meeting and gets into an argument with a co-worker (Consequences).

As you can see, our thoughts or cognitions can have a strong affect on our mood.

Has something similar to this happened to you? Tell us about it.

(Allow for feedback)

The “Hook”

The “Hook” is an unexpected stressor that causes distress.

Examples: sitting in traffic, standing in line at the grocery store (no other lanes are open), studying intensely for a test and receiving a failing grade

What are your “hooks”?

(Allow for feedback)

Challenging your “Hook”

Believe it or not, there is something you can do about your response to your hook! We call this “Challenging your hook.”

Here are some questions to ask if you find yourself “hooked”(Ellis & Dryden, 1987):

- *Where is the proof that this belief/thought is true?*
- *Is my irrational belief/thought helping me or does it make things worse for me?*
- *Is this belief/thought logical? Does it ring true to my common sense? (Is your belief stemming from love/approval, comfort, or success/achievement? These are preferences, not absolute demands)*

The “Hook” Card

Give patients the “Hook” card during the group to write the down the questions above. Carrying the card with them will remind them to watch for hooks in their daily lives.

Session Summary

What are your thoughts on the “Hook”?

(Allow for feedback)

Homework

Patients will be provided with a stress log and track stressors in order to identify their “hook” and their reaction to the hook.

Module 4: Reducing Arousal

Module Overview

During this module, patients will be provided an overview of Type A, Type B, and Type D behavior patterns and will identify their own behavior pattern. Patients will also be presented with how different behavior patterns affect heart health.

Module Goal

The goal of this module is the reduction of self-destructive behavior and the development of effective problem solving skills as well as improving the patient's ability to cope with daily life stressors by applying the coping strategies learned in modules 1, 2, and 3.

Module Overview

- Review homework
- Overview of Type A, Type B, Type C, and Type D behavior patterns and the affect on the heart
- Review of Type A inner dialogue:
 - All-or-Nothing Thinking
 - Overgeneralizations
 - Devaluation of self and others
 - Mindreading (negative predictions)
 - Catastrophizing
- Identification of patient behavior pattern
- Challenging the inner dialogue
- Termination/Wrap-up/Post-Group Assessment (if necessary)

Review homework: Challenging the “hook”

Did you notice any patterns in your stress log?

(Allow for feedback)

Did anything surprise you? Why?

(Allow for feedback)

Overview of Type A, Type B, Type C, and Type D Behavior

Have you heard of Type A Behavior?

(Allow for feedback)

Type B Behavior?

(Allow for feedback)

Type C Behavior?

(Allow for feedback)

Type D Behavior?

(Allow for feedback)

Review the following handout with patients and answer questions patients may have:

Behavior Patterns and Heart Health

Type A Inner Dialogue

Review the following handout with patients and answer questions patients may have:

Type A Behavior Inner Dialogue

Ask patients: *Do you have inner dialogue? If so, which one(s)?*

(Allow for feedback)

When does it happen for you?

(Allow for feedback)

*Remember, you don't have to show Type A behavior to have this inner dialogue – anyone can!
The key is recognizing when it happens and challenging those thoughts when they occur.*

Identification of Patient Behavior Pattern

Of the three behavior patterns we discussed, which one most describes your pattern? Why?

(Allow for feedback)

What are some examples in your life (currently) that would best explain why your behavior pattern?

(Allow for feedback)

Do you see aspects of different behavior patterns in addition to your predominate one? If so, which one?

(Allow for feedback)

Do you think your current behavior pattern is something you can change?

(Allow for feedback)

Challenging the Inner Dialogue

This is similar to challenging your “hook,” which was discussed last week in Module 3.

Here are some questions to ask yourself” (Ellis & Dryden, 1987):

- ***Where is the proof that this belief/thought is true?***
- ***Is my irrational belief/thought helping me or does it make things worse for me?***
- ***Is this belief/thought logical? Does it ring true to my common sense? (Is your belief stemming from love/approval, comfort, or success/achievement? These are preferences, not absolute demands)***

Termination/Wrap-up/Post-Group Assessment

Address any questions and have patients complete post-group assessments (if necessary) provided by your clinic/medical center.

What was the most beneficial tool you learned in this group?

(Allow for feedback)

What was the least beneficial tool you learned in this group?

(Allow for feedback)

If you could change one thing about the group, what would it be?

(Allow for feedback)

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Appendix A

Appendix B

Appendix C

Appendix D