

# Transtheoretical Model (TTM) of Change, Therapeutic Recreation and Role-Playing Games

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# Abstract

This document provides an overview of the origins, evolution, debate, and current applications relevant to the Transtheoretical Model (TTM), also known as Stages of Change (SoC) and relevance to role-playing games. It includes some of the debate about the viability, or argued lack thereof, for programs based on the TTM in any setting. The paper also includes suggestions for the potential relevance this model may have in the development and use of recreation education and therapeutic recreation interventions and role-playing games. Additionally, this paper includes some examples of potential implementations based on the TTM / SoC approach. Using the TTM as a guide from a TR perspective, it may be possible to develop a graduated series of role-playing gaming interventions for various populations.

# **Transtheoretical Model (TTM) of Change, Therapeutic Recreation and Role-Playing Games**

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## **Introduction**

The inherently flexible and diverse nature of the Therapeutic Recreation field draws upon many other knowledge and professional domains, including psychological counseling theories and practices. One theory currently used in a number of counseling areas, is the Transtheoretical Model (TTM), also known as Stages of Change (SoC).

Based on the existing research published in diet, exercise, and substance abuse counseling journals, there are a number of indicators that the TTM / SoC may be useful as a guide for leisure and physical education (Cicomasclo and Riebe, 2008) and recreation therapy program development and implementation, and may be relevant in predicting success rates in conjunction with “grit” for moderate to higher levels of challenge. (Reed, Pritschet, and Cutton, 2012)

Though the use of the TTM / SoC is not without some detractors (West, 2005), many programs, including government agencies utilize the model in their publications (HHS, 1999), and some programs in other countries as recently as 2013. (Jones, Jancey, Howat, Dhaliwal, Burns, McManus, Hills, and Anderson)

The roots of the TTM could arguably be traced as far back as the earliest stages of psychiatry and psychology, beginning with Freud's psychoanalytic approach, Jung's analytical psychology, and Rogers' humanistic approach “a relationship encompassing empathy, genuineness, and respect” (Carl Rogers 1957, Stumbo & Wardlaw, 2011, p. 117), developing the idea of a need for trust and respect in the client/therapist relationship as an important, though research shows not completely sufficient, component in a client's recovery prospects. (Stumbo & Wardlaw, 2011, p. 117)

# Building Upon Five Theories of Helping

Building upon five theories of helping; psychoanalytic, behaviorist, cognitive-behavioral, growth psychology, and positive psychology (Stumbo & Whitman, 2011, p. 116), as a beginning continued to take shape with “common factors” (Frank, 1973; Lambert, 1992; Weinberger, 1995; Stumbo & Whitman, 2011) the TTM model was evolving as a distinctly specific theory in the 1980's (Prochaska & DiClemente, 1982, 1983, 2005), progressing towards substantiation and subsequent publications by Prochaska, DiClemente, & Norcross, and others, with ongoing implementations based on the model published as recently as 2013 (Jones, Jancey, Howat, Dhaliwal, Burns, McManus, Hills, Anderson).

While TTM does not actually provide any specific techniques of implementation, it can provide a template for processes that can be used in a variety of therapeutic modalities, that map well to the stages of change addressed within the theory. Stumbo & Wardlaw (2011) provide an example of a specific therapy that has been developed using the TTM to help clients achieve measurable change, with the Motivational Interviewing (MI) approach. (pp. 119-121)

## Arguments About the TTM/SoC Model

There have been some detractors of the TTM/SoC model, claiming that it is too linear, assumes too much clarity of forethought by the clients, is too arbitrary in boundaries between stages, that the stages are of such divergent construct types they do not integrate coherently, that it ignores motivational underpinnings, and is ineffective in making accurate predictions. (West, 2006)

Though Robert West (2006) argues that the TTM is too linear, and while the TTM/SoC stages are considered to flow more effectively when performed in a more linear fashion, the TTM does allow for the nonlinear nature of individuals' motivation and action levels, due to people's variability in drive and behavior, allowing that there will be ups and downs, setbacks, and unforeseen challenges. The TTM allows for cycling through stages to varying degrees.

In the same above cited letter to the journal editor, while arguing against the continued use of TTM/SoC, Robert West points out just how widely used the model is for just one area of focus, for smoking cessation and other substance abuse “of 540 articles found in PubMed using the search phrase 'stages of change', 174 also had 'smoking' in the abstract or title, 60 had 'alcohol', seven had cocaine, two had 'heroin' or 'opiate' and one had 'gambling'.”

Stumbo & Whitman, claim that “TTM is the most popular health-behavior-change theory in the health literature”,(2011, p.131) and in the process of researching this paper, many stage-based interventions were easily found to be published, though many seemed focused on physical exercise and substance use/abuse cessation. Despite the ongoing debate, the TTM/SoC model is frequently used for dietary and physical exercise compliance (Durstine, Painter, Franklin, Morgan, Pitetti, and Roberts, 2005; Jones, et

al, 2013), and has become standard for use in many substance abuse programs. (HHS; Prochaska, 2006)

## **Differentiation Between Leisure Education and Leisure Counseling**

While counseling techniques are important and useful for therapeutic recreation professionals, it is important to note however, that according to Stumbo and Whitman (2011), there is a distinct difference between leisure education and leisure counseling. Leisure education has a specific and predetermined content, while leisure counseling has the focus of which problems to address in counseling “... originates from the individual client.” Lambert (1992) claimed the greatest factor in predicting a client's compliance and success with therapy is “preexisting client qualities (such as length of time and level of impairment).” (Stumbo & Whitman, p. 117)

## **Holistic Perspective**

A relevant quote that is a favorite of this author is from the TR Introduction textbook by Austin & Crawford, “Holistic medicine ... treats the person rather than the disease. ...concern lies with the 'whole person' and with permitting individuals to assume self-responsibility for their own health (Austin 1999), Ardell (1977) ... Whereas illness is the sole concern of traditional medicine, well medicine deals with wellness or health promotion.” (page 6, Austin/Crawford). The TTM addresses this approach as a multifaceted model that “harnesses knowledge about specific ways that people change (change processes), based on different levels of readiness to change (stages of change), while attending to relationship factors best suited for differential readiness to change.” (Stumbo & Whitman, p. 118), with the stages of change really being client-centric in their definition. Prochaska et al. (1992) initially defined five stages in the Transtheoretical Model of Change, later adding Termination as a sixth stage. (Prochaska & Norcross, 2001)

## **The 6 Stages of Change**

The model posits that there are six stages of change: Precontemplation, Contemplation, Preparation, Action, Maintenance, and Termination.

In the Precontemplation stage, the client is unaware in part or in whole of any need for change. (Stumbo & Whitman, 2011, p. 118) When the client is in the Contemplation stage, the client is aware of issue(s) and the possible need for change, but has not yet taken any action, typically the Therapeutic Recreation Specialist (TRS) might in this stage encourage the client to explore and choose his/her own options. (Prochaska & Norcross, 2001)

While in the Preparation stage, the client is aware there is an issue, understands the need to take action, and has made some preliminary plans toward taking action relevant to the desired outcomes. At this stage the Therapeutic Recreation Specialist (TRS) could assume the role of a coaching relationship, providing guidance and ideas at regular intervals. (Prochaska & Norcross, 2001)

Once the client is in the Action stage, to various degrees, this is the stage when the client actually engages in the activities necessary to cause change towards the desired outcomes. At this stage, the TRS may be directly engaged, or may step aside and act more in a consulting role. This is the most clearly obvious stage for the client, but the TTM viewpoint states that this stage would not be possible without the previous stages first taking place to some degree. (Stumbo & Whitman, 2011, p. 118).

At some point the client achieves the Maintenance stage, the TTM view is that just as clients are variable in mood and drive to get to the first 4 stages, maintaining the activity over time will likely have variability as well. The TRS provides contact information to the client, and encourages the client to utilize the TRS in an ongoing consultation role as needed.

## **Example of a Theoretical Application of TTM Using Graduated Role-Playing Game Formats for At-Risk Youth and Young Adults**

The following series of recreational activities could be described using the TTM theories. These programs are designed to address populations including at-risk youth, and/or juveniles in the legal system, that may have issues with aggressive behavior, maladaptive problem solving approaches, or other antisocial issues. The intervention approach is a series of graduated role-playing game (RPG) format variants with specific adventure scenarios focused on alternative approaches to problem solving rather than resorting to violence, crime, or other anti-social behavior.

### **Precontemplation Stage**

In the Precontemplation stage, the client does not initially really see a reason, need, or have any desire, to address currently maladaptive problem-solving skills, but it may be “on the radar” due to recent encounters with law enforcement (or other authorities), indicating there might be something that needs addressing, however the client does not yet have any intention to make an effort to change his/her current behavior.

At this stage, it is recommended that the TRS act as a guide, emulating a trusted individual who helps the client consider options (Prochaska & Norcross, 2001), introducing the client to the concept that there might be other approaches to problem solving that could be more productive toward the clients' intended long-term life goals (moving out of parents/guardian home, reducing real-world physical combat encounter risks, having own residence, getting a job, staying out of jail, having opportunities

for travel, purchasing and maintaining an automobile, etc.), and that various role-playing game formats may be able to help the client learn more constructive approaches.

## **Contemplation Stage**

As the client increases awareness in the Contemplation stage, the client may have been “nudged” into this stage by receiving a warning from school that they face potential suspension, or received an edict for court ordered fines/restitution/service, to address behavioral issues within the next 6 months.

Though the client may be highly distressed and expression considerable anger, the TRS could provide some positive motivators to consider using role-playing games to improve the current stress situation. Perhaps from prior experience or newly introduced by the TRS, considering either paper or electronic versions of solo adventures books or modules (SABM) RPG format. Or if the client already enjoys video games or adventure movies, the TRS could introduce the client to solo problem-solving-centric electronic role-playing games (ERPGs), then graduate towards some socially cooperative computer RPGs (multiplayer RPG (MRPG) such as MUSH, MUD, MMORPG, etc.). The TRS could also discuss the ideas of tabletop and live-action role-playing (LARP) gaming for consideration “down the road” to further refine their basic problem solving skills that will be introduced in an electronic role-playing game (ERPG) and computer-based RPG (CRPG), as well as the positive physical outlet and exercise.

## **Preparation Stage**

Once the client acknowledges that something needs to be done, now in the Preparation phase, and agrees to some of the suggestions by the TRS, the therapist can help the client create a proposed schedule, devise acquisition of resources, and establish some specific goals, first with computer-based RPG, then migrating toward tabletop RPG (TRPG), and LARP.

## **Action Stages**

Now that the client has “buy in” and is willing to take action, the TRS facilitates the client, engaging the client initially with controlled solo computer-based RPG with specific problem-solving scenarios. The client is guided through processing what was learned from different outcomes of various adventure scenarios as each is completed, building on these introductory skills with increasingly challenging adventures, and may later be introduced to online variants, interacting with other player characters, experiencing the consequences of solo-versus-cooperative play (the client learns he/she can't complete the quest or beat the “Boss” without help and ideas from others), and the increasing need for others to help the client achieve more challenging (and more rewarding) goals.

At the appropriate time, the TRS introduces the client to tabletop RPG, maybe at first just as a one-on-one with the TRS acting as Game Master / Game Facilitator, and then later with a larger group of 3 to 6 other players. Using what was previously learned as concepts in RPG (creation of a character, rules for resolution of action, approaches to problem solving, etc.), the client now engages in a fully local (rather

than online), in-person, social situation, working to cooperatively achieve mutual and personal goals. Beginning at first with simpler adventure challenges, but gradually increasing the challenge, and subsequent rewards realized within the game setting.

Finally, when the client has shown significant improvement in individual and socially cooperative problem-solving skills, the TRS introduces the client to Live-Action Role-Playing (LARP), either combat/action-centric, or drama-centric (non-combat) style, depending on propensities, physical coordination abilities, behavioral control, and the individual interests of the client, engaging in even more socially complex cooperative and competitive scenarios.

## **Maintenance Stage**

In the Maintenance Stage, the client continues to iterate between computer-based, tabletop, and live-action, role-playing gaming as appropriate to client needs and success levels. The TRS will help the client realize and illustrate all that he/she has learned, guiding the client to see the “social liberation” that his/her “social norms are changing in the direction of supporting the healthy behavior change” (Stumbo & Whitman, 2011, p. 133), by having the client explain to the TRS, and potentially other participants, what he/she has learned through the process, what worked well, what did not, what was more motivating, and what was discouraging. Using the clients own feedback, the TRS would help the client develop an ongoing maintenance schedule for sustaining the current levels of functioning and set goals for ongoing potential continued growth, through regular gaming group sessions, established schedules, etc.

## **Termination Stage**

At some point the client may reach the Termination stage, when the legal, educational, social, physical, financial, health, or other issues have been resolved in one form or another, and the client may no longer have the external pressures to engage in the activity, the client may choose to continue on his/her own for the enjoyment and intrinsic motivation, or desire to continue towards ongoing growth, or the client may choose to discontinue the activities, either abruptly or gradually over time, without the external forces if the motivation was mostly extrinsic.

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