Developing a Rewiring-Based Intervention for Maladaptive Personality Traits

- Why are personality-informed interventions needed?
- What is a wiring and rewiring statement? How do we design an intervention using the rewiring?
- What is balancing and why is important?
- How have we developed the main components of our intervention?

Personality-informed interventions are effective as a form of treatment and prevention for undesirable outcomes such as substance abuse, poor health, and poor self-regulatory behaviors. Yet, among widely-accepted personality assessments, *none* of them detail the ways one can address negative life outcomes via the rectification of maladaptive traits.

To offset this, Dharma Life Sciences has created a personality-based intervention. We integrate the following concepts of personality traits in our design: the direct cause, unique behavior, wiring, and rewiring.

Through rewiring—the application of an opposing cognitive bias—we enable individuals to adopt a new perspective, followed by new thought processes and new behaviors.

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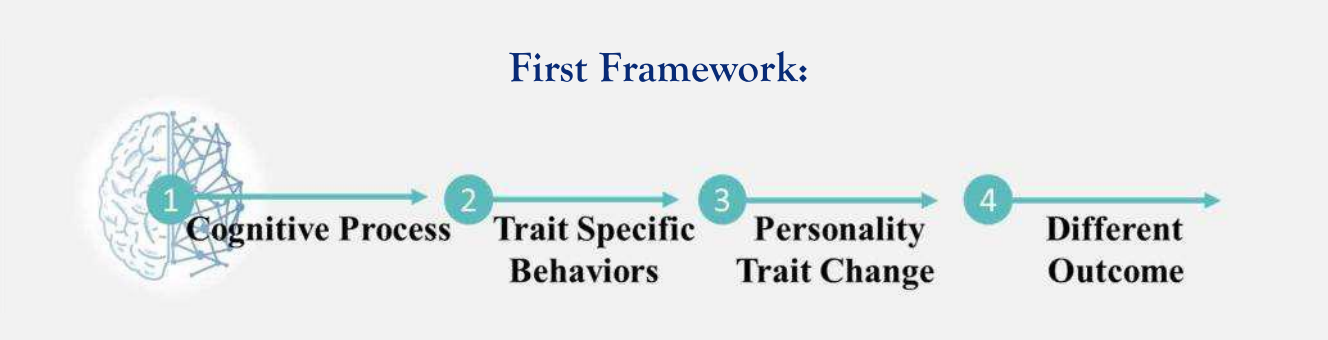
Introduction

Personality traits—defined here as a characteristic way of behaving, feeling, and thinking that spans across time, different situations, and different relationships—shape everyone's experiences. Depending on the traits someone possesses, one can expect to fare better in some areas of life over others. Nonetheless, all personality traits come with their share of benefits, and their share of hardships when unbalanced. For this reason, it is beneficial to address the maladaptive trait and to reduce the negative outcomes it may create.

The Importance of Personality-Informed Interventions

Personality-informed interventions, designed to prevent and combat negative life outcomes, were found to be effective. These interventions, characterized by their target of specific personality traits, are treatment programs that attempt to prevent/change undesirable outcomes. For instance, Conrad (2016) dually found that specific personality types (i.e. sensation seeking, impulsivity, anxiety sensitivity, and hopelessness) were determinants of substance abuse, and that cognitive behavioral interventions addressing these personality types had moderate effect sizes on the reduction of substance abuse-related behaviors, such as binge drinking and prescription drug use. Notably, Conrad concluded personality-targeted approaches were more advantageous than traditional CBT in this context. Munro (2017), similarly believed personality traits should be focal to intervention designs since they were strong predictors of risky behaviors. From a systematic review, he found trait informed digital interventions were effective in promoting personality changes which in turn, resulted in improvements to health. For example, these trait-targeted interventions promoted behavior change related to the assessment of risk, self-management, and healthy behaviors (i.e. healthy eating, physical exercise, and coping skills).

Given the link between low Conscientiousness and multiple negative health outcomes, Chapman, Hampson, & Clarkin (2014) believed the trait should be treated as an underlying pathology. They posited two possible frameworks for personality trait informed interventions that would reduce negative health outcomes. The first framework would change elements of the trait itself in order to change the outcome. The second framework would [1]predict an individual's risk of negative outcomes based upon the outcomes associated with their trait and [2]refine existing public health programs, so they consider treatments for trait specific behaviors. As will be shown, we follow the first framework by altering the cognitive processing associated with maladaptive personality traits, in order to get the trait to a more balanced state.



Moving to an Intervention

The direct cause and unique behavior of the traits are our foundation for designing a personality intervention. The direct cause is the environmental factor, i.e. the caregiver's rearing, that prompts the development of a trait (one that mirrors the environmental factor). The unique behavior is a specific behavior that is definitive of what the trait is and whether it is present. Due to this, we're able to distinctively identify traits, differentiate traits, and identify the causes. In doing so, we provide clients with an idea of the source of their maladaptive trait, the behaviors associated with the trait, and notably,

the ways in which their past life experiences shape cognitive and perceptual biases. We tackle this cognitive aspect by developing a wiring statement.

All about Wiring Statements

To develop the wiring statement, one must know the direct cause and the unique behavior since the wiring statement is the connection between the two. To put things in perspective, if a person has nervousness (high), the direct cause of their behavior is a threatening childhood environment while the unique behavior would be persistent worry. In order to explain why a threatening environment causes such worry, one must think of the cognitive bias that emerged from this environment. If one is in a threatening environment, they may be biased to perceive only threatening cues around them and as such, will be prone to frequent worry.

For the trait patience (low), and all other traits, the same process applies. The direct cause of patience (low) is immediate gratification. The unique behavior for this trait would be restlessness due to a delay. The common factor seen in both the direct cause and the unique behavior would yet again, be the cognitive bias that was ingrained. Constant instant gratification prevents the individual from learning the importance of waiting, which in turn, enables their feeling of urgency when something does not occur immediately. More concretely, this connection—the wiring statement—is the bias to focus on *delays* to a task rather than the benefits of its completion.

The wiring statement, which can be thought of as a cognitive bias associated with a trait, is central to the intervention. The wiring statement demonstrates the specific way in which external stimuli is internalized and manifested into perceptual biases, thought processes, and behaviors. The wiring primes an individual to evaluate their circumstances in a certain way, which in turn, prompts them to exhibit the behaviors associated with their trait. The wiring, therefore, underlies the maladaptive

behaviors. Changes to the wiring will change the behaviors associated with it. As will be discussed later, the internalization of the opposite of the wiring will prompt adaptive behaviors.

Wiring vs Rewiring

The rewiring statement negates the wiring statement. It is indicative of the opposite cognitive bias one must adopt to reach equilibrium. As with a scale, if one side holds the weight and the other side of the scale holds nothing, one must add the same weight to the other side to reach balance. The same applies to rewiring. If one is wired to think in one direction, they must internalize the *rewiring* statement in order to eventually think in a more balanced way. For nervousness (high), the rewiring statement is as follows: Enable them to focus on non-threatening cues/information rather than threatening cues/information in an environment. The effect of rewiring with a person with nervousness (high) is twofold. First, you prime them to perceive the *nonthreatening* elements in the environment. Second, you allow them to decide which cues are most relevant to the situation in order to behave most appropriately.

Rewiring an individual with any other trait, such as patience (low) requires the negation of the wiring statement. For this trait, the wiring allows someone to focus on the delays to the task rather than the benefits of its completion. To negate this, we must have this person focus on the opposite: the successful completion of the task rather than the delays to the task. In short, we must de-emphasize this individual's focus on the process. We will prime the individual to focus on the benefits to finishing the task to allow them to consider *both*; the time a process takes and its completion in any given scenario.

A Balanced View: Reinforcing Weighing

Weighing is a process by which the individual weighs two concepts influenced by the wiring and rewiring, in order to come to a rational decision. Although weighing is important for decision-making, schemas undermine this process. Schemas are mental shortcuts that are used for information-processing. With a schema, when someone is presented with a vast number of cues, they may selectively focus on just a few cues. This allows for quick decision-making but, paves the way for biased thinking. In this context, schemas will allow for processing and decision-making that is heavily influenced by the wiring. Since a schema is used as a quick method for interpreting information, one may overlook the need for weighing.

The more the wiring is used for decision making, the less the neural circuitry for weighing develops. Neural circuits are an organized cluster of neurons which processes a specific type of information (Purves, et al., 2001). These circuits' pathways become stronger through repetition. Since we are more likely to rely on our biases—the wiring—in order to process information, we are less likely to use the neural circuitry for weighing. Through repetition, by prompting the use of weighing, we can stop an individual's reliance on the wiring. For example, someone with nervousness (high) may learn to strengthen their weighing by considering concepts related to both the wiring (threatening cues) and the rewiring (nonthreatening cues) to come to a decision.

Whereas the wiring for this trait promotes the focus on threatening cues, the rewiring promotes the focus on nonthreatening cues. If a person with this personality trait were preparing for a test, some of the threatening information they may attend to includes the difficulty of the course and the reputation of the professor, who is a harsh grader. However, the nonthreatening information they may focus on is their preparedness for the exam and their history of good grades in the course. Given the equal amount of these threatening and nonthreatening cues, the individual should emphasize the non-threatening cues to

come to a decision that they are in fact prepared for the exam. Without this use of weighing, an individual with nervousness (high) may resort to using the wiring and attend to the threatening information solely, even though there may be just as much evidence of nonthreatening information. One may not learn to "weigh" until they are able to *identify* and *apply* the rewiring statement first.

Rewiring to Move Forward

"The wiring statement demonstrates the specific way in which external stimuli is internalized and manifested as perceptual biases, thought processes, and behaviors."

Whereas the wiring reinforces biases and behaviors associated with maladaptive actions, the rewiring reinforces biases and behaviors associated with adaptive behaviors. We structure the intervention by targeting perceptual biases, thought processes, and behaviors. More specifically, we apply the rewiring to all three as a method to counteract maladaptive behaviors associated with the unbalanced traits.

Rewiring the Brain and the Mind

The first step in staging an intervention is ensuring clients recognize the rewiring until it becomes automatic. Perceptual biases are known to occur on the unconscious level. However, before we can change perceptual biases, we must get the client to recognize the desired stimulus (i.e. situations or words related to the rewiring) on a conscious level. We address this by implementing what we call Brain Actions—a set of games based upon the rewiring statement. Over time, when the recognition of the rewiring becomes a less conscious effort, we get clients to focus on the application of the rewiring. To

target maladaptive thought processes and feelings, we utilize Mind Actions. Through recordings of past events and the journaling of triggers associated with the trait, we get clients to reevaluate what occurred using a new perspective—one that is more balanced.

Rewiring and Real-World Actions

The final step of the intervention involves addressing the problematic behaviors associated with an unbalanced trait. At this point, the client recognizes stimuli that was previously undermined and has learned to apply a new perspective to their experiences. Given these tools, the client is one step closer to applying the rewiring to their behavior. Hudson, Briley, Chopik, & Derringer (2019) revealed one crucial insight—the completion of challenges (based on behaviors congruent to the desired trait) is much more effective for actual personality trait change than the simple desire to change one's trait. Therefore, to consolidate personality-trait change, we have clients perform Real World Actions—a series of challenges related to the rewiring. We gradually allow clients to work up to difficult challenges by employing easy and intermediate challenges first. Towards the latter half of the program, the completion of Real-World Actions ensures clients get the chance to embody an adaptive personality trait. By the end of the intervention, the original wiring statement should no longer have an influence on the individual.

Call to Action

From the direct cause to the rewiring, we've taken a systematic approach to curating an intervention for maladaptive personality traits. The Dharma Life Sciences Program is one of the first of its kind—giving you a chance to be a better version of yourself soon after learning your trait. If you're interested in demoing our personality intervention, please refer to our contact page below.

Contact Us

If interested, please contact us at:

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Citations

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