



# RESILIENCE WORKBOOK

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# INTRODUCTION

This workbook provides a practical and entirely educational approach to improve personal resilience. The material is organized as a series of resilience exercises that support World Health Organization recommendations for suicide prevention. The exercises and the learning methods develop problem solving abilities and bring awareness to the importance of social support by applying positive coping skills to create less stressful outcomes to real life challenges. The materials can be used with all audiences to include organizations, educational settings, and families.

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## WHY ...

We might define stress as the body's response to demands or pressures. A little stress can be helpful. It can provide some push to get through a challenge. Stress can also be overwhelming. It can punish us emotionally and physically, particularly when it continues over long periods of time. Some of us might experience sleeplessness, irritability, and perhaps digestive problems (Alvord, Davidson, Kelly, McGuiness, & Tovian, 2018.; 5 things, n.d.). — *The citation identifies the source of the information. Using the name and date in the citation, you can find more information in the Reference section that follows.* If stress continues and becomes chronic, our immune system can become compromised and we are more prone to viral infections, heart disease, hypertension, diabetes, and mental disorders such as depression and anxiety (Krantz, Thorn, & Kiecolt-Glaser, 2013). At the extreme, suicide can be a consequence of stress.

Every forty seconds a person completes suicide somewhere in the world (Suicide, 2014). In the United States, for example, suicide was the second leading cause of death within the 10 to 44 year-old age group in 2019 (Heron, 2021). These are disturbing statistics.

There are, however, protective factors to stress. Resilience is considered protective and has been used to examine the effects of stress in educational and in clinical settings. For our learning we will define resilience as developing skills needed to manage stress in an optimal way (Johnson, Wood, Gooding, Taylor, & Tarrier, 2011; Markel, Trujillo, Callahan, & Marks, 2010). Resilience models tend to favor social connectives, or social support, as protective for dealing with stress and reducing suicide risk (Gunderson & Grill, 2014; Klonsky & May, 2015; O'Connor, 2011; Stanley, Hom, Hagan, & Joiner, 2015). The World Health Organization (WHO) encourages us to pursue resilience at individual and community levels by recognizing the role of protective factors relative to suicide risk factors. Protective factors include developing a social support system, spirituality as a link to a socially cohesive and supportive community, and lifestyle practices of positive coping strategies, good self-esteem, self-efficacy (believing you can meet a goal), and effective problem-solving skills. This includes the ability to reach out and find help when needed (World Health Organization, 2000; Suicide, 2014).

These protective factors serve as a mental armor. There is the added benefit that we are also preparing ourselves for educational success. These skills and the learning methods will contribute to our overall academic performance (Galatzer-Levy, Burton, & Bonanno, 2012; Hartley, 2011; Martin & Marsh, 2006; Martin & Marsh, 2008).

The rationale for building resilience into our lives is compelling. Including resilience into organizational culture, educational programs, and the family can provide a foundation for better dealing with the stresses of a rapidly changing world.

## HOW ...

The resilience skills and learning methods presented here are representative of current evidence-based research. We will refer to these resilience skills as positive coping skills because our intent is to take a personal challenge and create a more positive and less stressful outcome. Certainly there are many positive coping skills we can examine, but to keep this learning manageable, we will look at five. We title these skills Belief, Persistence, Strength, Trust, and Adaptability for our learning. They serve as mental armor, a personal protective factor to help us and our social support systems.

You are likely wondering how long is it going to take to learn and don this mental armor called resilience. The short answer is this is a lifetime exercise. Like any armor, you need to keep it shiny and that means keep a social support system and continue to practice these and other positive coping skills. But, if the question is more about how long will it take to develop some resilience understanding, then about three to four hours is needed to complete the five positive coping skills of Belief, Persistence, Strength, Trust, and Adaptability. If you are limited to under two hours, then consider completing Belief and Trust and practicing a relaxation exercise, such as diaphragmatic breathing in the Strength skill. Though each skill is unique, you will find that the learning exercises for each skill are nearly the same. Keep in mind that the reason we are exploring several skills is not just to learn positive coping skills. Rather it is to build confidence and reinforce the idea that each of us can be resilient and work comfortably with others as we deal with real life challenges. It is therefore *essential* that you work with a partner while completing the resilience exercises. The best results often come when working with a group of people, whether in a face-to-face group setting or an online group conferencing setting. Doing so allows you, and others, to experience the value of a social support systems and further recognize that the challenges you face are much the same challenges that others face, too. Because this instruction evolved from a university program, those of you with preteens will want to first explore the resilience skill exercises and then adapt them for your children. For example, exercises that have writing can be explored orally. Allow children time to describe their challenges and encourage them to work with you to apply positive coping skills. Like adults, children also need to recognize that their social support system can really help them with their challenges.

After completing the resilience skill learning, an optional technology exercise, *STEM Approach to Examine Resilience and Social Support*, can be worked in about an hour — allot yourself one to two hours especially if you are working in a classroom or group setting where there is unfamiliarity with computer technology. This STEM (Science, Technology, Engineering and Mathematics) exercise presents an opportunity to learn about the Internet of Things (IoT), simple graphical programming (Node-RED), and how we can learn resilience as we explore technology. This STEM exercise has been used down to middle school levels.

Yet, another way to explore and practice resilience is to use the Hero's Journey Resilience app (web application). This uses your web browser with either a downloadable app or, if you do not want to download the app, remotely through a server. The app also allows you to create your own resilience skills and the app builds a journal of your Hero's Journey, too. A majority of the Hero's Journey Resilience app is also included as a hard-copy in this text. Like this text, the app is licensed under Creative Commons Attribution-NonCommercial 4.0 International License so you are free to share and adapt the app for non-commercial purposes. The app is coded so that it can be more easily adapted.

The following three methods for learning resilience are oriented to your time constraints and interests. The learning can be broken into smaller segments, for example, working on just one skill.

## Comprehensive--All Skills

### 1. Pretest

Optional general resilience test before you begin the learning and again after the learning to measure personal change.

### 2. Background

Read the “Why ... “ section above OR watch the two minute video of why we need to be resilient and how we can become resilient [Resilience: Why and How, Part 1](#).

### 3. Learning

This Comprehensive option has you work with all five positive coping skills. Work with another person, using the videos and workbook flashcards, on the exercises (3 to 4 hours).

- Watch the video on learning the Belief skill and developing a social support system [Resilience Why and How, Part 2](#).
- Belief flashcard exercises.
- Persistence flashcard exercises.
- Strength flashcard exercises.
- Watch the video on learning the Trust skill with mention of the Persistence, Strength, and Adaptability skills [Resilience Why and How, Part 3](#).
- Trust flashcard exercises.
- Adaptability flashcard exercises.

### 4. Posttest

The same general resilience test may be a used after learning to measure personal change.

### 5. Supplements

Add to your learning by using the Resilience App and the STEM Approach to Resilience exercise.

## Fast-track--Two Skills

### 1. Pretest

Optional general resilience test before you begin the learning and again after the learning to measure personal change.

### 2. Background

Read the “Why ... “ section above OR watch the two minute video of why we need to be resilient and how we can become resilient [Resilience: Why and How, Part 1](#).

### 3. Learning

This Fast-track option has you work with two skills, Belief and Trust, and then briefly examine the Strength skill. Work with another person, using the videos and workbook flashcards, on Belief and Trust (1 to 2 hours).

- Watch the video on learning the Belief skill and developing a social support system [Resilience Why and How, Part 2](#).
- Belief flashcard exercises.
- Watch the video on learning the Trust skill with mention of the Persistence, Strength, and Adaptability skills [Resilience Why and How, Part 3](#).
- Trust flashcard exercises.
- Finally, practice diaphragmatic breathing for relaxation.

### 4. Posttest

The same general resilience test may be a used after learning to measure personal change.

### 5. Supplements

Add to your learning by using the Resilience App and the STEM Approach to Resilience exercise.

## Fastest-track—Awareness

### 1. Background

Read the “Why ... “ section above OR watch the two minute video of why we need to be resilient and how we can become resilient [Resilience: Why and How, Part 1](#).

### 2. Learning

This Fastest-track option will ask that you to first work with the Belief skill and, if time permits, the Trust skill. Watch the video to get an idea of why and how the resilience learning works and then use the resilience app to explore the skills and create your own Hero's Journey (1 hour). Alternatively, section 3 of this workbook reflects the Hero's Journey App but in a hard-copy, fast-track learning format.

- Watch the video on learning the Belief skill and developing a social support system [Resilience Why and How, Part 2](#).
- Work with the Belief skill on the app or in the workbook.

### 3. Resilience App

A simple web-based application paralleling the content of the workbook, and further allows you to create your own resilience skills at [Resilient Hacks site](#).

While it is all well and good to do some resilience exercises, we also want to know if the learning has made a difference, that is, have we changed. A general resilience test can be used before and after learning has occurred. A freely available [Response to Stressful Experiences Scale \(RSES\)](#), resilience test can be used with adults, (RSES, n.d.). Additionally, there are personal learning and change of behavior assessments following each skill in the text. These can be used formatively to measure our ongoing change and serve as discussion about personal change. Finally, there is a similar, though more

summative, test following all of the exercises.

Like individuals, families are unique entities, and can be enormously resilient as they collectively deal with challenges in their lives (Patterson, 2002; Walsh, 2015). The skills that help you to bounce back from adversity also help families in times of stress (Black & Lobo, 2008). Helping family members to be more resilient in times of stress helps you. You and your family can create a positive cycle of growth and strength.

You are now ready to work with either the Comprehensive, Fast-track, or Fastest-track method and start your learning. Or, continue and read more about the learning methods.

## LEARNING METHODS

This section goes into more detail as to how and why certain learning methods are used. In addition to providing insight into your learning, this can serve as useful foundation for developing your own resilience program. Educators play an important role in enhancing organizational, learner and family engagement, not only in academic success, but in reinforcing positive coping skills to better deal with stress (Epstein, Sanders, Sheldon, Simon, Salinas, Jansorn, ... & Hutchins, 2018; McLeskey, Rosenberg, & Westling, 2017). Collaboration is an important part of the learning process and can occur in many ways. One way is that of mentorship. Mentorship is where a more knowledgeable person helps to guide a less knowledgeable person. Certainly the more practice and experience we gain, the more effective we become as mentors. Actively explore these skills and methods will provide self-assurance to more comfortably act as a mentor to your social support system.

Learner-centered teaching or learner-centered education, used here, may be very different than methods you have experienced in the past (Weimer, 2002). You are more likely to be engaged because you are asked to solve real problems, think critically, apply information, and combine knowledge to create solutions. You are asked to collaborate, that is, work with others to arrive at solutions. And, you are asked to reflect, analyze and review what you have learned to evaluate your own learning, that is, you “grade” yourself. All of this gives you a lot more control over your own learning than you may have experienced in the past.

The learner-centered method provides flexibility and control to reach a level of learning that meets personal expectations and actively participating assures a level of competency that meets the program expectations or objectives (Martin & Marsh, 2006). How do we do this? The problem-based learning uses personal challenges you bring rather than us creating challenges for you to solve (Schmidt & Moust, 2000). Problem-based learning does not necessarily focus on arriving at the perfect single solution. Rather, problem-based learning encourages developing other desirable skills and attributes. This includes orderly problem solving through acquired knowledge, group collaboration, and communication. By analogy, it is more about the journey than just getting to the destination. Learning is “facilitated” by questions that direct you, and those with whom you are collaborating, in a self-paced and real-world manner. Key attributes of being resilient are having effective problem-solving skills and social support. Because, this is learner-centered, all of the instructional material is expected to be shared among those participating. Thus, there is no “lecture” associated with this learning. It is simply facilitated by someone willing to “move” the group through the exercises and assure that everyone has opportunity to participate whether in a face-to-face group setting or an online group conferencing setting.

The learning process begins by examining each resilience skill simply as a “flashcard” or memory aid. Each flashcard has a brief definition *about* the skill, *why* the skill is important, *how* to apply the skill, and a brief example demonstrating the skill being used to meet a challenge (Cobb & Bowers, 1999). These

resilience skill flashcards are used across three exercises, or contexts, to improve “transfer-of-learning” and make the skills memorable, that is, easier to remember (Bjork & Richardson-Klavehn, 1989; Eich, 1985; Van Merriënboer, Kirschner, & Kester, 2003). Transfer-of-learning means that you are able to take learning from one situation and successfully apply it to another situation—this is often very difficult for us to do. By sharing these flashcards and exercises with your friends and family, you develop yet another attribute of being resilient, that is, working in a supportive community of people sharing similar beliefs and values.



The three exercises are organized around the storytelling concept of the “Hero’s Journey.” The Hero’s Journey is common to many epic stories that involve a hero who, facing a challenge, goes on an adventure, is victorious in meeting the challenge, and returns as a transformed person (Campbell, 2003; Ohler, 2006). Several well known examples might be Dorothy in the Wizard of Oz, Luke in Starwars, and Frodo in Lord of the Rings. Similarly, this call to adventure occurs when your normal life is suddenly interrupted by a stressful challenge that threatens to move you from the known to the unknown. Then, through a process of problem solving, often with other people, you victoriously come to terms with the challenge and with change. This leads to a personal transformation of self-discovery and learning. While the ending may not always be entirely happy, it is expected to be meaningful and even transformational.



The exercises are used to move you along the Hero’s Journey. There are challenges, skills to be developed, and companions on the journey. These skills are positive coping skills that are considered protective factors to make you more resilient. We look at the five skills of Belief, Persistence, Strength, Trust, and Adaptability, though you can add additional skills. You have likely used these skills or something very similar to them in the past.

**Tell your story.** In the first exercise, following the flashcard review of the skill, you are asked to recall a

past challenge where you have had success using something like the skill. In a Hero's Journey, this is where we get insight about how heroes go about life in their ordinary world before their call to adventure. For example, if we are examining the skill of Persistence, think about when you used something like Persistence to deal with a personal challenge. By answering a few questions, you link the new skill format to a past success. This makes the new learning more memorable and you tend to look at the new learning in a more positive manner (Andersson & Conley, 2013; Race, Badre, & Wagner, 2009). Positive past experiences increase future self-confidence and self-esteem (World Health Organization, 2000).

*Tell your story*, helps you to develop self-efficacy, an attribute of being resilient. Self-efficacy may be defined as the belief in one's ability to complete tasks and successfully reach goals (Bandura, 1982; Margolis & McCabe, 2006). Focusing on your strengths, by encouraging personal reflection on how you solved your challenge, follows WHO suicide management recommendations (World Health Organization, 2016).

**Collaborate.** The second exercise, Collaborate, moves you from the known or familiar, to the unknown in the Hero's Journey. Recall that Luke had Obi Wan, Dorothy had Glinda the Good, and Frodo had Gandalf to help form their social support systems as they moved into the unknown. You also have a companion to work with you to develop your skill and meet the challenge. In this second exercise, you are asked work with at an associate, or perhaps two people, and consider a challenge you, your partner or someone you know is currently facing.

Being able to effectively interact with another person is an essential part of the process of becoming resilient and having a social support system (Barkley, Cross, & Major, 2014; Lochhead & Whimbey, 1987). Pursuing social support encourages empathy, communication, and the act of reaching out to one another, especially so when problem-solving a challenge that has relevance or real meaning to you. Trustful communication is often considered the first step in suicide prevention (World Health Organization, 2000). Empathy is described as putting aside one's own beliefs and instead "seeing through the eyes of another" or "walking in the shoes of another." It is important to understand that empathy is not the same as sympathy, rather it is a critical thinking skill to help give you insight into the way another person operates. Who you want to collaborate with is up to you, but initially consider someone with whom you are comfortable communicating such as a family member, friend, or associate. This might be someone you would consider as having a role in your social support system.

Your goal in this second exercise is to use the information provided on the resilience skill flashcard to resolve the challenge. With your associate, write your challenge and your skill solution to the challenge. If you are in a face-to-face group setting or an online group conferencing setting, post your outcome with other groups' outcomes. Through this learning process, you observe how social support systems apply positive coping skills to solve real life challenges. This second exercise, *Collaborate*, helps you to recognize the crucial importance of a social support system, bolsters your self-efficacy, self-esteem, empathy, and your ability to problem-solve and reach out to others (Bandura, 1993). In the Hero's Journey, this is where Luke uses the Force to destroy the Death Star, Dorothy douses the Wicked Witch who then melts into a puddle, and Frodo confronts Mount Doom.

**Own it.** In the third exercise, you are asked to take a few minutes and reflect upon the skill you have just examined and describe the skill in your own words. If you are time limited, then reflect upon the skill, and, in a few of your own words, summarize in *writing* what this positive coping skill means to you — how have you changed? Write a word, phrase, or paragraph that best captures the idea of the skill. You are attempting to adapt the meaning of the skill to something that is more useable and memorable to you. If you are working in a group setting, consider posting your responses, and recognize the diversity of thinking

Looking at the Hero's Journey, notice that you have moved from the known, Tell your story, to the unknown, Collaborate, where you worked with another person to deal with a real challenge by applying a skill. And, finally, to closure, Own it, where you are reflecting on meaning, redefinition, learning, and self-discovery — how have you changed? This is where our heroes, surrounded by their social support systems, make their return to their known world. Luke gets a hero's welcome, Dorothy has returned with the knowledge that to do anything, you must believe in yourself, and Frodo realizes he can no longer go back to his ordinary life and decides to leave with Bilbo, Gandalf, and the elves. Our heroes become resilient by developing their skills and through social support. Every one in the hero's social support system had a unique and important role to play to make the hero successful.

Keeping your notes from Tell your story, Collaborate, and Own it can serve as a powerful future reminder, an epic story, on how you dealt with challenges and change. Repeating this process for all five resilience skills helps to reinforce social support, problem solving, and build self-efficacy, a protective factor defined as a belief that you are indeed capable of reaching a desired goal. This can also be an opportunity to explore common challenges, such as the impact of Coronavirus (COVID-19).

If you are with a group and have more time, the Own it exercise can be worked in three parts. The first part of the exercise is an oral, or online, warmup to assure everyone has a basic understanding. Ask the group "What is a word, words or a phrase that best captures the idea of the skill?" It can be helpful to have someone facilitate this exercise. The facilitator makes sure that everyone who wishes has an opportunity to describe the skill. The facilitator can also repeat individual responses to assure clarity. This provides an opportunity for everyone to self-check and assure they understand the skill.

Next, reflect upon the skill, and, in a few of your own words, summarize in *writing* what this positive coping skill means to you — how have you changed? You are attempting to adapt the meaning of the skill to something that is more useable and memorable to you. If you are working in a group setting, post your responses, and gain some insight into other peoples thinking while practicing empathy.

Finally, if more time is available, finding a memorable quotation can be a powerful way to personalize and adapt the skill. For example, the Selye quotation "It's not the stress that kills us, it's our reaction to it." is a forceful reminder. And, as Winnie-the-Pooh reminds us "A quotation is a handy thing to have about, saving one the trouble of thinking for oneself, always a laborious business" – A.A. Milne. Perhaps you are doing this exercise with your family. You could play "scavenger hunt," with each family member finding a quote they really like, and the family can vote on the one they, as a group, like the best. This can be an example of "gamification," and it helps you to develop self-efficacy and empathy through observing different points of view.

If not a quotation, perhaps a memorable book is more to your liking. Or, identifying an element of nature, work of visual art, music, or even a mechanical tool can make the skill more memorable. Crafting your own art, tool, composition, or story may be more your style. Adapting and developing these skill descriptions makes the skills more memorable.

Several layers of testing learning are available for organizations seeking a level of accountability. Firstly, the freely available *Response to Stressful Experiences Scale (RSES)*, general resilience test may be used for adults as a pre and post test (RSES, n.d.). If testing as a group, then consider allowing the participants to use an alias as a name on the test as it provides more reliable results. Expect to see statistically significant gains in groups of about ten or more people after two to three hours of learning. More comprehensive, though typically cost associated, resilience testing is certainly available for varied age groups. Secondly, there are personal learning and change of behavior assessments following each skill in the text. These can be used formatively to provide the learner, and the facilitator with useful feedback.

Finally, there is a similar, though more summative, test following all of the exercises in the text.

As we look back over the learning and what we wish to accomplish, a *goal* emerges. Our goal is to develop resilience by applying positive coping skills to personal challenges and developing and sustaining a social support system. There are a number of *key objectives* or *steps* that help us achieve that goal to include:

- Recognize the importance of developing personal resilience through positive coping skills and social support system.
- Relate past challenges to resilient positive coping skills.
- Apply resilient positive coping skills to current challenges in conjunction with a member of your social support system.
- Redefine, in your own words, the meaning of each of the resilient positive coping skills.
- Create a personal social support system based on your needs with attention to why you are selecting those individuals.
- Identify how you will sustain that social support system over time.
- Consider the role of spirituality as a link to a socially cohesive and supportive community.
- Foster good self-esteem, self-efficacy, and effective problem-solving skills.

Beyond our personal resilience needs, we need to keep in mind the needs of those in our community. The current evidence-based research encourages us to develop resilient outcomes while promoting a sense of self, community, safety, self-efficacy, social connectedness, and hope (Hobfoll, Watson, Bell, Bryant, Brymer, Friedman, ... & Maguen, 2007). We must, however, be willing to honestly educate ourselves and explore our behaviors and attitudes. We will likely challenge long held beliefs on how we view ourselves and others.

## References

5 things you should know about stress. (n.d.). Retrieved from <https://www.nimh.nih.gov/health/publications/stress/index.shtml>

Alvord, M., Davidson, K., Kelly, J., McGuiness, K., & Tovian, S. (2018). Retrieved from <https://www.apa.org/helpcenter/understanding-chronic-stress.aspx>

Andersson, M. A., & Conley, C. S. (2013). Optimizing the perceived benefits and health outcomes of writing about traumatic life events. *Stress and Health, 29*(1), 40-49.

Bandura, A. (1982). Self-efficacy mechanism in human agency. *American psychologist, 37*(2), 122.

Bandura, A. (1993). Perceived self-efficacy in cognitive development and functioning. *Educational psychologist, 28*(2), 117-148.

Barkley, E. F., Cross, K. P., & Major, C. H. (2014). *Collaborative learning techniques: A handbook for college faculty*. John Wiley & Sons.

Bjork, R. A., & Richardson-Klavehn, A. (1989). On the puzzling relationship between environmental context and human memory.

Black, K., & Lobo, M. (2008). A conceptual review of family resilience factors. *Journal of family nursing, 14*(1), 33-55.

- Campbell, J. (2003). *The hero's journey: Joseph Campbell on his life and work* (Vol. 7). New World Library.
- Epstein, J. L., Sanders, M. G., Sheldon, S. B., Simon, B. S., Salinas, K. C., Jansorn, N. R., ... & Hutchins, D. J. (2018). *School, family, and community partnerships: Your handbook for action*. Corwin Press.
- Galatzer-Levy, I. R., Burton, C. L., & Bonanno, G. A. (2012). Coping flexibility, potentially traumatic life events, and resilience: A prospective study of college student adjustment. *Journal of Social and Clinical Psychology, 31*(6), 542-567.
- Gunderson, J., & Grill, M. (2014). Evidence-based program improves & sustains first-responder behavioral health. *JEMS*.
- Hartley, M. T. (2011). Examining the relationships between resilience, mental health, and academic persistence in undergraduate college students. *Journal of American College Health, 59*(7), 596-604.
- Heron, M. (2021). Deaths: leading causes for 2019. In Centers for Disease Control and Prevention, CDC. Retrieved December 14, 2021, from <https://www.cdc.gov/nchs/data/nvsr/nvsr70/nvsr70-09-508.pdf>
- Hobfoll, S. E., Watson, P., Bell, C. C., Bryant, R. A., Brymer, M. J., Friedman, M. J., ... & Maguen, S. (2007). Five essential elements of immediate and mid-term mass trauma intervention: Empirical evidence. *Psychiatry: Interpersonal and Biological Processes, 70*(4), 283-315.
- Johnson, J., Wood, A. M., Gooding, P., Taylor, P. J., & Tarrrier, N. (2011). Resilience to suicidality: The buffering hypothesis. *Clinical psychology review, 31*(4), 563-591.
- Krantz, D., Thorn, B., & Kiecolt-Glaser, J. (2013). How stress affects your health. Retrieved from <https://www.apa.org/helpcenter/stress.aspx>
- Lochhead, J., & Whimbey, A. (1987). Teaching analytical reasoning through thinking aloud pair problem solving. *New directions for teaching and learning, 1987*(30), 73-92
- Margolis, H., & McCabe, P. P. (2006). Improving self-efficacy and motivation: What to do, what to say. *Intervention in school and clinic, 41*(4), 218-227.
- Markel, N., Trujillo, R., Callahan, P., & Marks, M. (2010). Resiliency and Retention in Veterans Returning to College: Results of a Pilot Study. *Online Submission*.
- Martin, A. J., & Marsh, H. W. (2006). Academic resilience and its psychological and educational correlates: A construct validity approach. *Psychology in the Schools, 43*(3), 267-281
- Martin, A. J., & Marsh, H. W. (2008). Academic buoyancy: Towards an understanding of students' everyday academic resilience. *Journal of school psychology, 46*(1), 53-83.
- McLeskey, J. L., Rosenberg, M. S., & Westling, D. L. (2017). *Inclusion: Effective practices for all students*. Pearson.
- O'Connor, R. C. (2011). The integrated motivational-volitional model of suicidal behavior.
- Ohler, J. (2006). The world of digital storytelling. *Educational leadership, 63*(4), 44-47.

Patterson, J. M. (2002). Integrating family resilience and family stress theory. *Journal of marriage and family, 64*(2), 349-360.

Race, E. A., Badre, D., & Wagner, A. D. (2009). Multiple forms of learning yield temporally distinct electrophysiological repetition effects. *Cerebral Cortex, 20*(7), 1726-1738.

RSES, (n.d.). Retrieved from <https://www.reginfo.gov/public/do/DownloadDocument?objectID=39162801>

Schmidt, H. G., & Moust, J. H. (2000). Factors affecting small-group tutorial learning: A review of research. *Problem-based learning: A research perspective on learning interactions, 19-52*.

Stanley, I. H., Hom, M. A., Hagan, C. R., & Joiner, T. E. (2015). Career prevalence and correlates of suicidal thoughts and behaviors among firefighters. *Journal of Affective Disorders, 187*, 163-171.

Suicide, W. P. (2014). A global imperative. *World Health Organization*.

Van Merriënboer, J. J., Kirschner, P. A., & Kester, L. (2003). Taking the load off a learner's mind: Instructional design for complex learning. *Educational psychologist, 38*(1), 5-13.

Walsh, F. (2015). *Strengthening family resilience*. Guilford Publications.

Weimer, M. (2002). *Learner-centered teaching: Five key changes to practice*. John Wiley & Sons.

World Health Organization. (2000). *Preventing suicide: A resource for teachers and other school staff* (No. WHO/MNH/MBD/00.3). World Health Organization.

World Health Organization. (2016). mhGAP Intervention Guide Mental Health Gap Action Programme Version 2.0 for mental, neurological and substance use disorders in non-specialized health settings. *World Health Organization, 131-149*.

# SECTION 1

## SKILL FLASHCARD EXERCISES

The following three methods for learning resilience are oriented to your time constraints and interests.

### Comprehensive--All Skills

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- Belief flashcard exercises.
- Persistence flashcard exercises.
- Strength flashcard exercises.
- Watch the video on learning the Trust skill with mention of the Persistence, Strength, and Adaptability skills [Resilience Why and How, Part 3](#).
- Trust flashcard exercises.
- Adaptability flashcard exercises.

#### 4. Posttest

The same general resilience test may be a used after learning to measure personal change.

#### 5. Supplements

Add to your learning by using the Resilience App and the STEM Approach to Resilience exercise.

### Fast-track--Two Skills

#### 1. Pretest

Optional general resilience test before you begin the learning and again after the learning to measure personal change.

#### 2. Background

Read the “Why ... “ section above OR watch the two minute video of why we need to be resilient and how we can become resilient [Resilience: Why and How, Part 1](#).

#### 3. Learning

This Fast-track option has you work with two skills, Belief and Trust, and then briefly examine the Strength skill. Work with another person, using the videos and workbook flashcards, on Belief and Trust (1 to 2 hours).

- Watch the video on learning the Belief skill and developing a social support system [Resilience Why and How, Part 2](#).
- Belief flashcard exercises.
- Watch the video on learning the Trust skill with mention of the Persistence, Strength, and Adaptability skills [Resilience Why and How, Part 3](#).
- Trust flashcard exercises.
- Finally, practice diaphragmatic breathing for relaxation.

#### 4. Posttest

The same general resilience test may be a used after learning to measure personal change.

#### 5. Supplements

Add to your learning by using the Resilience App and the STEM Approach to Resilience exercise.

### Fastest-track—Awareness

#### 1. Background

Read the “Why ... “ section above OR watch the two minute video of why we need to be resilient and how we can become resilient [Resilience: Why and How, Part 1](#).

#### 2. Learning

This Fastest-track option will ask that you to first work with the Belief skill and, if time permits, the Trust skill. Watch the video to get an idea of why and how the resilience learning works and then use the resilience app to explore the skills and create your own Hero's Journey (1 hour). Alternatively, section 3 of this workbook reflects the Hero's Journey App but in an hard-copy, fast-track learning format.

- Watch the video on learning the Belief skill and developing a social support system [Resilience Why and How, Part 2](#).

- Work with the Belief skill on the app or in the workbook.

#### 3. Resilience App

A simple web-based application paralleling the content of the workbook, and further allows you to create your own resilience skills at [Resilient Hacks site](#).

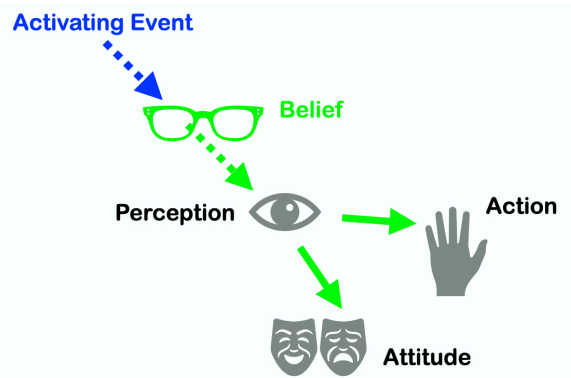


## Belief

Belief affects attitude. Changing your belief changes your attitude.

**A Story to Tell:** What is Belief? The way I perceive things is shaped by my beliefs. That means that my beliefs control my actions and my attitude. My attitude is the way I feel about something. How might this play out? Perhaps, my neighbor's dog has been barking for an hour. My *attitude* might be one of annoyance based on my *belief* that the dog barks for no reason. Or, my *attitude* might be one of concern based on my *belief* that the dog is barking because something is justly wrong. The way I perceive the event is shaped by my belief, and my *attitude* is the consequence of that *belief*.

So, when I encounter a personal challenge, I have choices to make. Sometimes I can alter the challenge to make it more positive or more manageable. Many times, however, the challenge may appear to be unalterable. I then have to alter a personal belief so I develop a better attitude dealing with the challenge. I have to ask myself if the belief I currently have is self-defeating and perhaps based on some fear. What then might be a more positive, yet realistic, belief that I can consider. This is not always easy or immediate. It takes a lot of courage to make change. But, once I have made the decision to develop a more workable belief, I have also made the decision to be a survivor rather than a victim. Then too, I may find that with a better attitude, I can also make the challenge more workable for me. I am in control.



Again, consider the barking dog. My attitude may be one of concern based on my belief that the dog is barking because something is justly wrong. If I check and find that the dog has tipped over its water bowl and wants water, then my belief is justified and even reinforced. But, if I see that the dog is barking for no apparent reason, then do I maintain the attitude of annoyance, perhaps even anger? I reflect on that *attitude* and recognize that the *belief* may be self-defeating. I understand that changing a belief that may be self-defeating is not always instantaneous. I need to persist in my thinking to develop a more positive belief and, consequently, a better attitude. My new belief you ask. How about birds chirp, cats meow, and dogs bark to communicate. I have a question for you. How do you manage your beliefs?

**Why:** Your beliefs control your actions and the way you feel about something, your attitude. You can alter your belief to change your perception and better deal with your challenge. Beliefs, whether positive or negative, can have a profound impact on physical and psychological health.

**How:** Approach your challenge with a realistic view. Can you change the challenge to make it more controllable? If the challenge appears not changeable, then a change of attitude is possible by changing a belief.

- Consider your challenge. Is the outcome changeable? If so, then identify a more positive yet realistic outcome.
- Or, if the outcome is not changeable, then identify your worst fear. There is a belief that is supporting that attitude. Identify a more positive belief. Consider the steps needed to bring about the change to a more positive belief.
- Sometimes a challenge may require a change of belief before a more positive outcome can be found. And, sometimes changing the outcome of a challenge may be necessary before finding the more positive belief.

**Example:** Because of a fracture, my arm is immobilized. This condition is not going away for several weeks and I can't change it.

- My challenge is how to deal with a cast on my arm for several weeks.
- The outcome is not changeable, so I will focus on a change of belief.
- My fear is that I can't do everything I want to do.
- I recognize that my belief is self-defeating because the belief appears to be "all or nothing" thinking.
- I seek the more positive belief that there is opportunity to do some of what I need and want to do.
- I recognize now that I can also improve my outcome with a support system and attainable goals.

*If you don't like something, change it. If you can't change it, change your attitude.*

— Maya Angelou

### Hero's Journey: Belief



## Tell your story: Recall a past Belief challenge

**Objective:** Completing this exercise will help to link this new learning to prior learning, something you did with some success in the past, to make the Belief skill more memorable.

Perception is shaped by belief. Changing your belief changes your perception, giving you control, inner strength and courage to make change.

A belief can be described as an idea or principle that we judge to be true. Some people believe the Earth is flat and others believe it is round. We become attached to our beliefs, whether they are beneficial or self-defeating. This is because our beliefs affect how we perceive things and subsequently affect our behaviors, particularly as we face challenges. What I may experience as stressful may not be that bothersome to you. And, what is stressful to you may have little impact on me.

The good news is that self-defeating beliefs can be modified into more positive beneficial beliefs (Burns, 1999). Let us look at Belief as a resilience skill. Read the Belief flashcard. Recall a past personal challenge where you successfully used the skill of Belief or something similar to Belief. Work on answering the following questions. These questions are presented as both *brief* questions and as *detailed* questions depending upon your time limitations and preferences. Writing your responses will help you to better organize your thinking. Feel free to work individually or in collaboration with another person on this exercise. Working with another person can develop problem-solving skills when one person acts as problem solver and the other as a listener. The problem solver reads the problem aloud and describes a potential solution. The listener follows the problem solver's steps attempting to catch any errors (Lochhead, & Whimbey, 1987).

Brief questions:

1. What was your challenge?
2. Did you change the challenge to something more positive or workable? Or ...
3. Did you change your Belief to something more positive?

Detailed questions:

1. What was your challenge?
2. If you **were able** to change the challenge to something more positive or workable:
  1. What was your more positive outcome to the challenge?
  2. Did you then find you had a more positive belief and a change of attitude?
3. If you **were unable** to change the challenge to something more positive or workable:
  1. What was your worst fear or concern?
  2. Now the tricky part. Can you identify the self-defeating belief that caused your fear or concern?
  3. What was the more positive belief that you used to replace the self-defeating belief? If you are struggling to identify the self-defeating and positive beliefs, then describe how you worked around the fear that confronted you. That description will help to identify the more positive belief you used.
  4. Did you then find you were able to find a way to change the outcome to make it more positive and manageable?

## **Collaborate: Apply Belief to a current challenge**

**Objective:** Completing this exercise with another person will encourage communication, empathy, and the ability to reach out while problem-solving a relevant challenge.

While positive coping skills are important to self-resilience, these skills also become very important to sustaining the social support system. So, by making yourself more resilient you also make your social support system more resilient too. For that reason, you are most strongly encouraged to do this exercise with another person so that you become aware of how to work with people within a social support

system, people who will work with you on real life challenges. Recognize too, that working with others is demanding, particularly so for those of us dealing with Post Traumatic Stress whereby we tend to isolate ourselves from others. Beliefs, whether positive or negative, can have a profound impact of our physical and psychological health (Schwarzer, 2014).

Consider a challenge either you or perhaps someone you know has encountered. Write the challenge in as much detail as you feel necessary to allow you, and your associate, to make a decision as to whether you can alter the challenge outcome so it is more manageable. Or, if the outcome appears to be not changeable, a change of attitude is possible by changing a belief (Bandura, 2001, Reivich & Shatté, 2002). Though this stressful challenge may be quite dire, we can still change the way we react to the situation and have some healing value emerge from the process (Tedeschi & Calhoun, 1996). Refer to the Belief flashcard, especially the example, to get an idea on how you might write your responses to the following questions. These questions are presented as both *brief* questions and as *detailed* questions depending upon your time limitations and preferences.

Brief questions:

1. What is your challenge?
2. Can you change the challenge to something more positive or workable? Or ...
3. Can you change your Belief to something more positive?

Detailed questions:

1. What is your challenge?
2. Are you **are able** to change the challenge to something more positive or workable:
  1. What is a more positive, yet realistic, outcome to the challenge?
  2. Are you able to recognize a more positive belief and a change of attitude?
3. Are you **unable** to change the challenge to something more positive or workable:
  1. What is the worst fear or concern?
  2. Can you identify the self-defeating belief that caused the fear or concern?
  3. What is a more positive belief that can replace the self-defeating belief? If you are struggling to identify the self-defeating and positive beliefs, then describe how you could work around the fear or concern. That description will help to identify the more positive belief used.
  4. Are you now able to find a way to change the outcome to make it more positive and manageable?

If you are working within a group environment, whether face-to-face group setting or an online group conferencing setting, consider posting your outcome with other groups' outcomes. Through this learning process, you can observe how social support systems apply positive coping skills to solve real life challenges.

## Own it: Reflecting on Belief

**Objective:** Completing this exercise will make the skills more understandable and therefore more workable for you.

1. You have applied the Belief skill to an instance that had occurred in your past. You have also applied the skill as group problem-based-learning to a current challenge. Now, reflect upon the skill. What is a word, words, or a phrase that best captures the idea of the skill of Belief. This is a good *oral*, or online, exercise in a group or classroom setting to determine if everyone is understanding the concept. It can be helpful to have someone facilitate this exercise. The facilitator assures everyone has the opportunity to describe the skill.

2. Reflect upon the skill of Belief and, in a few of your own words, summarize in *writing* what this positive coping skill means to you — how have you changed? You are attempting to adapt the meaning of the skill to something that is more useable and memorable to you. If you are working in a group or classroom setting, post your responses, and recognize the awesome power of social support.

3. If more time is available, finding a memorable quotation can be a powerful way to personalize and adapt the skill. What would you use as a memorable quotation for the this skill? Yet, you need not necessarily be limited to words to personalize the skill. Perhaps identifying an element of nature, work of visual art, music, or even a mechanical tool can make the skill more memorable. Crafting your own art, tool, composition, or story may be more your style. You are attempting to adapt the meaning of the skill to something that is more useable and memorable to you. If you are working in a group or classroom environment, post your results with others in the group and observe the results and recognize the power of diversity.





*Excellence is not a skill, it is an attitude.*  
—Ralph Marston





## How am I doing?

**Objective:** Completing this assessment will provide opportunity to monitor progress, adjust your learning, develop self-efficacy, and improve self-esteem.

Recall that the three exercises are organized around the storytelling concept of the “Hero’s Journey.” The Hero’s Journey is common to many epic stories that involve a hero who, facing a challenge, goes on an adventure, is victorious in meeting the challenge, and returns as a transformed person. Keeping your notes from the Tell your story, Collaborate, and Own it exercises can serve as a powerful future reminder, an epic story, as how you dealt with a challenge, as well as providing an opportunity to monitor your learning.

The following assessment allows you to monitor learning and track your changes as you continue to explore resilience through positive coping skills and social support. You are encouraged to compare these ongoing assessments to see how you have adapted to the learning and resilience.

Learning Objectives				
Evaluate how well the learning objectives are working for you. Answer by checking only one response to each of the following objectives.	 <b>Do not recall doing this</b>	 <b>Not a useful exercise</b>	 <b>Useful</b>	 <b>Very useful</b>
Relate a past challenge to the Belief resilience skill.				
Apply Belief, to a current challenge, with a member of your social support system.				
Redefine, in your own words, the meaning of Belief.				
Recognize the importance of developing personal resilience by using positive coping skills and social support system.				

<b>Change of Behavior</b>				
Evaluate how much you have changed. Answer by checking only one response to each of the following.	 <b>Worsened</b>	 <b>No change</b>	 <b>Improved</b>	 <b>Much improved</b>
Ability to apply positive coping resilience skills to personal challenges.				
Ability to reach out to a social support system to better deal with personal challenges.				
Ability to problem solve when dealing with personal challenges.				
Improvement of self-efficacy, the ability to persist in meeting a goal when dealing with a challenge.				
Improvement of self-esteem.				

### References

- Bandura, A. (2001). Social cognitive theory: An agentic perspective. *Annual review of psychology*, 52(1), 1-26.
- Burns, D. D. (1999). *The feeling good handbook*, Rev. Plume/Penguin Books.
- Lochhead, J., & Whimbey, A. (1987). Teaching analytical reasoning through thinking aloud pair problem solving. *New directions for teaching and learning*, 1987(30), 73-92.
- Reivich, K., & Shatté, A. (2002). *The resilience factor: 7 essential skills for overcoming life's inevitable obstacles*. Broadway Books.
- Schwarzer, R. (Ed.). (2014). *Self-efficacy: Thought control of action*. Taylor & Francis.



## Persistence

Persistence is facing a challenge with the belief you will succeed.

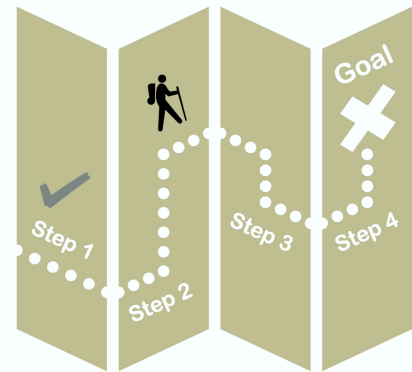
**A Story to Tell:** There is a journey ahead. It is the journey of personal change. I must persist to bring about change. There is no honor in failure earned through lack of effort. I deny myself and I deny those with whom I travel. If I wish to succeed, I need to persist.

There is something very powerful about writing a goal. It requires me to take the time to organize my thoughts into a statement that is brief and understandable. The goal has become worthy of my time and effort. I believe I can persist.

My preference is to keep my goal statement brief and to-the-point. Reduce a complex task into a simple phrase. I don't need to worry about the details, not yet, anyway. I can place limitations on the goal. Limitations make the goal manageable allowing me to determine the what and when of completion. "Hike a section of the Long Trail over four days." Is that doable I ask myself. There is nothing to be gained in setting myself up for failure. I want to make sure I can persist.

I decide how I will complete the goal, step by step. The process is systematic. Each step brings me closer to the goal. I write each step in a manner that permits me to determine when it has been completed. The step is measured by limitation. "Weather permitting, today I will hike 15 kilometers over 8 hours to arrive at the next campsite." I can check it off. I can mark progress toward goal completion. I make sure I will persist.

Marking progress builds belief, a commitment to ensure I complete the goal. I therefore write a number of steps to both provide direction and mark my progress. The goal and the steps become my map. When I have completed all of the steps, I have attained the goal. I have persisted.



Persistence is facing a challenge with the belief you will ultimately succeed. What is your challenge? How will you persist? Have you written your map?

**Why:** Persistence encourages you to make change, mark your progress, and build belief that you can reach your goal.

**How:** Consider creating a realistic goal and the steps needed to reach the goal so that when all of the steps are completed, you have attained your goal.

- Consider your challenge and recognize the importance of believing you can meet the challenge.
- Creating a goal is way to build the belief you can meet the challenge. The goal must be reachable within a realistic time limit.
- The steps describe the actions that are needed to reach your goal. Create as many steps as needed so that you can see the progress you are making. You persist by building belief in yourself.

- Remember to reward yourself as you persist.

**Example:** I have a project to do and need a plan to complete it on time.

- The challenge is to complete a project.
- The goal is to “Create a Project Time Plan.”
- Break the major parts of the project into smaller steps to better identify the tasks and how much time is needed to complete each part.
- Assign a due date to each project part.
- Assure there are enough steps so that progress can be easily seen.
- Monitor progress and remember to reward yourself as progress is made.

*Success is not the absence of failure; it's the persistence through failure.*

— Aisha Tyler

### Hero's Journey: Persistence



## Tell your story: Recall a past Persistence challenge

**Objective:** Completing this exercise will help to link this new learning to prior learning, something you did with some success in the past, so as to make Persistence more memorable.

Persistence is facing a challenge with the belief you will ultimately succeed.

Read the Persistence flashcard. The skill of Persistence is defined as “facing a challenge with the belief you will ultimately succeed.” Self-efficacy is defined as “how well one can execute courses of action required to deal with prospective situations” or, more simply, belief in one's ability to complete tasks and successfully reach goals (Bandura, 1982, p. 122). Notice that self-efficacy measures your Persistence. The more you persist the greater your self-efficacy. Being able to create an attainable goal and the steps to achieve that goal has been found to increase our sense of self-efficacy, leading to a greater likelihood of persisting and attaining success (Bandura & Locke, 2003; Bandura & Schunk, 1981; Gist, 1987; Locke & Latham, 2002). Recall a past personal challenge where you successfully used the skill of Persistence or something similar to

Persistence. Work on answering the following questions. These questions are presented as both *brief* questions and as *detailed* questions depending upon your time limitations and preferences. Writing your responses will help you to better organize your thinking. Feel free to work individually or in collaboration with another person on this exercise.

Brief questions:

1. What was your challenge?
2. What was your goal?
3. What were the steps needed to reach your goal?
4. What made the goal reachable?

Detailed questions:

1. What was your challenge?
2. What made you believe you could meet the challenge?
3. Did you create a goal as a way to build the belief you could meet the challenge?
4. Was your goal made reachable within a realistic time limit?
5. Did you write a goal statement?
6. Did you write the steps to describe the actions that were needed to reach your goal?
7. Did you include enough steps so that you could mark the progress you were making?
8. Did you remember to reward yourself in some way as you persisted?

## **Collaborate: Apply Persistence to a current challenge**

**Objective:** Completing this exercise with another person will encourage communication, empathy, and the ability to reach out while problem-solving a relevant challenge.

You are strongly encouraged to do this exercise with another person so that you become aware of how to work with people within a social support system, people who will work with you on real life challenges. Consider a challenge either you or perhaps someone you know has currently encountered.

Write the challenge in as much detail as necessary to allow you, and your associate, to answer the following questions. These questions are presented as both *brief* questions and as *detailed* questions depending upon your time limitations and preferences.

Brief questions:

1. What is your challenge?
2. What is your goal?
3. What are the steps needed to reach your goal?
4. What makes the goal reachable?

Detailed questions:

1. What is your challenge.
2. What makes you believe you can meet the challenge?
3. Will you create a goal to build the belief that you can meet the challenge? Do you believe a goal is important to the outcome? Those who see the goal as a challenge show better performance than those who perceive the goal to be threatening and leading to failure (Drach-Zahavy, & Erez, 2002). Setting more difficult goals, such as "improve upon past performance scores," leads to better performance than no goals or vague goals, such as "do my best" (Strecher, Seijts, Kok, Latham, Glasgow, DeVellis, ... & Bulger, 1995). The SMART acronym captures some of the elements of successful goal setting from a management context. That is, goals are *Specific* (have a defined intent), *Measurable* (limits are established),

*Assignable* (who is involved), *Realistic* (attainable), and *Time* related (have an expected completion) (Doran, 1981).

4. Describe your goal.
5. Is the goal attainable?
6. Is the goal reachable within a realistic time limit?
7. Describe the steps that are needed to reach your goal. It is important to develop a realistic goal along with the smaller, more manageable, informative steps required to attain the goal. These steps have purpose. Steps can help eliminate goal uncertainty by setting limitations while introducing more flexibility in reaching the goal (White, Kjelgaard, & Harkins, 1995; Zelen, 1955).
8. Do you have enough steps to mark your progress and build belief that you can persist?
9. How will you reward yourself as you persist?

If you are working within a group environment, whether face-to-face group setting or an online group conferencing setting, consider posting your outcome with other groups' outcome. Through this learning process, you can observe how social support systems apply positive coping skills to solve real life challenges.

## Own it: Reflecting on Persistence

**Objective:** Completing this exercise will make the skills more understandable and therefore more workable for you.

1. You have applied the Persistence skill to an instance that had occurred in your past. You have also applied the skill as group problem-based-learning to a current challenge. Now, reflect upon the skill. What is a word, words, or a phrase that best captures the idea of the skill of Persistence. This is a good *oral*, or online, exercise in a group or classroom setting to determine if everyone is understanding the concept. It can be helpful to have someone facilitate this exercise. The facilitator makes sure everyone has an opportunity to describe the skill.

2. Reflect upon the skill of Persistence and, in a few of your own words, summarize in *writing* what this positive coping skill means to you—how have you changed? You are attempting to adapt the meaning of the skill to something that is more useable and memorable to you. If you are working in a group or classroom setting, post your responses.

3. If more time is available, finding a memorable quotation can be a powerful way to personalize and adapt the skill. What would you use as a memorable quotation for the this skill? Yet, you need not necessarily be limited to words to personalize the skill. Perhaps identifying an element of nature, work of visual art, music, or even a mechanical tool makes the skill more memorable to you. Crafting your own art, tool, composition, or story may be more your style. If you are working in a group environment, post your results with others in the group and observe the results and recognize the power of diversity.







*If you are going through hell, keep going.*  
—Winston Churchill







## How am I doing?

**Objective:** Completing this assessment will provide opportunity to monitor progress, adjust your learning, develop self-efficacy, and improve self-esteem.

Recall that the three exercises are organized around the storytelling concept of the “Hero’s Journey.” The Hero’s Journey is common to many epic stories that involve a hero who, facing a challenge, goes on an adventure, is victorious in meeting the challenge, and returns as a transformed person. Keeping your notes from the Tell your story, Collaborate, and Own it exercises can serve as a powerful future reminder, an epic story, as how you dealt with a challenge, as well as providing an opportunity to monitor your learning.

The following assessment allows you to monitor learning and track your changes as you continue to explore positive coping skills and social support. You are encouraged to compare these ongoing assessments to see how you have adapted to the learning and resilience.

<b>Learning Objectives</b>				
Evaluate how well the learning objectives are working for you. Answer by checking only one response to each of the following objectives.	  <b>Do not recall doing this</b>	 <b>Not a useful exercise</b>	 <b>Useful</b>	  <b>Very useful</b>
Relate a past challenge to the Persistence resilience skill.				
Apply Persistence, to a current challenge, with a member of your social support system.				
Redefine, in your own words, the meaning of Persistence.				
Recognize the importance of developing personal resilience by using positive coping skills and social support system.				

<b>Change of Behavior</b>				
Evaluate how much you have changed. Answer by checking only one response to each of the following.	  <b>Worsened</b>	 <b>No change</b>	 <b>Improved</b>	  <b>Much improved</b>
Ability to apply positive coping resilience skills to personal challenges.				
Ability to reach out to a social support system to better deal with personal challenges.				
Ability to problem solve when dealing with personal challenges.				
Improvement of self-efficacy, the ability to persist in meeting a goal when dealing with a challenge.				
Improvement of self-esteem.				

**References**

- Bandura, A. (1982). Self-efficacy mechanism in human agency. *American psychologist*, 37(2), 122.
- Bandura, A., & Locke, E. A. (2003). Negative self-efficacy and goal effects revisited. *Journal of applied psychology*, 88(1), 87.
- Bandura, A., & Schunk, D. H. (1981). Cultivating competence, self-efficacy, and intrinsic interest through proximal self-motivation. *Journal of personality and social psychology*, 41(3), 586.
- Doran, G. T. (1981). There's a SMART way to write management's goals and objectives. *Management review*, 70(11), 35-36.
- Drach-Zahavy, A., & Erez, M. (2002). Challenge versus threat effects on the goal-performance relationship. *Organizational Behavior and Human Decision Processes*, 88(2), 667-682.
- Gist, M. E. (1987). Self-efficacy: Implications for organizational behavior and human resource management. *Academy of management review*, 12(3), 472-485.
- Locke, E. A., & Latham, G. P. (2002). Building a practically useful theory of goal setting and task motivation: A 35-year odyssey. *American psychologist*, 57(9), 705.
- Strecher, V. J., Seijts, G. H., Kok, G. J., Latham, G. P., Glasgow, R., DeVellis, B., ... & Bulger, D. W. (1995). Goal setting as a strategy for health behavior change. *Health education quarterly*, 22(2), 190-200.
- White, P. H., Kjelgaard, M. M., & Harkins, S. G. (1995). Testing the contribution of self-evaluation to goal-setting effects. *Journal of Personality and Social Psychology*, 69(1), 69.
- Zelen, S. L. (1955). Goal-setting rigidity in an ambiguous situation. *Journal of consulting psychology*, 19(5), 395.



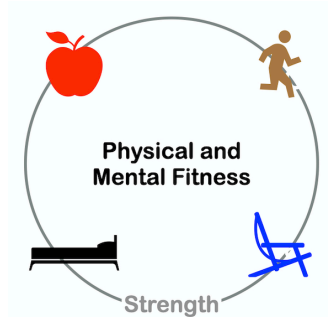
# Strength

Strength grows from proper nutrition, exercise, relaxation and sleep.

**A Story to Tell:** Life is constantly changing. The change may be forgiving or it may be an unrelenting challenge. The journey of change demands strength. Less is to flirt with failure.

Fitness is the strength to deal with life challenges. I can choose to be fit, to build strength to get through those challenges that bring about change. Fitness is awareness of mind and body, of self and needs. Fitness is forgiving of my fails, those times when my vision is poor and my footing is unsteady during storms of violent change. Fitness, too, lets me celebrate my wins. It is my ally on my journey through life.

Strength is a chain of links. Proper nutrition, exercise, relaxation, and sleep form the links in that chain. I recognize that I have almost complete control of diet and exercise to build strength. I begin simply by keeping nutritious foods, such as fruits, in plain view. I find an exercise that is an enjoyable escape from stress. I make time to relax and sleep. I monitor my progress. I see positive change. I am motivated. Strength is about self-care. The path to quality of life requires the body be strong so that the mind is able.



Strength sustains me on my journey of change. My journey is only bound by my beliefs. There are limits, though. I understand my strengths and my weaknesses. I recognize that my strength has limits. The journey will end. I will celebrate with my ally, fitness. Fitness is strength. Strength is a chain of links. How goes your journey? Have you met your ally?

**Why:** Practicing a healthy diet, physical exercise, relaxation, and good sleep habits improves physical, emotional, and mental well-being. When you feel good, challenges are more easily managed. Strength is about good self-care.

**How:** Find and practice plans for diet, exercise, relaxation, and sleep to fit your lifestyle while meeting the goals of good nutrition, aerobic exercise, stress reduction and adequate sleep.

- Consider your challenge and how it relates to diet, exercise, relaxation and sleep.
- Find and practice a healthy diet that fits your lifestyle yet lowers your health risks. Consider researched plans such as MyPlate, Healthy Eating Plate, Mediterranean, and DASH (Dietary Approaches to Stop Hypertension).
- Find and practice a physical exercise plan that fits your lifestyle and provides at least 2 hours and 30 minutes of moderate-intensity aerobic physical activity ideally spread evenly throughout the week.
- Find and practice a relaxation exercise, such as slow diaphragmatic breathing, progressive muscle relaxation, social resilience, and mindfulness-based stress reduction.
- Practice good sleep hygiene by keeping a consistent sleep-wake schedule, exercising daily and eliminating long naps and naps within a few hours of bedtime.

**Example:** I get anxious before and during high-stakes tests and that prevents me from doing as well as I could do. I need to find and practice a relaxation exercise.

- The challenge is to be relaxed before and while taking tests.
- Consider an easy relaxation exercise, such as diaphragmatic breathing, an exercise of slow controlled breathing. I put one hand on my chest and the other on my stomach. I slowly breathe so that the hand on my stomach moves up and down. I try to keep the hand on my chest from moving up and down. Each time I exhale, I focus on the word “relax.” Like any exercise I need to practice diaphragmatic breathing for several weeks before I master it. My plan is to practice it for about ten minutes before I go to sleep.
- Consider also an exercise plan to further reduce stress, diet plan to increase my energy, and good sleep to support the relaxation and improve my likelihood of doing even better on the test.
- Adjust or change any of the plans that are not working and monitor the changes.
- Just before a test, I practice diaphragmatic breathing thinking of the word “relax.”

*Strength is the capacity to break a Hershey bar into four pieces with your bare hands  
- and then eat just one of the pieces.”  
— Judith Viorst*

### Hero’s Journey: Strength



## Tell your story: Recall a past Strength challenge

**Objective:** Completing this exercise will help to link this new learning to prior learning, something you did with some success in the past, so as make Strength more memorable.

Strength grows from proper nutrition, exercise, relaxation and sleep.

Recall a past personal challenge where you successfully used the skill of Strength, perhaps relating to exercise, diet, relaxation, or sleep. Work on answering the following questions. These questions are presented as both *brief* questions and as *detailed* questions depending upon your time limitations and preferences. Writing your responses will help you to better organize your thinking. Feel free to work individually or in collaboration with another person on this exercise.

Brief questions:

1. What was your challenge?
2. How was your challenge related to diet, exercise, relaxation and/or sleep?
3. What made you feel you were successful meeting the challenge?

Detailed questions:

1. What was your challenge?
2. How was your challenge related to diet, exercise, relaxation and/or sleep?
3. If it was a diet, how was it “healthy” and how did it fit your lifestyle.
4. If it was a physical exercise plan, how did it fit your lifestyle yet provide at least 2 hours and 30 minutes of moderate-intensity aerobic physical activity throughout the week.
5. If it was a relaxation exercise, how did it relax you and fit into your lifestyle?
6. If it was good sleep hygiene, then what methods did you use and how did this fit into your lifestyle?

## Collaborate: Apply Strength to a current challenge

**Objective:** Completing this exercise with another person will encourage communication, empathy, and the ability to reach out while problem-solving a relevant challenge.

You are strongly encouraged to do this exercise with another person so that you become aware of how to work with people within a social support system, people who will work with you on real life challenges. Consider a challenge either you or perhaps someone you know has currently encountered.

Write the challenge in as much detail as necessary to allow you, and your associate, to answer the following questions. These questions are presented as both *brief* questions and as *detailed* questions depending upon your time limitations and preferences.

Brief questions:

1. What is your challenge?
2. How is your challenge related to diet, exercise, relaxation and/or sleep?
3. What is your goal?
4. What are the steps needed to reach your goal?

Detailed questions:

1. What is your challenge?
2. How does it relate to diet, exercise, relaxation and/or sleep.
3. Find and practice a healthy diet that fits your lifestyle yet lowers your health risks (Reedy, Krebs-Smith, Miller, Liese, Kahle, Park, & Subar, 2014).
  - Consider researched diet plans such as MyPlate (“ChooseMyPlate.gov,” 2018), Healthy Eating Plate (Willett, 2011), Mediterranean (Mitrou, Kipnis, Thiébaud, Reedy, Subar, Wirfält, ... & Schatzkin, 2007), and DASH—Dietary Approaches to Stop Hypertension (“DASH Eating Plan,” 2018).
4. Find and practice a physical exercise plan that fits your lifestyle and provides at least 2 hours and 30 minutes of moderate-intensity aerobic physical activity ideally spread evenly throughout the week (“Steps to Wellness,” 2012; “Global Recommendations on Physical Activity,” 2013).
5. Find and practice a relaxation exercise. Recognize that like any physical exercise, you will need to practice with these relaxation exercises to realize the results.
  - *Diaphragmatic Breathing* or eupnea is a simple relaxation exercise of slow breathing with focus on movement of the diaphragm. Put one hand on your chest and the other on your stomach. Breathe so that the hand on your stomach moves up and down. Try to keep the hand on your chest from moving up and down. As you exhale, focus on the word “relax.” (Chen, Huang, Chien, & Cheng, 2017; Ma, Yue, ... & Li, 2017)

- *Progressive Muscle Relaxation* (PMR) brings awareness of the body by focusing on slowly tensing and then relaxing muscle groups (Davis, Eshelman, & McKay, 2008).
  - *Social Resilience Model* (SRM) uses stabilization skills to reduce and prevent the symptoms of stress. In its simplest form, SRM focuses on accessing the parasympathetic system through several processes (Leitch & Sutton, 2013).
  - *Mindfulness-Based Stress Reduction* (MBSR) is the practice of bringing awareness to the present moment (Kabat-Zinn, 2005).
6. Practice good sleep hygiene by keeping a consistent sleep–wake schedule, exercising daily and eliminating long naps and naps within a few hours of bedtime (Elliot & Kuehl, 2007).
  7. How will you ensure that you have the belief to persist with the challenge?
  8. Will you create a goal to build the belief you can meet the challenge?
  9. Describe your goal.
  10. Is the goal reachable within a realistic time limit?
  11. Describe the steps that are needed to reach your goal.
  12. Do you have enough steps to mark your progress and build belief you can persist?

If you are working within a group environment, whether face-to-face group setting or an online group conferencing setting, consider posting your outcome with other groups' outcomes. Through this learning process, you can observe how social support systems apply positive coping skills to solve real life challenges.

## Own it: Reflecting on Strength

**Objective:** Completing this exercise will make the skills more understandable and therefore more workable for you.







1. You have applied the Strength skill to an instance that had occurred in your past. You have also applied the skill as group problem-based-learning to a current challenge. Now, reflect upon the skill. What is a word, words, or a phrase that best captures the idea of the skill of Strength. This is a good *oral*, or online, exercise in a group or classroom setting to determine if everyone is understanding the concept. It can be helpful to have someone facilitate this exercise. The facilitator makes sure everyone has an opportunity to describe the skill.
2. Reflect upon the skill of Strength and, in a few of your own words, summarize in *writing* what this positive coping skill means to you—how have you changed? You are attempting to adapt the meaning of the skill to something that is more useable and memorable to you. If you are working in a group setting, post your responses.
3. If more time is available, finding a memorable quotation can be a powerful way to personalize and adapt the skill. What would you use as a memorable quotation for the this skill? Yet, you need not necessarily be limited to words to personalize the skill. Perhaps identifying an element of nature, work of visual art, music, or even a mechanical tool makes the skill more memorable to you. Crafting your own art, tool, composition, or story may be more your style. If you are working in a group environment, post your results with others in the group and observe the results and recognize the power of diversity.







## How am I doing?

**Objective:** Completing this assessment will provide opportunity to monitor progress, adjust your learning, develop self-efficacy, and improve self-esteem.

Recall that the three exercises are organized around the storytelling concept of the “Hero’s Journey.” The Hero’s Journey is common to many epic stories that involve a hero who, facing a challenge, goes on an adventure, is victorious in meeting the challenge, and returns as a transformed person. Keeping your notes from the Tell your story, Collaborate, and Own it exercises can serve as a powerful future reminder, an epic story, as how you dealt with a challenge, as well as providing an opportunity to monitor your learning.

The following assessment allows you to monitor learning and track your changes as you continue to explore positive coping skills and social support. You are encouraged to compare these ongoing assessments to see how you have adapted to the learning and resilience.

<b>Learning Objectives</b>				
Evaluate how well the learning objectives are working for you. Answer by checking only one response to each of the following objectives.	  <b>Do not recall doing this</b>	 <b>Not a useful exercise</b>	 <b>Useful</b>	  <b>Very useful</b>
Relate a past challenge to the Strength resilience skill.				
Apply Strength, to a current challenge, with a member of your social support system.				
Redefine, in your own words, the meaning of Strength.				
Recognize the importance of developing personal resilience by using positive coping skills and social support system.				

<b>Change of Behavior</b>				
Evaluate how much you have changed. Answer by checking only one response to each of the following.	  <b>Worsened</b>	 <b>No change</b>	 <b>Improved</b>	  <b>Much improved</b>
Ability to apply positive coping resilience skills to personal challenges.				
Ability to reach out to a social support system to better deal with personal challenges.				
Ability to problem solve when dealing with personal challenges.				
Improvement of self-efficacy, the ability to persist in meeting a goal when dealing with a challenge.				
Improvement of self-esteem.				

## References

- Centers for Disease Control and Prevention. (2012). Steps to wellness: A guide to implementing the 2008 physical activity guidelines for Americans in the workplace. *Atlanta: Department of Health and Human Services.*
- Chen, Y. F., Huang, X. Y., Chien, C. H., & Cheng, J. F. (2017). The effectiveness of diaphragmatic breathing relaxation training for reducing anxiety. *Perspectives in psychiatric care, 53*(4), 329-336.
- ChooseMyPlate.gov. (2018, January 30). Retrieved from <https://www.choosemyplate.gov/>
- DASH eating plan. (2018, January 30). Retrieved from <https://www.nhlbi.nih.gov/health-topics/dash-eating-plan>
- Davis, M., Eshelman, E. R., & McKay, M. (2008). *The relaxation and stress reduction workbook*. New Harbinger Publications.
- Elliot, D., & Kuehl, K. S. (2007). *Effects of sleep deprivation on fire fighters and EMS responders*. International Association of Fire Chiefs.
- Kabat-Zinn, J. (2005). *Coming to our senses: Healing ourselves and the world through mindfulness*. Hachette UK.
- Leitch, L. & Sutton, L. (2013). *Social resilience model level 1 training*. Threshold GlobalWorks.
- Ma, X., Yue, Z. Q., Gong, Z. Q., Zhang, H., Duan, N. Y., Shi, Y. T., ... & Li, Y. F. (2017). The effect of diaphragmatic breathing on attention, negative affect and stress in healthy adults. *Frontiers in psychology, 8*, 874.
- Mitrou, P. N., Kipnis, V., Thiébaud, A. C., Reedy, J., Subar, A. F., Wirfält, E., ... & Schatzkin, A. (2007). Mediterranean dietary pattern and prediction of all-cause mortality in a US population: results from the NIH-AARP Diet and Health Study. *Archives of Internal Medicine, 167*(22), 2461-2468.
- Reedy, J., Krebs-Smith, S. M., Miller, P. E., Liese, A. D., Kahle, L. L., Park, Y., & Subar, A. F. (2014). Higher Diet Quality Is Associated with Decreased Risk of All-Cause, Cardiovascular Disease, and Cancer Mortality among Older Adults<sup>1, 2</sup>. *The Journal of nutrition, 144*(6), 881-889.
- Willett, W. (2011). *Eat, drink, and be healthy: the Harvard Medical School guide to healthy eating*. Simon and Schuster.
- World Health Organization. (2013). Global recommendations on physical activity for health. Geneva: WHO; 2010. ISBN, 1011132395, 60.

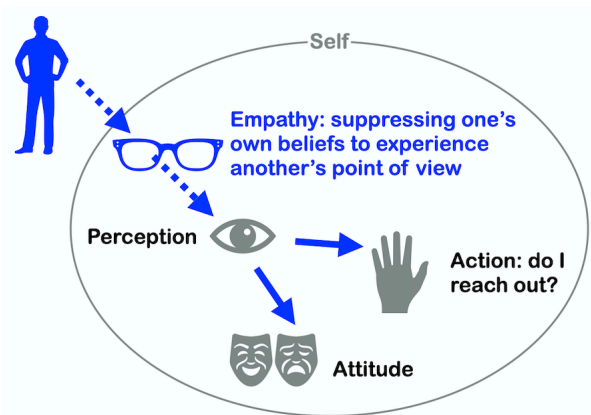


## Trust

Trust develops by using empathy to engage, reach out, and give support.

**A Story to Tell:** I learned trust as a toddler. Without it, I would not have survived. I learned, too, that my peers shape me to interact with the world as we perceive it. We become a community of one, trusting and sharing common values. If our values are honorable, we win. If our values are bad, we lose. As goes my peer group, so I go. Thus, I have learned to choose carefully with whom I want to spend time.

I learn of other people from other people. Empathy is the key that opens the lock into the lives of others. I walk the walk of another. I see through their eyes. Empathy is not sympathy. Empathy lets me understand what another experiences from their frame of reference. I have to suppress my beliefs so that I can interpret those of another. Then trust can develop by reaching out to engage and provide support. A challenging decision, trust. It is after all the substance of faith, a key to my inner self, my identity.



Support comes in many forms. As I face a challenge, I look to my strengths and weaknesses.

Where I find need, I find experts to provide insight. Each has a role to play in meeting the challenge. As one, they form a system, a social support system to meet the challenge. Yet, each person is one I can reach out to. They are my social support system.

My support system changes as I change. Some will remain in my social support system, those that are lifelong, perhaps family. There are new challenges. Still, everyone has a role to play in a system however big or small. Never underestimate the value a toddler's hug when facing a seemingly insurmountable challenge.

Identifying and sustaining a healthy support system becomes a continuous and lifelong process. I too may also play any of a variety of roles in other peoples' social support systems. By practicing and sharing positive coping skills I am making those interacting with me more resilient.

My social support system is a measure of my success, survival and legacy. Sustaining others sustains self. Together we share success, learn from failure, and cope with the challenges of life. There is a degree of trust in our relationships. We share a key. Look at your keys? With who would you entrust a key?

**Why:** Social support is considered one of the best protections from the effects of stress and suicide. Trust is foundational to all relationships, whether personal, professional or organizational.

**How:** Develop your social support system by identifying the challenge or challenges you may be facing. Consider people who would be helpful dealing with a challenge and the role each would play.

- Consider your challenge and identify your strengths and weaknesses to better identify your needs

and the support you bring.

- Consider people who best meet your needs while assuring you are comfortable reaching out to them and they are comfortable reaching out to you.
- Identify those individuals in your support system, roles they play, and how to contact them.
- Identify also the contributions you make to help sustain your support system.

**Example:** I have an uneasy feeling that one of my friends may be thinking about suicide. I am unsure how to handle this situation and need a plan on how to approach my friend.

- The challenge is to help a person who may be considering suicide (World Health Organization, 2016, pp. 131-149).
- Recognize that I am now part of my friend's social support system and I have a role to play.
- Recognize suicide is one of the leading causes of death for teens and young adults.
- Identify community resources.
- Contact resources to determine the best way to handle the situation.
- Be prepared to reach out to the person and listen.
- Question the person about the possibility of suicide.
- Persuade the person to get help.
- Refer the person to the identified resources for specialized help. Offer to get the person to assistance or call 911 if critical.
- Do a personal welfare check to best encourage a positive outcome.

Trust is the glue of life.  
—Stephen Covey

### Hero's Journey: Trust



## Tell your story: Recall a past Trust challenge

**Objective:** Completing this exercise will help to link this new learning to prior learning, something you did with some success in the past, so as make Trust more memorable.

Empathy develops by seeking to understand what another being is experiencing from their point of view. Trust develops by reaching out to engage and provide mutual support.

We have long recognized that reaching out and seeking assistance is a difficult and complex process. We see children reach out and experience the positive consequences of reaching out. That ability to reach out and find social support can have an important influence on the ability to be resilient (Williams, Lindsey, Kurtz, & Jarvis, 2001). When and where we reach out, the kinds of problems we seek help, our attitudes and the attitudes of people offering help all impact us (Gourash, 1978). Trust is foundational to all relationships, whether personal, professional or organizational (Rodwell, McWilliams, & Gulyas, 2017; Serrat, 2017).

Recall a past personal challenge where you successfully used the skill of Trust or something similar to Trust, where you reached out for social support. Work on answering the following questions. These questions are presented as both *brief* questions and as *detailed* questions depending upon your time limitations and preferences. Writing your responses will help you to better organize your thinking. Feel free to work individually or in collaboration with another person on this exercise.

Brief questions:

1. What was your challenge?
2. What made you to reach out to others?
3. Did you keep the social support system following the challenge?

Detailed questions:

1. What was your challenge?
2. With regard to the challenge, what were your perceived strengths and weaknesses?
3. Did you use this understanding of strengths and weaknesses to better identify the individual or individuals in your social support system?
4. With regard to the challenge, what allowed you to reach out to others?
5. What do you think allowed them to reach out to you?
6. With regard to the challenge, did you use empathy as an aid to communication and critical thinking? Remember that empathy is not sympathy, rather it is being able to “see through the eyes” of another person and experience their “point of view.”
7. Did you keep the social support system following the challenge?
8. If so, what contributions did you make to sustain the support system over time?

## **Collaborate: Apply Trust to current needs or a specific challenge**

**Objective:** Completing this exercise with another person will encourage communication, empathy, and the ability to reach out while problem-solving a relevant challenge.

Many of us are still socialized to “suck it up and drive on.” If we continue this attitude it could have serious long term consequences. The healing value of social support systems is particularly important for people who have survived horrific events (Bloom, 1998; Brewin, Andrews, & Valentine, 2000; Koenen, Stellman, Stellman, & Sommer Jr, 2003). Seligman (2006) noted that people who have at least one person, whom they can call in the middle of the night to tell their troubles, go on to have better health than friendless people. Ordinary social contact is a potential buffer against illness. Alternatively, people who isolate themselves do not fair as well. The lack of a social support system may increase the risk of developing PTSD after a traumatic event or events.

With your challenge in mind, consider empathy, reaching out to others, letting others reach out to you, and the social support system. Empathy is often described as putting aside one's own beliefs and instead "seeing through the eyes of another" or "walking in the shoes of another." It is important to understand that empathy is not the same as sympathy, rather it is a critical thinking skill to help give you insight. As an example, notice that every *A Story to Tell* segment that introduced every positive coping skill was written in the first person, I. By writing these in first person, you were encouraged to try to see through the "eyes" of the person writing a story and ask the question, "Just who is this person?" Maybe you were put off by the person, or maybe you wanted to reach out and get to know more about the person. This was intentional to encourage you into thinking about empathy. You have been practicing empathy. Reading can be a very good way to practice empathy.

The social support system is arguably our most important protective factors when coping with adversity. Notice that we refer to a social support system. System, by definition, is a group of interacting elements forming a complex whole. Thus, each person within our social support system plays a specific role, perhaps addressing a personal need, and forms a tight and supportive community.

How then is does one develop a social support system? When I think social support system, I think who might I want in my social support system to help me deal with a challenge I am facing. To do this, I must consider the challenge, decide which people have the desired skills to help solve the challenge, and decide if I am comfortable reaching out to those people. This last part, the reaching out, can be difficult because I need to be able to empathize with the person to be able to reach out. I have to be able to trust that person.

Let us look at one way to learn to develop our own social support systems. Consider a challenge either you or perhaps someone you know is facing as the motivation for developing a social support system. You are strongly encouraged to do this exercise with at least one person so that you become aware of how to work with people within a social support system, those people who will work with you on real life challenges. Write the challenge in as much detail as necessary to allow you, and your associate, to answer the following questions.

1. What is your challenge?
2. What are your perceived strengths and weaknesses? Consider your challenge and identify your strengths and weaknesses to better identify your needs.
3. Who meets your needs? Consider people who best meet your needs while assuring you are comfortable reaching out to them and they are comfortable reaching out to you.
4. What roles do they play? Identify those individuals in your support system, roles they play, and how to contact them. Some people may have significant roles in your social support system, while others may have more limited roles.

If you are working with a larger group of people, whether in person or online, this exercise can be more richly explored. First, treat everyone's challenge anonymously by writing each challenge on a small piece of paper and then placing the papers into a hat or some container. Next, without reading the challenges, have each person in the class pick a challenge from the container. Everyone then pairs into groups of two and each group will work with a picked challenge. By exploring someone else's challenge we have to "see through the eyes" of the person who wrote the challenge in order to understand what that person was trying to convey — that's empathy! Next, keep in mind that the person who wrote the challenge is reaching out to you to help solve the challenge — that's trust! Interpret the challenge to the best of your abilities, and write your responses to the questions above to create the outcome to the challenge.

If you are working within a group environment, then consider posting your outcome with other groups' outcomes so that everyone can view the posted materials. Through this learning process, you can observe how social support systems apply positive coping skills to solve real life challenges.

## Own it: Reflecting on Trust

**Objective:** Completing this exercise will make the skills more understandable and therefore more workable for you.







1. You have applied the Trust skill to an instance that had occurred in your past. You have also applied the skill as group problem-based-learning to a current challenge. Now, reflect upon the skill. What is a word, words, or a phrase that best captures the idea of the skill of Trust. This is a good *oral*, or online, exercise in a group or classroom setting to determine if everyone is understanding the concept. It can be helpful to have someone facilitate this exercise. The facilitator makes sure everyone has an opportunity to describe the skill.
2. Reflect upon the skill of Trust and, in a few of your own words, summarize in *writing* what this positive coping skill means to you—how have you changed? You are attempting to adapt the meaning of the skill to something that is more useable and memorable to you. If you are working in a group setting, post your responses.
3. If more time is available, finding a memorable quotation can be a powerful way to personalize and adapt the skill. What would you use as a memorable quotation for the this skill? Yet, you need not necessarily be limited to words to personalize the skill. Perhaps identifying an element of nature, work of visual art, music, or even a mechanical tool makes the skill more memorable to you. Crafting your own art, tool, composition, or story may be more your style. If you are working in a group environment, post your results with others in the group and observe the results and recognize the power of diversity.







## How am I doing?

**Objective:** Completing this assessment will provide opportunity to monitor progress, adjust your learning, develop self-efficacy, and improve self-esteem.

Recall that the three exercises are organized around the storytelling concept of the “Hero’s Journey.” The Hero's Journey is common to many epic stories that involve a hero who, facing a challenge, goes on an adventure, is victorious in meeting the challenge, and returns as a transformed person. Keeping your notes from the Tell your story, Collaborate, and Own it exercises can serve as a powerful future reminder, an epic story, as how you dealt with a challenge, as well as providing an opportunity to monitor your learning.

The following assessment allows you to monitor learning and track your changes as you continue to explore positive coping skills and social support. You are encouraged to compare these ongoing assessments to see how you have adapted to the learning and resilience.

<b>Learning Objectives</b>				
Evaluate how well the learning objectives are working for you. Answer by checking only one response to each of the following objectives.	  <b>Do not recall doing this</b>	 <b>Not a useful exercise</b>	 <b>Useful</b>	  <b>Very useful</b>
Relate a past challenge to the Trust resilience skill.				
Apply Trust, to a current challenge, with a member of your social support system.				
Redefine, in your own words, the meaning of Trust.				
Recognize the importance of developing personal resilience by using positive coping skills and social support system.				

<b>Change of Behavior</b>				
Evaluate how much you have changed. Answer by checking only one response to each of the following.	  <b>Worsened</b>	 <b>No change</b>	 <b>Improved</b>	  <b>Much improved</b>
Ability to apply positive coping resilience skills to personal challenges.				
Ability to reach out to a social support system to better deal with personal challenges.				
Ability to problem solve when dealing with personal challenges.				
Improvement of self-efficacy, the ability to persist in meeting a goal when dealing with a challenge.				
Improvement of self-esteem.				

## References

Bloom, S. L. (1998). By the crowd they have been broken, by the crowd they shall be healed: The social transformation of trauma. *Posttraumatic growth: Positive changes in the aftermath of crisis*, 179-213.

Brewin, C. R., Andrews, B., & Valentine, J. D. (2000). Meta-analysis of risk factors for posttraumatic stress disorder in trauma-exposed adults. *Journal of consulting and clinical psychology*, 68(5), 748.

Gourash, N. (1978). Help-seeking: A review of the literature. *American journal of community psychology*, 6(5), 413-423.

Koenen, K. C., Stellman, J. M., Stellman, S. D., & Sommer Jr, J. F. (2003). Risk factors for course of posttraumatic stress disorder among Vietnam veterans: a 14-year follow-up of American Legionnaires. *Journal of consulting and clinical psychology*, 71(6), 980.

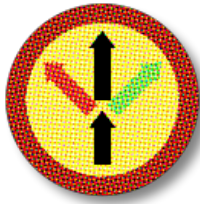
Rodwell, J., McWilliams, J., & Gulyas, A. (2017). The impact of characteristics of nurses' relationships with their supervisor, engagement and trust, on performance behaviours and intent to quit. *Journal of advanced nursing*, 73(1), 190-200.

Seligman, M. E. (2006). *Learned optimism: How to change your mind and your life*. Vintage.

Serrat, O. (2017). Building trust in the workplace. In *Knowledge Solutions* (pp. 627-632). Springer, Singapore.

World Health Organization. (2016). mhGAP Intervention Guide Mental Health Gap Action Programme Version 2.0 for mental, neurological and substance use disorders in non-specialized health settings. *World Health Organization*, 131-149.

Williams, N. R., Lindsey, E. W., Kurtz, P. D., & Jarvis, S. (2001). From trauma to resiliency: Lessons from former runaway and homeless youth. *Journal of Youth Studies*, 4(2), 233-253.

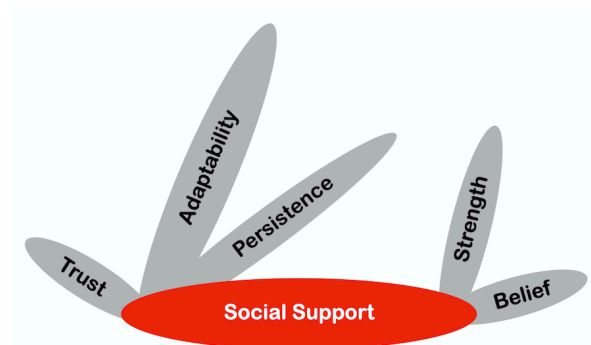


# Adaptability

Adaptability is the flexibility to meet a challenge.

**A Story to Tell:** Surviving birth is heroic. Though to thrive meant that I needed to adapt. Adaptability became a belief where I learned about change. Adaptability is my Swiss Army knife, a “MacGyver” that comes up with solutions to challenges.

Support comes in many ways. It may be a close group of people who sustain me as I sustain them. It may be a mentor that guides me through a challenge. Or, it may be a real Swiss Army knife that provides support. Whatever the means, adaptability provides confidence and understanding that I can meet the challenge. There are times when I alter the challenge to make it more positive, workable. I have adapted. When I am unable to change the challenge, I change the way I perceive it. My perception is an expectation of success. My success is a reachable goal, a belief. As my attitude improves, the challenge becomes more manageable. I have adapted.



Challenges, both personal and as a community, may be intuitively simple or increasingly complex. If the challenge is complex, I research the challenge to determine if a skillful solution is already developed. Or, perhaps I can adapt the skillful solution to better meet the challenge. I discuss the challenge and a potential skillful solution with others to be sure the idea is understood and can meet its intended purpose. I may find myself blending other skills to create an attainable goal. If what I adapt affects others, I may decide to include a definition about the skill, why the skill meets the challenge, and how the skill meets the challenge. We are after all a community of one. Adaptability is my Swiss Army knife, a “MacGyver” that meets my challenges. How have you adapted?

**Why:** Those believing they have the ability to succeed are more likely to pursue a challenge as something to be mastered rather than as a threat to be avoided. Developing the skill to best adapt to a challenge gives you confidence and control. You are empowered — you own it!

**How:** Developing your skill can be a goal setting process that calls for planning, cooperation, persistence and control to fully define and develop.

- Consider your challenge and research the idea. Perhaps a skillful solution is already developed.
- Discuss the skill idea with others to be sure the idea is understood and can meet its intended purpose.
- Consider creating the skill as a goal that is reachable along with the steps necessary to reach the goal.
- Steps may include a definition *About* the skill, *Why* the skill meets the challenge, and *How* the skill meets the challenge.

**Example:** Using the idea of “Who am I going to call when ...,” I want to extend my social support system

to include people who have abilities I may need. I will start with the simplest and move to the most essential members of my social support system. I further want to adapt my phone contact app to include these people in my contact list.

- The challenge is to extend my social support system using my phone contact list. *(About...)*
- Preparing for the future shapes me to adapt to the unexpected. *(Why...)*
- Research my phone contact app and begin with the easier contacts moving to more complex. *(How...)*
- Consider services such as electricity, water, gas, plumber, and roadside assistance.
- Consider healthcare such as physician, dentist, and veterinarian.
- Consider emergency services such police, fire, and poison control.
- Consider family, associates, and friends and the roles they play in the social support system.
- Consider In Case of Emergency (ICE) contact.

*Adaptability is not imitation. It means power of resistance and assimilation.*  
—Mahatma Gandhi

### Hero's Journey: Adaptability



## Tell your story: Recall a past Adaptability challenge

**Objective:** Completing this exercise will help to link this new learning to prior learning, something you did with some success in the past, so as make Adaptability more memorable.

Adaptability is the confidence and understanding to create and pursue a skillful outcome that best meets the challenge.

Maxwell is credited with saying “Change is inevitable. Growth is optional.” Changes bring about challenges from the closely personal to perhaps the far ranging challenges relating to social–ecological systems impacting us as a civilization. (Walker, Holling, Carpenter, & Kinzig, 2004). An adaptable person is able to adjust to different conditions. The adaptable person has the confidence and understanding to create and pursue a skillful outcome that best meets the challenge. We are all different and what works for one

person may not work for another, so an adaptable person will seek out positive coping mechanisms and solutions that best meet personal needs (Six myths, n.d.).

Using the definition of Adaptability from the flashcard, recall a past personal challenge where you successfully used the skill of Adaptability or something similar to Adaptability. Work on answering the following questions. These questions are presented as both *brief* questions and as *detailed* questions depending upon your time limitations and preferences. Writing your responses will help you to better organize your thinking. Feel free to work individually or in collaboration with another person on this exercise.

Brief questions:

1. What was your challenge?
2. Did you in any way do any research to see if a skillful solution had been already developed?
3. Did you talk with others to be sure the adapted skill was understood and could meet its intended purpose?
4. What was the adapted skill?

Detailed questions:

1. What was your challenge?
2. Did you in any way do any research to see if a skillful solution had been already developed?
3. Did you discuss the skillful solution with any others to be sure the idea was understood and could meet its intended purpose?
4. Did you develop or consider creating the skill as a goal that is reachable along with the steps necessary to reach the goal?
5. What was your goal and what were the steps that were followed to meet the goal?
6. Did you give the skill a title, include a definition *About* the skill, *Why* the skill would meet the challenge, and *How* the skill would meet the challenge?

## Collaborate: Apply Adaptability to a current challenge

**Objective:** Completing this exercise with another person will encourage communication, empathy, and the ability to reach out while problem-solving a relevant challenge.

You are strongly encouraged to do this exercise with another person so that you become aware of how to work with people within a social support system, people who will work with you on real life challenges. Consider a challenge either you or perhaps someone you know has currently encountered. Write the challenge in as much detail as necessary to allow you, and your associate, to answer the following questions. These questions are presented as both *brief* questions and as *detailed* questions depending upon your time limitations and preferences.

Brief questions:

1. What is your challenge?
2. Can you research the challenge to see if a possible solution already exists?
3. Can you talk with others to be sure the adapted skill is understood and can meet its intended purpose?
4. What is the adapted skill?

Detailed questions:

1. What is your challenge?
2. Consider your challenge and research the idea. Where might you look for potential solutions?

3. Discuss the skill idea with others to be sure the idea is understood and can meet its intended purpose. The skill idea or “sharing of a vision” may be considered a leadership process, especially if you intend to get help from others. According to Kouzes and Posner (2009), to share your vision you “envision the future” through possibilities and “enlist others in the dream” by appealing to shared goals. These individuals play an important role in providing you with perspective as to whether you appear to be on the right track. As there appears to be a relationship between resilience and leadership (Bartone, Kelly, & Matthews, 2013), who will you work with to best assure you have a skillful solution?
4. Do you want to create the skill as an attainable goal along with the steps necessary to reach the goal?
5. What is the goal and what are the steps?
6. If you intend to share the skill with others, how will you make the skillful solution more understandable? Will you create a definition *About* the skill, *Why* the skill meets the challenge, and *How* the skill meets the challenge?

If you are working within a group environment, whether face-to-face group setting or an online group conferencing setting, consider posting your outcome with other groups’ outcomes. Through this learning process, you can observe how social support systems apply positive coping skills to solve real life challenges.

## Own it: Reflecting on Adaptability

**Objective:** Completing this exercise will make the skills more understandable and therefore more workable for you.

1. You have applied the Adaptability skill to an instance that had occurred in your past. You have also applied the skill as group problem-based-learning to a current challenge. Now, reflect upon the skill. What is a word, words, or a phrase that best captures the idea of the skill of Adaptability. This is a good *oral*, or online, exercise in a group or classroom setting to determine if everyone is understanding the concept. It can be helpful to have someone facilitate this exercise. The facilitator makes sure everyone has an opportunity to describe the skill.
2. Reflect upon the skill of Adaptability and, in a few of your own words, summarize in *writing* what this positive coping skill means to you—how have you changed? You are attempting to adapt the meaning of the skill to something that is more useable and memorable to you. If you are working in a group setting, post your responses.
3. If more time is available, finding a memorable quotation can be a powerful way to personalize and adapt the skill. What would you use as a memorable quotation for the this skill? Yet, you need not necessarily be limited to words to personalize the skill. Perhaps identifying an element of nature, work of visual art, music, or even a mechanical tool makes the skill more memorable to you. Crafting your own art, tool, composition, or story may be more your style. If you are working in a group environment, post your results with others in the group and observe the results and recognize the power of diversity.

*Be willing to change because life won't stay the same.*

— Anonymous

As you complete this exercise, reflect for a moment on the process you have just completed whereby you had the challenge of coming up with a word, words, or a phrase that best captured the idea of Adaptability. You reinterpreted the Adaptability skill into your own words. In doing so, you have adapted the skill. And, you did this for the other positive coping skills of Belief, Persistence, Strength, and Trust.







You have been successfully applying and practicing the Adaptability skill. You made each of the skills your own. You are empowered — you own it! Because you have also worked in a group, perhaps your family, recognize all of you have served as mentors. This role sharing strengthens and sustains the social support system.







## How am I doing?







**Objective:** Completing this assessment will provide opportunity to monitor progress, adjust your learning, develop self-efficacy, and improve self-esteem.

Recall that the three exercises are organized around the storytelling concept of the “Hero’s Journey.” The Hero's Journey is common to many epic stories that involve a hero who, facing a challenge, goes on an adventure, is victorious in meeting the challenge, and returns as a transformed person. Keeping your notes from the Tell your story, Collaborate, and Own it exercises can serve as a powerful future reminder, an epic story, as how you dealt with a challenge, as well as providing an opportunity to monitor your learning.

The following assessment allows you to monitor learning and track your changes as you continue to explore positive coping skills and social support. You are encouraged to compare these ongoing assessments to see how you have adapted to the learning and resilience.

<b>Learning Objectives</b>				
Evaluate how well the learning objectives are working for you. Answer by checking only one response to each of the following objectives.	  <b>Do not recall doing this</b>	 <b>Not a useful exercise</b>	 <b>Useful</b>	  <b>Very useful</b>
Relate a past challenge to the Adaptability resilience skill.				
Apply Adaptability, to a current challenge, with a member of your social support system.				
Redefine, in your own words, the meaning of Adaptability.				
Recognize the importance of developing personal resilience by using positive coping skills and social support system.				

<b>Change of Behavior</b>				
Evaluate how much you have changed. Answer by checking only one response to each of the following.	  <b>Worsened</b>	 <b>No change</b>	 <b>Improved</b>	  <b>Much improved</b>
Ability to apply positive coping resilience skills to personal challenges.				

<b>Change of Behavior</b>				
Evaluate how much you have changed. Answer by checking only one response to each of the following.	  <b>Worsened</b>	 <b>No change</b>	 <b>Improved</b>	  <b>Much improved</b>
Ability to reach out to a social support system to better deal with personal challenges.				
Ability to problem solve when dealing with personal challenges.				
Improvement of self-efficacy, the ability to persist in meeting a goal when dealing with a challenge.				
Improvement of self-esteem.				

### References

Bartone, P. T., Kelly, D. R., & Matthews, M. D. (2013). Psychological hardiness predicts adaptability in military leaders: A prospective study. *International Journal of Selection and Assessment*, 21(2), 200-210.

Kouzes, J. M., & Posner, B. Z. (2009). *The student leadership challenge: Five practices for exemplary leaders* (Vol. 167). John Wiley & Sons.

Six myths about stress. (n.d.). Retrieved from <https://www.apa.org/helpcenter/stress-myths.aspx>

Walker, B., Holling, C. S., Carpenter, S., & Kinzig, A. (2004). Resilience, adaptability and transformability in social-ecological systems. *Ecology and society*, 9(2).

# SECTION 2

## STEM RESILIENCE AND SOCIAL SUPPORT

The preceding Learning to be Resilient should be explored before this optional STEM (Science, Technology, Engineering, and Mathematics) exercise. Discover how technology gives us insight on developing a social support system to deal with our challenges while learning about the Internet of Things (IoT) using visual programming (Node-RED). Because of its educational focus, this exercise uses the low-cost Raspberry Pi computer. If you do not have a Raspberry Pi computer available, you can still complete all of the exercises using either a Macintosh or Windows computer -- see how to install Node-RED below.

### Raspberry Pi OS

#### 1. Resilience Prep

Complete a Resilience Learning module, such as the Fast-track--Two Skills.

#### 2. STEM Learning

Work on the “STEM Approach to Examine Resilience and Social Support” workbook exercises and supplement with the videos.

- [STEM, Resilience, and Raspberry Pi Setup, Part 1.](#)
- [STEM, Resilience, MQTT, and Node-RED, Part 2.](#)
- [STEM, Resilience, Node-RED, and Internet of Things, Part 3.](#)

### Mac OS

#### 1. Resilience Prep

Complete a Resilience Learning module, such as the Fast-track--Two Skills.

#### 2. Install Node-RED on Mac

Brief, simple Node-RED install for Mac OS. [Node-RED Install.](#)

#### 3. STEM Learning

Though you are not using a Raspberry Pi, view the video to discover the positive coping resilience skills we use setting up a computer. And, discover how a technology system gives us insight on how to develop a social support system to deal with our challenges.

- [STEM, Resilience, and Raspberry Pi Setup, Part 1.](#)
- Work on the “STEM Approach to Examine Resilience and Social Support” workbook exercises and supplement with the videos.
- [STEM, Resilience, MQTT, and Node-RED, Part 2.](#)
- [STEM, Resilience, Node-RED, and Internet of Things, Part 3.](#)

### Windows OS

#### 1. Resilience Prep

Complete a Resilience Learning module, such as the Fast-track--Two Skills.

#### 2. Install Node-RED on Windows

Brief, simple Node-RED install for Windows 10. [Node-RED Install.](#)

#### 3. STEM Learning

Though you are not using a Raspberry Pi, view the video to discover the positive coping resilience skills we use setting up a computer. And, discover how a technology system gives us insight on how to develop a social support system to deal with our challenges.

- [STEM, Resilience, and Raspberry Pi Setup, Part 1.](#)
- Work on the “STEM Approach to Examine Resilience and Social Support” workbook exercises and supplement with the videos.
- [STEM, Resilience, MQTT, and Node-RED, Part 2.](#)
- [STEM, Resilience, Node-RED, and Internet of Things, Part 3..](#)



## STEM Approach to Examine Resilience and Social Support

**A Story to Tell:** Few would challenge the idea that technology is changing us. Technology has rapidly and dramatically changed the way we work, socialize, and communicate. Can we also look to technology to enable us to better adapt to these rapid changes?

While we may agree technology is changing us, there is debate as to whether technology is unifying us or alienating us from one another. This is important because how we cope with stress related issues depends upon our personal resilience and social support system. Let us first define resilience as the development and use of skills needed to manage stress in an optimal way (Resilient, 2018). Let us further consider the view of the World Health Organization (WHO). WHO looks at resilience by recognizing the role of protective factors relative to suicide risk factors at both the personal and community level. A key protective factor is the social support system. A healthy support system is where we both give and receive support. Another factor is spirituality where it provides a socially united and supportive community with a shared set of values. And, finally, having lifestyle practices of positive coping strategies, good self-esteem, self-efficacy and effective problem solving-skills. This includes the ability to reach out and find help when needed (Suicide, 2014).

The social support system is considered an essential protective factor when coping with challenges and adversity. System, by definition, is a group of interacting elements that form a complex whole. If we apply the definition of system to social support, then each person within our social support system has a specific role to play in the system. As a complex whole, the social support system forms a tight and supportive community that we can reach out to. Reaching out is two-way action. There is also an expectation that we will sustain those in our social support system as they sustain us. One way that we can sustain our social support system is practicing and sharing positive coping strategies. We consider these positive coping skills because our intent is to take personal challenges and create a more positive and less stressful outcomes. We title these skills Belief, Persistence, Strength, Trust, and Adaptability for our learning. What is Belief when we are talking resilience. The way we perceive things is shaped by our beliefs. Beliefs control our actions and our attitude. Attitude is the way we feel about something. We may need to persist to bring about a more positive belief. That is our next skill, Persistence, facing a challenge with the belief we will ultimately succeed. Followed by Strength, the physical aspect of our mental armor contributing to good self-care that includes diet, exercise, relaxation and sleep. Then, Trust the skill of reaching out and developing and sustaining a social support system. And, lastly Adaptability, that we don't forget it's not the strongest nor fastest, but most adaptable that ultimately survives. These skills serve as a personal protective factor and help us and our social support systems. With practice, we become more effective and successful problem solvers thus improving our self-efficacy and self-esteem. Self-efficacy is a belief in one's ability to complete tasks and reach a goal. Whereas, self-esteem is a favorable impression of oneself and may be a consequence of self-efficacy. We now have a shared idea of what it means to be resilient and the importance of a social support system.

Thus, the challenge and the goal of this exercise is to *determine if current technology can serve as a means to better understand resilience and the social support system.*

**About:** A substantial body of evidence-based research supports both resilience and effective learning. The resilience skills presented here are representative of this research as are the methods for learning these skills. We refer to these resilience skills as positive coping skills because our intent is to take a personal challenge and create a more positive and less stressful outcome. In addition to donning this mental armor to better protect us from stressful challenges, there is the added benefit that we are preparing ourselves for educational success. These skills and the associated learning methods will contribute to academic success (Galatzer-Levy, Burton, & Bonanno, 2012; Hartley, 2011; Martin & Marsh, 2006; Martin & Marsh, 2008).

STEM focuses heavily on the subjects of Science, Technology, Engineering, and Mathematics. The STEM learning is intended to increase interest and literacy in the areas of science and technology and encourage higher education and associated careers. Falling well within a STEM technology curriculum, this exercise introduces the concepts of resilience and social support without adding appreciable time to existing STEM initiatives. The further benefit of “transfer-of-learning” of subject material outside of the traditional STEM curricula allows us to better understand that learning from one discipline can be applied to another discipline. Our intent, then, is to blend the STEM discipline with the discipline of resilience and social support.

**How:** Our social support system is expected to have the distinct purpose of helping us cope with challenges and adversity. Often, a family member or members, close friend and associate will be a part of our social support system. There are many methods that connect us. Yet, wouldn't it be nice to have the opportunity to share the thought “I am thinking about you” with those in our social support system? That is the intent of this technology, to share this simple idea of “thinking about you” without any expectation of a complicated reply. Could we do this as a text message to the mobile phones of everyone in the social support system? Yes, of course. But, recall that our goal is to take an educational approach to exploring technologies. We expect to learn something about ourselves and technology from this STEM exercise. Finding parallels in communications we use as humans and those of technology could give us a better sense of how we communicate. An outcome might be an understanding of empathy, a survival skill, that allows us insight into another's world.

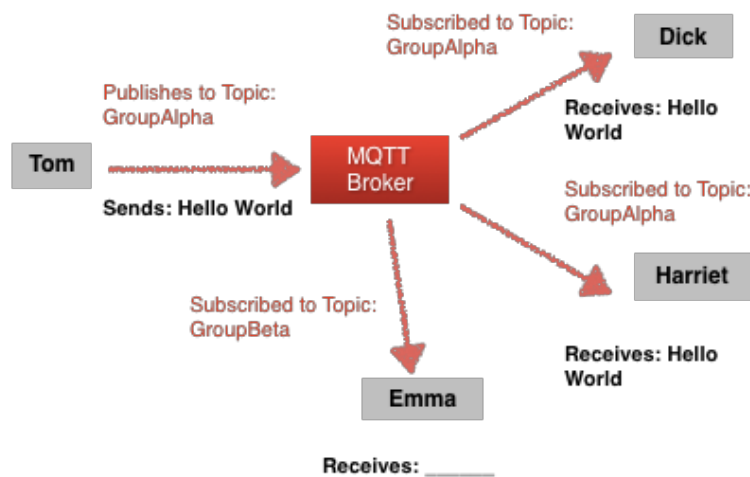
Empathy is often described as putting aside one's own beliefs and instead “seeing through the eyes of another” or “walking in the shoes of another.” It is important to understand that empathy is not the same as sympathy, rather it is a critical thinking skill to help give us insight. This creates a bridge to understanding and communication. Therefore our focus in this exercise is more about the process of personal change than on the development of a technology device. Our technology will be relatively simple and minimal. Remember, our desire is to provide simple and unimposing communication between people in our social support system.

In this exercise, you collaborate with other people. Who you want to work with is up to you, but consider someone with whom you are comfortable communicating such as a family member, friend, or associate. You will also be working on another type of communication, an entirely machine-based method of communication called MQTT.

MQTT is a simple messaging transport protocol for communicating between devices using a wireless network or the Internet (MQTT, n.d.). MQTT does not require extensive programming nor resources, making it ideal for data exchanges in Machine-to-Machine (M2M) and Internet-of-Things (IOT) where communication devices need to exchange data with each other. These devices, called clients, communicate by joining, or subscribing, to a central communication point, called a broker, that dispatches messages between the clients. The client that sends, or publishes, a message to the broker,

does so with an identifying name, called a topic, along with the message. Each client wishing to receive the message needs to be subscribed to that topic. The topic becomes the common identifier allowing each subscribed client to continue to receive messages sent by the broker. If we look to parallels with our social support system, we might consider each client to be a personal member of a social support system. So, let us assume that MQTT will serve as a workable communication protocol, a technology method we will use for exchanging information within our social support system.

How might this work? Let's say that Tom sends the message "Hello World" using the topic name "GroupAlpha" to an MQTT broker. Because Dick and Harriet are also subscribed to the topic "GroupAlpha" they will receive the message. But, Emma happens to be subscribed to the topic "GroupBeta" and will therefore not receive any message unless it originates from the topic "GroupBeta."



We next need to identify a tool that will use MQTT to allow the social support system to share the simple message of "thinking about you." This development tool needs to be able to connect devices and online services in support of Internet of Things (IoT) without the need of extensive programming. One such tool is Node-RED. Node-RED works in conjunction with our Web browser to form a work area, called a canvas, for developing our activity, or program flow (Node-RED, n.d.). Node-RED contains a menu, called a palette, of icon-like objects, called nodes, that we can drag and drop on to our canvas and connect together. Each node is specialized and provides a different function or operation. For example, a button node could be used to start an action that is connected to an MQTT node that is used to publish a message to a broker. While a node brings a lot of functionality without any complex programming, a node may still require some adjustments to make it work for our specific needs. For example, the MQTT publish node will need to be told the name of the MQTT broker and the topic we want to use for our social support system.

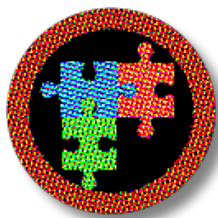
A problem that can be broken down into a series of simpler steps can likely be developed into a graphical flow of specialized nodes using Node-RED without the need for complex programming. Our program will, however, require that we assemble several nodes, adjust them, and connect them. All together, these nodes will permit us to send and receive a simple "thinking about you" message with people in our social support system.

Finally, we need to consider a physical technology device that contains Node-RED and can use MQTT for communication. As our focus is on the learning process, we will look to a minimal technology that provides a simple pathway for using MQTT. The ESP8266 and ESP32 are very common "minimalist"

devices, that is, small, low power, low cost, and have the technology resources to meet our needs. An internet search will reveal that there are comparably developed “thinking about you” systems using the ESP8266 that are well worth reviewing (Michel, 2015). But, these devices would require considerably more technology support, such as soldering, and more complex programming that is better saved for a later advanced exercise.

Our alternative is to consider a simple, low cost computer-based system that will permit rapid development of MQTT communication without the need of more complex programming. The Raspberry Pi 3 or 4 provides us with sufficient resources to fully develop our technology without additional support and is heavily supported as an educational tool (Raspberry, n.d.). Raspberry Pi 3 is a minimalist \$35 (USD) single-board computer that we supplement with a keyboard, mouse, 5 volt power supply, and an HDMI compatible monitor or TV. The Raspberry Pi, like most computers, requires an operating system (OS) that supports applications such as a Web browser. The most common Raspberry Pi operating system, Raspberry Pi OS, renamed from Raspbian, can be freely downloaded or purchased already installed on a microSD card and plugged into the Raspberry Pi. One of the many niceties of the Raspberry Pi OS environment, called NOOBS (New Out Of Box Software), is a graphical user interface complete with all of the application tools, including Node-RED, to develop and apply our MQTT system. Alternatively, if you do not have a Raspberry Pi, Node-RED can be installed on Windows, Macintosh, and Linux computers. The Raspberry Pi Foundation has also made available a downloadable Raspberry PI desktop, with educational software, for Windows and Macintosh computers.

As we work with the technology, we also want to be aware of the positive coping skills that make us resilient. Each of us may find that one or more resilience skills are used for each exercise. You want to keep track of your skill use. As you complete the exercise, you are asked which of the skills you used. Remember that our social support system is one of our most important protective factors in our mental armor. So, when you share the skills with someone in your social support system, you have begun the process of sustaining your social support system.



## 1 - Raspberry Pi Setup

**A Story to Tell:** The social support system is our most important sustaining element when coping with challenges and adversity. System, by definition, is a group of interacting elements forming a complex whole. Applying the idea of system to social support, each person within our social support system has a role to play, perhaps addressing a personal need, and forms a tight and supportive community that we can reach out to. We can consider the Raspberry Pi as a technology system of interacting elements requiring the Raspberry Pi board, NOOBS, a keyboard and mouse, monitor, and power supply. Like our social support system, each element in the technology system has a role to play and serves a specific purpose that forms a complex whole.

**Objectives:** Recall the challenge and the goal of this exercise is to *determine if current technology can serve as a means to better understand resilience and the social support system*. There are a number of objectives, or steps, that help us achieve that goal to include:

- Define the concept of a system.
- Understand the concept of the roles that different elements play within a system by comparing a Raspberry Pi system to that of a social support system.
- Apply through technology the skills of Belief, Persistence, Strength, Trust, and Adaptability.

**Raspberry Pi setup:** There are web sites and YouTube tutorials that provide detailed step-by-step builds for getting the Raspberry Pi fully operational (Getting started, n.d.; Stem, resilience, Node-RED, and the Internet-of-Things, n.d.). We will therefore simply provide an overview to the process as a general guideline. Completing these steps helps to explain the goal and objectives.

1. Collect the system hardware, to include a Raspberry Pi 3 or 4, USB keyboard, USB mouse, 5 Volt 2.5 Ampere Raspberry Pi power supply, HDMI monitor or TV with HDMI cable, and minimally an 8 GB micro SD card (be sure the micro SD comes with the SD card adapter).
2. A micro SD can be purchased with NOOBS already installed. NOOBS contains the Raspberry Pi OS (Operating System) and other useful third party application software. You can also prepare the micro SD for Raspberry Pi in a three step process of downloading NOOBS, formatting the micro SD, and copying NOOBS to the micro SD. But, Raspberry Pi Imager is a very easy way to install Raspberry Pi OS and other operating systems to an SD card.
3. Download Raspberry Pi Imager, a free download from the Raspberry Pi foundation (NOOBS, n.d.). Plug your micro SD in its adapter card into your computer card slot and follow the instructions.
4. Place the micro SD card into the SD slot of the Raspberry Pi.
5. Attach the other parts of the system, to include keyboard, mouse, monitor, and lastly the power supply. Once the power supply is connected, the Raspberry Pi will start up. During the install, you will need to identify WiFi, your time zone, and location.
6. From the first time startup menu, identify your WiFi network and enter the password.
7. From the mid menu, select Raspberry Pi OS Full. Other operating systems, such as LibreELEC can also be selected. LibreELEC is a software appliance extension that allows you to run Kodi, a media player.
8. From the bottom of the menu, select the appropriate Language, e.g. English (UK), Keyboard, and click the Install button at the top of the menu.
9. Once the system is installed and the graphical interface appears, you need to tell the system how to best meet your needs. You are prompted set your Country, Language, Timezone, Keyboard, change the default password (raspberry), adjust the screen border if needed, and WiFi network.
10. The installation program will ask to do an Update Software. Certainly recommended, but the updating process can be time intensive and you be requested to Restart the Pi. Note that if you have installed more than just Raspberry Pi OS, e.g. LibreELEC, you will be asked which operating system you want to start. Clicking on Raspberry Pi OS will start up that operating system.
11. You have completed the installation and setup of the Raspberry Pi and we are now ready to move forward with using Node-RED. Recognize that NOOBS has added a lot of software to include a full office suite as well as the Node-RED application.

**Evaluation.** Consider again the challenge and the goal of this exercise is to *determine if current technology can serve as a means to better understand resilience and the social support system*. Answer the following questions.

- Do you have a better understanding of how a system works? Define the concept of a system in your own words.

- Now that you have assembled the pieces necessary to make the Raspberry Pi into a working system, describe how that technology *did or did not* help you to better understand a social support system.
- Did you use Belief, Persistence, Strength, Trust, or Adaptability to complete any part of this exercise?



## 2 - Using Node-RED, Hello World

**A Story to Tell:** If we again look to parallels with our social support system and the Node-RED application, we see that each node, in Node-RED, is tasked with a specific purpose as might be the people in our social support system. As a node may need to be adjusted for operation and for communicating with other nodes so must the people in our social support system be made aware of their roles and assisted with communicating with us and other people in the support system. Whether our social support system or some technology, the act of communication requires commitment and consideration.

Change is inevitable. The challenges we encounter change us. Consider now the challenge of using Node-RED. Using Node-RED is a two step process. We first start Node-RED server and then use a browser, like Chromium, to access Node-RED. We can then develop a program application using Node-RED. Our first program is the traditional approach to learning almost any programming language. We communicate our presence with a simple program that will declare “Hello World.” Creating this simple program acquaints us with the environment, Node-RED programming, and also assures the technology is working.

**Objectives:** Recall the challenge and the goal of this STEM exercise is to *determine if current technology can serve as a means to better understand resilience and the social support system*. There are a number of objectives, or steps, that help us achieve that goal to include:

- Recognize that you need to adapt your thinking, your beliefs, and persist in order to get a computer application to work.
  - Identify parallels in the Node-RED setup to working with individuals within a social support system.
  - Apply through technology the skills of Belief, Persistence, Strength, Trust, and Adaptability.
1. Click on the Raspberry appearing on the menu at the top of the screen. From that Raspberry Pi pull-down menu, select *Programming*, and *Node-RED*. The *Node-RED console* immediately appears in the Raspberry Pi Terminal and describes the startup process of the Node-RED server. An example of a portion of the dialog follows.

*Start Node-RED*

***Once Node-RED has started, point a browser at <http://192.168.0.19:1880>***

*On Pi Node-RED works better with the Firefox or Chrome browser*

*Use `node-red-stop`*

*to stop Node-RED*

Use `node-red-start` to start Node-RED again  
 Use `node-red-log` to view the recent log output  
 Use `sudo systemctl enable nodered.service` to autostart Node-RED at every boot  
 Use `sudo systemctl disable nodered.service` to disable autostart on boot

...

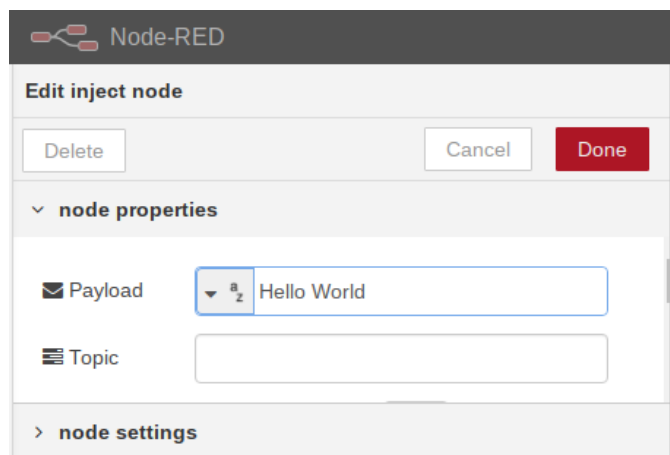
2. Notice that the example dialog tells you to point your browser to `http://localhost:1880`, where localhost is described as the address `http://192.168.0.19:1880`.
3. Copy and paste the complete address into your browser to see the Node-RED development area. In this example, we would start our browser, for example, Chromium, by clicking on the Globe icon on the menu at the top of the screen, and then either type in, or copy and paste the link `http://192.168.0.18:1880` into the browser. Chromium browser is currently bundled with the Raspberry Pi and will work with Node-RED, but other browsers will also work.
4. On the browser Node-RED shows itself as a three column development area. The left column displays the available nodes. The large center area, e.g. Flow 1, becomes a canvas where the desired nodes may be dragged from the left column, or palette, to develop a flow-based program, or flow. The right side can serve as an info and debug area where development status and testing can be monitored. The right side info and debug area can be toggled to appear, or not appear, by pressing the CTRL and Space Bar.

It is customary to develop a “Hello World” program in a new programming environment by injecting the text “Hello World” and displaying it in some manner.

5. To do so, drag the *inject* node from the left column into the center canvas development area, identified as *Flow 1*, by moving the cursor over the *inject* node, left-clicking the mouse button and holding it depressed while dragging the node to the canvas. When the node is in the canvas, release the mouse button. Notice that the *inject* label on the node has been changed to *timestamp*. To the right of the screen, the *Info* menu describes the properties of the node.
6. In a similar manner, drag the *debug* node onto the canvas. Notice that the *debug* label has been changed to *msg.payload* allowing it to display the contents, or payload, of a message.
7. “Wire” the two nodes together by clicking the mouse on the small ball icon appearing on the right side, or output, of the *timestamp* node and dragging a line to the small ball icon appearing on the left side, or input, to the *msg.payload* node. Thus, the two nodes are now connected.
8. The final step is to test, or *Deploy*, the program. Click on the *Deploy* button at the top right of the editing canvas. If the construction of the program is successful then a message *Successfully deployed* will so indicate.
9. Run the flow by clicking on the tab extending from the left side on the *timestamp* node. The message *Successfully injected: timestamp* appears. And, selecting the *debug* tab (bug icon) on the right side of the canvas displays a date and time stamp along with a msg payload number.

But, recall that we want to display a message, the text string “Hello World,” rather than a timestamp. So, we will adapt or edit the inject/timestamp node to do so.

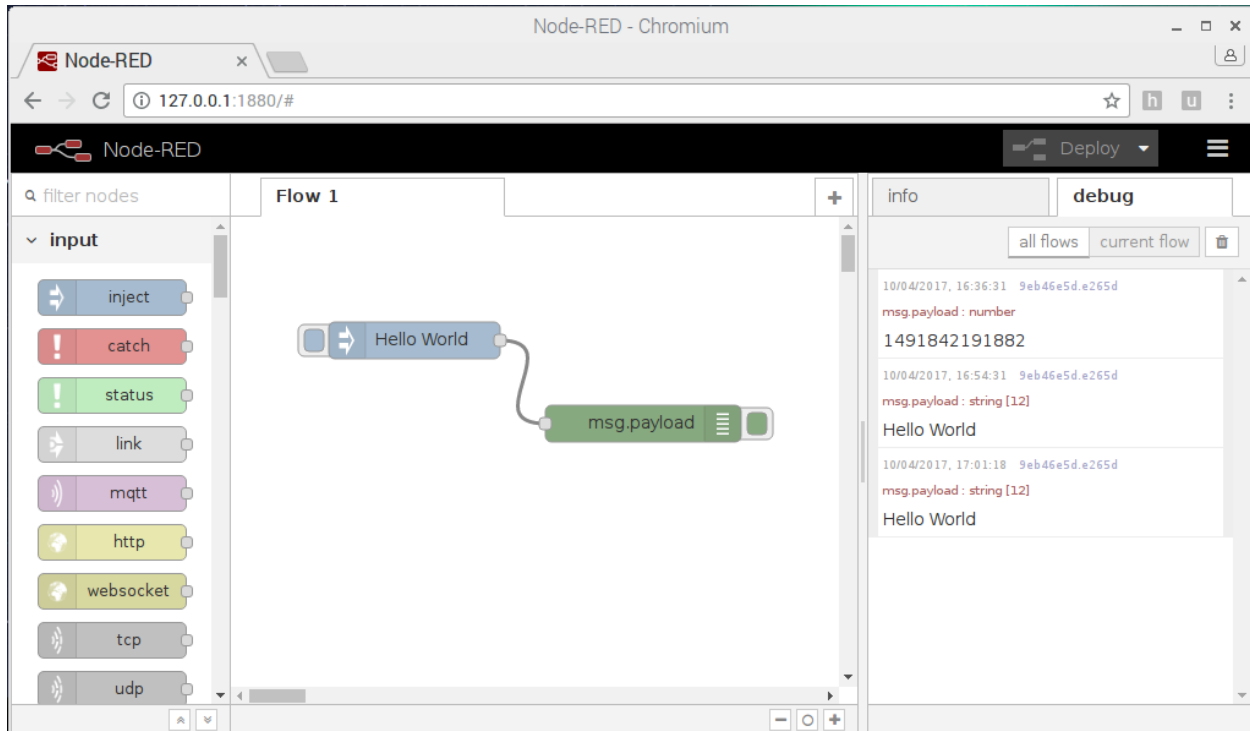
10. Double-click the mouse on the *timestamp* and the *Edit inject node* menu appears.
11. In the *Payload* entry field, click on the small *down arrow* and select *string*. Type *Hello World* in the entry area of the



*Payload*. Then, click the *Done* button and notice the *inject* node is now relabeled as the *Hello World* node.

12. Editing has occurred, so click on the *Deploy* button to test the newly edited flow.

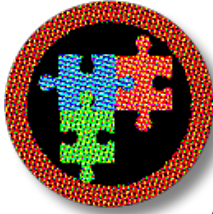
13. Run the flow by clicking on the tab on the left side on the *Hello World* node. Selecting the tab labeled *debug* tab on the right side of the canvas shows the message *Hello World* in the *debug*. Every time the tab on the left side of the *Hello World* node is clicked the message will appear. You have persisted and successfully created a Node-RED program!



Finally, Node-RED preserves your program flow, but if you want to save your program elsewhere or perhaps share it with another person, the Export function of Node-RED can be used. To do so, hold the *shift* key down and click on one of the nodes in the program. Notice that both nodes are highlighted and selected. Click on the three horizontal bar icon beside the Deploy button. Select *Export*. From the *Export nodes*, click on the *Copy to clipboard* button at the bottom of the menu. You can now paste the content into an editor, such as Text Editor in the Raspberry Pi Accessories menu, and save the results.

**Evaluation.** Consider again the challenge and the goal of this exercise is to *determine if current technology can serve as a means to better understand resilience and the social support system*.

- How did this particular technology exercise help you to begin to understand and adapt to change brought about by technology? More specifically, do you better understand that you changed so as to deal with concept of Node-RED technology?
- How did the technology enable you to better understand resilience and a social support system? Did you work with another person and form a social support system to deal with the challenge of programming in Node-RED? More specifically, now that you have created a program made of nodes that each have a specific role to play, do you find parallels to roles individuals play within a social support system?
- Did you use Belief, Persistence, Strength, Trust, or Adaptability to complete any part of this exercise?



## 3 - MQTT Node-RED Application

**A Story to Tell:** We identified the technology for our simple communications tool.

Node-RED serves as our development tool, Raspberry Pi 3 as a device, and MQTT as the communication protocol for our social support system. In the prior exercise we displayed a Hello World message. We next want to build upon our learning experiences in the Hello World exercise and develop a working application that sends a simple message to people in our social support system using a remote MQTT broker.

**Objectives:** Recall the challenge and the goal of this exercise is to *determine if current technology can serve as a means to better understand resilience and the social support system*. There are a number of objectives, or steps, that help us achieve that goal to include:

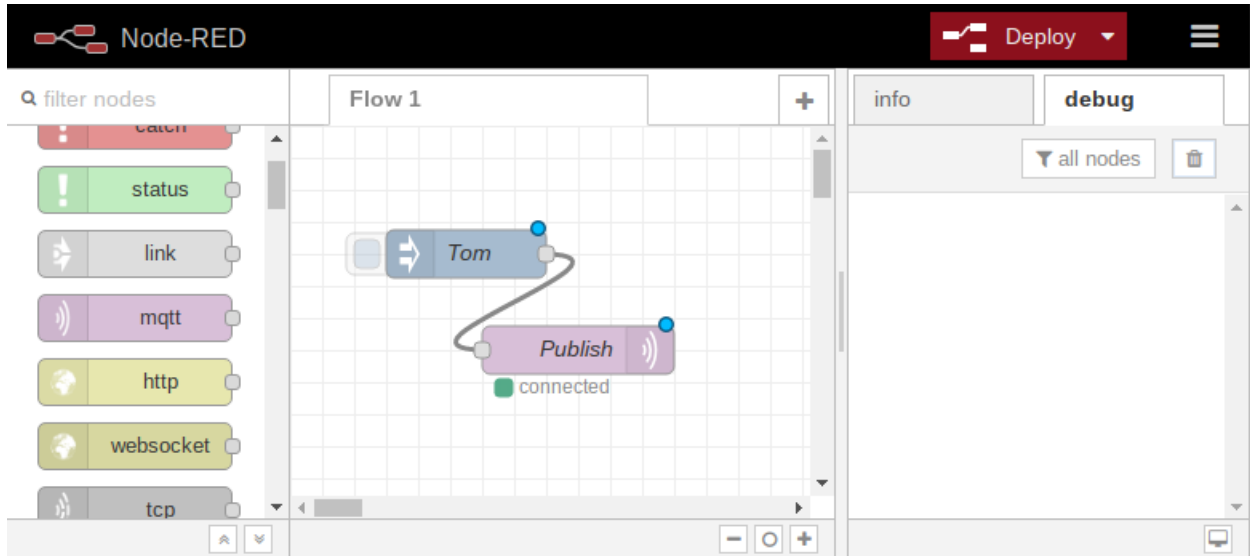
- Compare the roles of system, programming, and communication to the roles played by individuals within a social support system.
- Compare the effort required to get elements within a computer program to effectively communicate and provide results to the effort required to sustain a social support system.
- Apply through technology the skills of Belief, Persistence, Strength, Trust, and Adaptability.

**Publishing to a Topic:** MQTT is the communication protocol, or language, for communication between participants in our social support system. MQTT uses a publish and subscribe approach to communications. We, as clients, need to subscribe to some topic in order to receive information regarding that topic. And, we, as clients, need to publish to that same topic in order to transmit and share information. In this exercise, that information is the message “Hello from Tom” But, you can substitute your name for the “Tom.”

The topic is the common thread that unites our group, That topic can be the name of your support system, for example, we can use the name “AlphaGroup.”

Finally, to distribute our communications to all of the participants, we need a common server, called an MQTT broker, allowing the participants, called clients, to share information wherever internet connectivity exists. There are a number of “free” MQTT brokers that we can use for testing our support system communications. In this exercise we can use the broker identified as `mqtt.eclipse.org:1883` but feel free to use a broker of your own choice.

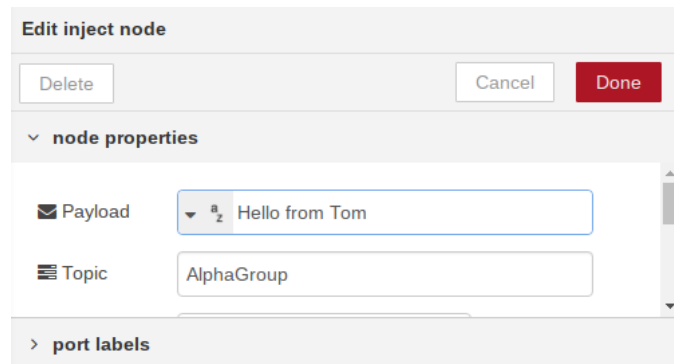
1. From the Raspberry Pi pull-down menu, select Programming, and Node-RED. Once Node-RED has started, the Console will tell you to point your browser at `http://localhost:1880`, where *localhost* may be described as an address `http://192.168.0.19:1880`. Copy and paste the complete address into your browser to see the Node-RED development area.
2. Note that if you have developed a Hello World program in *Flow 1*, you may want to develop this new program in *Flow 2* by clicking on the + tab appearing beside the *Flow 1* tab. Drag the *inject* node into the center canvas development area. Notice that the *inject* label on the node has been changed to



*timestamp*. To the right of the screen, the *Info* menu describes the properties of the node. Drag the *mqtt out* node, from the *network* suite of nodes, into the center canvas development area. We are intending to output, or send, a message from Node-RED to a remote MQTT broker.

3. “Wire” the two nodes together by “clicking” the mouse on the small ball icon appearing on the right side, or output, of the *timestamp* node and dragging a line to the small ball icon appearing on the left side, or input, to the *mqtt* node. Thus, the two nodes are now connected.

Recall that our challenge is to send a message, for example, “Hello from Tom,” rather than a timestamp. Remember to substitute your name in place of “Tom,” so that people know your real name. We begin by editing the inject/timestamp node.

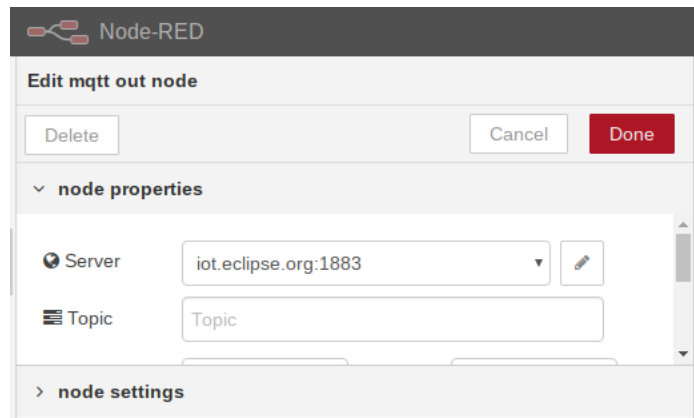


4. Double-click the mouse on the *timestamp* and the *Edit inject node* menu appears.
5. In the *Payload* entry field, click on the small *down arrow* and select *string*. Type *Hello from Tom* in the entry area of the *Payload* substituting your name for *Tom*.
6. In the *Topic* entry field, type *AlphaGroup*.
7. In the *Name* entry field, type your name. Then, click the *Done* button and notice the *inject* node is now relabeled with your name.

We next need to tell the MQTT node where to send the message, that is we need to tell the node to send the message to an MQTT broker. So, we begin by editing the MQTT node.

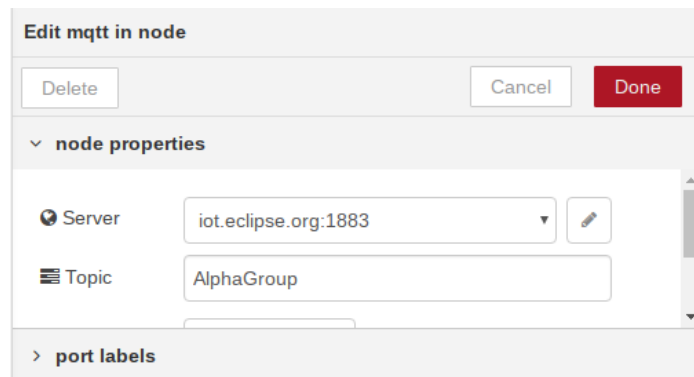
8. Double-click on the *mqtt* and an *Edit mqtt out node* menu appears.
9. Click on the *pen* icon appearing by *Server* field to display the *Add new mqtt-broker config node* menu.
10. In the *Server* field, type *mqtt.eclipse.org*, or a broker of your choice, to identify the MQTT broker and select *Add*. Note that port 1883 should be automatically added to the address. Click *Done* to return to the *Edit mitt out node*.

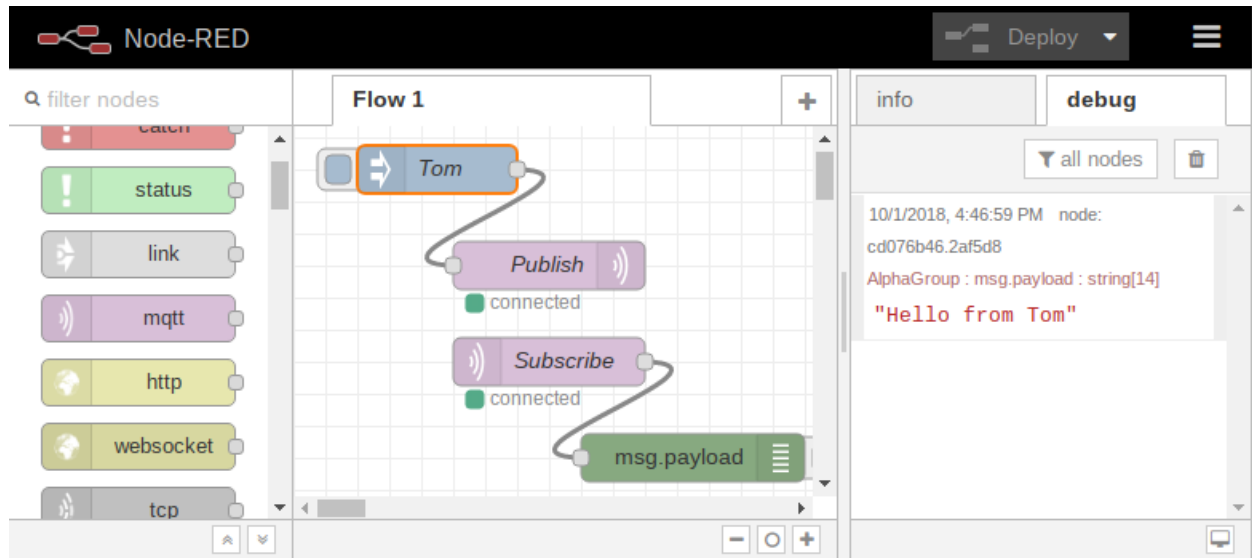
11. In the *Name* field of the *Edit mqtt out* node menu, type *Publish* to rename the *mqtt* node for clarity. Then, click the *Done* buttons and notice the node is now relabeled *Publish*.
12. Click on the *Deploy* button at the top right of the editing canvas. If the construction was successful then a message will so indicate. A *connected* message appearing below the *Publish* node indicates a successful connection to the remote broker.



**Subscribing to a Topic.** Thus far, we have created the flow to publish a message through an MQTT broker. Subscribing to a topic allows us to receive a message. We can receive, or input, the message we publish by subscribing to the broker. So, we add another MQTT node to represent the broker and the debug node to display the message in the debug area of the menu,

13. Drag the *mqtt in* node, from the *network* suite of nodes, to the center canvas in the development area.
14. Double-click on the *mqtt in* and an *Edit mqtt in node* menu appears.
15. In the *Server* field, you should see *mqtt.eclipse.org:1883* to identify the MQTT broker.
16. In the *Topic* field, type in *AlphaGroup* to subscribe to AlphaGroup.
17. In the *Name* field, type *Subscribe* to rename the *mqtt* node for clarity. Then, click the *Done* button and notice the button is now relabeled *Subscribe*. If we were to now click on the *Deploy* button, we would see *connected* below the *Subscribe* node indicating a successful connection with the remote broker.
18. Drag the *debug* node onto the canvas. Notice that the debug label has been changed to *msg.payload* allowing it to display the payload, or contents, of the message.
19. “Wire” the two nodes together by “clicking” the mouse on the small ball icon appearing on the right side, or output, of the *Subscribe* node and dragging a line to the small ball icon appearing on the left side, or input, to the *msg.payload* node. Thus, the two nodes are now connected.
20. Click on the *Deploy* button at the top right of the editing canvas. If the construction was successful then a message will so indicate and you should see *connected* under the *Subscribe* node.
21. Finally, run the flow by clicking on the tab on the left side of the *Tom* node, where of course, you will have substituted your name for Tom. Selecting the tab labeled *debug* on the right side of the canvas shows the message *Hello from Tom*. Every time the tab on the left side on the *Tom* node is clicked the message is being sent to the remote broker through the Internet and back again to you. You have successfully created a program to see how the Internet of Things (IoT) communicates using MQTT! Yay!
22. Did you do this exercise with others programming their Raspberry Pi computers? Are you seeing any other messages? What does it mean?





**Evaluation.** We return to the questions posed at the beginning of this exercise, as well as any questions you decided to explore, to evaluate its effectiveness. Consider again the challenge and goal of this exercise is to *determine if current technology can serve as a means to better understand resilience and the social support system.*

- How did this particular technology application enable you to begin to understand and adapt to change brought about by technology? More specifically, do you have a better understanding of such concepts as a system, programming, and communication?
- How did the technology enable you to better understand and use resilience and a social support system? Specifically, now that you have created a program made of nodes that each have a specific role to play and got them to work together, do you see parallels to the roles individuals play within a social support system?
- Did you use Belief, Persistence, Strength, Trust, or Adaptability to complete any part of this exercise?

Remember that having good self-esteem, self-efficacy, effective problem solving-skills, and lifestyle practices of positive coping strategies are important to one's sense of resilience. Did you find you experienced personal change, such as a change in your Belief about being able to program a computer? Consider sharing this experience with the people in your support system and perhaps with us.

## References

Galatzer-Levy, I. R., Burton, C. L., & Bonanno, G. A. (2012). Coping flexibility, potentially traumatic life events, and resilience: A prospective study of college student adjustment. *Journal of Social and Clinical Psychology, 31*(6), 542-567.

Getting started with the raspberry pi. (n.d.) Retrieved from <https://projects.raspberrypi.org/en/projects/raspberry-pi-getting-started>

Hartley, M. T. (2011). Examining the relationships between resilience, mental health, and academic persistence in undergraduate college students. *Journal of American College Health, 59*(7), 596-604.

Martin, A. J., & Marsh, H. W. (2006). Academic resilience and its psychological and educational correlates: A construct validity approach. *Psychology in the Schools, 43*(3), 267-281

Martin, A. J., & Marsh, H. W. (2008). Academic buoyancy: Towards an understanding of students' everyday academic resilience. *Journal of school psychology, 46*(1), 53-83.

Michel, K. (2015). ESP8266 + MQTT connected "Mithine" boxes with LED display. Retrieved from <https://www.youtube.com/watch?v=ilkXpnmITil>

[MQTT.org](https://MQTT.org). (n.d.). Retrieved from <https://MQTT.org>

Node-RED. (n.d.). Retrieved from <https://nodered.org>

NOOBS. (n.d.). Retrieved from <https://www.raspberrypi.org/downloads/noobs/>

Raspberry Pi Foundation. (n.d.). Retrieved from <https://www.raspberrypi.org>

Resilient Hacks. (2018). Retrieved from <http://resilienthacks.org/>





Stem, Resilience, Node-RED, and the Internet-of-Things. (n.d.). Retrieved from <https://www.youtube.com/playlist?list=PLCl1SwdgAUr3PMIAjMIQgFF6Tt8NoH5-F>





Suicide, W. P. (2014). A global imperative. *World Health Organization*.





## On staying resilient





**Objective:** Completing this evaluation provides a summary of overall learning and personal change.

A look back to what you have accomplished is a way to determine the personal impact of the learning, that is, you are looking at it summatively to determine its effectiveness upon you. Complete this measurement several weeks after you have completed the learning to get a sense of continuity, where you have been and what to do next.

Reaction to Learning Materials and Delivery of the Learning Experience				
Evaluate <i>your</i> perception of the learning materials and delivery of the learning. Check only one response to each of the following.	 <b>Very poor</b>	 <b>Poor</b>	 <b>Okay</b>	 <b>Very good</b>
Effectiveness of learning materials and resources.				
Effectiveness of delivery of the learning experience.				

Learning Goals and Objectives Assessment				
Evaluate the quality of <i>your</i> interaction with each of the program objectives. Check only one response to each of the following objectives.	 <b>Don't recall doing this</b>	 <b>Not useful</b>	 <b>Useful</b>	 <b>Used this again</b>
Apply Belief to a current challenge in conjunction with a member of your social support system.				

<b>Learning Goals and Objectives Assessment</b>				
Evaluate the quality of <i>your</i> interaction with each of the program objectives. Check only one response to each of the following objectives.	 <b>Don't recall doing this</b>	 <b>Not useful</b>	 <b>Useful</b>	 <b>Used this again</b>
Apply Persistence to a current challenge in conjunction with a member of your social support system.				
Apply Strength to a current challenge in conjunction with a member of your social support system.				
Apply Trust to a current challenge in conjunction with a member of your social support system.				
Apply Adaptability to a current challenge in conjunction with a member of your social support system.				

<b>Change of Behavior</b>				
Evaluate <i>your</i> perception of changes in <i>your</i> behavior. Check only one response to each of the following.	 <b>Worsened</b>	 <b>No change</b>	 <b>Improved</b>	 <b>Much improved</b>
Ability to apply positive coping resilience skills to personal challenges.				
Ability to reach out to a social support system to better deal with personal challenges.				
Ability to problem solve when dealing with personal challenges.				
Improvement of self-efficacy, defined as the ability to persist in meeting a goal when dealing with personal challenges.				
Improvement of self-esteem.				

Learning to apply these positive coping skills and developing a social support system might be compared to when you first learned to tie a shoe or perhaps learned to ride a bike. You learned the process, but it was continued practice that made that learning a fluid action requiring little effort. That same mindset needs to be applied to this current learning. Staying resilient is a lifelong pursuit. Keep your mental armor shiny and intact and it will protect you and those closest to you.

# SECTION 3

## HERO'S JOURNEY RESILIENCE



### Hero's Journey Resilience


Hero's Journey Resilience is a simple web browser-based app that parallels the content of the five resilience skills in this workbook. The app permits exploration of a personal challenge using any of the skills. Each skill is presented in a concise flashcard format that provides for responses to the exercise questions. All of your responses are stored locally on your computer or device. Additionally, you can create your own resilience skills. The app's My Journey assembles all of your skill entries to create your Hero's Journey.

The next few pages capture the essence of the app and provides a hardcopy alternative to using the app. If you are using this hardcopy version, be sure to keep all of your notes while working with the skills to then create your Hero's Journey.

Home **Hero's Journey**

<b>About</b>
<b>Belief</b>
<b>Persistence</b>
<b>Strength</b>
<b>Trust</b>
<b>Adaptability</b>
<b>Make a Skill</b>
<b>Make a Skill</b>
<b>My Journey</b>

**Your Hero's Journey:** Your goal is to create your own Hero's Journey. There are three exercises that move you along the Hero's Journey. There are challenges, skills to be developed, and companions on the journey. These skills are considered protective factors, your mental armor, to make you more resilient. How you wish to complete the Hero's Journey can be as epic as you want it to be. One way is to simply explore each of the five skills. Begin with Belief.



Hero's Journey  
Resilience



Resilience is the ability to bounce back from adversity and stress. Our goal is to use an entirely educational approach to improve resilience by using storytelling and World Health Organization recommendations for suicide prevention.

We are all familiar with storytelling as a means of learning. The learning here is organized around the storytelling concept of the "Hero's Journey." The Hero's Journey is common to many epic stories where a hero who, facing a challenge, goes on an adventure, is victorious, and returns as a transformed person. Some examples are Luke in Star Wars, Dorothy in the Wizard of Oz, and Frodo in Lord of the Rings.



This call to adventure occurs when your normal life is suddenly interrupted by a stressful challenge that threatens to move you from the known to the unknown. Through a process of problem solving, often with other people, you can skillfully and victoriously come to terms with the challenge.

Your goal is to create your own Hero's Journey. Yet, a goal without a plan is only a wish. So, there are three exercises that move you along the Hero's Journey. There are challenges, skills to be developed, and companions on the journey. These skills are considered protective factors, your mental armor, to make you more resilient. You can use five skills, Belief, Persistence, Strength, Trust, Adaptability, and even make your own skills.

**Your Hero's Journey:** One way to create your Hero's Journey is to explore each of the five skills. You can start with the Belief skill and work on the *Tell your story* exercise. Then, identify a companion or companions to work with and *Collaborate*, identify a challenge with your companion, and complete that exercise. Finally, alone or with your companion, work on the *Own it* exercise.

Yet, another way to create your Hero's Journey is to begin with a real challenge you are currently facing. Next identify a companion or companions to accompany you on the journey. Identify a skill you might use and work on the *Tell your story* exercise. Then, with your companion, work on *Collaborate*. Finally, alone or with your companion, work on the *Own it* exercise. How you wish to complete the Hero's Journey can be as unique and epic as you want it to be. It is, however, important that you complete all three exercises and work with a companion on the Collaborate exercise.



**1. Tell your story** builds confidence. In this first exercise, using a "flashcard" overview of one of the skills, you are asked to recall a past challenge where you have had success using something like the skill. Keeping that past challenge in mind, work on answering the questions. Refer to the flashcard *Example* for ideas about how to put together your story. In a Hero's Journey, this is where we get insight how our heroes go about life in their ordinary world before their call to adventure.

**2. Collaborate** moves you from the familiar to the unknown in the Hero's Journey. Recall that Luke had Obi Wan, Dorothy had Glinda the Good, and Frodo had Gandalf to help form social support systems as they moved into the unknown. You also have a companion to work with to develop your skill and meet the challenge. Work with a companion and consider a real challenge you, your partner or someone you know is currently facing by applying the skill. Write the challenge and your responses to the questions. Refer to the flashcard *Example* for help.

**3. Own it** asks that you reflect upon the skill you used and describe the skill in a few of your own words. Looking at the Hero's Journey, you have moved from the known, Tell your story, to the unknown, Collaborate, where you worked with another person to deal with a real challenge by applying a skill. And, finally, your return from the adventure, Own it, where you are now reflecting on self-discovery, meaning, and learning. What did you learn from this experience? How have you been transformed? You are adapting the meaning of the skill to be more useful and memorable. This is where our heroes, surrounded by their social support systems, make their return to their known world. Luke gets a hero's welcome with his companions, Dorothy has returned with the knowledge that to do anything, you must believe in yourself, and Frodo realizes he can no longer go back to his ordinary life and decides to leave with Bilbo, Gandalf, and the elves. Our heroes become resilient by developing their skills through social support.

Repeat this process for all five positive-coping skills to improve your resilience when dealing with stressful challenges. Your notes from Tell your story, Collaborate, and Own it can serve as a future reminder, an epic story, on how you dealt with challenges and change. Your notes from all of the skills are assembled and can be viewed in My Journey.

**Caution:** All of your data is stored locally on your web browser. You can selectively save and erase your data using the commands in the app. Clearing your browser buffer will erase ALL data.

**This informational material does not provide medical advice.** The information, including but not limited to, text, graphics, images and other material contained is for informational purposes only. The intent is to promote broad understanding and knowledge of education, health, and technology topics. This is not intended to be a substitute for professional medical advice, diagnosis or treatment. Always seek the advice of a qualified health care provider with any questions you may have regarding a condition or treatment and before undertaking a new health care regimen, and never disregard professional medical advice or delay in seeking it because of something you have read in this material.

Hero's Journey Resilience  
Version 1.2

A supplement to [Educators Multiuse Handbook for Resilience PDF](#)

Resilient <sup>Life</sup> Hacks

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## Belief affects attitude. Changing your belief changes your attitude.

**Why:** Your beliefs control your actions and the way you feel about something, your attitude. You can alter a belief to change your perception and better deal with a challenge. Beliefs, whether positive or negative, can affect your physical and psychological health.

**How:** Approach your challenge with a realistic view. Can you change the challenge to make it more workable? If the challenge appears not changeable, then a change of attitude is possible by changing a belief.

- Consider your challenge. Is the outcome changeable? If so, then identify a more positive yet realistic outcome.
- If the outcome is not changeable, then describe your concern or fear. There is a belief that is supporting that attitude. Identify a more positive belief. What are the steps needed to bring about the change to a more positive belief.
- Sometimes a challenge may require a change of belief before a more positive outcome can be found. And, sometimes altering the challenge is necessary before finding the more positive belief.

**Example:** Because of a fracture, my arm is immobilized in a cast. This condition is not going away for several weeks and I can't change it.

- My challenge is how to deal with an immobilized arm.
- The outcome is not changeable, so I focus on a change of belief.
- My concern is that I can't do everything I want to do.
- I see that my belief is self-defeating because the belief appears to be "all or nothing" thinking.
- I work on the more positive belief that there is still opportunity to do some of what I need and want to do.
- I see now that I can also improve my outcome with a support system and creating attainable goals.



### 1. Tell your story

Think about a time when you used something like Belief to successfully deal with a challenge. Answer the following questions. 1) What was your challenge? 2) Did you change the challenge to something more positive or workable? 3) Did you change your Belief to something more positive?

I once needed to change a self-defeating belief when I fractured a wrist and was unable to do those activities I needed to do. I could not change the time needed to heal. I could, however, change my belief to one where that I could adapt and still do many necessary activities.

### 2. Collaborate

Work with a companion and consider a real challenge you, your companion or someone you know is currently facing by applying the Belief skill. Answer the following questions. 1) What is the challenge? 2) What abilities or qualities does your companion have that can help with the challenge? 3) Can the challenge be changed to something more positive or workable? 4) Can the Belief be changed to something more positive?

The challenge is relocating to a distant location when traveling is very difficult. My companion has personal experience with relocating great distances. Packing items for later shipment will make the move much easier. Believing the move, though difficult, is workable by focusing on just the traveling.

### 3. Own it

Reflect upon the Belief skill and describe the skill in a few of your own words. You are adapting the meaning of the skill to be more useable and memorable.

Making a challenge more workable for me is finding ways to simplify the challenge, working with experts, and realizing that an "all or nothing" belief can be altered.

## Persistence is facing a challenge believing you will succeed.

**Why:** Persistence encourages you to make change, mark your progress, and build belief that you can reach your goal.

**How:** Create a realistic goal and the steps needed to reach the goal so that when all of the steps are completed, you have attained your goal.

- Consider your challenge and realize the importance of believing you can meet the challenge.
- Creating a goal is a way to build the belief you can meet the challenge. The goal must be reachable within a realistic time limit.
- A goal without a plan is only a wish. The steps describe the actions that are needed to reach your goal. Create as many steps as needed so that you can see the progress you are making. You persist by building belief in yourself.
- Remember to reward yourself as you persist.

**Example:** I have a project to do and need a plan to complete it on time.

- My challenge is to complete a project.
- My goal is to "Create a Project Time Plan."
- I break the major parts of the project into smaller steps to better identify the tasks and how much time is needed to complete each part.
- I assign a due date to each project part.
- I make sure that there are enough steps so that I can see the progress I am making.
- I monitor progress, check-off completed steps, and remember to reward myself as progress is made.



### 1. Tell your story

Think about a time when you used something like Persistence to successfully deal with a challenge. Answer the following questions. 1) What was your challenge? 2) What was your goal? 3) What were the steps needed to reach your goal? 4) What made the goal reachable?

Your past challenge? Your goal? Steps needed? Reachable?

### 2. Collaborate

Work with a companion and consider a real challenge you, your companion or someone you know is currently facing by applying the Persistence skill. Answer the following questions. 1) What is your challenge? 2) What abilities or qualities does your companion have that can help with the challenge? 3) What is your goal? 4) What are the steps needed to reach your goal? 5) What makes the goal reachable?

Your current challenge? Companion's abilities? Your goal? Steps needed? Reachable?

### 3. Own it

Reflect upon the Persistence skill and describe the skill in a few of your own words. You are adapting the meaning of the skill to be more useable and memorable.

Personal change and rethinking the skill?

Save

Erase All

## Strength grows from proper nutrition, exercise, relaxation and sleep.

**Why:** Practicing a healthy diet, physical exercise, relaxation, and good sleep habits improves physical, emotional, and mental well-being. When you feel good, challenges are more easily managed. Strength is about good self-care.

**How:** Find and practice plans for diet, exercise, relaxation, and sleep to fit your lifestyle while meeting the goals of good nutrition, aerobic exercise, stress reduction and adequate sleep.

- Consider your challenge and how it relates to diet, exercise, relaxation and sleep.
- Find and practice a healthy diet that fits your lifestyle yet lowers your health risks. Consider researched plans such as MyPlate, Healthy Eating Plate, Mediterranean, and DASH (Dietary Approaches to Stop Hypertension).
- Find and practice a physical exercise plan that fits your lifestyle and provides at least 2 hours and 30 minutes of moderate-intensity aerobic physical activity ideally spread evenly throughout the week.
- Find and practice a relaxation exercise, such as slow diaphragmatic breathing, progressive muscle relaxation, social resilience, and mindfulness-based stress reduction.
- Practice good sleep hygiene by keeping a consistent sleep-wake schedule, exercising daily and eliminating long naps and naps within a few hours of bedtime.

**Example:** I get anxious before and during high-stakes tests and that prevents me from doing as well as I could do. I need to find and practice a relaxation exercise.

- My challenge is to be relaxed before and while taking tests.
- I consider an easy relaxation exercise, such as diaphragmatic breathing, an exercise of slow controlled breathing. I put one hand on my chest and the other on my stomach. I breathe slowly so that the hand on my stomach moves up and down. I try to keep the hand on my chest from moving up and down. Each time I exhale, I focus on the word "relax." Like any exercise I need to practice diaphragmatic breathing for several weeks before I master it. My plan is to practice it for about ten minutes before I go to sleep.
- I also consider an exercise plan to further reduce stress, diet plan to increase my energy, and good sleep to support the relaxation and improve my likelihood of doing even better on the test.
- I adjust or change any of the plans that are not working and monitor the changes.
- Just before a test, I practice diaphragmatic breathing thinking of the word "relax."



### 1. Tell your story

Think about a time when you used something like Strength to successfully deal with a challenge. Answer the following questions. 1) What was your challenge? 2) How was your challenge related to diet, exercise, relaxation and/or sleep? 3) What made you feel you were successful meeting the challenge?

Your past challenge? Challenge related to Strength? Success?

### 2. Collaborate

Work with a companion and consider a real challenge you, your companion or someone you know is currently facing by applying the Strength skill. Answer the following questions. 1) What is the challenge? 2) What abilities or qualities does your companion have that can help with the challenge? 3) How is your challenge related to diet, exercise, relaxation and/or sleep? 4) What is your goal? 5) What are the steps needed to reach your goal?

Your current challenge? Companion's abilities? Challenge related to Strength? Goal? Steps?

### 3. Own it

Reflect upon the Strength skill and describe the skill in a few of your own words. You are adapting the meaning of the skill to be more useable and memorable.

Personal change and rethinking the skill?

Save

Erase All

## Trust develops by using empathy to engage, reach out, and give support.

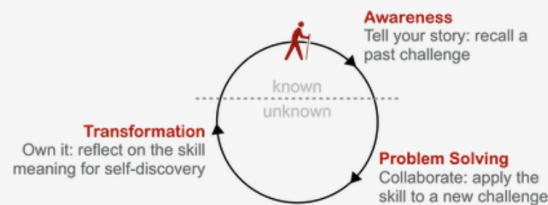
**Why:** Social support is considered one of the best protections from the effects of stress and suicide. Trust is foundational to all relationships, whether personal, professional or organizational.

**How:** Develop your social support system by identifying the challenge or challenges you may be facing. Consider people who would be helpful dealing with a challenge and the role each would play.

- Consider your challenge and identify your strengths and weaknesses to better identify your needs and the support you bring.
- Consider people who best meet your needs while assuring you are comfortable reaching out to them and they are comfortable reaching out to you. Recognize you are using empathy to "see through the eyes of another" to help determine their comfort level.
- Identify those individuals in your support system, the skills or qualities they provide, and how to contact them.
- Identify also the contributions you make to help keep your support system going.

**Example:** I have an uneasy feeling that one of my friends may be thinking about suicide. I need a plan on how to approach my friend.

- My challenge is to help a friend who may be thinking about suicide.
- I realize that I am now part of this person's social support system and I have a role to play.
- I recognize suicide is one of the leading causes of death for teens and young adults.
- I am prepared to reach out to the person and listen.
- I question the person about the possibility of suicide.
- I persuade the person to get help.
- I refer the person to specialized help to include suicide hotline, getting the person to assistance or calling 911 if critical.



### 1. Tell your story

Think about a time when you used something like Trust to successfully deal with a challenge. Answer the following questions. 1) What was your challenge? 2) What made you reach out to others? 3) Did you keep the social support system following the challenge?

Your past challenge? What made you reach out? Keep the support?

### 2. Collaborate

Work with a companion and consider a real challenge you, your companion or someone you know is currently facing by applying the Trust skill. Answer the following questions. 1) What is the challenge? 2) What abilities or qualities does your companion have that can help with the challenge? 3) What are strengths and weakness related to the challenge? 4) Who best meets needs while assuring you are comfortable reaching out to them and they are comfortable reaching out to you? 5) What roles do they play, and how do you contact them?

Your current challenge? Companion's abilities? Strengths and weaknesses? Who meets needs? Roles they play?

### 3. Own it

Reflect upon the Trust skill and describe the skill in a few of your own words. You are adapting the meaning of the skill to be more useable and memorable.

Personal change and rethinking the skill?

Save

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## Adaptability is the flexibility to meet a challenge.

**Why:** Often our biggest obstacle to dealing with change is the ability to change ourselves, our ability to adapt. Adapting to change provides confidence and growth. Believing you have the ability to succeed, you pursue a challenge as something to be mastered rather than as a threat. You are empowered — you own it!

**How:** Developing your adaptability skill can be a goal setting process that calls for planning, persistence, and cooperation to define and develop.

- Think about your challenge and research the idea. Perhaps a skillful solution already exists.
- Discuss the skill idea with others to be sure the idea is understood and can meet its intended purpose.
- Consider creating the skill as a goal that is reachable along with the steps necessary to reach the goal.
- Steps may include a definition *About* the skill, *Why* the skill meets the challenge, and *How* the skill meets the challenge.

**Example:** Using the idea of “Who am I going to call when ...” I want to extend my social support system to include people who have skills or qualities I may need. I will start with the simplest and move to the most essential members of my social support system. I further want to adapt my phone contact app to include these people in my contact list.

- My challenge is to extend my social support system using my phone contact list. (*About...*)
- Preparing for the future shapes me to adapt to the unexpected. (*Why...*)
- I research my phone contact app and begin with the easier contacts moving to more complex. (*How...*)
- I consider services such as electricity, water, gas, plumber, and roadside assistance.
- I consider healthcare such as physician, dentist, and veterinarian.
- I consider emergency services such police, fire, suicide, and poison control.
- I consider family, associates, and friends and the roles they play in the social support system.
- I consider In Case of Emergency (ICE) contact.



### 1. Tell your story

Think about a time when you used something like Adaptability to successfully deal with a challenge. Answer the following questions. 1) What was your challenge? 2) Did you do any research to see if a skillful solution had been already developed? 3) Did you talk with others to be sure the adapted skill was understood and could meet its intended purpose? 4) What was the skill?

Your past challenge? Research? Discussion? New skill?

### 2. Collaborate

Work with a companion and consider a real challenge you, your companion or someone you know is currently facing by applying the Adaptability skill. Answer the following questions. 1) What is the challenge? 2) What abilities or qualities does your companion have that can help with the challenge? 3) Can you research the challenge to see if a possible solution already exists? 4) Can you talk with others to be sure the adapted skill is understood and can meet its intended purpose? 5) What is the skill?

Your current challenge? Companion's abilities? Research? Discussion? New skill?

### 3. Own it

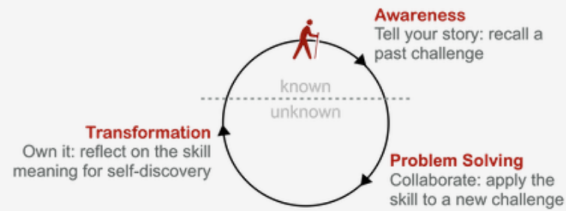
Reflect upon the Adaptability skill and describe the skill in a few of your own words. You are adapting the meaning of the skill to be more useable and memorable.

Personal change and rethinking the skill?

Save

Erase All

As you complete the skills, your notes are assembled here.



## Belief

A past challenge ... I once needed to change a self-defeating belief when I fractured a wrist and was unable to do those activities I needed to do. I could not change the time needed to heal. I could, however, change my belief to one where that I could adapt and still do many necessary activities.

A new challenge ... The challenge is relocating to a distant location when traveling is very difficult. My companion has personal experience with relocating great distances. Packing items for later shipment will make the move much easier. Believing the move, though difficult, is workable by focusing on just the traveling.

Self-discovery ... Making a challenge more workable for me is finding ways to simplify the challenge, working with experts, and realizing that an "all or nothing" belief can be altered.

## Persistence

## Strength

## Trust

## Adaptability







