Walden University

College of Management and Technology

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Walden University 2020



Abstract

Perceived Effect of Leadership Development Program on Business Results of Governmental Agency

by

Gloria Solomon

MBA, Wake Forest University, 1997

BS, University of North Carolina-Greensboro, 1987

Dissertation Submitted in Partial Fulfillment
of the Requirements for the Degree of
Doctor of Philosophy
Management

Walden University
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Abstract

Organizations invest billions of dollars in leadership development programs (LDPs) to train leaders to manage business challenges, such as new global markets, changing economic conditions, and shifting technology. Although organizations are investing in LDP training, there is little effort to evaluate LDP outcomes and the effect LDPs have on organizational business results. The purpose of this study was to examine a specific LDP in a government agency to determine its perceived effect on that agency's business results. The conceptual framework used for the study was Kirkpatrick's evaluation model. The central research question dealt with the perceptions of managers of attendees and of attendees on the effect of a specific LDP on their U.S. government agency's business results. A qualitative, embedded, case study approach was the research method chosen. The study sample consisted of 5 managers of individuals in the government agency's staff who attended the LDP and 7 individuals who attended the LDP. The data collection process consisted of semistructured interviews with participants from the 2 identified groups. Data analysis included coding and thematic analysis by means of the constant comparative method. The findings revealed that the majority of managers perceived the LDP did not affect the agency's business results; whereas, the majority of LDP attendees perceived their participation in the LDP did affect the agency's business results. A recommendation for future research is to use multiple cases (i.e., LDPs) in a study for enhanced credibility. The implications for positive social change of this study include the potential of LDPs to develop leaders better equipped to improve follower's performance and satisfaction and organizations' business results to the benefit of society.





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Dedication

I dedicate this dissertation to Darius, Brandon, Max, Kenneth, and Nicholas, my nephews, and to my niece, Morgan. This is my contribution to you and the world on leadership development. I hope you will glean some bit of knowledge to move the bar for yourself and others from this work. I also dedicate this work to my sisters, Rhonda, Barbara, Sheryl, and Teresa. You never complained about me slipping away at family gatherings to a quiet place to read or write. You have been patient and supportive during my extended period of writing and research. Lastly, and most important, I dedicate this dissertation to my mom, Gracie, and dad, Chester. You always encouraged me to achieve great things. I thank my family for their love and support.



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And Mary said: "My soul glorifies the Lord and my spirit rejoices in God my Savior, for he has been mindful of the humble state of his servant. From now on all generations will call me blessed, for the Mighty One has done great things for me—holy is his name." Luke 1:46-49



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Chapter 1: Introduction to the Study

To maintain a competitive advantage, leadership development is critical in today's business environment (Canwell, Dongrie, Neveras, & Stockton, 2014; Dalakoura, 2010). Culbertson and Owen (2012) agreed that losses in revenue, profits, and earnings per share signify organizations with poor leadership and that, therefore, organizations should spend additional millions on leadership training. Day (2000) defined leadership development as an integration strategy that helps people understand how to relate and coordinate their efforts with others, build commitments, and create extensive social networks as they develop self-understanding of social and organizational priorities.

The objective for this qualitative research study was to bridge the gap in the evaluation of leadership development programs (LDPs) and their impact on organizational business results. The conceptual framework of the study was Kirkpatrick's evaluation model. Social change implications of the study included the potential for using the findings to develop leaders better equipped to positively affect individuals, organizations, and communities. Chapter 1 contains an introduction to the study, which includes topical background material, a problem statement, the purpose of the study, research question, the conceptual framework and nature of the study, definitions, assumptions, the scope and delimitations, limitations, and significance of the study.

Background of the Study

The global recession has led to an increased need for LDPs designed to support organizational transformation (Hayward, 2011) and provide a sustainable competitive



advantage (DeRue, Nahrgang, Hollenbeck, & Workman, 2012). LDP staff train and prepare employees for leadership and close the gap between the kind of leadership that an organization has and the kind of leadership an organization needs, as described by Tourish (2012). Tsyganenko (2014) explained that LDPs as a popular method of developing leadership and managerial skills in the organization, and Phillips, Phillips, and Ray (2012) asserted that leadership development is now a critical part of organizational growth and development.

The primary goal of the LDP is to improve the operational effectiveness of the organization by enhancing its leadership capacity (Tsyganenko, 2014). Phillips et al. (2012) added that organizations gain a competitive advantage by developing leaders in a more efficient and effective manner and that an individual leader's growth will improve organizational business results (Tsyganenko, 2014). Furthermore, Choy and Lidstone (2013) concluded that LDP participants apply and integrate their new knowledge and skills to promote change in their organizations.

The organizational strategy of effective leadership development is contingent on planning, execution, and evaluation (Hayward, 2011). Canwell et al. (2014) stated organizations need to examine their LDPs to ensure effective programs. Evaluations help organizations determine if their training investments improve organizational performance by enabling them to assess the extent to which LDPs have aided in meeting goals, challenges, and problems (Relevant development, 2012).

Leadership development courses and programs have become more popular in the past 10–15 years, with leadership development intervention now in the mainstream of



academic degrees in business schools; however, the evaluation of LDPs has not matched the growth of the programs (Edwards & Turnbull, 2013). Watkins, Lyso, and deMarrais (2011) accounted for this discrepancy by positing that LDPs based on fixed objectives, such as those focused on the competency of the individual participant instead of the impact to the organization, do not capture outcomes robustly enough. Raelin (2004) suggested that applying an alternative lens to conceptualize leadership and the purpose of LDPs results in a new form of evaluation and development and that such change helps evaluators gain insight and understanding into the impact of programs at all levels: individual, group, and organizational.

Organizations invest large sums in leadership training and capacity building because they expect high returns in productivity and staff performance (Choy & Lidstone, 2013). Of those organizations that perform follow-up analysis, 86% evaluated at the participant level, 11% at the organizational level, and only 3% run return on investment (ROI) assessments (Salicru, Wassenaar, Suerz, & Spittle, 2016). Organizations have made little progress with LDP evaluation (Tourish, 2012). Evaluation is critical because it provides a means to justify and support the resources spent on training (Relevant development, 2012). In 2006, the authors of a leadership study concluded that measurable and repeatable ROI for leadership development was the wave of the future (Tourish, 2012). The results of the current study add to the body of literature on LDP evaluation with a focus on the impact of an LDP on organizational business results.



Problem Statement

Organizational leaders recognize the importance of leadership development, considering it a strategic priority (King & Nesbit, 2015; Lacerenza, Reyes, Marlow, Joseph, & Salas, 2017) and investing large sums in LDPs. Per the American Society for Training & Development, U.S. organizations spent \$1,273 per employee for direct training compared in 2016, and U.S. training expenditures, such as training payroll plus external training products and services, increased by 32.5% to \$90.6 billion in 2017 (2017 Training Industry, 2017). Because of the substantial costs of LDPs and their apparent impact on an organization's success, assessing participant learning and organizational outcomes is critical (King & Nesbit, 2015).

The general problem was organizations are investing large financial sums in training with minimal effort to determine training outcomes and effects on organizational business results. The specific problem was U.S. government agencies are not measuring the effect of its LDPs on their business results. Currently, there have only been a few studies on the effectiveness of LDPs that examine the impact of LDPs on organizational business results or financial outcomes, and only 40% of governmental program managers report evaluations of government programs completed within 5 years of their development (U.S. Government Accountability Office, 2017).

Purpose of the Study

The purpose of this qualitative, embedded case study was to determine two groups' perceptions of the effect of an LDP on the business results of a U.S. governmental agency: managers of individuals who have attended the LDP and



individuals who attended the LDP. In-depth, semistructured interviews of a purposeful sample of 12 individuals from the two aforementioned groups provided the study data. Triangulation of the findings for each group provided the desired insight into the effect of the LDP on agency business results. The findings of this study filled a current knowledge gap by examining the impact of an LDP on organizational business results as reported by individuals (i.e., managers of attendees and attendees) with knowledge of the LDP.

Research Questions

The central research question for the study was: What are the perceptions of managers of attendees and attendees on the effect of a specific LDP on their U.S. government agency's business results?

The subquestions were:

RQ1: What are perceptions of managers of attendees on the effect of a specific LDP on their U.S. government agency's business results?

RQ2: What are perceptions of attendees on the effect of a specific LDP on their U.S. government agency's business results?

Conceptual Framework

The problem statement of this study focused on the absence of LDP program evaluation regardless of the investment in leadership development. Tsyganenko (2014) posited that organizations create and support LDPs on the belief that improving individual leaders' behavior will lead to improved organizational business results. The goal of LDPs is the enhancement of leadership capacity and making dynamic leaders that will improve organizational and operational effectiveness (Tsyganenko, 2014). However,



organizations are not evaluating LDPs to determine if there is an impact to the organizational business results (Toursh, 2012). The conceptual framework of this study included integration of Kirkpatrick's evaluation model and Rice's (2011) study of the outcomes of a Fortune 500 company's leadership development course.

Kirkpatrick's evaluation model comprises four levels: reaction, learning, behavior, and results (Diamantidis & Chatzoglou, 2014). Level 1, reaction, measures the learner's emotions/feelings and their likes and dislikes (Rafiq, 2015). Level 2, learning, measures knowledge, skills, and abilities gained from the training (Diamantidis & Chatzoglou, 2014). Level 3, behavior, assesses whether behavior changed based on the training (i.e., job performance; Diamantidis & Chatzoglou, 2014). Level 4, results, are the final outcomes observed due to participation in the LDP, including improvement in job performance (Diamantidis & Chatzoglou, 2014). In the current study, the focus was on Level 4, results.

In this study, I extended Rice's (2011) findings by focusing on the impact of an LDP on the organization's business results. The findings of this study added to those of Rice's by including data from individuals that have knowledge of the program (i.e., managers of attendees) but did not attend. One limitation of Rice's study was a lack of verification of self-reported course outcomes (i.e., financial and behavioral). Rice stated a limitation of her study was not documenting managers' view of participants' application of LDP knowledge. This study addressed this limitation of Rice's study.

The integration of Rice's study (2011) supported the use of Level 4 of Kirkpatrick's model for LDP evaluation. The third and fourth levels of Kirkpatrick's



model focus on measurable behavioral change of LDP participants (DeSilets, 2018). The conceptual framework allowed a platform for the introduction of the research question that relates to the perception of the effect of the LDP on business results.

The qualitative methodology used in this study was an embedded case study. The data collection instrument was semistructured interviews that included questions about the impact of the LDP training on business results, which were defined as process or service improvements, cost savings, or revenue increases (see Rice, 2011) to enable the separation of the effects of the LDP from all other factors that might influence business results.

Nature of the Study

The nature of this study was a qualitative, embedded case study. Per Cronin (2014), qualitative research is descriptive instead of explanatory and exploratory instead of examining. Baškarada (2014) stated that qualitative research focuses on understanding the nature of the problem. The qualitative approach is subjective and used to understand specific phenomena (Cronin, 2014). Case studies are a qualitative research design.

Guvadeen and Seasons (2018) posited that qualitative research designs improve understanding of programs from the stakeholder perspective. An embedded case study includes subunits of a single case (Yin, 2018). The single case in this study was the LDP, and the subunits were the group of managers of individuals who attended the LDP and the group of individuals who attended the LDP. Study data were gathered from the two groups using the Kirkpatrick evaluation model and the constant comparative method (CCM) for data analysis.



Yin (2018) stated case studies are an empirical method to investigate a contemporary case in a real-world context. A single program evaluation is a case study (Yin, 2018). Case study research has a functional role in evaluations by providing an indepth examination of the case or focus on outcomes (Yin, 2018). Yin suggested using multiple sources of data, such as interviews and observations in case study evaluations. For this study, the sources of data were from interviews with two subunits of the case: managers of individuals who attended the LDP and individuals who attended the LDP. The findings resulted from triangulation of the data from these two sources.

The units of analysis for the study were the embedded groups: managers of individuals who attended the LDP and individuals who attended the LDP. The study focused on the LDP attendees' achieved business results after participation in the LDP. Utilization of level 4 of the Kirkpatrick evaluation model demonstrated alignment between the conceptual framework and the research method of qualitative embedded case study. The evaluation model assessed business results for an LDP (i.e., the case).

In this study, managers of attendees of the LDP reported their perceptions of the effect of the LDP on the organization's business results. Attendees of the LDP also identified their perceptions of the impact of the LDP on the organization's business results. To determine if participation in the LDP affected organizational business results, the interview focused on the organization's business results. Triangulation of data from both groups enhanced the rigor of this study.

The quantitative approach was not applicable to this study because it involves the testing of hypotheses and statistical generalizations (see Choy, 2014). The goal for this



study was to develop in-depth insight into the effect of the LDP on the business results. There were no unique cultural groups or issues involved in the study, so an ethnographic design was not appropriate for this study (Marshall & Rossman, 2011). A grounded theory approach was not suitable because there was no desire to develop a theory to explain a phenomenon (Marshall & Rossman, 2011). The phenomenological approach was not appropriate either because there was no phenomenon to study (Grossoehme, 2014).

Definitions

Behavior: Attitudinal changes that take place in the personality of LDP participants as a result of attending the program (Rafiq, 2015).

Business results: An improvement in a process or service, cost savings, or revenue increase (Rice, 2011).

Cost savings: The reduction of costs that lead to an increase in profit or revenue (Rice, 2011).

Evaluation: An inquiry collection and synthesis process of information or evidence (Hannum, Martineau, & Reinelt, 2006).

Leader development: Training that is intrapersonal and focused on the individual (Day, Fleenor, Atwater, Sturm, & McKee, 2014).

Leadership development: The integration strategy to help people understand how to relate and coordinate their efforts with others, build commitments, and develop extensive social networks as they develop self-understanding to social and organizational

priorities (Day, 2000). Leadership development is interpersonal and focused on enhancing leadership capacity (Day et al., 2014)

Learning: A change in knowledge, attitude, and skills (Rafiq, 2015).

Process improvement: The systematic examination and improvement of an administrative process or a series of actions or steps leading to a result (Page, 2015).

Reaction: The LDP participants' thoughts and view of the LDP (Rafiq, 2015).

Results: An impact measure used to determine whether a program improved performance, such as ROI, higher profits, increases sales, improved quality, or decreased costs (Tourish, 2012).

Return on investment (ROI): The benefits of training less the cost of the training divided by the cost of the training multiplied by 100 (Rafiq, 2015).

Revenue increase: The increase of sales (Jegadeesh & Livnat 2006).

Service improvement: A systematic approach using specific techniques to measure and deliver sustained improvements in a specific area (Health Foundation, 2013).

Training: A short-term learning intervention intended to result in immediate performance improvement (Popescu, Popescu, & Iancu, 2010).

Assumptions

Assumptions made were about the observation of business results, the alignment of training with business goals and business results, and interviewees' honesty in self-reporting. The first assumption was that managers of individuals who attended LDP and individuals that attended the LDP could identify achieved business results. There was



also an assumption that the interviewees would respond based on their lived experiences based on attending the LDP.

The next assumption was that LDP outcomes and goals would align with business goals and business results. If the aims of the LDP did not align with the organization's goals and business results, it would have been hard to argue that the LDP had an impact on business results. Finally, there was an assumption that the interviewees were forthcoming and honest in their responses to interview questions. To encourage honesty, the participant notification informed interviewees that their responses would be kept confidential and their identities kept private. There was also a presumption that the interview questions were adequate to determine business results.

Scope and Delimitations

In this study, the perceived results of the LDP by managers of individuals who attended the LDP and individuals who attended the LDP were the focus. This chosen focus extends Rice's (2011) study. This study included data from managers of individuals who have attended the LDP as well as attendees of the LDP. One limitation of the study was restriction of the population to managers of attendees of the LDP and individuals that attended the LDP of the one target organization.

The populations excluded were the individuals that had not taken the LDP within 2 years of this study and individuals that had no knowledge of the LDP. The evaluation frameworks excluded from this study included the context, input, process, and product (CIPP) model; input-process-output (IPO) model; training valuation system model; context, input, reaction, and outcome (CIRO) approach; organizational elements model



(OEM); Phillips's ROI model; Kearns and Miller's KPMT model (which is an acronym based on the authors' names, Paul Kearns and Tony Miller); and the carousel of development model. These models are like Kirkpatrick's but do not include a level to assess business results. Kirkpatrick's model is well known and the most used evaluation model (Bates, 2004; Eseryel, 2002); therefore, other models include portions of the Kirkpatrick model. Kirkpatrick's Level 4, business results, was the basis of the study and the preferred framework for the evaluation method.

The LDP used in this study was unique to the selected government agency. Hence, the results may not be transferable to other LDP programs or organizations, and there may be difficulty generalizing the results because of this limitation. Case studies are particularistic in nature and may not be transferrable to other situations (Yin, 2018).

Limitations

Limitations are the weaknesses of the study that are beyond the control of the researcher (Bernard, 2013). This study was centered on self-reported impacts on business results. Self-reported responses may not be reliable because they are dependent upon the individual's perception and memory (Qu & Dumay, 2011). Individuals may not be honest or forth coming due to fear or workplace ramifications. The informed consent form addressed privacy and volunteering for the study. There was no baseline for LDP attendees' skills prior to training or organizational performance. The agency did not define business results before or after the LDP. The research focus was on the LDP.

At the time of this study, I worked for the government agency; therefore, my own experiences and feelings related to the agency could have potentially influenced the study



results. I was not in a management or supervisory role. To reduce the potential bias, I did not include any individuals known to me in this study. Using multiple sources of data to triangulate findings also mitigated the potential for researcher bias (see Yin, 2018). Finally, the quality of this study was dependent on my skills, perceptions, and experience level.

Significance of the Study

The study was significant because it addressed a gap in the literature regarding the assessment of the effectiveness of leadership development. Leadership development effectiveness is one of the hardest areas to measure because the benefits and outcomes of leadership development training are difficult to quantify and are often intangible (Culbertson & Owen, 2012; Grohmann & Kauffeld, 2013). There is a lack of clarity in evaluation methods (EMs) for leadership development (McGurk, 2010), and organizations may not close the loop with systematic evaluation of leadership development training (Hernez-Broome & Hughes, 2004).

This study was timely because organizations invest significant sums in training with the belief that leadership development provides them with a competitive advantage (DeRue et al., 2012). Decision-makers need to know that LDPs have a positive effect on their bottom line (Phillips et al., 2012). Rowden (2005) stated that in today's business environment of downsizing and global competition, the need to justify all expenses—including training expenses—should relate to organizational business results, which includes market share, growth, profit, and bottom line. Ployhart and Hale (2014) posited

that training is effective when most of the employees complete training because there is a ROI and this increases organizational results.

Significance to Practice

The study of management training is pertinent to organizational outcomes because of the strategic nature and contribution to the organization's competitiveness, and the training itself is significant in the creation of organizational capabilities that are difficult to replace (Aragón, Jiménez, & Valle, 2014). Trained employees are essential to a company's quality effort (Riotto, 2004). Organizations that invest in programs that develop and strengthen leadership enrich their future (Getha-Taylor, Fowles, Silvia, & Merritt, 2015)

Employees are the most significant assets in an organization (Karim, Huda, & Khan, 2012). Employees acquire or enhance the knowledge, skills, and attitudes (KSAs) that are essential to job performance through training programs. Successful training helps organizations achieve goals and objectives (Karim et al., 2012), and the evaluation of training programs helps decision-makers remain competitive by determining their training needs.

Organizational staff measure processes and outputs across departments, and executives demand the same accountability for training and development programs as they do for other departments (De Alwis & Rajaratne, 2011). When organizational resources become scarce (Phillips et al., 2012) and expenses increase, accountability for training and development departments within organizations becomes critical (De Alwis & Rajaratne, 2011). Accountability increases pressure on human resource managers to



measure training and development success (De Alwis & Rajaratne, 2011; Punia & Kant, 2013) and justify training and development expenses as they relate to the organization's bottom line, goals, and strategy via ROI (De Alwis & Rajaratne, 2011; Phillips et al., 2012). For example, human resource managers and trainers may justify training expenses by providing evidence of a positive impact to the organization, which has led to the growth of training effectiveness metrics over the last few years (Punia & Kant, 2013).

Few organizations evaluate training and its impact on organizational performance despite its importance (Griffin, 2012). Brinkerhoff (2006) posited that evaluation is a tool to improve performance and business results and, therefore, has a constructive purpose for the organization. Improvements in business results can become accomplishments by providing the findings of the evaluation to stakeholders, who can act to nurture and sustain things that are working and change those that are not working (Brinkerhoff, 2006).

The primary goal of the evaluation is to identify the organization's capacity to manage learning resources and leverage that into continuously improved business results (Brinkerhoff, 2006). On the other hand, the purpose of a LDP is to improve the operational effectiveness of the organization by improving its leadership capacity (Tsyganenko, 2014). LDP evaluations can empower stakeholders and decision-makers by showing the value gained or lost from training, defining outcomes for improved results, and demonstrating how management decisions can turn learning investments into valuable performance and business results.



Significance to Theory

In the past, there has been more focus on program planning and implementation than evaluation (Hayward, 2011). Historically, the outcomes of LDPs have focused on advancing individual characteristics and capacities with no connection to organizational business results or strategy (Hayward, 2011; Tsyganenko, 2014). Few evaluation studies have included results criteria (Collins & Holton, 2004; Tharenou, Saks, & Moore, 2007). Most organizations evaluate training on reaction criteria instead of results criteria (Tharenou et al., 2007). Grohmann and Kauffeld (2013) stated they found no questionnaire with all four levels of Kirkpatrick's evaluation model that applied to a variety of training content.

Research supporting the positive effect of training on organizational results and productivity is weak (Aragón et al., 2014; Tharenou et al., 2007), with the findings of some studies indicating that training does not affect productivity or organizational business results (Aragón et al., 2014; Tharenou et al., 2007). There are similar results for studies concerning manager training (Aragón et al., 2014; Tharenou et al., 2007). Overall, the empirical literature is ambivalent about the positive connection between organizational business results and managerial training (Aragón et al., 2014). Collins and Holton (2004) posited that there is a need for more studies with organizational outcomes to determine the effectiveness of LDPs at the system level.

Significance to Social Change

Day (2000) defined leadership development as an integration strategy to help people understand how to relate and coordinate their efforts with others, build



commitments, and develop extended social networks as they develop self-understanding to social and organizational priorities. Leadership development also involves aspects of leader development that focuses on the development of social capital (Derue & Myers, 2014). The results of this study could be used to enact positive social change for the organization and individuals. LDPs give individuals an opportunity to develop KSAs for the workplace and community.

The goal of the LDP is to develop an individual's skills and knowledge that parlay into better business results. LDP attendees develop skills and knowledge, which they use in their organizations and communities. Social change is possible as the specific governmental agency reviews and assesses the LDP based on the study results to improve leader effectiveness. This, in turn, will impact agency customers and U.S. society by providing faster turnaround and higher quality products and services. This agency serves the scientific community, businesses, manufacturers, and the community at large.

Summary and Transition

This study involved an assessment of the impact of an LDP on an organization's business results based on data collected from the managers of LDP attendees and LDP attendees themselves. Leadership experts warn that the future of leadership development depends on programs proving their worth (Hayward, 2011). Training must increase the capabilities of the trainee and the organization to be successful (Punia & Kant, 2013). Program evaluation is one way to assess LDPs, by which organizations can move toward more rigorous leadership development practices by focusing on their bottom-line benefits (Hayward, 2011).



Chapter 1 included an introduction of the conceptual framework, the nature of the study, and the methodology provided definitions of key terms; described the assumptions and limitations; and presented the background of the dissertation, the problem statement, the purpose of the study, and the research question. Chapter 2 contains the literature review on leadership development and program evaluation.



Chapter 2: Literature Review

The research problem in this study centered on the need to evaluate the impact of LDPs on organizational business results. Organizations invest large sums of money in leadership training, with little emphasis placed on determining the ROI of that training (Tourish, 2012). To conduct this literature review included an examination of sources and literature in the areas of leadership, leadership development, evaluation, and studies related to leadership development, training, and training evaluation. Although there is a large amount of literature on leadership and evaluation available, the main goal of this chapter is to identify the most relevant leadership theories, practices, and evaluation models to support the current study.

This chapter begins with the literature search strategy and the conceptual framework of the study and concludes with a review of leadership, leadership development literature, and program evaluation. The review includes a synthesis of leadership and leadership development theories and models, and provide a synthesis of program evaluation, evaluation models, and outcomes of LDPs.

Literature Search Strategy

The literature review incorporated contrasting and comparative viewpoints relating to leadership development, LDPs, organizational business results, program evaluation, program outcomes, and ROI. EBSCO Host, Business Source Complete, and Sage Premier databases and the Google Scholar search engine were used to locate and identify articles in management, leadership, and organizational journals.

Keyword search terms included business results, leadership, leadership development, LDPs, leadership training, program evaluation, leadership training evaluation, learning, organizational performance, reaction, training effectiveness, and training return on investment. Sources included in this review were located in professional, peer-reviewed journals, such as Journal of Leadership Studies, Leadership Quarterly, Organizational Development Journal, Leadership, and Organizational Management Journal, Performance Improvement Quarterly and other business journals. The literature review also included information obtained from organizations focused on leadership development, such as the Center for Creative Leadership.

Through the extant literature review, several leadership themes emerged around leadership development and organizational business results. These themes included the impact of leadership development on organizational outcomes, how to measure training impact, the effectiveness of training, and development programs.

Conceptual Framework

The basis of the conceptual framework was Level 4 of Kirkpatrick's evaluation model. The study extended the outcomes of Rice's (2011) study of a Fortune 500 company's leadership development course. Leadership is a high priority in modern organizations; definitions of leadership describe the traits, behaviors, and characteristics of individuals that influence others in their achievement of goals. Northouse (2015) stated that the definition has several components as well as that leadership is a process that involves influence, is local to a group, and includes goal achievement. Derue and Myers (2014) defined leadership as a social and mutual influence process with actors

engaging in leading-following interactions to accomplish a common goal, while

Dalakoura (2010) stated that organizations should develop leaders to survive and succeed
in a competitive business environment.

Over the last 3 decades, researchers have created numerous methods of developing leaders and coined many definitions of leadership development. Day (2000) defined leadership development as an integration strategy to train individuals to relate to others, build commitments, coordinate efforts, and develop social networks through the application of self-understanding to social and organizational requirements. Derue and Myers (2014) defined leadership development as the interdependent process of preparing individuals in leader-follower exchange.

The distinction between leader development and leadership development is that the former focuses on individuals and human capital, while the latter focuses on the interpersonal dynamics of leadership and emphasizes the development of social capital (Derue & Myers, 2014). Day et al. (2014) added that leader development is training that is intrapersonal and focused on the individual, and leadership development is interpersonal and focused on enhancing leadership capacity. In all cases, leadership development involves the aspects of leader development that focus on the development of social capital, in contrast to leadership development, which focuses on individuals and human capital (Derue & Myers, 2014).

The primary conceptual framework for this study was Kirkpatrick's evaluation model and Rice's (2011) study of a leadership development course. Gentry and Martineau (2010) stated the evaluation method depends on the type of outcome the



researcher is trying to measure. In this study, the goal was to determine the effect on the specific business results that align with Level 4 of Kirkpatrick's evaluation model (see Curado & Martins Teixeira, 2014).

In what is known as the most famous and most applied evaluation method, Kirkpatrick described four levels of training evaluation as reaction, learning, behavior, and results (Wankhede & Gujarathi, 2012). Tourish (2012) listed the impact measures as:

Level 1: Reaction – How participants react to the training.

Level 2: Learning – The degree that attendees have progressed in skills, knowledge, and attitudes.

Level 3: Behavior – The extent that learning has transferred to work behavior.

Level 4: Results – A measure of improved performance, including ROI, increased profits, improved quality, decreased costs.

Kirkpatrick's four levels become increasingly complex and informative. The levels progress from gathering the participants' reactions and feedback about training, learning effects, behavioral changes and impact on the organization's performance (Curado & Martins Teixeira, 2014). The first two levels occur during training and are assessed immediately after training (Curado & Martins Teixeira, 2014). Levels 3 and 4 occur several weeks after training to allow for training transfer (Curado & Martins Teixeira, 2014). According to Tamkin, Yarnall, and Kerrin (2002), the intent of the model is not a hierarchical, and many organizations do not use all four levels of the model (Eseryel, 2002).



DeSilets (2018) and Tamkin et al. (2002) suggested the measurement of each Kirkpatrick level is different. Both DeSilets and Tamkin et al. agreed that reaction questionnaires are assessment tools for Level 1 at the end of the program, with the questionnaire measuring the attendees' level of satisfaction with the training. Satisfaction level is the most frequently measured level of Kirkpatrick's model (Aragón et al., 2014). Performance tests are applicable for Level 2 according to Tamkin et al. DeSilets recommended tests, an audience response system, or case study, for Level 2. Tamkin et al. stated observations and productivity data are assessments for Level 3, while DeSilets suggested using a blended survey to include questions for the first three levels. The survey timing is weeks to months after the program (DeSilets, 2018).

DeSiltes (2018) concluded that Level 4 is the most time consuming and difficult. Tamkin et al. (2002) stated that the measurement of Level 4 is calculated by assessing ROI, costs, and quality. According to Kirkpatrick (2005), Level 4 is the most significant for the organization because it measures the extent training met the program goals and organizational needs. Evaluators rarely completed Level 4 assessments regardless of the potential significance to the organization (Aragón et al., 2014). High costs, difficulty in collecting data, interpreting the data, and lack of a method for measuring the results were reasons for bypassing the Level 4 assessment (Aragón et al., 2014).

Although Kirkpatrick's model is one of the best known and most used evaluation models (Bates, 2004; Eseryel, 2002), there is criticism for its limitations (Kennedy, Chyung, Winiecki, & Brinkerhoff, 2014). King and Nesbit (2015) noted problems using



the model in LDP evaluations. Bates (2004) and Tamkin et al. (2002) posited that the model has the following three limitations:

- There is an assumption that each level offers data more informative than the prior level.
- 2. The model has an oversimplified view of training effectiveness that does not consider contextual or individual influences in the evaluation process.
- 3. Kirkpatrick's model presumes the four levels represent a casual chain such that greater learning is follows positive reaction from training.

Kennedy et al. (2013) stated there were only a few studies that involved using the fourth level in the evaluations. Twitchell, Holton, and Trott (2000) indicated that the top reason U.S. organizations did not conduct four-level evaluation was because it was not a requirement. Of the 40% of survey participants whose organizations required Level 3 and 4 evaluations, 4 out of 5 stated that they did not believe that the evaluations had minimal value (Twitchell et al., 2000), possibly because there are barriers to completing Kirkpatrick's Level 3 and 4 evaluations, as evidenced in the literature.

Twitchell et al. reported a third of the participants in their study stated costs and a lack of training as barriers to completion, and Pulichino (2007) reported difficulty in access to the data necessary for the evaluation, that evaluations were too time consuming, and lack of management support for Levels 3 and 4 evaluations were barriers.

Participants also claimed they did not have the expertise to complete the evaluations (Pulichino, 2007). The American Society for Training & Development (2009) reported its respondents' reasons for not completing evaluations as follows:



- It was too difficult to isolate the training's impact on results as opposed to other factors.
- Their learning management system did not have a useful evaluation function.
- Standardization of evaluation data is not enough to compare well among each function.
- It costs too much to conduct Level 3 and 4 evaluations.
- Organization leaders did not care about evaluation data.
- Interpreting the data is too difficult.
- Consideration of evaluations was not credible.
- Other researchers developed models in response to the criticism to extend
 Kirkpatrick's model or use it as a baseline to create new models.

Regardless of the limitations, Level 4 business results of the Kirkpatrick model addressed the research question and was the most appropriate model for the study.

Moreau (2017) described Kirkpatrick's model as an outcome-focused evaluation model.

Other evaluation models have based their assessments on modifications or additions to Kirkpatrick (Tamkin et al., 2002).

According to Rice (2011), the use of some portion of the Kirkpatrick model is a common LDP evaluation practice. The conceptual framework in this study included Rice's (2011) work because it was also a study of a leadership development course with a focus on the evaluation and outcomes of the course. The purpose of applying this framework was to extend Rice's study and fill a knowledge gap related to the LDP participants' impact on the organization's business results.



Literature Review

The literature review revealed a large volume of research dedicated to leadership and leadership development, and the most common training evaluation model was the Kirkpatrick model. The literature review indicated how the Kirkpatrick model grounded later models (i.e., the OEM, Phillips's ROI, Kearns and Miller's KPMT model, and the CIRO approach) and that other evaluation models attempted to focus on the purpose of evaluation and different measures (i.e., responsive and educational evaluation, evaluative enquiry, learning outcomes, and a balanced scorecard).

Leadership

There are many approaches to leadership research, from a definition of leadership traits to a process, including emotions, learning, and interpersonal relations. Gregoire and Arendt (2014) classified the approaches as trait, behavioral, power/influence, contingency/situational, and reciprocal. Early research on leadership in the 1900s concentrated on the trait approach (Gregoire & Arendt, 2014). The trait approach attempted to identify personal characteristics of effective leaders (Gregoire & Arendt, 2014). Researchers developed a trait model that provided the theoretical basis for research on leadership traits (Gregoire & Arendt, 2014).

The body of literature on leadership theory and practice addresses leadership models, the need for leadership, how leadership affects organizations, leadership strategies, leadership development, and leadership programs (Avolio, Walumbwa, & Weber, 2009; Collins, 2001; Day, 2000; Van Vugt, 2006; Yukl, 2008). Ardichvili and Manderscheid (2008) provided an overview of leadership theories that are foundations of



leadership development practices, such as leader-member exchange (LMX), transformational leadership, servant leadership, situational leadership, authentic leadership, and complexity theory. Horner (1997) and Yammarino (2013) also provided an overview of leadership and leadership theories. Chemers (2000) posited that the most influential theories, included the great man theories, trait theories, behavioral theories, participative leadership theories, situational theories, contingency theories, and transactional/transformational theories.

LMX began with the review of relationships between leaders and their followers. Avolio, Walumbwa et al. (2009) noted that the main idea in LMX is that leaders develop different exchange relationships with their followers; therefore, the quality of the relationship changes the impact on leader and member outcomes. The theory asserts that leaders have two relationships with direct reports: in-group and out-group (Avolio, Walumbwa et al. (2009).

Transformational leadership includes three types of leadership behavior: transformational, transactional, and laissez-faire (Ardichvili & Manderscheid, 2008). In transformational leadership, the leader engages subordinates and creates relationships to improve motivation levels, commitment, and morality (Ardichvili & Manderscheid, 2008). Transactional leaders concentrate on the exchange of favors between leaders and followers as well as rewards or punishment for performance, while laissez-faire is a passive type of leadership involving a hands-off leadership style (Ardichvili & Manderscheid, 2008).



Servant leadership, marked by a positive relationship to follower satisfaction, job satisfaction, intrinsic work satisfaction, caring for the safety of others, and organizational commitment (Avolio, Walumbwa, et al., 2009) offered little in the way of empirical research, and metrics for evaluation are a well-documented problem. Authentic leadership is relatively new to leadership theory and practice, dating to 1990 with the development of leadership coaching and training programs (Ardichvili & Manderscheid, 2008).

Avolio, Walumbwa, et al. (2009) defined authentic leadership as leader behavior that is transparent, ethical, and encourages openness in sharing information and inputs from followers for decisions. The complexity theory of leadership applies complexity concepts to the study of leadership. Leadership defined within this context is an interactive system of unpredictable agents acting in complex feedback networks that produce adaptive outcomes (Avolio, Walumbwa, et al., 2009).

Viewing the leader and follower in a straightforward exchange does not adequately explain the complete dynamics of leadership (Avolio, Walumbwa, et al., 2009). The unit of analysis for complexity leadership is the complex adaptive system (Uhl-Bien, Marion, & McKelvey, 2007). The three leadership roles explored in complex adaptive system explores are (a) adaptive (engaging others in brainstorming), (b) administrative (formal planning), and (c) enabling (minimizing constraints of bureaucracy to promote follower potential). Avolio, Walumbwa, et al. (2009) concluded that complexity leadership is deficient of substantive research, possibly the result of the difficulties in assessing the construct in a changing context.



The power/influence approach describes leadership effectiveness in terms of the type and amount of power held by a leader, and their influence over others (Gregoire & Arendt, 2014). Position power relies on the individual's position. Personal power, expert power, and referent power comes from the individual's characteristics (Gregoire & Arendt, 2014). Research on leadership effectiveness began at research centers at Iowa in the 1930s, and Michigan and Ohio State in the 1940s and 1950s (Avolio, Reichard, Hannah, Walumbwa, & Chan, 2009).

Lewin conducted studies on managers' leadership style at the University of Iowa and concluded that there were two management leadership styles—autocratic and democratic (Lussier & Achua, 2015). Managers with the autocratic leadership style make all decisions, whereas managers with the democratic leadership encourage employees to participate in decision-making. The Michigan study, conducted by Dr. Rensis Likert, added a participative leadership aspect to the Ohio findings (Gregoire & Arendt, 2014). Research at Michigan and Ohio indicated two classifications for leadership behavior—human interaction, and the job itself (Gregoire & Arendt, 2014).

The Managerial Grid, later named the Leadership Grid, demonstrated this twodimensional approach to leadership (Gregoire & Arendt, 2014). Leadership effectiveness did not consider situational factors, according to Gregoire and Arendt (2014). This omission resulted in research on contingency and situational approaches to leadership.

Other models included the least preferred coworker contingency model, path-goal theory, leader's substitute theory, multiple linkages model, and cognitive resources



theory. The path-goal theory implies the leader's behavior affects the subordinate's job satisfaction and effort (Gregoire & Arendt, 2014).

The Leaders Substitute theory centers on the features (i.e., subordinates, tasks, and organization) of any given situation that diminish leadership importance and focuses on substitutes for situations—such as those that make the leader behavior unnecessary—and neutralizers that invalidate the leader behavior (Gregoire & Arendt, 2014). The theory offers an alternative to leadership influence in such as work design, reward systems, informal peer leadership, and self- management.

Yukl's (2008) multiple links model demonstrates the effects of leadership behavior and the situational variables on intervening variables (ability and role clarity, the organization of work, cooperation and mutual trust, resources and support, external conditions, and task commitment) that establish a work groups' performance. This model was the first to focus on leadership process at the group level Gregoire and Arendt (2014). The contingency resource theory proposes that the interaction of the leader's traits, behavior and leadership situation determines the group performance (Gregoire & Arendt, 2014).

In the past, the study of leadership involved studying successful leaders and their organizations. This point of view used the leadership skillset approach to development (Conger, 2010). Fiedler (1996) posited that early leadership research was a complex interaction between the chosen leader, organization, and social environment. Day (2000) concurred in considering leadership an individual-level skill. Individual development concentrates on an individual's capacity to participate in leading-following activities and



assumes that developing an individual's KSAs will lead to a more efficient leader. In the 1970s, leadership research moved to advanced levels of analysis within groups, and via multiple leader-follower relationships within a group (Yammarino, 2013).

Researchers currently challenge this view, and the perception is that leadership is a phenomenon that exists between people, and not within individuals, or performed by individuals (Derue & Myers, 2014; Kennedy, Carroll, & Francoeur, 2013). Similarly, activities to develop an individual leader's skills will indirectly change the leading-following relationship among the actors (Derue & Myers, 2014). DeRue and Myers (2014) posited that leadership development literature covers three levels of analysis—individual, relational, and collective. Most of the leadership research has been on the individual level (DeRue & Myers, 2014).

Leadership Development

Day (2000) argued there is little research on advancing theories of leader development. Nine years later, Avolio, Walumbwa, et al. (2009) commented there had been little advancement on research into the factors that contribute to or detract from leadership development. Day and Sin (2011) attributed this is in part due to the difficulty in combining the construct of leadership with a similarly complex topic of development. Leadership development is a complex topic to study because it includes change and the consideration of time in theory and research (Day & Sin, 2011).

Day (2000) posited that the past literature concentrated on individual leader development at the cost of leadership development. As organizations move to a more collective and shared model of leadership, it is important to acknowledge that both

leadership and leadership development theories explain the development of leadership capacity (Derue & Myers, 2014).

Traditionally, only a small portion of the literature included executive leadership, with much of it focused on interpersonal dynamics and relationships between leader and followers (direct leadership; Zaccaro & Horn, 2003). But this trend has shifted, with more studies focused on executive leadership (Zaccaro & Horn, 2003). McCauley (2008) posited that most of the leader development research focused on leader interventions for development, with an emphasis on LDPs, multisource feedback, and mentoring. Other recent research addresses executive coaching, developmental assessment centers, action learning, networks, and developmental assignments (McCauley, 2008).

McCauley (2008) described LDPs as off-job events that offer shared learning and development experiences with a variety of content, techniques, purpose, and outcomes. McCauley suggested that researchers also referred to LDPs as training programs. Although LDPs are growing, research suggests that there is little time spent evaluating their effect on organizational business results. There is an assumption that the training will result in improvement in the individual, and therefore an improvement and positive impact on the organization's business results (Collins, 2002; Collins & Holton, 2004). When managerial leadership development was a relatively new field, there was minimal literature regarding what was or was not effective about organizational outcomes (Collins, 2001; Collins & Holton, 2004). Collins and Holton (2004) found less than 10 percent of the studies focused on the organizational level with most focused on organizational strategy and structure.



Tsyganenko (2014) stated that the conventional wisdom was that training individual leaders on specific skills and abilities would result in leadership and added that there was an assumption that LDP participants' improvement would lead to an increase in organizational business results. Inherent in LDPs is the idea that if the individual leader improves, the leader will influence or improve the performance of followers, thus leading to an increase in the organization's business results (Ray & Goppelt, 2011). With these assumptions in mind, changes have occurred in leadership development to enhance the effectiveness of leaders (Tsyganenko, 2014). The challenge is to create LDPs that produce efficient and dynamic leaders. LDP organizational goals enhance leadership capacity by improving the organization's effectiveness (Tsyganenko, 2014).

The leadership development literature has grown rapidly over the past 40 years (Day, 2000). This increase in interest stemmed from the belief that leadership development can create a competitive advantage, provide a source of profit and motivation for competitive change (Dalakoura, 2010), and improve overall business results of the organization. Organizations need leadership development at all levels to survive in today's competitive and turbulent business environment. Past research on leadership succession found a relationship between who was in charge and organizational performance (Kaiser, Hogan, & Craig, 2008).

The current literature on leadership development indicates that organizations are committed to the development of leaders and management, and growing training and development budgets support this phenomenon; leadership development is now the largest expense in the training and development budget of most organizations (Ardichvili,



Natt och Dag, & Manderscheid, 2016). Despite the substantial investments in training, most organizations are not satisfied with the outcomes of LDP training (Ardichvili et al., 2016). Baldwin and Ford (1988) and Burke and Day (1986) both acknowledge that individual participation in management programs rarely lead to change at the organizational level, while Martineau (2004) stated that organizations that invest in development found financial payoffs and understand that employee expertise is critical to competitive performance.

Leadership Studies

Hunter, Bedell-Avers, and Mumford (2007) stated that the typical leadership study begins with a self-reported survey or questionnaire based on a leadership assessment tool. The assessment asked participants to assess their manager's behavior, and for managers to assess their own behavior. The assessment results combine with organizational performance or commitment (Hunter et al., 2007). An example of such a study is the Krishman's study, which included the multifaceted leadership questionnaire and the measure of LMX, disseminated to 281 employees to rate their immediate supervisor's behavior (Hunter et al., 2007). The researcher found that transformational leadership enhances the use of friendliness as LMX improves the use of reasoning and decreases the use of authority (Hunter et al., 2007).

In another study, Rosete and Ciarrochi (2005) examined the relationship between emotional intelligence (EI) and transformational leadership. The researchers, who included 41 managers equipped with EI and other personality variables, asked senior supervisors to assess these management's organizational performance. In their



correlational analysis, Rosete and Cirraochi's found that managers with higher EI ratings were more likely to achieve business outcomes and subordinates considered them effective leaders

A third example of a leadership study was Lee's (2005) examination of LMX and organizational commitment of 220 engineers and scientists using LMX and multifaceted leadership questionnaire, a self-report tool used to assess the organizational commitment of participants. Lee (2005) found that research and development organizations should attempt to select and foster transformational leadership qualities for increased performance and effectiveness of followers. These studies involved the collection of subordinate perceptions of their manager's behavior using pre-developed measures and approaches to characterize leadership (Hunter et al., 2007).

These are representative samples of leadership studies, but there were a few flaws in these studies. Two common flaws were the assumptions that individuals reporting the behavior were witnesses to said behavior, and that a leader's behavior affected their subordinates' actions or perceptions. Hunter et al. (2007) noted that there is an assumption that all managers are leaders, which is another common flaw of leadership studies. A consideration of the context in which leader behavior occurs is omitted in the average leadership study (Hunter et al., 2007); in other words, studies do not consider the situation or factors affecting behaviors. Another flaw is recognizing leadership as a process with a series of events/activities and exchanges and not a single event/activity (Hunter et al., 2007).



Leadership Development Studies

The literature and related studies on leadership development are vast, and on an upward trajectory over the past few years (Dalakoura, 2010). Burke and Day's (1986) meta-analysis served as the principle empirical foundation to measure the effectiveness of managerial training in LDPs (Collins & Holton, 2004; McCauley, 2008). Their meta-analysis included 70 published and unpublished studies over a 30-year period (1951-1982), with participants from managers and supervisory staff representing industry and business. Burke and Day used the criterion categories subjective learning, objective learning, subjective behavior, and objective results.

Burke and Day (1986) found that managerial training focused universally on improving individual managerial skills and on-the-job performance. Poor reporting, incomplete details of the research methodology, missing information about the degree of range restrictions, and criterion reliabilities hindered the meta-analysis study process of LDPs in the original studies (McCauley, 2008). Due to the lack of evaluative research, Burke and Day believed that organizations were not aware of the impact of LDP training on job performance. Therefore, they recommended that organizations improve their evaluation process to provide effectiveness metrics for training programs. McCauley (2008) identified a need for more empirical research on LDPs.

Two research studies in 2000 focused on acquired leadership skills through the development processes. U.S. military studies by Mumford, Marks, Connelly, Zaccaro and Reiter-Palmon (2000) and Mumford, Zaccaro, et al. (2000) explored the leadership skills that leaders acquired over the course of a career. These studies assessed complex

problem-solving skills, creative thinking skills, social judgment skills, solution construction skills, and leader knowledge or expertise. Mumford, Marks, et al. found that skills increased between junior-level to mid-level positions, and between mid-level to upper-level positions.

Twenty years after Burke and Day's (1986) meta-analysis, Collins and Holton's (2004) conducted a meta-analysis of 83 managerial studies. The Collins and Holton study was a replication of the Burke and Day study, which found that managerial training had a positive outcome, and called for a clarification of effectiveness criteria, specifically with respect to the impact on organizational outcomes.

Unlike the Burke and Day (1986) study, Collins and Holton's (2004) analysis included education, government, medical and military management, along with business and industry leaders. Another difference between the analyses is that Collins and Holton included studies that assessed objective behavior—on-the-job behavioral changes observed by a supervisor. Two studies of 70 in Burke and Day's meta-analysis and 11 studies of 130 in Collins and Holton had organizational-level outcomes.

Both analyses concluded that the effectiveness of leader development programs varied; however, the average effect sizes were positive within all criteria (McCauley, 2008). Both studies indicated that LDP content and criterion used to measure effectiveness varies between programs. Collins (2002) found 16 out of 54 management development studies conducted between 1986 and 2000 had organizational level performance as the outcome variable. In addition, Collins in his literature review found no management development studies with organizational outcomes from 1986 to 1990.

Dalakoura's 2010 study examined the effects of leadership development on organizational performance and showed a positive relationship between leadership development and performance. The study sample included 112 Greek and multinational firm human resource managers from 18 industries. The structured questionnaire focused on the organization's practices regarding leadership development, management's commitment to leadership development, and leaders developing other staff. A limitation of the study is the single source of data from human resource managers.

Dalakoura (2010) conducted a study of a Greek multinational firm's human resource directors to identify the constructs that affect leadership development and the impact on organizational performance. The data collection instrument was a structured questionnaire with a sample size of 112 directors that represented 18 industry sectors and a 56.6% response rate. A limitation of the study was a sole source of information. However, Dalakoura noted that the respondents were subject matter experts and that the data was reliable. Another limitation of the study was it did not include hard data on the firm's outcomes; instead, the company's performance was measured by 20 performance criteria using a 7-point scale, ranging from "well below average" (which qualifies as a rating of 1) to "well above average" (which rates 7). The study results indicated that leadership development had a positive impact on organizational performance as measured through financial outcomes.

Conservative views of organizational leadership assume that leaders significantly influence the performance of organizations they lead (Thomas, 1988). This individualist point of view conflicts with the contextualist view of the situational constraints that



influence leaders. Lieberson and O'Connor (1972) found in their study of the impact of the top leadership role on an organization's performance that leaders have minimal influence on organizational performance. Later studies questioned their methodology.

A recent study of nursing leaders found that Kirkpatrick's evaluation model was relevant but called for additional research to explain the relationship between LDP participation and behavioral changes that produce organizational outcomes (Vitello-Cicciu, Weatherford, Gemme, Glass, & Seymour-Route, 2014). The research question was: "What changes do nurse leaders describe in their leadership practice following participation in an LDP" (Vitello-Cicciu et al., 2014, p.171)? The study data consisted of self-reported behavioral changes, which was a limitation.

In addition to the end of course evaluation, there was a need to determine the behavioral changes in nursing leaders following an LDP to decide to continue financial support for the program. The study included 34 nursing leader participants in the Leadership Academy. The LDP's goal was to enhance leadership development in midlevel nursing leaders in practice and application. Focus groups of leaders self-reported an online questionnaire on Kirkpatrick's Level 3—behavioral change—after completion of an LDP. The study indicated that one group of participants was able to identify increased self-awareness as a leader and incorporate their learning into new leadership behavior within six to nine months after training (Vitello-Cicciu et al., 2014). Researchers were also working to complete a method to determine Kirkpatrick's Level 4, results of the study.



King and Nesbit (2015) evaluated an Australian government's LDP to explore the work environment and behavioral changes after staff attendance of an LDP. The goal of the study was to explore programs to develop leaders with cognitive and behavioral complexity to lead in demanding environments (King & Nesbit, 2015). Thirty participants attended 1 of 3 workshops. The research method used a traditional quantitative approach developed from Kirkpatrick's model completed immediately after the training.

A second evaluation stage was a qualitative assessment with a semistructured interview conducted 3 months postprogram. The study analyzed the feedback from both methods on the same topics. EMs focused on reflection assessment of personal learning providing more details on the learning experience than a traditional approach, the Kirkpatrick model (King & Nesbit, 2015). The study found that 77% of the participants reported a behavioral change related to the LDP. The study used a qualitative approach to determine the postlearning impact of the LDP program (King & Nesbit, 2015). The approach aligned the LDP design, strategic business objectives, purpose of the program interventions, learning objectives, and evaluation.

Packard and Jones (2015) included performance outcomes in their evaluation of a leadership development initiative. The evaluation included two impact measures, changes on the job, and effect of the program, to determine performance outcomes. Both the participant and their supervisor reported the changes on the job. Supervisors reported their observations of the changes. The participant reported the effect of the program. Packard and Jones (2015) defined effect as the change attributed to the training.



Salicru et al. (2016) conducted a case study of an LDP of a 180-year-old Finnish company, with locations in 70 countries. The LEAD program was a 1week intensive residential program targeted toward experienced managers, and focused on skills to motivate, lead, and manage participant's achievement of business results by engaging employees. The goal of the study was to investigate what evidence could qualify LEAD as a best practice; explain how and why its components made an impact on participants' transfer of behavior and learning in the business; and advance global leadership development theory (Salicru et al., (2016).

The case study used a mixed method triangulation design that included Kirkpatrick's evaluation model. The triangulation included external bench marking from the industry, a review of the literature and primary data (interviews, observations, and surveys), and secondary data (archival records, analysis of documents, and participant evaluations; Salicru et al., 2016). Results included each of the four levels of Kirkpatrick's model (Salicru et al., 2016). There was a good to excellent participant satisfaction rating (Level 1), and greater than two-thirds of the participants believed they were able to have a significant to high impact on business results (Level 4). Evaluators noted the remaining two levels (Level 2- learning, and Level 3-behavioral changes) during networking and observations of small group work. A reported limitation was the lack of focus groups.

Business Results

A review of the literature revealed researchers interchanged the terms business results, business performance, business outcomes, and business effectiveness. The terms



often excluded the word business in the literature. Talbot (2010) posited that performance research continued because of the purpose of the organization and stakeholders' interest in the organization and the need to determine how well the organization is doing. Talbot stated that performance measurement of public services was increasing.

In the past, researchers encountered the same challenges of today in defining and measuring effectiveness and performance (Talbot, 2010). As early as 1916, the U.S. Congress established the Bureau of Efficiency to address waste in the government. This early research focused on organizational effectiveness, now known as performance (Talbot, 2010). Performance measurement started in or around the 1980s or early 1990s (Talbot, 2010).

The Government Accountability Office (GAO) established the Government Performance and Results Act (GPRA) of 1993 to ensure government agencies use performance information in decision making and reporting results and performance (U.S. Government Accountability Office, 2012). The GAO updated GPRA in 2010 to the GPRA Modernization Act, also known as the Modernization Act or GPRAMA. The goal of GPRAMA was to increase the managerial use of performance data by establishing a series of performance routines that enabled cross-agency goals (Moynihan & Kroll, 2016). GPRAMA also included language about managerial accountability for results and performance.

The Office of Management and Budget now encourages agencies to improve government effectiveness by increasing the use of program evaluations in making a



budget, and management decisions (Moynihan & Kroll, 2016). Per Aragón-Sánchez et al. (2003), there is little and only recent research regarding training impact on business results. Most studies do conclude that training has a positive effect on productivity, quality, labor turnover, and financial results (Aragón-Sánchez et al.,2003). Aragón-Sánchez et al. stated the business world does not apply Level 4 because of the technical difficulty of results evaluation and the lack of research focused on developing a method to evaluate on the level.

A reason for this is the difficulty in determining a reliable indicator of training incidence, made more difficult due to the existence of tangible and intangible returns.

Aragón-Sánchez et al. addressed the issue by applying two results dimensions, effectiveness, and profitability. The assessment of effectiveness was determined by translating costs into economic terms. Aragón-Sánchez et al. stated that the measurement of results referred to the whole organization or department.

Aragón-Sánchez et al. (2003) focused on analyzing the effect of training on business results in a study of 457 European small to medium-sized enterprises. The conclusion was training conducted inside the organization with outside trainers affects several result measurements positively, while on-the-job training influenced a higher number of results positively. In the Tourish (2012) leadership development study, only 32% of 192 organizations included business results in their evaluation, although it was the most crucial category per the researchers.

Kirkpatrick defined results as evaluative methods of a training program's effect on achieving organizational objectives, which included costs, profits turnover, and



absenteeism Level 4, business results, focused on outcome measures to determine training effectiveness and results. The model promoted awareness of thinking of assessment in business terms, results. Tourish (2012) defined business results as a return on investment, higher profits, increased sales, improved quality, and decreased costs. Phillips et al. (2012) described business results as output, quality, time, and costs associated with the program. DeSilets (2018) stated a Level 4 could include a variety of sources such as cost analysis, financial value, quality, or output.

The fourth level, business results, the assessment does not occur in evaluations due to the high cost of collecting data and difficulty in interpreting the data (Aragón-Sánchez et al., 2003). Another reason is not having a precise method of measuring results (Aragón-Sánchez et al., 2003). Tourish (2012) proposed three questions to assess the impact of business results:

- 1. Were the goals set in the prior 12 months met?
- 2. Are the problems resolved?
- 3. How can you quantify the results?

The goal is to identify the problems, challenges, and targets at the beginning of the program and focus the training to provide the needed help to address each one (Tourish, 2012). The evaluation results will align with the lists and are identifiable as completed or accomplished after training (Tourish, 2012). Kirkpatrick's model does not include a means of measuring business results. Other models include varying methods of measuring business results. The Program Evaluation section includes evaluation models.

Program Evaluation

Program evaluation became significant in the United States during the Kennedy administration in the 1960s (Linzalone & Schiuma, 2015). This was a period when the government invested large sums in the Great Society social programs. The effect of these programs is still unknown (Linzalone & Schiuma, 2015). There is some change since the Kennedy era regarding program evaluation. Singh (2013) stated that although training evaluation is an important human resource strategy, systematic evaluation is the least well carried out training activity.

It is critical to assess the impact of leadership development, considering the importance of organizational leadership and the substantial investment in training leaders (Martineau, 2004). Although training effectiveness is critical to organizations, organizations rarely evaluate training (Medina et al., 2015). Singh (2013) concurred and posited that training evaluation is an important human resource development strategy. Nevertheless, there appears to be a consensus that systematic evaluation is not a well carried out training activity (Singh, 2013). There were many reasons for not conducting training evaluations, such as lack of experience, difficulty identifying, and measuring participant satisfaction and the future purpose of the evaluation due to cost, impractical use of the results, and difficulty in evaluating results (Medina et al., 2015).

There is a renewed interest in the evaluation of managerial LDPs (Holton, 1996), with researchers exploring the cause-effect relationships between interventions and training participants' learning, behavior, and system-level results (Collins & Holton, 2004). There are two types of evaluations—formative and summative. To develop an



evaluation, it is important to understand the purpose of the evaluation (Chyung, 2015). The evaluation purpose drives the type of evaluation.

For example, a formative evaluation applies if the goal is to improve the quality of the program, and a summative evaluation applies if the goal is to focus on the outcomes or results of the program (Chyung, 2015; Eseryel, 2002). The formative evaluation included investigating the resources used and the implementation of the program, the merit. Evaluators considered the results, but they were not the focus of the assessment. The researchers' summative evaluation concentrated on results but includes the resources and processes of the program. Defining the purpose of the evaluation determines whether there is a focus on the merit or worth of the program (Chyung, 2015).

As with leadership, there are varying definitions of evaluation. Hannum et al. (2006) defined evaluation as an inquiry process to collect and synthesize information or evidence. Chyung's (2015) included a systematic collection and analysis of information regarding the program's processes and outcomes. Chyung also considered evaluation to be an investigation about something to answer questions for specific groups of people, organizations, or society. Linzalone and Schiuma (2015) defined evaluation as the analysis and measurement of the effectiveness of a program's activities. The evaluation included a judgment of the effect and progress, a comparison of the planned effect and the actual effect of activities. Linzalone and Schiuma added that evaluation is a group of research methods that systematically investigates the success of programs, policies, projects, and other social interventions.



Ayob and Morell (2016) stated that evaluation includes cost analysis, process evaluation, performance measurement, impact/outcome assessment, and organizational effectiveness. The evaluation is a means to review a program concerning its criteria, value, and standards (Ayob & Morell, 2016). Scriven (2016) defined evaluation as the systematic study of merit, worth and significance.

The goal of evaluation is to help managers, employees, and Human Resource development professionals make informed decisions about programs and methods (Kumar, Narayana, & Vidya Sagar, 2012). There are also additional benefits such as improving the economic, social and condition of people's lives. Pineda (2010) stated that evaluation consisted of gathering training results to analyze and review them for optimization of future training. Pineda posited that training evaluation is the analysis of the total value of a training system for action in financial and social perspectives to determine if the program achieved its objectives and the cost-benefit. Chyung (2015) stated the goal was to provide evaluative conclusions about the value, quality, or significance of the subject studied.

The evaluation includes ongoing feedback from the learner, the trainer, and the student's supervisor to improve the quality of the training and identify whether learners met the objectives (Singh, 2013). Evaluation should consider effectiveness in both qualitative and quantitative terms about the organizations (Singh, 2013).

There are two opportunities to conduct evaluations: at the front-end, and at the back-end of an intervention (Chyung, 2015). A front-end evaluation measures the need or opportunity to refine goals of the intervention (Chyung, 2015). Front-end evaluations



are also known as needs assessments and include context and input evaluations. Backend evaluations assess the quality and value of the intervention, and include process and product evaluations (Chyung, 2015). The result of the evaluation is usually a report with evaluative conclusions and recommendations to improve, or judgment about, the quality and value of the intervention (Chyung, 2015). Singh (2013) referred to program evaluation forms as happy sheets, and a crude form of evaluation. This type of evaluation is not useful in supporting training to stakeholders who are interested in how training expenditures contribute to organizational growth (Singh, 2013).

The literature does not support a best evaluation approach or model for all situations (Linzalone & Schiuma, 2015). The approach or model varies with the factors such as the intent of the evaluation, the stakeholders, and match with the core values (Linzalone & Schiuma, 2015). The evaluation may use more than one method or approach. In the past, evaluation models focused on factors that enabled or prevented the transfer of individual learning back at work. Evaluations captured learning of fixed objectives, Watkins et al. (2011) and Edwards and Turnbull (2012) suggested there is a need for a more robust evaluation approach that assesses changes that affect the individual and the organization.

The lack of formal research and empirical data with respect to LDP evaluation led to the development of models. Carden and Alkin (2012) suggested that the evaluation community use the terms theory and model interchangeably, though theory in this application is neither descriptive nor empirical. The difficulty in creating a descriptive



evaluation theory is due to the complexity of the programs and the evaluator's extensive actions for the evaluation (Carden & Alkin, 2012).

According to Carden and Alkin (2012), fully developed prescriptive evaluation theories consider (a) issues related to the methodology used in the evaluation, (b) the user focus of the evaluation, and (c) the assessment and value of the data (Carden & Alkin (2012). Alkin and Christie (2004) grouped evaluation theories in three dimensions: methods/role, judgment/valuing, and use.

One of the first major method theories was Tyler's work on The Eight Year Study, which included taxonomic classification of learning outcomes, the need to validate indirect measures against direct indicators, formative evaluation, decision-oriented evaluation, criterion-referenced, and objective referenced test (Alkin & Christie, 2004). Suchman viewed evaluation as a form of research, and conducted evaluations in a scientific manner, noting that the researcher must acknowledge the administrative criteria to determine the value of conducting the study (Alkin & Christie, 2004). This concept set the tone for other researchers. Branch, like Campbell, considered random field experiments as the best evaluation approach. Rossi departed from the random experimental model and moved to internal and external validity, implementation, and use (Alkin & Christie, 2004).

Due to criticism, Rossi developed tailored evaluation that refined the evaluation focus and tailored the evaluation to the program. Rossi, Weiss, and Chen developed some of the initial ideas about theory-driven evaluation, which includes the construction



of program theory used to guide the evaluation (Alkin & Christie, 2004). According to Rossi, this approach reconciles the two main types of validity: internal and external.

Scriven's (2016) work grounded the valuing theories group and stated that evaluation had to include valuing concept and make value judgments about the object studied (Carden & Alkin, 2012). In contrast, Eisner's model makes value judgments about the quality of an object, process or situation (Alkin & Christie, 2004). Lincoln and Guba (1986) acknowledged the diversity of the perspective held by stakeholders and understood the evaluator's duty to present the value to different stakeholders (Alkin & Christie, 2004).

Patton's work included the use of evaluation dimension, and did not focus on decision-makers, but rather on procedures that would improve utility to more stakeholders by identifying the true beneficiaries of the evaluation - its primary users (Alkin & Christie, 2004). Patton developed the utilization-focused evaluation which included seeking the primary users as the first step in evaluation. Alkin also focused on the decision-making issues in evaluation. Alkin's CSE model and Stufflebean's CIPP model were similar in focusing on decision-making, but Alkin recognized that process and product both have summative and formative dimensions. Alkin and Christie (2004) considered the process as summative (program documentation) or product as formative (outcome).

There are many EMs. However, there are few published studies focusing on estimating behavior, and the financial effects related to LDPs (Day et al., 2014). The literature has several classifications of EMs. Hentschel's (1999) classified the four types



of EMs as either qualitative or quantitative research EMs. The four types of EMs are standard household survey, ethnography, economic anthropology, and subjective welfare. Stufflebeam and Shinkfield (2007) classified EMs differently as three major types and sub-types:

- 1. Questions and/or methods-oriented
 - Questions-oriented
 - Methods-oriented
- 2. Improvement/accountability-oriented
 - Decision/accountability-oriented
 - Consumer-oriented
 - Accreditation/certification
- 3. Social agenda/advocacy approaches:
 - Constructivist evaluation
 - Deliberative democratic evaluation
 - Utilization-focused evaluation
 - Client-centered studies

Kahan (2008) categorized EM by goal free, goal based, theory-based, utilization, collaborative, balanced scorecard, appreciative injury, and, CIPP. The predominant evaluation approach to training evaluation is goal-based and system-based approaches (Eseryel, 2002). A system-based model approach considers the overall context and situation in the evaluation process (Eseryel, 2002). A goal-based evaluation approach centers on the purpose of the evaluation and does not define the steps to attain the

purpose, or how to use the results to improve the training (Eseryel, 2002). Despite the many classifications of EMs, the literature does not provide a comprehensive review (Linzalone & Schiuma, 2015).

Linzalone and Schiuma (2015) conducted a systematic literature review of EMs that included assessment for duplication and personalization and grouped EMs by three different typologies, strategic, contextual (breakdown, or tree structures), methodological variables such as the purpose of the evaluation, the dimension being evaluated and the method of evaluation (statistical, multi-criteria analysis, or impact assessment). Kirkpatrick's 1959 model is based on a goal-based evaluation approach and Stufflebeam's CIPP model; TVS approach; and IPO model are system-based models (Eseryel, 2002).

Stufflebeam's CIPP Model

In 1960, Stuffelbeam developed an evaluation model defining four types of educational evaluation: CIPP. The context and input refer to the program's needs, goals, and resources to operate the program (Chyung, 2015). Process and product evaluations focus on the influence of the implementation process and outcomes (Chyung, 2015).

Input Process Output Model

Bushnell developed the IPO model, which focuses on the inputs to training like the CIRO model (Tamkin, et al., 2002). The model sets performance indicators at each stage. The outputs and outcomes are like Kirkpatrick's model. The four stages are input, process, outputs, and outcomes.

Training Valuation System Model



Fitz-enz developed the four-step, TVS model (Tamkin et al., 2002). This model is like Kirkpatrick's Level 3 and 4. The four sequential steps are situation analysis, intervention, impact, and value. There must be a strong partnership between the trainer and client/manager for this model to work (Tamkin et al., 2002).

Context, Input, Reaction, Outcome (CIRO) Approach

The CIRO model is comparable to Kirkpatrick, but changes the training format, and analyzes context and inputs prior to assessing reactions and outcomes of training (Tamkin et al., 2002). The outcome level overlaps learning, behavior and results (Tamkin et al., 2002). The four sequential stages of the approach are:

Stage 1: Context

Stage 2: Input

Stage 3: Reaction

Stage 4: Outcome

Hamblin was one of the earlier models to extend Kirkpatrick's model in 1974 (Tamkin et al., 2002). Hamblin's five-level model closely matches the first three levels of Kirkpatrick's model and adds two additional levels. The five levels are:

Level 1: Reactions

Level 2: Learning

Level 3: Job behavior

Level 4: Organization

Level 5: Ultimate Value



Level 4 describes the effect on the organization and Level 5 describes the financial effect. Hamblin implies that the levels of his model form a hierarchy, in contrast to the Kirkpatrick model (Tamkin et al., 2002).

In 1995, Kaufman, Keller, and Watkins introduced the OEM. The model included an additional element to Kirkpatrick's model, societal contribution, as evaluation criteria (Tamkin et al., 2002). The six-level model included the following levels:

Level 1: Input

Level 2: Process

Level 3: Micro (acquisition)

Level 4: Micro (performance)

Level 5: Macro

Level 6: Mega

OEM Level 1 is similar to Kirkpatrick's Level 1, but added the usefulness, role, appropriateness, and contributions of methods and resources used (Tamkin et al., 2002). Level 2 also closely resembled Kirkpatrick's Level 1. This level adds an analysis of the implementation of the intervention regarding meeting objectives (Tamkin et al., 2002). OEM Level 3/4 are akin to Kirkpatrick's Level 2/3, respectively. A difference in the behavioral levels is that OEM focuses on application, rather than on skills and knowledge (Tamkin et al., 2002). Level 5 focuses on results and the contribution to the organization. Level 6 examines societal outcomes.

During the same time, Phillips developed a five-level evaluation model that focused on ROI (Tamkin et al., 2002). The first level is reaction and planned action. This level measures the participant's satisfaction and plans to incorporate the new learning (Opperman, Liebig, Bowling, Johnson, & Harper, 2016). The next level is learning. The third level is job application or behavior/implementation that measures implementation to practice (Opperman et al., 2016). On the other hand, the fourth level is business results or organizational impact that measures the output, quality, costs, and time in relation to the benefit/cost ratio (Opperman et al., 2016). The final level is ROI, the ultimate value with prospective investment opportunities (Opperman et al., 2016). The emphasis is on normalization so benefits and costs comparisons to other factors influencing outcomes (Opperman et al., 2016). The ROI and Kirkpatrick models part ways at the fifth level—return on investment. The ROI model adds the monetary benefit of training, compared to its cost (Tamkin et al., 2002).

A year later, Indiana University's evaluation taxonomy model added two more levels to Kirkpatrick's model, to include six strata (Tamkin et al., 2002). The first and last strata were extensions to the Kirkpatrick model. Stratum 1 examined training volume and the level of per participant. Stratum 6 examined the social impact much like OEM and Hamblin. The evaluation strata are:

Stratum 1: Activity accounting

Stratum 2: Participant reactions

Stratum 3: Participant learning

Stratum 4: Transfer of training



Stratum 5: Business impact

Kearns and Miller Model

In 1997, Kearns and Miller developed the KPMT model that was comparable to Phillip's ROI model, and similar to Kirkpatrick's model (Tamkin et al., 2002). The model explains training objectives from a business perspective, as opposed to the trainees' perspective (Tamkin et al., 2002). The goal of the model is to provide a toolkit for identifying bottom-line objectives by using questioning techniques, process mapping, and evaluation of existing training (Tamkin et al., 2002). The evaluation levels are:

Level 1: Reaction to training & development

Level 2: Learning

Level 3: Transfer to workplace/behavior

Level 4: Bottom line added value

Kearns and Miller's KPMT model views ROI in hard terms and supports the belief that a requirement to design appropriate training and development is a stated business objective (Tamkin et al., 2002).

Carousel of Development 6 Stage Evaluation Model

The Society developed a six-stage evaluation model in 2000, the carousel of development. The first stage was planning which differed from the other models discussed. There was also a differentiation in Stages 3 and 4; both stages intended to validate training (Tamkin et al., 2002). Stages 5 and 6 intended to evaluate training. The evaluation stages are:

Stage 1: Identify the business need



Stage 2: Define the development objectives

Stage 3: Design the learning process

Stage 4: Experience the learning process

Stage 5: Use and reinforce the learning

Stage 6: Judge the benefits to organization

Training ROI

Noe (2010) considered ROI to be the fifth level of Kirkpatrick's evaluation model. ROI included the learning benefit of training related to the cost of training. Human resource staff believed that ROI was challenging, and that one or both were impossible to calculate for training programs (Noe, 2010). Salicru et al. (2016) agreed with Noe by describing the ROI measurement process as contentious and challenging. Kirkpatrick and Kirkpatrick (2005) provided a framework to calculate ROI and Phillips (2007) improved the framework.

Estimating the ROI of training provides information for the organization's decision-makers to compare training benefits and costs. Curado and Teixeria (2014) identified advantages of ROI estimates, improvement in the selection of training programs, a positive impact in cost monitoring, an increase in revenue forecast based on the service improvement and product selection and an increased justification of current and future budgets. Avolio, Avey, and Quisenberry (2010) suggested a method of estimating return on leadership development investment that included implications for measuring organizational effectiveness. The estimate included different scenarios, assumptions, length of the intervention, and level of participants in the development



program. The return on leadership development investment ranged from a low negative to more than 200% depending on different factors (Avolio et al., 2010).

Phillips (2007) claimed that it is not possible to calculate ROI estimates with complete accuracy. Curado and Teixeria (2014) recommended using conservative estimates due to the difficulty in calculating ROI. Organizations conduct ROI for 5% of their training (Kirkpatrick & Kirkpatrick, 2005). This rate is consistent with Noe's (2010) estimate of 3%.

Salicru et al. (2016) stated that although impact evaluation is one of the most critical evaluations, it is the most neglected aspect of LDPs. An alternative to the traditional ROI calculation, a holistic approach, uses other values to determine the relative benefits of LDP to an organization. Qualitative responses such as wellbeing and engagement outcomes are indicators of value and improvement of programs (Salicru et al., 2016). These outcomes are return on expectations (Salicru et al., 2016).

Success Case Method

The Success Case Method (SCM) is an alternative to return on investment training result assessment (Brinkerhoff, 2005). The SCM identifies success and failure factors of program participants and the program's bottom line results (Brinkerhoff, 2005) by way of a two- part evaluation process. First, the researcher identifies the LDP participants as successful or unsuccessful. Second, the researcher conducts interviews to determine the kind of successes that the participants attribute to LDP training.

Program Evaluation of LDP Studies

In 2002, the Kellogg Foundation commissioned the Development
Guild/Development Dimensions International consulting firm to study the current state of
evaluation of leadership programs. The Development Guild/DDI identified 80 eligible
programs and conducted a scan of 55 leadership programs. The scan concluded few
leadership programs evaluated organizational capacity as a measure of leadership
effectiveness (Reinelt, Foster, & Sullivan, 2002). The Reinelt et al. scan found an
increased demand for program outcomes (changes in behavior, attitudes, knowledge,
skills, status, or level of functioning).

A second finding was that LDPs evaluate outcomes and impacts (i.e., long-term social change) on multiple levels (i.e., individual, organizational, community, field, and systems). A third finding was that few LDPs offer a clear program theory or theory of change, and this did not relate to the desired outcomes and impacts (Reinelt et al., 2002). Programs continued to focus on individual outcomes. The fourth finding was that LDPs lack metrics to evaluate mid-to-long term outcomes and impacts, but immediate reporting of results can capture short-term outcomes (Reinelt et al., 2002). Long-term evaluations required additional funding, and time.

Tsyganenko (2014) studied a financial service agency (Fortune Invest) to determine the evaluative impacts at the individual and organization levels by testing the behavioral and financial outcomes of trainees against a control group of non-trainees before and after the training program. A quantitative research method determined if training intervention resulted in significant changes in behavior and/or financial outcome

on the 22 midlevel manager participants of a year-long LDP. Tsyganenko tested behavioral and financial outcomes of trainees and non-trainees using a pretest/posttest control group design, the outcome variables utilized for the study were a self-assessment of leadership competencies of the managers and annual sales results of the managers. The control group reported no change in their behavior, and no increase in sales. The study concluded that LDP was effective at the individual and organizational levels.

Gap in Literature

Current evaluation practices do not permit the alignment of evaluation methodology with the required outcomes for LDPs (King & Nesbit, 2015; Reinelt et al., 2002). LDP EMs provide information on tangible outcomes. There is an abundance of knowledge of LDP impacts on individuals, but there is less known about the impact of LDPs on the organization (Reinelt et al., 2002). Studies focus on changes in behavior, attitudes, knowledge, skills, status, or level of functioning that individuals learn.

Summary and Conclusions

The major themes in the leadership literature included the focus on the need for leadership and leadership training during challenging economic times, and competitive business environments (Dalakoura, 2010). Leadership development has become more popular, and LDPs have increased. On the other hand, evaluation of the LDPs has not matched this growth (Watkins et al., 2011).

Evaluation models with differing terminology and categories span over four decades. The models have many similarities, and the strategies have not changed over 40 years (Tamkin et al., 2002). The literature indicated that Kirkpatrick's model is still



useful in framing different points of measurement (Tamkin et al., 2002). The literature supported the need for organizations to decide what they want to measure, and to create metrics for the criteria (Tamkin et al., 2002). In deciding to evaluate training, one must consider the purpose of the training and evaluation, the audience receiving the results, the points to take the measurements, the time involved, and use of the overall framework. The goal is to make the most informative evaluation given the differing needs and situational constraints (Tamkin et al., 2002).

This study was an extension of Rice's 2011 evaluative study of an LDP. The study examined the participant's impact on the organization's business results. Most studies limit evaluation to self-reporting by the LDP attendees. The impact on the organization and ROI is rare in the evaluation and generally not in included in studies (Tourish, 2012). The qualitative research method involved the use of an evaluative process, specifically Kirkpatrick's evaluation model. Chapter 3 includes more information about the research method.

Chapter 3: Research Method

The purpose of the study was to determine attendees' and managers' perceptions of the effect of an LDP on the business results of a U.S. governmental agency. The goal for this study was to fill the current knowledge gap by evaluating the impact of a LDP on organizational business results. In Chapter 3, I present a description of the research design, the role of the researcher, and the methodology of the study. A description of the study population and sampling strategy details follow. The final section includes issues of trustworthiness and ethical procedures. The chapter concludes with a summary and transition to Chapter 4.

Research Design and Rationale

The conceptual framework chosen for this study comprised Kirkpatrick's evaluation model and Rice's (2011) study of outcomes of a leadership development course. The focus for this study was the perceptions of LDP attendees and managers of LDP attendees on the effect of the LDP on a U.S. government agency's business results. The findings of this qualitative, embedded case study extended Rice's study of a leadership development course. Rice evaluated a corporate LDP using two EMs: Kirkpatrick's model and SCM. The study involved the application of Kirkpatrick's EM to answer the research question addressing the perception of the effect of the LDP on the organization's business results.

Qualitative research was the methodology applied to this study. Qualitative research consists of a systematic organization, collection, and interpretation of written material resulting from observation and talk (Grossoehme, 2014). This research



methodology incorporates the meaning of social phenomena as experienced by individuals in their natural environment (Grossoehme, 2014). In qualitative research, the researcher seeks to understand phenomena, whereas in quantitative research the researcher tests a hypothesis (Trusty, 2011). A qualitative researcher explores the aspects of program evaluations and provides a voice to participants' experiences (Vaterlaus & Higginbotham, 2011). The questions in qualitative research allow researchers the opportunity to explore the issues of the phenomena (Trusty, 2011). Survey questions identify the topic, period of time, and perspective of interest (Vaterlaus & Higginbotham, 2011).

This study aligned with the qualitative approach because of the use of open-ended interviews as the data collection method (see Greene, 1994). Greene (1994) added that qualitative evaluations take the form of case studies. Qualitative research stems from experiences and/or observations (Kozleski, 2017). Qualitative research puts the research participant in the role of storyteller (Kozleski, 2017). The LDP attendees and managers became storytellers during the interviews.

The quantitative method was not applicable to the research question or program evaluation in this study. Quantitative research includes the testing of hypotheses and statistical generalizations (Choy, 2014); therefore, the qualitative approach was the chosen research methodology for this study. There were no unique cultural groups or issues involved in the study, so an ethnographic design was not appropriate for this study (see Marshall & Rossman, 2011). A grounded theory approach was not suitable because there was no desire to develop a theory to explain a phenomenon (see Grossoehme,

2014). There were no unique experiences or events anticipated from the LDP phenomenological approach did not apply to this study. The study fit a qualitative embedded case study approach. Study data was collected from the managers of LDP attendees and LDP attendees. The EM used was the Kirkpatrick model.

The central research question for the study was: What are the perceptions of managers of attendees and attendees on the effect of a specific LDP on their U.S. government agency's business results?

The subquestions were:

RQ1: What are perceptions of managers of attendees on the effect of a specific LDP on their U.S. government agency's business results?

RQ2: What are perceptions of attendees on the effect of a specific LDP on their U.S. government agency's business results?

Herron and Quinn (2016) stated case study analysis is a leading empirical research method. Researchers use case studies to understand complex social phenomena because with the design, a researcher can focus on a specific case or event to get a holistic and real-world perspective. Yin (2018) stated case studies are an empirical method to investigate a contemporary case in a real-world context. Gustafsson (2017) posited that a case study is a rigorous study about a person, group, or unit aimed to generalize over several units. The cases study includes thorough analysis of an individual unit (Baškarada, 2014).

This study aligned with case study research because it is an empirical inquiry that investigates a contemporary issue in its real-life context (see Yin, 2009). The issue under



study was the effect of the LDP on the agency's business results. Because this study included more than one unit, or object of analysis, the study was an embedded case study (see Scholz & Tietie, 2013). The case was the LDP, and the two embedded subunits were the managers of LDP attendees and the LDP attendees. The two units of analysis are the LDP attendees and managers of attendees (see Yin, 2009). Using an embedded case study approach, researchers can interview subunits to achieve multiple perspectives within the case (Yin, 2018).

The case study process includes six stages: plan, design, prepare, collect, analyze, and share (Baškarada, 2014; Yin, 2018). The planning stage involves identifying the research rationale and questions (Baškarada, 2014). The design stage includes defining the unit of analysis and the case(s) studied as well as new theory (Baškarada, 2014). The preparation stage includes the researcher training, skill development, and development of case study protocol. According to Yin (2018), the researcher should understand the main concepts and methodological issues relevant to the study. The collection stage involves the protocol using multiple sources of evidence, creating a case study database, and keeping a chain of evidence (Baškarada, 2014). Yin included documentation, archival records, interviews, direct observations, participant-observation, and physical artifacts as sources of evidence.

The U.S. GAO (2012) also recommended an auditable chain of evidence. Yin offered strategies to analyze the case study data based on theoretical propositions as well as working with the data from the ground up and using descriptive frameworks or checking on rival explanations. This study included working with the data from the



ground up, applying matching and explanation building techniques. The share stage encompassed the reporting of study results. Baškarada (2014) indicated the share stage should define the audience and compose textual and visual materials. Yin posited that the report should include enough evidence to gain the reader's confidence that the researcher knows the subject.

Role of the Researcher

My role as the researcher-observer in this study was to collect and analyze data. For this study, I assumed the role of LDP evaluator or assessor and conducted interviews. According to Hannum et al. (2006), the assessor of the LDP determines if the program achieved the desired outcomes without doing harm or provided an ROI. I acknowledge personal bias as a feature of my humanity and understand it was vital to explore the feelings, meanings, and personal context of the reported lived experiences and reflect on their meanings (see Nicholls, 2009). Yin (2018) added that the researcher/interviewer has two roles related to the case study interview: (a) following the researcher's own line of inquiry, according to the case study protocol and (b) articulating the actual questions in an unbiased manner. The researcher/interviewer is an active listener who paraphrases and probes to develop rapport with the participants and discussion related to the interview questions and study (Rossetto, 2014).

The relationship between researcher and interviewees in a qualitative study develops with the study (Nicholls, 2009). Since the study was at the agency I work at, which employs approximately 2,900 scientists, engineers, technicians, and support staff along with about 1,800 associates and complement staff, I may have had professional

relationships and personally know the LDP attendees and managers of attendees who had participated in the LDP. I did not supervise or did I have formal or informal power over any of the participants. As a researcher for this study, I was an insider and a member of the community participating in the study. As such, I had knowledge of the organizational culture, values, customs, and norms. Being an insider, I had shared views and opinions with the participants.

Nonetheless, as a member of the larger organizational culture, I was not a member of the LDP graduate subculture. I had minimal knowledge of the LDP before considering it for the study. One advantage of my role was ease of access to the LDP attendees and managers of attendees of the LDP as well as possible acceptance by the them. Dwyer and Buckle (2009) stated that membership provides some degree of trust and openness in research studies. In addition, the participants were likely to be more willing to share their experiences because of an understanding of shared culture (see Dwyer & Buckle, 2009). This may not have been available to outside researchers. As an employee, I could identify decision-makers and engage in discussions with them about the study. I believe this gave me an advantage in the agency's decision to move forward with the study.

Dwyer and Buckle (2009) added there are disadvantages to inside researchers. For example, participants may make assumptions about their connection to the researcher and neglect to explain their experiences (Dwyer & Buckle, 2009). Dwyer and Buckle stated if the researcher does not separate his or her experiences from the participant's experiences, this could result in obscured perceptions. Another possible disadvantage is

misdirection of the interviews as a result of focusing on the researcher's experience instead of the participants' experience (Dwyer & Buckle, 2009).

Methodology

Participant Selection Logic

Participant selection was based on purposeful sampling from a specific governmental agency's LDP. Purposeful sampling is a technique to choose participants based upon their knowledge, experience, and meaningful information related to the study (Kemparaj & Chavan, 2013). The aim of the selection strategy was to select people that managed participants of the LDP who could provide answers to the interview questions by relating their observations, experiences, and perspectives of their subordinates.

O'Reilly and Parker (2012) indicated the two considerations in sampling methods for qualitative research are adequacy and appropriateness. O'Reilly and Parker suggested that the researcher be flexible with the sample size to answer the research question. By using purposeful sampling, a researcher can reach information-rich cases, meeting the appropriateness consideration. In addition, a researcher can accomplish data saturation with this sampling method.

There are no established rules for sample size in qualitative research; rather, the information needed from the study determines the sample size (Kemparaj & Chavan, 2013). Bernard (2013) stated that a suitable sample size for qualitative research was 15 to 20 participants. There are mixed views on the sample size for case studies. Baškarada (2014) stated that fewer than 15 interviews are insufficient for a case study. Rowley (2012) stated that even a sample size larger than 10 participants may not guarantee



sufficient richness in data. Yin's (2018) view was that a qualitative case study needs a sample size between one and 10 participants. One common opinion is a researcher should continue data collection until there is data saturation (Guest, Bunce & Johnson, 2006). Guest et al. (2006) posited that sample size relies on data saturation, the point when no new data that affects the emerging themes surfaces. A sample size of 19–21 participants was adequate to answer the research question in this study because this is the LDP class population. The targeted population was LDP attendees and managers of attendees of the LDP. The final sample size depended on when data saturation occurred.

Study participants were employees of a specific government agency as well as LDP attendees and managers of attendees of the LDP. The goal of the LDP program is to provide new supervisors and managers with the support and skills needed to be effective leaders. The LDP attendees are leaders who have less than 3 years of supervisory experience, and those that would benefit from leadership training. Agency managers recommend and approve employee participation in the program.

The initial training is a 5-day, offsite training course. The initial training course agenda involves creating a flexible leadership style, identifying personal styles/preferences and the benefits of differences, leveraging groups to solve problems and accomplish work, and strategic planning. The LDP includes monthly, 3-hour cohort sessions; leadership coaching; a capstone project; a 2-day leadership training session; and creating a leadership development plan based on a 360 assessment.

The agency has conducted 17 LDP classes since the program inception date. To ensure that participants could report on the training outcomes, the most recent class was



the target population. I asked the leadership and employee development group leader (LEDGL) to provide the names and contact information for LDP attendees and managers of attendees of the LDP. The chosen sample was from this population of managers of individuals who had attended the LDP and individuals that attended the LDP.

Instrumentation

Case studies are about phenomena in a real-world context (Yin, 2018). Following this definition, I collected the data in the field (the governmental agency), using face-to-face interviews or by telephone. The preferred data collection method was face-to-face interviews, but I accommodated the participant's schedule and conducted telephone interviews when necessary. This protocol allowed the participants to remain in their everyday setting.

I followed Yin's (2018) proposed field procedures for data collection including tasks to gain access to the LDP attendees, managers of attendees of the LDP and sites for the interviews, having resources to do the field work such as personal computer, writing materials, paper, and a quiet place for notetaking, a schedule for data collection activities, and a plan for unexpected events and changes in participant availability. I also used an audio recording device to record the interviews. The recording provided a more accurate rendition of the interview than notes alone (Yin, 2018).

The research interview is one of the most important data collection methods in qualitative research (Qu & Dumay, 2011). Dowling, Lloyd, and Suchet-Pearson (2016) claimed that qualitative interviews are the leading data collection methods in social subdisciplines. Qualitative research interviews encompass collecting facts and



information (Targum, 2011) and learning about meanings, emotions, experiences, and relationships (Rossetto, 2014).

I used a semistructured interview as the data collection instrument. The interview consisted of a direct question about the business results achieved by the LDP participant and additional questions probing for clarification and emerging themes. This aligned with Qu and Dumay's (2011) view of semistructured interviews having identified themes in a consistent and systematic manner that allowed for probing for elaborate responses. Because semistructured interviews have a basis in human conversation, the interviewer has an opportunity to modify the style, pace, and order of the questions to solicit full responses from the interviewee (Qu & Dumay, 2011).

The interviewer directs the conversation toward the topics and questions of the study. The interview aids in understanding interpretations and experiences of social life (Dowling et al., 2016). This instrument is flexible, accessible, and capable of allowing the interviewer to disclose hidden facts of human and organizational behavior (Qu & Dumay, 2011). A shortcoming of interviewing is the assumption that interviewees are competent and tell the truth (Qu & Dumay, 2011).

I developed the interview protocol based upon the research question. Because this study was an extension of the Rice (2011) study, I included questions related to business results as defined by Rice that focused on Level 4-Results of the Kirkpatrick model. Rice defined business results as a process or service improvement, cost savings, or revenue increase. The interview question focused on these three business results. The purpose of the study and the research question grounded the interview. The interview

process followed Castillo-Montoya's (2016) interview protocol refinement (IPR). The IPR four phase process included ensuring interview questions aligned with the research question, organizing an interview protocol to create an inquiry based upon conversation, getting feedback on the protocol, and conducting a pilot of the interview protocol.

First the interview questions must align with the research question. The research question related to the effect of an LDP on the agency's business results. The interview question focused on the perceptions of LDP attendees and managers of LDP attendees of their impact on the agency's business results as a result of completing the LDP.

Phase 2 of the IPR required the researcher develop an inquiry-based conversation through the interview protocol (Castillo-Montoya, 2016). Yin (2018) made a similar comparison and stated that case study interviews are like guided conversations. The process included writing the interview questions differently from the research question, following social rules of ordinary conversation, including a variety of questions, and including a script with follow-up and prompt questions. The interview questions aided in understanding the research topic. The questions were in everyday language for clarity and understanding. The interview promoted a conversation with the interviewee.

Phase 3 of the IPR involved getting feedback on the instrument (Castillo-Montoya, 2016). Completing this phase improved the reliability and trustworthiness of the interview instrument (Castillo-Montoya, 2016). The study instrument is similar to the Rice (2011) instrument including business results. I have conducted a close reading of the questions, made revisions, and received feedback from the dissertation committee.

Phase 4 involved conducting a pilot study to assess the interview instrument



(Castillo-Montoya, 2016). I did not use a pilot study as there is one research question with broad themes for the study. I used member checking to validate participant responses.

The second source of data collection was a semistructured interview with managers of attendees of the LDP. I asked questions on three broad themes: LDP attendees' results, business results, and reflections. The questions were like the attendees' questions, with the manager of attendees of the LDP providing his or her perceptions of the outcomes from the LDP. The purpose of interviewing managers of attendees of the LDP was to support the case study findings with multiple sources of evidence by triangulation. Multiple sources of data provided multiple measures of the same phenomenon (Yin, 2018). The use of triangulation of multiple data sources increased the confidence that the study depicted the event accurately (Yin, 2018).

Procedures for Recruitment and Participation

After I receive Institutional Review Board approval from Governmental Agency's IRB, I began the recruitment process with a solicitation to the governmental agency requesting assistance with the case study. I submitted a letter requesting permission to access the LDP attendees and managers of attendees of the LDP to the agency LEDGL. Once I received approval to include the agency staff in the study, I proceeded with recruitment. I asked the LEDGL to provide a list of the LDP attendees and managers of attendees of the LDP. I asked the LEDGL to provide an introduction letter or e-mail informing the LDP attendees and managers of attendees of the LDP of their eligibility to participate in the study.



Next, I invited the LDP attendees and managers of attendees of the LDP to participate in the study. The invitation described the purpose of the study, sample interview questions, and time commitment. The requirement to participate in the study was the manager's subordinate's completion of the LDP within the past 2 years. The LEDGL assisted in identifying agency staff that met the minimum requirement. The invitation also gave the option of doing the interview face-to-face or via the telephone. A reminder e-mail served as a follow-up for the nonresponsive participants. Individuals were able to opt out of the interview, or study at any time. I kept all information and participant identities confidential.

Data Collection

Yin (2018) stated the researcher is the primary interview tool. I used semistructured interviews to collect data. After each participant signed the consent forum, I conducted a face-to-face or telephone interview following an interview protocol. The questions focused on business results. The questions emphasized Kirkpatrick's Level 4 to gain insight into business results. The interview (Appendix B and C) included questions related to business results.

The data collection phase of the case study protocol included using multiple sources of evidence, creating a case study database, and keeping a chain of evidence (Baškarada, 2014). The source of data was the interview responses from the interviewees. The case study database included the interviews transcripts, my handwritten notes, and preliminary analysis (Baškarada, 2014). I used the database to



categorize, index, and cross-reference data. I maintained the data on a personal computer secured with a password and a cloud storage account.

I was the only person collecting data. After each participant signed the consent form, I conducted interviews with LDP attendees and managers of attendees of the LDP until data saturation occurred for each group. Fusch and Ness (2015) posited there is no one-size-fits-all method to reach data saturation. Researchers concur data saturation occurs when there is no new data, new themes, or new coding, and the study is duplicatable (Guest et al., 2006). Depending on the sample, researchers can reach data saturation with a minimum of six interviews (Guest et al., 2006). Fusch and Ness described the data as rich (quality) or thick (quantity). Thick data is a large quantity of data and rich data is multiple layer, detailed, and intricate data. The goal is to have both.

The interview protocol, Appendix A, was the interview process used to ensure consistency with all interviews. The questions were openended and required prompts to get at pre-planned specifics not included in participant's responses (Jacob & Furgerson, 2012). The interview included follow-up questions for clarification and emergent data. The interview took between 30 to 45 minutes. I recorded the interview and transcribed them using a transcription service for further analysis. A follow-up interview was in the protocol for clarification. I informed the interviewees of the possible follow-up for clarification of responses. I sent a copy of the transcribed interview to the interviewee to conduct member checking. The interviewee could add or elaborate in the reflection portion of the interview. The final portion of the interview included a review of the key points of the interview and thanking the interviewee for participating.



Data Analysis Plan

A goal of qualitative research is analytical generalization (Baškarada, 2014), accomplished by the extraction of abstract concepts from each unit of analysis (Yin, 2018). The units of analysis in this study were the managers of attendees of the LDP and the individuals who attended the LDP. Case study data analysis can take the form of examining, categorizing, tabulating, testing, or recombining evidence (Yin, 2018). The chosen data collection method, open-ended semistructured interviews, generated large data sets. I was responsible for data management and analysis.

Data analysis requires involved reviewing transcripts and notes to begin coding data for categorization. The process involves a close reading of the text, reflecting on data, and interpretation (Renz, Carrington, & Badger, 2018). I used a computer-based tool, computer assisted qualitative data analysis (CAQDAS), such as NVIVO or Dedoose, or Microsoft Excel to assist with organizing and categorizing the data as necessary. Yin (2018) emphasized the words tool and assist in the CAQDAS definition, stating the software will not complete the analysis on its own. The CAQDAS functionality is researcher driven and requires the researcher's identification and interpretation of patterns, themes, and categories. Researchers use CAQDAS to manage tasks such as organizing data based on characteristics, segments, and categorizing data by themes (Talanquer, 2014).

The analytic technique chosen for the interviews was CCM. I used constant comparative analysis to identify broad themes, and patterns, or categories that emerge in qualitative research. I presented the data in a logical sequence in relation to the research



question (Hewitt-Taylor, 2001). This method focuses on the constant comparison of data and codes, with codes allowing the ability to refine and check the extent the codes account for the data (Giles, de Lacey, & Muir-Cochrane, 2016).

I transcribed and analyzed each interview immediately following the interview.

The following are detailed CCM analysis steps I used as recommended by Ridolfo and Schoua-Glusberg (2011):

- 1. Assign codes to the interview notes for each interviewee.
- 2. Organize the codes into categories and the categories into larger themes of question interpretation and response formation.
- 3. Perform axial coding, refining the themes that emerged from the coding.
- 4. Compare the interview responses that have similar themes, resolving any discrepancies among themes and noting the similarities.
- 5. Compare and contrast the principal themes that emerge from the analysis of the data.
- 6. Identify the core themes that emerged from the analysis.

The interview questions related to outcomes of the LDP and the third and fourth level of the Kirkpatrick model and business results. The analysis addressed the fourth level of the Kirkpatrick model.

As noted by Renz et al. (2018), the focus of triangulation in social research has been the use of multiple data sources, researchers, theories, and methods to increase the validity and confidence in the study. Researchers often reduce bias by using a second data source and data collection method (Vaterlaus & Higginbotham, 2011).

Triangulation of the data occurred with the use of multiple data sources, managers of attendees of the LDP and individuals that attended the LDP. The triangulation process also served as validation of the participants' self-reported responses.

To protect participant privacy, I coded all identifying information on data collection instruments. For example, an "A" for the LDP attendee and "M" for the managers of attendees of the LDP replaced interviewees' names. The codes captured the LDP attendees and managers of attendees (e.g., A1 for LDP attendee and M1 for manager of attendee) without linking a manager to an attendee.

Issues of Trustworthiness

Qualitative researchers design and include methodological strategies to confirm trustworthiness. The trustworthiness strategies applied to this study include accounting for researcher bias, establishing a process for data coding and analysis, incorporating verbatim descriptions of participant responses to support findings, data triangulation with different methods and perspectives (Noble & Smith, 2015). Instead of applying scientific rigor, qualitative research uses credibility, transferability, dependability, and confirmability.

Credibility

There is no way to eliminate the human touch in the research process. To manage the issue, an assessment of subjectivity and bias was in place to address reflexivity. I began the study with no preconceptions about the LDP. I believed that most training and education have positive outcomes. As a researcher, I set aside this view to not influence or sway the interview responses. I used the case study protocol and ask questions in an



unbiased manner. Asking questions, listening, adapting, and understanding the issues address other biases (Yin, 2018). Recording and transcribing interview responses before analysis aids in the credibility of findings. The participant confirmed their transcribed interviews were accurate and respond to their own words. Houghton, Casey, Shaw, and Murphy (2013) stated that member checking is after interview transcription and before data analysis. Member checking aids in credibility (Marshall & Rossman, 2011). To achieve data triangulation, I collected data from two different sources, managers of attendees of the LDP and the attendee of the LDP.

Transferability

Transferability or external validity questions applicability of the findings (Malterud, 2001). The study was an extension of Rice's (2011) study. This study extended the Rice study by using managers of attendees of the LDP to determine business results of the LDP attendee in addition to the attendees per se. This case study was not generalizable because the LDP is specific to one governmental agency. I provided the details of the participant sample, data collection process, and research methodology for other researchers to assess for future generalization and replication.

Dependability

Dependability demonstrates the consistency of research findings (Elo et al., 2014). Per Elo et al. (2014), qualitative researchers describe the methods of data collection, analysis, and interpretation to ensure audit ability and other researchers to follow the study. Including details of the research design, descriptions of the data collection process, data analysis, an audit trail, and interpretation of the results enhanced

the dependability of the study findings. The study also incorporated triangulation by using multiple sources for data collection, thus increasing dependability.

Confirmability

Houghton et al. (2013) defined confirmability as the accuracy and neutrality of research data. The establishment of confirmability provides the research process with a rationale for its methodology and interpretation of the researcher (Houghton et al., 2013). I ensured the confirmability of the study by ensuring that the research was auditable so that other researchers can follow the research methodology, the analysis, and interpretation process.

Ethical Procedures

Walden University IRB approved ethical procedures of the study. I requested permission from the federal agency to use the LDP and LDP attendees and managers of attendees for this study. I will present a debriefing to the organization's LEDGL sharing the findings of the study.

All participants provided written consent to use their information, or interview responses for this dissertation study. I treated all participants in an ethical manner. Participant confidentiality and privacy are considerations during all stages of the study. There was no work relationship between the managers of the LDP attendees and the individuals that attended the LDP. I also maintained the privacy and confidentiality of participant names, data, and study documents. The participant notification included a statement that their participation related to agency activities and was for the sole purpose of the doctoral study.



Each participant received and completed a consent form via e-mail. The form included information to decide about participation in the study to include background information about the study, the study protocol, and risks and benefits. I reviewed the consent document with individuals prior to the interview. Participation in the study was voluntary and individuals could withdraw from the study at any time. The study included data collected prior to a request to withdraw from the study, unless the individual in question did not want the data used. I stored excluded data in a secondary database and omitted it from the study results.

A pseudonym replaced each participant's name on a data collections spreadsheet and in all the data collection files, interviews, and documents. I stored all data on password-protected electronic files in a locked space in the researcher's home office. I maintained control of all data, storage devices, and passwords. Only the researcher had access to the data and passwords. I will retain the research data for 3 years.

Summary

This chapter included the research methodology, research design, and rationale, role of the researcher, and trustworthiness. I used a qualitative embedded case study methodology to answer the research question. The qualitative case study design was evaluative, using the Kirkpatrick model to assess the LDP. Yin (2018) posited that case study research was appropriate for evaluations.

The researcher's role in the case study included serving as the listener and evaluator while collecting and analyzing data. The purposeful sample included LDP attendees and managers of attendees of the LDP from a governmental agency. A



requirement to participate in the study was attendance in the LDP and the ability to relate experiences and business results after the LDP. The sample population consisted of managers of attendees of the LDP and LDP graduates. I collected data from this population until I reached saturation.

The researcher developed data collection instrument was a semistructured interview. The semistructured interview is the leading data collection instrument in qualitative research (Qu & Dumay, 2011). The governmental agency staff helped with the referral and recruitment for the study.

I performed the data analysis using CCM analytic technique. The data analysis followed a process outlined by Ridolfo and Schoua-Glusberg (2011). The process included addressing issues of credibility, transferability, dependability, and confirmability. The chapter concludes with a section on ethical considerations. In Chapter 4, I present the research results. This includes research setting, demographics of participants, data collection and analysis, findings, and evidence of trustworthiness.

Chapter 4: Results

The purpose of conducting this qualitative, embedded case study was to examine the perceived effect of an LDP on the business results of a governmental agency. To achieve this purpose, I interviewed LDP attendees and managers of LDP attendees that had knowledge of the LDP. I analyzed the participants' responses to identify themes and patterns of their perceptions of business results. The general problem addressed in the study was organizations investing large sums of money in training with minimal effort to determine training outcomes and effects on business results. The specific problem addressed in the study was government agencies not measuring the effect of its LDPs on the organization's business results.

The following research question guided this study: What are the perceptions of managers of attendees and attendees on the effect of a specific LDP on their U.S. government agency's business results? The two research subquestions were:

RQ1: What are perceptions of managers of attendees on the effect of a specific LDP on their U.S. government agency's business results?

RQ2: What are perceptions of attendees on the effect of a specific LDP on their U.S. government agency's business results?

Chapter 4 includes the results of the study. In this chapter, I discuss the research questions, the research setting, and the study participants' demographics. Following sections include a description of the data collection procedures, data analysis, and evidence of trustworthiness. The study results section includes the findings of the research. The final section is a summary of the chapter.



Research Setting

The research setting was a governmental agency in Maryland. The agency had a telework policy, so I conducted most of the interviews via telephone for convenience. The research interviews began in September 2019, which was the last month of the U.S. government's fiscal year. During this period, government staff prepare closeouts and final reports for the fiscal year and prepare for the upcoming year. There was limited staff availability for interviews during this period.

This period also included an additional element of uncertainty due to a lack of an approved federal budget for the next year. Without an approved budget, there was a possibility of furlough and a federal government shutdown. On September 20, 2019, Congress passed a continuing resolution that allowed the government to continue operating for an additional 3 weeks. The agency returned to its regular business activities after this date, and I completed the interviews and data collection.

The focus for the LDP chosen was on individuals who served in a leadership position for 3 years or less and who had little leadership training. The goal of the program was to provide the leadership skills and training needed to be a successful leader at the agency. The program, which was one year long, included a 360-degree assessment, a week-long offsite course, monthly cohort meetings, leadership coaching, and a capstone project. I excluded the current class from the study population because they had not completed the program at the time of this study.

Although I am an employee of the agency, I had an only general knowledge of the program. I gained specific knowledge of the program as I conducted the literature review



and the research study but limited my questions to the research topic and the LDP. I introduced myself as an employee of the agency to participants, and I notified everyone that I would include the study results in my dissertation. I kept an objective posture during the interviews.

Demographics

The study population was a purposeful sampling from an LDP. This study focused on the perceptions of LDP attendees and managers with knowledge of the LDP; therefore, other demographical information did not have an essential role in the study. I first ensured the participants met the requirements to participate in the study. The criteria for participation were completing the LDP or being an LDP attendee manager that had knowledge of the program. The study population included LDP classes with completion dates from 2015 to 2018. The initial goal was to include LDP classes within 2 years of the study. Due to the initially low response rate, I expanded the population to include additional classes.

The study included 12 manager and attendee participants. There were five attendees included in the study. The attendees included two from the 2018 class; one from the 2017 class; two from the 2016 class. There were seven managers included in the study. The manager participants included four from the 2018 class; one from the 2017 class; one from the 2016 class; and one from the 2015 class.

The LEDGL provided me with the LDP attendee list, which was accessible on the agency's internal webpage. I matched the attendees' managers to the attendees' list by using the agency directory. Then, I created a study population list that included the LDP



attendees and their managers, eliminated any individuals that I knew or that I had a working relationship with, and removed individuals that were no longer with the agency. The filtered list became the finalized study population.

I confirmed managers had knowledge of the LDP by asking them before the interview took place. The people interviewed did not have an employee-supervisor relationship. For example, if I interviewed an LDP attendee, I would not interview his/her manager and vice versa. I made the selection when either the attendee or manager responded to the invitation to participate in the study.

I interviewed seven LDP attendees and five managers, and each met the minimum qualifications to participate. All the participants came from the same governmental agency. Two managers volunteered but did not meet the minimum criteria. I excluded seven LDP attendees and two managers that I had established work relationships with so that I could remain objective. Four attendees were no longer with the agency.

Data Collection

I recruited participants from one governmental agency. In preparation for this study, I requested permission from the LEDGL to include the agency LDP and employees in the study. The governmental agency approved this study (Approval No. MEP-2019-0162) with the inclusion of the LDP and government employees. Walden University IRB approved the ethical protocol of the study (IRB Approval No. 10-08-19-0222831).



The LEDGL sent the LDP attendees and managers on the finalized study population list an introduction e-mail according to the protocol. I then sent an invitation e-mail to the study population after the introduction e-mail. I sent an e-mail to each potential participant individually to maintain anonymity, asking the participant to contact me directly if they chose to volunteer for the study.

The study participants followed the protocol on the invitation letter and contacted me via e-mail or with a phone call to confirm their interest. After confirmation of interest in the study, I briefed the volunteer and provided them with a copy of the consent form. Study participants signed the consent form and returned it to me via e-mail or during our interview meeting. The next steps included scheduling the interview and getting consent forms from the volunteers. I scheduled the interviews via e-mail or phone call and confirmed with a calendar invite that included the conference call-in information, date, and time of the interview.

I followed the interview protocol, conducting an orientation before the interview. The orientation included providing a research description, setting expectations of the study and interview, collecting the consent form, and answering questions. I reiterated the privacy agreement as noted in the consent form and confirmed I would use a code in lieu of their name for the study. All volunteers consented to the interview and acknowledged their desire to move forward.

I conducted and recorded the interviews using a secured Internet conference service, which required a unique pin code to access. The conference service recorded effortlessly, and the recorded data were available within minutes after the recording. I



downloaded the recordings to an Internet-based transcription service, which required a unique pin code to access. The transcription service featured voice correction that made validation of the transcript easier. This process aided in reducing errors in the transcription. I also used my notes to correct and revise inaudible sections of the recording. The recorded interviews were deleted after the transcription. I provided a transcript of their interview to each of the interviewees for member checking.

I conducted each interview in the same manner, according to the research protocol. I was the primary interview tool (see Yin, 2018). There were two sources of data: the LDP attendees and the managers with knowledge of the LDP. No one declined the interview because of the recording. Interviewing via teleconference allowed the volunteer interviewees and me the ability to focus on the interview. The interviews lasted between 30 to 45 minutes each. I conducted only one interview with each volunteer. I thanked each volunteer for their participation in the study at the conclusion of the interview.

I compared the transcribed interviews to the recording to minimize errors and increase accuracy. Member checking increases the credibility of the study (Marshall & Rossman, 2011). During the member checking process, none of the participants identified personal or organizational conditions that influenced the interpretation of the data or study results.

The interviews included one open-ended question with additional clarifying questions. If the participant's response did not include information about the definition of business results as defined in this study, I asked probing questions on each aspect.



There was also follow-on questions that originated from the interviewees' responses.

Lastly, the interview included follow-up questions for clarification and new data. The data identified the attendee and manager perceptions of business results from attendance in the LDP. I used the data to identify patterns and themes in the responses.

I chose to use printed transcripts of the interviews for analysis instead of the case study database. I highlighted and made notes on the transcribed interviews. I also took handwritten notes during the interviews and preliminary analysis. There were multiple sources of data, so I kept a chain of evidence (see Baškarada, 2014). I kept the research documents in a separate file on a password-protected computer.

Data Analysis

The process of transcription and organization began with my familiarization of the data. I completed familiarization by rereading the transcripts and my notes before starting the analysis. I analyzed the data for this study based on interviews from two sources: LDP attendees and managers with knowledge of the LDP. The interview questions related to the third and fourth levels of the Kirkpatrick EM. I addressed the fourth level, results, during the analysis. My analysis followed the analysis plan described in Chapter 3 using CCM.

I began the analysis process after interview transcription and revision, if needed.

I conducted the CCM analysis process by first assigning codes to the interview notes for each interviewee. The second step was organizing the codes into categories and categories into larger themes. I refined the themes that emerged from the interview coding and compared the interview responses that had similar themes, resolving any



discrepancies among themes and noting the similarities. Then, the principal themes that emerged from the analysis of the data were compared and contrasted. In the final step, I identified the core themes that emerged from the analysis (see Ridolfo & Schoua-Glusberg, 2011). There were no predetermined codes or themes for the data analysis process. The themes evolved directly from the interviewee responses, and I identified them from the transcribed interviews and my notes. I organized the data and categorized them by each research question in a Microsoft Excel spreadsheet. The spreadsheet enabled the tabulation of the data.

I analyzed the first transcript and identified categories and themes that emerged related to the research question. I highlighted and made notes assigning codes to themes. Next, the codes were organized into categories and themes on each transcript. I added the data to a Microsoft Excel spreadsheet labeling the data A1 or M1 for the Attendee 1 and Manager 1. Assignment codes to each interview ensured that there was no mix up of data from one interview to the next. The use of pseudonyms for interviewees strengthened the ethical issues concerning confidentiality. By using a separate Excel spreadsheet, I was able to ensure that the coding remained consistent and that I was able to establish a clear decision trail for audit purposes.

I repeated this process with the second attendee interview. After the second attendee interview, I compared the categories and themes to the first attendee interview and made a composite analysis of the emergent themes from both attendees' interviews. I added new codes and categories as needed to the composite. As I continued this process, I refined some categories and themes and resolved discrepancies. Refining the



themes helped develop core themes. The core themes were themes that remained most frequently mentioned by interviewees. I compared the third attendee's interview responses to the first two and I updated the composite to include the three completed interviews. I repeated this cycle until data saturation, which I achieved when no new core themes emerged. I applied the same analysis process to the managers' interviews.

Evidence of Trustworthiness

As described in Chapter 3, I used various methods to ensure the trustworthiness of the study data. I accounted for researcher bias, recorded and transcribed interviews to have verbatim interview responses, and included two sources for data triangulation. I also used the same process for data coding and analysis. The areas of trustworthiness for qualitative research are credibility, transferability, dependability, and confirmability.

Credibility

To ensure credibility, I followed the study protocol, as described in Chapter 3, during data collection. I applied the same interview process to each LDP attendee and manager. The interview process was standardized, using the same interview instrument (Appendices B and C). I permitted the participants to verify responses, review for accuracy, and revise their interview, member checking. Member checking improved the credibility of my study by permitting changes to the recorded interviews. Marshall and Rossman (2011) stated member checking aids in credibility. I e-mailed the transcripts to each participant in the study for member checking. This process was a method of gaining trust and credibility in the study.

An additional form of credibility used was data triangulation. I applied data triangulation by collecting data from two sources, which also reduced bias (Vaterlaus & Higginbotham, 2011). I addressed researcher bias by using the prescribed protocol and asking questions in an unbiased manner. I asked probing and follow-up questions to ensure accurate, comprehensive data from each interviewee.

Transferability

Transferability in qualitative research is the ability of research findings shifting to a new study (Petty, Thomson, & Stew, 2012). According to Petty, et al. (2012), the potential user determines transferability, not the researcher doing the qualitative research. Likely, users can decide if research is transferable by the detailed findings of a study (Yin, 2018). I included a detailed description of the context of the study, setting, and population for possible transferability. According to Yin (2108), describing details of a case study can improve transferability, and the potential user can determine if the findings are transferable. As stated in Chapter 3, the study focus was on a specific LDP of one governmental agency using purposeful sampling. For this reason, along with the limitations noted in Chapter 1, the study may not be generalizable.

Dependability

Elo et al. (2014) stated that dependability is an indication of the consistency of the research findings. To aid in the dependability of the study, I documented the study methodology, data collection, analysis, and interpretation of findings. To ensure dependability, I utilized data triangulation and member checking to aid in transferability. I recorded all interviews and transcribed them in the same manner following the research



protocol. I followed the same method for analyzing each interview. According to Houghton et al. (2013), the assurance of dependability increased if the researcher's method was identical for processing and analyzing data for each participant.

Confirmability

To ensure confirmability and minimize bias, I disclosed my role with the agency during the interview session. I maintained my role as a researcher during the process. I reviewed the recordings and transcripts to help disclose, eliminate, and isolate any personal biases during the review, coding, and analysis of the data to assure confirmability. I maintained confirmability during data collection, coding of themes, and analysis of the data. Houghton et al. (2013) stated confirmability occurs when the researcher's findings result from the participants' ideas and experiences rather than the preferences and characteristics of the researcher. I conducted member checking to ensure the accuracy of the interview transcriptions. I collected the data following the research protocol and the data was auditable.

Study Results

The purpose of this embedded case study was to examine the perceived effect of an LDP on the business results of a governmental agency. For the purposes of this study, I defined business results as an improvement in a process or service, cost savings, or revenue increase (Rice, 2011). This study included one research question and two subquestions. The research question was: What are the perceptions of managers of attendees and attendees on the effect of a specific LDP on their U.S. government agency's business results? The research subquestions were: (a) What are perceptions of



managers of attendees on the effect of a specific LDP on their U.S. government agency's business results? (b) What are perceptions of attendees on the effect of a specific LDP on their U.S. government agency's business results? The data collection process included data from 12 interviewees, seven LDP attendees, and five managers. Everyone volunteered to participate in the study. I reached saturation after the seventh LDP attendee's interview and the fifth manager's interview.

I used two sets of interview questions to collect data, each specific for the targeted group (Appendices B and C). The interview question for the attendees was: What business results did you create as a result of attending the LDP? The interview question for the managers was: What effect have the individuals who completed the LDP while working for you had on the agency's business results that you attribute to the LDP? I probed as appropriate for clarity and emergent themes from prior interviews. I used the following examples of business results as probing and clarifying questions during the interview:

- 1. Create or recommend an improvement to an agency service or process
- Create or recommend an efficiency standard or quality improvement after participation in the LDP
- 3. Cause or create a cost savings for the agency after participation in the LDP
- 4. Cause a revenue increase for the agency

I defined these concepts in Chapter 1.

The information presented in the remainder of this section relates to the themes resulting from the research subquestions, RQ1, and RQ2. When asked RQ1, most of the



managers noted how the attendees improved in their roles after the LDP without directly addressing business results. For example, M4 stated the LDP enabled his staff to get out of their silo and interact with other agency staff. M3 answered that his staff's professionalism improved after attending the LDP. The skills related during the interview were, improved communication and negotiation skills, staff development, problem-solving, increased professionalism, and an enhanced ability to manage workload. M1 and M2 mentioned the mentoring component of the LDP as a benefit with appropriate tools for the attendees. With probing and clarifying questions, the managers responded to the business results-focused questions.

Eight clear themes emerged from the managers' interviews, based on the percentage of the participants who mentioned a theme (See Table 1). Four themes resonated within the group (as denoted by the fact that 80% of the participating managers identified them in their responses to RQ1): applying situational leadership, serving on an agency initiative or project, not creating a revenue increase, and building teams or working with co-workers. M2 stated that his subordinate attending the LDP had improved team building skills and did a really good job with direct reports.

In the interviews, the managers focused on the individual skills the attendees gained from the LDP. Two of the lower-ranked themes related to improved business results, and the other two to skills enhancement. M1 reported he did not have any data to support a revenue increase from staff attending the LDP. M1 added that he would like to think that the attendee did increase revenue because they are in a fee for service group and cost is a concern for him. M3's response aligned with M1, by stating he could not



quantify a revenue increase or cost savings. The top-ranked business results theme for the managers indicates that they perceived that LDP attendees did not create a revenue increase for the agency.

Table 1

Managers' Perception of the Effect of a Specific LDP on Business Results

Applied situational leadership with direct reports and/or co-workers	80%
Served on an agency initiative or project	80%
Did not create a revenue increase for the agency	80%
Demonstrated enhanced ability to build	80%
teams/work with co-workers	
Did not create a cost savings	60%
Improved a service or process	60%
Demonstrated enhanced networking skill	60%
throughout agency	
Demonstrated improved conflict management	60%
skills	

When I asked the LDP attendees RQ2, most attendees began by describing the LDP components, and the events. The attendees also included skills and the most beneficial elements of the program. A6 was the only individual in the study that asked for an explanation of business results before responding. Again, with probing and clarifying questions, the attendees responded to the business results-focused questions.

Nine clear themes emerged from the LDP attendees' interviews (see Table 2).

There was one theme that all participants attendees mentioned in their interviews, improved self-assessment skills. This theme resulted from the 360-Assessment component of the LDP per the attendees. A2 stated the assessment provided him with a sense for how other staff perceived him. This information gave A2 confidence and ideas



to improve. Six of the seven included networking and collaboration with other agency staff as a benefit of the LDP.

The third theme on the list was conflict management. A1 relayed that he learned how to listen to understand, which helped him when working with difficult people. LDP attendees, many nonsupervisory, stated how this program component helped them in their daily interaction with a diverse group of co-workers. The other six themes received the same response rate. Three themes related to business results had the same response rate.

Attendees' Perception of the Effect of a Specific LDP on Business Results					
Improved self-assessment skills	100%				
Improved networking/collaboration with others					
outside of work division	86%				
Learned to work with difficult people/conflict					
management	71%				
Did not produce a revenue increase	57%				
Learned to communicate change persuasively in					
difficult conversations	57%				
Did not create a cost savings	57%				
Enhanced team building and team leadings					
skills	57%				
Applied situational leadership with direct					
reports and/or co-workers	57%				
Developed an efficiency standard or quality					
improvement	57%				

The data directly addressing the definition of business results indicated the majority of the LDP attendees perceived they affected the agency's business results.

Nineteen attendee responses included phrases or words similar to the words used in the definitions described above. The findings indicate that 53% of the LDP attendees

Table 2

perceived there was an agency business result from their attendance of the LDP, and 47% perceived there was not an agency business result from their participation of the LDP.

Using the same analysis that I used for the managers showed that the findings for the managers were the opposite of the LDP attendees; the managers did not perceive the LDP attendees affected the agency's business results. There were 14 responses directly addressing the definition of business results, as described above. The findings indicated 36% of the managers stated the LDP attendee did affect the agency's business result, and 64% noted the LDP attendee did not affect the agency's business result. The findings are in Table 3.

Table 3

LDP Attendee's Response to Business Results Clarification Question

	Mana	Managers		OP idees	
Examples of Business Results in		_	_	_	
Interviews	Yes	No	Yes	No	
Created or recommended an improvement					
to an agency service or process	3	1	3	3	
Created or recommended an efficiency standard or quality improvement after participation in the LDP	0	1	4	2	
Caused or created a cost savings for the agency after participation in the LDP	0	3	1	4	
Caused a revenue increase for the agency	2	4	2	0	
Totals	5	9	10	9	

There were minimal discrepant cases identified in the data collected. I reviewed the transcribed interviews to identify the shared perceptions of the 12 participants toward business results. There were several similarities related to responses from the

interviewees. The managers and attendees shared the view that, while attendance was beneficial to the agency in many ways, attending the LDP did not result in cost savings or a revenue increase.

Summary

The primary goal of this embedded case study was to explore the perceptions of LDP attendees and managers with knowledge of the LDP on the agency's business results. This chapter included a description of the data collection processes used for gathering, transcribing, and coding of the study data, and the study findings related to the research questions obtained by analyzing the transcribed interview data.

Based on the study findings, 53 % of LDP attendees reported the LDP had a positive impact on business results, and 64% of managers said the LDP did not have a positive impact on business results. The study resulted in eight core themes for the managers and nine core themes for the attendees. The study findings revealed that there was a common perception that the LDP was beneficial to LDP attendees. The study findings indicated the business results were difficult to quantify.

The results of the study can be useful for agency decision-makers involved in planning and developing leadership training. LDP evaluations show the value gained or lost from training, and define outcomes of results. Management can use this information to make decisions to turn learning investments into valuable performance and business results in creating and redesigning LDPs. Chapter 5 includes a discussion of the interpretation of research findings, limitations of the study, recommendations for future research, and implications for positive social change.



Chapter 5: Discussion, Conclusions, and Recommendations

The purpose of this study was to examine a specific leadership development program in a government agency to determine its perceived effect on that agency's business results. In Chapter 1, I provided a brief introduction to the research, a theoretical framework, and the research questions. Chapter 2 consisted of a review of the literature on leadership development, leadership and leadership development studies, and program evaluation. The focus of the literature review was the program evaluation of leadership development studies. I completed a comprehensive review of the research methodology in Chapter 3, while Chapter 4 contained a detailed analysis of the research findings. In this chapter, I report a summary of the findings as they relate to the research questions and an interpretation of the results based on the research questions. This chapter also includes the interpretation of findings, limitations of the study, recommendations, implications, and the influence on positive social change.

I used a qualitative, embedded case study design in this study to determine the perceptions of the effect of an LDP on the business results of a U.S. governmental agency from managers of individuals who have attended the LDP and individuals who attended the LDP. Yin (2018) posited that using qualitative methods provide comprehensive descriptions of the emerging phenomena. The study included in-depth interviews with 12 volunteer government agency employees: five managers and seven LDP attendees.

Interpretation of Findings

I anchored this study with a central research question: What are the perceptions of managers of LDP attendees and LDP attendees on the effect of a specific LDP on the



U.S. government agency's business results? The results from the study indicated that the LDP attendees and managers had different perceptions of the business results as defined in Chapter 1. The managers' responses related to the business result was 64% negative, indicating that managers perceived the attendees had a no impact on business results after attending the LDP. In contrast, the attendees' responses related to business result was 53% affirmative, indicating the attendees' perception of their impact on business results was positive.

There were differing definitions of business results in the literature. Diamantidis and Chatzoglou (2014) defined results as the outcomes observed due to participation in the LDP (e.g., job performance). Tourish (2012) added that results were a measure of improved performance, including ROI, increased profits, improved quality, and decreased costs. The differences in business results definition is an added factor in comparing the studies. The definition of business results applied to this study was an improvement in a process or service, cost savings, or revenue increase (see Rice, 2011). The interview questions for this study, including the probing questions, were related to this definition of business results. Only one participant asked for an explanation of business results during the interviews.

The peer-reviewed literature on initial LDP studies included contrasting views on the effectiveness of LDPs. The findings of the meta-analysis by Burke and Day (1986) and Collins and Holton's (2004) study showed that the effectiveness of LDPs varied.

Collins and Holton found that managerial training had a positive outcome. Like the



current case study, Collins and Holton included the government in their analysis. Their study also included supervisors and a focus on organizational-level results.

Aragón-Sánchez et al. (2003) concluded that training had a positive effect on productivity, quality, labor turnover, and financial results. Martineau (2004) posited that organizations that invested in development resulted in economic payoffs. The results from this study indicated varying results from the two data sources, which aligned with the findings of Burke and Day (1986) and Collins and Holton (2004). The findings of later studies indicated that LDPs had an impact on Kirkpatrick's Level 4 (i.e., Results; Dalakoura, 2010; Packard & Jones, 2015; & Salicru et al., 2016).

Dalakoura (2010) examined an LDP's effect on organizational performance and found a positive relationship between leadership development and performance as measured through financial outcomes. I found a contradiction to this finding in this study. The criteria applicable to economic results for the present study were revenue increase and caused or created costs savings. The managers and the attendees had a high negative response for both criteria. There were nine total responses from the managers and attendees related to the two financial outcome criteria. Seventy-eight percent of the managers perceived there was no financial outcome, and 57% of the attendees perceived there was no financial outcome. The two studies also differ in the data sources. The sole data source of the Dalakoura's study was human resource directors, and the current research included LDP attendees and managers of LDP attendees.

A similar LDP study by Packard and Jones (2015) included performance outcomes, LDP attendees, leaders in human services organizations, and their supervisors. Packard and Jones focused on a measure for actual changes on the job. The participants and their supervisors reported the measure (i.e., impact: participant view and impact: supervisor view). Packard and Jones' study was similar to the current case study in that the researchers examined both the LDP attendee's perception and the manager's perception. Kirkpatrick's Level 4 (i.e., Results) includes the impact measured on job performance (Diamantidis & Chatzoglou, 2014), and both studies focused on Kirkpatrick's Level 4.

The studies differ in that the current study did not include the attendee's manager. Unlike Packard and Jones, I chose unrelated managers and LDP attendees to maintain the anonymity of the interviewees. Although performance outcomes differ from the criteria used for this study (i.e., business results instead of changes on the job), in both studies participants reported a positive impact on results.

As in my study, Salicru et al. (2016) used the case study design with triangulation of multiple data sources. However, Salicru et al. included each of the four levels of the Kirkpatrick model. In this study, I focused on Level 4 only. The participants in the Salicru et al. study were experienced managers that attended a 1-week intensive residential program. They found that the managers perceived they had a high impact on business results. The LDP included in this study was a one-year long program. I found similar views from the attendees of the governmental LDP. The difference between the two studies is that Salicru et al. used self-reported data from the LDP participants for the



Level 4 data only. In contrast, this study included data from managers and self-reported data from participants.

My findings did not confirm the later LDP studies with organizational outcomes that I presented in the peer-reviewed literature in Chapter 2. Both Packard and Jones (2015) and Salicru et al. (2016) reported positive impacts. Those researchers found that LDPs affect Kirkpatrick's Level 4 (i.e., Results), including job performance and business results. The results align of later studies align with the findings of this study. The difference in the later studies of the literature review and this study is the use of multiple data sources.

The data sources (i.e., managers of LDP attendees and LDP attendees) of this study have differing perceptions of the effect of the LDP on business results. No one previous study matches the current study; therefore, the results of the current study do not duplicate those of other studies. There is empirical evidence from this study that contributes to the body of knowledge of LDP evaluation. First, managers and attendees have differing perceptions of the effect of this specific LDP on business results. Next, the contrasting views of the attendees and managers indicate a need for additional research to document the impact of LDPs on business results.

Limitations of the Study

There were several limitations to this study. The first being the use of a purposeful study population from a specific government agency LDP. I chose the sample explicitly to answer the research question (see O'Reilly & Parker, 2012). However, the purposefully chosen sample reduced the ability to generalize the findings.



The timing of data collection was also a limitation. The research began during September, the last month of the federal government's fiscal year. September is a time that the agency is conducting the end-of-year activities. There was also a brief period of uncertainty regarding the federal budget and potential government shut down. Both factors limited the time and availability for interviews by agency staff. I reached data saturation only after interviewees responded to multiple contacts via e-mail invitations to the sample population and the expansion of the target population.

Another limitation of this study was the data collection method of in-depth interviews. Interviewees may have answered the questions based on what they either wanted the researcher to hear or what they believed the agency expected them to say. The agency staff considered the LDP a flagship program of the agency and reputable. This prominence may have influenced the interviewees to provide positive responses. There was no evidence that this limitation existed in any of the interviews or transcripts. Yin (2018) stated that case studies using multiple sources of evidence receive higher ratings in terms of quality than studies relying on one source of evidence.

Although the Kirkpatrick model is the most popular evaluation model (Bates, 2004; Eseryel, 2002; Wankhede & Gujarathi, 2012), it includes the limitation of oversimplifying training effectiveness in that it does not consider contextual or individual influences (Bates, 2004; Curado & Teixeira, 2014; Tamkin et al., 2002). There is a possibility that the reported effect on business results was not a direct result of the LDP. Some attendees and managers stated they could not directly attribute business results to



the LDP; however, the interviewees acknowledged the LDP did improve the attendees' skills and that the LDP was of value to the agency.

As an employee of the agency, my experiences and feelings could potentially have influenced the study results. I reduced any potential bias by excluding any LDP attendees or managers that I knew or worked with from the study. There were seven attendees and two managers excluded due to this criterion. According to Yin (2018), the use of multiple data sources for triangulation, as I did in this study, aides in mitigating researcher bias.

Recommendations

Recommendations for future research include further examination of the effect of LDPs on business results. Based on the literature review, few organizations have evaluated training and its impact on organizational performance (Griffin, 2012). Many researchers have focused on the individual's outcome of LDP training and omitted organizational outcomes (Hayward, 2011; Tsyganenko, 2014). Packard and Jones (2015) posited that supervisors' views of performance are not standard in leadership development evaluations. The findings of this study added to the scholarly information on the topic by focusing on outcomes (i.e., business results) and managers' perceptions of LDP outcomes. There were many studies with different findings related to LDP outcomes, so there is a need to explore LDP outcomes on an organizational level.

The attendees and managers reported their perceptions of the effect the LDP had on business results, which included impacts related to the definition of business results. I noted these in the findings and themes reported in Chapter 4. Some of the interviewees



responded that it was difficult to relate the LDP training to business results. Per Hayward (2011), not all performance improvements and bottom-line benefits are related to the LDP. Variables, such as the experience and existing skills of LDP attendees and economic changes, can influence data, making it difficult to measure impact (Hayward, 2011).

To address this issue, future researchers could expand the framework of this study and examine other variables as possible influences on LDP outcomes and business results. This includes using additional methods for evaluating the transfer of training and measuring business results. For example, Rice (2011) used two combined models, Kirkpatrick and SCM, in evaluating an LDP and determining business results. Researchers could also examine other sources of data to support respondent perceptions, such as job performance appraisals, sales records, departmental performance, or preset goals (Shenge, 2014).

This study included LDP classes that had occurred in the past 4 years. Day et al. (2014) suggested a longitudinal research study on leader development as a more accurate measure of training effectiveness. A longitudinal study could cover trends over an elongated period following the LDP (see Yin, 2018).

The findings of this study demonstrated a need for clarification around the term, business results. If future studies include business results, there should be clarity in the definition for the respondents. Currently, there are differing definitions of business results in the literature. In this study, the respondents initially provided more information about the skills gained from the LDP instead of the effects on business results. After I



asked probing questions using the definition of business results, I got more responses related to the topic. I documented these responses in the resulting themes. The top emerging eight responses from the managers included three themes related to business results. The top emerging nine themes from the attendees included only two themes related to business results.

This study was a single case study of one government agency's LDP. I recommend including additional LDPs or organizations in future studies. Further research could consist of a multicase study with other industries or governmental agencies to examine and explain the effect of LDPs on business results. The expansion of the study population increases the generalizability of a study.

In this study, I used a qualitative method providing one view of the data. Future research could include a quantitative case study method to include statistical data to further explain the impact on organizational outcomes. Using mixed methods, both qualitative and quantitative data could provide the strengths that offset the weaknesses of each research method (Megheirkouni, 2018). Using more than one method of data collection and analysis adds to the richness of the data (Edwards & Turnbull, 2012). These study changes could provide a comprehensive review of the data.

Implications

In addition to the general and specific management problem, this study addressed the gap in literate regarding the assessment of the effectiveness of leadership development. The research findings included useful information for stakeholders and future scholars researching LDP effectiveness and outcomes. In this section are



implications for social change. Implications for social change may consist of the potential for using the findings to develop leaders better equipped to affect individuals, organizations, the practice, and communities positively.

Individual Implications

Employees are the most significant assets in an organization (Karim et al., 2012). Trained employees are essential to a company's quality effort (Riotto, 2004). Getha-Taylor et al. (2015) added that organizations that invest in programs that develop and strengthen leadership enrich their future. This study includes positive social change for individuals. LDPs allow individuals an opportunity to develop KSAs for the workplace and community. The goal of the LDP is to build an individual's knowledge, skills and ability that can turn into better business results for the organization. LDP attendees develop skills and knowledge, which they use in their organizations and communities. Social change for individuals is possible as the specific governmental agency reviews and assesses the LDP based on the study results to improve leader effectiveness.

Organizational Implications

The study of management training is pertinent to organizational outcomes because of the strategic nature and contribution to the organization's competitiveness (Aragón, et. al, 2014). Management training includes leadership development and LDPs. The orientation of leadership development is toward building capacity in anticipation of known and unexpected challenges (Megheirkouni, 2018). Megheirkouni (2018) stated leadership development is a strategic initiative in response to challenges surrounding an organization. In this study, I addressed a general and specific problem related to leadership training. The general problem was an organization's investment in training with a minimal effort to determine training outcomes and the effects on business results. The specific problem was government agencies not measuring the effect of its LDPs on the organization's business results. In this case study, I examined the managers' and attendees' perceptions of the effect of an LDP on business results to address both problems.

Kirkpatrick and Kirkpatrick (2013) reported that government agencies recognize the benefits of measuring training effectiveness, like nongovernmental agencies. This view aligns with the GAO's attempt to improve agency accountability for results and performance (U.S. Government Accountability Office, 2012). OMB also encouraged improvement in government effectiveness by using program evaluation (Moynihan & Kroll, 2016). However, only 40% of government program managers report evaluations of government programs completed within 5 years of their development (U.S. GAO, 2017).



Brinkerhoff (2006) stated that evaluation is a tool to improve performance and business results by providing the findings to stakeholders who can nurture and sustain things that are working and change those that are not working. The findings of this study, if implemented, offer a means for positive social change for governmental agencies by examining and reporting the findings of the effect of an LDP on the business results of the agency. The agency can use the findings to improve the LDP and leader effectiveness in managing the organization's challenges. Agency decision-makers need to know the outcome of LDPs, specifically, if the LDP had a positive effect on the bottom line (Phillips et al., 2012). Rowden (2005) stated there is a need to justify all expenses in the current business environment of downsizing and global competition.

Implications for Practice

Dalakoura (2010) stated that the themes in leadership literature include the need for leadership and leadership training during challenging economic times and competitive business environments. Leadership development is popular; however, LDP evaluation has not increased (Dalakoura, 2010). Hayward (2011) and Tsyganenko (2014) concluded that outcomes of LDPs focused on the improvement of individual characteristics without connecting those improvements to organizational business results or strategy. Aragón et al. (2014) found that empirical literature was undecided regarding a positive connection between business results and managerial training. This study will fill the current knowledge gap by examining an LDP's impact on organizational business results as reported by individuals (i.e., managers of attendees) with knowledge of the LDP instead of only the individual attendees' reactions or results.



My findings produced data that future researchers can use to further study, analyze, and identify how participating in an LDP affects business results. The addition of my findings adds to the literature by including two different perspectives on the effect of an LDP in one study. This study adds to the knowledge base regarding processes and challenges in LDP evaluation and suggests opportunities and improvements. I included the difficulties in gathering valid data regarding the impacts of an LDP on business results for future research. This study also advances leadership development EMs by focusing on the LDP's effect on business results to a much greater extent than past studies.

Community Implications

There are additional benefits such as improving the economic, social, and condition of people's lives. Leadership development incorporates social change by its definition. Leadership development is an integration strategy to help people understand how to relate and coordinate their efforts with others, build commitments, and develop extended social networks as they build self-understanding to social and organizational priorities (Day, 2000). LDPs provide instruction on skills that individuals can apply to work efforts and the community.

The agency in this case study serves the scientific community, businesses, manufacturers, and the community at large. By using EMs to review and assess LDPs to improve leader effectiveness, the agency impacts social change. Improvement in individual leader skills could flow down and impact agency customers, and American society, by providing faster turnaround and higher quality products and services.



Kirkpatrick and Kirkpatrick (2013) stated that U.S. residents benefit from efficient government administration when agencies create training effectiveness.

Conclusions

The literature review indicated there is a need for leadership and leadership training. There was also a need for evaluation of LDP results. According to leadership experts, the future of leadership development depends on programs confirming their worth (Hayward, 2011). Program evaluation is one means of assessing LDP worth and moving toward more rigorous leadership development practices by focusing on their bottom-line benefits (Hayward, 2011). This study offers an example of an assessment of LDPs outcomes. The study inclusion of both the LDP attendees and managers is a unique contribution to LDP evaluation research.

The goal of the study was to assess the perceptions of LDP attendees and managers with knowledge of the LDP on the agency's business results. There were differing views from the impact on business results. LDP attendees reported the LDP had a positive impact on business results; managers reported the LDP did not have a positive impact on business results. I identified a common perception that the LDP was beneficial to LDP attendees. Another finding was both LDP attendees and managers did not perceive the LDP attendees caused a financial result, a cost savings or revenue increase, for the organization.

Edwards and Turnball (2012) declared leadership development as both very simple and at the same time, very complicated. Leadership is about impacting the behavior of individuals, and at its most complex, it seeks to understand the impact on the



individual, organization, community, and society, across time, place, related networks and, organizational levels and beyond (Edwards & Turnball, 2012). Leadership development is critical to business, and managers, human resource staff, and evaluators can use evaluations of LDPs to improve individual leaders.



References

- 2017 Training Industry Report. (November/December, 2017). *Training Magazine*.

 Retrieved from https://trainingmag.com/trgmag-article/2017-training-industry-report/
- Alkin, M. C., & Christie, C. A. (2004). An evaluation theory tree. In M. C. Alkin (Ed.), *Evaluation roots: Tracing theorists' views and influences* (pp. 12-65). Thousand Oaks, CA: Sage.
- American Society for Training and Development. (2009). 2009 state of the industry report. Alexandria, VA: ASTD Press.
- Aragón, M. I. B., Jiménez, D. J., & Valle, R. S. (2014). Training and performance: The mediating role of organizational learning. *BRQ Business Research Quarterly*, 17(3), 161-173. doi:10.1016/j.cede.2013.05.003
- Aragón-Sánchez, A., Barba-Aragón, I., & Sanz-Valle, R. (2003). Effects of training on business results. *The International Journal of Human Resource*Management, 14(6), 956-980. doi:10.1080/0958519032000106164
- Ardichvili, A., & Manderscheid, S. V. (2008). Emerging practices in leadership development an introduction. *Advances in Developing Human Resources*, 10(5), 619-631. doi:10.1177/1523422308321718
- Ardichvili, A. A., Natt och Dag, K., & Manderscheid, S. (2016). Leadership development: Current and emerging models and practices. *Advances in Developing Human Resources*, 18(3), 275-285. doi:10.1177/1523422316645506



- Avolio, B. J., Avey, J. B., & Quisenberry, D. (2010). Estimating return on leadership development investment. *The Leadership Quarterly*, 21(4), 633-644. doi:10.1016/j.leaqua.2010.06.006
- Avolio, B. J., Reichard, R. J., Hannah, S. T., Walumbwa, F. O., & Chan, A. (2009). A meta-analytic review of leadership impact research: Experimental and quasi-experimental studies. *The Leadership Quarterly*, 20(5), 764-784. doi:10.1016/j.leaqua.2009.06.006
- Avolio, B. J., Walumbwa, F. O., & Weber, T. J. (2009). Leadership: Current theories, research, and future directions. *Annual Review of Psychology*, 60, 421-449. doi:10.1146/annurev.psych.60.110707.163621
- Ayob, A. H., & Morell, J. A. (2016). The historical path of evaluation as reflected in the content of evaluation and program planning. *Evaluation and Program*Planning, 58, 20-27. doi:10.1016/j.evalprogplan.2016.05.006
- Baldwin, T. T., & Ford, J. (1988). Transfer of training: A review and directions for future research. *Personnel Psychology*, 41(1), 63-105. doi:10.1111/j.1744-6570.1988.tb00632.x
- Baškarada, S. (2014). Qualitative case study guidelines. *The Qualitative Report*, 19(40), 1-25. Retrieved from http://nsuworks.nova.edu/tqr/
- Bates, R. (2004). A critical analysis of evaluation practice: The Kirkpatrick model and the principle of beneficence. *Evaluation and Program Planning*, 27, 341-347. doi:10.1016/j.evalprogplan.2004.04.011
- Bernard, H. R. (2013). Social research methods: Qualitative and quantitative approaches



- (2nd ed.). Thousand Oaks, CA: Sage.
- Brinkerhoff, R. O. (2005). The success case method: A strategic evaluation approach to increasing the value and effect of training. *Advances in Developing Human*Resources, 7(1), 86-101. doi:10.1177/1523422304272172
- Brinkerhoff, R. O. (2006). Increasing impact of training investments: An evaluation strategy for building organizational learning capability. *Industrial and Commercial Training*, 38(6), 302-307. doi:10.1108/00197850610685824
- Burke, M. J., & Day, R. R. (1986). A cumulative study of the effectiveness of managerial training. *Journal of Applied Psychology*, 71(2), 232. doi:10.1037/0021-9010.71.2.232
- Canwell, A., Dongrie, V., Neveras, N., & Stockton, H. (2014). Developing 21st-century leadership skills. *Mworld*, *13*, 38-43. Retrieved from http://www.msworld.org/
- Carden, F., & Alkin, M. C. (2012). Evaluation roots: An international perspective. *Journal of Multidisciplinary Evaluation*, 8(17), 102-118. Retrieved from www.journals.sfu.ca/jmde
- Castillo-Montoya, M. (2016). Preparing for interview research: The interview protocol refinement framework. *The Qualitative Report*, 21(5), 811-831. Retrieved from https://nsuworks.nova.edu/tqr
- Chemers, M. M. (2000). Leadership research and theory: A functional integration. *Group Dynamics: Theory, Research, and Practice, 4*(1), 27. doi:10.1037/1089-2699.4.1.27



- Choy, L. T. (2014). The strengths and weaknesses of research methodology: Comparison and complimentary between qualitative and quantitative approaches. *IOSR Journal of Humanities and Social Science*, *19*(4), 99-104. Retrieved from www.iossrjournals.org
- Choy, S., & Lidstone, J. (2013). Evaluating leadership development using the most significant change technique. *Studies in Educational Evaluation*, *39*(4), 218-224. doi:10.1016/j.stueduc.2013.09.001
- Chyung, S. Y. Y. (2015). Foundational concepts for conducting program evaluations.

 *Performance Improvement Quarterly, 27(4), 77-96. doi:10.1002/piq.21181
- Collins, D. B. (2001). Organizational performance: The future focus of LDPs. *Journal of Leadership Studies*, 7(4), 43-54. doi:10.1177/107179190100700404
- Collins, D. B. (2002). Performance-level evaluation methods used in management development studies from 1986 to 2000. *Human Resource Development Review*, *1*(1), 91-110. doi:10.1177/1534484302011005
- Collins, D. B., & Holton, E. F. (2004). The effectiveness of managerial LDPs: A metaanalysis of studies from 1982 to 2001. *Human Resource Development Quarterly*, 15(2), 217-248. doi:10.1002/hrdq.1099
- Conger, J. A. (2010). *Handbook of leadership theory and practice*. Boston, MA: Harvard Business School.
- Cronin, C. (2014). Using case study research as a rigorous form of inquiry. *Nurse Research*, 21(5), 19-27. doi:10.7748/nr.21.5.19.e1240



- Culbertson, S., & Owen, K. (2012). Demonstrating the value of executive education.

 *People & Strategy, 35(3), 44-51. Retrieved from http://www.hrps.org/?page=peoplestrategy
- Curado, C., & Teixeira, S. (2014). Training evaluation levels and ROI: The case of a small logistics company. *European Journal of Training and Development*, 38(9), 845-870. doi:10.1108/EJTD-05-2014-0037
- Dalakoura, A. (2010). Examining the effects of leadership development on firm performance. *Journal of Leadership Studies*, 4(1), 59-70. doi:10.1002/jls.20160
- Day, D. V. (2000). Leadership development: A review in context. *Leadership Quarterly*, 11(4), 581. doi:10.1016/S1048-9843(00)00061-8
- Day, D. V., Fleenor, J. W., Atwater, L. E., Sturm, R. E., & McKee, R. A. (2014).

 Advances in leader and leadership development: A review of 25 years of research and theory. *The Leadership Quarterly*, 25(1), 63-82.

 doi:10.1016/j.leaqua.2013.11.004
- Day, D. V., & Sin, H. P. (2011). Longitudinal tests of an integrative model of leader development: Charting and understanding developmental trajectories. *The Leadership Quarterly*, 22(3), 545-560. doi:10.1016/j.leaqua.2011.04.011
- De Alwis, A., & Rajaratne, W. M. (2011). A study on measuring return on investment of a key account management training program. *Scientific Papers of the University of Pardubice. Series D, Faculty of Economics & Administration*, 16(21), 19-30.

 Retrieved from http://www.upce.cz/english/fea/research-development/journal-scientific.html



- DeRue, D. S., & Myers, C. G. (2014). Oxford handbook of leadership and organizations.

 New York, NY: Oxford University Press.
- DeRue, D., Nahrgang, J. D., Hollenbeck, J. R., & Workman, K. (2012). A quasiexperimental study of after-event reviews and leadership development. *Journal of Applied Psychology*, 97(5), 997-1015. doi:10.1037/a0028244
- DeSilets, L. D. (2018). An update on Kirkpatrick's model of evaluation: Part two. *The Journal of Continuing Education in Nursing*, 49(7), 292-293. doi:10.3928/00220124-20180613-02
- Diamantidis, A. D., & Chatzoglou, P. D. (2014). Employee post-training behavior and performance: Evaluating the results of the training process. *International Journal of Training and Development*, 18(3), 149-170. doi:10.1111/ijtd.12034
- Dowling, R., Lloyd, K., & Suchet-Pearson, S. (2016). Qualitative methods 1: Enriching the interview. *Progress in Human Geography*, 40(5), 679-686. doi:10.1177/0309132515596880
- Dwyer, S. C., & Buckle, J. L. (2009). The space between: On being an insider-outsider in qualitative research. *International Journal of Qualitative Methods*, 8(1), 54-63. doi:10.1177/160940690900800105
- Edwards, G., & Turnbull, S. (2012). A cultural approach to evaluating leadership development. *Advances in Developing Human Resources*, 15(1), 45-60. doi:10.1177/1523422312467144



- Edwards, G., & Turnbull, S. (2013). Special issue on new paradigms in evaluating leadership development. *Advances in Developing Human Resources*, *15*(1), 3-9. doi:10.1177/1523422312467147
- Elo, S., Kääriäinen, M., Kanste, O., Pölkki, T., Utriainen, K., & Kyngäs, H. (2014).

 Qualitative content analysis. *Sage Open*, 4(1). doi:10.1177/2158244014522633
- Eseryel, D. (2002). Approaches to evaluation of training: Theory & practice. *Journal of Educational Technology & Society*, 5(2), 93-98. doi:10.1.1.194.6630
- Fiedler, F. E. (1996). Research on leadership selection and training: One view of the future. *Administrative Science Quarterly*, 41(2), 241-250. doi:10.2307/2393716
- Fusch, P. I., & Ness, L. R. (2015). Are we there yet? Data saturation in qualitative research. *The Qualitative Report*, 20(9), 1408-1416. Retrieved from https://nsuworks.nova.edu/tgr
- Gentry, W. A., & Martineau, J. W. (2010). Hierarchical linear modeling as an example for measuring change over time in a leadership development evaluation context.

 The Leadership Quarterly, 21(4), 645-656. doi:10.1016/j.leaqua.2010.06.007
- Getha-Taylor, H., Fowles, J., Silvia, C., & Merritt, C. C. (2015). Considering the effects of time on leadership development: A local government training evaluation. *Public Personnel Management*, 44(3), 295-316. doi:10.1177/0091026015586265



- Greene, J. (1994). Qualitative program evaluation: Practice and promise. In N. Denzin and Y. Lincoln (Eds.). *Handbook of qualitative research* (pp. 83-107). Thousand Oaks, CA: Sage.
- Gregoire, M. B., & Arendt, S. W. (2014). Leadership: Reflections over the past 100 years. *Journal of the Academy of Nutrition and Dietetics*, 114(5), S10-S19. doi:10.1016/j.jand.2014.02.023
- Griffin, R. (2012). A practitioner friendly and scientifically robust training evaluation approach. *Journal of Workplace Learning*, 24(6), 393-402. doi:10.1108/13665621211250298
- Grohmann, A., & Kauffeld, S. (2013). Evaluating training programs: Development and correlates of the Questionnaire for Professional Training Evaluation. *International Journal of Training & Development*, 17(2), 135-155. doi:10.1111/ijtd.12005
- Grossoehme, D. H. (2014). Overview of qualitative research. *Journal of Health Care Chaplaincy*, 20(3), 109-122. doi:10.1080/08854726.2014.925660
- Guest, G., Bunce, A., & Johnson, L. (2006). How many interviews are enough? An experiment with data saturation and variability. *Field Methods*, *18*, 59-82. doi:10.1177/152822052799903
- Gustafsson, J. (2017). Single case studies vs. multiple case studies: A comparative study.

 **Academy of Business, Engineering and Science, Halmstad University, Halmstad, Sweden. Retrieved from www.diva-portal.org/smash/get/diva2:1064378/FULLTEXT01.pdf



- Guvadeen, D., & Seasons, M. (2018). Evaluation theory and practice: Comparing program evaluation and evaluation in planning. *Journal of Planning Education and Research*, 38(1). 98-110. doi:10.1177/0739456X16675930
- Hannum, K., Martineau, J. W., & Reinelt, C. (2006). *The handbook of leadership development evaluation*. San Francisco, CA: John Wiley & Sons.
- Hayward, S. (2011). Connecting leadership development to bottom line benefits. *Strategic HR Review*, 10(1), 28–34.

 doi:10.1108/14754391111091788#sthash.hWBEg6P8.dpuf
- Health Foundation. (2013). Quality improvement made simple: What everyone should know about healthcare quality improvement: Quick guide. Retrieved at www.health.org.uk/publications
- Hentschel, J. (1999). Contextuality and data collection methods: A framework and application to health service utilisation. *The Journal of Development Studies*, 35(4), 64-94. doi:10.1080/00220389908422581
- Hernez-Broome, G., & Hughes, R. J. (2004). Leadership development: Past, present, and future. *Human Resource Planning*, 27(1), 24-32. Retrieved from http://www.hrps.org/
- Herron, M. C., & Quinn, K. M. (2016). A careful look at modern case selection methods. *Sociological Methods & Research*, 45(3), 458-492. doi:10.1177/0049124114547053
- Hewitt-Taylor, J. (2001). Use of constant comparative analysis in qualitative research. *Nursing Standard*, *15*(42), 39. doi:10.7748/ns2001.07.15.42.39.c3052



- Holton, E. F. (1996). The flawed four-level evaluation model. *Human Resource Development Quarterly*, 7(1), 5-21. doi:10.1002/hrdq.3920070103
- Horner, M. (1997). Leadership theory: Past, present and future. *Team Performance Management*, *3*(4), 270-287. doi:10.1108/13527599710195402
- Houghton, C., Casey, D., Shaw, D., & Murphy, K. (2013). Rigour in qualitative casestudy research. *Nurse Researcher*, 20(4), 12-17. doi:7748/nr2013.03.20.4.12.e326
- Hunter, S. T., Bedell-Avers, K. E., & Mumford, M. D. (2007). The typical leadership study: Assumptions, implications, and potential remedies. *The Leadership Quarterly*, *18*(5), 435-446. doi:10.1016/j.leaqua.2007.07.001
- Jacob, S. A., & Furgerson, S. P. (2012). Writing interview protocols and conducting interviews: Tips for students new to the field of qualitative research. *The Qualitative Report*, 17(42), 1-10. Retrieved from https://nsuworks.nova.edu/tqr
- Jegadeesh, N., & Livnat, J. (2006). Post-earnings-announcement drift: The role of revenue surprises. *Financial Analysts Journal*, 22-34. doi:10.2469/faj.v62.n2.4081
- Kahan, B. (2008). Review of evaluation frameworks. *Kael Consulting, Saskatchewan Ministry of Education*. Retrieved from http://idmbestpractices.ca/pdf/evaluation-frameworks-review.pdf
- Kaiser, R. B., Hogan, R., & Craig, S. B. (2008). Leadership and the fate of organizations. American Psychologist, 63(2), 96. doi:10.1037/0003-066X.63.2.96
- Karim, M. R., Huda, K. N., & Khan, R. S. (2012). Significance of training and post training evaluation for employee effectiveness: An empirical study on Sainsbury's



- Supermarket Ltd, UK. *International Journal of Business and Management*, 7(18), 141. doi:10.5539/ijbm.v7n18p141
- Kemparaj, U., & Chavan, S. (2013). Qualitative research: A brief description. *Indian Journal of Medical Sciences*, 67(3), 89-98. doi:10.4103/0019-5359.121127
- Kennedy, F., Carroll, B., & Francoeur, J. (2013). Mindset not skill set evaluating in new paradigms of leadership development. *Advances in Developing Human**Resources, 15(1), 10-26. doi:10.1177/1523422312466835
- Kennedy, P. E., Chyung, S. Y., Winiecki, D. J., & Brinkerhoff, R. O. (2014). Training professionals' usage and understanding of Kirkpatrick's Level 3 and Level 4 evaluations. *International Journal of Training and Development*, 18(1), 1-21. doi:10.1111/ijtd.12023
- King, E., & Nesbit, P. (2015). Collusion with denial: Leadership development and its evaluation. *Journal of Management Development*, *34*(2), 134-152. doi:10.1108/JMD-02-2013-0023
- Kirpatrick, D. L. (1959). Techniques for evaluating training programs, Part 2: *Training and Development Journal*, 21-26. doi:10.4236/ce.2016.715225
- Kirkpatrick, D., & Kirkpatrick, J. (2005). *Transferring learning to behavior: Using the four levels to improve performance*. San Francisco, CA: Berrett-Koehler.
- Kirkpatrick, J., & Kirkpatrick, W. K. (2013). Feds lead the way in making training evaluations more effective. *Public Manager*, 42(1), 15. Retrieved from www.td.org/the-public-manager



- Kozleski, E. B. (2017). The uses of qualitative research: Powerful methods to inform evidence-based practice in education. *Research and Practice for Persons with Severe Disabilities*, 42(1), 19-32. doi:10.1177/1540796916683710
- Kumar, V., Narayana, M. S., & Vidya Sagar, M. (2012). Evaluation of training in organizations: A proposal for an integrated model. *International Journal of Engineering and Management Sciences*, 3(1), 77-84. doi:10.1108/03090591011070789.
- Lacerenza, C. N., Reyes, D. L., Marlow, S. L., Joseph, D. L., & Salas, E. (2017).

 Leadership training design, delivery, and implementation: A metaanalysis. *Journal of Applied Psychology*, 102(12), 1686-1718.

 doi:10.1037/apl0000241
- Lee, J. (2005). Effects of leadership and leader-member exchange on commitment. *Leadership & Organization Development Journal*, 26(8), 655-672. doi:10.1108/01437730510633728
- Lieberson, S., & O'Connor, J. F. (1972). Leadership and organizational performance: A study of large corporations. *American Sociological Review*, *37*(2), 117-130.

 Retrieved from http://www.jstor.org/
- Lincoln, Y. S., & Guba, E. G. (1986). But is it rigorous? Trustworthiness and authenticity in naturalistic evaluation. *New Directions for Program Evaluation*, *30*, 73-84. doi:10.1002/ev.1427



- Linzalone, R., & Schiuma, G. (2015). A review of program and project evaluation models. *Measuring Business Excellence*, 19(3), 90-99. doi:10.1108/MBE-04-2015-0024
- Lussier, R. N., & Achua, C. F. (2015). *Leadership: Theory, application, & skill development*. Boston, MA: Nelson Education.
- Malterud, K. (2001). Qualitative research: standards, challenges, and guidelines. *The Lancet*, 358(9280), 483-488. doi.10.1016/S0140-6736(01)05627-6
- Marshall, C., & Rossman, G. B. (2011). *Designing qualitative research*. Thousand Oaks, CA: Sage.
- Martineau, J. (2004). Laying the groundwork: First steps in evaluating leadership development. *Leadership in Action*, 23(6), 3-8. doi:10.1002/lia.1044
- McCauley, C. D. (2008). Leader development: A review of research. Unpublished manuscript. Retrieved from
 http://www.shrm.org/about/foundation/research/documents/mccauley%20leader%20dev%20lit%20review.doc
- McGurk, P. (2010). Outcomes of management and leadership development. *Journal of Management Development*, 29(5), 457-470. doi:10.1108/02621711011039222
- Medina, L., Acosta-Pérez, E., Velez, C., Martínez, G., Rivera, M., Sardiñas, L., &
 Pattatucci, A. (2015). Training and capacity building evaluation: Maximizing
 resources and results with success case method. *Evaluation and Program Planning*, 52, 126-132. doi:10.1016/j.evalprogplan.2015.03.008



- Megheirkouni, M. (2018). Leadership and management development post-war: Exploring future trends. *International Journal of Organizational Analysis*, 26(1), 107-128. doi:10.1108/IJOA-06-2017-1176
- Moreau, K. A. (2017). Has the new Kirkpatrick generation built a better hammer for our evaluation toolbox? *Medical Teacher*, *39*(9), 999-1001. doi:10.1080/0142159X.2017.1337874
- Moynihan, D. P., & Kroll, A. (2016). Performance management routines that work? An early assessment of the GPRA Modernization Act. *Public Administration*Review, 76(2), 314-323. doi:10.1111/puar.12434.
- Mumford, M. D., Marks, M. A., Connelly, M. S., Zaccaro, S. J., & Reiter-Palmon, R. (2000). Development of leadership skills: Experience and timing. *The Leadership Quarterly*, 11(1), 87-114. doi:10.1016/S1048-9843(99)00044-2
- Mumford, M. D., Zaccaro, S. J., Johnson, J. F., Diana, M., Gilbert, J. A., & Threlfall, K. V. (2000). Patterns of leader characteristics: Implications for performance and development. *The Leadership Quarterly*, 11(1), 115-133. doi:10.1016/S1048-9843(99)00045-4
- Nicholls, D. (2009). Qualitative research: Part two-methodologies. *International Journal of Therapy and Rehabilitation*, *16*(11), 586. doi:10.12968/ijtr.2009.16.11.44939.
- Noble, H., & Smith, J. (2015). Issues of validity and reliability in qualitative research. *Evidence Based Nursing*, *18*(2), 34-35. doi:10.1136/eb-2015-102054
- Noe, R. A. (2010). *Employee training and development*. Boston, MA: McGraw-Hill/Irwin.



- Northouse, P. G. (2015). Leadership: Theory and practice. Thousand Oaks, CA: Sage.
- Opperman, C., Liebig, D., Bowling, J., Johnson, C. S., & Harper, M. (2016). Measuring return on investment for professional development activities: A review of the evidence. *Journal for Nurses in Professional Development*, 32(3), 122-129. doi:10.1097/NND.000000000000000262
- O'Reilly, M., & Parker, N. (2012). "Unsatisfactory saturation:" A critical exploration of the notion of saturated sample sizes in qualitative research. *Qualitative Research*, 13(2), 190-197. doi:10.1177/1468794112446106.
- Packard, T., & Jones, L. (2015). An outcomes evaluation of a leadership development initiative. *Journal of Management Development*, *34*(2), 153-168. doi:10.1108/JMD-05-2013-0063
- Page, S. (2015). The power of business process improvement: 10 simple steps to increase effectiveness, efficiency, and adaptability. New York, NY: American Management Association.
- Petty, N. J., Thomson, O. P., & Stew, G. (2012). Ready for a paradigm shift? Part 2: Introducing qualitative research methodologies and methods. *Manual Therapy*, 17, 378-384. doi:10.1016/j.math.2012.03.004
- Phillips, J. J. (2007). Measuring ROI: Fact, fad, or fantasy? *Training and Development*, 61(4), 42. Retrieved from https://www.researchgate.net/journal/1535-7740_T_and_D



- Phillips, J., Phillips, P., & Ray, R. (2012). *Measuring leadership development: Quantify*your program's impact and ROI on organizational performance. New York, NY:

 McGraw Hill.
- Pineda, P. (2010). Evaluation of training in organisations: A proposal for an integrated model. *Journal of European Industrial Training*, *34*(7), 673-693. doi:10.1108/03090591011070789
- Ployhart, R. E., & Hale, D. (2014). The fascinating psychological microfoundations of strategy and competitive advantage. *Annual Review of Organizational Psychology and Organizational Behavior*, 1, 145–172. doi:10.1146/annurev-orgpsych-031413-091312
- Popescu, L., Popescu, V., & Iancu, A. (2010). The economic impact of employer investment in training. *Economics, Management & Financial Markets*, *5*(1), 170-175. Retrieved from http://www.addletonacademicpublishers.com/economics-management-and-financial-markets
- Pulichino, J. P. (2007). *Usage and value of Kirkpatrick's four levels of training*evaluation (Doctoral dissertation, Pepperdine University). Retrieved from

 ProQuest Dissertations and Theses Global. (UMI No. 3264775)
- Punia, B. K., & Kant, S. (2013). A review of factors affecting training effectiveness visà-vis managerial implications and future research directions. *International Journal of Advanced Research in Management and Social Sciences*, 2(1), 151-164. Retrieved from http://globalimpactfactor.com/international-journal-ofadvanced-research-in-management-and-social-sciences/



- Qu S., & Dumay, J. (2011). The qualitative research interview. *Qualitative Research in Accounting & Management*, 8(3), 238-264. doi:10.1108/11766091111162070
- Raelin, J. A. (2004). Don't bother putting leadership into people. *The Academy of Management Executive*, 18(3), 131-135. doi:10.5465/AME.2004.14776184
- Rafiq, M. (2015). Training evaluation in an organization using Kirkpatrick model: A case study of PIA. *Journal of Entrepreneurship & Organization Management*. 4(3), 1-8. doi:10.4172/2169-026X.1000151
- Ray, K. W., & Goppelt, J. (2011). Understanding the effects of leadership development on the creation of organizational culture change: A research approach.

 International Journal of Training and Development, 15(1), 58-75.

 doi:10.1111/j.1468-2419.2010.00368.x
- Reinelt, C., Foster, P., & Sullivan, S. (2002). *Evaluating outcomes and impacts: A scan of 55 LDPs*. Battle Creek, MI: WK Kellogg Foundation.
- Relevant development: Effective leadership training. (2012). *Development and Learning* in *Organizations*, 26(5), 32–36. doi:10.1108/14777281211258699
- Renz, S. M., Carrington, J. M., & Badger, T. A. (2018). Two strategies for qualitative content analysis: An intramethod approach to triangulation. *Qualitative Health Research*, 28(5), 824-831. doi:10.1177/1049732317753586
- Rice, A. A. (2011). Evaluation of the impact of a large corporate leadership development course (Doctoral dissertation). Retrieved from ProQuest Dissertations and Theses.

 (UMI No. 3455082)



- Ridolfo, H., & Schoua-Glusberg, A. (2011). Analyzing cognitive interview data using the constant comparative method of analysis to understand cross-cultural patterns in survey data. *Field Methods*, 23(4), 420-438. doi:10.1177/1525822X11414835
- Riotto, J. J. (2004). Model for calculating ROI of training/learning initiatives. *Journal of Interactive Instruction Development*, 16(4). Retrieved from http://www.salt.org/salt.asp?pn=jiid&ss=l
- Rosete, D., & Ciarrochi, J. (2005). Emotional intelligence and its relationship to workplace performance outcomes of leadership effectiveness. *Leadership & Organization Development Journal*, 26(5), 388-399. doi:10.1108/01437730510607871
- Rossetto, K. R. (2014). Qualitative research interviews: Assessing the therapeutic value and challenges. *Journal of Social and Personal Relationships*, *31*, 482-489. doi:10.1177/0265407514522892
- Rowden, R. W. (2005). Exploring methods to evaluate the return-on-investment from training. *Business Forum*, 27(1), 31-36. Retrieved from http://www.bizforum.org/journal.htm
- Rowley, J. (2012). Conducting research interviews. *Management Research Review*, *35*, 260-271. doi:10.1108/01409171211210154
- Salicru, S., Wassenaar, E., Suerz, E., & Spittle, J. (2016). A case study of global leadership development best practice. *OD Practitioner*, 48(2). Retrieved from https://www.odnetwork.org/page/ODPractitioner



- Scriven, M. (2016). Roadblocks to recognition and revolution. *American Journal of Evaluation*, 37(1), 27-44. doi:10.1177/1098214015617847
- Shenge, N. A. (2014). Training evaluation: Process, benefits, and issues. *IFE**PsychologIA: An International Journal, 22(1), 50-58. Retrieved from https://journals.co.za/content/journal/ifepsyc
- Singh, M. (2013). Training evaluation: Various approaches and applications. *IUP Journal* of Soft Skills, 7(1), 27-34. Retrieved from http://www.iupindia.in/Soft_Skills.asp
- Stufflebeam, D. L., & Shinkfield, A. J. (2007). Evaluation theory, models, and applications. San Francisco, CA: Jossey-Bass.
- Talanquer, V. (2014). Using qualitative analysis software to facilitate qualitative data analysis. *Tools of Chemistry Education Research*, 1166, 83-95. doi:10.1021/bk-2014-1166.ch005
- Talbot, C. (2010). Theories of performance: Organizational and service improvement in the public domain. Oxford, NY: Oxford University Press.
- Tamkin, P., Yarnall, J., & Kerrin, M. (2002). *Kirkpatrick and beyond: A review of models of training evaluation. IES Report*. Grantham, UK: The Institute for Employment Studies
- Targum, S. D. (2011). The distinction between clinical and research interviews in psychiatry. *Innovations in Clinical Neuroscience*, 8(3), 40. Retrieved from http://innovationscns.com/



- Tharenou, P., Saks, A. M., & Moore, C. (2007). A review and critique of research on training and organizational-level outcomes. *Human Resource Management Review*, 17(3), 251-273. doi:10.1016/j.hrmr.2007.07.004
- Thomas, A. B. (1988). Does leadership make a difference to organizational performance? Administrative Science Quarterly, 33(3), 388-400. doi:10.2307/2392715
- Tourish, D. (2012). Developing leaders in turbulent times: Five steps towards integrating soft practices with hard measures of organizational performance. *Organizational Dynamics*, 41(1), 23-31. doi:10.1016/j.orgdyn.2011.12.004
- Trusty, J. (2011). Quantitative articles: Developing studies for publication in counseling journals. *Journal of Counseling & Development*, 89(3), 261-267. doi:10.1002/j.1556-6678.2011.tb00087.x
- Tsyganenko, M. V. (2014). The effect of a LDP on behavioral and financial outcomes: Kazakhstani experience. *Procedia Social and Behavioral Sciences*, *124*(20), 486-495. doi:10.1016/j.sbspro.2014.02.511.
- Twitchell, S., Holton, E. F., & Trott, J. W. (2000). Technical training evaluation practices in the United States. *Performance Improvement Quarterly*, *13*(3), 84-109. doi:10.1111/j.1937-8327.2000.tb00177.x
- Uhl-Bien, M., Marion, R., & McKelvey, B. (2007). Complexity leadership theory:

 Shifting leadership from the industrial age to the knowledge era. *The Leadership Quarterly*, 18(4), 298-318. doi:10.1016/j.leaqua.2007.04.002
- U.S. Government Accountability Office. (2012a). *Designing evaluations: 2012 revision*. (GAO-12-208G). Washington, DC: Government Printing Office.



- U.S. Government Accountability Office. (2012b). *Program evaluation: Strategies to*facilitate agencies' use of evaluation in program management and policy making

 (GAO-13-570). Washington, DC: Government Printing Office.
- U.S. Government Accountability Office. (2017). Program evaluation: Annual agencywide plans could enhance leadership support for program evaluations. (GAO-17-743). Washington, D.C.: Government Printing Office.
- Van Vugt, M. (2006). Evolutionary origins of leadership and followership. *Personality* and Social Psychology Review, 10(4), 354-371.

 doi:10.1207/s15327957pspr1004_5
- Vaterlaus, J. M., & Higginbotham, B. J. (2011). Qualitative program evaluation methods.

 *The Forum for Family and Consumer Issues, 16(1). Retrieved from http://digitalcommons.usu.edu/cgi/viewcontent.cgi?article=2566&context=extensi on curall
- Vitello-Cicciu, J. M., Weatherford, B., Gemme, D., Glass, B., & Seymour-Route, P. (2014). The effectiveness of a LDP on self-awareness in practice. *Journal of Nursing Administration*, 44(3), 170-174. doi:10.1097/NNA.00000000000000046
- Wankhede, M., & Gujarathi, R. (2012). Evaluation of training: Need to focus. *Journal of Business Management & Social Sciences Research*, 1(2), 1-15. Retrieved from www.borjournals.com/a/index.php/jbmssr
- Watkins, K. E., Lyso, I. H., & deMarrais, K. (2011). Evaluating executive leadership programs: A theory of change approach. *Advances in Developing Human Resources*, *13*, 208-239. doi:10.1177/1523422311415643



- Yammarino, F. (2013). Leadership past, present, and future. *Journal of Leadership & Organizational Studies*, 20(2), 149-155. doi.10.1177/1548051812471559
- Yin, R. (2018). Case study research and applications: Design and method (6th ed.).

 Thousand Oaks, CA: Sage.
- Yukl, G. (2008). How leaders influence organizational effectiveness. *The Leadership Quarterly*, 19(6), 708-722. doi:10.1016/j.leaqua.2008.09.008
- Zaccaro, S. J., & Horn, Z. N. (2003). Leadership theory and practice: Fostering an effective symbiosis. *The Leadership Quarterly*, *14*(6), 769-806. doi:10.1016/j.leaqua.2003.09.009
- Zigarmi, D., & Roberts, T. P. (2017). A test of three basic assumptions of Situational Leadership® II Model and their implications for HRD practitioners. *European Journal of Training and Development*, 41 (3), 241-260. doi:10.1108/EJTD-05-2016-0035

Appendix A: Interview Protocol

Interview .	Focus:	Perceived	Effect of	f Leac	lership	Deve	lopment	Program	on .	Business

Results of Governmental Agency

Date of the interview:

Location of the interview:

Start time: End time:

Name of the Interviewee:

Name of the Interviewer:

Orientation

1. The meeting begins with introductions and exchange of contact information. The researcher provides a description of the study and interview process.

Expectations of the research study, interview, sharing of data, and other issues are provided to the participant.

- 2. The researcher presents a copy of the consent form for the participant signature.
- 3. The researcher asks if the participant has any questions before proceeding.

Introduction

Interview Process

- 4. Researcher follows the questionnaire to guide the interview.
- 5. The interview is recorded, and the researcher takes notes.
- 6. The interview will last approximately 45-60 minutes.
- 7. The same interview protocol is followed for each participant.



Closing

- 8. The researcher informs each participant of the possible 30-minute follow-up meeting to conduct member checking and review questions that need further clarification.
- 9. The researcher reviews the key topics, or any issues and confirms accuracy with the participant.
- 10. At the close of the interview, the researcher thanks the interviewee for participating in the study.



Appendix B: Interview Questions for Individuals who Attended the LDP

Re Business Results

1. What business results did you create as a result of attending the LDP?

Examples of Business Results:

- a. Create or recommend an improvement to an agency service or process
- b. Create or recommend an efficiency standard or quality improvement after participation in the LDP
- c. Cause or create a cost savings for the agency after participation in the LDP
- d. Cause a revenue increase for the agency
- 2. [Probe as appropriate for more clarity, for examples, and for emergent themes from prior interviews not yet mentioned by the interviewee.]
- 3. Is there anything else that you would like to share about the effect of LDP participants on agency business results?

Consent

Do you consent that the information you provided can be used for research purposes to be published in a dissertation? The information you provided will be combined across all participants, so you cannot be identified. Your identity will not be attached to any data that is published or presented.

Thank you so much for your time today. I assure you that this conversation will be kept confidential and your name will never be associated with this information.



Appendix C: Interview Questions for Managers of Individuals who Attended the LDP

Re Business Results

4. What effect have the individuals who completed the LDP while working for you had on the agency's business results that you attribute to the LDP?

Examples of Business Results:

- a. Create or recommend an improvement to an agency service or process
- b. Create or recommend an efficiency standard or quality improvement after participation in the LDP
- c. Cause or create a cost savings for the agency after participation in the LDP
- d. Cause a revenue increase for the agency
- 5. Probe as appropriate for more clarity, for examples, and for emergent themes from prior interviews not yet mentioned by the interviewee.
- 6. Is there anything else that you would like to share about the effect of LDP participants on agency business results?

Consent

Do you consent that the information you provided can be used for research purposes to be published in a dissertation? The information you provided will be combined across all participants, so you cannot be identified. Your identity will not be attached to any data that is published or presented.

Thank you so much for your time today. I assure you that this conversation will be kept confidential and your name will never be associated with this information.

