Action Research Plan

Topic

Action research can be defined as a structured and systematic investigation designed by an education professional to gather and analyze information regarding their instructional environment and used to guide the development of action plans (Mertler, 2016). The focus of this action research will be to investigate the impact of modeling and co-teaching blended learning on the use of blended learning by classroom teachers. Blended learning, according to Horn and Staker (2015, pp. 34-35), requires that "a student learns at least in part through online learning, with some elements of student control over time, place, path, and/or pace." The student must also learn "at least in part in a supervised brick-and-mortar location away from home." Lastly, the online portion of learning and the brick-and-mortar portion must be connected in a way that provides "an integrated learning experience."

Purpose

The purpose of this action research is to determine if modeling and co-teaching blended learning rotation models affect the use of blended learning by high school classroom teachers. By combining an understanding of professional development requirements with the need for deliberate blended learning training for teachers, district technology instructional specialists hope to translate the data into effective structures to support teachers as they transition from exclusive face-to-face teaching to a rotational model of blended learning (Crowe, 2019). This action research would address how

modeling and co-teaching alongside a teacher would provide content specific support and active engagement to impact high school teachers implementing blended learning.

Research Design and Methodology

The overarching research question is **“**Does repeated modeling and co-teaching of blended learning rotation models with the Instructional Practices in Education and Training (IPET) course teacher affect blended learning usage?” A mixed methods case study will be used to quantify the number of blended learning exposures through modeling and co-teaching, the number of times blended learning is purposefully planned by the course instructor and the number of times the blended learning plan is carried out.

Quantitative data will allow the district Technology Instructional Specialist team to plan for and allocate appropriate amounts of time and support to additional teachers as they begin their own blended learning journey. As more teachers begin blending with confidence, they may be called upon to help provide modeling and co-teaching opportunities to their colleagues. Quantitative data allows those requests to have a tangible timeline commitment in an effort to not overwhelm those experienced teachers with an excessive quantity of additional tasks.

Qualitative data will also be collected, to identify themes as the course instructor reflects on the modeling and co-teaching process as well as the implementation of blended learning. Both the quantitative and qualitative data will help drive changes to both the amount of and type of support available to teachers.

Data and Measurement Instruments

Technology Instructional Specialists will partner with the Instructional Practices in Education and Training course teacher to provide regular opportunities for modeling and co-teaching blended learning. Quantitative data will include:

- The frequency of blended learning modeling and/or co-teaching by a member of the district instructional technology team during each quarter of 2019-2020 school year.
- The frequency of blended learning rotation models designed by the course instructor during each quarter of the 2019-2020 school year.
- The frequency of blended learning rotation models used the course instructor during each quarter of the 2019-2020 school year.

Semi-structured interviews conducted by members of the Technology Instructional Specialist team will serve to identify themes related to the research question will be conducted to collect qualitative data.

The Technology Instructional Specialist team will log their modeling and/or co-teaching sessions with a Google Form measurement instrument as seen in Appendix A. Lesson plans will be shared and annotated indicating when/where blended learning is purposefully planned. A teacher self-report Google Form as seen in Appendix B will be filled in to determine if the planned blended activities were implemented. Semi-structured interviews will be scheduled at various intervals to determine if more exposure through modeling and/or co-teaching is needed and to reflect on the process. The semi-structured interview questions can be referenced in Appendix C.

A Review of Literature

The “Modeling Blended Learning to Increase the Use of Blended Learning” literature review gives a brief overview of blended learning with a focus on rotational models as well as the benefits of blended learning for more a more personalized education. Because blended learning in its simplest definition combines the best of online and face-to-face instructional practices in an effort to guide students along individualized learning paths, assisting teachers as they design and create their own blended learning environments through modeling and co-teaching may be a catalyst that results in changes in practice. The need for deliberate blended learning exposure and training for pre-service teachers will connect to what we know regarding effective professional learning with a focus on active exposure, modeling, and support. By focusing on a teacher partnership at the high school level, this action research should add to the body of educational literature regarding blended learning implementation with 9-12 grade public school teachers.

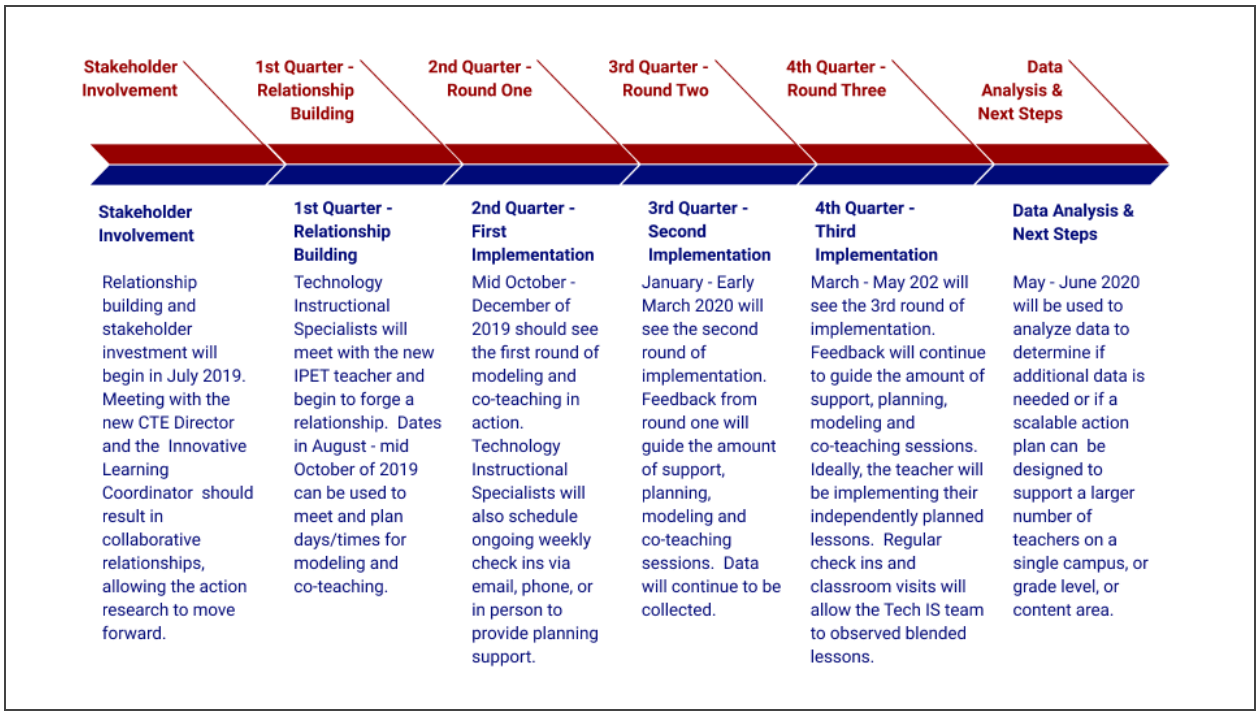
Implementation Timeline & Data Collection/Analysis

As mentioned above, the goal is to implement this action research during the upcoming 2019-2020 school year, beginning in the first fall quarter. However, because the Technology Instructional Specialists plan to partner with the new Instructional Practices in Education and Training course teacher, it is possible that action research data collection might not begin during the first quarter as new relationships must be forged. In addition to the new teacher who is replacing the longstanding IPET teacher who retired in the Spring of 2019, there have been additional changes in leadership

structures, both in the Career and Technology Department and the Learner Services Department. As relationships are built, ideas are shared, and the new stakeholders are invested, the action plan can begin. The following data will be collected each quarter (either beginning in the first or second quarter of the Fall of 2019):

- The frequency of blended learning modeling and/or co-teaching
- The frequency of blended learning rotation models designed by the course instructor
- The frequency of blended learning rotation models used the course instructor
- Semi-structured interviews at various intervals

At the end of the 2019-2020 academic year, the district Technology Instructional Specialist team should have 3-4 quarters worth of data to analyze. The quantitative data should be analyzed to determine if there are trends or correlations between the frequency a teacher experiences modeling and co-teaching and independently designing and implementing blended lessons. If there is a trend or correlation, is that information scaleable to determine if similar amounts of time and support are needed as the team plans to work with more teachers? After coding the qualitative data, the researchers hope to identify themes that need to improved upon or capitalized on to most effectively support teachers. Additional semesters of data may be required with a larger test group to determine if the themes are consistent or if they were unique to a specific content area or instructor.



* Click the image for a larger view of the timeline.

Develop an Action Plan

Once the data is collected and analyzed, the Technology Instructional Specialist team will determine if enough data has been collected to develop a plan that is scalable for a larger test group of teachers or if addition quarters of data should be collected. The information will be communicated with the new Innovative Learning Coordinator to determine the next steps. If a scalable plan is ready, the coordinator will help facilitate the communication regarding which grade levels, campuses or content areas will test the action plan. The district is piloting a 1:1 device initiative on 4 campuses in the Fall of 2019. The Technology Instructional Specialist team may suggest that both a 1:1 device campus and a campus with a lower device to student ration be included in the next steps. This will help the district to know if having 1:1 devices is the required ratio

for blended learning implementation or if campuses are successful with less, and if so, how much less?

Reflection

The action research aims to determine the quantity of modeling and co-teaching required to result in a teacher designing and implementing blended learning lessons independently and use that information to plan for time, resources, and support for other teachers as they begin their own blended learning journeys. What the various rotational models look like in each classroom can vary from grade level to grade level and content area to content area. A high school math teacher may get a few ideas from watching and working with an elementary Language Arts teacher, but likely would gain better insight and have more immediate ideas watching and working with another high school math teacher and/or someone who can dedicate time to help that teacher turn ideas into reality. By providing content specific support and active engagement opportunities to the IPET course instructor, the Technology Instructional Specialist team is hopeful to use the data to develop a plan to most efficiently support a larger cohort of classroom teachers.

Appendix A

Instructional Technology Team Modeling and Co-Teaching Log Google Form

Name of Instructional Technology Team Member:

Partnering Teacher Name:

Date:

Academic Quarter:

- 1st
- 2nd
- 3rd
- 4th

Modeling or Co-Teaching?

Interactions that led to the Modeling or Co-Teaching:

- Email
- Phone Call
- In Person Meetings
- Other:

Time spent on interactions:

Briefly describe the modeled or co-taught lesson:

Additional Notes/Reflections:

Appendix B

Teacher Self Report Google Form

Partnering Teacher Name:

Date:

Academic Quarter:

- 1st
- 2nd
- 3rd
- 4th

Lesson Plan File Upload

Was the blended lesson implemented as planned?

- Yes
- No

If yes, reflect upon the lesson. What was successful? Enjoyable? Needs work?

If no, what changes were made from the original plan or were there obstacles that prevented the implementation?

Appendix C

Semi-Structured Interview Questions:

- What during the modeling and co-teaching process was most helpful in planning to blended learning lessons to use in your course?
- When did you feel ready to implement blended learning lessons independently in your course?
- What else do you feel you need to be successful in blended learning design?
- How do you feel your blended learning lessons went?
- What evidence can you share to support how you feel it went?
- What would you change in future lesson designs with regards to blended learning rotations?

References

Crowe, A. (2019). Modeling blended learning to increase the use of blended learning. Retrieved from https://anncrowe6.wixsite.com/thecrowesnest/action-research-literature-review

Horn, M. B. & Staker, H. (2015). *Blended: Using disruptive innovation to improve schools*. San Francisco, CA: Jossey-Bass.

Mertler, C. A. (2016). *Action research: Improving schools and empowering educators (5th ed.).* Thousand Oaks, CA: SAGE Publications, Inc.