Program Evaluation: IXL Learning

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DESCRIPTION OF PROGRAM AND MAJOR COLLABORATORS 4

CLIENTS AND USERS 4

PROGRAM/ISSUE TO BE EVALUATED 4

PROGRAM GOALS, OBJECTIVES, AND OUTCOMES 4

Short-term outcomes. *5*

Intermediate outcomes. *5*

Long-term (1+ years of use). *5*

MAJOR COLLABORATORS AND STAKEHOLDERS 5

IXL Learning (Client) *5*

Elementary Teachers and Instructional Leads. *6*

IT Directors & Media Specialists. *6*

Students. *6*

School Leaders. *6*

PURPOSE OF EVALUATION 7

WHY A NEEDS ASSESSMENT 7

CENTRAL CONSTRUCTS 8

Instructional Challenges (Teacher Needs). *8*

Student Learning Barriers. *8*

Infrastructure and Support Needs. *9*

Perceived Value and Satisfaction. *9*

PROPOSED METHODOLOGY 10

PARTICIPANTS 10

DESIGN AND METHODOLOGY 11

Formative Needs Assessment Design: *11*

Rationale for Formative Approach: *12*

Mixed-Methods Data Collection: *12*

Phase 1: Teacher Survey. *12*

Phase 2: Interview. *13*

Phase 3: Individual Interviews. *14*

Maintaining Participant Communication *15*

PROPOSED EVALUATION AND ANALYSIS **15**

DISSEMINATION OF EVALUATION RESULTS **18**

ETHICAL AND PRACTICAL CONSIDERATIONS **19**

Potential Sources of Bias 19

Data Anonymity and Confidentiality Protocols 20

Voluntary Participation and Non-Coercion 21

Data Privacy and FERPA Compliance 21

Institutional Review Board (IRB) Approval 21

Stakeholder Buy-in and Participant Burden 22

Access Limitations 22

Timeline Constraints 23

Information Needs and Data Collection Procedures 23

Resources and Personnel Required 25

Timeline and Deliverables 26

DATA GATHERING TO DATE **28**

APPENDIX A: DRAFT DATA COLLECTION INSTRUMENTS **30**

APPENDIX B: LETTERS AND FORMS **31**

Appendix B.1: Invitation to Participate – Teachers 31

Appendix B.2: Invitation to Participate – Caregivers 33

Appendix B.3: Consent Form – Educators 35

Appendix B.4: Consent Form – Caregivers 39

Appendix B.5: Post-Study Follow-Up Letter – Educators 43

APPENDIX C: PROPOSED DATA COLLECTION SCHEDULE 45

APPENDIX D: PRELIMINARY LOGIC MODEL FOR IXL MATH PROGRAM EVALUATION 46

APPENDIX E: DRAFT DATA COLLECTION INSTRUMENTS (COLLABORATOR QUESTION SETS) 47

APPENDIX F: TEACHER SURVEY: NEEDS ASSESSMENT OF IXL'S K-6 MATH PLATFORM 49

Description of Program and Major Collaborators

Program Overview and Context

IXL Learning is a leading educational technology company founded in 1998 and recognized as one of the largest K-12 edtech companies globally. Headquartered in San Mateo, California, IXL's mission is, "At IXL Learning, we are passionate about improving learning for all. We apply technology in thoughtful and innovative ways to unlock learners' innate curiosity, creativity, and desire for knowledge" (IXL Learning, n.d.-a). The organization develops adaptive learning technologies that support instruction in mathematics, literacy, science, social studies, and language. Through its personalized learning platform, IXL provides real-time analytics, skills-based recommendations, and diagnostic tools that enable teachers to monitor progress and differentiate instruction according to individual student needs. In addition to the K-12 flagship platform, IXL Learning owns several well-known educational brands, including Rosetta Stone, Dictionary.com, and Teachers Pay Teachers (IXL Learning, n.d.-b)

Clients and Users

IXL's products serve a wide range of users, from individual learners at home to entire school districts. Typical clients for IXL's core platform are K-12 school districts, schools, and teachers, as well as some direct-to-consumer families/homeschoolers.

Program/Issue to be Evaluated

This evaluation will focus on IXL's implementation in K-6 mathematics classrooms. IXL offers an extensive math curriculum and analytics that promise to help teachers differentiate instruction and students master skills at their own pace.

Program Goals, Objectives, and Outcomes

The overarching goal of IXL is in its mission of "improving learning for all" through technology.

Short-term outcomes. Increased student practice at an individual pace, improved immediate performance in math as seen in IXL's *internal* diagnostics, greater student engagement and confidence in math, and teacher use of data to differentiate instruction.

Intermediate outcomes. Improved classroom instruction and intervention for a broad range of student ability levels. Students should show improved formative assessment results and growth on internal measures. Additionally, teacher attitudes towards using technology in math instruction should become more positive as benefits are seen.

Long-term (1+ years of use). IXL aims to contribute to higher student achievement in math measured through *external* metrics, such as standardized math tests. Another long-term outcome is narrowing achievement gaps through the individualized nature of IXL's learning processes. At scale, a successful outcome would be sustained adoption and integration of IXL into the school's curriculum. Finally, an important aspect is maintaining a culture of personalized learning in the school.

Our **draft logic model (Appendix D)** illustrates links between inputs (e.g., the IXL platform, devices), activities (students practicing skills, teachers reviewing reports), outputs (usage metrics), and outcomes (short-, mid-, long-term goals).

Major Collaborators and Stakeholders

There are several key stakeholders associated with IXL's implementation, each with distinct interests in the program and evaluation. Below are primary collaborators for our needs analysis.

IXL Learning (Client). As the client, IXL's product and research team want to know

how their program is performing. They are interested in evidence of effectiveness and feedback on challenges. IXL has requested that our evaluation focus on the *needs and experiences of teachers and students using IXL Math* to inform product development and customer support efforts.

Elementary Teachers and Instructional Leads. As primary users, teachers are essential for understanding instructional challenges, student engagement, and feasibility of adoption. They are in a crucial position for understanding the effectiveness of the program: teachers have instructional know-how; they are familiar with what IXL's programs are trying to do without having the blind spots that are common for those intimately familiar with its development; and they witness the student interactions with the platform and see the victories and frustrations. *The evaluation team has identified this group as a major resource in conducting an effective needs assessment*.

IT Directors & Media Specialists. Where teachers are keys to information about observed student experiences and common pain-points regarding product use, IT directors and media specials are key for observed teacher experiences and common pain-points regarding infrastructure, device access, and data-security.

Students. These direct users provide feedback on engagement, usability, and perceived learning value. They also provide performance data indicating the effectiveness of the platform as a learning tool. This assessment aims to reflect the student perspective as much as possible, as they represent the core stakeholder that drives sustained use and future adoption of the platform.

School Leaders. School and district leadership are often the decision-makers on the adoption of technology like IXL and the resources allocated to it. They are concerned with bigger-picture outcomes, such as external test scores and meeting target goals of student

engagement and performance.

Sample collaborator question sets are provided in **Appendix E** to illustrate how stakeholder perspectives may inform future stages of evaluation.

Purpose of Evaluation

The primary purpose of this evaluation is to conduct a Needs Assessment of IXL's K-6 Math platform to identify and explore the needs, gaps, and areas for improvement from the perspective of those using or supporting the platform. This type of evaluation is *formative* in nature, intending to inform program improvement and decision-making rather than making a summative judgment about the program's effectiveness (Alkin, et al., 2025). This study will be a formative, process-oriented needs assessment that seeks to understand the gaps between desired outcomes and the current state of the platform.

Why a Needs Assessment

By conducting a needs assessment, the researchers aim to answer the overarching question: "What needs must be met for IXL's elementary math platform to effectively support teaching and learning?" In doing so, the researchers will illuminate challenges and requirements that, if addressed, could enhance the program's success. IXL's elementary math program is widely used, but its impact can vary depending on how well it fits the needs of teachers and students in real classrooms. A needs assessment is necessary to ensure that the platform is aligned with its end-users' requirements and to guide any adjustments or support needed for optimal implementation. While IXL is a well-established company, IXL Learning seeks to determine end-user needs, infrastructure barriers, and perceived value of the platform. IXL's product team, in collaboration with a partner school district interested in maximizing the platform's benefits, requested a thorough look at the needs of the program. The findings will

benefit multiple parties: IXL Learning will receive actionable feedback to improve their product and support services; teachers and students will benefit as the program becomes better tailored to their needs; and school/district leaders will gain clarity on what is required to successfully integrate IXL into the classroom.

Central Constructs

Instructional Challenges (Teacher Needs). The difficulties or pain points that elementary teachers face in delivering math instruction. These challenges include differentiating instruction for diverse learners, keeping students engaged, addressing knowledge gaps, and managing time for individualized feedback. By pinpointing these challenges, the researchers identify needs that a platform like IXL should address.

Evaluation Questions:

What are the biggest challenges K-6 teachers face in math instruction?

To what extent do these teachers perceive that an online platform like IXL could help address those challenges?

Student Learning Barriers. The obstacles that K-6 students encounter in learning math. These may be cognitive (e.g., difficulty understanding concepts), attitude-based (e.g., math anxiety or motivation level), or related to the learning environment (e.g., lack of practice opportunities or limited home support). Understanding these barriers from both teacher and student perspectives will reveal the needs that must be met for students to succeed. In this evaluation, the researchers will explore how and whether IXL currently helps address these barriers and what gaps remain.

Evaluation Questions:

What learning gaps or barriers do K-6 students experience in math?

How might an adaptive platform assist in overcoming these barriers?

Infrastructure and Support Needs. The technological and organizational resources required to implement IXL effectively. This construct covers technological infrastructure (e.g., availability of devices, reliable internet) and capacity (e.g., teacher training, tech support). Identifying these needs will inform the supports or resources the school or IXL must provide for learner success. In short, what environmental factors need to be in place for IXL to work as intended?

Evaluation Question:

What technological and infrastructural factors affect the implementation of IXL in elementary classrooms?

What needs or improvements are required in these areas?

Perceived Value and Satisfaction. How end-users (teachers, students, parents, administrators) perceive the value of the IXL math platform. This includes satisfaction with the platform's features and content, belief in its usefulness for learning, and willingness to use the product. For teachers, perceived value may involve whether they believe IXL saves time or improves student outcomes. For students, it may be whether IXL makes learning more enjoyable or easier to understand. This is an important construct in this needs assessment because if end-users do not see value in the program, there is a deficit in program effectiveness or better communication/training is needed.

Evaluation Question:

How do teachers and students perceive the value of IXL's math platform for teaching and learning?

What factors influence their willingness to adopt or continue using it?

Proposed Methodology

To address the evaluation questions above, the researchers will use a mixed-methods design that combines quantitative surveys with qualitative interviews and focus groups. The design is descriptive and cross-sectional, examining the current state of current needs and perceptions.

Participants

The primary participants in this needs assessment will be K-6 teachers in Hamilton, Marion, and Sequatchie counties in Tennessee (Chattanooga region). Within these districts, the initial focus is on classrooms serving students who have Individualized Education Plans (IEPs) or Individualized Learning Plans (ILPs) in math skills development. Teacher participants will be recruited via their district-provided email addresses, receiving an invitation that outlines the evaluation's purpose and what participation entails. IXL Learning will provide the researchers with email addresses of teachers and administrators. IXL Learning will obtain explicit consent for each of the three included school districts to share these email addresses, and the research team will only use these email addresses for the initial invitation. Follow-up emails will only be sent to those teachers and administrators who have agreed to participate and those who specifically request additional email communication (e.g., a teacher cannot find the initial email and requests it to be re-sent). If a teacher does not respond to the initial email invitation, a follow-up invitation letter will be mailed to the school's physical address. This letter will provide instructions on how to contact the evaluation team (by email or telephone) to either consent or decline participation. Once a teacher confirms interest and consent (see Appendix B for the consent form), the evaluation team will supply additional details on how data will be collected and what is expected of participants.

Teachers constitute the primary data source and are the only group from whom data would realistically be collected if the plan were implemented within the timeframe. However, the design intentionally anticipates future phases of evaluation that could include additional stakeholder groups (e.g., students, caregivers, administrators, IT staff). Draft instruments for these groups are included in the appendices to illustrate how the evaluation might expand in scope beyond this initial teacher-focused needs assessment.

Participants in this needs assessment are drawn from a cluster sample of the three counties mentioned above, selected to be broadly representative of the region's K-6 educational context. To encourage participation, each teacher who completes the evaluation process will receive a $25 gift card (their choice of Amazon or Barnes & Noble) as a token of appreciation. The delivery method for this incentive is flexible based on the participant's preference: the gift card can be sent electronically via email or delivered as a physical card via mail upon completion of the survey questionnaire.

Design and Methodology

Formative Needs Assessment Design: This project is a formative needs assessment of IXL's K-6 Math platform. The evaluation is designed to examine how the platform currently operates in the classroom setting, how stakeholders experience it, and where gaps exist between the current state and the desired outcomes for math learning. The emphasis on *formative* evaluation means that the focus is on gathering insights that can be used for immediate program improvement rather than on delivering judgment on the platform's success. The purpose of this evaluation is to identify the IXL platform's strengths, uncover any weaknesses or pain points, and understand user needs to fill gaps in effectiveness. By doing so, the evaluation can inform targeted enhancements or support strategies to better align the platform with classroom needs.

Rationale for Formative Approach: The rationale for choosing a formative evaluation design is grounded in the goal of continuous improvement. Since the intention is to refine the IXL math platform and its implementation strategy, a formative approach is most suitable. Such an approach allows the evaluators to collect and analyze feedback in real time and make iterative recommendations. This aligns with best practices in program development, where early feedback loops can significantly enhance the final implementation.

Mixed-Methods Data Collection: To achieve a comprehensive understanding of the situation, the evaluation employs a mixed-methods data collection strategy. There will be an initial quantitative phase followed by qualitative phases, allowing the team to capture both broad patterns and in-depth insights:

Phase 1: Teacher Survey. Upon obtaining consent, each participating teacher will complete an initial structured questionnaire. This survey is organized into four parts, each targeting a specific domain of interest:

- **Instructional Challenges –** Identifying what difficulties teachers face in math instruction, especially with diverse learning needs.
- **Student Assessment, Progress, and Understanding –** Gathering information on how teachers assess student progress in math and how well students demonstrate understanding, including how IXL's tools might assist or fall short.
- **Tech Support, Training, and Professional Development –** Understanding the level of technical support and training teachers have (or need) for using IXL, and any professional development gaps.

- **Perceived Value and Willingness to Adopt –** Capturing teachers' overall impressions of the IXL platform's usefulness and their openness to integrating it into their regular classroom practice.

The survey mostly consists of fixed-choice questions (e.g., Likert-scale items, checklists of challenges or resources) so that the responses can be quantified and compared across participants. Teachers will be able to complete this survey electronically via an online form. Alternative options will be available as needed. The survey is designed to take 15-20 minutes to encourage full participation. **Appendix F** contains the full text of the Teacher Survey Questionnaire.

Phase 2: Interview. After the two-week survey window concludes and responses are compiled, the evaluation team will organize focus group sessions. These focus groups serve as a qualitative follow-up to the survey, allowing teachers to discuss and elaborate on their experiences in a collegial setting. Participants who completed the survey will be invited to join a focus group at a convenient time and a neutral location (for example, a public library meeting room centrally located for the county's teachers). Each focus group will be facilitated by one of the principal evaluators, with another team member present to take notes and observe. A semi-structured discussion guide (see **Appendix A** for proposed Focus Group Questions) will be used to ensure that key topics from the survey are explored in depth. Topics include specific challenges in using the platform, support needs, and success stories or concerns. Teachers will be encouraged to share both positive experiences and frustrations. The group setting allows participants not only to voice their own perspectives but also to react to and build upon the comments of their peers, potentially surfacing consensus on common issues or illuminating how experiences might differ between schools or districts. Each focus group session will be audio-

recorded (with prior permission from all participants) to ensure accuracy of the information captured. These recordings will later be transcribed verbatim by a professional transcription service bound by confidentiality agreements. The resulting transcripts will be stored securely (e.g., in a password-protected file on the evaluation team's secure drive) for subsequent analysis.

Phase 3: Individual Interviews. Following the focus groups, the evaluators will conduct one-on-one interviews with willing participants. Not every teacher may be interviewed individually; rather, this phase is intended to dive deeper with a select group of teachers or to follow up on issues that emerged during the focus groups or surveys. Teachers will be invited to volunteer for a personal interview, and the team will strive to include at least a few teachers from each district (Hamilton, Marion, Sequatchie) to capture any district-level nuances. Interviews will be scheduled at a time convenient for the teacher and can take place either on the school campus (if permitted and convenient) or at a neutral location such as a quiet café or library room. In cases where in-person meetings are not feasible, an interview may be conducted via a video conferencing tool or telephone as a backup. The interview format will be semi-structured: the evaluators will use a predefined set of open-ended questions (see **Appendix A** for Individual Interview Questions) to guide the conversation, but they will also probe further based on the interviewee's responses. These interviews provide an opportunity for teachers to express thoughts they might not have been comfortable sharing in a group, or to go into detail on specific experiences with IXL's math platform and their students' learning needs. As with the focus groups, the interviews will be audio-recorded with consent. The recordings will be transcribed and stored securely for analysis. After completing the interview, each participant will receive a thank-you communication (via email) from the evaluation team, which will also outline the procedure for them to receive their incentive if they haven't already (e.g., confirming whether

they prefer the $25 gift card by email or physical mail).

By employing this multi-phase, mixed-methods approach, the evaluation will obtain both quantitative metrics (from the surveys, such as the percentage of teachers who feel adequately trained to use IXL, etc.) and qualitative insights (from the focus group and interview narratives). This design ensures that we capture a broad overview of needs and patterns across the districts, as well as the context and nuance behind those numbers. It is especially suited to a formative evaluation, where understanding *why* certain challenges occur is just as important as identifying *what* the challenges are.

Maintaining Participant Communication. Throughout all phases, the evaluation team will maintain regular communication with participants to keep them informed. For example, after a teacher submits a survey, a short acknowledgment email will be sent to thank them and to let them know the upcoming steps (such as the expected timing of focus groups). Prior to focus groups and interviews, reminder emails or calls will be made to ensure participants remember their scheduled sessions. The team will also be attentive to any questions or issues participants raise, responding promptly to emails or phone calls. If a participant decides to withdraw at any point, the team will graciously thank them for their time and ensure they are not contacted further, and their data will be handled according to the consent agreement (e.g., omitted from analysis if that was the condition of withdrawal).

Proposed Evaluation and Analysis

Once data collection is complete, the evaluation team will systematically organize and analyze the information using a combination of quantitative and qualitative analytical techniques, informed by a grounded theory approach (Bryant & Charmaz, 2007). The analysis will proceed in the following manner:

Quantitative Data (Survey Responses): The multiple-choice and fixed-response data from the teacher surveys will be aggregated and examined for overall trends. The team will use software tools (e.g., Excel, SPSS, Dedoose) to manage the data. Dedoose is a secure, cloud-based application that supports mixed-methods research and meets rigorous standards for data protection. Using Dedoose (or a similar tool), evaluators will assign codes or tags to survey items as needed and run descriptive statistics (e.g., frequencies, percentages, mean ratings for Likert-scale items) to summarize the teachers' needs and perceptions. For instance, the percentage of teachers who report a lack of adequate training for IXL can be calculated, or average confidence levels in using the platform can be determined. If sample sizes permit, comparisons may be made across the three districts (Hamilton vs. Marion vs. Sequatchie) to see if certain needs are more pronounced in one county than another. The quantitative results will be visualized using charts or tables for clarity, which will later be included in the final report to stakeholders.

Qualitative Data (Focus Groups and Interviews): The narrative data obtained from focus group transcripts and interview transcripts will undergo a coding and thematic analysis consistent with grounded theory methodology (Bryant & Charmaz, 2007). Initially, evaluators will read all transcripts to get a holistic sense of the discussions. During a second, more detailed read, they will perform open coding to annotate the text with labels that identify key ideas, issues, or sentiments expressed by the teachers. For example, a statement like "I feel the training wasn't enough to get me comfortable with the software" might be coded as "insufficient training" or "teacher not comfortable with platform." After open coding is complete, the team will engage in selective coding to focus on the most salient categories that emerge. This involves looking across all the initial codes to identify major themes and subthemes. Some anticipated themes might include *Professional Development Needs*, *Student Engagement Challenges*,

Technical Difficulties, *Positive Outcomes/Success Stories*, and *Suggestions for Improvement*, although the team will remain open to unexpected themes that arise from the data.

Throughout this process, the evaluators will use Dedoose or a similar qualitative analysis tool to organize the codes and excerpts. One advantage of using a dedicated tool is that it allows the team to easily retrieve all excerpts related to a particular code (e.g., all comments related to "technical issues") and compare how often or in what context that code appears in different data sources and across different counties. Data security for these qualitative materials is also ensured through the analysis platform's encrypted storage and controlled access (only the evaluation team will have access to the project in the software).

Integrating Quantitative and Qualitative Findings: After identifying the major themes from the qualitative data and key patterns in the quantitative data, the evaluation team will integrate these findings to form a coherent overall picture. This involves comparing what was learned from the surveys with what was expressed in focus groups and interviews. For instance, if quantitatively a large proportion of teachers indicate low confidence in using IXL's analytics features, the qualitative data might reveal reasons. The analysis will pay special attention to such relationships. In line with grounded theory, evaluators will be looking for a central storyline or explanation that connects the various themes. An example might be: *"Teachers who lack sufficient professional development tend to have lower confidence in implementing IXL's features, which in turn correlates with lower perceived student engagement."* If evidence for such a connection appears, the team will document it thoroughly, noting which data support it. The analysis will also account for divergent cases or contradictions. It is possible that not all teachers share the same experiences or views of the IXL platform. The evaluators will actively

seek out and examine these outliers or contradictory responses. These differences will be captured in the analysis so that recommendations can be appropriately nuanced.

Organizing Results by Context: Given that data is collected from three different county school districts, the evaluators will also organize some findings by district to see if there are location-specific trends. However, common themes that persist across all districts (e.g., a need for more training, or features of the platform that everyone likes) will be emphasized as broadly relevant findings.

Throughout the analysis phase, the evaluation team will hold regular meetings to discuss emerging findings and ensure that the coding process is consistent. They may use techniques such as intercoder reliability checks (where multiple evaluators code the same portion of a transcript and then compare and harmonize their coding) to enhance the rigor of the qualitative analysis. By the end of this phase, the team will have a set of well-substantiated findings that relate to the evaluation questions and the overall purpose of improving the IXL K–6 Math platform.

Dissemination of Evaluation Results

After completing the analysis, the principal evaluators will compile a comprehensive evaluation report that details the entire process and findings. This report will include sections such as an executive summary, background and context, methodology, findings (with sub-sections for survey results, focus group themes, and interview insights), conclusions, and actionable recommendations for the IXL platform and its implementation in elementary math education. All participant data will be reported in aggregate or anonymously (as per the ethical protocols), and direct quotes from teachers will be included only with coded identifiers. Any figures, tables, or charts that help illustrate the findings (for example, a bar graph showing the

percentage of teachers citing each type of challenge) will be incorporated to make the results clear and accessible.

Once the report is prepared, the evaluation team will present the results to key stakeholders in IXL's Elementary Learning division. This presentation will be done in a formal meeting or via online seminar. During the presentation, the evaluators will walk the stakeholders through the major findings, explaining the significance of each and how it relates to the usage and effectiveness of the IXL platform. They will highlight strengths of the platform and needs and gaps. Evaluators will offer evidence-based recommendations. For example, if many teachers reported difficulties in interpreting student progress data on IXL, a recommendation might be to develop a targeted training module or an improved dashboard feature. The stakeholders will be given the opportunity to ask questions and discuss the findings with the evaluators, ensuring clarity and facilitating a dialogue on potential next steps. The evaluators will also provide a written executive summary that the stakeholders can easily share with others in the organization or refer to when making decisions.

Ethical and Practical Considerations

Potential Sources of Bias

In designing the evaluation, several potential conflicts of interest or biases have been considered. For example, some teacher participants might have prior connections to the educational curriculum or technology industry that could influence their feedback. A teacher who is a former employee of a curriculum development firm may have pre-formed opinions about digital learning tools, potentially biasing their responses. Similarly, a participant whose spouse or partner works for an educational software or curriculum company could have their perspectives inadvertently shaped by those affiliations. Additionally, any teacher currently doing

consulting or content development work for an educational technology firm (other than IXL) might show partiality in their responses. Even recent experience using a different personalized learning platform could color a participant's views on IXL. Acknowledging these possibilities upfront is important so that the evaluation team can interpret the data with appropriate caution and, if necessary, ask follow-up questions to clarify responses that might be influenced by these factors.

Data Anonymity and Confidentiality Protocols

To protect the rights and privacy of all participants, the evaluation will adhere to strict ethical protocols in data collection and reporting. Participants will not be personally identified in any reports or discussions; all data will be de-identified using codes rather than real names or school identifiers. For instance, each teacher's responses might be labeled with an arbitrary code (e.g., "Teacher 1, County A") for analysis purposes. Any direct quotes or specific examples derived from open-ended responses will be anonymized and referenced only by these codes in the evaluation report.

All collected data will be stored securely. Digital data (survey results, email communications, transcribed notes) will be stored in a dedicated, access-controlled account or database that only the evaluation team can access. This account will have two-factor authentication enabled to add an extra layer of security. Any information initially collected on paper (for example, if a participant opts to fill out a paper survey or if notes are taken by hand during focus groups) will be kept in a locked filing cabinet in a secure office until it is digitized. The room housing the cabinet will have a deadbolt lock to prevent unauthorized access. Once paper-based data are transferred to a secure electronic format, the physical copies will be shredded or otherwise destroyed to prevent any unintended disclosure.

Voluntary Participation and Non-Coercion

It will be clearly communicated to all potential participants that their involvement in this evaluation is completely voluntary. Teachers will be informed in the invitation and again in the consent process that they are under no obligation to participate and may decline without any negative consequences. Whether a teacher chooses to participate or not will have no effect on their employment status, performance evaluations, or access to school resources. Participation (or non-participation) will not influence their students' grades or any services the students receive. This assurance is intended to alleviate concerns and reduce any perceived pressure; the goal is to encourage honest and unbiased participation by ensuring that teachers understand there is no professional or personal risk in providing candid feedback.

These ethical safeguards align with professional expectations for program evaluation and institutional review processes. They also provide the foundation for more applied ethical and practical considerations discussed in the next section.

Data Privacy and FERPA Compliance

All data collection involving teachers or student-related information will adhere to FERPA and district-level privacy policies. Teacher surveys will be configured to avoid collecting personally identifying information, and any mention of student data will refer to aggregated or de-identified information only. If access to usage reports or outcome data is granted, those data will be managed in accordance with district agreements and stored securely.

Institutional Review Board (IRB) Approval

Prior to any recruitment or data collection, this evaluation will be submitted to the University of Tennessee, Knoxville Institutional Review Board (IRB) for review. Because the project involves gathering information from educators about their professional practice and,

potentially, de-identified student data, it is expected to qualify for exempt or expedited review as minimal-risk educational research. No invitations will be sent, consent forms distributed, or data accessed until IRB approval or a formal determination of exemption has been obtained.

In addition to IRB review, the evaluation team will comply with any research approval processes required by participating districts and schools. Any substantial modifications to instruments or procedures that could affect participant risk will be submitted to the IRB and relevant district offices for approval prior to implementation. Modifications that increase participant risk or substantially alter the feasibility or design of the evaluation may, if necessary, prompt the research team to identify an alternative sample. All activities will be conducted in accordance with the final approved protocol.

Stakeholder Buy-in and Participant Burden

Teachers often face significant time pressures and may initially view evaluation activities as “one more thing” added to their workload. Clear communication about the purpose of the study, the approximate time commitments for each phase, and the potential benefits will be essential to securing meaningful participation. Incentives and flexible participation options are included to reduce burden.

Access Limitations

Variability in how districts and schools currently use IXL will influence both the sampling frame and the interpretation of findings. Some schools may have robust implementations and rich usage data, while others are just beginning or use the platform more sporadically. The evaluation design anticipates these differences by a) collecting contextual information about local implementation and b) avoiding over-generalization from limited subsamples.

Timeline Constraints

The school calendar and project calendar may not fully align. Testing windows, holidays, and report-card periods may coincide with planned data-collection phases. To address this, the proposed timeline is intentionally conservative, and the plan differentiates between what is feasible within the semester and what could be implemented later.

Ethical procedures will include obtaining informed consent, anonymizing data in reporting, and maintaining transparent communication with participants throughout evaluation. These safeguards uphold professional evaluation standards emphasizing transparency, fairness, and respect for participants. A sample consent statement is included in **Appendix B**.

Information Needs and Data Collection Procedures

Although IXL Learning publishes extensive product research and performance reports, several key questions remain for the evaluation team. Clarifying these questions with IXL and the partner district will help ensure that the evaluation design is realistic and that the instruments are contextually valid. In particular, the team needs additional information on:

- Collaboration and approval processes
    - What is the formal communication structure for this research collaboration?
    - Who must approve each stage of the assessment (e.g., survey content, access to usage data) before moving forward?
- Data access and governance
    - What are the protocols for accessing proprietary usage data and analytics from the IXL platform?
    - Under what conditions, if any, can de-identified usage data be shared with the evaluation team?

- Prior evaluations and internal reviews
    - Has IXL previously commissioned formal program evaluations or internal implementation reviews for the K-6 math platform? If so, what were the main findings, and how did those findings inform subsequent product updates or support?
- Outcomes and demographic data
    - What outcomes data (e.g., benchmark scores, growth metrics) are already available from partner districts?
    - To what extent are these outcomes linked to student demographic characteristics, school-level factors, and patterns of IXL usage?
- Funding and partnerships
    - Beyond customer fees, what funding streams, grants, or donor partnerships support IXL implementations in districts? Are there particular accountability expectations attached to any of these partnerships?

Obtaining answers to these questions will allow the evaluation team to refine data-collection plans, avoid duplicating existing efforts, and design instruments that complement IXL's internal analytics rather than compete with them.

Consistent with the mixed-methods design, data collection is organized into three phases. Phase 1 (teacher survey) constitutes the core of the feasible data-collection plan in the current model. Phases 2 and 3 are recommended for extensions for fuller implementation. A table with the overall data collection process can be found in **Appendix C**.

Alternative formats (e.g., Zoom, paper surveys, phone interviews) may be used when necessary, depending on participant's availability and preferences. All instruments will undergo

basic pilot testing for clarity and alignment with evaluation questions before use. Preliminary research conducted for this proposal, including review of publicly available reports and independent dissertations, provides the foundational evidence base on which this data-collection plan builds.

Resources and Personnel Required

Implementing this evaluation as designed will require a modest but clearly defined set of resources and personnel:

- **Software and tools:**
    - Survey platform (Qualtrics) configured to protect participant privacy.
    - Spreadsheet and statistical tools (Excel, SPSS) for managing and analyzing quantitative data.
    - Qualitative analysis software (Dedoose) for coding and organizing focus group and interview transcripts.
- **Materials**
    - Finalized survey instruments, focus group protocols, and interview guides (**Appendix A)**.
    - Recruitment materials, including email invitations, letters of introduction, and consent forms **(Appendix B)**.
    - Access to relevant IXL usage reports and district-provided contextual information.
- **Personnel**
    - A small evaluation team responsible for design, data collection, analysis, and reporting.

  - A school or district liaison in each participating district to facilitate communication with principals and teachers and to support logistical coordination.
  - A data specialist or analyst to manage data cleaning, integration of multiple sources, and preparation of figures/tables.

- **Information and contextual data**
  - Demographic profiles of participating schools.
  - Existing IXL training materials or professional development resources used by the districts.
  - District policies related to technology use, data-sharing, and instructional expectations in mathematics.

Timeline and Deliverables

The proposed timeline below reflects a realistic sequencing of major tasks within a typical semester, recognizing that the teacher survey is the most feasible component to fully implement during the course.

- Preliminary research and proposal development: Oct 1-13
  - Review existing IXL research.
  - Clarify information needs with IXL and district contacts.
  - Draft the evaluation plan and secure course-level approval.
- Instrument development and pilot testing: Oct 14-21
  - Develop the teacher survey, focus group protocols, and interview guides, aligning them with the central constructs.
  - Conduct informal pilot testing to check clarity and approximate completion time.

    - Revise items based on feedback.
- Teacher survey administration: Oct 22-Nov 4
    - Obtain any necessary district or school approvals.
    - Distribute the survey to consenting teachers and send reminders during the two-week window.
    - Close the survey and export de-identified response data for analysis.
- Qualitative data collection: Nov 5-Nov 18
    - If time and approvals permit, conduct focus groups and/or individual interviews with a subset of teacher participants.
    - Arrange for transcription of audio recordings and organize transcripts for analysis.
- Data analysis and report drafting: Nov 7-20
    - Conduct descriptive analyses of survey data and initial coding of qualitative data.
    - Integrate findings around the central constructs.
    - Draft a comprehensive evaluation report, including an executive summary and recommendations.
- Final report and presentation: Nov 25-30
    - Revise the report based on feedback from the instructor and peers.
    - Prepare a concise presentation for IXL and/or course stakeholders summarizing the evaluation questions, methods, key findings, and recommendations.

A more detailed, phase-by-phase data-collection schedule is provided in **Appendix C**.

Data Gathering to Date

To inform the design of this needs assessment, the evaluation team has begun by reviewing existing evidence related to IXL's impact and implementation. This work has focused on:

- IXL's ESSA-aligned effectiveness materials and internal research summaries to understand how the company currently documents impact and to identify the main outcome measures emphasized in existing studies.
- Three recent dissertations (Carter, 2024; Guest, 2024; Thompson, 2022) were examined to explore how adaptive math software and artificial intelligence tools are being studied in K-12 contexts. These studies informed expectations about the kinds of outcomes, teacher experiences, and implementation challenges that may be relevant for IXL.
- The team reviewed IXL's public-facing materials to clarify how the platform is positioned to support teachers and students.

This early data gathering has helped the evaluation team identify potential gaps between existing evidence and the questions that matter most to teachers. The planned needs assessment is designed to complement, rather than duplicate, the existing body of IXL-focused research.

References

Alkin, M. C., Vo, A. T., & Christie, C. A. (2025). *Evaluation essentials: From A to Z* (3rd ed.). The Guilford Press.

Carter, B. (2024). *A qualitative collective case study: Exploring the impact of adaptive mathematics software on instruction in the elementary math classroom* (Publication No. 31768267) [Doctoral dissertation, Drexel University]. ProQuest Dissertations & Theses Global.

Guest, M., Jr. (2024). *Exploring the use of artificial intelligence as an instructional learning tool in middle school mathematics classrooms* (Publication No. 31638698) [Doctoral dissertation, Arkansas State University]. ProQuest Dissertations & Theses Global.

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Thompson, L. B. (2022). *A phenomenological qualitative study on successful algebra teachers' perceptions of the implementation and use of IXL* (Publication No. 29321833) [Doctoral dissertation, Valdosta State University]. ProQuest Dissertations & Theses Global.

Students acknowledge the use of ChatGPT, an AI platform owned by OpenAI, in preparation of this assignment. This platform was used in the following ways: Combining sections completed by multiple researchers and revising content for clarity.

Appendix A: Draft Data Collection Instruments

Sample Survey Items (Teachers & Administrators)

1. How confident do you feel using digital learning tools to support math instruction? (1 = Not confident, 5 = Very confident)
2. How often do you use IXL for math practice or instruction?
3. What are the biggest challenges you face when integrating IXL or similar platforms into your lessons?
4. To what extent do you believe adaptive learning technology improves student engagement?
5. What professional development or support would help you use IXL more effectively?

Sample Focus Group Questions (Teachers)

1. What aspects of IXL work best in your classroom and why?
2. What barriers have you encountered when implementing IXL or other adaptive platforms?
3. How do your students respond to adaptive feedback and practice in math?
4. What training or resources would increase your confidence in using IXL?

Sample Interview Questions (Administrators or Technology Coordinators)

1. How is IXL currently supported within your school or district infrastructure?
2. What data or indicators do you use to evaluate technology integration success?
3. How might teachers' feedback influence future decisions about IXL adoption?

Appendix B: Letters and Forms

Appendix B.1: Invitation to Participate – Teachers

Dear [Teacher's Name],

We are reaching out to invite you to participate in an important study aimed at improving the IXL K-6 Math platform. As an educator in the community, your unique perspective and experience are invaluable to our understanding of how well this platform supports students, especially those with Individualized Learning Plans (ILPs) in math skills development.

This study will conduct a needs assessment to identify any gaps, challenges, or areas for improvement in the platform's functionality and impact. Your feedback will help ensure that future enhancements to the platform better meet the needs of students, particularly those with varying learning needs.

Your participation in this study will involve sharing your experiences with the IXL Math platform through surveys, interviews, or other data collection methods. We want to emphasize that this is a **voluntary** process, and your involvement will be completely confidential. The insights you provide will play a crucial role in shaping improvements to the program, but your participation will not affect your employment, grades, or access to school resources in any way. We genuinely believe that your contributions will make a significant difference in the continued development of tools that aim to support all students in their learning journeys. Your perspective as a teacher, especially in classrooms where students are working with individualized learning plans, will be instrumental in identifying what's working well and where IXL can do better.

If you choose to participate, we will provide you with a consent form with more details about the study and how your data will be managed. Should you have any questions about the study or your involvement, please feel free to contact us directly at IXLEvaluationTN@Gmail.com or 865-974-1000.

Thank you so much for considering this opportunity to help shape the future of educational tools for students in this community. Your voice and expertise are incredibly important, and we greatly appreciate your time and insight.

Please reply to this email in the next two weeks if you would like to participate!

Warm regards,

Brandi Berland, principal evaluator

Mary Campbell Harris, principal evaluator

Andrew Rosbury, principal evaluator

Ramo Stott, principal evaluator

The IXL TN Evaluation Team

Appendix B.2: Invitation to Participate – Caregivers

Dear Parent/Guardian,

We're writing to let you know about a new opportunity connected to your child's math learning.

Our team is doing a study to learn more about how the IXL K-6 Math program is working for students. This is the online program your child already uses in class for math practice. We are especially interested in how well it supports students who are ahead in math, receive extra help, or who have an Individualized Education Plan (IEP).

What is the study about?

Our goal is to understand:

- How well IXL helps students build their math skills.
- How well it supports students with IEPs or are at different skill levels in math.
- How the program can be improved to better support all learners.

To do this, we will look at information from teachers and students about their IXL experience.

What will my child do?

If you give permission, your child will:

- Use IXL as part of their regular math work (like they already do), and
- May be asked to share brief feedback about their experience through a short survey.

We will not ask your child to do anything that will take a lot of extra time or interfere with normal class activities. Surveys will be administered by teachers or school administration, not by the researchers. The attached consent form includes additional details about the study.

Voluntary Participation

- You may choose whether your child participates.
- Your child can stop participating at any time.
- Saying "no" or stopping later **will not** affect your child's grades, classroom experience, or access to any school resources.

Thank you for your time and for supporting your child's learning. Your feedback and your child's experiences can help guide the effectiveness and use of educational tools and improve the educational experience of all students. If you would like to discuss your child's participation, please contact our team at IXLEvaluationTN@gmail.com or **865-974-1000**.

Warm regards,

Brandi Berland, principal evaluator

Mary Campbell Harris, principal evaluator

Andrew Rosbury, principal evaluator

Ramo Stott, principal evaluator

The IXL TN Evaluation Team

IXLEvaluationTN@Gmail.com

Phone: 865-974-1000

Appendix B.3: Consent Form – Educators

IXL Learning Needs Assessment of K-6 Math Platform

Educator Consent Form

Project Title: Needs Assessment of IXL's K-6 Math Platform to Identify Gaps, Needs, and Areas for Improvement

Principal Investigators: Brandi Berland, Mary Campbell Harris, Andrew Rosbury, & Ramo Stott

Contact Information: IXLEvaluationTN@Gmail.com or 865-974-1000.

Purpose of the Study

This study aims to conduct a formative needs assessment to explore the gaps, needs, and areas for improvement in the use of IXL's K-6 Math platform. We will gather feedback from educators in Hamilton, Marion, and Sequatchie Counties, focusing on teachers whose students have individualized learning plans (ILPs) for math development. The goal is to understand how well the platform supports students' learning needs and to inform future improvements.

Participation Requirements

By agreeing to participate, you will be asked to complete surveys, participate in interviews, or engage in other forms of data collection that may provide insights into your experience using the

IXL Math platform in the classroom. Your participation will contribute to a broader understanding of how the platform meets the needs of students, particularly those with ILPs.

Voluntary Participation

Participation in this study is **completely voluntary!** You are under no obligation to participate, and your decision to participate or not participate will not affect your employment or access to school resources in any way.

You are free to withdraw your participation at any time without any penalty or loss of incentive to which you are otherwise entitled. If you choose to withdraw, your data will not be included in the study.

Confidentiality and Privacy

Your responses will be kept confidential. The data collected will be used solely for research purposes related to this evaluation. Your identity will not be shared with any third parties, and any identifying information will be removed or anonymized before analysis and reporting. Your responses to survey questions will be assigned a code name in the form of a Letter and Number for organization purposes.

Potential Risks and Benefits

There are no anticipated risks associated with your participation in this study. Your feedback will provide valuable insights into how IXL's Math platform can be improved to better support both students and educators. However, please be aware that there may be slight discomfort when

discussing challenges or gaps in the platform's current usage, though all information provided will be managed sensitively and respectfully.

Compensation

Participants in the evaluation will be offered a gift card in the amount of $25 to either Amazon or Barnes & Noble. Incentives will either be emailed to participants' email address or mailed to the participant upon completion and submission of questionnaire to evaluators.

Consent to Participate

Please print your name, sign your name, and provide the current date and send the attached PDF document to the email address provided below.

By signing below, you are indicating that you have read and understood the information above, and that you voluntarily agree to participate in this study. You will be provided with a copy of this consent form for your records.

I have read and understood the information presented above and voluntarily consent to participate in the study.

Participant Name (Printed): _____

Participant Signature: _____

Date: _____

Contact Information

If you have any questions about this study or would like additional information before or after participating, please reply to this email or contact:

IXL TN Evaluation Team

IXLEvaluationTN@Gmail.com

Phone: 865-974-1000

Appendix B.4: Consent Form – Caregivers

IXL Learning Needs Assessment of K-6 Math Platform

Caregiver Consent Form

Project Title: Needs Assessment of IXL's K-6 Math Platform for Identifying Gaps, Needs, and Areas for Improvement

Principal Investigators: Brandi Berland, Mary Campbell Harris, Andrew Rosbury, & Ramo Stott

Contact Information: IXLEvaluationTN@Gmail.com, Phone: 865-974-1000.

Institution: IXL Learning

Date:

Introduction and Purpose of the Study

We are conducting a **Needs Assessment** to explore how the IXL K-6 Math platform meets the needs of students, with a particular focus on those with Individualized Learning Plans (ILPs) in math skills. The purpose of this evaluation is to identify strengths, gaps, and areas for improvement within the platform to ensure it effectively supports all students' learning, including those with specific learning needs.

We would like your student(s) to be involved and participate in this study, which involves gathering feedback about their experience using the IXL platform as part of their math curriculum. This feedback will help improve the platform's design and functionality.

What Will My Student Be Asked to Do?

If you consent to your students' participation, the following activities will be involved:

- **Use of IXL Math Platform**: Your student will continue to use the IXL platform as part of their regular math activities.
- **Data Collection**: We will collect data on your student's use of the platform and their performance, including feedback from your student about their experience using the platform (through brief surveys, interviews, or classroom activities).

Participation in this study is designed to be a low-burden experience for your student and will not interfere with their normal learning activities during instruction.

Voluntary Participation

Please know that your student's participation in this study is **completely voluntary**. Your student's participation will not affect their grades, classroom experience, or access to school resources in any way. Your student may withdraw from the study at any time without any penalty or negative consequences. Your decision whether to allow your student to participate or not will not affect their relationship with the school or their teachers.

Confidentiality and Data Protection

All data collected will be kept confidential and stored securely. No personal identifying information about your student will be shared outside of the study, and the data will be anonymized for analysis and reporting purposes. Only the research team will have access to the data.

Potential Risks and Benefits

There are no known risks associated with your student's participation in this study. The study is being conducted to better understand how the IXL Math platform supports students' learning and how it can be improved to better serve students, particularly those with ILPs.

While there is no direct compensation for participation, your students' input will contribute significantly to improving the educational tools used in their classroom.

Consent to Participate

By signing this form, you acknowledge that:

- You have read and understood the information about this study.
- You consent to your student's participation in the study.
- You understand that your student's participation is voluntary, and they can withdraw at any time.
- You understand that the data collected will be kept confidential and used solely for research purposes related to this evaluation.

Parent/Guardian Consent:

I, the undersigned, give permission for my student, _____, to participate in the **Needs Assessment of IXL K-6 Math Platform** study. I understand the nature of the study, what my student will be asked to do, and that participation is voluntary. I also understand that I can withdraw my consent at any time without penalty.

Parent/Guardian Name (Printed): _____

Parent/Guardian Signature: _____

Date: _____

Student's Name (Printed): _____

Grade/Teacher: _____

Contact Information

If you have any questions or concerns about this study or your students' participation, please contact the principal investigators:

The IXL TN Evaluation Team

IXLEvaluationTN@Gmail.com

Phone: 865-974-1000

Appendix B.5: Post-Study Follow-Up Letter – Educators

Dear [Teacher's Name],

On behalf of the IXL TN Evaluation Team, I want to extend our deepest gratitude to you for your participation in our **Needs Assessment of the IXL K-6 Math Platform**. Your insights and feedback have been incredibly valuable, and your involvement is a critical part of our effort to improve educational tools that better serve both students and educators.

Thanks to your time and input, we are gaining a clearer understanding of how the platform supports learning, particularly for students with Individualized Learning Plans (ILPs), and how it can be enhanced for future use. Your willingness to share your experiences has made a significant contribution to this important evaluation.

As a token of our appreciation, we would like to offer you a **gift card** for your participation. You may choose between a gift card in the amount of $25 to **Amazon** or **Barnes & Noble**, depending on your preference. Please let us know which one you would prefer and the best email address to send the electronic gift card, or if you would prefer a physical card, we can arrange that as well.

Once again, thank you for your time, commitment, and support in helping us improve the IXL Math platform. We genuinely appreciate your efforts in making this evaluation a success.

If you have any questions or need further information, please feel free to reach out to me directly at IXLEvaluationTN@Gmail.com or call 865-974-1000.

Warm regards,

Andrew Rosbury

Principal Evaluator

IXLEvaluationTN@Gmail.com

Phone: 865-974-1000

The IXL TN Evaluation Team

Appendix C: Proposed Data Collection Schedule

Phase	Activity	Participants	Duration	Purpose/Outcome
Phase 1	Online Survey (quantitative + open-end)	Teachers, Students, Parents	2 weeks	Establish baseline perceptions of math learning, technology use, and barriers to adoption.
Phase 2	Focus Groups	Teachers, Administrators, IT staff	2 weeks	Exploring emerging themes from surveys: collect deeper qualitative data.
Phase 3	Individual Interviews	Key Stakeholders (Teachers, IT Director, Administrators)	2 weeks	Refine understanding of implementation needs, training requirements, and ethical considerations.

Total Duration: Approximately six weeks

Estimated Start Date: October 14 – November 21

Data Analysis and Reporting: November 21 – November 30

Appendix D: Preliminary Logic Model for IXL Math Program Evaluation

Inputs	**Activities**	**Outputs**	**Short-Term Outcomes**	**Long-Term Outcomes**
- IXL Math platform access -Teachers and students -School technology infrastructure -Evaluation team -Research instruments (survey, focus-group guides)	- Conduct evaluation surveys - Facilitate focus groups and interviews - Analyze responses for themes and barriers - Report findings to stakeholders	- Completed survey data - Summary of focus-group insights - Preliminary report on instructional and infrastructure findings	- Identification of teacher and student experiences - Recognition of infrastructure barriers - Recommendations for professional development	- Improved integration of adaptive learning technology - Increased teacher confidence and student engagement - Data-informed decisions on technology adoption

Appendix E: Draft Data Collection Instruments (Collaborator Question Sets)

Although the current evaluation focuses primarily on teachers, students, and IT directors, these additional question sets illustrate how broader stakeholder perspectives could be incorporated in later stages of a comprehensive implementation evaluation.

Each set is organized by the intended audience and aligned with the evaluation's central constructs: instructional practice, infrastructure and support, and perceived value.

EdTech Integration / Implementation Professionals & PD Coordinators

Goal 1 – Rollout, Implementation, and Adoption

- What have been the most significant challenges schools face when implementing new learning platforms?
- What primary factors determine whether a teacher, a school, or a district adopts a new platform?
- What is a typical timeframe for planning and implementing a new learning-technology initiative?
- What types of support or resources make implementation smoother for teachers and administrators?
- What common mistakes have EdTech companies made during the implementation or rollout process?

Goal 2 – Effective Training for Teachers

- What kinds of professional-development formats most effectively influence teachers to adopt new technology?

- What concerns do teachers most often express when learning to use and supervise a learning platform?
- How is the success of a professional-development program measured, and what evaluation methods are used?
- What does an evaluation of platform compatibility with current systems typically include?
- What technical or integration issues have you had troubleshooting when connecting adaptive learning platforms with other systems?

Goal 3 – Assessing Impact on Instruction and Learning

- Which indicators suggest that a platform genuinely improves student learning outcomes or teacher effectiveness?
- What ongoing support structures are essential for the continued and effective use of EdTech tools?
- How frequently should teachers complete training or practice sessions to remain current with platform features?
- What is the most common budgeting or cost concerns regarding continued platform use?
- What processes or supports assist schools from pilot testing to full-scale adoption?

These question sets are preliminary and exploratory in nature. They are intended for refinement during later stages of the evaluation design process or in future mixed-methods studies of IXL Math implementation.

Appendix F: Teacher Survey: Needs Assessment of IXL's K-6 Math Platform

Section 0: Background Information

These questions help us understand your teaching context so we can better interpret your responses.

1. Which grade level(s) do you currently teach for math?

   (Select all that apply)

   ☐ Kindergarten

   ☐ 1st Grade

   ☐ 2nd Grade

   ☐ 3rd Grade

   ☐ 4th Grade

   ☐ 5th Grade

   ☐ 6th Grade

   ☐ Other (please specify): _____

2. What is your primary role this year?

   ☐ General education classroom teacher

   ☐ Special education teacher

   ☐ Math interventionist/specialist

   ☐ Other (please specify): _____

3. How many years of teaching experience do you have (in any subject)?

   ☐ 0-2 years

   ☐ 3-5 years

☐ 6-10 years

☐ 11-15 years

☐ 16 or more years

4. About what percentage of your current students have an IEP or ILP in math?

   ☐ 0%

   ☐ 1-10%

   ☐ 11-25%

   ☐ 26-50%

   ☐ More than 50%

   ☐ Not sure

Section 1: Instructional Challenges

In this section, we'd like to learn more about the math challenges you see in your classroom. Your response will help us understand where students struggle the most and what makes teaching math more difficult.

5. **What are the biggest challenges you face when teaching math to your current K–6 students?**

   (Select all that apply)

   ☐ Lack of foundational math skills

   ☐ Students at very different levels

   ☐ Student engagement/motivation

   ☐ Limited classroom time for math instruction

   ☐ Limited resources/materials for teaching math

☐ Supporting students with IEPs/ILPs or other additional learning needs

☐ Family/homework support outside of school

☐ Other (please specify): _____

6. **Which math topics or skills do your students struggle with the most?**

(Select up to three)

☐ Number and operations (basic addition, subtraction, multiplication, division)

☐ Fractions and decimals

☐ Word problems

☐ Multi-step problems

☐ Geometry

☐ Measurement

☐ Problem solving/reasoning

☐ Other (please specify): _____

7. **How do you currently differentiate math instruction for students at different levels?**

(Select all that apply)

☐ Small-group instruction

☐ One-on-one support

☐ Different materials for different students (e.g., different worksheets, manipulatives)

☐ Adaptive learning platforms (e.g., IXL, Khan Academy)

☐ Peer tutoring

☐ Whole-class re-teaching

☐ Other (please specify): _____

8. **To what extent does student motivation or engagement contribute to the math learning challenges you observe in your classroom?**

☐ Not at all

☐ A little

☐ Some

☐ A lot

☐ A great deal

Section 2: Student Assessment, Progress, and Understanding

These questions focus on how you check for understanding and track student progress in math. We're interested in tools and strategies you use and where you may need more support.

9. **How do you currently assess student understanding in math?**

(Select all that apply)

☐ Teacher-made quizzes and tests

☐ State standardized tests

☐ District/school benchmark assessments

☐ Observations and informal checks for understanding

☐ Rubrics and performance-based tasks

☐ Adaptive learning platforms (e.g., IXL, i-Ready)

☐ Other (please specify): _____

10. **How confident are you in tracking an individual student's math progress throughout the year?**

    ☐ Not at all confident

    ☐ Slightly confident

    ☐ Somewhat confident

    ☐ Very confident

    ☐ Extremely confident

11. **How well do your current tools and strategies support you in monitoring the progress of students with IEPs/ILPs or additional learning needs in math?**

    ☐ Not at all well

    ☐ Slightly well

    ☐ Somewhat well

    ☐ Very well

    ☐ Extremely well

    ☐ Not applicable / I don't currently teach students with IEPs/ILPs in math

12. **What types of support do your students need most to succeed in math?**

    (Select up to three)

    ☐ Extra practice

    ☐ Real-time feedback

    ☐ Step-by-step/scaffolded instruction

☐ Visual supports (e.g., charts, diagrams, models)

☐ One-on-one support

☐ Opportunities to explain their thinking

☐ Small-group instruction

☐ Other (please specify): _____

13. **What types of learning resources or activities do your students respond to most positively in math?**

    (Select up to three)

    ☐ Visual aids (e.g., charts, diagrams)

    ☐ Games/interactive activities

    ☐ Practice problems (online or paper)

    ☐ Videos or multimedia content

    ☐ Hands-on activities/manipulatives

    ☐ At-home practice (e.g., homework, online practice)

    ☐ Other (please specify): _____

Section 3: Tech Capacity, Infrastructure, and Device Access

This section asks about the technology and devices available to you and your students during math instruction. Your answers will help us understand what is realistically possible in your classroom.

14. **What types of electronic or interactive devices do your students have access to during math instruction?**

    (Select all that apply)

☐ Desktop/laptop computers (individual)

☐ Tablets/iPads (individual)

☐ Shared devices (e.g., rotating laptop or tablet cart)

☐ Interactive whiteboards (e.g., Smartboard)

☐ Other (please specify): _____

15. **How frequently do students have access to computers or tablets during math instruction?**

☐ Never

☐ Rarely (less than once a month)

☐ Occasionally (a few times a month)

☐ Frequently (about once a week)

☐ Almost every lesson

16. **What expectations or guidelines do you have for students using computers/tablets during math instruction?**

(Select all that apply)

☐ No device use unless directed by the teacher

☐ Limited to specific tasks or activities

☐ Use is actively monitored by the teacher or support staff

☐ Students may sometimes choose their own activities

☐ Other (please specify): _____

17. **How reliable is internet connectivity in your classroom when using online tools?**

☐ Always

☐ Most of the time

☐ Sometimes

☐ Rarely

☐ Never

18. **What educational technology platforms or tools do you currently use for math instruction?**

(Select all that apply)

☐ IXL

☐ Khan Academy

☐ Zearn

☐ Nearpod

☐ Google Classroom

☐ Other (please specify): _____

19. **What educational technology platforms or tools do you currently use for student assessment and progress tracking in math?**

(Select all that apply)

☐ IXL

☐ School/district assessment systems (e.g., MAP, STAR, i-Ready)

☐ Google Forms

☐ Excel or other spreadsheets

☐ Online gradebook (e.g., Skyward, PowerSchool)

☐ Other (please specify): _____

20. **How confident are you in using digital platforms for teaching math?**

☐ Not at all confident

☐ Slightly confident

☐ Somewhat confident

☐ Very confident

☐ Extremely confident

21. **What challenges or concerns do you have about using technology for math instruction in your classroom?**

(Select all that apply)

☐ Lack of devices

☐ Poor internet connectivity

☐ Lack of training or support

☐ Limited time to integrate technology into lessons

☐ Student access issues (e.g., shared devices, logins)

☐ Technology is unreliable

☐ Concerns about student engagement or distraction

☐ Concerns about screen time

☐ Data privacy or security concerns

☐ Other (please specify): _____

☐ I do not have major concerns about using technology for math instruction

Section 4: Tech Support, Training, and Professional Development

Here, we'd like to know more about the training and support you receive for using technology in your teaching, especially in math. This will help us identify what kinds of professional learning would be most helpful.

22. **In the past 2 years, what kinds of support or training have you received for using educational technology in any subject?**

    (Select all that apply)

    ☐ General technology training (e.g., basic device or LMS use)

    ☐ Subject-specific technology training (not math-specific)

    ☐ Online resources or tutorials accessed on your own

    ☐ In-person workshops or professional development sessions

    ☐ One-on-one coaching or support from a colleague or tech specialist

    ☐ None

    ☐ Other (please specify): _____

23. **In the past 2 years, what kinds of support or training have you received specifically for using technology in math instruction?**

    (Select all that apply)

    ☐ General technology training (not specific to math)

    ☐ Math-specific technology training

    ☐ Online resources or tutorials you accessed on your own

    ☐ In-person workshops or PD sessions focused on math and technology

☐ None

☐ Other (please specify): _____

24. **What types of professional development would most help you feel confident using a new digital platform for teaching math?**

(Select all that apply)

☐ Hands-on sessions where you can explore the platform as a teacher and student

☐ Short, just-in-time sessions embedded in the school day

☐ Online tutorials or guides you can review on your own time

☐ Ongoing technical support (e.g., help desk, tech coach)

☐ Opportunities to collaborate and share ideas with other teachers using the platform

☐ Other (please specify): _____

25. **If professional development sessions that included technology education and platform immersion were offered at no extra cost, how likely would you be to attend?**

☐ Very unlikely

☐ Unlikely

☐ Unsure

☐ Likely

☐ Very likely

26. **If training for a free certification related to math technology platforms were offered and renewed every two years, how likely would you be to complete it?**

☐ Very unlikely

☐ Unlikely

☐ Unsure

☐ Likely

☐ Very likely

Section 5: Perceived Value of IXL and Adaptive Learning Technology

These questions explore your views on using digital and adaptive learning platforms for math, including IXL. We want to understand what you see as the benefits, concerns, and key factors that influence whether you use these tools.

By "adaptive learning platforms," we mean online tools that adjust questions or content based on each student's performance (for example, IXL, Khan Academy, Dreambox).

27. **Have you used any adaptive learning platforms in your teaching?**

☐ Yes

☐ No

☐ I'm not sure

28. **If yes, which adaptive learning platform(s) have you used, and how would you describe your experience with them?**

(Open-ended; if you answered "No" or "I'm not sure" to Questions 27, you may skip this question.)

29. **How often do your students use IXL for math during a typical week?**

- ☐ Not at all
- ☐ Less than once a week
- ☐ 1-2 times per week
- ☐ 3-4 times per week
- ☐ 5 or more times per week

30. **How well does IXL align with your current math curriculum and standards?**

- ☐ Not at all well
- ☐ Slightly well
- ☐ Somewhat well
- ☐ Very well
- ☐ Extremely well
- ☐ Not sure

31. **How helpful is IXL for supporting students with IEPs/ILPs or additional learning needs in math?**

- ☐ Not at all helpful
- ☐ Slightly helpful
- ☐ Somewhat helpful
- ☐ Very helpful
- ☐ Extremely helpful
- ☐ Not sure / Not applicable

32. **What benefits would you expect or have you observed from an adaptive learning platform for math?**

(Select all that apply)

☐ Personalized learning paths for students

☐ Immediate feedback for students

☐ Data and reports that help with tracking progress

☐ Saving teacher time (e.g., grading, planning)

☐ Increased student engagement (e.g., game-like features, badges)

☐ Support for students with IEPs/ILPs or additional learning needs

☐ Other (please specify): _____

33. **What concerns, if any, do you have about adopting or integrating adaptive learning platforms (including IXL) for math instruction?**

(Select all that apply)

☐ Time needed to learn the platform

☐ Lack of student access to devices

☐ Reliability of the platform/technology

☐ Alignment with curriculum or standards

☐ Data privacy or security

☐ Students over-relying on hints or shortcuts

☐ Concerns about screen time

☐ Other (please specify): _____

☐ I do not have major concerns

34. **How much autonomy do you have in selecting digital platforms to use for classroom math instruction?**

☐ None

☐ A little

☐ Some

☐ A lot

35. **What factors are most likely to influence your decision to adopt a new teaching platform for math?**

(Select up to three)

☐ Platform access and ease of use

☐ Alignment with curriculum and standards

☐ Cost of the platform

☐ Evidence that the platform is effective (research or data)

☐ Student engagement potential

☐ Support and training available

☐ Recommendations from colleagues or school leaders

☐ Other (please specify): _____

36. **What features would make a math instruction and assessment platform most useful for your teaching and your students' learning?**

(Select all that apply)

☐ Auto-grading

☐ Real-time feedback for students

☐ Alignment with state/national standards

☐ Progress tracking and reporting at class and individual levels

☐ Personalized learning paths

☐ Supports designed for students with IEPs/ILPs or additional learning needs

☐ Gamification or interactive features (e.g., games, badges)

☐ Easy integration with other tools you use (e.g., Google Classroom, gradebook)

☐ Other (please specify): _____

37. **If you could design the ideal math learning platform, what would it do?**

(Open-ended)