

# Educator Study with iClicker Insights Fall 2019



PRODUCT USED	iClicker Insights
STUDY DESIGN	Evaluation study with descriptive analyses

# How iClicker Insights supports student success at a mid-sized 4-year university

#### **Institutional Context**

The University of Memphis is a public four-year research university offering undergraduate and graduate degrees. The institution serves over 22,000 students with one main campus in Memphis, Tennessee. Two administrators from the Student Academic Success department and seven instructors from various departments chose to participate in this study.

In prior semesters, the Student Academic Success department used several digital resources as well as an early intervention program to support student success. The digital tools provided a variety of information, including; advising appointments, tutoring and coaching management, communications, predictive analyses, course scheduling, course performance and degree completion. The data was integrated with other systems to identify students not progressing as expected.

# Goals for using iClicker Insights

The administrators in this study planned to use iClicker Insights to identify students with troubling attendance patterns so that they could attempt to intervene before the student fell too far behind in their course(s). They also planned to review iClicker attendance data at the end of the semester to identify student attendance patterns associated with poor class performance and develop a plan to proactively address in future semesters. The administrators planned to disseminate the attendance and survey data from the iClicker Insight dashboard to the appropriate support areas.

# iClicker Insights Implementation

The administrators and instructors used iClicker Insights and iClicker Reef throughout the 16-week fall 2019 semester. During this study the instructors used iClicker Reef to take attendance in their classrooms and administered the surveys periodically throughout the semester. The administrators checked the iClicker Insights dashboard at least once per week except during weeks when classes were not in session. During the first month of the semester, the administrators cross-referenced the attendance data with the Early Intervention data and referred students with poor attendance to their advisors as part of an institutional early alert system. As the semester progressed, the attendance data was monitored to identify students of concern. Once a student was flagged for concern, the administrator shared the information with the students' instructor and/or advisor for support.

# **Study Design**

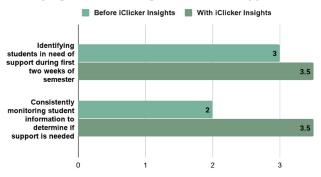
This study explored how institutions integrated data from iClicker Insights into their student success initiatives. In addition, information about administrator and instructor perceptions of iClicker Insights was gathered. Beginning and end-of-semester surveys were used to gather information about administrator perceptions of iClicker Insights and instructor perceptions of iClicker Reef. Administrator interviews provided more nuanced feedback regarding how data from the iClicker Insights dashboard was being used to support students. Weekly implementation logs were used to gather data on usage trends and general product satisfaction as usage evolved. Descriptive analyses were conducted on survey and log data as well as thematic analyses of interview data.

#### Results

iClicker Insights supports identification and monitoring of students in need of support. Administrators were asked to rate the degree of difficulty they experienced supporting students in previous semesters and then with iClicker Insights. Administrators reported that it was less difficult to identify students in need of support during the first two weeks of the semester using iClicker Insights. They also reported that it was much less difficult to consistently monitor student information to determine if ongoing support is needed when using iClicker Insights as compared to their previous digital systems. When asked to exclusively consider iClicker Insights, administrators strongly agreed iClicker Insights helped them understand which students needed additional support.

**iClicker Insights improves communication with instructors and students.** The administrators in this study reported that it was less difficult to communicate with instructors about students in need of support compared to previous semesters without iClicker Insights. They also noted that using iClicker Insights made it much easier to communicate with students when they were identified to be in need of support.

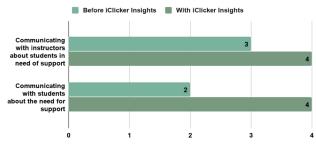
#### **Identifying and Monitoring Students for Support**



Scale: Very difficult (1) to Not difficult at all (4)

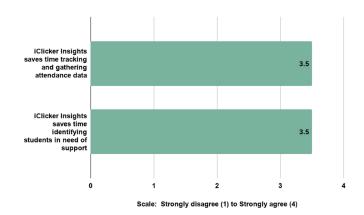
iClicker Insights saves time. The instructors in this study used iClicker to take attendance in their classes daily and reported being satisfied with their use of iClicker. The administrators used iClicker Insights to review the attendance data from these classes each week. Administrators strongly agreed that use of iClicker Insights saved them time tracking and monitoring the attendance data from the various instructors' classes. They also strongly agreed that iClicker Insights saved them time identifying students in need of support based on their attendance patterns. Administrators reported that using iClicker Insights helped them fulfill their goals of identifying and supporting and student success.

# Communicating with Instructors and Students About Need for Support



Scale: Very difficult (1) to Not difficult at all (4)

iClicker Insights is easy to use. Administrators strongly agreed that iClicker Insights was easy to use in response to a single ease-of-use question. The system usability scale was also administered to help understand administrator perceptions of the usability of iClicker Insights. The administrators in this study rated iClicker Insights at 69 points. Generally, a score of 68 is considered to be "good" and the system is perceived as highly usable. A score of 69 indicates a positive administrator perception of iClicker Insights usability. Administrators also reported that they were very confident iClicker Insights met their needs.



**Insights for Optimization** 

The administrators provided insightful feedback on several features of iClicker Insights. They suggested adding more filters to the dashboard so they could view only specific variables or subsets of classes and also hope that the data from iClicker Insights can be integrated with other systems on campus in the future. The feedback was continually shared with the product development team and integrated into product revisions.

Overall, the results of this study have generated valuable recommendations for the iClicker Insights product team. The positive perceptions support the continuation of research on iClicker Insights.

# **Insights for Instructors**

One of the most important insights was the ease with which administrators could identify students in need of support early in the semester, and communicate with instructors to provide identified students the necessary support. Administrators in similar educational contexts might consider recommending their instructors take attendance each class session using iClicker so the data can be used to track student attendance early and often to identify in need of support.

### **Study Limitations**

Although the data are rich and the findings important for product optimization and insights for administrators, they are specific to this institution and the administrators that participated in this study. They cannot be generalized to all institutions who use iClicker Insights. The results are also descriptive and should not be used to infer causation.

# **Ethics and Data Privacy**

Prior to data collection, this study and the associated consent forms and instruments were reviewed and approved (found exempt) by the Human Resources Research Organization (HumRRO). HumRRO is an accredited (00009492) third-party Institutional Review Board organization with no affiliation with Macmillan Learning. Macmillan Learning seeks third-party review to eliminate any bias in the decision of the exemption. The data in this study, which are provided by administrators and instructors, are initially identifiable. However, once a random identifier is generated identifiable data are destroyed. Data are provided in secure storage locations, and access is permitted only to the primary investigator in the study. For full details of our data handling and storage privacy procedures, contact marcy.baughman@macmillan.com.