# BRIDGING BARRIERS

Assessing the Digital Divide and Remote Learning Across 22 Kansas City School Districts

LEANLAB EDUCATION

**Katie Boody**
*Founder & CEO*

**Erin Huebert, PhD**
*Vice-President of Research and Programs*

**Rohan Pidaparti**
*Manager of Innovation Programs*

**Jorge Holguin**
*Manager of Community Organizing*

## INTRODUCTION

Since President Trump declared the coronavirus a national emergency on March 13, school leaders across the nation have been balancing incredible operational challenges—distributing food, coordinating social services, and supporting staff—all while transitioning instructional activities to a new frontier of virtual, or distance learning. Additionally, a stark "digital divide," the gap between those with computer and internet access and those without, is preventing many of our nation's students from accessing online learning opportunities. This means many students have functionally been without access to instruction, beyond paper packets, since early March. This divide belies a deeper concern; in a city where staunch educational inequities have persisted for decades, this digital divide threatens to widen an already stark chasm, despite recent hard-won progress.

When stay-at-home orders went into effect and school buildings closed their doors, LEANLAB Education, a Kansas City based non-profit focused on innovating in public education, decided to put their traditional program activities on hold, in order to support Kansas City area students with gaining access to the connectivity and technology necessary to participate in distance learning efforts. LEANLAB's mission has always been to combat structural inequities that prevent access to quality learning opportunities through technology and innovation, so working to close the digital divide by increasing access to connectivity and technology was a natural fit. Additionally, LEANLAB's expertise in education technology solutions and innovation processes—and standing relationships with many regional school districts—makes them uniquely qualified to support educators during this transition to virtual learning.

This report proceeds as follows: Part I discusses the collaborative effort of LEANLAB and its school and community partners to help schools identify and respond to the technology needs of Kansas City school students. Part II summarizes the results from an educator needs assessment that was created by LEANLAB and distributed to teachers across the city to understand their emerging challenges in a virtual learning context. LEANLAB found that 1 in 5 students across 22 school districts in the Kansas City region lack reliable internet access, and lack, therefore, access to virtual learning opportunities. This finding points to an opportunity to create larger, systemic change by inviting multiple change agents (schools, communities, philanthropy and government) to take collective action toward bridging the digital divide and ensuring all students have equal access to learning opportunities.

# PART I

## TECHNOLOGY NEEDS ASSESSMENT

Geographic evidence of the digital divide in the Kansas City metropolitan area has been identified by other organizations, notably the Kansas City Coalition for Digital Inclusion and the Kansas City Library that have conducted assessments of technology needs across the region. Such connectivity analyses do not, however, accurately describe the *educational digital divide*–variation in access to technology at the school level–across the region for two reasons. First, census-level reports don't account for the dynamism of the frequent mobility of families. There is very high transience in KC schools; 40-50% of students will switch from one school to another school in any given year. Second, geographic reports do not account for the fragmented nature of Kansas City's public school setting. Nearly 50% of KC students are in charter schools, meaning many Kansas City students don't attend school in the same neighborhood in which they live.

Therefore, in order to effectively assess the extent of the educational digital divide in Kansas City, LEANLAB developed a separate technology needs assessment and process with each participating school district. School districts had the option to voluntarily leverage LEANLAB's capacity to assist with identifying connectivity and technology needs. LEANLAB designed a bilingual technology needs assessment tool that schools could use to assess the needs of their students and families. Ultimately, 22 local education agencies (LEAs), colloquially known as "school districts" or "charter school systems," communicated their technology needs to LEANLAB, including the total number of students in need of internet access and the total number of students in need of devices (laptops or tablets) to use for remote, virtual instruction.

Of the 22 participating LEAs (see table on next page), 17 were public charter schools and five were traditional public school districts. The five traditional public school districts were Belton, Fort Osage, Independence, Clinton County, and Kansas City Kansas Public Schools. These districts serve suburban, rural, and urban student populations across geographically dispersed landscapes. There were unique challenges related to distribution of resources and connectivity for families outside of densely populated areas with centralized school systems.

# CONNECTIVITY AND DEVICE NEEDS BY SCHOOL TIER

| Tier | Description | Total Student Population | Device Need | % of Population in Need | Connectivity Need | % of Population in Need |
|---|---|---|---|---|---|---|
| **1** | 17 Charter Schools participating within Kansas City Public Schools boundaries | 10,484 | 2,418 | 23.06% | 1,100 | 10.49% |
| **2** | 4 Non-charter school districts in KCMO area (not including KCPS) | 25,724 | 144 | 0.56% | 6,857 | 26.66% |
| **3** | Kansas City Kansas School District | 22,902 | 0 | 0.00% | 4,800 | 20.96% |
| **Total** | **22 participating schools** | **59,110** | **2,562** | **4.33%** | **12,757** | **21.58%** |

To organize schools and provide resources where they were most needed, LEANLAB categorized the 22 school districts that voluntarily participated into three separate tiers. Charter schools were prioritized as "Tier 1" because they are least equipped with the IT staff necessary to support the transition to remote learning. Additionally, the small student populations of charters meant that their needs could be more quickly met. LEANLAB then prioritized other public school districts in the Kansas City region, including Fort Osage, Independence, Clinton County, and Belton School Districts. Finally, the third tier comprised the Kansas City Kansas School District, the only participating school district in the state of Kansas[1].

The aggregate technology needs assessment data revealed, as shown in the table above, a total need for 2,562 student devices (4% of the student population), and a total need for internet access for 12,757 students (21% of the student population). Charter schools represent the majority of the device need. About 23% of the charter school student population was in need of devices, while only one of the non-charter school districts reported a need for devices, representing just 0.56% of the total student population of Tier II schools. The connectivity need, however, was much larger with the non-charter schools. Among the five public school districts (Tier II and III), 24% of the student population was without access to the internet, representing a need for 11,657 hotspots. Among the 17 charter schools, about 10% of the student population did not have access to the internet, representing a need for 1,100 hotspots.

[1] *Kansas City Public Schools (KCPS), an initial participant with LEANLAB, was able to withdraw their need and negotiate their own agreements with vendors for hotspots and devices independently. They remained an advisor on vendor selection, procurement, distribution, and short-term WiFi solutions for "digital deserts" - neighborhoods identified as having dense areas of families without internet access.*

## PARTICIPATING SCHOOLS

| SCHOOL NAME | # OF STUDENTS |
|---|---|
| **TIER I** | |
| Academie Lafayette | 1088 |
| Academy for Integrated Arts | 207 |
| Citizens of the World | 221 |
| Crossroads Charter Schools | 895 |
| De La Salle Education Center | 140 |
| Frontier School of Excellence | 1564 |
| Genesis Charter School | 272 |
| Gordon Parks Elementary School | 180 |
| Guadalupe Centers | 1479 |
| Hogan Preparatory Academy | 1058 |
| Hope Leadership Academy | 116 |
| Ewing Marion Kauffman School | 1139 |
| Kansas City Girls Preparatory Academy | 76 |
| Kansas City International Academy | 677 |
| KIPP: Endeavor Academy | 630 |
| Lee A. Tolbert Community Academy | 513 |
| Scuola Vita Nuova Charter School | 314 |
| **TIER II** | |
| Belton School District | 4868 |
| Fort Osage R-I School District | 5069 |
| Independence School District | 15143 |
| Clinton County R-III School District | 644 |
| **TIER III** | |
| Kansas City Kansas School District | 22902 |

# TECHNOLOGY ACQUISITION CHALLENGES

**After identifying the technology needs of Kansas City area schools, LEANLAB explored the technology and connectivity vendor landscape to identify purchase and distribution options. Through investigating COVID-19-specific offers and vendor partnerships for schools, three key challenges emerged.**

## 1 DIMINISHING INVENTORY AND LIMITED VENDOR CAPACITY

As the COVID-19 crisis set in, and more organizations and individuals began working and studying from home, demand for hotspots and devices skyrocketed and vendors struggled to supply inventory to meet the demand. This limited inventory, coupled with overtaxed distribution channels, created long delays for order fulfillment, unconducive for an emergency crisis response. For certain vendors, orders placed in late March through early April would not be fulfilled until July and August, after the end of the school year. This timeline was not helpful for many of LEANLAB's school partners working urgently to reduce the gaps in learning for disconnected families. Furthermore, each school had its own specific technology needs and preferences, which made achieving economies of scale through collective purchasing difficult, as no single vendor could effectively meet the unique and specific needs of each school.

## 2 LACK OF ACCESSIBLE CAPITAL

The capital costs of devices and connectivity solutions became cost prohibitive depending on the total number of devices and solutions needed. Particularly, large districts, some reporting needs of up to 5,000 hotspots, with an estimated price tag of $1.2 million for 12 month contracts, did not have sufficient cash reserves to absorb such large, unbudgeted expenditures. Funds made available by government agencies and local philanthropy were often limited in scope and had long disbursement timelines. Furthermore, schools were hesitant to employ funds to purchase devices and connectivity solutions given the uncertainty of the scope and severity of the crisis, which is expected to decrease available state school funding for the next fiscal school year, 2020-21. Some school districts explicitly expressed a desire to hold back on technology expenditures, instead prioritizing building cash reserves to cover basic operating expenses expected to be negatively impacted by anticipated COVID-19 related school budget cuts in the next fiscal year.

## 3 LACK OF COMPREHENSIVE BROADBAND AND CONNECTIVITY INFRASTRUCTURE

A baseline of adequate connectivity and broadband infrastructure is necessary to effectively and efficiently implement connectivity and technology service at scale. Prior infrastructure analyses reveal a patchwork of unequal broadband access available across the KC-metro area. Neighborhoods with more concentrated poverty have more housing units without broadband infrastructure running directly to individual homes, limiting the viability of high-speed in-home connectivity options at scale.

The Kansas City Public Library and the Schools, Health & Libraries Broadband's 2019 report, "Examining Kansas City's Progress in Addressing The Digital Divide: A Comprehensive Analysis" cites that Kansas City, MO home broadband adoption grew to 85.1%, and 80.4% in Kansas City, KS, since last assessed in 2013 (when broadband adoption was 67.1% and 60.4% respectively). While this growth is significant, it reveals a 15-20% gap in homes without broadband access. Still, some broadband providers remained cost prohibitive for many families; for example, Spectrum had an offer for 60 days of free internet, but only customers without outstanding Spectrum balances were eligible for the offer. Additionally, rural communities struggled with necessary and consistent satellite access to leverage hotspots from some mobile providers. School districts in Clinton and Wyandotte Counties, for instance, reported struggling to reliably access the internet from Sprint's 1Million Project, citing inconsistent satellite signals.

[2] *The 1Million Project is a multi-year initiative to offer free mobile devices and free high-speed wireless internet connectivity to 1 million low-income, U.S. high school students lacking a reliable source of internet access at home.*

## COORDINATED FUNDRAISING EFFORTS

While LEANLAB has not directly fundraised on behalf of schools, LEANLAB has worked as an advisor, making data-informed recommendations to area philanthropists and individuals interested in supporting immediate connectivity needs.

Specifically, LEANLAB Education worked with SchoolSmartKC (SSKC)—a funder specializing in strategic investments for charter and district schools within the Kansas City Public School District boundaries—on an effort to allocate financial and instructional resources through an accelerated grant-making process to meet short-term purchasing needs of hotspots and devices. SchoolSmartKC allocated $467,360 to the 17 charter schools partnering with LEANLAB and $611,000 to Kansas City Public Schools to purchase the technology of their choice to meet the needs of their students and families. As shown in the table below, the funding allowed the 17 charter schools to purchase 360 devices (15% of the total charter need) and 719 hotspots (65% of the total charter need). Because the SSKC funding was only available to schools within the KCPS boundaries, suburban and rural districts (Tier II and III schools) did not qualify for funding.

| TIER | DESCRIPTION | NUMBER OF DEVICES PURCHASED | PERCENT OF DEVICE NEED MET | NUMBER OF HOTSPOTS PURCHASED | PERCENT OF HOTSPOT NEED MET |
|---|---|---|---|---|---|
| 1 | 17 Charter schools within KC Public School System Boundaries | 360 | 14.88% | 719 | 65.36% |
| 2 | 4 non-charter schools in Kansas City, Missouri | 0 | NA | 145 | 2.11% |
| 3 | Kansas City Kansas School District | 0 | NA | 0 | 0% |
| **TOTAL** | **22 participating schools** | **360** | **14.88%** | **864** | **19.01%** |

Additionally, LEANLAB worked with the Ewing Marion Kauffman Foundation, recommending purchasing support for smaller Tier II and Tier III school districts, and infrastructure assessment and connectivity planning grants for larger school districts with high volumes of need. Google Fiber and Startland, a local digital news-outlet, helped direct giving initiatives toward individual school districts with unmet needs. Some charter schools were able to fundraise at a local level to attain grants and individual donations of up to $20,000 to help support immediate device needs.

## COORDINATED DIGITAL INCLUSION EFFORTS

There were many barriers to acquiring technology quickly. With long distribution timelines, there remained a need to get students and families stop-gap connectivity solutions in the short term, while coordinating a larger fundraising initiative from funders and simultaneously negotiating bulk deals with vendors.

The Kansas City Coalition for Digital Inclusion stepped in to coordinate the efforts of local organizations, including the public library system, transportation authorities, non-profits, and private industry to provide emergency connectivity and technology to students and families in need.

Connecting for Good secured donations of devices and hotspots from local businesses and government agencies, and distributed to families with students attending schools within Tiers 1, 2 and 3, as well as to the general public in need throughout Jackson County.

The Kansas City Public Library system made open access WiFi available 24-hours a day in the parking lots of all branch locations.

Kansas City Public Schools and Student Transportation of America, a transportation vendor, placed WiFi-equipped school buses at library locations throughout the city in areas that were identified as "digital deserts," meaning they contained large disconnected populations.

Though these short-term efforts were successful in providing some connectivity to vulnerable populations, identifying high-need areas, and leveraging existing resources, these efforts were unable to meet the total need for connectivity in the Kansas City region. Solutions like WiFi-equipped school buses lacked the strength of signal needed to cover larger areas and often were subject to bandwidth throttling and slowed speeds. For the long-term change needed to fully connect the Kansas City region, significant infrastructural investment is needed.

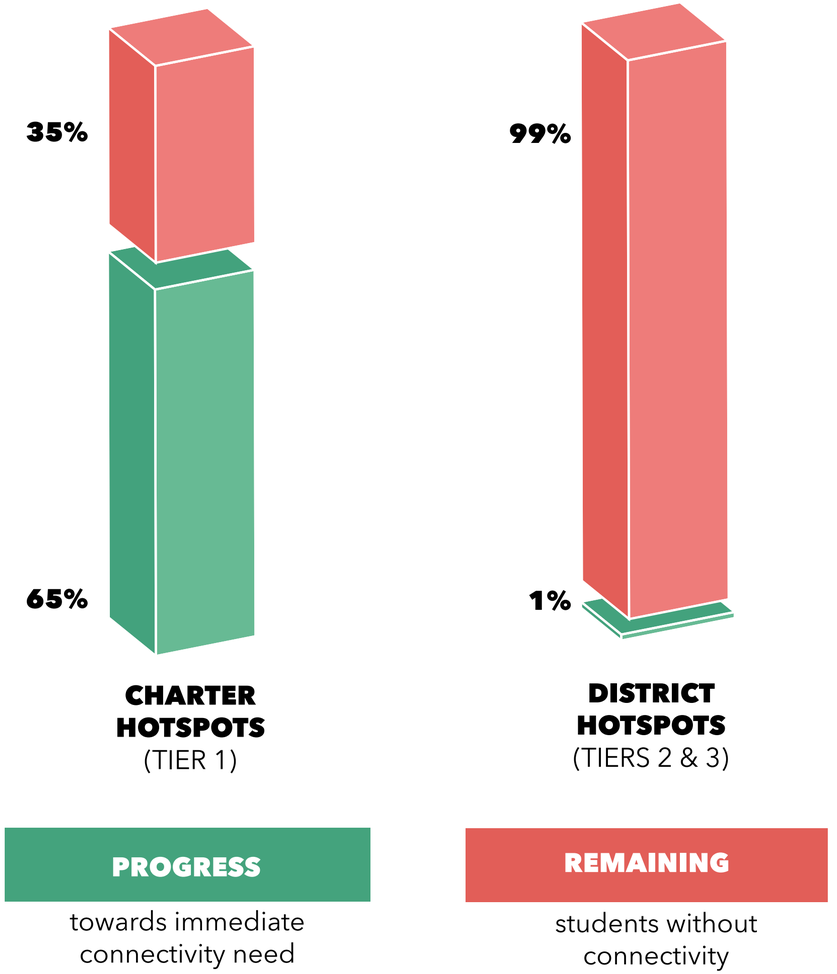
## REMAINING NEED

While the philanthropic community in Kansas City helped many schools in the urban core provide direct, immediate support, the funding was, unfortunately, not sufficient for addressing all of the immediate needs across the region. Substantial connectivity needs for large, traditional school districts with larger populations remain. The sheer size of their need (4000-6000 households without internet) and the corresponding cost (more than $1million dollars for annual contracts on hot spots) of connectivity prevented large district school leaders from procuring hotspots even at discounted, bulk pricing. Of the 11,657 households among the five district schools (Tier II and III) that were reported to be without internet at home, only 145 hotspots were secured to distribute to families, representing just 1.24% of the total need across Tier II and III schools.

Among the charter schools, many larger charter schools were not able to cover the cost of buying devices for every student in need. Even with funding from SchoolSmartKC, only 15% of the total device need was secured. Among the charter schools that were able to secure devices, many are in the position of requiring that multiple students within homes share the same device across contents and grade levels. Charter schools were able to cover 65% of the immediate connectivity need by distributing hotspots they purchased with SSKC funding, but 35% of the connectivity need remains.

The adjacent figure illustrates progress toward the *immediate* need that schools identified in March. The need is, however, ongoing and always evolving. Given the dynamic nature of the connectivity need as well as the significant size of the remaining immediate need, there existed a space for other creative avenues for connecting families to the internet beyond distributing hotspots. Though some families were able to secure COVID-19 related short term offers from service providers, there was no evidence of these kinds of connectivity solutions being broadly leveraged.

Therefore, there is a continued need for a consortium of organizations across Kansas City, with the purpose of providing alternative connectivity solutions (as described in the “Coordinated Digital Inclusion Efforts” section above).



PART I

# CONCLUSION

Reaching the most marginalized families requires overcoming major infrastructural gaps and intractable inequities. A connectivity report on the digital divide prepared by mySidewalk, a city intelligence platform, makes clear that the Troost Avenue boundary, a North-South thoroughfare that serves as Kansas City's de facto racial dividing line, also segregates the connected from the disconnected. As research continues to point to COVID-19 disproportionately affecting communities of color, it is evident that communities of color are also disproportionately affected by connectivity issues as well.

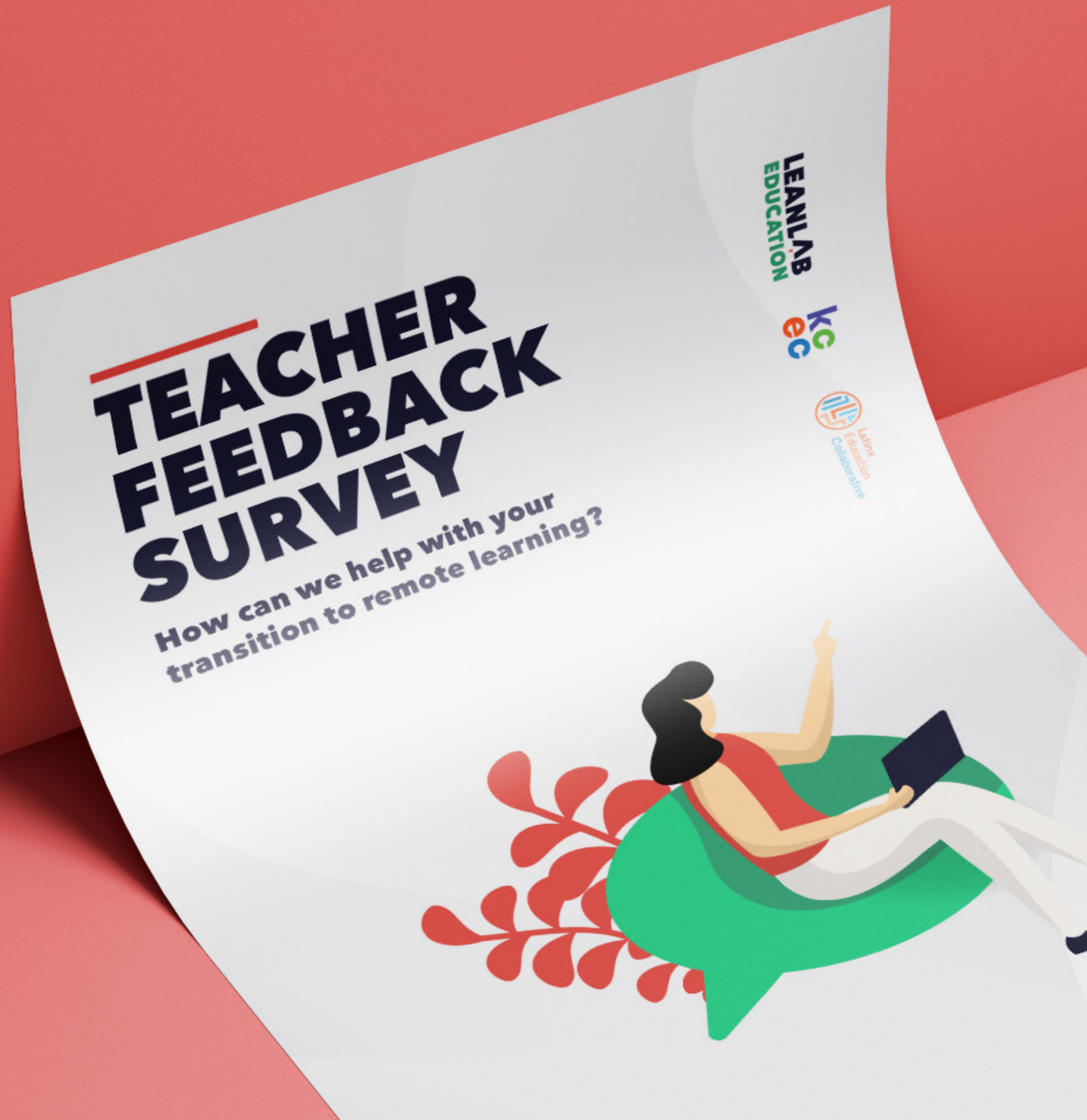
LEANLAB technology needs assessment results suggest that the current digital divide is perpetuated by long standing inequities in the Kansas City region and points to a need for comprehensive, sustainable solutions, especially for school districts serving large populations of students living in poverty and rural communities. Given the complexity of such systemic inequities, the data also suggests that school budgets, philanthropy and digital inclusion advocates alone cannot absorb the responsibility and cost of long term connectivity solutions. Connectivity solutions need to work over a longer time horizon than 12-month hotspot contracts and temporary WiFi access points. Though the COVID-19 outbreak has illuminated the extent of the digital divide in the Kansas City region, the digital divide preceded the pandemic and will persist beyond it, unless systemic action is taken.

Schools, districts, and communities need to be prepared to deal with the effects of the divide in the future. As more research points to how low-income and historically marginalized students are the most adversely affected by going online, schools, policymakers, and communities need to take meaningful action to ensure that virtual learning doesn't perpetuate or exacerbate existing gaps in achievement and opportunity. The Kansas City region will not be able to prosper in the future without an education system that adequately serves all students; the digital divide and its related challenges remain a barrier to the vision of what education in this region can be.

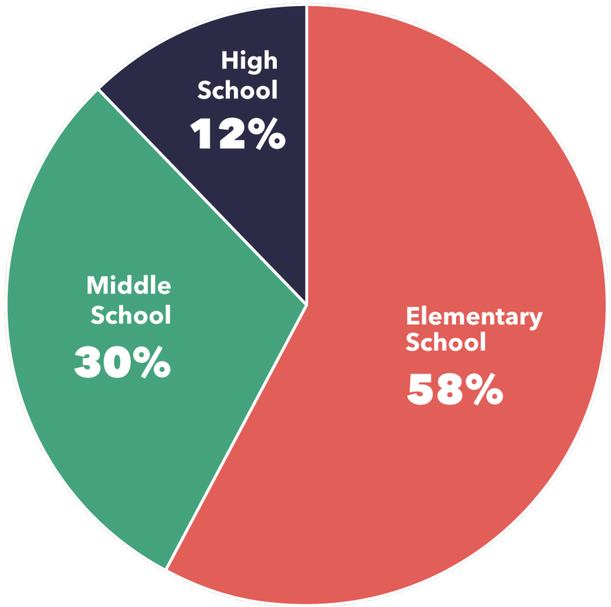
# PART II

## TEACHER NEEDS ASSESSMENT

As the transition to remote learning illuminated the digital divide and the technology needs of Kansas City public school students, it also changed the way educators taught and engaged with students and families. For students that did not have connectivity or access to technological devices, the instructional options for teachers were extremely limited. For students without connectivity or devices, schools resorted to sending paper packets of instructional materials to families without internet access or devices through food distribution channels, while continuing online remote learning for students with access. LEANLAB wanted to understand the challenges educators were experiencing and the creative solutions they were developing in response to this remote learning context and, in particular, in contexts with limited access to technology. By uncovering teacher challenges and innovations–new and creative processes and/or tools, which helped teachers overcome the challenges they were experiencing–LEANLAB is able to illuminate both gaps and "bright spots" of our teacher's remote instructional practices, and use this data to inform future instructional supports and interventions.



## TEACHER BREAKDOWN BY GRADE LEVEL

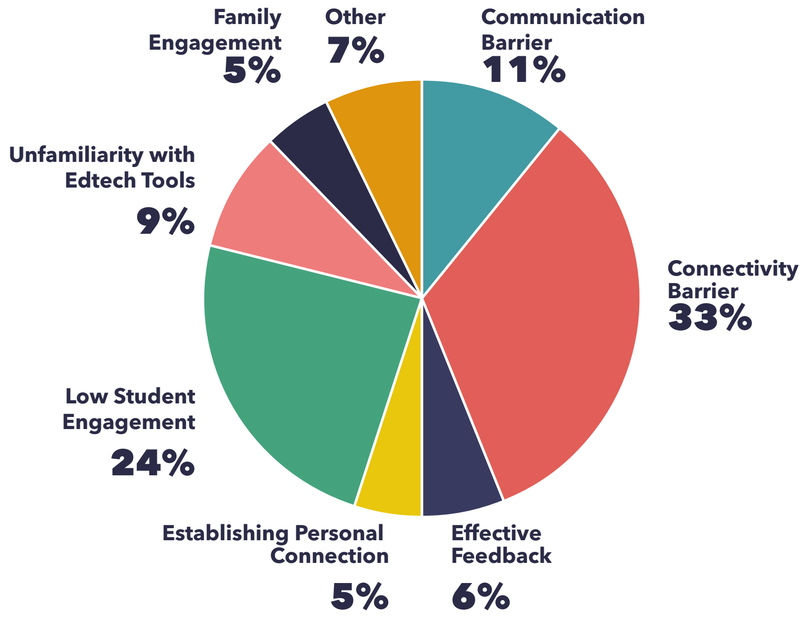



## SURVEY DEMOGRAPHICS

LEANLAB distributed a teacher survey across the entire Kansas City metro area in early April in collaboration with Kansas City Education Collective and the Latinx Education Collaborative, two local, start-up education-nonprofits focused on building collaborative learning opportunities for educators across the Kansas City metro.

A total of 197 teachers from 10 charter schools responded and 61 teachers from 23 non-charter schools responded. The non-charter school districts represented include Blue Valley School District, KCPS, KCKPS, Olathe School District, and Shawnee Mission School District. Of the 258 respondents, 58% teach in an elementary school, 30% of respondents teach in a middle school, and 12% of respondents teach in a high school.

# WHAT ARE THE MAIN CHALLENGES THAT YOU ARE HAVING RELATED TO TEACHING IN A VIRTUAL FORMAT?




**Teachers were given an open-ended question that asked them to identify the main challenges they were having related to teaching in a virtual format. Responses were then categorized accordingly, and the results are illustrated in the adjacent figure. The most common challenge among teachers was a connectivity barrier, as they described not being able to virtually connect with many of their students that didn't have access to the internet at home. Many teachers were concerned that a lack of connectivity was creating unfair advantages for some students:**

- "If students live in a home without a workspace or the resources needed to learn at home, I'm afraid they won't be on-level with peers."
- "Students who have support at home are doing very well. [Connectivity] is widening the gap for our students."
- "Virtual learning highlights the digital divide. Students with access to reliable Internet, safe and quiet places to work and adults at home with the knowledge to support them are doing OK. Students without those advantages are being left behind. This is a huge widening of the opportunity gap."

**The second most common challenge that teachers reported was low student engagement. Teachers found it hard to keep students engaged in the material and assess progress, stating that a virtual context cannot replicate in-person instruction, nor peer interaction:**

- "There is nothing that can replace being in a classroom."
- "Some students require more hands on learning and engagement [than] virtual learning is able to do."

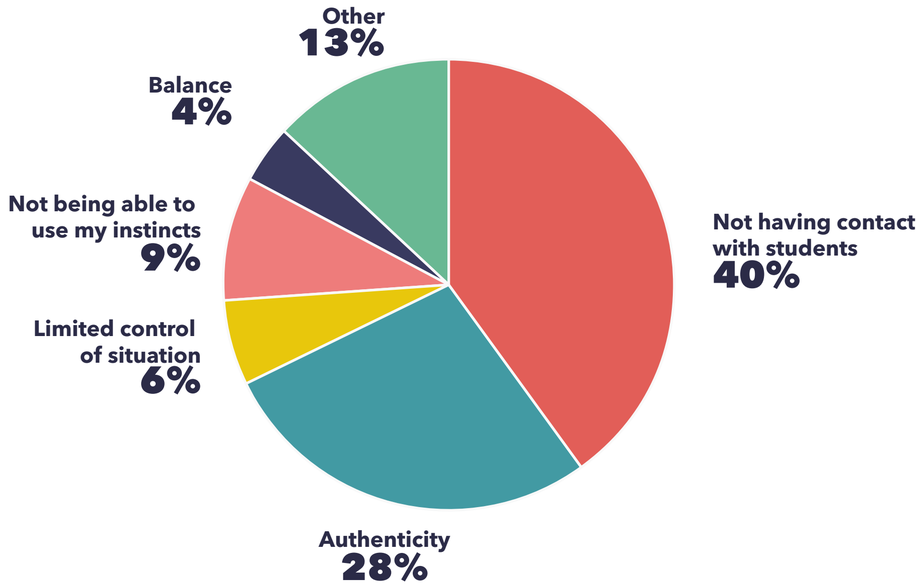
**The third most common challenge for teachers related to virtual instruction was that they found it difficult to communicate with their students in a virtual context.**

- "Since there is not a set schedule at home, I am unable to communicate on a regular basis with all of my students. Our working hours are not the same."
- "Only being able to communicate with students via a chat system and not a voice conversation is difficult. It takes a lot of typing and reading for a student to follow assistance when needing help rather than a quick conversation."

**Finally, the fourth most common teaching challenge was that teachers were either unfamiliar with instructional technology tools, or their students or caregivers were unfamiliar with the tools, making instruction laborious and challenging.**

- "Students are not prepared to properly use technology independently."
- "Getting parents to understand/use the technology. Many will give up before trying."

## WHEN IT COMES TO SOCIAL-EMOTIONAL LEARNING OF YOUR STUDENTS, WHAT HAVE BEEN THE BIGGEST CHALLENGES FOR YOU AS A TEACHER?



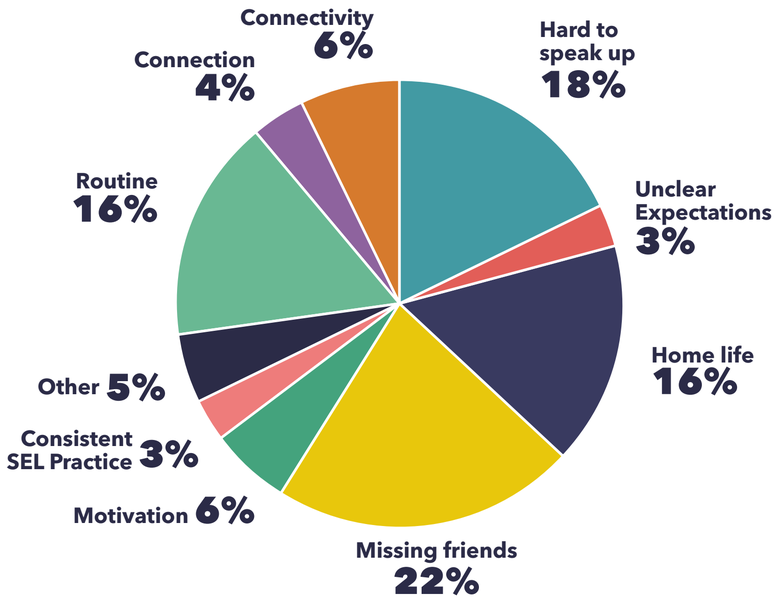

**The survey asked teachers an open-ended question about challenges related to social-emotional learning - the process of developing and using social and emotional skills - and the top challenges are illustrated in the adjacent figure.**

**The top three challenges for teachers related to the difficulty of establishing necessary social-emotional learning conditions that were not easily duplicated out of a traditional classroom setting:**

1. **In-person contact**
2. **Authentic environment**
3. **Being able to use instinct**

- "Some students need the connection we can't give them virtually."
- "I cannot interpret their responses behind just written words."
- "Knowing that the social-emotional supports in school are not always available at home. It is hard when students reach out to say "HI" and "I miss you" and we can't see eye-to-eye or give that hug."
- "Social-emotional learning is most authentic when put into the context of real-life situations, such as an argument with a peer, a moment where we calm down together."
- "I can't see the kids. I can't gauge by their faces, tone, body language how they are doing. Are their parents frustrated with this too and yelling at them or even worse? Are they using the tools we've taught them when they are upset or scared? It's really hard right now."

## WHEN IT COMES TO SOCIAL-EMOTIONAL LEARNING OF YOUR STUDENTS, WHAT HAVE YOU NOTICED ARE THE BIGGEST CHALLENGES FOR STUDENTS?



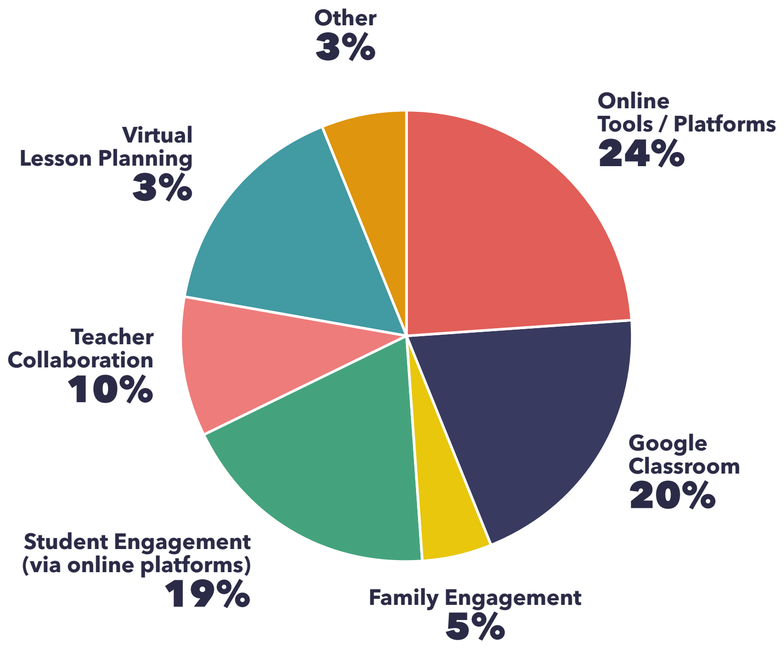

**The survey also asked teachers an open-ended question about what they believed were the biggest challenges for the students regarding the students' social-emotional learning. The responses were categorized accordingly and the results are illustrated in the adjacent figure. The most common response was that teachers believed students were "missing their friends," resulting in a negative emotional toll on the students.**

- "Many students feel very isolated, and want to be back in school. I see students who miss their routine, the structure, the love and support from staff and teachers, and feel very uncertain about the future. This weighs on them heavily."
- "They miss the community of the classroom. That is not something that can be replicated virtually."
- "They miss the actual classroom experiences that come with building friendships and receiving support from their peers."

**An additional two categories were illuminated from the respondents' data: increased inconsistency in student's schedules and routines as well as demanding home environments led to social-emotional learning challenges for students.**

- "I think it has been difficult for some students to adjust to at-home/remote learning...students are not used to spending time at home doing their daily school work...they are still adjusting to their individual home/family schedules...their parents are also working at home."
- "Students are anxious because some of their families are struggling."
- "Students are concerned about family health, unemployment, and food. Many high school students are taking on more responsibilities like taking care of younger siblings or working at grocery stores to help the family out."
- "Those students who have homes that don't serve as a center of safety and security are having the hardest time being there. We have had a few students attempt to run away from home."

## WHAT IS WORKING FOR YOU IN YOUR VIRTUAL LEARNING SPACES? WHAT HAS BEEN YOUR BIGGEST SUCCESS SO FAR?




**Despite these challenges, teachers reported a number of successes with virtual learning. The top two most common successes identified by teachers centered on online-learning platforms. 24% of respondents mentioned a specific online tool that they felt had been particularly useful (i.e. Seesaw, Class Dojo, Zoom) and 20% specifically mentioned Google Classroom as a helpful platform. For those teachers that identified student engagement as a success, almost all of them gave credit to a particular online learning platform.**

- "Many students are excited to learn new material and see all of their friends during live lessons. We use zoom and the screen share so that the lesson is not much different than it would be if we were in class."
- "Students are using a variety of digital tools to access learning and they are also using a variety of tools to show what they are learning. I've been able to create and upload videos that incorporate Google Slides next to a video of me teaching the lesson."
- "I've enjoyed doing video chat "Lunch Bunches" with my students that is not academic and really focused on keeping the classroom community alive."

**Finally, teacher collaboration was key to success. 16% of respondents said lesson planning for a virtual context was going well, especially when they collaborated with other teachers. 10% of respondents said that collaborating with other teachers on delivering content to students contributed to their biggest success.**

- "Leaning on my grade level team and sharing resources is valuable. We plan together and share videos of us reading."
- "We have split up the tasks among our five member team to make sure we are getting the most attention in every subject.  That way, we are not getting burned out on trying to do all everything on our own."

# KEY CHALLENGES

**Four key challenge areas for educators emerged from the survey.**

## 1 LACK OF CONNECTIVITY

- Teachers struggled to provide instruction to students who did not have reliable access to the internet in their homes. A lack of connectivity was the most cited barrier to student learning.
- Teachers struggled to get in touch with families to check in on the social-emotional health of their students.

## 2 STUDENT & FAMILY ENGAGEMENT

- Teachers struggled to maintain student engagement for two main reasons:
  - Difficulty translating classroom material into a user-friendly, fun, and interesting virtual format.
  - Difficulty incentivizing and motivating students, as schools made decisions to no longer teach new material or to suspend grades.
- Teachers noted that the reality of remote learning was contingent upon parent support or adult engagement in the home, but major barriers existed that prevented full parent-engagement, such as parents working full time, families having multiple children in the household, etc.

## 3 SOCIAL EMOTIONAL LEARNING & SUPPORT

- It was difficult for teachers to build authentic environments with students where they could feel safe, honest, and truly heard.
- Teachers noted that students were missing their friends. Virtual classroom-environments are not sufficient replacements for in-person interactions among peers. Similarly, teachers perceived social isolation as having significant consequences for students' learning and engagement.
- Teachers perceived that it was difficult for many students to establish a school routine at home, with many students balancing additional home-life responsibilities.

## 4 IT & LEARNING SUPPORT

- For many teachers, navigating the plethora of edtech tools was overwhelming and they were unfamiliar with how to effectively use many of them.
- It was difficult for teachers to adapt and execute lessons for a digital, remote environment.

PART II

# CONCLUSION

The results of the teacher survey demonstrate the real-life consequences of the digital divide on teacher instruction and student learning. Again, a lack of connectivity in homes emerged as the primary challenge for teachers in a virtual context. Teachers described how they couldn't establish personal connections with students virtually and that left them feeling worried for their students' academic progress and social-emotional well-being. Teachers were particularly concerned about the widening opportunity and learning gap between students with access to the internet and those without. While teachers described the limitations of a virtual context for meaningful peer and teacher interaction and social-emotional learning for all students, the engaging online interactions teachers were able to create were lost for those students without access to the internet.

The teacher survey findings point to a need for dynamic and collaborative professional development opportunities, that support teachers through this transition and share high-impact instructional practices, technology tools, like edtech platforms and Learning Management Software platforms, that improve student engagement and learning. As a way to support teachers in response to the challenges they identified, LEANLAB is taking steps to partner with other education nonprofits to provide collaborative, joint professional development opportunities to support educators navigating the realities of remote learning. Moving forward, teachers will no longer be in a "chalkboard era." In the words of Kansas City Public Schools Superintendent Dr. Mark Bedell, "[School] will never look the same when this is all said and done. If all we're trying to do right now is just get through it and survive and then we go back, we will be completely irrelevant post-COVID-19." This is an opportunity for schools, community organizations, and elected leaders to be creative in the educational solutions we try in schools, at home, and in our community. Through an innovative mindset and willingness to go beyond traditional classroom practices, Kansas City could not only bridge the digital divide and make learning opportunities available for all students, the city could emerge as a leader, having redefined the education frameworks that will yield the next generation of active citizens.

LEANLAB understands that the connectivity needs reported here are dynamic and have the potential to change, given the complex implications of Covid-19. We are keeping a real-time, updated version of this document here to reflect ongoing changes in our local landscape.

# 5 RECOMMENDATIONS FOR STUDENT DIGITAL EQUITY

*Co-created with system level leaders from school systems across the KC metro area.*

### INTERNET PROVIDERS

- Internet providers should provide free internet service plans for all households with pre-k to college aged students.
- Provide "school-district education plans" with increased flexibility including:
  - No contractual obligations
  - Month-to-month options
  - No data caps
- Reduce barriers for non English-speaking and undocumented populations by:
  - Eliminating any status identifying documentation
  - Providing translational services in tech support service

### LOCAL & MUNICIPAL GOVERNMENT

- City Councils in KCMO and KCKS should adopt resolutions for Digital Equity. These resolutions should commit to supporting a phased plan for achieving 100% citywide student household adoption of internet, computers, and digital/online learning tools. The four phases are: Assessment, Costing, Funding, and Execution.

### SCHOOL DISTRICTS

- School districts should adopt a 100% digital equity pledge, ensuring 100% of students receive access to quality internet devices (laptops/tablets), and the ongoing tech support necessary to equitably participate in 21st Century Learning.

### PHILANTHROPISTS

- Philanthropy should give immediate, unrestricted funds to support the immediate technology needs (internet connectivity, laptops/tablets, and anticipated technology loss expenses) for the academic year 2020-21, while a more comprehensive government and corporate policy initiative is undertaken.

### STATE DEPARTMENTS OF EDUCATION

- Create grant programs for customized Professional Development and instructional resources for local districts, and
- Create a stipend program to incentivize exemplar instructional leaders to share best practices locally, state-wide and nationally.
- Leverage national best practices to inform the creation of clear learning standards aligned to best practices in distance learning