Summary of the September 2022 for KY K-12 Education Technology Leaders' Virtual Meeting

In case you missed it or want a refresher, the following is what we talked about during the September 20, 2022, EdTech leaders' virtual meeting. A copy of the video and audio can be found at: https://mediaportal.education.ky.gov/technology/2022/09/edtech-webcast-september-2022/.

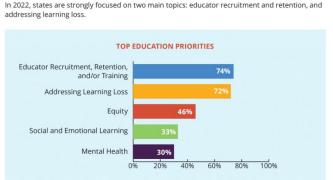
Public viewing of the archived webcasts and written summaries are also available on the KDE Media Portal at: http://mediaportal.education.ky.gov/. Numbers in RED indicate the timestamp for that portion of the discussion so it can be easily located on the full digital recording.

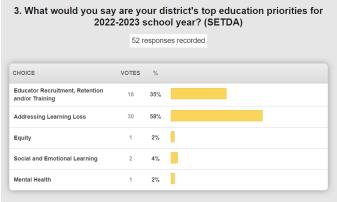
This was a virtual meeting with our OET staff and all the districts joining via Microsoft Teams and/or YouTube. We will continue to make these available from our KDE media portal so that you can watch the archived discussion and share with the appropriate people in your district. Several GoSoapBox poll questions were posed throughout the meeting and district EdTech leaders were asked to respond to all the questions as it assists us in planning and getting a feel for how to best move forward. Your voice and your feedback are important and extremely helpful to us. Please remember that in addition to these webcasts being available on the KDE Media Portal, each month's webcast is accompanied by these written summaries. We encourage you to share the link and all or any portion of these summary notes with staff throughout your district who may find the information beneficial to them in their position.

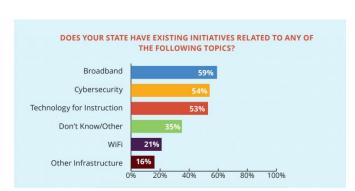
(1:33) Highlights and Main Takeaways from recent State Education Technology Director's Association (SETDA) Report – KDE is a member of SETDA as well the Council of Chief State School Officers (CCSSO). The SETDA group recently completed a survey that all states completed; the full report can be reviewed at SETDA.. This survey and report is the first attempt to track how state education agencies and policymakers are adapting to a digital world post-pandemic while also identifying state priorities relating to technology and education.

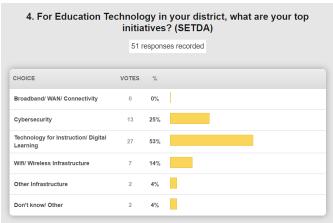
In Kentucky we are seeing/feeling many of the same things we see in the slide below and this is becoming more noticeable in areas like our STLP program and computer science areas. Recruitment and retention are making school travel and building programs much more challenging. This is for KY K-12 positions as well as other positions within schools—bus drivers, janitorial service, cafeteria workers, etc. David encouraged CIOs to be thoughtful about this in discussions within their schools and districts.

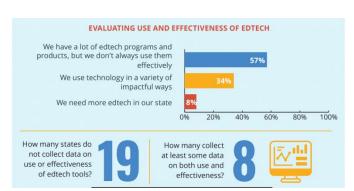
David shared some of the slides from the report and we posed some GoSoapBox questions that align with these charts to capture where our CIOs believe KY K-12 falls in these areas.

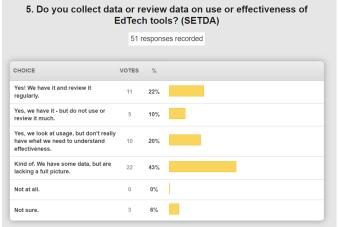


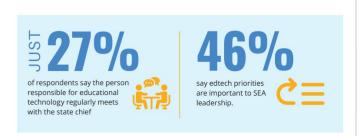


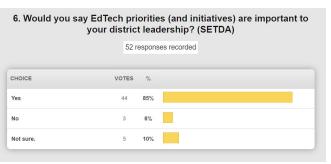


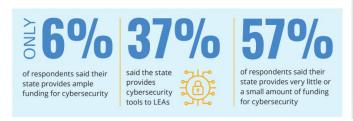












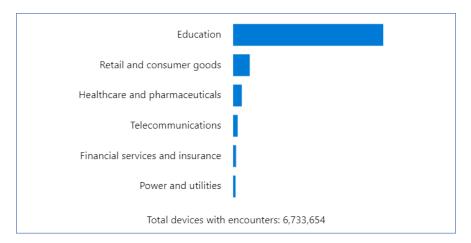


Cybersecurity is very much a concern and one where we lead several statewide initiatives. We are by no means perfect, but we do make cybersecurity a priority and are looking for ongoing funding for some of the areas where we were able to apply federal funding.

(9:55) 2022 KY K-12 Cybersecurity Healthcheck Report – This annual report was due to your Superintendents and local boards no later than an August 30; this is required by regulation. KDE's Office of Education Technology (OET) is also required to provide this informational update to the KDE Commissioner

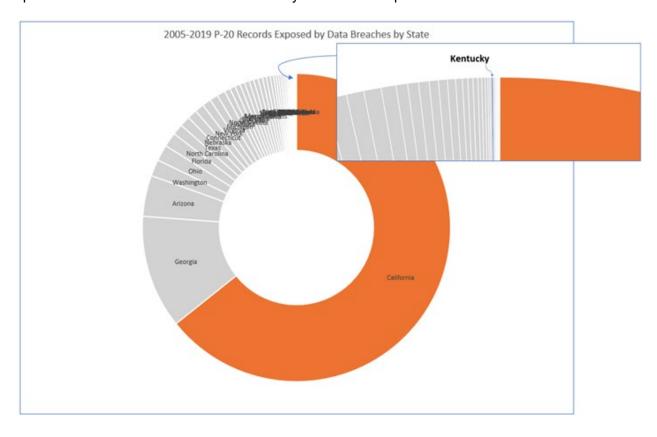
and KBE in regard to what we have done in KDE to address KY K-12 edtech cyber security during the previous school year and to bring to their attention any major issues that we want the Commissioner and the KBE to be aware of before the next school year. An excerpt of this report was sent out to ClOs prior to today's meeting.

This is an excellent opportunity to educate your board members and discuss how education organizations are the #1 target of cybercriminals with the highest overall number of cyberattacks as seen in the chart below:



We continue to try to improve our product and design standards and to make our KDE staff and our districts more cyber-savvy. Within KDE the agency we have been piloting multi-factor authentication and are now implementing. Many districts are currently planning or have done the same. Having statewide product standards has been very beneficial in our efforts to improve our overall approach.

The following chart shows where Kentucky stands in terms of educational data breaches compared with the rest of the country using the latest available data for all states. Bob commented that attackers go where the money is and education received a record amount of federal funding. We need to keep moving forward in improving our cybersecurity efforts. Cyberattackers are being more intentional and more sophisticated in their "plans of attack" and we have to continually review and improve our efforts as well.



(14:54) KY K-12 EdTech Contracts Status Updates –

- Next Generation K-12 Internet It is in process and moving forward as expected and anticipated; there are
 no red flags and no concerns at this time. Since it is an open and active procurement, we cannot provide
 any additional details.
- <u>SEEK Update</u> Preliminary planning and activities are moving forward for a new solution for the existing SEEK system.
- <u>Identity Management</u> We are investigating our options around this; we have heard the message and a potential procurement is definitely one of the avenues being discussed and reviewed.

(17:33) KETS Offers of Assistance/SFCC Update -

- Notifications for the first KETS Offer of Assistance are still on track to go out in early October. This will be a \$12/ADA first offer and notifications should be coming your way.
- We went before the SFCC at their September 7th meeting sharing the same presentation given to the Kentucky Board of Education (KBE) at the August 3rd KBE meeting where the KETS monies were approved for distribution. SFCC has been a great partner and teammate over the past 30 years.

(19:24) Upcoming Student Technology Leadership Program (STLP) Regional and State Championship Update - We are ramped up and excited for this school year and the long serving STLP Program. This year's theme is "STLP ALL IN" and we hope to have even more students excited and involved in the program. The upcoming 2023 STLP State Championship is scheduled for April 19, 2023. You've given us great feedback and David previously mentioned some of the personnel and travel challenges all districts are facing. Because of this, Regionals will be virtual this year and we will make the very best of it. In person experiences are the best but travel and staffing restrictions are not in our favor. Last year's online connect Regional model seemed to significantly and positively impact the quality of project presentations which, as a result, enhanced the success of the 2022 State Championship!

We had an amazing day at Central Bank Center/Rupp Arena and have reviewed all of your feedback and recommendations on how we can make better use of the space and improve the experience.

For news & updates and a One-Stop-Shop to Review All Important Recent STLP Info, check out https://stlp.education.ky.gov/news/

(28:14) Internet Bandwidth/Being Frugal with Internet – To illustrate his points, David used examples about using a generator for camping or power outages. Even if this isn't the case, most people are not aware of how much power certain devices take to operate. David also gave an example of trying to watch a football game while at the Breathitt County family farm and how certain programs and devices require more bandwidth. This came to light during the pandemic and we sent out the following graphic and link:



Most users are unaware. Remote and virtual instruction required us all to be much more aware of Internet usage. There are questions and considerations for any technology-enabled initiative. There are five questions that need to be asked before beginning every technology enabled initiative: *Can you? Should you? How much? Who pays? Is there a legal purchasing mechanism?*

The seven main details of consideration for those 5 questions:

- 1. Impact on student's academics, instruction, and core operations of a district during prime instructional hours
- 2. Impact of money/funding (what primary funding source, what is it to pay for, how does the money work, does it jeopardize e-rate, stay on the high ground/not gaming the system)
- 3. Impact on cybersecurity and safety
- 4. Impact on amount of KY K-12 Internet bandwidth required or not required
- 5. Impact on KETS product/service and design standards
- Gartner Hype Cycle
- 7. Short & long term: Impact of people coming and going

Use of the KY K-12 network for after-hours/non-instructional activities has the potential to impact our maximization of the E-rate rebate program. While E-rate is somewhat non-specific in how they define this, you should be able to easily defend the bandwidth usage on your network. If you are doing anything that begins to exchange money or the school/district could realize a profit, then it has even more implications and will increase the effort and actions necessary to manage it.

As a reminder, we wanted to share again a portion of what we included in our May 2021 summary notes for this monthly webcast:

"...KY K-12 Internet Services During Basic & Extended School Hours – The main focus of our KY K-12 Internet service has always been instructional even though the network is also used for administrative needs. Our focus this summer and going forward is to make sure that our instructional network is used primarily for day-to-day instruction during core instructional hours.

Sports and gaming activities should be done after these core instructional hours and this needs to be an item that is regularly discussed. Anything that is not day-to-day, instructionally related should be done after the core instructional hours of 6 a.m. to 6 p.m. (*changed to 6 am to 4 pm after the pandemic*). This includes, but is not limited to, things such as:

- Sporting events/broadcasts
- Sports game film posting of players and traditional post-game film exchange between team coaches in digital form (e.g., Hudl, Dragonfly, etc.)
- Sanctioned/non-sanctioned eSports gaming
- Grid computing

There will be increased emphasis on extended school day services as many of our educational services are now reaching beyond the traditional school day... "

(45:17) OET's Relationship to Other Organizations – Today we spent some time showcasing and discussing our long-standing relationships with other organizations (e.g., KET, KHSAA), tech vendor (DMD-Volta), districts (JCPS, FCPS, other smaller districts) and other KDE offices as a way to highlight the importance of great partnerships. Having good relationships and partnerships with our vendors has been one of our superpowers.

• **Kentucky Educational Television (KET)** is an example of a great partnership between state agencies for 50 years. Tim Bischoff, Chief Technology Officer at KET, joined us during the webcast to share some things that KET and KDE are working on collaboratively that impact KY K-12 students and staff at school and beyond the school campus (e.g., ATSC 3.0/ NextGen TV, KET's Network Center Infrastructure upgrade, KY K-12 students Online Learning Experience Collaborative project, PBS Learning Media, Virtual Labs, News Quiz, K-12 PD, STLP, KySTE, and new public safety project).

In the early days of KETS, KY was already the first state to have educational television available in every school. We have had a very collaborative versus a competitive relationship with KET over the past 30 years. Compared to the other 49 states, we are very lucky to have this teamwork and successful relationship.

Tim gave us a bit of television standard history as we transitioned from Black and White to color to stereo to high definition. The last big shift was from analog to digital. ATSC3.0 was approved in 2017 by the FCC and it's referred to as NextGen TV. The upgrading of the transmitters and antennas is complete and KET is now working on the encoding, public safety emergency warning systems and the network center/next gen conversion. The replacement of outdated equipment and infrastructure is being done through a grant in conjunction with KDE. This is deploying across the US and internationally. He shared a short video that provided an overview and talked about how viewers would need to "activate" these services as they become available in your area. You can also visit https://watchnextgentv.com to check out all the specifics.

Other areas of collaboration with KET:

- PBS Learning Media is another partnership we've had with KET and they have streamed over 4M resources in Kentucky over the past 12 months. This is an increase of over 150%.
- NewsQuiz is entering into its 37th year and used by 160,000 of our students and teachers in 118 of our school districts this past year.
- K-12 PD Over 1300 certificates have been issued to date.
- KyOnline Learning Experience Collaborative Created to support high quality online/virtual instruction.
- DMD/Volta has been an excellent vendor partner in the KETS program. They recognized we were moving from on-premise to the cloud and that it was in the best interest of the educational environment to move in that direction.
- Relationships with our school districts are crucial and we discussed some background on two of our
 districts. Our current working relationship with Jefferson County and Fayette County is outstanding but it
 wasn't always that way. Early on in the KETS program, we struggled in dealing with our larger districts
 especially in the area of statewide services, product standards and equitable purchasing standards. We

have been fortunate to be able to grow these relationships over the years. We had a great working partnership with Toyota and Fayette County and continue to use both of these large school districts to pilot new project implementations.

• Kentucky High School Athletic Association (KHSAA), led by Julian Tackett, is an example of a great partnership between state agencies for 30 years. We truly appreciate our working relationship with Julian and his staff. Today we provided an update on a few key things that OET and KHSAA are working on cooperatively in the area of technology enabled systems that impact KY K-12 students and staff at KY K-12 school campuses and beyond the school campus (e.g., school information systems (IC)/portal, game film video exchange/edits/viewing (HUDL), broadcasting/viewing of live/on demand sports events through Pixellot & National Federation of High Schools (NFHS) apps, KHSAA eSports, GoFAN electric ticketing).

Our long partnership began with the school information system and how it could support student eligibility. This is one of those items using bandwidth that has a money-making aspect to it. School sports, in general, need to keep up with the monies involved to support all of the sports. The following charts were shown and described:

First column is 2018-2019 and second column is 2017-2018. As you can see, school sports do create revenue and supports sports overall at the school/district level.

| EVENT NET REVENUE | | | |
|-------------------|-----------|-----------|---|
| Archery | \$3,350 | \$5,312 | |
| Baseball | \$48,093 | \$20,640 | |
| Bass Fishing | \$2,980 | \$7,972 | |
| Boys Basketball | \$837,383 | \$866,699 | |
| Girls Basketball | \$124,386 | \$68,055 | |
| Bowling | \$6,546 | \$5,415 | |
| Competitive Cheer | \$41,143 | \$12,584 | |
| Cross Country | \$38,888 | \$42,776 | |
| Dance | \$6,492 | \$7,436 | |
| Field Hockey | \$13,712 | \$12,887 | |
| Football | \$196,711 | \$350,673 | |
| Boys Golf | -\$6,578 | -\$3,086 | |
| Girls Golf | -\$610 | -\$3,993 | |
| Soccer | \$30,611 | \$33,006 | |
| Softball | \$8,751 | -\$2,174 | |
| Swimming | \$7,449 | \$12,390 | |
| Tennis | \$3,005 | \$1,105 | · |
| Track and Field | \$37,099 | \$30,219 | |
| Volleyball | \$16,102 | \$15,406 | |
| Wrestling | \$33,920 | \$34,312 | · |

KHSAA PARTICIPATION REPORT TEAMS BY LEVELS

| Sport | | Varsity | | | JV | | Fres | Freshman | |
|------------------|---------|---------|----------|-----|-------|---------|-------|----------|--|
| эроп | | Teams | Play | ers | Teams | Players | Teams | Players | |
| Archery | | 201 | 3,1 | 199 | 12 | (|) 1 | 0 | |
| Baseball | | 261 | 3,5 | 532 | 227 | 24 | 1 77 | 38 | |
| Basketball - Bo | ys | 275 | 2,7 | 754 | 271 | 80 | 209 | - | |
| Basketball - Gir | ls | 270 | 2,7 | 753 | 248 | 4 | 7 160 | 13 | |
| Bowling - Boys | | 108 | 6 | 377 | 7 | (| 0 0 | 0 | |
| Bowling - Girls | | 103 | | 155 | 7 | | 0 0 | 0 | |
| Bowling - Unifie | ed | 34 | | 110 | 0 | | 0 0 | 0 | |
| Cheerleading | | 246 | <u> </u> | 113 | 24 | 2 | | 6 | |
| Cross Country | _ | 262 | <u> </u> | 678 | 55 | 23 | | 8 | |
| Cross Country | - Girls | 259 | | 538 | 53 | 1 | | 6 | |
| Dance | | 107 | _ | 935 | 5 | 10 | | 0 | |
| Esports - Spring | | 106 | | 766 | 15 | | 3 | 0 | |
| Esports - Winte | | 81 | | 547 | 10 | |) 2 | 0 | |
| Fast Pitch Softh | | 257 | <u> </u> | 343 | 228 | 1 | | - | |
| Field Hockey - 0 | Girls | 19 | | 286 | 14 | | 4 | 0 | |
| Fishing | | 122 | | 015 | 5 | |) 1 | 0 | |
| Football | | 222 | _ | 373 | 192 | 713 | | 94 | |
| Golf - Boys | | 251 | <u> </u> | 347 | 42 | 29 | | 0 | |
| Golf - Girls | | 227 | | 343 | 29 | 20 | | 0 | |
| Lacrosse - Boy | | 33 | | 158 | 18 | |) 2 | 0 | |
| Lacrosse - Girls | 3 | 32 | 4 | 106 | 23 | 12 | 2 4 | 0 | |
| Soccer - Boys | 203 | 3,0 | 16 | 16 | 66 | 407 | 23 | 44 | |
| Soccer - Girls | 204 | 2,9 | 05 | 16 | 62 | 305 | 13 | 21 | |
| Swimming - Boys | 141 | 9 | 63 | | 8 | 0 | 1 | 0 | |
| Swimming - Girls | 146 | 1,3 | 11 | | 9 | 0 | 1 | 0 | |
| Tennis - Boys | 221 | 1,2 | 47 | 3 | 35 | 0 | 0 | 0 | |
| Tennis - Girls | 222 | 1,6 | 40 | 4 | 42 | 0 | 0 | 0 | |
| Track - Boys | 261 | 4,1 | 51 | 2 | 29 | 1 | 7 | 0 | |
| Track - Girls | 262 | 3,3 | 82 | (| 33 | 0 | 8 | 0 | |
| Track - Unified | 33 | 1 | 25 | | 1 | 0 | 0 | 0 | |
| Volleyball | 275 | 2,7 | 74 | 27 | 73 | 380 | 189 | 191 | |
| Wrestling | 126 | 1,5 | 15 | 4 | 40 | 4 | 4 | 0 | |

eSports enrollment uses PlayVS.com to help administer the eSports program. Enrollment for the Fall is open now with the current list of game titles:

- » NBA 2K
- League of Legends
- » Rocket League
- >> Hearthstone
- >> Madden
- Super Smash Bros.™ Ultimate
- » Splatoon™ 2
- » Mario Kart™ 8 Deluxe

We'll know soon which ones of these have met the sign-up threshold to move forward for this school year. Video games do require a very reliable connection and consume significant bandwidth. Start times for these games has been a concern. From a KDE perspective we have no issue with a team beginning after 4 p.m. in their local time and Switch games can begin at any time since they do not access the KY K-12 Internet network; however, there are cybersecurity considerations. The real issue is the PlayVS platform – they have required all teams to begin at the same time regardless of time zone and that is why the current start time has been made 5 p.m.

For some background on eSports, please visit the following:

Nintendo Switch: <u>10/15/21 – Esports in Public Schools on the KY K-12 Internet Service | Kentucky High School Athletic Association (khsaa.org)</u>

eSports enrollment possibilities <u>07/29/22 – 2022 Fall Esports Enrollment Information | Kentucky High</u> School Athletic Association (khsaa.org)

- Many schools are moving toward electronic ticketing, using GoFan, for sporting events and this is a
 moneymaker that has increased bandwidth usage. This is being used by 99 schools at this time and is
 being used for regular season as well as post season events.
- NFHS Network is a service of the KHSAA and allows you to watch events live or go back and watched archived events; there is a cost for this service but it is relatively inexpensive. We are fine with this service being used after instructional hours.
- Hudl is a service used to capture, analyze and learn from video and data; the games are recorded and then can be downloaded. It allows players to create their own highlight films, etc. We recently analyzed the amount of bandwidth being used during instructional hours and it is very minimal; we hope you continue to use this service and download/use these after core instructional hours.

(1:33:29) Eastern KY Campgrounds as it relates to EdTech for those flooded districts and all other districts – We continue to meet virtually on a weekly basis with flood districts. Assistance and donations from other districts have been phenomenal; they didn't have to go outside of school districts to get needed hardware—GREAT. We are currently part of conversations about connectivity for campground areas, especially the Breathitt County campground. This one is the main one that is so remote that it isn't possible to use hotspots and we are working with EMA to get Internet service to this campground.

(1:35:02) Special Stilwell Award Update – OET conducted their award ceremony and David shared some of those photos. As we prepared for the ceremony, it was very interesting to find that 97% of our OET staff were with us the entire time (March 2020 to March 2022). We hope you are planning some fun events to distribute these awards and we'll be planning the Red Suspender Day in the near future. The KDE website will be updated with a complete list of awardees in the near future.

Additional GoSoapBox questions posed during the webcast:

| | 50 | | and the second s |
|------------------------------------|-------|--------|--|
| | 56 F | espons | es recorded |
| | | | |
| CHOICE | VOTES | % | |
| Complete or nearly complete | 32 | 57% | |
| Making good progress | 9 | 16% | |
| Organizing and planning the review | 4 | 7% | |
| Not sure but will check | 11 | 20% | |

| | | | 2. What is your district status on completion of the review/approval of non-accountability data? | | | |
|------------------------------------|-------|--------|--|--|--|--|
| | 50 re | espons | es recorded | | | |
| CHOICE V | OTES | % | | | | |
| Complete or nearly complete | 7 | 14% | | | | |
| Making good progress | 10 | 20% | | | | |
| Organizing and planning the review | 4 | 8% | | | | |
| Not sure but will check | 29 | 58% | | | | |